

MADHYA PRADESH ELECTRICITY REGULATORY COMMISSION

5th Floor, Metro Plaza, Bittan Market, Bhopal - 462 016



AGGREGATE REVENUE REQUIREMENT AND RETAIL SUPPLY TARIFF ORDER FOR FY 2013-14

Petition no 01/2013

PRESENT:

**Rakesh Sahni, Chairman
A. B. Bajpai, Member
Alok Gupta, Member**

IN THE MATTER OF:

Determination of Aggregate Revenue Requirement (ARR) and Retail Supply Tariff for FY 2013-14 based on the ARR & Tariff Application made by the Distribution Licensees namely Madhya Pradesh Poorv Kshetra Vidyut Vitaran Company Limited (East Discom), Madhya Pradesh Paschim Kshetra Vidyut Vitaran Company Limited (West Discom), Madhya Pradesh Madhya Kshetra Vidyut Vitaran Company Limited (Central Discom), and Madhya Pradesh Power Management Company Limited (MPPMCL).

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A1: ORDER

(Passed on this 23rd Day of March, 2013)

- 1.1 This Order is in response to the Petition no. 01 of 2013 jointly filed by Madhya Pradesh Poorv Kshetra Vidyut Vitaran Company Limited, Jabalpur, Madhya Pradesh Paschim Kshetra Vidyut Vitaran Company Limited, Indore and Madhya Pradesh Madhya Kshetra Vidyut Vitaran Company Limited, Bhopal (hereinafter individually referred to as East Discom, West Discom and Central Discom respectively and collectively referred to as Discoms or Distribution Licensees or Licensees or the petitioners), and Madhya Pradesh Power Management Company Limited, Jabalpur (hereinafter referred as the MPPMCL or collectively with Discoms referred to as the Petitioners) before the Madhya Pradesh Electricity Regulatory Commission (hereinafter referred to as MPERC or the Commission). This petition has been filed as per the requirements of the Madhya Pradesh Electricity Regulatory Commission (Terms and Conditions for Determination of Tariff for Supply and Wheeling of Electricity and Methods and Principles for Fixation of Charges) Regulations, 2012 {RG-35 (I) of 2012} (hereinafter referred to as the Tariff Regulations).
- 1.2 In accordance with the Tariff Regulations, the Distribution Licensees of the State were required to file their respective Petition(s)/proposal(s) for the determination of Aggregate Revenue Requirement (ARR) and Retail Supply Tariff for FY 2013-14 latest by 17th December, 2012. Accordingly, the Commission vide letter dated 1st December, 2012 directed Distribution Licensees and MPPMCL to file the Petition for determination of ARR and Retail Supply Tariff for FY 2013-14, in accordance with the Tariff Regulations by 17th December, 2012. MPPMCL, vide letter dated 17th December, 2012 requested the Commission to extend the date of filing of the Petition by another 15 days stating that formats of the approved Regulations are different from that of the previous Regulations and therefore, Discoms require more time to finalise their ARR. The Commission considered the request and directed that the Petition be filed by 31st December, 2012. The joint Petition (Petition No. 01/2013) was filed on 31st December, 2012 by the East Discom, West Discom, Central Discom and MPPMCL, for determination of their ARR and Retail Supply Tariff for FY 2013-14.
- 1.3 A motion hearing on the Petition was held on 5th February, 2013. During the hearing, representatives on behalf of the petitioners submitted the salient features of the Petition. The Commission admitted the Petition vide Order dated 5th February, 2013 and issued following time bound directives:
- i. The information/justification/data desired as mentioned in the annexure to the said Order be filed giving supporting details/documents wherever required latest by 15th February, 2013
 - ii. To publish the public notice in Hindi and English in the newspapers latest by 7th February, 2013 for inviting objections /comments/suggestions from the stakeholders on the subject Petition.

- iii. English and Hindi version of the Petition be kept ready for sale to stakeholders from 8th February, 2013 positively at the offices mentioned in the public notice.
- 1.4 Further a meeting was convened by the Commission with the MDs and concerned officers of the Discoms and MPPMCL on 5th February, 2013 to discuss the issues related to the petition and to seek clarification on various items of the petition.
- 1.5 Public notices comprising the gist of the tariff applications and tariff proposals were published by the East Discom, West Discom and Central Discom on 7th February, 2013 in the Hindi and English newspapers. The stakeholders were requested to file their objections/comments/suggestions latest by 28th February, 2012.
- 1.6 The Commission has received written objections details of which along with the analysis are given in the chapter ‘A6: Public Objections and Comments on Petition’ of this order.
- 1.7 During FY 2013-14, the new tariff determined through this Order shall be applicable from the 1st April, 2013 up to 31st March, 2014.
- 1.8 The gist of the Petition submitted is given below:

Table 1 : Snapshot of the Petition (Rs. Crore)

Particulars	East Discom	West Discom	Central Discom
Revenue from sale of power	5841.09	8009.37	6150.86
Non- Tariff income	68.43	65.06	46.23
Aggregate Revenue Requirement	7103.36	9445.01	7671.30
Revenue gap in Income and Expenditure for FY 2013-14	1262.27	1435.65	1520.44

- 1.9 During the scrutiny of the Petition, deficiencies were observed in the information regarding sales, power purchase and other ARR items. The petitioners were directed to submit the relevant data and information. The Central Discom vide letter dated 19th January, 2013 filed additional submission in the matter. The petitioners subsequently submitted the additional data vide submission dated 19th February, 2013. In view of the submissions made by the petitioners as well as information available with the Commission, the Commission proceeded to determine the ARR and Tariff for FY 2013-14.
- 1.10 Revenue gap of Rs. 1262.27 Crore, Rs. 1435.65 Crore, and Rs. 1520.44 Crore for East, West and Central Discom respectively has been projected. It has been clarified in the petition that the revenue gap does not include the true-up costs of previous years and past liability on account of contribution towards terminal benefit trust funds. The petitioners have also submitted the additional estimated revenue on account of

proposed increase in tariff. The petitioners have prayed to treat the balance unrecovered revenue gap of three Discoms as Regulatory Asset and have proposed its amortization over a period of three years starting from FY 2014-15. The additional estimated revenue on account of proposed tariff is tabulated as under:

Table 2: Additional Revenue due to proposed tariff increase (Rs. Crore)

Particulars	East Discom	West Discom	Central Discom
Total Revenue at Current Tariff	5841.09	8009.37	6150.86
Total Revenue at Proposed Tariff	6262.74	8609.05	6703.21
Additional Revenue due to proposed Tariff increase	421.65	599.69	552.35

Table 3: Proposed recovery of revenue gap (Rs. Crore)

Particulars	East Discom	West Discom	Central Discom
Total Revenue Gap	1262.27	1435.65	1520.44
Increase in revenue due to proposed tariff revision	421.65	599.69	552.35
Regulatory Asset proposed	840.62	835.96	968.10

Uniform Retail Tariff across Discoms

- 1.11 It was conveyed by GoMP in FY 2012-13 that the tariff for all consumer categories be kept the same across the state in the foreseeable future. GoMP vide letter no 2150/13/2013 dated March 14, 2013 has conveyed that the tariff for all consumer categories be kept the same across the state in FY 2013-14. The Commission vide letter no MPERC/RE/2013/842 dated March 14, 2013 requested GoMP to re-allocate the existing and new generating capacities amongst the Discoms for FY 2013-14 so that the aforesaid intent of GoMP could be given effect. Accordingly, GoMP has revised allocation of generating capacities vide its letter No. 2254/13/13/02 dated March 19, 2013.

State Advisory Committee

- 1.12 The Commission convened a meeting of the State Advisory Committee (SAC) on 27th February, 2013 for seeking advice on the Petition. The SAC members provided several valuable suggestions which have been duly considered by the Commission while determining the ARR and Tariff for the FY 2013-14.

Public Hearing

- 1.13 The Commission issued public notice on 16th February, 2013 in various newspapers across the state inviting interested stakeholders to present their views on the petition during public hearings.
- 1.14 Public hearings on the Tariff Petition filed by the Discoms were held by the Commission at Jabalpur, Bhopal, and Indore. These were conducted as per the following schedule.

Table 4: Public hearing

Sr. No.	Name of Discom	Place/venue of Public Hearing	Date
1	M.P. Poorv Kshetra Vidyut Vitaran Company Ltd., Jabalpur,	Tarang Auditorium, Shakti Bhavan, Rampur, Jabalpur	2 nd March, 2013
2	M.P. Madhya Kshetra Vidyut Vitaran Company Ltd., Bhopal	Auditorium, Academy of Administration, 1100 Quarters, Bhopal	5 th March, 2013
3	M.P. Paschim Kshetra Vidyut Vitaran Co. Ltd., Indore	Santosh Sabhagrah, Charak Hospital Campus, Rani Sati Gate, Near temple, Yashwant Niwas Road, Indore	8 th March, 2013

- 1.15 The Commission has ensured that due process, contemplated under law to ensure transparency and public participation is followed at every stage meticulously and adequate opportunity has been given to all persons to file their comments/suggestions in the matter.
- 1.16 All objections/comments/suggestions related to the petition received from the stake holders as also the issues raised by them during the hearings have been duly considered while finalizing this Order.

Distribution Losses

- 1.17 While notifying the MYT Regulation for distribution tariff the Commission had given distribution loss trajectory for the period from FY 2013-14 to FY 2015-16 after due consultation with the stake holders including the Discoms keeping in view the interests of the consumers as also of the Discoms. The distribution loss reduction trajectory specified in the Regulations is given in the following table:

Table 5: Distribution Loss reduction trajectory as per Regulations

Particulars	FY 2013-14	FY 2014-15	FY 2015-16
East Discom	23%	20%	18%
West Discom	20%	18%	16%
Central Discom	23%	21%	19%

Energy Accounting and Meterisation

- 1.18 In the Tariff Orders for FY 2011-12 and FY 2012-13, the Commission had emphasized the importance of energy accounting and meterisation. Need for proper Energy Accounting and Energy Audit at various levels such as sub-stations, distribution feeders and distribution transformers as well as at consumer end was also impressed upon the Discoms so as to provide reliable data about the actual level of distribution losses – technical and other. Discoms were directed to prepare and implement appropriate loss reduction strategies and schemes. Meterisation at various levels of the distribution network such as feeder/ DTR metering and consumer metering is of prime importance to locate high loss areas to take action to curb losses. The Commission, has however, noted with deep concern that not much headway has been made in this direction by the distribution licensees during the past years. While there appears to be some progress with regard to feeder meterisation, meterisation of agricultural DTRs and individual un-metered domestic connections remains neglected. The status as per periodic reports submitted with regard to meterisation of un-metered rural domestic connections and agricultural predominant DTRs and feeders up to December, 2012 is as given below:

Table 6: Status of feeder meterisation as on 31.12.2012

Sr. No.	Particulars	Central Discom		West Discom		East Discom	
		33kV feeders	11kV feeders	33kV feeders	11kV feeders	33kV feeders	11kV feeders
1	Total No. of energy Audit points	1270	3028	2249	4418	1501	3192
2	No. of feeders which are provided with energy audit metering.	1168	2518	1880	3251	1501	3192
3	No. of feeders where energy audit meters are lying defective	51	116	430	1210	Nil	Nil
4	No. of feeders on which energy audit meters are yet to be provided	102	510	369	1167	Nil	Nil

Table 7: Status of meterisation of un-metered rural domestic consumers/agricultural DTRs

Discom	Domestic Rural			Agricultural DTR		
	Total no. of connections	No. of un-metered connections	Percentage (%) un-Metered	Total no. of Pre-dominant Agricultural DTRs	No. of DTRs provided with meters	Percentage (%) of DTRs provided with meters
East	1781883	902041	50.62%	60531	410	0.68%
West	1534806	285870	18.63%	74161	16204	21.85%
Central	1072223	356346	33.23%	76896	12505	16.26%
State Total	4388912	1544257	35.19%	211588	29119	13.76%

- 1.19 The Commission is aware of the fact that there are issues with regard to individual meterisation of a very large number of agriculture consumers. The Commission, therefore, had been repeatedly directing all the Discoms to step up meterisation of agriculture predominant distribution transformers. The Commission had directed that all agricultural predominant DTRs be got metered by March, 2012 as an interim arrangement till all individual agricultural connections are provided with meters. The progress is far from satisfactory. The Commission is of the firm view that all consumers should be metered individually or at least in group in case of agriculture consumers. The present regime of billing on benchmark consumption to either domestic or agriculture consumers has no incentive for energy saving by the consumers.
- 1.20 The State Govt. has announced a flat rate payment scheme for the year 2013-14 for agriculture pump consumers. Under this scheme the consumer shall make payment at a flat rate per HP twice a year in advance in the months of April and October and the balance amount shall be paid by the State Govt. as subsidy. This scheme includes un-metered agriculture consumers. In view of the features of this scheme, it has now become imperative that Discoms should provide meters expeditiously on agricultural predominant DTRs to ensure that supply to agriculture consumers is measured and that proper energy audit is possible.
- 1.21 The Commission convened a meeting with the MDs and officers of the Distribution Companies and MPPMCL on 5th Feb., 2013. During the meeting, the Commission sought the plan for meterisation of feeders/ agricultural DTRs and unmetered domestic connections. It was submitted by the petitioners that 100 % meterisation in this regard would be achieved by end of March, 2014. This was subsequently confirmed by the petitioners vide their submission of February 19, 2013. The Commission has further

observed that there are only about 20,000 un-metered domestic connections in urban areas. The petitioners submitted during the meeting that all these connections would be provided with meters very soon. The Commission directs the Discoms that this work should be completed by end of June, 2013 and in case of feeders, agriculture DTRs and rural un-metered domestic connections by end March, 2014.

- 1.22 The Commission has perused the additional submissions made by the Central Discom subsequent to the filing of the petition and has taken due cognizance thereof. The Commission has, however, considered due costs as per norms prescribed in the Regulations after prudent check.

Wheeling Charges and Cross Subsidy Surcharge

- 1.23 The Wheeling Charges and Cross Subsidy Surcharge for open access consumers have been dealt with in chapter – A4: “Wheeling Charges and Cross Subsidy Surcharge”.

Open Access

- 1.24 The Commission has noticed with strong sense of dismay the lethargy and indifference with which the applications for short term open access by consumers of 1 MW and above are treated by the Discoms. The Commission would like to make it absolutely clear that it is the right of every consumer of 1 MW and above to obtain electricity through open access at the time and for the period of his choosing. Any hesitation on the part of Discoms to obstruct or otherwise hinder open accessibility of electricity would be dealt with severely.

Aggregate Revenue Requirement of Discoms

- 1.25 The Commission has estimated the overall revenue requirement and in order to bridge the revenue gap has revised the retail supply tariffs for various categories. The Aggregate Revenue Requirement and the revenues accruing from the revised tariffs for FY 2013-14 for the three Discoms are contained in the detailed Order.
- 1.26 The gist of the Aggregate Revenue Requirement for FY 2013-14 as determined by the Commission in the present Order in respect of the three Distribution licensees of the State is given below:

Table 8: ARR summary as admitted by the Commission (Rs. Crore)

Particulars	East	West	Central	Total
Power Purchase Cost including MPPMCL cost	3914.03	6467.14	4401.49	14782.66
PGCIL charges	205.05	262.53	218.42	686.00
Transco Charges (MPPTCL) including Terminal Benefits	496.03	563.11	540.71	1599.85
SLDC Charges	3.02	3.09	3.18	9.29
O&M cost	852.15	792.89	746.91	2391.95
Depreciation	65.16	91.41	83.80	240.37
Interest on Project Loans	129.68	102.63	133.61	365.92
Return on Equity	168.16	167.52	174.14	509.83
Interest on Working Capital	0.00	0.00	0.00	0.00
Bad and Doubtful Debts	1.00	1.00	1.00	3.00
Interest on Consumer Security Deposit	49.35	52.25	47.95	149.55
MPERC Fees	0.48	0.67	0.51	1.66
Less: Other Income - Retail & Wheeling	-162.51	-229.23	-333.61	-725.35
ARR for FY 2013-14	5721.60	8275.01	6018.11	20014.72
Add: Impact of True ups	177.44	215.88	191.22	584.54
Total ARR for FY 2013-14	5899.04	8490.89	6209.33	20599.26
Revenue at Current Tariffs	5855.94	8420.11	6164.80	20440.85
Revenue Gap at Current Tariffs	43.10	70.78	44.53	158.41

- 1.27 The Commission has determined the ARR and the tariffs for FY 2013-14 for the three Discoms of the State on the basis of the distribution loss trajectory as specified in the Regulations.
- 1.28 Since the issuance of Retail Supply Tariff Order for FY 2012-13, the Commission has passed the following different Tariff Orders in case of Generation Companies and Transmission Companies, which would result in an impact of Rs. 584.54 Crore. These companies have been allowed to recover these costs from ARR of Discoms for FY 2013-14.

Table 9: Impact of true up/ final orders on ARR for FY 2013-14 (Rs. Crore)

Sr. No.	Particulars	Impact
1	Impact of True-up of MPPTCL Transmission Tariff for FY 2010-11	563.95
2	Impact of True-up of MPPGCL Generation Tariff for FY 2009-10	-190.64
3	Impact of Final Generation Tariff in Petition No. 59 of 2012	-2.94
4	Impact of Final Generation Tariff for 500 MW Ext. U-5, for SGTPS, Birsinghpur	125.84
5	Impact of compliance of ATE Judgment in Appeal No. 121/2011 filed by MPPGCL against MPERC Order dated 24th January, 2011 in Petition No. 55 of 2009	33.76
6	Impact of Final Generation Tariff for 210 MW Ext. U-5, for ATPS, Chachai	54.57
	Total	584.54

1.29 The table below indicates the approved ARR, revenue and revenue gap at current tariff and revenue from the new tariff (Annexure 2 and 3 to this Order) being prescribed in this Order.

Table 10: Final ARR and revenue from revised tariffs (Rs. Crore)

Particulars	East	West	Central	State
Total ARR for FY 2013-14 (A)	5721.60	8275.01	6018.11	20014.72
Add: impact (B)	177.44	215.88	191.22	584.54
Total ARR for FY 2013-14 (A+B=C)	5899.04	8490.89	6209.33	20599.26
Revenue at Current Tariffs (D)	5855.94	8420.11	6164.80	20440.85
Revenue Gap at Current Tariffs (C-D)	43.10	70.78	44.53	158.41
Revenue at Revised/New Tariffs (E)	5898.96	8490.96	6209.20	20599.12
Uncovered Gap/Surplus (E-C)	-0.08	0.07	-0.13	-0.14

1.30 The Commission has continued with the prescribed mechanism for recovery of Fuel Charge Adjustment (FCA) on quarterly basis so that uncontrollable costs on account of variation in the variable charges are adjusted timely in accordance with the spirit of tariff policy and as further directed by the Hon'ble APTEL.

1.31 The Commission has taken note of and assessed the projected sales for FY 2013-14 on the basis of the petitioners' commitment to provide 8 hours of continuous supply to agriculture consumers and 24 hours supply to all villages, towns and cities through-out the State from sometime within the next few months. The Commission directs that the

petitioners shall expedite all ongoing works to ensure that electricity supply as promised is available to all as quickly as possible.

Implementation of the Order

- 1.32 The Distribution Licensees must take immediate steps to implement this Order after giving seven (7) days Public Notice in the newspapers, in accordance with Regulation 1.30 of MPERC (Details to be furnished and fee payable by licensee or generating company for determination of tariff and manner of making application) Regulations, 2004, as amended from time to time. The tariff determined by this Order shall be applicable from 1st April, 2013 to 31st March, 2014, unless amended or modified by an Order of this Commission.
- 1.33 The Commission has thus accepted the Petition of the Distribution Licensees of the State and MPPMCL with modifications and conditions, and has determined the retail supply tariffs and charges recoverable by the Distribution Licensees in their area of supply for FY 2013-14. The Commission directs that this Order be implemented along with directions given and conditions mentioned in the detailed Order and schedules attached to this order. It is further ordered that the licensees are permitted to issue bills to consumers in accordance with the provisions of this Tariff Order and applicable Regulations.

-sd-

(Alok Gupta)
Member

-sd-

(A. B. Bajpai)
Member

-sd-

(Rakesh Sahni)
Chairman

A2: DETAILED REASONS AND GROUNDS ATTACHED WITH RETAIL SUPPLY TARIFF ORDER ISSUED BY THE MPERC ON 23RD MARCH, 2013 IN RESPECT OF PETITION NUMBER 01/2013

Shri F.K.Meshram, Chief General Manager (Tariff) represented the MPPMCL.

Shri P.K. Singh, Chief Engineer (Commercial) represented the East Discom

Shri Kailash Shiva, Chief Engineer (Commercial) represented the West Discom

Shri A.R. Verma, G.M. & S.E. (Commercial) represented the Central Discom

- 2.1 Following is the detailed order with grounds and reasons of determining the ARR, the tariff and the charges recoverable during FY 2013-14 by the three Distribution licensees. The detailed Order discusses about the functional and financial performance of the three Distribution licensees and includes a section dealing with the status report on the compliance of Commission's Directives as well as the responses of the Distribution Licensees thereto and Commission's observations on the suggestions and comments received from the stakeholders on the ARR and the tariff proposal.

A3: AGGREGATE REVENUE REQUIREMENT FOR FY 2013-14 OF MADHYA PRADESH POORV, PASCHIM AND MADHYA KSHETRA VIDYUT VITARAN COMPANIES LIMITED (EAST, WEST AND CENTRAL DISCOMS)

Summary of sales forecast as proposed by the Petitioners

- 3.1 The total sale of the Discoms, as projected by them during FY 2013-14 is 43010.77 MU viz. 12247.98 MU for East Discom, 17619.45 MU for West Discom, and 13143.34 MU for Central Discom.
- 3.2 The petitioners have submitted that for projection of sales for FY 2013-14, category wise and slab wise actual data of the sales, number of consumers, connected/contract load, etc. of the preceding five years .i.e. FY 08, FY 09, FY 10, FY 11, FY 12 is now available. It has been observed that the actual sales during FY 12 have deviated significantly from the sales forecast submitted by the petitioners and sales admitted in tariff order for FY 12. Considering the increase in supply hours particularly in the rural areas during the current year, it is considered appropriate to revise the sales forecast for FY 13 and thereafter project the sales for FY 14. The approach followed is to analyse the Compound Annual Growth Rates (CAGRs) of each category and its subcategories in respect of urban and rural consumers separately. After analysis of the data, appropriate/reasonable growth rates have been assumed for future consumer/ sale forecasts from the past CAGRs of the Category/Sub-category. The forecast also considers the impact of schemes/ plans of licensees such as Rajiv Gandhi Grameen Vidyutikaran Yojana (RGGVY), future meterization plan of urban domestic consumers and separation of feeders of agriculture and other categories of consumers and increase in supply hours in the rural areas. The projected sale for FY 2013-14 for LT and HT categories is given below:

Table 11: Sales projection proposed by Discoms (MU)

Particulars	East Discom	West Discom	Central Discom	Total for State
LT Sale	8654.03	13567.59	9738.73	31960.35
HT Sale	3593.95	4051.86	3404.61	11050.42
Total Sale	12247.98	17619.45	13143.34	43010.77

- 3.3 The category wise sale as filed by the petitioners is given in table below:

Table 12: Category wise sale proposed by Discoms (MU)

Particulars	Projections For FY 2013-14 (MU)			
	East Discom	West Discom	Central Discom	Total for the State
LT				
LV-1: Domestic	5089.70	5944.77	4378.79	15413.26
LV-2: Non Domestic	637.58	824.42	821.91	2283.91
LV-3: Public Water Works and Street Light	330.32	384.71	403.16	1118.19
LV4: LT Industrial	319.81	577.96	345.58	1243.35
LV 5.1: Irrigation Pumps for Agriculture	2273.72	5831.91	3783.68	11889.31
LV-5.2 : Agriculture related use	2.90	3.82	5.61	12.33
LT Sale (MU)	8654.03	13567.59	9738.73	31960.35
HT				
HV-1: Railway Traction	570.44	425.04	900.84	1896.32
HV-2: Coal Mines	496.48	0.00	33.47	529.95
HV-3.1: Industrial	1795.13	2855.29	1832.85	6,483.27
HV-3.2: Non-Industrial	249.89	404.59	334.24	988.72
HV-4: Seasonal	7.80	8.96	2.93	19.69
HV-5.1: Public Water Works, Irrigation	66.74	344.52	109.47	520.73
HV-5.2: Other than Agricultural	10.51	6.29	6.31	23.11
HV-6: Bulk Residential Users	396.96	7.17	184.5	588.63
HV-7: Bulk Supply to Exemptees	0.00	0.00	0.00	0.00
HT Sale (MU)	3593.95	4051.86	3404.61	11050.42
Total LT + HT Sale (MU)	12247.98	17619.45	13143.34	43010.77

Discom wise submission:**MP Poorv Kshetra Vidyut Vitaran Company Limited (East Discom):**

- 3.4 Discom has estimated sale to the tune of 9186.99 MU for FY 2012-13 and subsequently projected the sale as 12247.98 MU for FY 2013-14. The effect of RGGVY, meterization plan of domestic consumers, separation of feeders of agricultural and other categories of consumers and increase in supply hours in rural areas have been further added to project the sale. East Discom has projected 8654.03 MU (or approx. 71% of total sales) sales in LT categories and in HT categories as 3593.95 MU (or approx. 29% of total sales).
- 3.5 It is submitted by Discoms that after FY 2005-06, there has been considerable change in the infrastructure of the Discom and the reliability as well as quality of the supply has improved considerably. Further, supply hours have also increased gradually over past period. Therefore, the average monthly consumption of metered and un-metered

domestic consumers has increased considerably now, but due to regulatory constraints, the billing of un-metered domestic consumers is being done on the basis of assessed consumption approved by the Commission. It is requested that billing of un-metered domestic connections may be revised on the basis of the average monthly consumption of metered categories measured respectively in urban and rural areas. It is further submitted that due to anticipated increase in supply hours in FY 2013-14, the consumption of un-metered connections would also increase and therefore projections with regard to consumption of un-metered domestic connections have been considered as 136 units/month/connection and 100 units/month/connection in urban and rural areas respectively.

- 3.6 It is also submitted by Discoms that impact of implementation of the RGGVY has also been taken into account for future consumer/load/consumption projections. It is indicated that connected load per consumer for consumers added under the RGGVY has been taken as 300 watts per consumer and consumption of the consumers has been assumed at par with the metered consumption per consumer per month of rural consumers. Under RGGVY, the Discom has targeted 2.40 lakh consumers to be added in FY 2013-14 as compared to 2.47 lakh in FY 2012-13.
- 3.7 It is submitted that in case of agricultural category the Petitioner has projected the consumption of unmetered agricultural consumers for FY 2013-14 on the basis of existing billing benchmark i.e.1560 units and 1200 units per HP per annum in urban and rural area respectively with the month wise segregation as per norms provided in the tariff order for FY 2012-13.

MP Paschim Kshetra Vidyut Vitaran Company Limited (West Discom):

- 3.8 Discom has estimated sale to the tune of 13858.97 MU for FY 2012-13 and have projected the sale as 17619.46 MU for FY 2013-14. Sales to the tune of 13567.59 MU (or approx. 77% of total sales) in LT categories and 4051.86 MU (or approx. 23% of total sales) in HT categories have been projected.
- 3.9 It is submitted that after FY 2005-06, there has been considerable change in the infrastructure of the Discom and the reliability as well as quality of the supply has improved considerably. Further, the supply hours have also increased gradually over past period. Therefore, the average monthly consumption of metered and un-metered domestic consumers has increased considerably now, but due to regulatory constraints, the billing of un-metered domestic consumers is being done on the basis of assessed consumption approved by the Commission. It is requested that billing of un-metered domestic connections may be revised on the basis of the average monthly consumption of metered categories measured respectively in urban and rural areas. It is further submitted that due to anticipated increase in supply hours in FY 2013-14, the assessed consumption would also increase and therefore projected consumption of un-metered domestic connections have been considered as 163 units/month/connection and 100 units/month/connection in urban and rural areas respectively.

- 3.10 It is submitted in the Petition that in respect of the domestic category impact of implementation of the RGGVY has also been taken into account for future consumer/load/consumption projections. About 1.08 lakh new domestic consumers are likely to be added due to implementation of RGGVY having sales to the tune of 86.96 MU during FY 2012-13 and further 1.04 lakh new connections are likely to increase having projected sale of 254.87 MU for FY 2013-14. Further, in addition to normal growth, schemes such as Feeder Segregation Scheme and R-APDRP scheme, which are under execution, would help the Discom to tap the potential created by implementation of these schemes which is likely to result in considerable increase in number of new connections in city and town areas. It is further submitted that such demographic impact spread across the circles, with consequent increase in the growth of sale, has not been adequately covered by the historical growth trend. Hence, over and above the historical trend, the Discom has estimated an addition of around 4.76 lakh new consumers having estimated consumption of 746.11 MU during FY 2013-14. As regards Feeder Segregation Scheme, it is submitted that as per the plan of the company, 100% of the 11kV rural feeders will be bifurcated at the starting of FY 2013-14. This is further likely to increase sales by about 865.57 MU.
- 3.11 It is submitted that non-domestic category will register higher growth on account of expansion of city areas, upcoming small shopping complexes, and development of Indore as education hub of the State resulting in likely additional sales of 824.42 MU. In case of agricultural category, the Petitioner has projected the assessed consumption of unmetered agricultural consumers for FY 2013-14 on the basis of existing billing benchmarks .

MP Madhya Kshetra Vidyut Vitaran Company Limited (Central Discom):

- 3.12 Discom has submitted the revised sale estimation to the tune of 9939.84 MU for FY 2012-13 and subsequently projected the sale as 13143.44 MU for FY 2013-14. The implementation of RGGVY, meterisation plan of domestic consumers, separation of feeders of agricultural and other categories of consumer and increase in supply hours in rural areas have been considered to project the sale. Sales in LT categories are projected as 9738.73 MU (or approx. 74% of total sales) and in HT categories as 3404.61 MU (or approx. 26% of total sales).
- 3.13 It is submitted that the after FY 2005-06, there has been considerable change in the infrastructure of the Discom and the reliability as well as quality of the supply has improved considerably. Further, the supply hours have also increased gradually over past period. Therefore, the average monthly consumption of metered and un-metered domestic consumers has increased considerably now, but due to regulatory constraints, the billing of un-metered domestic consumers is being done on the basis of billing norms approved by the Commission. It is requested that billing of un-metered domestic connections may be revised on the basis of the average monthly consumption of metered categories measured respectively in urban and rural areas. It is further submitted that the average metered consumption per month in urban area in FY 2011-12 comes out to 125

units whereas in rural areas it is 47 units. The growth as seen from the data available up to September, 2012 comes out to 5.12% and 3.01% in urban and rural areas respectively and thus projections of consumption of un-metered domestic connections have been considered as 166 units/month/connection and 100 units/ month/connection in urban and rural areas respectively.

- 3.14 It is also submitted by the Discom that impact of implementation of the RGGVY has also been taken into account for future consumer/load/consumption projections. It is indicated that connected load per consumer for consumers added under the RGGVY has been taken as 300 watts per consumer and consumption of these consumers has been assumed at par with the metered consumers of rural area. Under RGGVY, the Discom has targeted 1.27 lakh consumers to be added in FY 2013-14 as compared to 0.70 lakh consumers in FY 2012-13.
- 3.15 It is submitted that in case of agricultural category the Discom has projected the assessed consumption of unmetered agricultural consumers for FY 2013-14 on the basis of proposed billing benchmark i.e.1760 units and 1420 units per HP per annum in urban and rural area respectively. It is submitted that the tariff for un-metered agricultural consumers is not based on the actual/realistic consumption. The Discom has cited certain reasons for under estimation of the unmetered irrigation pumps consumption, and accordingly requested to allow a 20% increase in the normative specific consumption, so that, the adverse impact of under estimation of unmetered irrigation pumps consumption gets minimized. It is further submitted that during FY 2013-14, it intends to maintain an average 3-phase supply for 8 hours to the agricultural consumers and thus due to anticipated increase in supply hours, actual consumption is likely for increase. It is requested by the Discom that projections of annual consumption of un-metered agricultural connections need to be reviewed and revised and have proposed it as 1760 and 1420 units/HP/annum in urban and rural areas respectively.

Commission's Analysis of Sale

- 3.16 Discoms have estimated that the sales would increase on account of implementation of RGGVY, Feeder Separation Scheme, and proposed increase in supply hours in rural areas, improvement in the reliability and quality of the supply on account of change in the infrastructure of Discoms over the period of time, etc. It is observed that Discoms in their submissions have maintained that they have envisaged increased hours of supply of electricity to every household in the state starting FY 2013-14 aimed at accelerating socio-economic development, particularly in the rural areas.
- 3.17 A meeting with MD's of the Discoms and MPPMCL was held on February 5, 2013, wherein Discoms briefed status of the progress on various ongoing and proposed activities. The Commission has also taken note of the clarifications/additional information provided by Discoms. Discoms were emphatic in their submission that rural supply hours would definitely increase substantially and the plan is to provide round the clock supply to all areas of the state. Discoms also supported their contention of increase in sale projections particularly in the domestic category of consumers and were

categorical in their stand that they will be actually achieving the sales projections made in the petition for various consumer categories in view of the fact that a number of schemes are under execution resulting in increase in supply to rural areas to the tune of 24 hours.

- 3.18 The Commission reviewed the sales forecast and compared the same with past trends. The Commission has taken due cognizance of various submissions made by Discoms for projected increase in sales. The Commission is supportive of the Discoms endeavour to provide unrestricted supply to all the consumers. Accordingly, it considers it prudent to accept the sales as filed and expects that the Discoms would endeavour to achieve their sales projections. Since the Commission has admitted the quantum of sales as filed, it expects that the Discoms would bridge the deficit in benchmarks proposed by the Discoms and revised benchmarks considered in this order for FY 2013-14 for billing to the unmetered categories of consumers. The basis for revising benchmarks for unmetered categories of domestic consumers is explained in the subsequent paragraph.
- 3.19 As regard Domestic un-metered urban and rural consumers, the Commission has decided to increase the billing benchmark for rural areas from the existing level of 42 units per consumer per month to 55 units per consumer per month against the proposed benchmark of 100 units per consumer per month, based on available historical data of metered domestic consumer categories. Similarly the existing billing benchmark of 77 units per consumer per month for urban areas has been revised as 100 units per consumer per month. However, the Commission would like to make it clear that unmetered connections are not desirable in view of the explicit provisions of the Electricity Act, 2003 and should not be allowed to continue without meter for an indefinite period. Discoms are directed that all the unmetered urban domestic connections be provided with meters by end of June, 2013 and all unmetered rural domestic connections be provided with meters by end of March, 2014.
- 3.20 The Central Discom has proposed revision in the billing benchmark for agriculture unmetered connections, while other two Discoms have not proposed any change. The Central Discom has submitted metered consumption data of about 4% of agricultural DTRs in their area. Sample size is found to be inadequate. Moreover, the metered consumption data needs to be duly validated. In view of the foregoing the Commission is not convinced of the proposal for revision of billing benchmarks for unmetered agricultural connections. Accordingly, the Commission decides to continue with the existing billing benchmark in case of unmetered agricultural connections.
- 3.21 The Commission further directs the petitioners that they should not unduly restrict supply to any category of consumers during the tariff period. In the event that the actual requirement of supply of power is in excess of the quantum admitted by the Commission for sale or power procurement projections in this tariff Order or due to paucity of generation from the sources identified in this Order, the petitioners shall take immediate steps to arrange the supply of required power from all available sources including medium or short term purchase. The petitioners shall have to make all possible efforts to provide adequate supply at all times to all the categories of the consumers of the state. However, the Discoms while procuring such power shall ensure compliance with the

requirements of the relevant Regulations and guidelines keeping a check on the distribution losses in the network.

Energy Balance and Power Purchase as Proposed by the Petitioners

- 3.22 The petitioners claim that they have considered available information from the key sector participants for computation of power purchase cost for the purpose of arriving at their revenue requirement. The petitioners have requested the Commission to take due cognizance of this fact while computing their allowable power purchase cost.
- 3.23 The petitioners have submitted that the forecast for power purchase cost takes into account the fixed and variable costs as per the previous approved costs as well as expected future costs projected by the MPPMCL or MP Genco, the fuel cost escalation as per the CERC Order on inflation index, and various other cost such as taxes, incentive, MOPA charges, Electricity Duty, Cess etc. as per the bills raised by NTPC for past financial years.
- 3.24 The petitioners have considered the percentage allocation of capacity (weighted average of 29.89% to the East Discom, 38.27% to the West Discom and 31.84% to the Central Discom) as per the Government of Madhya Pradesh (GoMP) Notification dated March 29, 2012 for FY 2013-14 including 200 MW specific power share allocation to the East Discom from Central Generating stations for Bundelkhand region . The East, West and Central Discoms have submitted the details related to the following items pertaining to power purchase cost for the above weighted average of Discom allocations:
- Monthly energy available from all sources
 - Annual fixed charge and energy charge payable to generators
 - Estimated payment to generators on account of incentives, income tax, duties, etc.
 - Estimated inter-state transmission charges to be paid.
- 3.25 The requirement for procurement of energy for projected sale of 43011 MU as filed by the three Discoms is 58441 MU. Discom-wise break-up is shown in the table below:

Table 13: Energy balance for FY 2013-14 as proposed by Discoms

Particulars	East	West	Central
Sale to LT category (MU)	8654	13568	9739
Sale to HT category (MU)	3594	4052	3405
Total Sale (MU)	12248	17619	13143
Distribution losses (%)	23.00%	20.00%	23.00%
Input at Distribution Interface (MU)	15936	22226	17088
Transmission loss (%)	4.30%	4.30%	4.30%
Input at G-T interface (MU)	16653	23226	17856
External Loss (MU)	250	254	203
Total Power Purchase Quantum (MU)	16903	23481	18059

- 3.26 The petitioners have converted the annual projected sales into monthly sales using the sales profiles observed in the past years for each of the Discom. It is submitted that for computation of the Intra-State Transmission Losses (MPPTCL losses), the actual data has been taken from the MP-SLDC online portal for the past 12 months (52 weeks) and the accordingly computed average of 4.30% has been considered for the future period.
- 3.27 The petitioners have submitted that the Inter-State transmission losses have been computed separately for Eastern Region (ER) and Western Region (WR) stations. For WR, past data of 26 weeks of FY 2012-13, till December 16, 2012 as available on the PGCIL website has been considered, and an average loss level of 3.69% has been used for FY 2013-14. In case of ER, transmission loss of stations allocated to the State of Madhya Pradesh has been considered and average loss level of 2.50% has been considered for FY 2013-14.
- 3.28 The petitioners have claimed that they have projected energy requirement on the basis of the month wise grossing up of the projected distribution losses. The details filed are as given under:

Table 14: Monthly loss percentage as filed

Sr. No.	Month	FY 2013-14		
		East Discom	West Discom	Central Discom
1	April	23.44%	23.23%	22.92%
2	May	22.83%	23.85%	22.13%
3	June	18.81%	17.40%	21.54%
4	July	20.76%	9.20%	21.38%
5	August	23.39%	7.44%	22.98%
6	September	23.32%	11.54%	22.93%
7	October	24.79%	27.60%	24.19%
8	November	24.26%	29.42%	24.42%
9	December	24.87%	23.67%	23.98%
10	January	24.33%	25.48%	24.63%
11	February	20.78%	21.80%	23.06%
12	March	24.43%	19.38%	21.83%
13	Average losses for the year as filed (Arithmetic average)	23.00%	20.00%	23.00%
14	As specified in Regulations	23.00%	20.00%	23.00%

Assessment of Energy Availability by the Petitioners

3.29 The petitioners have submitted that assessment of energy availability for the State of Madhya Pradesh is based on the following:

- (a) Current long term allocated generation capacity of MP.
- (b) New generating capacities coming up in future years for MP Genco, Central Sector, Joint Ventures, UMPP, and under Competitive Bidding.
- (c) Impact of generation capacity allocation in WR and ER.
- (d) Performance of plant in past three years.

3.30 The petitioners have submitted that future projections for Central Generating Stations (CGS) allocated to Madhya Pradesh have been done on the basis of average availability of the past three years. Further, for projecting the availability from the Central Sector Stations the latest allocation made by Western Regional Power Committee/ Eastern Regional Power Committee has been assumed to be constant over the projection period. It is also clarified that the actual ex-bus availability has been taken till August 2012.

3.31 The petitioners have further submitted the capacity addition plan of MP Genco stations, Central Generating Stations, and other JV and Case -1 stations, which are expected to be commissioned during FY 2013-14. The details of the generating stations submitted is mentioned in the table below:

Table 15: Capacity Addition Plan filed for FY 2013-14

SL No	Generating Stations	Unit	Capacity (MW)	MP's Share (MW)	Schedule
1	Singaji Thermal Power Stations Phase I -Unit-1	Unit-1	600	600	Sep-13
	Singaji Thermal Power Stations Phase I -Unit-2	Unit-2	600	600	Oct-13
2	Satpura Thermal Power Stations Exten - Unit 10	Unit-10	250	250	Feb-13
	Satpura Thermal Power Stations Exten - Unit 11	Unit-11	250	250	Sep-13
3	NTPC Mauda TPS- Unit-1	Unit-1	500	78	Mar-13
	NTPC Mauda TPS- Unit-2	Unit-2	500	78	Sep-13
4	Vindhyachal Mega Project, Stage 4-Unit-1	Unit-1	500	143	Apr-13
	Vindhyachal Mega Project, Stage 4-Unit-2	Unit-2	500	128	Dec-13
5	DVC Durgapur Steel TPS- Unit-1	Unit-1	500	50	Jul-12
	DVC Durgapur Steel TPS- Unit-2	Unit-2	500	50	Dec-12
6	UMPP Sasan, Sidhi	Unit-1	1320	495	Oct-13
7	Bina Power, Sagar Unit-1	Unit-1	250	175	Sep-12

	Bina Power, Sagar Unit-2	Unit-2	250	175	Feb-13
8	Jaiprakash Power, Nigri- Unit-1	Unit -1	660	248	Sep-13
	Jaiprakash Power, Nigri- Unit-2	Unit-2	660	247	Dec-13
9	MB Power, Annupur	Unit -1	600	210	Nov-13
10	BLA Power, Narsinghpur	Unit -1	45	16	Apr-12
11	Jhabua Power, Seoni		600	210	Dec-13
12	Lanco TPS, Amarkantak		300	300	Dec-12
13	Solar, Wind, Biomass		120	120	Mar-13

3.32 Accordingly, the energy availability from new stations has also been considered from the expected month of commissioning in FY 2013-14. The petitioners have submitted the following assumptions for projecting the availability from the future capacities:

- (a) PLF considered for Coal based stations is 85%-88% depending on the station (after discussions with MP Genco)
- (b) PLF considered for Gas based and Atomic power stations is 68%
- (c) Auxiliary consumption considered for Coal based stations is 7.5%
- (d) Auxiliary consumption considered for Gas based and Atomic power stations is 12%.
- (e) The availability has been forecast based on the month of operation in a particular year and the past trend of energy availability from the plants.

3.33 Annual availability from each of the sources as filed is shown in the table below:

Table 16: Energy Availability ex-bus as filed by the petitioners for FY 2013-14 (MU)

Generating Stations	FY 2013-14
CGS	
NTPC-Korba	3421
NTPC-Vindychal I	3188
NTPC-Vindychal II	2349
NTPC-Vindychal III	1937
NTPC-Kawas	662
NTPC-Gandhar	569
KAPP	601
TAPS	1358
NTPC – Farakka	0
NTPC – Talcher	0
NTPC – Kahalgaon	0
NTPC - Sipat Stage II	1518
NTPC - Kahalgaon 2	357
Bilateral and Joint Venture Stations	

NHDC - Indira Sagar		2745
Sardar Sarovar		2157
Omkareshwar HPS		1221
DVC (MTPS, CTPS)		1717
MP Genco Stations		
ATPS - Chachai-PH 1&2		514
STPS - Sarani-PH 1, 2 & 3		4561
SGTPS - Bir'pur - PH 1 & 2		3933
SGTPS - Bir'pur – Extn		3471
ATPS - Chachai-Extn		1376
CHPS-Gandhi Sagar		97
CHPS-RP Sagar & Jawahar Sagar		227
Pench THPS		237
Banasgar Tons HPS		1209
Banasgar Tons HPS-Bansagar IV (Jhinna)		62
Birsingpur HPS		35
Bargi HPS		438
Rajghat HPS		40
Marhi Khera HPS		83
Other		
RSEB (Chambal,Satpura)		408
UPPCL (Rihand,Matatila,Rajghat)		174
Others 1 (Wind & CPP)		254
Total		40920
Allocated to MPPMCL		
NTPC Korba – III		494
IPP Torrent		581
NTPC Sipat Stage – 1	Unit 1	504
Singaji TPP Phase -1, Khandwa (Share = 100%)	Unit 1	1455
	Unit 2	1215
Satpura TPP Extension, Betul (Share = 100%)	Unit 10	1436
	Unit 11	600
Sipat Stage - 1, Bilaspur (NTPC)	Unit 2	706
	Unit 3	706
NTPC Mouda STPS, Satge -1, Nagpur (NTPC)	Unit 1	428
	Unit 2	180
Vindhyachal Mega Project, Stage - 4, Sidhi (NTPC)	Unit 1	756
	Unit 2	146
Vindhyachal Mega Project, Stage - 5, Sidhi (NTPC)	Unit 1	0

DVC Durgapur Steel TPS	Unit 1	318
	Unit 2	295
UMPP Sasan, Sidhi	Unit 1 & 2	1002
	Unit 3 & 4	0
	Unit 5 & 6	0
Essar Power, Sidhi	Unit 1	0
Bina Power, Sagar	Unit 1	1122
	Unit 2	1005
Jaiprakash Power, Nigri	Unit 1	601
	Unit 2	296
MB Power, Anuppur	Unit 1	338
	Unit 2	0
DB Power, Singrauli	Unit 1	0
Shri Maheshwar HEP, Khargone (Capacity per Unit 40 MW, Due to uncertainty, availability is as Zero till further decision)	Unit 1 & 2	0
	Unit 3 & 4	0
	Unit 5 & 6	0
	Unit 7 & 8	0
	Unit 9 & 10	0
BLA Power, Narsinghpur	Unit 1	90
	Unit 2	0
Jhabua Power, Seoni	Unit 1	252
Lanco TPS, Amarkantak		1821
IPPs - Concessional Energy		0
Renewable Energy (Wind, Solar, Bio etc.)		209
Renewable Energy (Wind, Solar, Bio etc.)		1
TOTAL		16557
Grand Total		57477

3.34 The petitioners have submitted that the above energy availability is based on:

- Capacity allocation of Central Generating Stations to the State of Madhya Pradesh as per Western Region Power Committee's (WRPC) Letter on WRPC/Comm-I/6/Alloc./2012/684 dated May 24, 2012.
- Future capacity which is proposed to be commissioned has been allocated to MPPMCL and the Discom wise availability has been calculated for the current existing capacities.
- Capacity allocation of individual stations to the three Discoms of Madhya Pradesh based on the GoMP Gazette notification.

Assessment of Power Purchase Cost (Fixed and Variable Cost) by the Petitioners

- 3.35 The petitioners have stated that fixed costs of MP Genco stations for FY 2013-14 have been kept as the same level as that of FY 2011-12 and as approved by the Commission in its Multi Year Tariff Order dated March 3, 2010.
- 3.36 The petitioners have further submitted that in case of Central Generation Stations fixed costs as per tariff orders issued by the Central Electricity Regulatory Commission for respective generating stations till FY 2013-14 have been considered. The details of generating stations and reference of Orders issued are given below:

Table 17: CERC Tariff Orders for Central Sector Stations

Station	Total Capacity MW	Petition No.	CERC Order Dated
Korba Stage - I & II	2,100.00	264 of 2009	12.10.2012
Korba Stage – III	500	247 of 2010	3.05.2012
Vindhyachal Stage – I	1,260.00	227 of 2009	11.10.2012
Vindhyachal Stage – II	1,000.00	258 of 2009	25.05.2012
Vindhyachal Stage – III	1,000.00	260 of 2009	28.05.2012
Kawas Gas PS	656.20	285 of 2009	30.12.2011
Gandhar Gas PS	657.37	226 of 2009	30.12.2012
Sipat Stage – I	1,980.00	28 of 2011	6.09.2012
Sipat Stage – II	1,000.00	316 of 2009	6.07.2011
Kahalgaon Stage- II	1,500.00	282 of 2009	13.04.2012
Chandrapura DVC		339 of 2010	10.10.2012

- 3.37 Variable costs (including Fuel Price Adjustment) for MP Genco and Central Generating Stations have been considered from the bills for FY 2011-12, which have been escalated at the annual rates specified by the CERC in its Notification dated October 8, 2012.
- 3.38 Fuel Price Adjustment (FPA) and other variable charges have been taken from bills of FY 2011-12 and have been escalated in the same manner as that of variable cost per unit. Since, these costs are typically paid at the end of financial year, and as the data for FY 2012-13 is not available, aforementioned cost of FY 2011-12 has been considered as the base.
- 3.39 The petitioners have further submitted that, in case of CGS, an additional ED/Cess of 8 paise/unit has been considered from FY 2012-13 onwards, and same has been included in the variable component of the generation cost.
- 3.40 In case of new upcoming stations of CGS, the cost estimated by the MPPMCL has been considered, whereas for the State stations, costs have been taken as informed by the MP Genco.

3.41 The table below provides the details of the costs viz. fixed costs and variable costs for all the existing plants for determining the power purchase cost for FY 2013-14.

Table 18 : Fixed cost and Variable cost as filed for the Existing Stations for FY 2013-14

Generating Stations	Fixed Charges (Rs. Crore)	Total Variable Charge (Rs./kWh)
NTPC-Korba	188.92	1.03
NTPC-Vindychal I	197.97	2.17
NTPC-Vindychal II	174.09	1.99
NTPC-Vindychal III	204.22	2.02
NTPC-Kawas	96.96	2.95
NTPC-Gandhar	95.56	2.74
KAPP	0.11	2.31
TAPS	-	2.84
NTPC – Farakka	-	-
NTPC – Talcher	-	-
NTPC – Kahalgaon	-	-
NTPC - Sipat Stage II	178.43	1.01
NTPC - Kahalgaon 2	63.54	2.44
NHDC - Indira Sagar	516.14	0.46
Sardar Sarovar	188.93	1.16
Omkareshwar HPS	288.88	0.45
DVC (MTPS, CTPS)	177.21	2.45
ATPS - Chachai-PH 1&2	24.34	1.51
STPS - Sarani-PH 1, 2 & 3	227.72	1.92
SGTPS - Bir'pur - PH 1 & 2	303.71	2.57
SGTPS - Bir'pur – Extn	368.54	2.42
ATPS - Chachai-Extn	176.21	1.29
CHPS-Gandhi Sagar	2.04	0.85
CHPS-RP Sagar & Jawahar Sagar	-	1.51
Pench THPS	6.39	0.30
Banasgar Tons HPS	55.35	0.91
Banasgar Tons HPS-Bansagar IV (Jhinna)	4.70	1.39
Birsingpur HPS	2.01	1.37
Bargi HPS	5.46	0.43
Rajghat HPS	1.88	1.29
Marhi Khera HPS	11.12	2.32
Other		
RSEB (Chambal, Satpura)	-	4.27

UPPCL (Rihand, Matatila, Rajghat)	-	0.08
Others 1 (Wind & CPP)	-	3.86

Details of Costs for future capacities

3.42 The petitioners have submitted that in case of capacities which are proposed to be commissioned in FY 2013-14, the rates as per Power Purchase Agreement of respective stations have been considered. The table below indicates rates considered by the petitioners:

Table 19 : Cost for future capacities

Particulars	Fixed Charges (Rs. Crore)	Variable Charges Rs./kWh	Basis
Singaji TPP Phase -1, Khandwa (Share = 100%)	240	3.50	Fixed and Variable Charges after discussions with MPPMCL and MP Genco.
Satpura TPP Extension, Betul (Share = 100%)	96	3.00	Variable cost is escalated @ CERC rates from FY 2012-13 onwards.
Sipat Stage - 1, Bilaspur (NTPC)	48	1.24	Based on existing cost of NTPC Sipat Stage - 1, Unit 1
NTPC Mouda STPS Satge -1, Nagpur (NTPC)	72	1.24	Based on existing cost of NTPC Sipat Stage - 1, Unit 1
Vindhyachal Mega Project, Stage - 4, Sidhi (NTPC)	57	2.06	Fixed Cost is linked to MP share in MW (per MW cost on basis of existing Vindhyachal plants). Variable Cost is based on the average of existing three stages of Vindhyachal plants.
DVC Durgapur Steel TPS	44	1.22	Based on costs of existing DVC plants
UMPP Sasan, Sidhi	0	1.28	As per discussions with MP Genco.
Bina Power, Sagar	0	3.80	As per discussions with MP Genco. The variable cost is escalated @CERC rates from FY 2012-13 onwards
Jaiprakash Power, Nigri			
MB Power, Anuppur			
BLA Power, Narsinghpur	0	3.80	As per discussions with MP Genco. The variable cost is escalated @ CERC rates from FY 2012-13 onwards
Jhabua Power, Seoni			
Lanco TPS, Amarkantak			

Renewable Energy (Wind, Solar, Bio etc.)	0	8.00	Based on the competitive bidding rates for Renewable Energy in MP
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Assessment of Other Elements of Power Purchase Cost by the petitioners

Inter State Transmission Charges associated with existing capacities:

3.43 The petitioners have submitted that the Inter-State Transmission Charge (PGCIL cost) to be paid by the State of Madhya Pradesh consists of charges to be paid for transmission system of Western Region and Eastern Region. In response to the specific query raised by the Commission on the methodology adopted for projecting the transmission charges, the petitioners have submitted that Inter-State transmission charges for existing stations have been projected on the basis of actual bills for the FY 2011-12 and FY 2012-13 after introduction of Point of Connection (PoC) regime. Further, the actual bill for FY 2011-12 is Rs. 587 Crore and actual bill for FY 2012-13 is likely to be around Rs. 634 Crore indicating a growth of 8.07%, which has been used to estimate the Inter-State Transmission Charges for FY 2013-14. These charges are estimated at Rs. 685.56 Crore for FY 2013-14. The petitioners have submitted that these costs have been allocated to Discoms in ratio of the power procured by each Discom from Central Sector Stations as tabulated below:

Table 20: PGCIL Costs: Inter-State transmission charges (Rs Crore)

Particulars	Allocation (%)	PGCIL Costs
East Discom	30%	212
West Discom	38%	267
Central Discom	32%	207
Total	100%	686

Intra - State Transmission Charges

3.44 The petitioners have submitted that for the purpose of calculation of intra-state transmission costs, MPPTCL cost has been considered as per the actual expenditure excluding true-up amount. The SLDC charges are added to such provided costs so as to arrive at total MPPTCL costs for three Discoms. The petitioners submitted that the total transmission charges of Rs. 1974.17 Crore have then been allocated to three Discoms as per the weighted average of capacity of allocation of stations to the Discoms as indicated in the table below:

Table 21: Intra-State Transmission Charges filed by Discoms for FY 2013-14 (Rs. Crore)

Particulars	FY 2013-14
East Discom	543
West Discom	754
Central Discom	677
Total	1974

MPPMCL Other Costs: Details and Discom Allocation

- 3.45 As tabulated below, the petitioners have submitted details of MPPMCL other costs with an estimated net expenses of Rs. 79.18 Crore for FY 2013-14 and allocated the same to the three Discoms based on the average capacity allocation of existing stations. The petitioners further prayed to allow expenses and include the same as a power purchase cost of the three Discoms. It is clarified that MPPMCL has been operating on 'No Profit and No Loss' basis. Further, it is supplying power to Discoms at MPERC determined tariff pursuant to State Government Notification dated May 18, 2011. The details of the expenses and costs allocated to Discoms are mentioned in the table below:

Table 22: Expenses of MPPMCL as filed for FY 2013-14 (Rs Crore)

Particulars	FY 2013-14
Purchase of Power	11.79
Inter-State Transmission Charges	72.04
Depreciation Expenses	2.26
Interest and Finance Charges	84.20
Repairs and Maintenance Expenses	1.94
Employee Expenses	38.11
A&G Expenses	11.22
Other Expenses	25.59
Total	247.15
Less:	
Income	167.97
Net Expenses	79.18

Table 23: MPPMCL Costs allocated to Discoms (Rs Crore)

Particulars	FY 2013-14
East Discom	21.68
West Discom	30.30
Central Discom	27.19
Total	79.18

3.46 The total power purchase cost as filed by the petitioners is given in the table below:

Table 24: Total Power Purchase Cost as filed for FY 2013-14

Total Power Purchase Cost		East Discom	West Discom	Central Discom	State
A	Ex-bus Units to be Purchased (MU)	16903	23481	18059	58443
B	Fixed Cost (Rs. Crore)	1079.73	1390.94	1089.76	3560
C	Variable Cost (Rs. Crore)	3589.18	5242.22	3964.60	12796
D	MPPMCL costs (Rs. Crore)	21.68	30.30	27.19	79
E = B+C+D	Total Power Purchase Cost - Ex Bus (Rs. Crore)	4690.60	6663.46	5081.55	16436
E/A	Rate of Power Purchase (Rs./kWh)	2.78	2.84	2.81	2.81
H	External Losses (MU)	250	254	203	707
I	Inter State Transmission Cost (Rs. Crore)	212.17	266.63	206.76	686
J = (A-H)	Units to be Purchased at State Periphery (MU)	16653	23226	17856	57735
K = (I + E)	Total Power Purchase Cost at State Boundary (Rs. Crore)	4902.77	6930.09	5288.31	17121
J/K	Rate of Power Purchase at State Boundary (Rs./kWh)	2.94	2.98	2.96	2.93
L	Intra State Transmission Cost – MPPTCL including SLDC (Rs. Crore)	542.93	754.42	676.82	1974
M = (K+L)	Total Power Purchase Cost at Discom Interface (Rs. Crore)	5445.70	7684.52	5965.13	19095
N	Transmission Loss (MU)	717	1000	769	2486
O = (J-N)	Units to be Purchased at Discom Boundary (MU)	15935.89	22226.33	17087.65	55250
O/M	Rate of Power Purchase at Discom Boundary (Rs./kWh)	3.42	3.46	3.49	3.46

Commission's Analysis of Energy Balance and Power Purchase

Distribution Losses

3.47 The Commission has notified the MPERC (Terms and Conditions for determination of tariff for supply and wheeling of electricity and methods and principles of fixation of charges), Regulations dated November 29, 2012 for the tariff period from FY 2013-14 to FY 2015-16. The distribution loss level trajectory as specified in the Regulations is given in the table below:

Table 25: Loss targets as per Regulations (in %)

Loss Targets	FY 2013-14	FY 2014-15	FY 2015-16
East Discom	23%	20%	18%
West Discom	20%	18%	16%
Central Discom	23%	21%	19%

3.48 For projecting the energy requirement, the Commission has considered the distribution losses for FY 2013-14 as mentioned in the table above. The Commission has noted that the submission by the petitioners has been in accordance with the provision of the Regulations to the extent that they have considered the loss levels as per the prescribed loss trajectory. However, while making month wise calculations for arriving at the input requirement of power; the petitioners have taken arithmetical averages of month wise losses to calculate yearly loss levels. This is not found in consonance with the loss level trajectory as per Regulations. The Commission has considered annual sale grossed up by annual level of prescribed loss levels as per the calculations shown in subsequent paragraphs/ tables.

External (PGCIL) Losses

3.49 The Inter-State transmission losses have been computed separately for Eastern Region and Western Region stations. For Western Region past data (52 weeks, till week ending 25th March 2012) as available on the PGCIL website has been taken and an average loss level of 3.65% has been considered for FY 2013-14. For Eastern Region transmission line losses an average loss level of 2.50% have been considered as filed by the Petitioner.

3.50 The Commission has considered Intra-State transmission losses at 3.16% for FY 2013-14 in accordance with the MPERC (Terms and Conditions for Determination of Transmission Tariff) Regulations 2012. The energy balance / power purchase requirement on the basis of the sale approved by the Commission for all the three Discoms for FY 2013-14 is presented in the following table:

Table 26: Power purchase requirement as worked out

Particular	State	East Discom	West Discom	Central Discom
Total Sales (MU)	43011	12248	17619	13143
Distribution loss (%)	21.80%	23.00%	20.00%	23.00%
Distribution loss (MU)	11989	3658	4405	3926
Input at T-D interface (MU)	55000	15906	22024	17069
Transmission loss (%)	3.16%	3.16%	3.16%	3.16%
Transmission loss (MU)	1795	519	719	557

Input at G-T interface (MU)	56795	16426	22743	17626
PGCIL Losses %				
WR- PGCIL Losses %	3.65%	3.65%	3.65%	3.65%
ER- PGCIL Losses %	2.50%	2.50%	2.50%	2.50%
PGCIL Losses (MU)	1290	417	507	366
Power Purchase Requirement (MU)	58084	16842	23250	17992

3.51 Energy Deptt. Govt. of Madhya Pradesh (GoMP) letter no. 2254/13/13/02 Bhopal dated March 19, 2013, has revised the existing generating capacity allocation to the three Discoms. In order to maintain the uniform retail supply tariff across the State for FY 2013-14, GoMP has conveyed that the Commission may apportion the capacities/ costs of stations allocated to MPPMCL further to Discoms.

3.52 The table below presents the allocation of generation capacities to the East, West and Central Discoms as per the Energy Deptt. Govt. of MP letter no. 2254/13/13/02 Bhopal dated March 19, 2013, including specific allocation of 200 MW to Bundelkhand region and others.

Table 27: Station wise capacity allocation to Discoms (%)

Proposed Discom wise Allocation for FY 2013-14									
SL No	Generating Stations	Installed Capacity (MW)	Allocation to State (MW)	Specific Allocation to Bundelkhand Region (MW)	Allocation to state(excluding specific allocation) (MW)	Discom wise Allocation (in % excluding specific allocation)			
A. Central Generating Stations						East	West	Central	Total
1	WR – KSTPS	2100	490	53	437	32%	37%	31%	100%
2	WR - VSTPS-I	1260	445	32	413	31%	32%	37%	100%
3	WR - VSTPS-II	1000	321	25	296	30%	35%	35%	100%
4	WR - KAWAS GPP	656	140	0	140	35%	40%	25%	100%
5	WR - GANDHAR GPP	657	117	0	117	32%	38%	30%	100%
6	WR - KAKRAPAR APS	440	111	11	100	25%	40%	35%	100%
7	WR - TARAPUR APS Unit 3 & 4	1080	234	28	206	25%	40%	35%	100%
8	WR - VSTPS – III	1000	250	25	225	25%	40%	35%	100%
9	WR - SIPAT –II	1000	193	26	167	30%	40%	30%	100%

10	ER-KAHALGAON STPS-II	1500	75	0	75	27%	53%	20%	100%
11	DVC (MTPS,CTPS)	500	200	0	200	33%	53%	14%	100%
	SUB TOTAL	11193	2576	200	2376				
B. State Generating Stations									
I	THERMAL								
1	AMARKANTAK COM	240	240	0	240	27%	33%	40%	100%
2	AMARKANTAK EXT	210	210	0	210	27%	33%	40%	100%
3	SATPURA TPS PH I & II & III	1080	980	0	980	29%	32%	39%	100%
4	SGTPS EXT	500	500	0	500	28%	32%	40%	100%
5	SGTPS	840	840	0	840	28%	32%	40%	100%
	SUB TOTAL	2870	2770	0	2700				
II	HYDEL								
	INTERSTATE								
1	GANDHI SAGAR	115	58	0	58	23%	27%	50%	100%
2	RANAPRATAP SAGAR & JAWAHAR SAGAR	271	136	0	136	20%	30%	50%	100%
3	PENCH	160	107	0	107	20%	40%	40%	100%
4	RAJGHAT	45	23	0	23	20%	40%	40%	100%
	SUB TOTAL	591	324	0	324				
	FULL MP ALLOCATION								
1	BARGI	100	100	0	100	25%	50%	25%	100%
2	BIRISINGHPUR	20	20	0	20	30%	50%	20%	100%
3	BANSAGAR – I	315	315	0	315	30%	40%	30%	100%
4	BAN SAGAR II	30	30	0	30	30%	40%	30%	100%
5	BAN SAGAR III	60	60	0	60	30%	40%	30%	100%
6	BAN SAGAR IV	20	20	0	20	30%	40%	30%	100%
7	MARIKHEDA	60	60	0	60	30%	50%	20%	100%
	SUB TOTAL	605	605	0	605				
	BILATERAL AND OTHERS								
1	INDIRA SAGAR	1015	1015	0	1015	22%	53%	25%	100%
2	NCE- WIND GENERATION	-	-	-	-	-	-	-	-
3	CAPTIVE	-	-	-	-	-	-	-	-

4	SARDAR SAROVAR	1450	827	0	827	32%	43%	25%	100%
5	OMKARESHWAR	520	520	0	520	30%	45%	25%	100%
	SUB TOTAL	2985	2362	0	2362				
6	RSEB (CHAMBAL, SATPURA)	-	-	-	-	-	-	-	-
7	UPPCL (RIHAND, MATATILA, RAJGHAT)	55	55	0	55	29%	38%	33%	100%
	SUB TOTAL	55	55	0	55				
	GRAND TOTAL	18299	8692	200	8492	28%	39%	33%	100%

3.53 The petitioners have submitted the details of the generating stations assigned to MPPMCL including the details of stations that got commissioned in the past and expected to be commissioned in FY 2013-14. Details of generating stations allocated to MPPMCL is given in the table below:-

Table 28: Generating Stations allocated to MPPMCL for FY 2013-14

SL No	Particular	Allocation to MPPMCL (MW)
	Sipat -I (3 Units)	341
2	NTPC Korba – III	77
3	IPP Torrent	100
4	Singaji Thermal Power Stations Phase I -Unit-1	600
	Singaji Thermal Power Stations Phase I -Unit-2	600
5	Satpura Thermal Power Stations Extn - Unit 10	250
	Satpura Thermal Power Stations Extn - Unit 11	250
6	NTPC Mauda TPS- Unit-1	78
	NTPC Mauda TPS- Unit-2	78
7	Vindhyachal Mega Project, Stage 4-Unit-1	143
	Vindhyachal Mega Project, Stage 4-Unit-2	128
8	DVC Durgapur Steel TPS- Unit-1	50
	DVC Durgapur Steel TPS- Unit-2	50
9	UMPP Sasan, Sidhi	495
10	Bina Power, Sagar Unit-1	175
	Bina Power, Sagar Unit-2	175
11	Jaiprakash Power, Nigri- Unit-1	248
	Jaiprakash Power, Nigri- Unit-2	247
12	MB Power, Annupur	210
13	BLA Power, Narsinghpur	16
14	Jhabua Power, Seoni	210

15	Lanco TPS, Amarkantak	300
16	Solar, Wind, Biomass	50
	Total Capacity (MW)	5070

- 3.54 In order to ascertain the availability of the energy individually from each station, the availability as filed by the petitioners has been compared with the availability as worked out on the basis of past 3 years performance of the Generating Stations.
- 3.55 As regards, energy availability of existing Generating Station the Commission has considered the average of actual energy generation of the generating stations allocated to the State based on the Regional Energy Accounts published by the Western Regional Power Committee (WRPC) and Eastern Regional Power Committee (ERPC) available till December 2012.
- 3.56 Further while going through the Station wise energy availability projection filed by the petitioners for FY 2013-14, the Commission observed that the energy availability projected by the Petitioners for M.P Genco Stations and new generating stations allocated to MPPMCL is significantly less for FY 2013-14. In this regard, the Commission vide letter no 238 dated January 24, 2013 asked M.P Genco to submit their projections of energy availability for M.P Genco stations for FY 2013-14. MP Genco vide letter no 240 dated January 24, 2013 submitted their projections of energy availability. For M.P Genco stations the Commission considered the energy availability as submitted by M.P Genco for FY 2013-14. Further the Commission vide letter dated January 24, 2013 had sought details from NHDC regarding their availability projections for FY 2013-14 in respect of Indira Sagar Power Station (ISPS) and Omkareshwar (OSP) . NHDC vide letter dated January 28, 2013 has submitted the actual energy availability for FY 2011-12, FY 2012-13 till December,12 and projections for FY 2013-14. The Commission has considered the average of actual energy availability during last three years .i.e. FY 2010-11, FY 2011-12 and FY 2012-13 (till December) for projecting the energy availability for FY 2013-14. As regard energy availability of new generating stations allocated to MPPMCL the Commission has projected the energy availability based on the norms specified in the CERC (Terms and Conditions of Tariff) Regulations, 2009.
- 3.57 Month wise details of projected availability for FY 2013-14 are indicated in the table below:

Table 29 : Month wise MUs projection for FY 2013-14

Generating Stations		Apr	May	Jun	July	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Total
1 Allocated to Discom														
A. Central Generating Stations														
1	WR – KSTPS	276	273	278	326	336	244	285	313	276	261	281	300	3449
2	WR - VSTPS-I	253	258	264	297	245		258	278	297	300	275	302	3212
3	WR - VSTPS-II	211	226	204	180	152	134	205	213	226	218	199	196	2366
4	WR - KAWAS GPP	66	62	45	48	37	26	72	49	64	55	63	71	655
5	WR - GANDHAR GPP	57	61	44	54	33	21	50	58	52	50	46	50	574
6	WR - KAKRAPAR APS	55	54	51	55	45	35	53	50	48	60	59	69	634
7	WR - TARAPUR APS Unit 3 & 4	112	121	102	107	124	126	110	113	114	131	123	115	1398
8	WR - VSTPS – III	174	178	150	130	145	142	169	167	177	177	160	179	1947
9	WR - SIPAT –II	113	135	124	129	119	116	118	104	126	137	126	138	1484
10	ER- KAHALGAON STPS-II	32	31	25	17	17	18	29	34	33	37	36	47	357
11	DVC (MTPS,CTPS)	189	183	212	219	182	22	50	101	148	149	135	127	1717
	SUB TOTAL	1539	1582	1498	1561	1434	1068	1400	1480	1562	1575	1503	1594	17794
B. State Generating Stations														
I THERMAL														
1	AMARKANTAK COM	125	139	56	77	80	43	75	90	124	135	119	139	1202
2	AMARKANTAK EXT	124	132	123	90	111	70	126	119	137	140	127	126	1426
3	SATPURA TPS PH I & II & III	448	433	361	345	292	303	405	433	481	486	416	442	4845
4	SGTPS EXT	274	294	312	287	199	220	326	327	358	343	293	346	3579
5	SGTPS	422	408	340	325	275	286	382	408	453	458	392	416	4563
	SUB TOTAL	1394	1407	1192	1125	956	922	1314	1376	1553	1562	1346	1469	15615
II HYDEL														
INTERSTATE														
1	GANDHI SAGAR	8	10	2	0	0	4	17	44	37	25	25	14	187
2	RANAPRATAP SAGAR & JAWAHAR SAGAR	1	1	3	2	11	9	14	67	72	83	46	29	337
3	PENCH	14	11	12	5	7	33	33	19	19	22	19	17	210
4	RAJGHAT	0	0	0	3	6	5	3	5	7	8	7	1	45
	SUB TOTAL	23	22	17	10	24	52	67	135	134	137	97	61	779
FULL MP ALLOCATION														
1	BARGI	46	27	22	33	51	65	54	44	41	30	45	40	499
2	BIRISINGHPUR	0	0	1	10	14	16	3	1	0	0	0	0	45
3	BANSAGAR – I	67	78	87	103	124	131	148	103	102	85	89	98	1214
4	BAN SAGAR II													

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5	BAN SAGAR III													
6	BAN SAGAR IV	2	2	3	3	3	6	9	9	9	7	7	6	66
7	MARIKHEDA	0	0	2	11	21	11	3	8	6	6	3	6	76
	SUB TOTAL	114	108	116	160	213	229	217	164	158	128	144	150	1900
	BILATERAL AND OTHERS													
1	INDIRA SAGAR	130	140	137	135	413	532	263	206	222	245	181	193	2796
2	NCE- WIND GENERATION	19	35	43	32	9	9	6	8	9	13	14	3	200
3	CAPTIVE	3	1	2	2	4	9	4	5	7	7	7	3	54
4	SARDAR SAROVAR	123	130	130	133	366	481	194	112	108	158	107	116	2157
5	OMKARESHWAR	69	70	70	94	157	207	112	87	90	93	105	85	1240
	SUB TOTAL	345	376	381	396	948	1238	579	418	437	516	414	400	6448
6	RSEB (CHAMBAL,SATPURA)	49	45	33	37	30	37	48	30	23	8	29	38	408
7	UPPCL (RIHAND,MATATIL A,RAJGHAT)	7	8	5	8	15	17	16	20	21	16	24	17	174
	SUB TOTAL	56	53	38	45	46	54	64	50	44	24	53	55	582
	GRAND TOTAL	3471	3547	3242	3297	3620	3562	3640	3624	3888	3942	3556	3729	43118
2. Allocated to MPPMCL														
1	WR - SIPAT -I (3 Units)	127	159	158	157	165	116	159	185	197	196	175	122	1917
2	NTPC Korba – III	43	34	38	52	52	19	32	52	40	49	51	33	494
3	IPP Torrent	72	74	23	27	17	65	71	48	40	47	41	55	581
4	Singaji Thermal Power Stations Phase I -Unit-1	0	0	0	0	0	338	349	338	349	349	315	349	2387
	Singaji Thermal Power Stations Phase I -Unit-2	0	0	0	0	0	0	349	338	349	349	315	349	2049
5	Satpura Thermal Power Stations Ext - Unit 10	141	145	141	145	145	141	145	141	145	145	131	145	1713
	Satpura Thermal Power Stations Ext - Unit 11	0	0	0	0	0	141	145	141	145	145	141	145	1004
6	NTPC Mauda TPS- Unit-1	44	45	44	45	45	44	45	44	45	45	41	45	534
	NTPC Mauda TPS- Unit-2	0	0	0	0	0	44	45	44	45	45	41	45	310
7	Vindhyachal Mega Project, Stage 4-Unit-1	0	83	81	83	83	81	83	81	83	83	75	83	899
	Vindhyachal Mega Project, Stage 4-Unit-2	0	0	0	0	0	0	0	0	74	74	67	74	291
8	DVC Durgapur Steel TPS- Unit-1	28	29	28	29	29	28	29	28	29	29	26	29	343
	DVC Durgapur Steel TPS- Unit-2	28	29	28	29	29	28	29	28	29	29	26	29	343
9	UMPP Sasan, Sidhi	0	0	0	0	0	0	288	279	288	288	260	288	1691
10	Bina Power, Sagar Unit-1	98	101	98	101	101	98	101	98	101	101	91	101	1192

	Bina Power, Sagar Unit-2	98	101	98	101	101	98	101	98	101	101	91	101	1192
11	Jaiprakash Power, Nigri- Unit-1	0	0	0	0	0	144	144	140	144	144	130	144	991
	Jaiprakash Power, Nigri- Unit-2	0	0	0	0	0	0	0	0	144	144	130	144	561
12	MB Power, Annupur	0	0	0	0	0	0	0	118	122	122	110	122	595
13	BLA Power, Narsinghpur	9	9	9	9	9	9	9	9	9	9	8	9	105
14	Jhabua Power, Seoni	0	0	0	0	0	0	0	0	122	122	110	122	477
15	Lanco TPS, Amarkantak	169	175	169	175	175	169	175	169	175	175	158	175	2055
16	Solar, Wind, Biomass	17	18	17	18	18	17	18	17	18	18	16	18	209
	SUB TOTAL	874	1003	932	972	970	1579	2319	2395	2796	2811	2552	2729	21933
	TOTAL	4345	4549	4174	4269	4590	5142	5959	6019	6684	6753	6109	6458	65051

3.58 The firm availability from the long term sources works out to 43118 MU and from the sources allocated to MPPMCL which is considered as infirm availability is of the order of 21933 MU. The firm availability has been distributed among the Distribution Companies as per Energy Deptt. GoMP letter no 2254/13/13/02 dated March 19, 2013. Subsequently, the infirm availability on the basis of the ratio of balance requirement of the Discoms has been considered. Thereafter, the remaining requirement has been considered to be met through availability from the RTC 500 MW medium term sources as proposed from October, 2012. Accordingly the month wise Discom wise requirement and the estimated availability are given below:

Table 30 : Availability and Requirement (MU)

FY 2013-14 (Projections)													
Power Purchase Requirement – Ex Generating Bus(MU)													
Particulars	Apr	May	June	July	Aug	Sept	Oct	Nov	Dec	Jan	Feb	Mar	Total
Central Discom	1260	1438	1436	1438	1441	1440	1442	1618	1796	1797	1442	1443	17992
West Discom	1629	1858	1857	1858	1866	1863	1862	2089	2092	2094	2090	2091	23250
East Discom	1181	1183	1181	1347	1351	1347	1349	1678	1516	1681	1514	1515	16842
Total for State	4069	4479	4474	4643	4658	4651	4654	5384	5404	5572	5045	5049	58084
Availability from all Sources – Ex Generating Bus (MUs)													
Requirement to be met from Long term sources	3471	3547	3242	3297	3620	3562	3640	3624	3888	3942	3556	3729	43118
Balance Requirement after Long Term	598	932	1233	1346	1038	1089	1014	1760	1516	1630	1489	1321	14966
MPPMCL sources As Available	874	1003	932	972	970	1579	2319	2395	2796	2811	2552	2729	21933
Requirement to be met from MPPMCL sources	598	932	932	972	970	1089	1014	1760	1516	1630	1489	1321	14224

Balance Requirement After Long Term and MPPMCL	0	0	301	374	68	0	0	0	0	0	0	0	742
Requirement to be met from medium purchase	-	-	301	374	68	0	0	0	0	0	0	0	742
Total Availability	4069	4479	4474	4643	4658	4651	4654	5384	5404	5572	5045	5049	58084

3.59 The station wise power allocation in MW to the three Discoms of the State is given in the following table:

Table 31 : Station wise capacity allocation to Discoms (in MW)

SL No	Generating Stations	Installed Capacity (MW)	Allocation to State (MW)	Allocation to State (%)	Discom wise Allocation (in MW including specific allocation)		
					Eastern	Western	Central
A. Central Generating Stations							
1	WR – KSTPS	2100	490	23.33%	193	162	135
2	WR - VSTPS-I	1260	445	35.33%	160	132	153
3	WR - VSTPS-II	1000	321	32.10%	114	103	104
4	WR - KAWAS GPP	656	140	21.33%	49	56	35
5	WR - GANDHAR GPP	657	117	17.80%	37	44	35
6	WR - KAKRAPAR APS	440	111	25.32%	36	40	35
7	WR - TARAPUR APS Unit 3 & 4	1080	234	21.65%	80	82	72
8	WR - VSTPS – III	1000	250	24.96%	81	90	79
9	WR - SIPAT –II	1000	193	19.26%	76	67	50
10	ER- KAHALGAON STPS-II	1500	75	5.00%	20	40	15
11	DVC (MTPS,CTPS)	500	200	40.00%	66	106	28
	SUB TOTAL	11193	2576		912	922	741
B. State Generating Stations							
I	THERMAL						
1	AMARKANTAK COM	240	240	100.00%	65	79	96
2	AMARKANTAK EXT	210	210	100.00%	57	69	84
3	SATPURA TPS PH I & II & III	1080	980	90.74%	284	314	382
4	SGTPS EXT	500	500	100.00%	140	160	200
5	SGTPS	840	840	100.00%	235	269	336
	SUB TOTAL	2870	2770		781	891	1098
II	HYDEL						

Retail Supply Tariff Order FY 2013-14

	INTERSTATE						
1	GANDHI SAGAR	115	58	50.00%	13	16	29
2	RANAPRATAP SAGAR & JAWAHAR SAGAR	271	136	50.00%	27	41	68
3	PENCH	160	107	66.67%	21	43	43
4	RAJGHAT	45	23	50.00%	5	9	9
	SUB TOTAL	591	324		66	109	149
	FULL MP ALLOCATION						
1	BARGI	100	100	100.00%	25	50	25
2	BIRISINGHPUR	20	20	100.00%	6	10	4
3	BANSAGAR – I	315	315	100.00%	95	126	95
4	BAN SAGAR II	30	30	100.00%	9	12	9
5	BAN SAGAR III	60	60	100.00%	18	24	18
6	BAN SAGAR IV	20	20	100.00%	6	8	6
7	MARIKHEDA	60	60	100.00%	18	30	12
	SUB TOTAL	605	605		177	260	169
	BILATERAL AND OTHERS						
1	INDIRA SAGAR	1015	1015	100.00%	223	538	254
2	NCE- WIND GENERATION	0	0	0	0	0	0
3	CAPTIVE	0	0	0	0	0	0
4	SARDAR SAROVAR	1450	827	57.00%	265	355	207
5	OMKARESHWAR	520	520	100.00%	156	234	130
	SUB TOTAL	2985	2362		644	1127	591
6	RSEB (CHAMBAL,SATPURA)	55	55	100%	16	21	18
7	UPPCL (RIHAND,MATATILA,RAJ GHAT)	0	0	0	0	0	0
	SUB TOTAL	55	55		16	21	18
	GRAND TOTAL	18299	8692		2596	3330	2766

3.60 The station wise Ex-Bus availability and the availability at the State periphery after considering the PGCIL system losses for WR and ER stations for FY 2013-14 is shown in table below:

Table 32 : Station wise availability in MUs Discoms

Name of the Station		Availability (Ex-Bus)			Availability (Ex-State Periphery)		
		East	West	Central	East	West	Central
A. Central Generating Stations							
1	WR – KSTPS	1355	1139	954	1306	1097	919
2	WR - VSTPS-I	1156	953	1102	1114	919	1062
3	WR - VSTPS-II	841	762	762	810	735	735
4	WR - KAWAS GPP	229	262	164	221	253	158
5	WR - GANDHAR GPP	184	218	172	177	210	166
6	WR - KAKRAPAR APS	206	228	200	199	220	192
7	WR - TARAPUR APS Unit 3 & 4	473	493	432	455	475	416
8	WR - VSTPS – III	636	699	612	613	674	590
9	WR - SIPAT –II	583	515	386	562	496	372
10	ER- KAHALGAON STPS- II	96	189	71	91	178	67
11	DVC (MTPS,CTPS)	567	910	240	532	854	226
	SUB TOTAL	6327	6371	5097	6079	6111	4903
B. State Generating Stations							
I	THERMAL						
1	AMARKANTAK COM	325	397	481	325	397	481
2	AMARKANTAK EXT	385	471	570	385	471	570
3	SATPURA TPS PH I & II &III	1405	1550	1890	1405	1550	1890
4	SGTPS EXT	1002	1145	1432	1002	1145	1432
5	SGTPS	1278	1460	1825	1278	1460	1825
	SUB TOTAL	4394	5023	6198	4394	5023	6198
II	HYDEL						
	INTERSTATE						
1	GANDHI SAGAR	43	50	94	43	50	94
2	RANAPRATAP SAGAR & JAWAHAR SAGAR	67	101	169	67	101	169
3	PENCH	42	84	84	42	84	84
4	RAJGHAT	9	18	18	9	18	18
	SUB TOTAL	161	254	364	161	254	364
	FULL MP ALLOCATION						
1	BARGI	125	250	125	125	250	125
2	BIRISINGHPUR	14	23	9	14	23	9

3	BANSAGAR – I	364	486	364	364	486	364
4	BAN SAGAR II	0	0	0	0	0	0
5	BAN SAGAR III	0	0	0	0	0	0
6	BAN SAGAR IV	20	26	20	20	26	20
7	MARIKHEDA	23	38	15	23	38	15
	SUB TOTAL	545	822	533	545	822	533
	BILATERAL AND OTHERS						
1	INDIRA SAGAR	615	1482	699	593	1428	674
2	NCE- WIND GENERATION	60	80	60	60	80	60
3	CAPTIVE	16	22	16	16	22	16
4	SARDAR SAROVAR	690	928	539	665	894	520
5	OMKARESHWAR	372	558	310	358	538	299
	SUB TOTAL	1754	3069	1625	1693	2961	1568
6	RSEB (CHAMBAL,SATPURA)	122	163	122	122	163	122
7	UPPCL (RIHAND,MATATILA,R AJGHAT)	52	70	52	52	70	52
	SUB TOTAL	175	233	175	175	233	175
	GRAND TOTAL	13356	15771	13990	13047	15403	13740

3.61 The Commission has applied merit order dispatch principle month-wise on the basis of the variable costs of the generating stations. The table below depicts merit order amongst the stations and their variable energy rates.

Table 33 : Merit order

Generating Stations	Dispatch Type (Must Run=1, Others=0)	Variable Charges (Paise / kWh)
WR - KAKRAPAR APS	1.00	235.77
WR - TARAPUR APS Unit 3 & 4	1.00	284.17
NCE- WIND GENERATION	1.00	435.00
ER - TALCHER STPS	0.00	0.00
GANDHI SAGAR	0.00	0.00
RANAPRATAP SAGAR & JAWAHAR SAGAR	0.00	0.00
PENCH	0.00	0.00
RAJGHAT	0.00	0.00
BARGI	0.00	0.00
BIRISINGHPUR	0.00	0.00

BANSAGAR – I	0.00	0.00
BAN SAGAR II	0.00	0.00
BAN SAGAR III	0.00	0.00
BAN SAGAR IV	0.00	0.00
MARIKHEDA	0.00	0.00
INDIRA SAGAR	0.00	0.00
SARDAR SAROVAR	0.00	0.00
OMKARESHWAR	0.00	0.00
UPPCL (RIHAND,MATATILA,RAJGHAT)	0.00	8.00
WR – KSTPS	0.00	103.91
AMARKANTAK EXT	0.00	108.88
WR - SIPAT –II	0.00	125.66
AMARKANTAK COM	0.00	140.84
DVC (MTPS,CTPS)	0.00	152.05
WR - VSTPS-II	0.00	155.21
WR - VSTPS – III	0.00	157.41
SATPURA TPS PH I & II &III	0.00	163.36
WR - VSTPS-I	0.00	166.28
ER- KAHALGAON STPS-II	0.00	200.83
WR - GANDHAR GPP	0.00	231.09
SGTPS EXT	0.00	240.66
WR - KAWAS GPP	0.00	242.26
CAPTIVE	0.00	245.00
SGTPS	0.00	269.28
RSEB (CHAMBAL,SATPURA)	0.00	419.00

3.62 The total Station wise availability after application of the merit order dispatch principle on monthly availability is given in the table below:

Table 34 : Station wise availability after considering MOD (MUs)

SL No	Name of the Station	Availability (Ex-Bus - MOD)			
		State	East	West	Central
A. Central Generating Stations					
1	WR – KSTPS	3449	1355	1139	954
2	WR - VSTPS-I	3212	1156	953	1102
3	WR - VSTPS-II	2366	841	762	762
4	WR - KAWAS GPP	655	229	262	164
5	WR - GANDHAR GPP	574	184	218	172

6	WR - KAKRAPAR APS	634	206	228	200
7	WR - TARAPUR APS Unit 3 & 4	1398	473	493	432
8	WR - VSTPS – III	1947	636	699	612
9	WR - SIPAT –II	1484	583	515	386
10	ER- KAHALGAON STPS-II	357	96	189	71
11	DVC (MTPS,CTPS)	1717	567	910	240
	SUB TOTAL	17794	6327	6371	5097
B. State Generating Stations					
I	THERMAL				
1	AMARKANTAK COM	1202	325	397	481
2	AMARKANTAK EXT	1426	385	471	570
3	SATPURA TPS PH I & II &III	4845	1405	1550	1890
4	SGTPS EXT	3579	1002	1145	1432
5	SGTPS	4563	1278	1460	1825
	SUB TOTAL	15615	4394	5023	6198
II	HYDEL				
	INTERSTATE				
1	GANDHI SAGAR	187	43	50	94
2	RANAPRATAP SAGAR & JAWAHAR SAGAR	337	67	101	169
3	PENCH	210	42	84	84
4	RAJGHAT	45	9	18	18
	SUB TOTAL	779	161	254	364
	FULL MP ALLOCATION				
1	BARGI	499	125	250	125
2	BIRISINGHPUR	45	14	23	9
3	BANSAGAR – I	1214	364	486	364
4	BAN SAGAR II				
5	BAN SAGAR III				
6	BAN SAGAR IV	66	20	26	20
7	MARIKHEDA	76	23	38	15
	SUB TOTAL	1900	545	822	533
	BILATERAL AND OTHERS				
1	INDIRA SAGAR	2796	615	1482	699
2	NCE- WIND GENERATION	200	60	80	60
3	CAPTIVE	54	16	22	16
4	SARDAR SAROVAR	2157	690	928	539
5	OMKARESHWAR	1240	372	558	310
	SUB TOTAL	6448	1754	3069	1625
6	RSEB (CHAMBAL,SATPURA)	408	122	163	122
7	UPPCL (RIHAND,MATATILA,RAJGHAT)	174	52	70	52

	SUB TOTAL	582	175	233	175
	TOTAL	43118	13356	15771	13990

- 3.63 After applying MOD it has been observed that no Intra -Discom transaction of sale and purchase is required. It is apparent from the results of merit order application and as indicated in the aforementioned tables that there would be a gap between energy availability and requirements of Discoms estimated on the basis of the normative loss levels. The month-wise requirement of the Discoms would not be met through their share from allocated capacities. Since the month-wise requirement of the petitioners is more than the firm availability, hence the same would further be met from the availability of the Stations assigned to MPPMCL. The balance requirement would be met from medium term power procurement as estimated.
- 3.64 Further for FY 2013-14, the Commission has also applied the principle of merit order dispatch (MOD) on the generating stations allocated to MPPMCL. Month wise dispatch from these stations based on MOD is given in the table below:

Table 35: Month wise Dispatch based on MOD from MPPMCL allocated Stations (MU) for FY 2013-14

Month	Dispatch from MPPMCL allocated stations (MU)			
	State	East	West	Central
April, 13	598	95	376	127
May, 13	932	71	581	279
June, 13	932	155	545	232
July, 13	972	225	537	210
August, 13	970	242	415	313
September, 13	1089	273	470	345
October, 13	1014	228	535	251
November, 13	1760	561	790	409
December, 13	1516	322	696	498
January, 14	1630	473	672	485
February, 14	1489	413	807	269
March, 14	1321	357	750	213
Total	14224	3417	7176	3631

- 3.65 Further it may be observed from the above table there is still some unmet requirement during some of the months which is considered to be met through Medium term power procurement. Discom wise Ex- Bus power purchase required, availability after MOD, purchase from MPPMCL and Medium term sources is given in the table below:

Table 36 : Requirement, availability and shortfall (In MU)

Particular	East	West	Central	State
Total Required Ex-Bus	16842	23250	17992	58084
Total available Ex-Bus After MOD from firm availability	13356	15771	13990	43118
Difference	3486	7479	4002	14967
Purchase from MPPMCL allocated stations based on MOD from in-firm availability	3417	7176	3631	14224
Balance required	69	303	371	742
Medium Term power Purchase	69	303	371	742

3.66 After applying MOD on the MPPMCL stations, it has been observed that during some months of the year 2013-14, the availability from MPPMCL stations would remain partly unutilized by the Discoms. The Commission suggests that the unutilized power could be considered for banking with other States so that the shortfall, if any, in the requirement in the Rabi season could be met from such banked power itself i.e. without any cost implications. The Commission directs that the Discoms should avail the opportunity of inter-State trading of surplus power only after fully meeting demand of their consumers.

3.67 As per advice of GoMP vide letter no. 2150/13/2013 dated March 14, 2013, the Commission has decided to specify a uniform tariff in the State during FY 2013-14. Further, GoMP vide their letter no 2254/13/13/02 dated March 19, 2013 have conveyed the reallocation of the generating capacities. They have also stated that in order to maintain uniform Retail Supply Tariff across the State for FY 2013-14, the Commission may apportion the costs/capacities MPPMCL allocated stations further to Discoms.

Power Purchase Costs

3.68 The power purchase cost has two elements i.e. fixed cost and variable cost. The working for these costs is discussed in the following paragraphs.

Central Generating Stations (Thermal)

3.69 For NTPC's Stations in Western Region and Eastern Region, for the purpose of fixed cost determination of individual stations, the Commission has considered latest available Tariff Orders issued by CERC, which are given in the table below –

Table 37: Fixed Cost Order Reference for Thermal Generating Stations

SL No	Name of Station	Fixed Cost Order Reference
1	WR – KSTPS	CERC Order dated 12.10.2012, Petition No. 264/2009 from 01.04.2009 to 31.03.2014
2	WR - VSTPS-I	CERC Order dated: 12.09.2012, Petition No. 227/2009 from 01.04.2009 to 31.03.2014
3	WR - VSTPS-II	CERC Order dated: 26.12.2011, Petition No. 258/2009 from 01.04.2009 to 31.03.2014
4	WR - KAWAS GPP	CERC Order dated: 14.06.2011, Petition No. 285/2009 from 01.04.2009 to 31.03.2014
5	WR - GANDHAR GPP	CERC Order dated: 30.12.2011, Petition No. 226/2009 from 01.04.2009 to 31.03.2014
6	WR - VSTPS – III	CERC Order dated: 28.05.2012, Petition No. 260/2009 from 01.04.2009 to 31.03.2014
7	WR - SIPAT –II	CERC Order dated: 20.01.2012, Petition No. 316/2009 from 01.04.2009 to 31.03.2014
8	ER- KAHALGAON STPS-II	CERC Order dated: 13.04.2012, Petition No. 282/2009 from 01.04.2009 to 31.03.2014
9	WR - SIPAT -I (3 Units)	CERC Order dated: 6.09.2012, Petition No. 28/2011 from date of COD to 31.03.2014
10	NTPC Korba – III	CERC Order dated: 3.05.2012, Petition No. 247/2010 from date of COD to 31.03.2014
11	IPP Torrent	CERC Order dated: 11.01.2010, Petition No. 109/2009 from date of COD to 31.03.2014

- 3.70 Fixed costs of thermal power stations have been computed as per recovery of fixed cost Regulations in CERC (Terms and Conditions of Tariff) Regulations, 2009.
- 3.71 However, to determine the energy cost for FY 2013-14, the Commission has considered variable cost as charged in actual bills raised by NTPC to MPPMCL till December 2012.
- 3.72 Other charges have been considered as per the latest bills available with the Commission till December, 2012.

Central and State Generating Stations (Hydel)

- 3.73 For computation of fixed charges of Hydel Stations, the Commission has considered latest available tariff orders issued by CERC for individual stations. Further the fixed costs have been computed as per recovery of fixed charges Regulations in CERC (Terms and Conditions of Tariff) Regulations 2009 and Madhya Pradesh Electricity Regulatory

Commission (Terms and Conditions for Determination of Generation Tariff) (Revision – I) Regulations, 2009.

Indira Sagar (NHDC)

3.74 For FY 2013-14 charges for Indira Sagar hydel power plant are admitted as per the CERC Tariff Order, dated June 13, 2011.

Sardar-Sarovar

3.75 The Commission has allowed annual fixed charges as per the Tariff Order issued by it dated October 18, 2012.

Omkareshwar:

3.76 The Commission has allowed annual fixed charges for Omkareshwar as per the Tariff Order issued by CERC dated September 5, 2012.

Renewable Sources

3.77 The minimum purchase requirement by the Discoms for Solar and Non-Solar energy from different sources as per relevant Regulations for FY 2013-14 is shown in the following table:

Table 38: Minimum purchase obligation

Renewable Source	Minimum Purchase Requirements for FY 2013-14
Solar	0.80%
Non-Solar	4.70%
Total	5.50%

3.78 **Captive Generation and Wind:** Discoms have filed a total availability of 254 MU from captive power plants and wind generation during FY 2013-14. However, the break-up of the energy availability from Captive and Wind has not been provided. The Commission has considered 200 MU from Wind and remaining 54 MU from Captive sources. Supply of power from wind generation @ Rs. 4.35/kWh and captive power plant @ Rs. 2.45/ kWh has been considered for FY 2013-14. The rate provided in this Order for purchase of power from captive power plants is the maximum ceiling rate for firm power during normal time. The Commission directs Discoms that Purchase of power from captive power plants should be undertaken as per procedure prescribed in MPERC (Power purchase and other matters with respect to conventional fuel based Captive Power Plants) Regulations (revision – 1) 2009 dated 31st January, 2009.

3.79 **Generating Station assigned to MPPMCL:** As regards rate of new generating stations, the Commission has considered the rates as filed by the petitioners. The Commission

observed that for some of the upcoming generating stations the petitioners have not submitted the appropriate basis for projecting the rates. The Commission directed the petitioners to submit the appropriate basis for projecting the rates of the upcoming generating stations. The petitioners in their additional submission amongst various other things related to power purchase, made the following important submissions:

- a) The petitioners have submitted that the remark on the escalation in variable charges for UMPP Sasan, Sidhi was an inadvertent error on behalf of the petitioners. The actual rate of 70 paise per unit as per PPA may be considered for subsequent computations. Accordingly, the same has been considered for computation of power purchase cost.
- b) The petitioners have submitted that the fixed cost for Singaji TPP and Satpura extension has been considered as per the actual expenditure incurred till date. The escalation in variable charge of Rs. 3.50 per unit for Singaji TPP and Rs. 3.00 per unit for Satpura TPP was an inadvertent error and may be taken as nil for subsequent computations. The through rate of Rs. 3.50 per unit and Rs. 3.00 per unit includes fixed and variable charge and same may be considered for Singaji TPP and Satpura TPP respectively. Accordingly these rates have been considered for computation of power purchase cost.

3.80 For the new stations which will become available to the State during the current year from the Central and State Sector, the following methodology has been adopted for considering the fixed and variable charges:

Table 39: Basis of Fixed and Variable charges for MPPMCL plants

Station	Fixed Costs (Rs. Crore)	Energy Charges Rs./kWh	Basis
WR - SIPAT -I (3 UNITS)	221	143	CERC Order dated: 6.09.2012, Petition No. 28/2011 from date of COD to 31.03.2014 and variable cost as per Bills , average for April to Dec, 2012
NTPC KORBA – III	56	98	CERC Order dated: 3.05.2012, Petition No. 247/2010 from date of COD to 31.03.2014 and variable cost as per Bills , average for April to Dec, 2012
IPP TORRENT	61	308	CERC Order dated: 11.01.2010, Petition No. 109/2009 from date of COD to 31.03.2014 and variable cost as per Bills , average for April to Dec, 2012
SINGAJI THERMAL POWER STATIONS PHASE I -UNIT-1	303	163	Total cost including fixed and variable charges has been considered as filed by the Discoms
SINGAJI THERMAL POWER STATIONS PHASE I -UNIT-2		163	

SATPURA THERMAL POWER STATIONS EXTEN - UNIT 10	319	163	Total cost including fixed and variable charges has been considered as filed by the Discoms
SATPURA THERMAL POWER STATIONS EXTEN - UNIT 11		163	
NTPC MAUDA TPS-UNIT-1	72	124	Total cost including fixed and variable charges has been considered as filed by the Discoms
NTPC MAUDA TPS-UNIT-2		124	
VINDHYACHAL MEGA PROJECT, STAGE 4-UNIT-1	62	206	Total cost including fixed and variable charges has been considered as filed by the Discoms
VINDHYACHAL MEGA PROJECT, STAGE 4-UNIT-2		206	
DVC DURGAPUR STEEL TPS- UNIT-1	44	311	Fixed cost and Variable cost has been considered as per average rate based on actual bills from April to Dec, 2012
DVC DURGAPUR STEEL TPS- UNIT-2		311	
UMPP SASAN, SIDHI	22	57	Total cost including fixed and variable charges has been considered as filed by the Discoms
BINA POWER, SAGAR UNIT-1	466	151	Fixed cost and Variable cost has been considered based on MPERC Order dated December 12, 2012
BINA POWER, SAGAR UNIT-2		151	
JAIPRAKASH POWER, NIGRI- UNIT-1	256	175	Total cost including fixed and variable charges has been considered as filed by the Discoms.
JAIPRAKASH POWER, NIGRI- UNIT-2		175	
MB POWER, ANNUPUR	90	228	Total cost including fixed and variable charges has been considered as filed by the Discoms.
BLA POWER, NARSINGHPUR	19	200	Fixed cost has been considered based on MPERC Order dated July 24, 2012 and Variable cost has been considered as per average rate based on actual bills from a April to Dec, 2012
JHABUA POWER, SEONI	72	228	Total cost including fixed and variable charges has been considered as filed by the Discoms.
LANCO TPS, AMARKANTAK	314	142	Fixed cost and Variable cost has been considered based on MPERC Order dated December 01, 2012
SOLAR, WIND, BIOMASS	105	0	Average cost of Wind, Solar and Biomass is considered

3.81 The Commission has considered the cost of only those generating stations allocated to

MPPMCL which are getting dispatched after applying MOD for FY 2013-14. Since these are future capacities, actual situation may change depending on the COD of these stations as compared to the projections envisaged in this Order. Therefore there could be instances where a particular station has been considered to be scheduled based on projected COD may actually not get scheduled and vice-a-versa. In such an eventuality, the Commission would duly consider the costs based on actual scheduling for FY 2013-14 while undertaking true-up for FY 2013-14.

- 3.82 Further, the Fixed and Variable rates for some of the above mentioned generating stations allocated to MPPMCL are considered provisionally for billing purpose as the Tariff Orders for the Generating Station have not been issued by the appropriate Regulatory Commissions. However, after issuance of the relevant Tariff Order of the generating station by the appropriate Commission, the tariff approved in that Order will be considered applicable and the difference in the cost provisionally allowed in this Order and actual cost will be considered in the true-up of FY 2013-14 or allowed to be recovered through the FCA in case of variable charges.

M.P Power Generating Stations

- 3.83 The Fixed Cost of the MP Genco Stations has been considered in accordance with the Generation Tariff Order FY 2011-12 dated April 16, 2012. These fixed costs have been adjusted based on availability considered from the Generating Stations in this Order and as per Recovery of Annual Capacity (fixed) charges provided in the Madhya Pradesh Electricity Regulatory Commission (Terms and Conditions for Determination of Generation Tariff) (Revision –I) Regulations, 2009.

- 3.84 The allocation of the fixed cost among the three Distribution Companies is given in the following table:

Table 40 : Allocation of fixed cost among Discoms (Rs Crore)

Name of the Station	Fixed Cost (Rs. Crore)			
	Total	East	West	Central
CGS				
WR – KSTPS	178.91	70.32	59.08	49.50
WR - VSTPS-I	192.03	69.13	57.00	65.90
WR - VSTPS-II	145.42	51.70	46.86	46.86
WR - KAWAS GPP	60.97	21.34	24.39	15.24
WR - GANDHAR GPP	62.95	20.15	23.92	18.89
WR - KAKRAPAR APS	0.00	0.00	0.00	0.00
WR - TARAPUR APS Unit 3 & 4	0.00	0.00	0.00	0.00
WR - VSTPS – III	198.47	64.81	71.29	62.37
WR - SIPAT –II	167.76	65.86	58.23	43.67
ER- KAHALGAON STPS-II	40.66	10.98	21.55	8.13

DVC (MTPS,CTPS)	177.21	58.48	93.92	24.81
SGS				
AMARKANTAK COM	88.61	23.92	29.24	35.44
AMARKANTAK EXT	173.49	46.84	57.25	69.40
SATPURA TPS PH I & II & III	253.97	73.65	81.27	99.05
SGTPS EXT	365.13	102.24	116.84	146.05
SGTPS	303.71	85.04	97.19	121.48
HYDEL				
INTERSTATE				
GANDHI SAGAR	8.03	1.85	2.17	4.01
RANAPRATAP SAGAR & JAWAHAR SAGAR	13.64	2.73	4.09	6.82
PENCH	19.03	3.81	7.61	7.61
RAJGHAT	6.97	1.39	2.79	2.79
FULL MP ALLOCATION				
BARGI	16.53	4.13	8.27	4.13
BIRISINGHPUR	5.59	1.68	2.79	1.12
BANSAGAR – I	157.70	47.31	63.08	47.31
BAN SAGAR IV	12.98	3.89	5.19	3.89
MARIKHEDA	22.28	6.68	11.14	4.46
BILATERAL AND OTHERS				
INDIRA SAGAR	574.51	126.39	304.49	143.63
NCE- WIND GENERATION	87.17	26.15	34.87	26.15
CAPTIVE	0.00	0.00	0.00	0.00
SARDAR SAROVAR	356.04	113.93	153.10	89.01
OMKARESHWAR	358.47	107.54	161.31	89.62
RSEB (CHAMBAL,SATPURA)	0.00	0.00	0.00	0.00
RIHAND,MATATILA (UPPCL)	0.00	0.00	0.00	0.00
Total	4048.21	1211.94	1598.92	1237.35

Variable Cost

- 3.85 Based on the above discussions, the Variable Energy Charges as computed on the basis of the availability considered for purchase after applying the principle of merit order dispatch at Ex-Bus are shown below:

Table 41: Station wise admitted variable cost (Rs Crore)

Name of the Station	Total	East	West	Central
CGS				
WR – KSTPS	358.32	140.84	118.33	99.15
WR - VSTPS-I	534.16	192.29	158.54	183.32
WR - VSTPS-II	367.20	130.55	118.32	118.32
WR - KAWAS GPP	158.79	55.58	63.52	39.70
WR - GANDHAR GPP	132.71	42.47	50.43	39.81
WR - KAKRAPAR APS	149.44	48.64	53.76	47.04
WR - TARAPUR APS Unit 3 & 4	397.16	134.33	140.18	122.65
WR - VSTPS – III	306.47	100.07	110.08	96.32
WR - SIPAT –II	186.53	73.23	64.74	48.56
ER- KAHALGAON STPS-II	71.74	19.37	38.02	14.35
DVC (MTPS,CTPS)	261.12	86.17	138.40	36.56
SGS				
AMARKANTAK COM	169.29	45.71	55.87	67.72
AMARKANTAK EXT	155.26	41.92	51.24	62.10
SATPURA TPS PH I & II &III	791.48	229.53	253.27	308.68
SGTPS EXT	861.32	241.17	275.62	344.53
SGTPS	1228.74	344.05	393.20	491.50
HYDEL				
GANDHI SAGAR	0.00	0.00	0.00	0.00
RANAPRATAP SAGAR & JAWAHAR SAGAR	0.00	0.00	0.00	0.00
PENCH	0.00	0.00	0.00	0.00
RAJGHAT	0.00	0.00	0.00	0.00
BARGI	0.00	0.00	0.00	0.00
BIRISINGHPUR	0.00	0.00	0.00	0.00
BANSAGAR – I	0.00	0.00	0.00	0.00
BAN SAGAR IV	0.00	0.00	0.00	0.00
MARIKHEDA	0.00	0.00	0.00	0.00
BILATERAL AND OTHERS				
INDIRA SAGAR	0.00	0.00	0.00	0.00
NCE- WIND GENERATION	0.00	0.00	0.00	0.00
CAPTIVE	13.23	3.97	5.29	3.97
SARDAR SAROVAR	0.00	0.00	0.00	0.00
OMKARESHWAR	0.00	0.00	0.00	0.00
RSEB (CHAMBAL,SATPURA)	171.02	51.31	68.41	51.31
RIHAND,MATATILA, (UPPCL)	1.39	0.42	0.56	0.42
Total	6315.38	1981.61	2157.78	2175.99

- 3.86 After allowing long term purchases as per merit order dispatch, 14966 MU remains to be arranged in various months of FY 2013-14. Of this balance requirement, 14224 MU would be met from the generating stations allocated to MPPMCL. This leaves a balance requirement of 742 MU, which would be met through medium term sources @ 4.11 Rs./kWH. The medium term power is available for the period from October, 2012 to March, 2014. The total MU dispatch and cost of MPPMCL allocated generating stations is mentioned in table below:

Table 42 : Total MU dispatch and Cost of MPPMCL allocated generating stations

Dispatch from MPPMCL Stations	Total MU				Total Cost (Rs Crore)			
	East	West	Central	Total	East	West	Central	Total
Total for the State	3417	7176	3631	14224	670.36	2555.80	808.60	4034.76

Inter-State and Inter-Regional Transmission Charges

- 3.87 PGCIL charges to be paid by MP Discoms consist of charges to be paid for transmission system of Western Region and Eastern Region.
- 3.88 The Commission has reviewed inter-state transmission charges as per the actual bills available for FY 2012-13 up to Dec, 2012 and the claims filed by the petitioners. The Commission observed that the claims filed by the petitioners are reasonable and therefore the Commission has admitted the same. These charges have then been allocated to respective Discoms, based on their firm capacity as per the GoMP notification inclusive of specific allocation for Bundelkhand region. The Commission has considered the capacities of generating stations available through MPPMCL which are allocated to State while allocating the PGCIL charges to the Discoms. The table below gives a detail of the charges allocated to East, West and Central Discoms.

Table 43 : PGCIL charges allowed to Discoms (Rs. Crore)

Discom	Share in MW	PGCIL Charges
East	1492	205.05
West	1911	262.53
Central	1590	218.42
Total	4993	686.00

Intra-state Transmission Charges

- 3.89 The Commission has considered the transmission charges as approved in the Transmission Tariff Order for FY 2012-13 and some allowance for expected increase in FY 2013-14. Further the terminal benefits have been admitted as claimed by the Petitioner for FY 2013-14. Accordingly intra – State transmission charges for FY2013-14 in the power purchase cost of the Discoms have been admitted as given in the table below:

Table 44 : MPPTCL charges allowed by the Commission for FY 2013-14 (Rs. Crore)

Annual MPPTCL Charges	FY 2013-14
MP Poorv KVVCL	496.03
MP Madhya KVVCL	540.71
MP Paschim KVVCL	563.11
Total	1599.85

3.90 With regard to the issue of expenses against terminal benefits for MPSEB/ successor entities employees who are to retire in FY 2013-14 as well as pension payments to be paid to pensioners in FY 2013-14, the petitioners have prayed to allow expenses to the extent of expected cash outgo during FY 2013-14 on this account and have claimed Rs.677 Crore under the intra-state transmission charges. Some additional amount on this account has also been claimed by the Discoms under O&M expenses. However, during the meeting held on 5th February, 2013 with the MDs of the Discoms and the MPPMCL, it was accepted by them that this has been an inadvertent error. The Commission has allowed the terminal benefits and pension expenses for FY 2013-14 on provisional basis on “pay as you go” principle payable to MP Transco to the extent of Rs.677 Crore based on the claims filed by the petitioner under the head of intra-state transmission charges claimed for FY 2013-14. These are included in total transmission charges of Rs. 1600 Crore. As has been mentioned in this tariff order elsewhere (reference – issue no.28 in chapter A-6 on “PUBLIC OBJECTIONS AND COMMENTS ON LICENSEES’ PETITION”), the Commission has not made any provision under sub clauses (5) , (6) of clause 3 of MPERC (Terms and Conditions for allowing pension and terminal benefits liabilities of personnel of the Board and successor entities) Regulation 2012 (G-38 of 2012) for FY 2013-14 since no such demand has been made by the petitioners nor have any details been provided to support such claim.

MPPMCL Cost

3.91 The Commission has also admitted an amount of Rs. 79.18 Crore as MPPMCL expenses for FY 2013-14 as claimed by the petitioners based on the prudence check of expenditure claimed by the petitioners. While admitting these expenses, the Commission has reviewed expenses incurred as indicated in MPPMCL financial statements for FY 2011-12.

SLDC Charges

3.92 The Commission has considered the SLDC charges of Rs. 9.29 Crore provisionally as filed by the petitioners for FY 2013-14. This has also been included in the aforementioned transmission charges. The total power purchase cost as admitted by the Commission is summarized in the following table:

Table 45 : Total power purchase cost admitted for FY 2013-14 (Rs Crore)

Particulars	East Discom	West Discom	Central Discom	Total for State
For Discom allocated stations				
Fixed Charges	1211.94	1598.92	1237.35	4048.21
Variable Charges	1981.61	2157.78	2175.99	6315.38
Stations allocated to MPPMCL	670.36	2555.80	808.60	4034.76
Cost for Medium Term power	28.44	124.34	152.36	305.14
MPPMCL Cost	21.68	30.30	27.19	79.17
PGCIL Charges	205.05	262.53	218.42	686.00
MPPTCL Charges (Including Terminal Benefits)	496.03	563.11	540.71	1599.85
SLDC Charges	3.02	3.09	3.18	9.29
Grand Total	4618.13	7295.87	5163.80	17077.80

Pooled Power Purchase Cost

3.93 The Central Electricity Regulatory Commission (Terms and Conditions for recognition and issuance of Renewable Energy Certificate for Renewable Energy Generation) Regulations, 2010 have stipulated the provision for determining the pooled cost of power purchase for the purpose of computing the Floor and Forbearance price of Renewable Energy Certificates. The relevant provision of the Regulation is reproduced below:

“5 Eligibility and Registration for Certificates:

(1)

:

:

c. it sells the electricity generated either (i) to the distribution licensee of the area in which the eligible entity is located, at a price not exceeding the pooled cost of power purchase of such distribution licensee, or (ii) to any other licensee or to an open access consumer at a mutually agreed price, or through power exchange at market determined price.

Explanation.- for the purpose of these regulations ‘Pooled Cost of Purchase’ means the weighted average pooled price at which the distribution licensee has purchased the electricity including cost of self generation, if any, in the previous year from all the energy suppliers long-term and short-term, but excluding those based on renewable energy sources, as the case may be.”

- 3.94 Accordingly, the pooled power purchase cost has been computed considering ex-bus power purchase excluding renewable energy sources as mentioned in the table below:

Table 46 : Pooled Power Purchase cost for FY 2013-14

Particulars	FY 2013-14
Power Purchase Requirement excluding renewable energy sources (MU) Ex- Bus	57675
Total Power Purchase Cost excluding renewable energy sources (Rs Crore)	14592
Pooled Power Purchase Cost (Rs/kWh)	2.53

Network Cost

Capital Expenditure Plans/ Capitalization of Assets

Petitioners submissions

Investments

- 3.95 The petitioners have submitted the Capital Investment Plan under various schemes like Feeder Segregation, ADB, R-APDRP, System Strengthening (STN/TSP/SCSP), RGGVY, Kisan Anudan Yojana (New Agricultural Pumps), etc. It is further submitted that the petitioners' focus is on the creation of new 33/11 kV substations, bifurcation of overloaded 33 kV feeders, 11 kV Feeder Segregation, additional/augmentation of PTRs, installation of DTRs, conversion of bare LT line into AB Cables and replacement of service lines etc.
- 3.96 The petitioners have further submitted that technical losses forming a part of distribution losses of the system are mainly due to poor infrastructure which needs strengthening, renovation and up-gradation of the capacity of lines, sub-stations and associated infrastructure. Commercial losses on account of pilferage of energy can be reduced to a large extent by re-engineering the system, which requires capital investment and concerted efforts. Distribution Licensees are working for reduction in both technical and commercial losses and in the recent years distribution losses have also reduced, but not upto the normative loss level.
- 3.97 Discom wise Capital Investment Plan under various schemes for FY 2012-13 and FY 2013-14 as filed is indicated below:

Table 47 : Capital Investment plan (Rs. Crore)

Distribution Company	FY 2012-13	FY 2013-14
East Discom	1,367.74	1,921.51
West Discom	1,450.20	1,471.89
Central Discom	1,914.68	1,297.35
Total for the State	4,732.62	4,690.75

Capitalization and CWIP

3.98 Discom wise Capitalization Plan and the status of CWIP as filed by the Discoms for FY 2012-13 and FY 2013-14 are indicated below:

Table 48 : Discom wise year wise capitalisation and bifurcation of CWIP (Rs. Crore)

Particulars	FY 2012-13	FY 2013-14
East Discom		
Opening Balance of CWIP	618.18	1171.39
Fresh Investment during the year	1,367.74	1,921.51
Interest and Expenses Capitalized	75.39	82.97
Investment Capitalized	889.93	1577.14
Closing Balance of CWIP	1,171.39	1,598.73
West Discom		
Opening Balance of CWIP	756.68	1,229.55
Fresh Investment during the year	1,450.20	1,471.89
Interest and Expenses Capitalized	0.00	0.00
Investment capitalized	977.33	1423.23
Closing Balance of CWIP	1,229.55	1,278.21
Central Discom		
Opening Balance of CWIP	410.94	1332.61
Fresh Investment during the year	2,014.62	1,405.26
Interest and Expenses Capitalized	0.00	0.00
Investment capitalized	1092.95	1358.68
Closing Balance of CWIP	1332.61	1379.19

Commission's Analysis on Asset Capitalisation

3.99 MPERC (Terms and Conditions for Determination of Tariff for Supply and Wheeling of Electricity and Methods and Principles for Fixation of Charges) Regulations, 2012 (Tariff Regulations) specifies the manner of submission the Capital Investment Plan.

3.100 As per these Regulations, the Discoms shall submit in the ARR petition a detailed Capital Investment Plan, Financing Plan and Physical targets indicating physical and financial achievement against various Capex schemes for meeting the requirement of

load growth, reduction in distribution losses, improvement in quality of supply, reliability, metering etc.

- 3.101 The Capital Investment Plan shall show separately, ongoing projects that will spill into the year under review and new Projects (along with justification) that may commence but may be completed within or beyond the Tariff Period. The Commission shall consider and approve the Discoms' Capital Investment Plan for which the Distribution Licensee shall be required to provide relevant technical and commercial details.
- 3.102 The petitioners have filed the Capital Investment Plan in their Petition for FY 2013-14. The progress of asset addition by the Discoms for FY 2009-10, FY 2010-11, and FY 2011-12 reveal that the Gross Fixed Assets (GFA) addition has been as follows:

Table 49 : Asset capitalisation during FY 2009-10 to FY 2011-12 (Rs. Crore)

Particulars	East	West	Central
FY 2009-10	252.38	75.40	173.24
FY 2010-11	405.38	661.40	180.14
FY 2011-12	572.78	490.48	689.15

- 3.103 It can be seen from the above table that during FY 2011-12 the Discoms have achieved significant progress in asset capitalisation. The Commission has therefore considered the same amount of asset capitalisation for admitting the capitalisation for FY 2012-13 and FY 2013-14. For formulation of tariff in FY 2013-14, the Commission has computed asset addition during FY 2013-14 keeping in view actual assets addition of FY 2011-12.

Table 50: Asset capitalisation considered for FY 2012-13 to FY 2013-14 (Rs. Crore)

Particulars	East	West	Central
FY 2012-13	572.78	490.48	689.15
FY 2013-14	572.78	490.48	689.15

Operations and Maintenance Expenses

Petitioners submission

- 3.104 The petitioners have submitted that Operation and Maintenance (O&M) expenses projected are based on the relevant provisions of the Regulations. Component wise O&M expenses has been discussed below:

Employee Expenses

- 3.105 As regards Employee Expenses, the petitioners have submitted that in accordance to the Regulation 34.1 of the Tariff Regulations, the Commission has notified norms for

Employee Expenses excluding Dearness Allowance (DA), pension, terminal benefits and incentives to be paid to employees, and therefore the same have been considered over and above the notified/normative expenses.

- 3.106 East Discom has submitted that in case of DA, it has assumed 14% increase during the year in two six monthly installment of 6% and 8%, which will result in approximately 10% increase during FY 2013-14. They have further submitted that current DA is @ 72% basic salary, therefore, DA for FY 2013-14 is considered as 82% of the Basic Pay.
- 3.107 West Discom has submitted the following assumptions for estimating the Employee Expenses:
- a) For the calculation of DA, Basic Pay has been arrived by increasing the Basic pay over FY 2011-12 by 3%
 - b) The petitioner has submitted that growth rate in DA has been considered based on average increase in DA by the State Government since July 2009 i.e. 7% increase every six months. Accordingly, it has considered an average DA rate of 82.50% for FY 2013-14.
 - c) On account of terminal benefits, only cash outflow has been considered as per the provisions of the MPERC (Terms and Conditions for allowing Pension and Terminal Benefits Liabilities of Personnel of the Board and Successor Entities) Regulations, 2012.
 - d) Incentives/Bonus to be paid to the employees considered as per the previous trend in the Audited Accounts.
 - e) Expenses on account of arrears due to revision of pay as provided by the Sixth Pay Commission have been considered as notified in the Regulations.
- 3.108 West Discom in their filing requested to review Employee expenses norms on account of following reasons:
- a) As most of the employees working in the company have been transferred from MPSEB to Discoms and their service conditions cannot be changed in view of the provision of the EA, 2003 and Transfer Scheme Rules, the Employee expenses are of committed in nature and un-avoidable. It is also submitted to treat the same as uncontrollable factor.
 - b) On the backdrop of all round shortage of staff, the Company has recently started recruiting in some crucial cadres like Assistant Engineers, Junior Engineers, Line staff, etc. Additional expenses on account of salaries for fresh recruitment during the FY 2013-14 have been considered.
 - c) Two Rural Electricity Co-operative Societies (RECs) viz. Pandhana and Manasa have been merged into the Discom Therefore the Discom is required to incur the additional employee cost towards the employees of RECs. Licensee has submitted that no employee cost has been considered on this account in the Regulations.

Further, based on past actual data licensee is expected to incur cost totaling to Rs. 11.58 Crore which has not been considered in the Regulations.

- 3.109 Central Discom in its additional submission dated January 19, 2013 have claimed net employee expenses of Rs. 793.85 Crore for FY 2013-14 along with assumptions considered for estimating certain expenses. Broadly, licensee has claimed expenses of Rs. 307.49 Crore towards Salaries, Rs. 253.68 Crore towards D.A., Rs. 23.78 Crore towards Other allowances and relief, Rs. 174.50 Crore for Terminal Benefits, Rs. 12.41 Crore towards Staff Welfare Expenses, and Rs. 71.19 Crore towards various other expenses.
- 3.110 During scrutiny of the Petition it was observed that ‘Employee expenses excluding DA, arrears, pension, and Terminal Benefits’ for Central Discom for FY 2013-14 was stated as Rs. 307.49 Crore, against relevant normative expenses of Rs. 303 Crore specified under Tariff Regulations. In response to a query in this regard, Discom has submitted that as per new HR policy, retirement age of the employee has been increased from 58 years to 60 years. Hence, number of retirements will reduce and the figure of employee cost will increase in the employee expenses. Discom has further requested the Commission to consider the increase in employee expenses.
- 3.111 In response to a query as to why different rates have been considered for projections of DA by Discoms, West and Central Discoms have submitted that in view of past trend, 7% increase is considered in the DA every six months and accordingly 82.50% average DA has been considered for FY 2013-14. , East Discom has submitted that the DA rate as claimed by other Discoms may be considered.

A&G Expenses

- 3.112 East Discom has submitted that as per the relevant provision of Regulations, Administrative and General (A&G) Expenses for FY 2013-14 are estimated at Rs. 112.78 Crore.
- 3.113 West Discom has submitted that norms of A&G expenses specified in the Regulation 34.1 of the Tariff Regulations exclude taxes payable to the Government and Fees payable to MPERC. Therefore, it has considered the expenses towards such items over and above the normative A&G expenses. For FY 2013-14, the Discom has estimated the A&G expenses excluding MPERC fees and taxes totaling to Rs. 97.73 Crore, considering the amount of Rs.5.02 Crore towards the taxes payable to the Government.
- 3.114 Central Discom has estimated A&G expenses excluding MPERC fees and taxes at Rs. 105.71 Crore, considering the amount of Rs. 1.02 Crore towards the taxes payable to the Government.
- 3.115 Central Discom in its additional submission has submitted the net A&G expenses as Rs. 224.40 Crore, which are based on the following points:

- a) **Rent:** The rent has been considered as last year audited base data as adjusted with inflation rate.
- b) **Rates and Taxes:** Based on last year audited base data and further adjusted with inflation rate.
- c) **Insurance Fund Charges:** The insurance charges are taken as proportionate to the revenue and thereby taking the average of last 3 years audited figures and adjusted by inflation rate.
- d) **Other Expenses:** All the other expenses are taken in proportion to the GFA and the Revenue and further averaged out for last 3 years audited financials for making the projections for FY 2013-14.
- e) **Allocation of common expenses of MPSEB:** These expenses have been claimed as average of last 3 years audited financial statements and further increased by 8.96% as inflation rate for FY 2013-14.
- f) **Bandwidth charges R-APDRP Part A:** Company has implemented R-APDRP Part A project with the financial assistance of the Power Finance Corporation. The cost of Networking, GPRS charges, FMS charges for hardware and software are not included in this funding and these costs are required to be funded through Company's own funds as operational expenses. This cost has not been included in the Investment and Financial plan of the company for FY 2013-14. For FY 2013-14, an expenditure amounting to Rs. 10.37 Crore is estimated towards project implementation.

3.116 During scrutiny of the Petition it was observed that A&G Expense excluding MPERC fees and Taxes for Central Discom for FY 2013-14 was stated as Rs. 105.71 Crore, against relevant normative expenses of Rs. 85.14 Crore specified under Tariff Regulations. In response to a query raised in this regard, Discom has submitted that actual A&G expenses for FY 2011-12 are Rs. 93.24 Crore (before Capitalization), and for FY 2013-14, it has projected A&G Expense excluding MPERC fees and Taxes at Rs.110.05 Crore.

3.117 Further, in response to the query on the nature of taxes payable to the Government, Discom has submitted that such taxes comprise Property tax, other miscellaneous State Levies, and Entry Tax.

R&M Expenses

3.118 Discoms have submitted that as per the relevant provision of Regulations, Repair and Maintenance (R&M) Expenses, @ 2.3 % of opening GFA, for FY 2013-14 are estimated at Rs. 93.46 Crore, Rs. 96.38 Crore, and Rs. 85.67 Crore for East, West and Central Discom respectively.

3.119 Central Discom in its additional submission has submitted R&M expense of Rs.129.72

Cre. Discom has submitted that the R&M cost is forecast as 1.62% of the GFA and further inflated with 8.96% as inflation rate for FY 2013-14. The total R&M expenses are then bifurcated into the respective sub-categories based on previous three years share of the sub-category of total R&M expense.

Other Items of O&M Expenses

Claims against terminal benefits

3.120 The petitioners have claimed terminal benefits and pension payments under the head of O&M expenses as discussed in following paragraphs.

3.121 As regards, Terminal Benefits (Pension, Gratuity, and Leave Encashment) Provision-Discoms have submitted that in view of the provisions of the MPERC (Terms and Conditions for allowing Pension and Terminal Benefits Liabilities of Personnel of the Board and Successor Entities) Regulations, 2012, they have considered both provisions, the rate as prescribed in actuary report and actual cash out flow on account of terminal benefits. It is clarified that, for estimating such liability, according to actuarial valuation, the liability as on March 31, 2009 for three Discoms was determined, to which the actual percentages prescribed in the Actuary valuation for the future contribution rate required to be made for meeting the liabilities arising due to future service.

Table 51: Future Contribution rate of liability on account of Actuary

Assumption	East Discom				West Discom				Central Discom			
	Gratuity	Pension	Leave Encashment	Total	Gratuity	Pension	Leave Encashment	Total	Gratuity	Pension	Leave Encashment	Total
Contribution rate	4.95%	21.73%	0.77%	27.45%	4.67%	20.28%	0.59%	25.54%	4.56%	20.15%	0.54%	25.25%
Discount rate	7.00%	7.00%	7.00%	7.00%	7.00%	7.00%	7.00%	7.00%	7.00%	7.00%	7.00%	7.00%

Table 52: Calculation of Terminal Benefits (Rs. Crore)

Particular	Pension		Gratuity		Leave Encashment	
East Discom						
Provision as on 31.03.2013	737.52		141.31		55.78	
Discount @7%	7.00%	51.63	7.00%	9.89	7.00%	3.9
Current Service cost						
Yearly salary	414.72		414.72		414.72	
Contribution	21.73%	90.12	4.95%	20.53	0.77%	3.19
Total Provision for FY 2013-14		141.8		30.42		7.1
West Discom						
Provision as on 31.03.2013	743.48		141.75		32.35	
Discount @7%	7.00%	52.04	7.00%	9.92	7.00%	2.26
Current Service cost						
Yearly salary	552.22		552.22		552.22	

Contribution	20.28%	112	4.67%	25.79	0.59%	3.26
Total Provision for FY 2013-14		164		35.71		5.52
Central Discom						
Provision as on 31.03.2013		703.29		154.37		69.85
Discount @7%	7.00%	49.23	7.00%	10.81	7.00%	4.89
Current Service cost						
Yearly salary		379.9		379.9		379.9
Contribution	20.15%	76.55	4.56%	17.32	0.54%	2.05
Total Provision for FY 2013-14		125.8		28.13		6.94

Table 53: Terminal Benefits Liability for Discoms (Rs. Crore)

Particulars	East Discom		West Discom		Central Discom	
	FY 2012-13	FY 2013-14	FY 2012-13	FY 2013-14	FY 2012-13	FY 2013-14
Gratuity	141.31	30.42	141.75	35.71	129.59	24.79
Pension	737.52	141.75	743.48	164.03	592.38	110.92
Leave Encashment	55.78	7.1	32.35	5.52	63.35	6.31
Total	934.61	179.26	917.59	205.27	785.51	142.02

- 3.122 Central Discom in its additional submission submitted the methodology for calculation of terminal benefits and prayed to allow to the cost of Rs. 927.55 Crore in the ARR for FY 2013-14, for meeting the past service liability as per actuarial valuation report.
- 3.123 As regards, Terminal Benefits (Cash Outflow), the petitioners have submitted that Terminal Benefits (only yearly Cash Outflow for FY 2013-14) have been included as part of the employee expenses. Further, for estimating the Cash Outflow, the actual cash Outflow of FY 2011-12 increased by 7.93% yearly. As part of submission under additional information, the petitioners have submitted that the Terminal Benefits claimed under O&M expenses to the extent of Rs. 585.89 Crore are on the basis of actual cash outflow and the Terminal Benefits is only for Discoms employees excluding Transco, Genco, and MPPMCL employees.

Table 54: Terminal Benefits (Cash Outflow) of Discoms (Rs. Crore)

Particulars	East Discom	West Discom	Central Discom
Gratuity	152.88	161.09	121.4
Pension	10.96	52.46	42.55
Leave Encashment	3.75	15.57	17.48
PF/GTIS/NPS etc.	1.16	4.39	2.19
Total	168.75	233.52	183.62

3.124 As regards, MPERC fees, the petitioners have submitted that for FY 2013-14, they have estimated the MPERC fees as per the provisions of the Regulations. Central Discom in its additional submission has claimed Rs. 0.39 Crore towards MPERC Licence Fee for FY 2013-14 under A&G expenses.

3.125 Accordingly as per the submission made above, the filing of the petitioners in respect of O&M Expenses is indicated below:

Table 55: O&M expenses for FY 2013-14 (Rs. Crore)

Particulars	East Discom	West Discom	Central Discom
	As per Norms	As per Norms	As per Norms
Employee Cost (including arrears, DA and others)	660.08	616.30	591.01
A&G Expenses	112.78	97.73	106.73
R&M expenses	93.46	96.38	85.67
Other Item of O&M expenses			
Terminal Benefit (Cash Outflow)	168.75	233.52	183.62
MPERC Fees	0.48	0.67	0.51
Total O&M expenses	1035.55	1044.60	967.54

Commissions Analysis on O&M Expenses

3.126 MPERC (Terms and Conditions for Determination of Tariff for Supply and Wheeling of Electricity and Methods and Principles for Fixation of Charges) Regulations, 2012 specified the normative O&M Expenses for each of the Discoms in the State.

3.127 Operation and Maintenance (O&M) expenses comprise Employee expenses, Repair and Maintenance (R&M) cost and Administrative and General (A&G) expenses. The

amount of employee expenses, expenses against arrears, and A&G expenses for FY 2013-14 have been specified in the Regulations. For the R&M expenses, it has been specified that R&M expenses will be considered as 2.3% of opening GFA for the financial year. These norms exclude pension, terminal benefits and incentive to be paid to employees, taxes payable to the Government, MPSEB expenses and fee payable to MPERC. Details of basis of arriving at the amount of expenses including expenses towards payment of arrears have been provided in the Regulations.

- 3.128 The amount of arrears on account of 6th Pay Commission for the period up to 31.08.08 actually paid by the Discoms shall be compared with amount towards this head included in O&M charges at the time of true-up and variation, if any, shall be trued up.
- 3.129 As regards the issue of expenses against terminal benefits for the MPSEB/successor entities who are yet to retire in FY 2013-14 as well as pension payments to pensioners, the Commission has allowed the terminal benefits and pension expenses for the FY 2013-14 on provisional basis on ‘pay as you go’ principle under the transmission charges to the extent of Rs. 677 Crore. Therefore no separate provisions under O&M expenses are warranted. The Commission’s views/ directions on this issue are given elsewhere in this tariff order (reference para 3.90 in chapter A3 under subsection on “Commission’s Analysis on Energy balance and power purchase”).
- 3.130 The Commission shall allow the taxes payable to the Government and Fees to be paid to the MPERC separately as actual.
- 3.131 Accordingly, Employee expenses as specified in the Tariff Regulations have been admitted. As regard DA, the Commission considers it appropriate to allow DA @ 80% of the Basic salary based on historical trends subject to true up. The Commission has also considered expected expenditure of Rs. 34 Crore, Rs. 30 Crore, and Rs. 29.52 Crore for East, West and Central Discom against salary arrears for FY 2013-14 as specified in the MPERC (Terms and Conditions for Determination of Tariff for Supply and Wheeling of Electricity and Methods and Principles for Fixation of Charges) Regulations, 2012 subject to true up.

Table 56: Employee Expenses as admitted for FY 2013-14 (Rs. Crore)

Particulars	East	West	Central
Employee Expenses excluding arrears, DA, Terminal Benefits and incentives	344.00	325.00	303.00
DA	275.20	260.00	242.40
Arrears	34.00	30.00	29.52
Total	653.20	615.00	574.92

3.132 The Commission has considered the submissions made by the petitioners for allowing expenses in addition to the normative levels and finds this unacceptable. However, if there are major deviations on account of some unforeseen circumstances, same shall be duly considered at the time of true up. A&G expenses as specified in the Tariff Regulations have been admitted as given in the Table below:

Table 57: A&G Expenses as admitted for FY 2013-14 (Rs. Crore)

Particulars	East	West	Central
A&G expenses	112.78	92.71	85.14

3.133 R&M expenses @ 2.3% of opening GFA of respective Discoms for the financial year have been considered.

Table 58: R&M Expenses as admitted for FY 2013-14 (Rs. Crore)

Particulars	East	West	Central
Opening GFA as on 1 st April, 2012	3173.69	3213.18	3087.15
Asset addition considered during FY 2012-13*	572.78	490.48	689.15
Opening GFA as on 1 st April, 2013	3746.46	3703.65	3776.30
Allowed % for R&M	2.30%	2.30%	2.30%
Total R&M	86.17	85.18	86.85

Note: * Asset addition during FY 2012-13 is considered at same level of FY 2011-12.

3.134 Total O&M expenses admitted by the Commission for FY 2013-14, have been summarized in the table below:

Table 59: O&M Expenses as admitted for FY 2013-14 (Rs. Crore)

Particulars	East	West	Central
Employee Expenses	653.20	615.00	574.92
A&G Expenses	112.78	92.71	85.14
R&M Expenses	86.17	85.18	86.85
Total O&M expenses	852.15	792.89	746.91

Depreciation

Petitioners submissions

3.135 The petitioners have submitted that they have developed detailed depreciation model based on rates specified by the Commission in Annexure-II of Tariff Regulations. The depreciation worked out for FY 2012-13 to FY 2013-14 is shown in Table below:

Table 60: Depreciation as per Regulation (Rs. Crore)

Particulars	East Discom		West Discom		Central Discom	
	FY 2012-13	FY 2013-14	FY 2012-13	FY 2013-14	FY 2012-13	FY 2013-14
Land under Lease	0.00	0.00	0.07	0.13	0.00	0.00
Building	1.35	1.86	2.68	3.01	0.69	1.09
Hydraulic Works	0.16	0.12	0.28	0.28	0.01	0.01
Other Civil Works	0.07	0.07	0.08	0.08	0.02	0.02
Plant and Machinery	34.97	47.52	74.96	117.33	88.05	125.24
Line Cable Networks etc.	77.04	92.63	62.37	75.83	44.64	88.06
Vehicles	0.01	0.01	0.02	0.02	0.06	0.06
Furniture and fixtures	0.00	0.00	0.09	0.12	0.05	0.09
Office Equipments	2.04	3.3	0.75	1.14	0.75	1.11
Total	115.63	145.5	141.31	197.95	134.27	215.68

3.136 Central Discom in its additional submission has stated that it has inherited Opening GFA of Rs 3096.57 Crore as per Audited Accounts for FY 2011-12. The Capitalisation of CWIP is transferred to the fixed assets as new assets additions for the year. It is expected that the addition of GFA during FY 2013-14 would be of Rs. 684.85 Crore and accordingly accumulated depreciation during FY 2013-14 would be of Rs. 215.68 Crore. The petitioners submitted that the salient premise adopted for projection of depreciation for FY 2013-14 are as follows:

3.137 The period from the opening balance of the depreciable assets (assets not depreciated up to 90%) for each year of the projection period has been estimated based the year wise asset addition data of MPSEB from 1985-86 to 2004-05 under each account head. No depreciation has been charged on assets whose accumulated depreciation has reached 90% of the Assets value (Original value). A summary of the estimated % depreciable assets (opening balance) for the projection period is represented below:

- a. The depreciation has not been charged on the assets which are created out of consumer contribution for FY 2013-14 to FY 2015-16.
- b. The depreciation rate that has been adopted for the depreciation calculation is as per the Companies Act, 1956. Also the Companies Act, 1956 rates are used in the preparation of Annual Accounts of the Discom. The Discom requested the Commission to consider Companies Act rates applicable for a Transmission Licensee for Distribution Licensee as well.

Commission's Analysis of Depreciation

- 3.138 As per the MPERC (Terms and Conditions for Determination of Tariff for Supply and Wheeling of Electricity and Methods and Principles for Fixation of Charges) Regulations, 2012, for the assets of Distribution System declared in commercial operation after 31st March, 2013, depreciation shall be calculated annually based on 'straight line method' and at the rates specified in Annexure II of aforementioned Tariff Regulations. Provided that, the remaining depreciable value as on 31st March of the year closing after a period of 12 years from Date of Commercial Operation shall be spread over the balance useful life of the assets.
- 3.139 In case of the existing Projects, the Tariff Regulations specify that the balance depreciable value as on 1st April, 2013 shall be worked out by deducting the cumulative depreciation including advance against depreciation as admitted by the Commission up to 31st March, 2010 from the gross depreciable value of the assets. The rate of depreciation shall continue to be charged at the rate specified in Annexure-II of Tariff Regulations till cumulative depreciation reaches 70 %. Thereafter, the remaining depreciable value shall be spread over the remaining life of the asset such that the maximum depreciation does not exceed 90 %.
- 3.140 It is observed that the filing by the Discoms has not been in accordance with the provisions of the Regulations. Due to non submission of information such as assets wise detail, depreciation as per the rate specified in Annexure-II, assets depreciated more than 90% of their value, useful life of assets, and final depreciation model comprising all relevant information in the desired manner in accordance with the provisions of the Regulations, the Commission has re-computed the depreciation for FY 2013-14.
- 3.141 As regards value of the asset base, the Commission has dwelt at length on the reasons for not considering the projections of asset addition made by the Discoms for FY 2013-14, as these are not in conformity with the past trend. For FY 2013-14 the Commission, has therefore, computed depreciation taking assets base as closing balance of assets existing as on 31st March, 2012 plus the addition in GFA during FY 2012-13. GFA as per audited statements of accounts of FY 2011-12 has been used, to arrive at the opening GFA for FY 2012-13. Further for projecting GFA for FY 2013-14 for depreciation purposes, half of the addition in GFA during FY 2012-13 has been considered to arrive at the GFA for FY 2013-14. Further the depreciation rates of 2.44%, 2.81%, 2.44% have been considered for determining the depreciation for FY 2013-14. However, the Commission clarifies that the difference in Depreciation amount as approved by the Commission in this Tariff Order and the actual Depreciation as per Audited Accounts for FY 2013-14 shall be trued up in the True-up Order for FY 2013-14.
- 3.142 For arriving at GFA, the accumulated Consumer Contribution, Grant and Subsidy toward cost of capital assets till 31st March, 2012 have been reduced from the GFA. Consumer Contribution during FY 2012-13 is considered the same as Consumer Contribution as mentioned in Audited Statement of Accounts of FY 2011-12. The GFA has been considered for allowing depreciation for FY 2013-14 on the basis of opening

GFA of FY 2013-14 plus half of the average addition during FY 2012-13 after netting off consumer contribution.

3.143 The closing GFA as on 31st March, 2012 in Audited Statement of Accounts i.e. Opening GFA as on 1st April, 2012 is taken after eliminating the land cost.

3.144 The depreciation admitted for FY 2013-14 is given in the following table:

Table 61: Depreciation (Rs. Crore)

Particular	East	West	Central
Opening GFA as on 1st April, 2012	2091.74	2655.30	2568.36
Add: Addition during FY 2011-12	572.78	490.48	689.15
Less: Consumer Contribution in FY 2011-12	187.03	91.97	111.68
Opening GFA as on 1st April, 2013	2477.49	3053.80	3145.83
Average of addition less addition to Consumer Contribution during FY 2013-14	192.87	199.25	288.74
GFA for Depreciation for FY 2013-14	2670.36	3253.05	3434.57
Depreciation Rate (%)	2.44%	2.81%	2.44%
Depreciation admitted for FY 2013-14	65.16	91.41	83.80

Note: Depreciation rate in percentage considered in the table above are as provided in Tariff Order for FY 2011-12 as the Distribution Licensees have neither submitted the computation in accordance with the Tariff Regulations nor submitted the requisite details of item wise assets vis-à-vis actual accumulated depreciation.

Interest and Finance Charges

Petitioners submissions

3.145 The petitioners have submitted that Regulation 31 provides the method of calculation of Interest and Finance Charges on loan capital. The same methodology has been adopted for projecting the Interest and Finance charges on project loans for FY 2013-14 as adopted by the Commission in the Tariff Order for FY 2012-13.

East Discom

3.146 The East Discom has filed the following details for working the interest on capital loans:

Table 62: Interest cost as per Regulation (Rs. Crore)

Particulars	East Discom	
	FY 2012-13	FY 2013-14
Addition to GFA during the year	889.93	1,577.14
Consumer contribution during the year	27	34.1
Net addition to GFA during the year (1 2)	862.93	1,543.04
30% of addition to net GFA considered as funded through equity	258.88	462.91
Balance addition to net GFA during the year funded through debts	604.05	1,080.13
Debt Repayment due during the year (equal to the depreciation claim)	115.63	145.5
Debt associated with GFA as per Tariff Order	1,182.59	2,117.21
Weighted average rate of interest % on all loans	10.19%	9.28%
Total interest on project loans	120.56	196.39
Finance charge	2.77	3.05
Total Interest on Project loans & Finance Charge	123.33	199.43

West Discom

3.147 The West Discom has filed the following details for working the interest on capital loans:

Table 63: Interest cost as per Regulation (Rs. Crore)

Particulars	West Discom	
	FY 2012-13	FY 2013-14
Opening balance of GFA identified as funded through debt	846.12	1,424.05
Addition to GFA during the year	977.33	1,423.23
Consumer contribution during the year/ Asset Constructed Under RGGVY During the year	55.45	86.96
Net addition to GFA during the year	921.88	1,336.27
30% of addition to net GFA considered as funded through equity	276.56	400.88
Balance addition to net GFA during the year funded through debt	645.31	935.39
Debt Repayment due during the year (equal to the depreciation claim)	67.38	197.95
Closing balance of GFA identified as funded through debt	1,424.05	2,161.50
Average of loan balances	1,135.08	1,792.77

Weighted average rate of interest % on all loans	0.11	0.1
Total Interest on project loans	124.98	184.78
Finance Charges	15.08	16.29
Total Interest on Project loans & Finance Charge	140.06	201.06

Central Discom

3.148 The Central Discom has filed the following details for working the interest on capital loans:

Table 64: Interest cost as per Regulation (Rs. Crore)

Particulars	Central Discom	
	FY 2012-13	FY 2013-14
Addition to GFA during the year	1,225.39	684.85
Consumer contribution during the year	0	0
Net addition to GFA during the year	1,225.39	684.85
30% of addition to net GFA considered as funded through equity	367.62	205.46
Balance addition to net GFA during the year funded through debt	857.77	479.4
Debt Repayment due during the year (equal to the depreciation claim)	134.27	215.68
Debt associated with GFA as per Tariff Order	1,125.07	1,618.67
Weighted average rate of interest % on all loans	10.48%	9.15%
Total Interest on project loans	156.67	155.98
Finance Charges	16.99	18.34
Total Interest on Project loans & Finance Charge	173.66	174.31

Additional Submission

3.149 Central Discom in its additional submission has submitted as under:

- MPSEB Generic Loan transferred through the provisional balance sheet as on May 31, 2005 has now been bifurcated into their respective heads and re-casted into separate accounts.
- The interest and repayment of loans is based on the respective repayment schedule of the loans and the interest
- The additions of the new loans are considered in tandem with the investment plan to reflect the actual cash inflows funding the projects.

- d) The impact of Financial Restructuring Plan (FRP) has been considered in the Government Loans (inherited). Therefore, no interest and principal repayment has been considered from FY 2013-14.

Table 65: Interest cost as per additional submission (Rs. Crore)

	Particulars	FY 2013-14
I	Interest charges on State Govt. Loans, Bonds and Advances	
	Interest Charges on loans from the State Government	0
	Interest charges on loans Bonds	0
	Interest charges on Foreign Currency Loans/Credits	0
	Interest charges on Debentures	0
	Total of Interest	0.00
II	Interest on Long Term loans / Credit from the FIs/Banks/Organisation approved by the State Govt.	
1	Secured	
a	PFC (including PFC STL)	8.88
b	REC	10.49
c	JBIC	3.75
d	ADB-II	8.22
e	RAPDRP A	4.21
f	RAPDRP B	11.25
	RAPDRP B (REC)	5.52
g	HUDCO	5.92
	ADB CP from REC	1.42
h	SSTD/TSP/SCSP	5.75
i	Feeder separation	
2	Unsecured	0
	Market Loan Bond	5.48
	ADB	0
	NABARD	0
	PMGY	0
	MNP	0
	APDRP	5.09
	SSTD/TSP/SCSP	
	Total of II	75.98
A	Total of I + II	75.98
B	Cost of raising finance & Bank Charges on project Loans	23.55
C	Grand Total of Interest & Finance Charges: A+B	99.54
D	Less: Interest & Finance Charges Chargeable to Capital Accounts	24.88
E	Net Total of Interest & Finance Charges on Project Loans	74.65

F	Interest and Finance Charges on Working Capital Loans	63.1
G	Interest on Consumer Security Deposit	95.8
H	Interest at weighted average rate of loan portfolio on excess additional equity, if any	
	Total interest and finance charges chargeable to revenue account (E+F+G+H)	233.56

Commission's Analysis of Interest and Finance Charges

- 3.150 MPERC (Terms and Conditions for Determination of Tariff for Supply and Wheeling of Electricity and methods and Principles for Fixation of Charges) Regulations, 2012 allows interest charges only for those loans to be pass through in the ARR for which the associated capital works have been completed and assets have been put to use.
- 3.151 The latest Audited Statements of Accounts provided to the Commission by the petitioners pertaining to FY 2011-12 have been considered for computing the asset capitalisation. For all on-going works, the interest cost related to the loan funding of such works is considered as Interest during Construction (IDC) which shall be capitalised and added to the project cost at the time of asset capitalisation. Therefore, such interest cost has not been considered as pass through in the ARR. The underlying principle for considering the capitalisation instead of capital expenditure incurred during the year is that the consumer can only be made to bear the interest cost related to those assets, which the consumer is making use of. The asset which is under construction is not used by the consumers; hence interest cost incurred by the Discoms during construction becomes a part of CWIP and has not been allowed to be recovered through tariff.
- 3.152 The Commission is aware that the Discoms may have completed some capital works during the course of FY 2012-13 and shall complete some more work during FY 2013-14, which shall be capitalised and added to the asset base. However, as explained in the section on capitalization under Network Cost chapter, the Discoms past performance with respect to actual capitalisation of assets is far less than the projected claims of asset addition that they have made. The Commission thus finds it appropriate not to consider the estimated capitalisation that is projected for FY 2013-14 and to consider the interest expenses attributable to such asset only when such assets are actually added to the asset base. This shall also serve as an incentive for the Discoms to expedite the completion of works and improve their accounting practices to ensure quick and efficient transfer of asset from CWIP to GFA.
- 3.153 The Commission, therefore, for FY 2013-14 has decided to follow the approach as adopted in its Retail Supply Tariff Order for FY 2012-13 to work out the interest cost chargeable to revenue account. This has been done in the following manner:
- a) Net asset addition to GFA during FY 2011-12 is arrived by subtracting the consumer contribution received during the respective year from total asset addition

to GFA during the respective year as available from Audited Statement of Accounts.

- b) 30% of the net asset addition to GFA during FY 2011-12 has been considered as funded through the equity, balance of net asset addition to GFA is considered as having been funded through debt and added to the total debt in GFA
- c) Debt repayments have then been subtracted from the total debt identified with completed assets as computed from the above. The repayment for FY 2012-13 and FY 2013-14 shall be deemed to be equal to the depreciation allowed for that year.
- d) Asset addition net of consumer contribution during FY 2012-13 is arrived at as average of asset additions of during FY 2011-12 from Audited Statement of Accounts. It is assumed that, asset additions during the year have been financed 70% through loan and 30% through equity. For allowing the Interest and Finance Charges on the project loans, the Commission has considered the weighted average rate of interest as filed by Discoms for FY 2013-14 viz. 9.28%, 10.00% and 9.15% for East, West and Central Discom respectively.

3.154 Total interest and finance charges admitted for FY 2013-14 are as under:

Table 66: Total Interest and Finance Charges admitted for FY 2013-14 (Rs. Crore)

Particular	East	West	Central
FY 2010-11			
Debt identified with GFA as on 1st April, 2010	338.38	138.15	400.50
70% of addition to net GFA considered as funded through Loan net of Consumer Contribution	261.77	439.93	115.01
Debt repayment	49.48	73.30	54.66
Total debt associated with GFA as on 31st March, 2011	550.67	504.78	460.85
FY 2011-12			
Debt identified with GFA as on 1st April, 2011	550.67	504.78	460.85
70% of addition to net GFA considered as funded through Loan net of Consumer Contribution	390.92	283.68	462.98
Debt repayment	46.96	67.38	53.51
Total debt associated with GFA as on 31st March, 2012	894.63	721.08	870.33
FY 2012-13			
Debt identified with GFA as on 1st April, 2012	894.63	721.08	870.33
70% of addition to net GFA considered as funded through Loan net of Consumer Contribution	390.92	283.68	462.98
Debt repayment	51.04	74.61	62.67
Debt identified with GFA as on 31st March, 2013	1234.51	930.15	1270.64
FY 2013-14 Interest Cost			
Debt identified with GFA as on 1st April, 2013	1234.51	930.15	1270.64

70% of addition to net GFA considered as funded through Loan net of Consumer Contribution	390.92	283.68	462.98
Debt repayment	65.16	91.41	83.80
Total debt associated with GFA as on 31st March, 2013	1560.28	1122.43	1649.82
Average of loan Balance for FY 2012-13	1397.39	1026.29	1460.23
Weighted average rate of interest (%) (as per Interest on Project Loans)	9.28%	10.00%	9.15%
Interest charges	129.68	102.63	133.61
Other Charges (Balance Sheet FY 2011-12)	0.00	0.00	0.00
Interest and Finance charges on Project Loans	129.68	102.63	133.61

Interest on Working Capital

Petitioners submission

3.155 The petitioners have stated that the working capital requirement has been estimated based on the norms as per the Regulations. Interest rate of 13.50% by the East and Central Discoms and 14.00% by the West Discom has been considered for the calculation of the Interest on the working capital.

3.156 Central Discom in its additional submission considered the interest rate of 14.50% for estimating the Interest on Working Capital for wheeling activity. Central Discom further submitted that the interest rate for estimating the Interest on Working Capital is presently the lowest PLR rate among the top five Indian banks as per the Monthly Economic Report for April 2011 issued by the Ministry of Finance. Whereas for retail sale of activity interest rate of 13.50% is considered. The claims filed by the Discoms are given below:

Table 67: Interest on Working Capital as filed for FY 2013-14

Sr. No.	Particulars	East Discom	West Discom	Central Discom
		As per Norms	As per Norms	As per Norms
For Wheeling Activity				
1	1/6th of annual requirement of inventory for previous year	22.82	5.59	55.05
2	O&M expenses			
2.1	R&M expenses	93.46	96.38	85.67
2.2	A&G expense	113.26	98.40	106.74
2.3	Employee expenses	828.83	849.82	774.63
2.4	Total of O&M expenses	1035.55	1044.60	967.03

2.5	1/12th of total	86.30	87.05	80.59
3	Receivables	0.00	0.00	0.00
3.2	Annual Revenue from wheeling charges	0.00	6.82	0.00
3.3	Receivables equivalent to 2 months average billing of wheeling charges	0.00	1.14	0.00
4	Total Working capital (1+2.5+3.3)	109.12	93.77	135.63
5	Rate of Interest	13.50%	13.50%	13.50%
6	Interest on Working capital	14.73	12.66	18.31
	For Retail Sale activity			
1	1/6th of annual requirement of inventory for previous year	0.00	1.40	0.00
2	Receivables	0.00	0.00	0.00
2.1	Annual Revenue from Tariff and charges	5841.09	8074.43	6155.38
2.2	Receivables equivalent to 2 months average billing	973.51	1345.74	1025.89
3	Power Purchase expenses	5445.70	6663.46	5965.13
3.1	1/12th of power purchase expenses	453.81	555.29	497.09
4	Consumer Security Deposit	734.87	772.55	1020.89
5	Total Working capital (1+2.2-3.1-4)	-215.17	19.29	-486.71
6	Rate of Interest	13.50%	13.50%	14.00%
7	Interest on Working capital	-29.05	2.60	-65.71
	Total Interest on Working Capital from Wheeling Activity	14.73	12.66	18.31
	Total Interest on Working Capital from Retails Activities	-29.05	2.60	-65.71
	Net Interest on Working Capital	-14.32	15.26	-53.30

Commission's Analysis of Interest on Working Capital

- 3.157 MPERC (Terms and Conditions for Determination of Tariff for Supply and Wheeling of Electricity and methods and Principles for Fixation of Charges) Regulations, 2012 specifies that the total Working Capital shall consist of expenses towards working capital required for the supply activity and for the wheeling activity. The parameters that shall be considered for computation of working capital for wheeling and supply activity have also been specified separately. Further, as per the aforementioned Tariff Regulations, the rate of interest on working capital shall be equal to the State Bank Base Rate as on 1st of April of the relevant year plus 3.50%.
- 3.158 As per the Audited Statement of Accounts, Gross block at the end of FY 2011-12 was of Rs. 3173 Crore, Rs. 3213 Crore, and Rs. 3087 Crore for East, West and Central Discom respectively. One percent of this value pro-rated to two months would work out to Rs.

5.29 Crore, Rs. 5.36 Crore, and Rs. 5.15 Crore for East, West and Central Discom respectively. This has been considered as the inventory requirement for wheeling activity and retail activity. This has been further divided into wheeling and retail inventory in the ratio of 80:20 as adopted in last Tariff Order. The Consumer Security Deposit has been considered as discussed in the section on Interest on Consumer Security Deposit. The values of other elements of working capital have been recomputed for the amount allowed by the Commission in the relevant sections of this Order.

3.159 In its earlier Tariff Orders, the Commission has been allowing the Interest on Working Capital separately for wheeling and retail activity. However, during the true up exercise for the year 2006-07 and 2007-08 it had been observed that, the Discoms were not able to segregate the details for wheeling and retail activity. Moreover, as both activities are undertaken simultaneously by the Discom, hence the available resources are common for both. Therefore, the Commission has taken working capital requirement together for wheeling and retail activities.

3.160 The Regulations allow working capital interest to the Discoms at the rate equal to the State Bank of India (SBI) Base Rate as on 1st of April of that year plus 3.5%. The SBI Base Rate presently stands at 10%. Accordingly, the normative interest rate for working capital loans to Discoms would be limited to 13.50%. The interest on working capital admitted by the Commission for wheeling and retail sale activity combined together is given in the table below:

Table 68: Interest on Working Capital admitted by the Commission (Rs. Crore)

	Months	East	West	Central
Wheeling				
Inventory	2	4.23	4.28	4.12
Approved O&M	1	71.01	66.07	62.24
Total Working Capital Requirement (Rs. Crore.) – Wheeling		75.24	70.36	66.36
Interest Rate (%)		13.50%	13.50%	13.50%
Total Interest on Working Capital (Rs. Crore.)		10.16	9.50	8.96
Retail				
Inventory	2	1.06	1.07	1.03
Approved O&M	1	0.00	0.00	0.00
Revenue	2	973.51	1334.89	1025.14
Less: Power Purchase Cost	1	354.06	493.35	384.79
Less: Consumer Security Deposit		832.03	1271.82	935.56
Total Working Capital Requirement (Rs. Crore) – Retail		-211.52	-429.20	-294.18
Interest Rate (%)		13.50%	13.50%	13.50%
Total Interest on Working Capital (Rs. Crore)		-28.56	-57.94	-39.71

Total interest on Working Capital Requirement (Rs. Crore) – Wheeling		10.16	9.50	8.96
Total interest on Working Capital Requirement (Rs. Crore) – Retail		-28.56	-57.94	-39.71
Net Interest on Working Capital		-18.40	-48.44	-30.76
Total Interest on Working Capital admitted (Rs. Crore)		0.00	0.00	0.00

Interest on Consumer Security Deposit

Petitioners submissions

3.161 Discoms have submitted that Interest on consumer security deposit has been paid to the consumers according to relevant Regulations. East Discom has submitted that Bank rate of RBI as on April 1, 2012 i.e. 9.5% has been considered for computation. East and West Discom submitted that Interest on Consumer Security Deposit of RECs has not been considered as the same are under liquidation and their assets and liabilities are not yet transferred to the Licensee, and prayed to consider such interest in the year of transfer of Final assets and liabilities to the licensee.

3.162 In response to query raised regarding details of the actual interest paid on Consumer Security Deposit for FY 2012-13 up to December, 2012, West Discom submitted Rs. 13.34 Crore up to September, 2012, Central Discom submitted provisional figure of Rs. 19.25 Crore up to September, 2012, whereas East Discom has not the submitted the actual interest paid to on Consumer Security Deposit and submitted that details can be finalised only after finalization of Statement of Accounts. It is submitted that opening Consumer Security Deposit as on 1st April, 2011 stands at Rs. 490.84 Crore, Rs. 509.44 Crore, and Rs. 261.86 Crore for East, West, and Central Discom respectively. Further, closing Consumer Security Deposit as on 31st March, 2012 is Rs. 564.03 Crore, Rs. 597.14 Crore, and Rs. 178.73 Crore for East, West and Central Discom respectively.

Table 69: Interest on Consumer Security Deposit as per Regulations for FY 2013-14 (Rs. Crore)

Particulars	East Discom	West Discom	Central Discom
Interest on Consumer Security Deposit	60.69	69.23	91.88

Commission's Analysis of Consumer Security Deposit

3.163 From Audited Statement of Accounts, the Commission has observed that the total outgo of annual interest on the Consumer Security Deposit is not in tune with the quantum of

security deposits held and the interest costs allowed in past. Discoms have been paying less interest than allowed, which may be due to the reason that amount of security deposit as held is neither adjusted pursuant to permanent disconnection or default of payments nor is the interest paid in such cases. Therefore, the Commission has decided to admit the interest on Consumer Security Deposit based on the actual Consumer Security Deposit mentioned in the Audited Accounts submitted by the Discoms for FY 2011-12. The interest rate has been considered at 8.75% Bank rate as specified by the Reserve Bank of India with effect from January 29, 2013. Discom wise interest on consumer security deposit admitted by the Commission is mentioned in the Table below:

Table 70: Interest on Consumer Security Deposit (CSD) admitted for FY 2013-14 (Rs. Crore)

Particular	East	West	Central
Interest on Consumer Security Deposit	49.35	52.25	47.95

Return on Equity

Petitioners submissions

3.164 The petitioners have submitted that the Return on Equity (RoE) for the period has been calculated as per the Regulations. East Discom has submitted that as per Para 30.2 of the Tariff Regulations, it is entitled to RoE of 16% p.a. The petitioners in their submission also clarified that RoE of RECs has not been considered as RECs are under liquidation and their assets and liabilities are not transferred to the Discoms, and accordingly prayed to the Commission that RoE of RECs may be considered in the year of transfer of Final Assets and Liabilities to the Discoms. The claims made by the Discoms are shown in the following tables:

Table 71: Return on Equity (Rs. Crore)

Sr. No.	Particulars	East Discom		West Discom		Central Discom	
		FY 2012-13	FY 2013-14	FY 2012-13	FY 2013-14	FY 2012-13	FY 2013-14
A	Gross Fixed Assets at the beginning of year (net of consumer contributions)	3072.72	3935.65	1723.56	2578.06	2870.66	4312.55
A1	Opening balance of GFA identified as funded through equity	921.82	1180.70	877.44	1154.01	861.20	1293.76
A2	Opening balance of GFA identified as funded through debt	2150.90	2754.96	846.12	1424.05	2009.46	3018.78
B	Proposed capitalisation of assets as per the investment plan (net of consumer contribution)	862.93	1543.04	921.88	1336.27	1092.95	1435.17

B1	Proportion of capitalized assets funded out of equity, internal reserves	152.03	488.63	276.56	400.88	327.88	430.55
B2	Balance Proportion of capitalised assets funded out of project loans (B - B1)	710.91	1054.41	645.31	935.39	765.06	1004.62
C1	Normative additional equity (30% of B)	258.88	462.91	276.56	400.88	327.88	430.55
C2	Normative additional debt (70% of B)	604.05	1080.13	645.31	935.39	765.06	1004.62
D1	Excess / shortfall of additional equity over normative (B1-C1)	-106.85	25.72	0.00	0.00	0.00	0.00
D2	Excess / shortfall of additional debt over normative (B2-C2)	106.85	-25.72	0.00	0.00	0.00	0.00
E	Equity eligible for Return (A1+(C1/2)) or (A1+(B1/2)), whichever is lower	997.83	1412.15	1015.73	1354.45	1025.14	1509.04
	Return on Equity (16% on E)	159.65	225.94	162.52	216.71	164.02	241.45

3.165 Central Discom in its additional submission has submitted the revised RoE as per the Regulations. The Comparison of Return on Equity filed as per Regulation and as per additional submission filed by Central Discoms is as follows:

Table 72: Return on Equity as per additional submission (Rs. Crore)

Sr. No.	Particulars	Central Discom	
		As per Regulation	As per Additional Submission
A	Gross Fixed Assets at the beginning of year (net of consumer contributions)	4312.55	4312.55
A1	Opening balance of GFA identified as funded through equity	1293.76	1293.76
A2	Opening balance of GFA identified as funded through debt	3018.78	3018.78
B	Proposed Capitalisation of Assets as per the Investment Plan (Net of Consumer Contribution)	1435.17	1358.68
B1	Proportion of capitalized assets funded out of equity, Internal reserves	430.55	407.60
B2	Balance Proportion of capitalized assets funded out of project loans (B - B1)	1004.62	951.08
C1	Normative additional equity (30% of B)	430.55	407.60
C2	Normative additional debt (70% of B)	1004.62	951.08

D1	Excess / shortfall of additional equity over normative (B1-C1)	0.00	0.00
D2	Excess / shortfall of additional debt over normative (B2-C2)	0.00	0.00
E	Equity eligible for Return (A1+(C1/2)) OR (A1+(B1/2)), whichever is lower	1509.04	1497.57
	Return on Equity (16% on E)	241.45	239.61

Commission's Analysis of Return on Equity

3.166 MPERC (Terms and Conditions for Determination of Tariff for Supply and Wheeling of Electricity and methods and Principles for Fixation of Charges) Regulations, 2012 specified that RoE shall be computed on pre-tax basis @ 16%. The paragraphs under the Commission's analysis of Interest and Finance charges in this Order explain the approach for identification of debt and equity component related with completed assets. This approach results in the total equity identified with GFA as at the end of FY 2013-14. The return on equity is then determined by allowing the specified rate of 16% on the total equity identified which is allocated in proportion to GFA. The total equity identified along with RoE as admitted for FY 2013-14 is tabulated below.

Table 73: Return on Equity admitted for FY 2013-14 (Rs. Crore)

Particular	East	West	Central
FY 2010-11			
30% of addition to net GFA considered as funded through equity net of consumer contribution	112.19	188.54	49.29
Total Equity identified with GFA as on 31st March, 2011	632.17	743.07	592.35
FY 2011-12			
30% of addition to net GFA considered as funded through equity net of consumer contribution	167.54	121.58	198.42
Total Equity identified with GFA as on 31st March, 2012	799.70	864.64	790.77
FY 2012-13			
30% of addition to net GFA considered as funded through equity net of consumer contribution	167.54	121.58	198.42
Total Equity identified with GFA as on 31st March, 2013	967.24	986.22	989.19
FY 2013-14			
30% of addition to net GFA considered as funded through equity net of consumer contribution	83.77	60.79	99.21
Total Equity identified with GFA as on 31st March, 2014	1051.01	1047.01	1088.40
RoE @16% of FY 2013-14	168.16	167.52	174.14

Other items of ARR

- 3.167 Apart from the expense components discussed above, there are certain other items which form part of the ARR of the Discoms. These include provision for Bad Debts, and Other (Non-Tariff) Income. These are detailed below:

Bad and doubtful debts**Petitioners submission**

- 3.168 The petitioners have claimed provision for bad debts as 1% of the total sales revenue. The Central Discom in its additional submission estimated the Bad and Doubtful Debts at Rs. 61.55 Crore, same as per original filing.

Table 74: Bad and Doubtful Debts for FY 2013-14 as per Regulations (Rs Crore)

Particulars	East Discom	West Discom	Central Discom
Bad and Doubtful Debts	58.98	80.74	61.55

Commission's Analysis on Bad and Doubtful debts

- 3.169 In response to query, actual amount of Bad and Doubtful debts that have been written-off during FY 2011-12 are Rs.35.81 Crore, Rs. 29.61 Crore, and Rs. 49.01 Crore for East Discom, West Discom, and Central Discom respectively. Further, out of the above, amount of Delayed Payment Surcharge to be written off is Rs. 8.51 Crore, nil, and Rs. 39.69 Crore for East Discom, West Discom, and Central Discom respectively.
- 3.170 MPERC (Terms and Conditions for Determination of Tariff for Supply and Wheeling of Electricity and methods and Principles for Fixation of Charges) Regulations, 2012 specifies that Bad and Doubtful Debts in the ARR shall be allowed based on actually written off bad debts in the past as per the available latest audited financial statements to the extent Commission considers it appropriate and shall be trued up during the true up exercise for the relevant year subject to a maximum limit of 1% of the yearly revenue.
- 3.171 The Commission observed that the claim of Discoms for provision of bad and doubtful debts is very much on the higher side when compared with the meager amounts actually written off in the past. The Discoms also did not respond to the further queries raised by the Commission in respect of bad debts actually written off with full details. The Commission therefore provisionally admits the expenses against the bad and doubtful debts to the tune of Rs 1 Crore for each Discom subject to true up.

Other Income**Petitioners submission**

3.172 The petitioners have submitted that main components of Non-Tariff Income are meter rent, wheeling charges, supervision charges, sale of scrap and miscellaneous charges from consumers. Meter rent and Miscellaneous Charges have been projected as a percentage of tariff income. Discoms also clarified that Other Income of society area has not been considered due to annual Audit of some of the societies is pending and also a few societies are under liquidation.

3.173 The Table below indicates the filing of other income by Discoms

Table 75: Other Income (Rs Crore)

Particulars	East Discom	West Discom	Central Discom
Income from Investment, Fixed & Call Deposits	17.34	0	17.46
Interest on loans and Advances to staff	0	0	0.26
Interest on Advances to Suppliers / Contractors	0	0	0.41
Income/Fee/Collection against staff welfare activities	0.03	0.01	0
Miscellaneous receipts	39.06	0	21.39
Misc. charges from consumers	0	38.17	6.72
Deferred Income (Consumer Contribution)	12.01	0	0
Wheeling charges	0	6.82	0
Income from Trading other than Power (i.e. sale of scrape, tender form)	0	4.5	0
Supervision charges	0	15.55	0
Total	68.43	65.06	46.23

Commission's Analysis on Other Income

3.174 The Commission observed that the as per Audited Accounts for FY 2011-12, the other income including the receipts against meter rent, recovery from billing against cases of theft/ unauthorized use of energy, misc. receipts etc. have been to the tune of Rs. 139.51 Crore, 196.78 Crore and Rs 286.39 Crore for East, West and Central Discom respectively. The Commission has escalated the other income of FY 2011-12 with an escalation factor of 7.93% twice to arrive at the other income for FY 2013-14. The Other Income as admitted by the Commission is tabulated below:

Table 76: Other Income admitted for FY 2013-14 (Rs. Crore)

Particulars	East	West	Central
Other Income	162.51	229.23	333.61

Impact of True Up/Final Orders

3.175 Since the issuance of Retail Supply Tariff Order for FY 2012-13, the Commission has passed following different Tariff Orders in case of Generation Companies and Transmission Companies, which would result in an impact of Rs. 584.54 Crore on the ARR. These companies have been allowed to recover these costs from ARR of Discoms for FY 2013-14. Accordingly, the amount of Rs. 584.54 Crore is apportioned in the ratio of ARR admitted for each Discom to the total ARR for the State.

Table 77: Impact of true ups/ final orders on ARR for FY 2013-14 (Rs. Crore)

Sr. No.	Particulars	Impact
1	Impact of True-up of MPPTCL Transmission Tariff for FY 2010-11	563.95
2	Impact of True-up of MPPGCL Generation Tariff for FY 2009-10	-190.64
3	Impact of approval of Final Generation Tariff in Petition No. 59 of 2012	-2.94
4	Impact of approval of Final Generation Tariff for 500 MW Ext. U-5, for SGTPS, Birsinghpur	125.84
5	Impact of compliance of ATE Judgment in Appeal No. 121/2011 filed by MPPGCL against MPERC Order dated 24th January, 2011 in Petition No. 55 of 2009	33.76
6	Impact of approval of Final Generation Tariff for 210 MW Ext. U-5, for ATPS, Chachai	54.57
	Total	584.54

3.176 The ARR as admitted for FY 2013-14 is presented in following table:

Table 78: Total Aggregate Revenue Requirement as admitted (Rs Crore)

PARTICULARS	East	West	Central	Total
Power Purchase Cost including MPPMCL cost	3914.03	6467.14	4401.49	14782.66
PGCIL charges	205.05	262.53	218.42	686.00
Transco Charges (MP TRANSCO) including Terminal Benefits	496.03	563.11	540.71	1599.85
SLDC Charges	3.02	3.09	3.18	9.29
O&M cost	852.15	792.89	746.91	2391.95
Depreciation	65.16	91.41	83.80	240.37

Interest on Project Loans	129.68	102.63	133.61	365.92
Return on Equity	168.16	167.52	174.14	509.83
Interest on Working Capital	0.00	0.00	0.00	0.00
Bad and Doubtful Debts	1.00	1.00	1.00	3.00
Interest on Consumer Security Deposit	49.35	52.25	47.95	149.55
MPERC Fees	0.48	0.67	0.51	1.66
Less: Other Income - Retail & Wheeling	-162.51	-229.23	-333.61	-725.35
ARR for FY 2013-14	5721.60	8275.01	6018.11	20014.72
Add: Impact on a/c of true up/final orders of Transco/ gen. Stations	177.44	215.88	191.22	584.54
Total ARR for FY 2013-14	5899.04	8490.89	6209.33	20599.26

Segregation of approved ARR between Wheeling and Retail Sale activities

- 3.177 The Regulations provide that the Discoms should file the Aggregate Revenue Requirement in three parts, viz. for power purchase activity, for wheeling (distribution) activity and for retail sale activity. The Regulations clearly list out the items of fixed costs (i.e. other than power purchase) that should be included in wheeling and retail sale activities. The purpose of segregating the total distribution expenses into wheeling and retail sale activities is to establish the wheeling charges that are to be recovered from open access customers.
- 3.178 Discoms have complied with the Commission's Regulations to the extent that they have filed the ARR segregated among expenses for power purchase, wheeling and retail sale activities. Discoms have only considered normative interest on working capital for retail activity, provision for bad debts and interest on consumer security deposits in retail sale activity. All other items have been considered entirely as part of wheeling activity.
- 3.179 For the purpose of this Tariff Order, therefore, the Commission allocates the fixed costs (i.e. other than power purchase) in the following manner:

Wheeling activity shall include:

- (a) O&M expenses
- (b) Depreciation
- (c) Interest on project loans
- (d) Interest on working capital loans – for normative working capital for wheeling activity
- (e) Return on Equity
- (f) Other miscellaneous expenses
- (g) Less: Other Income as attributed to wheeling activity

Retail sale activity shall include:

- (a) Interest on working capital loans – for normative working capital for retail sale activity
- (b) Interest on Consumer Security Deposits
- (c) Bad and Doubtful debts
- (d) Less: Other Income as attributed to retail sales activity

Aggregate Revenue Requirement (ARR) admitted by the Commission for FY 2013-14

3.180 On the basis of above, the ARR for FY 2013-14 for wheeling and retail sale activity for all the three Discoms is admitted as under:

Table 79: Total ARR (wheeling and retail) as admitted (Rs. Crore)

Particulars	East	West	Central	Total
Power Purchase Cost including MPPMCL cost	3914.03	6467.14	4401.49	14782.66
PGCIL charges	205.05	262.53	218.42	686.00
Transco Charges (MP TRANSCO) including Terminal Benefits	496.03	563.11	540.71	1599.85
SLDC Charges	3.02	3.09	3.18	9.29
(A) Sub Total- Power Purchase Cost	4618.13	7295.87	5163.80	17077.80
Wheeling Activity				
O&M cost	852.15	792.89	746.91	2391.95
Depreciation	65.16	91.41	83.80	240.37
Interest on Project Loans	129.68	102.63	133.61	365.92
Return on Equity	168.16	167.52	174.14	509.82
Interest on Working Capital – Wheeling	0.00	0.00	0.00	0.00
MPERC Fees	0.48	0.67	0.51	1.66
(B) Sub Total- Wheeling ARR for FY 2013-14 as approved	1215.63	1155.12	1138.97	3509.72
Retail Activity				
Bad and Doubtful Debts	1.00	1.00	1.00	3.00
Interest on Consumer Security Deposit	49.35	52.25	47.95	149.55
Less: Other Income - Retail & Wheeling	-162.51	-229.23	-333.61	-725.35
(C) Sub Total- Retail ARR for FY 2013-14 as approved	-112.16	-175.98	-284.66	-572.80
Total ARR for FY 2013-14	5721.60	8275.01	6018.11	20014.72

Revenue from revised tariffs

3.181 The consumer category wise revenue at approved revised FY 2013-14 tariff is presented in the table below:

Table 80: Revenue from revised tariffs in FY 2013-14 (Rs. Crore)

Particulars	East Discom		West Discom		Central Discom		Total for the State	
	Sales (MU)	Revenue (Rs. Cr)	Sales (MU)	Revenue (Rs. Cr)	Sales (MU)	Revenue (Rs. Cr)	Sales (MU)	Revenue (Rs. Cr)
LT								
LV-1: Domestic	5090	2212	5945	2935	4379	2077	15413	7224
LV-2: Non Domestic	638	417	824	566	822	549	2284	1531
LV-3: Public Water Works & Street Light	330	136	385	160	403	171	1118	467
LV-4: LT Industrial	320	184	578	345	346	199	1243	728
LV 5.1: Irrigation Pumps for Agriculture	2274	821	5832	2189	3784	1260	11889	4270
LV-5.2 : Agriculture related use	3	1	4	2	6	3	12	6
LT Sale (MU)	8654	3772	13568	6197	9739	4257	31960	14226
HT								
HV-1: Railway Traction	570	338	425	262	901	534	1896	1134
HV-2: Coal Mines	496	323	0	0	33	25	530	349
HV-3.1: Industrial	1795	1071	2855	1618	1833	1026	6483	3715
HV-3.2: Non-Industrial	250	166	405	260	334	218	989	645
HV-4: Seasonal	8	5	9	6	3	2	20	12
HV-5.1: Public Water Works, Irrigation	67	31	345	142	109	54	521	228
HV-5.2: Other than Agricultural	11	5	6	3	6	3	23	11
HV-6: Bulk Residential Users	397	188	7	4	185	89	589	281
HV-7: Bulk Supply to Exemptees	0	0	0	0	0	0	0	0
HT Sale (MU)	3594	2127	4052	2295	3405	1952	11050	6375
Total LT + HT Sale (MU)	12248	5899	17619	8491	13143	6209	43011	20599

Gap / surplus at revised tariffs:

3.182 The total ARR as approved by the Commission and the revenue from revised tariffs is indicated in the table below:

Table 81: Final ARR and revenue from revised tariffs (Rs Crore)

Particulars	East	West	Central	State
Total ARR for FY 2013-14 (A)	5721.60	8275.01	6018.11	20014.72
Add: impact (B)	177.44	215.88	191.22	584.54
Total ARR for FY 2013-14 (A+B=C)	5899.04	8490.89	6209.33	20599.26
Revenue at Current Tariffs (D)	5855.94	8420.11	6164.80	20440.85
Revenue Gap at Current Tariffs (C-D)	43.10	70.78	44.53	158.41
Revenue at Revised/New Tariffs (E)	5898.96	8490.96	6209.20	20599.12
Uncovered Gap/Surplus (E-C)	-0.08	0.07	-0.13	-0.14

A4: WHEELING CHARGES AND CROSS SUBSIDY SURCHARGE

Determination of “wheeling cost”

- 4.1 For the purpose of determining wheeling cost, the Commission allocates the fixed costs of distribution (i.e. other than power purchase) for wheeling activity in the following manner:

Wheeling activity shall include:

- (a) O&M expenses
 - (b) Depreciation
 - (c) Interest on project loans
 - (d) Interest on working capital loans – on normative working capital for wheeling activity
 - (e) Return on Equity
 - (f) Other miscellaneous expenses
 - (g) Less: Other Income as attributed to wheeling activity
- 4.2 On the basis of the approved ARR for FY 2013-14, the expenditure towards wheeling activity for all the Discoms is Rs. 3509.73 Crore.

Segregation of costs among voltage levels

- 4.3 The costs of distribution identified as attributable to wheeling activity may further be distributed among the two voltage levels of distribution i.e. 33 kV and below 33 kV. Though, the EHT consumers (i.e. at voltages above 33 kV) are consumers of the Distribution Licensees and they are not directly connected to the distribution system, certain costs such as cost related with metering, billing and collection are associated with EHT consumers. However, the Commission, at this juncture, is not inclined to get into those details, primarily on account of data unavailability.
- 4.4 The Distribution Licensees in the State of Madhya Pradesh presently do not maintain account of their costs on a voltage-wise basis. Similar is the case with other Government owned Distribution Licensees operating in most of the states in India.
- 4.5 It is observed that the present accounting practices followed by MP Discoms do not permit segregation of GFA among the voltage levels directly. The Commission, therefore, considers it appropriate to adopt the approach to use the transformation capacity in MVA at interfaces of 33/11 kV and 11/0.4 kV.
- 4.6 The data used for this exercise for the value of the asset base is as follows:

Table 82 : Identification of asset value

Voltage level of Lines	Cumulative length of lines (ckt-km)	Per unit cost (Rs. Lakh/ckt-km)	Total Cost of lines (Rs. Crore)
33 kV (on rail pole)	44672	12.54	5601.87
Below 33 kV			
(a) 11 kV (on rail pole)	312422	9.35	29211.46
(b) LT (on PCC pole)	404661	5.17	20920.97
Sub-Total			50132.43
Total			55734.30

Table 83 : Total Cost of transformer voltage level

Transformer Voltage Level	Cumulative Capacity (MVA)	Per unit cost (Rs. Lakh/MVA)	Total Cost (Rs. Crore)
33/11 kV Transformer	22531	38.26	8620.36
11/0.4 kV Transformer	30405	2.28 per 100 kVA	6932.34
Total			15552.70

4.7 For the above purpose, data for length of lines and transformation capacity expected to be added during FY 2013-14 are taken as supplied by the Licensees as part of their filing for FY 2013-14.

4.8 In order to identify the asset values at different voltage levels, it is necessary to “assign” the interface transformers to either voltage levels. For this exercise, the Commission considers it appropriate to include the distribution transformers (11/0.4 kV) to be part of the 11 kV network and the power transformers of 33/11 kV to be part of the 33 kV network. Based on this, the asset values at different voltage levels work out to:

Table 84 : Identification of value of network at each voltage level

Voltage Level	Cost of Lines (Rs. Crore)	Cost of Transformation (Rs. Crore)	Total Cost (Rs. Crore)
33 kV	5601.87	8620.36	14222.23
Below 33 kV	50132.43	6932.34	57064.77
Total	55734.30	15552.70	71287.00

- 4.9 The expenses of wheeling activity, identified as incurred for the above different voltage levels of distribution worked out using the asset value ratios as obtained from above, are as follows:

Table 85 : Identification of network expenses (wheeling cost) at different voltage level)

Voltage level	Assets value (Rs. Crore)	Assets value Ratio (%)	Total wheeling cost (Rs. Crore)	Wheeling Cost (Rs. Crore)
33 kV	14222.23	19.95	3509.73	700.21
Below 33 kV	57064.77	80.05		2809.52
Total	71287.00	100.00		3509.73

Sharing of Wheeling costs

- 4.10 The cost of wheeling identified as above for the abovementioned voltage levels is again required to be allocated to the users at the same voltage levels since the 33 kV network is used by the consumers at 33 kV and below 33 kV, while the below 33 kV(including those at 11 kV and LT)
- 4.11 This allocation of wheeling cost at different voltage level is done based on the usage of the network at different voltage level by consumers. The Commission has chosen to adopt “Units to be Sold” at different voltage levels as the measure of network usage to allocate the costs as detailed below:

Table 86 : Allocation of wheeling cost over distribution system users

	Particulars	Unit	Total
a	Wheeling Cost at 33 kV (a)	Rs. Crore	700.21
b	Sales at 33 kV	MU	5441.65
c	Total Sales {excluding sales at EHT}	MU	38035
d	Proportion of 33 kV sales to total sales		0.14
e	Wheeling cost of 33 kV allocated to 33 kV users only [(a)*(d)]	Rs. Crore	98.03

- 4.12 The wheeling cost allocated to 33 kV thus works out to Rs. 98.03 Crore. Based on this allocation, and considering the consumption at 33 kV, the wheeling charges in Rupees per unit are determined as follows :

Table 87 : Wheeling Charges

Voltage	Wheeling Cost allocated (Rs. Crore)	Sales (MU)	Wheeling charges (Rs./unit)
EHT	---	---	---
33 kV	98.03	5441.65	0.18

Applicability of wheeling charges under different scenarios

- 4.13 Various scenarios of location of Open Access generators and their consumers and the consequent applicability of transmission and wheeling charges shall be as below:
- Scenario 1: Generator is connected to Transmission network (EHT voltages), while the consumer is connected to the distribution network at 33 kV of Distribution Licensee: The scenario shall attract both transmission and wheeling charges since power required by the open access consumer will flow downstream from the transmission network through distribution network up to the consumer's connection.
 - Scenario 2: Generator is connected to distribution network at 33 kV of Distribution licensee, while the consumer is connected to the transmission network (132 kV or above): In this scenario, the consumer's requirement will be met by power flow over transmission network alone. The power generated by the open access generator will be locally consumed within the Discom and will not flow upstream to the open access consumer. Hence, such transactions shall attract only the transmission charges.
 - Scenario 3: Both Generator and consumer are connected to the transmission network (132 kV or above): Only transmission charges shall apply, since there is no usage of distribution network.
 - Scenario 4: Both generator and consumer are connected to the distribution system of any of the Distribution Licensee at 33 kV: The power generated by the open access generator will be consumed within the Discoms under the conditions of uniform retail tariff throughout the M.P. and hence it will contribute to meeting the demand of the open access consumer. Therefore, there is no additional usage of transmission network in this transaction. Hence, such transactions shall attract only the wheeling charges.
- 4.14 For encouraging open access, the Commission has determined the above applicability of charges. The formulations above also conform to the principle that power flows on the network by displacement method.

Determination of Cross-Subsidy Surcharge

- 4.15 The Tariff Policy prescribes the following formulae for determination of cross- subsidy surcharge for various categories of consumers.

“8.5 Cross-subsidy surcharge and additional surcharge for open access

8.5.1 ...

....

Surcharge formula:

$$S = T - [C (1+L/100) + D]$$

Where

S is the surcharge

T is the Tariff payable by the relevant category of consumers;

C is the Weighted average cost of power purchase of top 5% at the margin excluding liquid fuel based generation and renewable power

D is the Wheeling charge

L is the system Losses for the applicable voltage level, expressed as a percentage

....

8.5.5 Wheeling charges should be determined on the basis of same principles as laid down for intra-state transmission charges and in addition would include average loss compensation of the relevant voltage level.”

- 4.16 The Tariff Policy at clause 8.5.1 states that *“National Electricity Policy lays down that the amount of cross subsidy surcharge and the additional surcharge to be levied from the consumers who are permitted open access should not be so onerous that it eliminates the competition which is intended to be fostered in generation and supply of power directly to the consumers through open access.”*

The first proviso of the above clause states that *“.... a consumer would avail of open access only if the payment of all the charges leads to benefit to him....”*

The second proviso of the above clause states that *“..... Accordingly, the cost of supply to the consumer for this purpose may be computed as the aggregate of (a) The weighted average of power purchase cost (inclusive of fixed and variable charges) of top 5% power at the margin,”*. The last proviso to the above clause states that *“the cross subsidy surcharge should be brought down progressively and, as far as possible, at a linear rate to a maximum of 20% of its opening level by the year 2010-11.”*

- 4.17 As mentioned in the preceding para the cost of supply to the consumer for this purpose **may** be computed on the basis of the aggregate of top 5 % at the margin of the power purchase costs. Therefore, looking to the intent of the proviso and the present level of cross subsidy surcharge in mind, the Commission is of the considered opinion that only top 3% of power at the margin of power purchase cost shall, for the present, be considered for computation of the cost of supply to the consumer so that cross subsidy surcharge does not become onerous.

4.18 The cost of marginal power purchase of top 3% power works out as below :

Total Energy required in FY 2013-14 = 58084 MU

Table 88 : Cost of marginal power purchase of top 3% power i.e. 1743 MU

Stations	Units (MU)	Cost (Rs./unit)	Total cost (Rs. Crore)
RSEB (CHAMBAL,SATPURA)	408	4.19	171
IPP Torrent	195	4.13	81
Medium term Power purchase	742	4.11	305
BLA Power, Narsinghpur	69	3.81	26
DVC Durgapur Steel TPS- Unit-1	138	3.74	52
DVC Durgapur Steel TPS- Unit-2	119	3.74	45
SGTPS EXT	71	3.43	24
Total	1743		703

4.19 Therefore, the weighted average cost of power purchase of top 3% at the margin works out as Rs. 703 Crore/1743 MU = Rs. 4.04 per unit.

4.20 The Tariff Policy specifies that the Loss level (term 'L') should be worked out for each voltage level separately. For this purpose, the loss levels at each voltage level are assumed as below because of non-availability of required reliable data by the Distribution licensees:

Table 89 : Voltage-wise loss levels

Voltage Level	Loss level (L)
EHT (transmission system) including External losses	5.30%
33 kV (only 33 kV system)	5.15%

4.21 The cost of transmission shall be uniformly spread over all consumers at every voltage level, as the transmission network is utilized by all consumers. Therefore, similar to wheeling costs, the approved transmission charges for FY 2013-14 is worked out as under:-

Table 90 : Transmission Charges

Particulars	Rs. Crore
PGCIL Charges	685.56
MPPTCL Charges	1599.85
SLDC Charges	9.29
Total Charges	2294.70
Units to be handled by MPPTCL	58084
Transmission Charges per unit	39 paise

- 4.22 Finally, the last term in the Tariff Policy formula ‘T’, Average Tariff for each category is derived from the revenue working in done under the FY 2013-14 Tariff Order exercise.
- 4.23 As per the MPERC (Open Access) Regulations, 2005, the consumers with contract demand of 1 MW or above shall be allowed open access w.e.f. 1st October, 2007. These consumers are to be connected at 33 KV or above as per Madhya Pradesh Electricity Supply Code, as amended from time to time.
- 4.24 In accordance with the above, the total cost for various categories of HT consumers having contract demand of 1 MW or above at 132 kV/33 kV under various scenario are worked out as detailed in the table 91 (“scenario wise cost”). The Cross-Subsidy Surcharge shall be the difference of average tariff and the total cost for the particular category at particular voltage. The category wise average tariff as per Tariff Order for FY 2013-14 is given in the table 92 (“category wise average tariff”). For example, for Railway Traction at 132 kV the average tariff for FY 2013-14 as per tariff order works out to Rs. 5.98 per unit and total cost works out to Rs. 4.66 per unit. Therefore, Cross-Subsidy Surcharge shall be Rs. 5.98 – Rs. 4.66 = Rs. 1.32 per unit. However, in case (e.g. Public Water Works, Other than Irrigation, Bulk Residential Users, Bulk Supply to Exemtees etc.) where cross-subsidy surcharge, based on above methodology, works out as negative, the same shall be considered as zero for billing purposes.
- 4.25 The aforesaid wheeling charges and cross subsidy surcharges are not applicable to consumers availing open access from renewable sources of energy.

Table 91 : Scenario wise cost (Rs. per unit)

Scenario	Cost of Power at 3% Margin	Cost of Power grossed up for distribution losses (5.15%)	Cost of Power grossed up for transmission losses (5.30%)	Transmission charges	Wheeling charges	Total Cost [C(1+L/100)+D]
1	4.04	4.26	4.49	0.39	0.18	5.07
2	4.04		4.26	0.39		4.66
3	4.04		4.26	0.39		4.66
4	4.04	4.26	4.49	0.00	0.18	4.67

Table 92 : Category wise average tariff (Rs. per unit)

Category of HT/EHT consumers	Average Tariff 'T'
HV- 1 : Railway Traction	5.98
HV- 2 : Coal Mines	6.58
HV- 3.1 : Industrial	5.88
HV- 3.2 : Non-Industrial	6.48
HV-3.3: Shopping Malls	7.97
HV-3.4: Power Intensive Industries	4.98
HV-4 : Seasonal	6.27
HV- 5.1 : Public Water Works	4.27
HV- 5.2 : Other than Irrigation	4.67
HV- 6 :Bulk Residential Users	4.74

A5: FUEL COST ADJUSTMENT CHARGE

5.1 The petitioners during the tariff exercise for FY 2012-13 had proposed to levy the Fuel Cost Adjustment charges as an automatic pass through in tariff to account for the increase/decrease in fuel cost from time to time. The Commission after taking due cognizance of various facts, and as per the Regulation 9.1 of the MPERC (Terms and Conditions for Determination of Tariff for Supply and Wheeling of Electricity and Methods and Principles for Fixation of Charges) Regulations, 2009 had specified the formula for deriving Fuel Cost Adjustment (FCA), for recovery/adjustment of uncontrollable cost due to increase or decrease in the cost of fuel in case of coal, oil, and gas for generating plants, in its Retail Supply Tariff Order dated 31st March, 2012 for FY 2012-13. In addition to the FCA formula, the Retail Supply Tariff Order dated 31st March, 2012 for FY 2012-13, also specified the modalities/manner of computation, billing, collection, recovery, etc. of FCA charge.

Petitioners submission

5.2 The petitioners have submitted that the aforementioned FCA formula does not cover the recovery of incremental power purchase cost wherein power purchase has been made due to factors which were beyond their control, which include shortage in supply from the identified power supply sources in the tariff order requiring them to purchase power at a higher price from the power market or other sources to meet the demand.

5.3 It is submitted that quantum of power purchase may not be restricted on the basis of normative loss levels, as the petitioners have to meet the power demand of the consumers according to obligation to supply mandated under the Electricity Act, 2003. It is also submitted that in given operating conditions of the power system, the quantum of energy and the power demand are more or less uncontrollable variables. It is submitted that for the purpose of tariff determination, the average power purchase cost per unit based on the prudent cost may be considered. The petitioners have also submitted the interpretation that the cost based on the average power purchase cost per unit on the quantum of power based on normative loss should be passed on to the consumer and any cost in excess of that shall be borne by the petitioners. It is also averred that the methodology of passing on full fixed cost element of the power purchase cost to consumers as a legitimate cost shall maintain proper balance between the interests of consumers and the petitioners, since it is based in overall averaging method, and impact of all the factors over an annual cycle are covered and distributed equitably.

5.4 The petitioners have submitted that in view of the aforementioned facts and as per the Regulations, it will be more appropriate to design single formula for recovery of FCA charge simultaneously with incremental power purchase cost. The proposed formula by the Petitioners is produced as under:

$$F\& IPPCA \text{ for billing quarter (p/u)} = \frac{APPC \text{ (Rs. Crore)} \times 100}{\text{Normative Sale (MU)}}$$

Where,

APPC (Average Power Purchase Cost) = sum of (a) difference in per unit average cost actually billed by each power generation/sources and as allowed in the Tariff Order, multiplied by (b) units availed from each such generating station in the preceding quarter,

Preceding Quarter = the period of preceding three months excluding the period of two months immediately preceding to the billing quarter,

Billing Quarter = the period of three months for which F&IPPCA is to billed and shall be a period commencing on first day to last day of quarter for the quarter commencing from 1st April ending 30th June and so on.

Normative Sale = the sale grossed down from the total actual ex-bus drawal from all sources (generators + other sources) during preceding quarter by the normative PGCIL, transmission and distribution losses for the months of the preceding quarter provided in the Tariff Order.

Commission's analysis

- 5.5 The Commission has considered the submissions made by the petitioners. The relevant Regulations have provision for allowing incremental power purchase costs in addition to the levy of FCA. However the Commission at this juncture is of the opinion that only FCA be allowed to be recovered and any further additional burden on the consumers during the tariff period may not be warranted. Any additional costs on this account would be considered after due prudence check at the time of true up. Moreover, a substantial portion on account of increases in power purchase costs are taken care of levy of FCA. The Commission therefore decides to continue with levy of quarterly FCA charge only.
- 5.6 In view of Regulation 9 of the MPERC (Terms and Conditions for Determination of Tariff for Supply and Wheeling of Electricity and Methods and Principles for Fixation of Charges) Regulations, 2012, the Commission hereby decides to continue with the FCA formula along with its associated mechanism/modalities with minor modifications as detailed in following paragraphs.
- 5.7 FCA formula for deriving Fuel Cost Adjustment for recovery/adjustment of uncontrollable costs due to increase or decrease in the cost of fuel in case of coal, oil, and gas for generating plants.

$$\text{FCA for billing quarter (p/u)} = \frac{\text{IVC (Rs. Crore)} \times 1000}{\text{Normative Sale (MU)}}$$

Where,

IVC = sum of – (a) difference in per unit variable cost actually billed by each long term coal or gas based power generator and variable cost as allowed in the Tariff Order, multiplied by (b) units availed from each such generating station in

the preceding quarter. Variable costs of Hydel Generating Stations shall not be considered for the purpose of working out the increase in variable Cost of Power Purchase.

Preceding Quarter = the period of preceding three months excluding the period of two months immediately proceeding to the billing quarter,

Billing Quarter = the period of three months for which FCA is to billed and shall be a period commencing on first day to last day of quarter for the quarter commencing from 1st April ending 30th June and so on.

Normative Sale = the sale grossed down from the total actual ex-bus drawal from all sources (Generators + Other sources) during preceding quarter by the normative PGCIL, transmission and distribution losses for the months of the preceding quarter provided in the Tariff Order.

- 5.8 FCA shall have to be worked out on the basis of the normative parameters as per respective generation tariff orders issued by the appropriate Commissions. Further variation if any, shall need prior approval of the Commission.
- 5.9 FCA charge shall be in the form of paise per unit (kWh) rounded off to the nearest integer. For this purpose, fraction up to 0.5 shall be ignored and fraction higher than 0.5 shall be rounded off to the next higher integer. This charge shall be added to or deducted from, as the case may be, the energy charges as per the existing tariff for the energy billed to every consumer and shall be indicated separately in the electricity bills issued to the consumers and shall be treated as part of energy charge.
- 5.10 FCA charge shall be uniformly applicable to all categories of consumers of the Distribution Companies in the State.
- 5.11 MPPMCL has been authorized by the Distribution Companies to procure power on their behalf for retail supply to consumers. The responsibility of working out the rate of FCA every quarter shall rest with the MPPMCL.
- 5.12 MPPMCL shall workout change in variable cost of power purchase during the preceding quarter based on the bills received by them from the Long Term Coal and Gas based Generators. The information shall be prepared in the following manner for every month of the “preceding quarter” and summated thereafter for the quarter:

Table 93: Format for FCA charge

Month/ quarter	Name of generating station/ other source	Power Drawn ex-bus	Variable cost incurred based on actual variable charges		Variable cost as per rates provided in Tariff Order		Increase in variable cost of power purchase
		(MU)	Rate (paise/unit)	Cost (Rs. Cr)	Rate (paise/unit)	Cost (Rs. Cr)	[5-7] (Rs. Cr)
1	2	3	4	5	6	7	8
Total							

- 5.13 MPPMCL shall workout “normative sale”. For this purpose normative PGCIL, transmission and distribution loss (percentage /quantum) for the months of preceding quarter, as provided in the Tariff Orders, shall be subtracted from the total ex-bus power drawn during the preceding quarter to arrive at normative sale.
- 5.14 FCA charge shall be worked out by the MPPMCL based on the formula provided here above and details shall be submitted to the Commission for verification atleast 15 days before the commencement of the billing quarter. After approval of the Commission FCA charge shall be leviable for the following quarter.
- 5.15 The Distribution Companies of the State shall commence billing of FCA charge from the first day of the billing quarter.
- 5.16 The rate and amount of FCA charge shall be shown separately in the consumer bills.
- 5.17 Following illustration is given for the purpose of understanding:
- 5.18 If the “billing quarter” is say “July to Sept”, then the “preceding quarter” shall mean the period “Feb to April” and the period of May and June months is allowed to collect the data/ details and finalization of FCA charge.
- 5.19 The details of the normative Losses for PGCIL System and MPPTCL System and normative distribution losses as per the Tariff Orders of the Commission are indicated in the table below:

Table 94: Normative Losses - for PGCIL System, MPPTCL System and distribution losses

Sr. No.	Month/Year	PGCIL Losses*		MPPTCL Losses**	Distribution Losses***
		Region	%	%	%
1	November, 12	W.R.	3.61%	3.74%	23.82%
		E.R.	2.69%		
2	December, 12	W.R.	3.61%	3.74%	23.82%
		E.R.	2.69%		
3	January, 13	W.R.	3.61%	3.74%	23.82%
		E.R.	2.69%		
4	February, 13	W.R.	3.61%	3.74%	23.82%
		E.R.	2.69%		
5	March, 13	W.R.	3.61%	3.74%	23.82%
		E.R.	2.69%		
6	April, 13	W.R.	3.65%	3.16%	21.80%
		E.R.	2.50%		
7	May, 13	W.R.	3.65%	3.16%	21.80%
		E.R.	2.50%		
8	June, 13	W.R.	3.65%	3.16%	21.80%
		E.R.	2.50%		
9	July, 13	W.R.	3.65%	3.16%	21.80%
		E.R.	2.50%		
10	August, 13	W.R.	3.65%	3.16%	21.80%
		E.R.	2.50%		
11	September, 13	W.R.	3.65%	3.16%	21.80%
		E.R.	2.50%		
12	October, 13	W.R.	3.65%	3.16%	21.80%
		E.R.	2.50%		
13	November, 13	W.R.	3.65%	3.16%	21.80%
		E.R.	2.50%		
14	December, 13	W.R.	3.65%	3.16%	21.80%
		E.R.	2.50%		
15	January, 14	W.R.	3.65%	3.16%	21.80%
		E.R.	2.50%		
16	February, 14	W.R.	3.65%	3.16%	21.80%
		E.R.	2.50%		
17	March, 14	W.R.	3.65%	3.16%	21.80%
		E.R.	2.50%		

Note: * PGCIL Losses: % PGCIL loss is based on input separately from E.R. and W.R.

** Transmission Losses: % M.P. Transmission losses are based on input at State periphery.

*** Distribution Losses: % Distribution losses are based on input at Discoms periphery.

A6: PUBLIC OBJECTIONS AND COMMENTS ON LICENSEES' PETITIONS

- 6.1 After admission of the ARR and Tariff proposals for FY 2013-14 filed by the petitioners, salient features were published in the newspapers. The Commission had directed the petitioners to publish gist of their tariff applications and proposals to invite comments/objections/suggestions from various stakeholders in the news papers and the last date of submission was 28th February, 2013. The Commission has considered all the comments received up to the date of public hearings. Names of objectors who had filed the comments/ objections on Discoms ARRs /Tariff Proposals for FY 2013-14 are given in **Annexure-I**.
- 6.2 The Commission subsequently issued a public notice inviting all stake holders willing to present their suggestions/objections related to the ARR and Tariff proposals in person during the public hearings. Number of comments received on ARRs/Tariff proposals is shown in the table below :-

Table 95 : No. of objections received

Sr. No.	Name of Discom	Number of suggestions/ objections received on ARR & Tariff Proposal for FY2013-14
1	M.P. Poorv Kshetra Vidyut Vitaran Company Ltd., Jabalpur, (East Discom)	19
2	M.P. Paschim Kshetra Vidyut Vitaran Co. Ltd., Indore (West Discom)	51
3	M.P. Madhya Kshetra Vidyut Vitaran Company Ltd., Bhopal (Central Discom)	20
	Total	90

- 6.3 The Commission held public hearing as per following schedule:-

Table 96 : Public hearings held:

Sr. No.	Name of the Distribution Company	Date of hearing	Venue of hearing
1	East Discom, Jabalpur	2 nd March 2013	Tarang Auditorium, Shakti Bhavan, Rampur, Jabalpur
2	Central Discom, Bhopal	5 th March 2013	Auditorium, Academy of Administration, 1100 Quarters, Bhopal and
3	West Discom, Indore	8 th March 2013	Santosh Sabhagrah, Film Bhavan, Near Rani Sati Gate, Yashwant Niwas Road, Indore.

During the hearing, a majority of the respondents from all consumer categories have opposed tariff hike as proposed by the petitioners. Most of the respondents were of the view that major causes of poor performance of the three Discoms were high distribution losses including theft of electricity and lack of meterisation of un-metered connections in domestic and agriculture categories. A large number of respondents raised serious concerns on slackening progress of meterisation in case domestic households and agricultural connections in rural areas and were of the view that a definite and time bound plan for implementing 100% meterisation for all categories of consumers be enforced as lack of metering provides opportunity for manipulation and adjustment and encourages inefficiency. Some of the respondents from domestic category have raised their concern on increasing number of billing related complaints and informed that due to non-replacement of defective/faulty meters within the prescribed time period, bills on assessment basis are issued by Discoms. Most of the respondents from domestic category opposed the petitioners' proposal of levying reliability charges in view of proposed 24 hours supply to rural domestic feeders after completion of feeder separation project. In their tariff proposal the petitioners have proposed substantial change in general terms and conditions of LT and HT tariff category on issues such as load factor calculation /incentives, power factor incentives, ToD tariff rebate/surcharge, additional charge for excess demand, delayed payment surcharge, etc.. Industry representatives opposed the proposed changes.

- 6.4 As a part of the tariff exercise, a meeting of the State Advisory Committee (SAC) was convened on 27th February, 2013 at the Commission's office to obtain views of SAC members on the ARR/Tariff proposals of the petitioners. The suggestions made by the members of SAC were duly taken into consideration by the Commission while finalizing the Tariff Order.
- 6.5 While a number of suggestions/ objections and comments have been received and given due consideration by the Commission, only major responses/objections received related to ARR/tariff petition and also those raised during the course of public hearings have been grouped together according to the nature of the comments/objections and are summarized in this Chapter as given in the following paragraphs:

ISSUE NO. 1: Railway traction tariff

Issue raised by objectors

Indian Railways have represented that traction tariff should not be further hiked and existing traction tariff for the railway should be brought down to a reasonable level by declining the Discoms' proposal for increase in fixed and energy charges. The cost of supply applicable for the particular voltage category should be taken in to account.

Response from Discoms

The tariff proposed for Railways is very reasonable and is in line with the road-map for reducing cross-subsidy as approved by the Commission. The marginal hike in tariff proposed is barely sufficient to cover the inflation. Further, the petitioner would like to bring on record again that a tariff rebate of 10% for new projects up to a period of 5 years has been proposed in the instant petition, which is definitely a very attractive proposition.

Commission's views

The Commission has given due consideration to the issues raised by the objector and have determined the tariff keeping in view all relevant factors. The tariff for railway traction category has been kept unchanged for FY 2013-14.

ISSUE NO. 2: Voltage rebate on energy cost (at 132 kV/220 kV supply)

Issue raised by objectors

Representatives from Railways have requested the Commission to consider giving a rebate of 4% on 132 kV and 5% on 220kV on energy charges as supply is availed at 132/220 kV and also that voltage wise CoS be kept in mind while determining tariff for their connections. They have also suggested that cross subsidy levels be kept in accordance with the cross subsidy road map.

Response from Discoms

The Commission has already discussed and decided about this issue in the tariff order for FY 2009-10 at Issue No. 4.22(c) (Page 93) and tariff order for FY 2011-12 at Issue No. 3(b) (page 89). However, the licensee has made a provision for 10 % rebate for new traction points

Commission's views

The cost of supply being taken is average cost of supply across all voltage levels for tariff formulation. Further the Commission has been gradually reducing the cross subsidy to the extent possible while ensuring that tariff of subsidized categories does not get distorted resulting in sudden tariff shocks and has consciously reduced cross subsidy for railway traction over the years.

ISSUE NO. 3: Tariff hike in Bulk residential users (HV-6) and Non Domestic (LV-2.2) tariff category

Issue raised by objectors

Indian Railway has opposed the Discoms' proposal on tariff hike in Bulk residential users (HV- 6) , Non industrial (HV- 3) and Non domestic(LV-2.2) tariff category stating that it is a direct burden to passengers amenities items such as station lighting , station water supply etc.

Response from Discoms

The tariff proposed is in line with the road-map for reducing cross-subsidy as approved by the Commission. The marginal hike is barely sufficient to cover the cost of inflation.

Commission's views

The Commission has given due consideration to the issue and the tariff for Bulk residential users (HV-6), and Non domestic (LV-2.2) tariff category has been determined considering relevant factors and also keeping in mind the relevant provisions of the Tariff Policy.

ISSUE NO. 4: Tariff hike for Power Intensive Industries

Issue raised by objectors

M/s All India Induction Furnace Association have opposed the proposed tariff hike for power intensive industries stating that no increase is tolerable by MSP/Rolling mills consumers' in 33kV and 132 kV category. Further, it is requested that proposed changes made by petitioner in general terms and conditions of HT tariff category in respect of load factor calculation/incentives, power factor incentives, ToD tariff rebate/surcharge, additional charge for excess demand, delay payment of surcharge etc. may not be accepted and instead rate of PF incentive etc. should be increased above 98% PF.

Response from Discoms

The petitioners fully appreciate the concerns of the objectors, who are bulk consumers. However, the petitioners' commercial interests are also at stake. The proposed increase in tariff is reasonable and designed to cover the incremental expenditure. It is quite pertinent to highlight, that, the power intensive industries like steel rolling mills, induction furnace, Ferro-alloys have the substantial benefit of various incentives to reduce the average cost of power, which at times can even go below the average cost of supply. The Commission is requested, that, the incentive structure is designed in such a way, that, the effective average tariff should not fall below the average cost of supply under any circumstances. The Electricity Act 2003(As amended)-Section 61(d), also echoes the fact that the Tariff Structure should always consider average cost of supply.

Commission's views

The Commission while determining the tariff for HV 3.4 has kept relevant factors of Tariff Policy in mind and has determined the tariff accordingly. The suggestion made by the objectors about the proposed changes in terms and conditions of the tariff have also been appropriately considered.

ISSUE NO. 5: Delayed payment surcharge should be considered as revenue earned in ARR

Issue raised by objectors

Some of the respondents raised the issue that the delayed payment surcharge is a part of the revenue earned and should be accounted for in the ARR as income. Some of the respondents have opposed the proposed increased in delay payment surcharge from existing rate of 1% to 1.25%.

Response from Discoms

It is submitted that the receipts from late payment surcharge are uncertain and hence such receipts cannot be predicted. Moreover, the late payment means that the Licensee has been deprived of its own revenue and consequently forced to take loans from Financing Agencies by paying huge interest. The delayed payment surcharge being the compensation against the interest on loans, it should not be treated as a part of revenue.

Commission's views

The Commission continues to maintain its stand for reasons provided in its Regulations for not treating the receipts against the delayed payment surcharge as income and simultaneously not allowing additional interest on working capital on account of default in payment by the licensees. Further the Commission has not considered any increase in the rate of charging the delayed payment surcharge.

ISSUE NO. 6: Reduction of billing demand to extent of 75% of contract demand

Issue raised by objectors

Representatives from industries/industrial associations' suggested that the minimum billing demand should be made 75% of the contract demand against prevailing provision of 90% of the contract demand. The proposal of Discoms that billing demand should be rounded off to next higher integer number has been opposed.

Response from Discoms

The petitioners feel, that a flexibility of 10% in contract demand is quite justified and reasonable. The petitioners recover only a small fraction of the fixed costs through the demand charges. Hence, minimum billing demand as 90% of contract demand is rational. It is felt that the impact of rounding-off of demand to the next higher integer will certainly be meagre. Hence, the petitioners feel that the existing provision is in order because the licensee's ultimate concern is overall revenue neutrality.

Commission's views

The Commission is of the view that these issues were raised during previous tariff determination exercises also and that any change in present provisions is not warranted.

ISSUE NO. 7: Fuel Cost Adjustment should fall under head of 'Fuel Surcharge'

Issue raised by objectors

Representatives from industries / industrial associations have suggested that recovery of fuel cost adjustment should be reflected in energy bills under head of 'Fuel surcharge' and should not be treated as part of energy charges to avoid burden of paying electricity duty.

Commission's views

The FCA charge is levied on account of increase in fuel costs and is therefore very much a part of energy charge as clearly specified in the chapter on FCA. Therefore, its treatment cannot be delinked from the energy charge. The Commission therefore has not accepted the suggestion.

ISSUE NO. 8: Abolition of TOD incentive for off peak period and increase in peak load surcharge

Issue raised by objectors

Representatives from various organisations have objected that in the proposed tariff, off peak load period (10 pm to 6 am next day) incentive of 7.5% has been proposed to be abolished. Similarly for peak load period 6 pm to 10 pm, 30% surcharge of normal rate has been proposed. It is suggested that ToD incentive for off peak period and surcharge for peak load period be kept at present level of 7.5% and 15% respectively. Some of the respondents were of the view that it will be prudent if the off peak rebate is further increased to the level of peak load surcharge to avail cheap power by industries during off peak hours.

Response from Discoms

One of the biggest challenges faced by the Discoms is to flatten the evening and late night peak loads. Therefore, 15% surcharge for the evening peak use was provided in the last tariff order. However, as a complementary action, which is not desirable at this moment, a rebate of 7.5% was provided for consumers drawing power in the off-peak hours, i.e. 10 pm to 6 am. Further, the peak night demand takes place between 1 am to 4 am, especially during the Rabi season. Hence it is obvious that major load cannot be shifted to night hours. The Discoms will face major problems in maintaining the load curve in the night hours. It is, therefore requested to commission to approve the proposed tariff on Time of day surcharge.

Commission's views

The Commission has fixed Time of Day surcharge for four hours (*from 6 pm to 10 pm*) and rebate for eight hours (*from 10 pm to 6 am next day*). The Commission does not find any justification for any further changes in the rate of surcharge or rebate.

ISSUE NO. 9: Formation of regulatory assets

Issue raised by objectors

Representatives from various groups/ associations have raised the concerns that formation of regulatory assets as proposed by Discoms is an indication of financial mismanagement and proposal of Discoms should not be accepted.

Response from Discoms

The Commission has been requested to create Regulatory Assets basically to avoid tariff shock to the consumers. It would be welcomed if the Commission allows complete ARR through revision in the retail tariff.

Commission's views

The Commission has revised the tariff matching with the ARR/ revenue requirement which fully meets the allowable costs. Hence there is no need for regulatory assets.

ISSUE NO. 10: Increase in additional charges for excess demand

Issue raised by objectors

The representative from various industries and industrial associations have opposed the proposed increase in additional charges for excess demand on fixed and energy charges in LT and HT categories. It is further requested that additional charges may be taken on only fixed charges and no corresponding energy charges should be billed, as excess demand does not have any relation with consumption of unit.

Response from Discoms

The petitioners feel that the consumers should maintain discipline expected of them. Moreover, if the consumer does not exceed the C.D. frequently, then the additional burden on the consumers cannot be too significant. The Hon'ble Supreme Court of India in a recent Judgment dated 20th October, 2011 in Civil Appeal No. 8859/2011 held that "*Excess Load would fall under Section 126 of 2003 Act*"

Commission's views

The Commission has taken relevant factors into account while deciding additional charges on demand recorded in excess of contract demand and finds no justification for any change in existing provisions.

ISSUE NO. 11: Tariff hike in domestic category and reduction in slabs for Domestic category

Issue raised by objectors

Domestic consumers including representatives from various organisations have opposed the proposed tariff hike in domestic category. It is suggested that domestic tariff should not be more than the cost of supply as domestic category cannot be expected to cross subsidise other categories. Some objectors suggested that the number of slabs in domestic category should be reduced to two only i.e. 0-30 units and above 30 units with uniform charges applicable. This initiative will save cost of billing, manipulation in meter reading and related malpractices, if any. Further, rationale for determining fix charges are opposed by some of the domestic consumers

Response from Discoms

The licensee does not propose frequent changes in the slab structure.

Commission's views

The Commission has considered the suggestions made by the objectors. The Commission is of the view that frequent changes in consumption slabs of domestic categories is not desirable. The tariff has been determined for this category appropriately keeping in view all relevant factors.

ISSUE NO. 12: Removal of connected load ceiling in case demand based LT Industrial tariff

Issue raised by objectors

Representatives from Industrial Associations have suggested removal of ceiling on connected load for LV-4 tariff category as majority of consumers in LT Industries categories are provided with two part meters which record demand and energy. Having installed demand meter, the idea of applying connected load tariffs is irrational and unacceptable. Some of respondents have suggested that tariff slabs should be related to contract demand and not with connected load after installation of Wi-Fi enabled AMR meters in place.

Response from Discoms

Removal of ceiling of connected load is technically unacceptable because the distribution licensee's system will not be properly geared up to handle the loads if the actual demands of the consumers exceed their CDs by an appreciable amount. The licensee should be able to assess and put a restriction on the maximum possible load that could be incident on his system under any abnormal conditions or exigencies.

Commission's views

The Commission has reconsidered the matter with regard to request for removal of ceiling on the connected load in case of LT industrial consumers having contract demand based tariff. The Commission has considered the suggestions of the LT industrial consumers and has accordingly done away with the ceiling on connected load in LV-4 category. The rationale behind this is explained in the chapter on 'Retail Tariff Design'.

ISSUE NO. 13: Permitting use of 10% of domestic sanctioned load for non-domestic purpose

Issue raised by objectors

Some of the domestic consumers and representatives from Chamber of Commerce have requested that in respect of domestic category, 10% of the sanctioned load should be allowed to be used for non-domestic purpose. These measures shall be helpful in promoting self-employment and making livelihood possible especially for those women /housewives who cannot afford to go outside for employment

Response from Discoms

The provision referred by respondent was in vogue till FY 2008-09. The same however was withdrawn by the Commission after receiving complaints of misuse of the above provision.

Commission's views

The Commission agrees with the view expressed by the licensees. Further the purpose of use is taken into consideration for a particular consumer category and it would not be appropriate to allow non-domestic use of a domestic connection.

ISSUE NO. 14: Change in definition of rural area

Issue raised by objectors

Representatives from various industrial organizations and industries have opposed the Discoms' proposal regarding change in respect of definition of 'Rural area' in general terms and conditions of Low tension tariff and requested that definition of rural area may be continued as per retail supply tariff order FY 2012-13 at clause 1 of general terms and conditions for L.T. Consumer and in accordance with GoMP Notification No. 2010/F13/0513/2006 dated 25th March, 2006.

Response from Discoms

The definition of rural area as given in previous tariff orders creates practical problems as experienced by the Licensee and therefore a different definition has been proposed in the petition.

Commission's views

The Commission remains of the view that no change is required in light of the provisions of section 14 of Electricity Act, 2003. This issue has already been dealt with in the previous tariff Orders.

ISSUE NO.15: Rebate in Cold storage tariff

Issue raised by objectors

The representatives from cold storage associations have requested that the cold storage to be considered in the agriculture category and tariff rate meant for agriculture should be made applicable in HT and LT category.

Response from Discoms

It may be mentioned that cold storages are being operated on commercial basis as they are charging the cost of service provided by them to their customers; hence the category need not be changed.

Commission's views

The Commission agrees with the views expressed by the Discoms and has not accepted the suggestions of the objectors.

ISSUE NO. 16: Reduction in period for advance payment for temporary agriculture connections

Issue raised by Objectors

Respondents from farmers associations have requested that existing provisions for advance payment for temporary connections for a minimum of three months be reduced to one month.

Response from Discoms

The Commission vide its Tariff Order FY 2012-13 has provided that Consumers opting for temporary agricultural supply shall have to pay the charges in advance for three months including by those who request to avail connection for one month only subject to replenishment from time to time for extended period and adjustment as per final bill after disconnection.

Commission's views

After going through the due process, the Commission had decided that advance deposits equal to three months be taken for serving of temporary agricultural supply. However, in case the consumer wishes to discontinue supply in less than three months, the refund be arranged within prescribed time lines. No change in this provision at this juncture is considered necessary.

ISSUE NO. 17: Tariff hike in Agriculture Category

Issue raised by objectors

The agriculture consumers have raised the objections against tariff hike proposed by the licensees in respect of agriculture connections and requested for further reduction in existing tariff rate.

Response from Discoms

Discoms have submitted that in accordance with the provisions of Tariff Policy, the tariff for each consumer category should be as per cost of electricity for that particular category and that each consumer category shall bear as minimum 80% of the cost of average cost of electricity of that particular category. Further, the feasibility of effective metering in the agricultural sector is a serious constraint which is difficult to overcome. Meters are being provided on agricultural pre-dominated DTRs.

Commission's views

The Commission has kept in view the objector's suggestions and licensees' response as well as the provisions of Tariff Policy while finalising agricultural tariff.

ISSUE NO. 18: Tariff for Telecom service Providers

Issue raised by objectors

Representatives from Telecom service providers have opposed the tariff hike proposed by petitioners in non-domestic tariff category (LV-2) and requested to continue rebate in energy charges for connection of Telecom infrastructure situated in rural areas as provided in retail supply tariff order FY 2012-13. It is requested that telecom services should be considered under essential infrastructure category and a separate tariff category should be created for the same.

Response from Discoms

There is no such category as infrastructure service provider in the tariff structure. However, any establishment including infrastructure service provider who is required to pay service tax is covered under the Non-domestic tariff.

Commission's views

The Commission does not agree with objector's suggestion of transferring telecom service providers to industrial category or creating a new category for them. However, to give impetus to expansion of telecom infrastructure in rural areas suitable rebate in energy charges for such consumers situated in rural area has been provided since 2011-12 is being continued this year also.

ISSUE NO. 19: Abolition of provision of minimum consumption charges

Issue raised by objectors

Representatives from various industry organizations suggested that no tariff minimum unit charges in case of HT and LT categories should be taken as Discoms are already recovering energy charges more than tariff minimum units.

Response from Discoms

The request for abolition of tariff minimum consumption/charges as objected by the objectors may not be accepted as it is main body of the tariff structure because it is related to the contract/agreement made by the consumer with the Company to provide power supply for a contracted demand/load for which the Company is also committed and bound to extend electric supply for the contracted demand and has to create infrastructure as well as make provisions for the load. Hence, the provisions of minimum charges needs to be continued in the tariff and it should be allowed as proposed by the Company.

Commission's views

The Commission is of the view that normally tariff minimum should not be recovered from consumers if the fixed cost is fully recovered through fixed charges. However, if fixed charges are at low level there is no alternative left but to levy minimum charges for some of the categories of consumers so as to keep revenue balance. If the fixed costs of the licensees are fully recovered by levying commensurate fixed charges, it may lead to tariff distortion which may not be desirable for the consumers. It has also to be mentioned here that if the consumption is above the threshold limit of minimum charges then actual consumption charges are recovered.

ISSUE NO. 20: Separate tariff category for Agro based industries

Issue raised by objectors

There should be a separate tariff under LT and HT tariff for agro based industries such as Ginning, pressing, oil mill, rice mill, khandsari mill, sugar mill, besan mill, maida mill and flour mill etc. In this category, no fixed charges should be billed.

Response from Discoms

The tariff for various categories is fixed by the MPERC considering various factors and in line with the provisions of the Tariff Policy. The tariff structure for seasonal consumers was fixed by the MPERC after considering the views of public and the nature of consumption of such industries.

Commission's views

The Commission has considered the objectors' suggestions and licensees' views while finalising tariff and no changes in the existing provisions have been considered. The Commission does not favour increase in the number of categories any further.

ISSUE NO. 21: Power factor incentive for HV industries

Issue raised by objectors

Representatives from industries/industrial associations have suggested that proposed reduction in power factor incentives in HT tariff category in PF slab between 98% to 99% from existing 5% to 4.5% and PF slab above 99% from existing 7% to 6% may not be accepted but the incentives for PF above 98% may be increased. Further, power factor incentive for HV category should be provided above 0.90 in place of existing 0.95.

Response from Discoms

The views expressed by the objector are not acceptable as it will impact the stability of Power System. A H.T consumer consumes a bulk power from the system. Thus, he should draw the power from the system at power factor of 90%. Failing to attain so it attracts a penalty based on status of low power factor. Further, as per the Grid code, Discom has to maintain the power factor at the level of 95%. Therefore, penalty levied on consumers for fall in the power factor below 95% is justified.

Commission's views

The levy of power factor penalty or providing power factor incentive has been evolved after due consideration over a period of time. No further change in existing provisions in this regard is considered appropriate by the Commission.

ISSUE NO. 22: Temporary supply should not be charged higher than 1.1 times the normal charges

Issue raised by objectors

Representatives from industrial associations have opposed the proposal of Discoms that fixed charges and energy charges for temporary supply shall be billed at 1.5 times the normal charges as applicable to relevant category in place of existing 1.3 times in LV and HV category. It is suggested that temporary charges in all categories shall not be levied higher than 1.1 times the normal charge. It is further suggested that in case of LT temporary supply, sanctioned load/connected load may be increased from existing 100HP to 150 HP.

Response from Discoms

Temporary consumers do not provide a permanent revenue stream to the licensee and the power for temporary connections has to be procured sometimes from power exchanges, when there is no availability from long term power purchase agreements, cost of which is substantially higher. Therefore, the proposed rate of 1.5 times of the normal charge is quite reasonable. A rate of 1.3 times appears to be inadequate compensation for the facility of temporary supply which is normally extended almost immediately.

Commission's views

The Commission has provided billing of temporary connection at 1.3 times the rate applicable for permanent connections considering all relevant factors.

ISSUE NO. 23: Validation of data through independent experts

Issue raised by objectors

The representative from industrial associations has suggested that figures in the tariff proposals submitted by the Distribution companies need validation through a team of independent experts.

Response from Discoms

Discom stated that the matter had been considered by the Commission and the need for third party validation has not been endorsed. In this context, the objector may refer to the Commission's order in the petition no. 80/07 filed by the M.P. Electricity Consumer Society, Indore. Further, such validation of data shall be a time consuming exercise and may ultimately prove to be redundant, as sufficient opportunity for validation, recording objections/ suggestions and required transparency is already there in the procedure being followed at present.

Commission's views

The Commission agrees with the views expressed by the Discoms and would like make it clear here that the process outlined in the Electricity Act, 2003 has been followed for determination of tariff.

ISSUE NO. 24: Rationalization of tariff for EHV/HV category

Issues raised by objectors

The representatives from industries have opposed the discriminatory tariff increase proposal for EHT/HT category stating that EHT/HT consumers are still paying high cost compared to average cost of supply, although contributing minimum system losses. It is suggested that tariff structure should be rationalised in such a manner so that tariff should reflect the true cost of supply to a particular category of consumer.

Response from Discoms

As per the Tariff Policy, the overall average cost of supply is to be considered for determination of tariff and cross subsidy, rather than voltage level wise or category wise cost of supply.

Commission's views

The Commission has taken into account all factors including the provisions of cross subsidy road map while determining fixed charges and energy charges in the tariff. The Commission has made conscious effort to keep the cross subsidy levels near the road map to the extent possible and has been gradually reducing the cross subsidy burden over the previous years.

ISSUE NO. 25: Tariff hike is opposed for Shopping Mall category

Issue raised by objectors

Shopping malls should be treated as 'Bulk Users' and appropriate relaxation may be allowed in the applicable tariff similar to HV-6 and HV-7 tariff category applicable to bulk supplies to different users having mixed load.

Response from Discoms

The HV-3.3 tariff, applicable to the Shopping Malls, is already less than the low tension tariff applicable for the same category. Further, purpose of supply and end-use in case of consumers under the HV-6 and HV-7 categories is different from those under HV-3.3. Therefore, the contention of the objector is not justified.

Commission's views

The Commission has considered the objections/suggestions of the objectors and Discoms' views while determining tariff for shopping malls.

ISSUE NO. 26: Rebate for supply through rural feeder

Issue raised by objectors

Representatives from industrial associations have suggested that rebate of 15% should be given on tariff rate of demand and energy charges. It is further suggested that rural feeder should be those feeder which are to be declared rural feeder (33 kV and 11 kV) from EHV substation (132 kV and above only).

Response from Discoms

The Discoms have stated that request made by the objectors for providing rebate for supply through rural feeder is not acceptable as the Commission has already taken all care in its retail supply tariff order for FY2012-13 for H.T consumer and thus, the provision is not required to be introduced for rebate of 15% on tariff rate of demand charges and energy charges.

Commission's views

The Commission has considered the matter and decided to continue with existing provisions of 10% rebate in fixed charges and 20% reduction in minimum consumption as specified in the HV-3 schedule.

ISSUE NO. 27: Change in tariff category for hostels run by Tribal Welfare Dept., GoMP

Issues raised by objectors

Representative from Tribal Welfare department has requested to provide domestic tariff in place of existing non domestic tariff (LV-2.1) for hostels being run by tribal welfare department across the State

Commission's views

The Commission observed that the LV-2.1 is applicable for connection of hostels having a reasonable tariff and therefore does find the request acceptable.

ISSUE NO. 28: Terminal benefits

Issues raised by objectors

The representatives from various associations of Power Companies including MP pensioners associations have requested that the provision for contribution to the terminal benefits Trust and provisions for allowing yearly pension/ terminal benefits be allowed in ARR in additional to allowing for yearly outgo against the terminal benefits/ pension.

Response from Discoms

The petitioners agree with the contention of the various associations of Power Companies including MP pensioners associations and requests the Commission to consider the request of stakeholder and allow such costs as claimed by the petitioners in their ARR for FY 2013-14.

Commission's views

The Commission has notified separate Regulations to deal with this issue and has also allowed expenses towards Pension and Terminal Benefits in the ARR for expenses against yearly pension/ terminal benefits for FY 13-14. In so far as provision for contribution for the pension and terminal benefit trust fund is concerned reference is invited to sub clauses of (5), (6) and (8) of Regulation 3 of the MPERC (Terms and conditions for allowing pension and terminal benefit liabilities of personnel of the Board and the successor entities) Regulations, 2012. This provision can only be made after proper actuarial analysis for which action shall be set in motion shortly. This, however, shall be a separate exercise to be undertaken by Transco on directions of the Commission. Results of this exercise shall get reflected in retail distribution tariff orders at the discretion of the Commission as per the Regulation referred to above.

ISSUE NO. 29: Suggestions on applicability with regard to tariff category HV-6.2 (Bulk residential users)

Issue raised by objectors

It is suggested that applicability under tariff category HV6.2 be amended incorporating old age houses and rescue houses etc. run by charitable trust as per following:

“The tariff category HV-6.2 is applicable for supply to Registered Cooperative Group Housing Societies as per MOP notification no. S.O.798 (E) dated 9th June 2005 and also to other Registered Group Housing Societies and individual domestic user and old age houses and rescue houses etc. run by charitable trust. The terms and conditions for this category of consumers shall be applicable as per the provisions in section 4.77 to 4.95 (both inclusive) of the Electricity Supply Code, 2004 as amended from time to time.”

Commission’s views

The Commission has considered the suggestions of the objectors and finds it unacceptable. The tariff category HV-6.2 is applicable for supply to Registered Cooperative Group Housing Societies as per MOP notification no. S.O.798 (E) dated 9th June 2005 and also to other Registered Group Housing Societies and individual domestic user. The terms and conditions for this category of consumers shall be applicable as per the provisions in section 4.77 to 4.95 (both inclusive) of the Electricity Supply Code, 2004 as amended from time to time. This category has been designed in pursuance of the MoP notifications exclusively for specified categories of consumers and the suggested changes to this category are not found acceptable.

ISSUE NO. 30: Tariff plan for pre-paid energy meters for domestic category under LV-1

Issue raised by objectors

Respondents from one cooperative housing society under tariff category HV 6.2 of bulk residential users have informed that they have installed pre-paid meters to collect the monthly charges from house holders and unlike domestic connections in tariff LV-1 wherein fixed charges are based on the consumption at the end of month, in pre-paid meters amounts reduces on daily basis and hence, it is difficult to calculate monthly consumption at the beginning of month. It is requested that for pre-paid meter connections fixed charges may be provided per kW basis as in case of non –domestic connection of tariff LV-2.

Commission’s views

The Commission has provided for billing of fixed charges in case of individual domestic consumers to ensure that their charges are prorated based on actual consumption and the consumers are not put to any undue burden on account of fixed charges related to the connected load. However, the issue of tariff design of prepaid meters is important and shall be addressed by the Commission separately.

ISSUE NO. 31: Generators connected to the grid

Issue raised by objectors

One of objectors has suggested that the generators connected to the grid be allowed to net of the grid supply used by them against the generation they feed to the grid. They have further suggested that no demand charges be levied on them while availing start up power.

Commission's views

The Commission is of the view that the suggestion to net-of the supply availed with that of supply fed to the grid by the generators is not in line with commercial principles. The Commission therefore has not accepted this suggestion. As regards tariff applicable to the generators for startup power or synchronization with the grid, a separate category has been provided in the tariff schedules appropriately.

ISSUE NO. 32: Introduction of kVAh billing

Issue raised by objectors

One of the objectors suggested that kVAh billing concept should be introduced and power factor incentives should be withdrawn.

Commission's views

The Commission has considered suggestions of the objector and shall address it separately.

ISSUE NO. 33: Minimum consumption for categories of HT consumers

Issue raised by objectors

One of the objectors has suggested that there should be uniform guaranteed minimum consumption for all categories of HT/EHT.

Commission's views

Differentiation in minimum consumption across the different voltage levels in HT/EHT categories are related to the average load factor for that category and generally the HT consumers who maintain average load factor are not required to bear minimum consumption charges.

ISSUE NO. 34: Consider poultry farms situated in the premises of agricultural connection on agricultural tariff

Commission's views

The Commission does not find any merit in the suggestion as LV-5.3 tariff (For other agricultural use) includes poultry farms.

ISSUE NO. 35: Integration cycle for calculation of demand be considered as 30 minutes in place of 15 minutes

Commission's views

This issue has been raised several times in the past. The 15 minutes time interval is synchronous with the time interval considered for integration of demand for drawal by the Discoms from the grid and therefore, it is well aligned. There is no justification for any change in the matter.

ISSUE NO. 36: Tariff be made equal for urban and rural areas in same category

Issue raised by objectors

It is suggested that tariff for urban and rural areas including fixed charges be made similar in view of proposed 24 hours supply planned for rural areas.

Commission's views

The Commission as of now has continued with the rebate in billing of fixed charges for rural areas. The Commission will take a view during the next tariff determination exercise after ascertaining the factual position.

ISSUE NO. 37: Two-slab tariff for HT consumers be merged into one

Issue raised by objectors

One of the objectors has suggested that energy charges for load factor up to 50% and above 50% should be kept same.

Commission's views

Two-slabs for billing of energy charges in some categories of HT consumers were introduced earlier to avoid tariff shock. The Commission is of the view that energy charges should be billed at uniform rate for the entire consumption. However, looking to the impact of merging two slabs at this juncture, the Commission has continued with the pattern of two slabs tariff for energy charges to avoid tariff shock.

ISSUE NO. 38: Lowering minimum consumption level for HT consumers having contract demand from 60 kVA to 100 kVA

Issue raised by objectors

One of the objectors suggested that the minimum consumption units for consumers having load from 60 kVA to 100 kVA should be considered as 360 units per kVA per annum.

Commission's views

The minimum consumption for the consumers having contract demand up to 100 kVA was earlier brought down to 600 units as compared to other HT consumers who are billed a minimum consumption of 1200 units per kVA per annum. The Commission does not find any merit in further reducing the minimum consumption from the present level of 600 units per kVA per annum in case of contract demand up to 100 kVA.

ISSUE NO. 39: Seasonal HT tariff should be made applicable for micro /mini and small hydro electric power plants

Issue raised by objectors

One of the objectors suggested that Seasonal HT tariff should be made applicable for micro /mini and small hydro electric power plants that avail supply for maintaining essential activities of the plant during their off season.

Commission's views

The Commission has considered the suggestion and tariff schedule HV-4 has been made applicable to micro /mini and small hydro electric power plants.

ISSUE NO. 40: To impose high loss surcharge in areas having high AT&C losses

Issue raised by objectors

One of the objectors has suggested that high loss surcharge be imposed in areas having high AT&C losses.

Commission's views

The petitioners have not made any proposal in this regard in their petition. The issue will be dealt with as and when such proposals are made by the petitioner along with duly verified authentic data of area wise loss figures.

A7: RETAIL TARIFF DESIGN

Legal Position

- 7.1 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, the Commission has, after taking into consideration all the submissions made by East, West, and Central Discom, all the objections, responses on behalf of the Discoms, issues raised during the Public Hearing, and all other relevant material, determined the Aggregate Revenue Requirement and Tariff for FY 2013-14 for the aforementioned three Distribution Companies. It is clarified that in the determination of the ARR the Commission has also considered the relevant/appropriate ARR of the Generation Company and the Transmission Company. While determining tariff for various consumer categories the Commission has given due consideration to the relevant provisions of the Electricity Act, 2003, National Tariff Policy and its own relevant Regulations.

Commission's Approach to Tariff Determination

Uniform vs. Differential Retail Tariffs

- 7.2 In consultation with the State Government, the Commission has decided that uniform retail supply tariffs shall be continued for FY 2013-14 also.
- 7.3 GoMP issued a letter on March 19, 2013 in respect of the revised allocation of the available generating capacity among the three Discoms to make it possible to have a uniform tariff with more or less a balanced revenue income vis-à-vis the approved aggregate revenue requirement of the Discoms. The revenues worked out using FY 2013-14 approved tariffs when compared with the approved ARR for FY 2013-14 results in non-uniform revenue gaps/surpluses across the three companies. GoMP vide its above mentioned letter has reallocated the generating capacities among the three Discoms so as to rebalance the power purchase costs among the Discoms. This makes it possible to achieve a more or less balanced revenue income at approved FY 2013-14 tariffs vis-à-vis the approved ARR of FY 2013-14 for all three Discoms, thereby ensuring uniform retail tariffs in the State.
- 7.4 Determination of the aggregate revenue requirement is based on distribution loss level trajectory specified in the MPERC (Terms and Conditions for Determination of Tariff for Supply and Wheeling of Electricity and Methods and Principles for Fixation of Charges) Regulations, 2012.

Linkage to Average Cost of Supply

- 7.5 While determining the tariffs for FY 2013-14, the Commission has given due consideration to the requirement of the Electricity Act, 2003 that consumer tariffs should reflect the cost of supply. The average cost of supply for the year FY 2013-14 works out to Rs.4.79 per unit as against Rs. 4.90 per unit for FY 2012-13. The table below shows

the cost coverage on account of tariff for FY 2013-14 as compared to the cost coverage as determined by the Commission in the FY 2012-13 Tariff Order:

Table 97: Comparison of tariff v/s average cost of supply

Category/ sub-category	Average realisation as % of Average CoS	
	FY 2012-13 (as per Tariff Order dated 31 st March, 2012)	FY 2013-14 (achieved as per this Tariff Order)
Domestic	96.69%	97.85%
Non-domestic	136.05%	140.01%
Public water works	82.92%	85.44%
Street Light	85.20%	88.21%
Industrial	122.82%	122.29%
Agriculture	76.78%	75.00%
Railways	124.21%	124.84%
Coal Mines	130.92%	137.33%
Industrial	120.57%	119.90%
Non-industrial	118.82%	136.64%
Irrigation, PWW and Other than agriculture	84.75%	91.03%
Bulk residential users	98.56%	98.87%

- 7.6 The cost structure has undergone a change during the year as explained in previous sections of this Order. Further, the admitted LT: HT sales mix has undergone a change from approx. 68%:32% in FY 2012-13 to approx. 74%:26% in FY 2013-14. This indicates a major shift in the consumption mix of LT vis-a-vis HT. The Commission has been consciously making efforts over the past several years to reduce the cross subsidy levels across all consumer categories. However, while doing so it has also kept in mind that any category of consumers is not put to tariff shock by a sudden steep hike. The process of reduction of cross subsidy has been gradual. As explained earlier, due to change in the consumption mix of LT vis-a-vis HT this year, the overall percentages of projected LT sales have increased considerably. This has resulted in reduction of average cost of supply as compared to the last year as the impact of standing cost of power purchase and of other items of ARR per unit has reduced. As a consequence, the average cost of supply over all categories shall see a downward trend. Yet, the afore-stated shift in the consumption mix shall also affect the revenues of the licensees negatively. It is not difficult to see why. The contribution of the comparatively lower revenue yielding categories expands even as that of the high revenue yielding categories compresses.
- 7.7 In order to bridge the gap in the ARR and revenue on existing tariff, the Commission has consciously attempted to align the tariff keeping in mind the cross subsidy road map as a guiding factor. However, for reasons adumbrated in the foregoing paragraph, the cross subsidy percentages in some of the categories will show a change without any corresponding changes in the applicable tariff.

7.8 After giving due consideration to the suggestions/ objections of the Objectors and the proposals submitted by the Discoms the Commission has made some changes in the tariff design for FY 2013-14. These changes are mentioned in following paragraphs:

- i. Removal of HV-7: Bulk Supply to Exemptees:** Distribution Licensees in their Petition submitted that they have not included sales forecast for this category, as the Discoms do not currently have any consumer in this category. However, it was observed that though the charges for the aforementioned category were not included in the proposed Tariff Schedule, certain charges were indicated under 'Table 62: HT Proposed Tariff Schedule'. In response to a query in this regard East Discom submitted that this category may be omitted from the Tariff Schedule since none of three Discoms have consumers in this particular category. During the meeting held with MDs of Discoms on 5th February, 2013, the Discoms reiterated their abovementioned submission. Therefore, the Commission removes this Category of consumers from the Tariff Schedule for FY 2013-14.
- ii. Modification in ceiling of Contract Demand in case of sub-category 'Non Domestic: LV 2.1 and LV 2.2: Optional - Demand based Tariff for Contract demand above 10 kW':** Distribution Licensees in their Petition have proposed that demand based tariff for consumers having connected load of 10 kW be introduced on optional basis and for connected load of more than 15 kW on mandatory basis. Discoms also requested that in any case Contract Demand shall not be less than 10 kW. In this regard, the Commission required confirmation whether demand based meters have since been installed for all existing 15 kW and above consumers in all of three Discoms and that the installation of such meters for new connections is assured. In reply, all three Discoms have confirmed that demand based meters have already been installed on all the existing 15 kW and above non-domestic consumers. The introduction of optional demand based tariff for consumers having contract demand from 10 kW to 15 kW and mandatory demand based tariff for contract demand in excess of 15 kW will save consumers from the difficulties arising out of connected load based tariff. Demand based Tariff is always a better option as compared to connected load based tariff both for consumers as well as the Discoms. This helps in identifying the actual load incident on the system and obviates the compulsion of restricting connected load for the consumers. Accordingly, the Commission has modified the ceiling of Contract Demand for the above mentioned sub-categories under LV 2.1 and LV 2.2, which were on optional basis, to Optional - Demand based Tariff for Contract demand above 10 kW and up-to 20 kW and mandatory demand based tariff for consumers having contract demand in excess of 20 kW. .
- iii. Load Factor calculation formula:** The petitioners have submitted that existing Load Factor calculation formula unduly benefits those consumers whose maximum recorded demand is less than the contracted or billing demand. Such consumers get double benefit i.e. by way of power factor incentive and by way of reduction in energy charges for the energy corresponding to more than 50% Load Factor. Further, Discoms also submitted that consumers are expected to utilize the asset at optimum level within grid discipline. Therefore, Load Factor calculation should be based on contracted demand or maximum demand whichever is higher and 0.9 or actual power factor whichever is higher. In this context, the Commission has considered the submissions made by the petitioners as well

as stakeholders besides the deliberations held in this matter in the past. The Commission has observed that in cases where the actual power factor is more than 0.9, the load factor calculated on the basis of keeping power factor constant as 0.9 in the denominator of the formula results in higher load factor. Moreover, the consumer having higher power factor also avails power factor incentive. Accordingly, the Commission has revised the load factor calculation formula based on contracted demand or maximum demand whichever is higher and 0.9 or actual power factor whichever is higher. The Commission is of the view that this modification incentivises the consumer appropriately without impacting the interests of the Discoms adversely.

- iv. Removal of ceiling of connected load in case of LT demand based tariff under Tariff Schedule LV-4:** The demand of removing ceiling on connected load where the demand based tariff is applicable, has been voiced by different industrial consumer groups over past few years repeatedly. The consumers have been stating difficulties in maintaining the connected load of their premises within the ceiling of 150 HP for various reasons. In the eventuality of exceeding the connected load these consumers were getting penalised although their maximum demand recorded is well within the contract demand. The consumers' contention has been that once the maximum demand is being duly recorded in the meter there is no relevance of connected load. The billing of the licensee is based on the contract demand and the licensee is not put to any loss even if there is an increase in the connected load if the maximum demand recorded is with-in the contract demand. In case the maximum demand recorded exceeds the contract demand, the consumer has to pay additional charges for excess demand. The Discoms have confirmed that they have installed meters having suitable features to record the maximum demand as also having features for monitoring the consumption and other parameters. Having considered the submissions of the consumers as well as Discoms, the Commission has decided to remove the ceiling on the connected load in case of LT industrial consumers to whom Tariff Schedule LV-4 is applicable and has appropriately modified subcategories under this tariff schedule.
- v. Separate Tariff Schedule for synchronisation and start-up power for generators connected to the grid:** In its previous retail supply tariff order the Commission had laid down terms and conditions for tariff to be made applicable for generators connected to the grid but who are not the consumers of the licensee and seek to avail power for synchronisation with the grid or start up power. The tariff for these generators was linked with tariff schedule HV – 3.1. Having given due consideration to the objections/suggestions received in this regard as well as the provisions made in other States in such cases, the Commission has decided to provide a separate tariff schedule for synchronisation and start-up power for generators connected to the grid.
- vi. Flat rate tariff for agriculture:** As per directions of the state Govt, the licensees have proposed a flat rate tariff for permanent agriculture consumers. It has been proposed that consumers under this scheme shall pay @ Rs. 1200 per HP per annum. The payment shall be recovered in two parts @ of Rs.600 per HP in April and @ of Rs.600 per HP in October. The balance amount of the bill as calculated under LV 5.1 shall be paid by the State Govt. as subsidy. Taking the state Government's commitment on subsidy in to account, the Commission has agreed to provide a separate category for flat rate tariff for

permanent agriculture consumers and has accordingly provided a separate category(LV 5.4) in the tariff schedule. Metered consumers under LV 5.1 shall have the option to continue in the same category or opt for flat rate tariff.

A8: COMPLIANCE ON DIRECTIVES ISSUED IN TARIFF ORDER FOR FY 2012-13

The para-wise response submitted by Discoms on the directives issued by the Commission in Retail Supply Tariff Order for FY 2012-13, and the Commission's observations/directions thereof is given below:

8.1 Distribution Losses:

Commission's Directives:

Although all the Discoms have shown reducing trend of losses, however the East and West Discoms could not achieve the prescribed milestones. The Commission directs that efforts for loss reductions needs to be further intensified.

Discoms' response:

East Discom: It is submitted that following various steps are being taken up to reduce the losses:

a) System strengthening work/Aug. of transmission capacity:

It is submitted that in order to reduce the technical losses, the distribution system is being strengthened /augmented. Following addition in the distribution system has been made during FY 2011-12.

Sr. No.	Particulars	Unit	As on Mar. 2011	Added in FY 2011-12	As on Mar. 2012
1	33/11KV S/s	No.	909	5	914
2	Power Transformer	No.	1377	39	1416
3	PTR Capacity	MVA	5317.5	238.7	5556.2
4	33KV Line	km	14685	244	14929
5	11KV Line	km	74269	4517	81635
6	LT Line	km	107243	741	107984
7	DTR	No.	76708	18314	95022
8	DTR Capacity	MVA	5179.55	449.06	5628.61

b) Implementation of Non-RAPDRP Scheme:

It is submitted that in order to reduce the losses, the work in selected Non-RAPDRP towns spanning over three phases is being undertaken. The work carried out consists of LT line cabling, replacement of service line by armored cable, shifting of meters to call bell location, installation of meters, etc.

In Phase-I, 21 towns were selected. The works in all such 21 towns have been completed, and the average loss level in these towns has reduced from 47.28% in the month of March 2010 to 19.17% in the month of March 2012.

In Phase-II, 27 towns were selected. The works in all such 27 towns have been completed and average loss level of these towns has reduced from 53.26% to 29.69%.

In Phase-III works in 35 towns has been recently taken up with ADB loan saving, and the work is proposed to be completed in FY 2012-13.

c) Feeder Separation Scheme:

It is submitted that there is a provision to separate 1645 nos. of 11 kV feeders under Feeder Separation Scheme, and it is expected that after completion of entire project there would be a saving of 2823 LU.

West Discom: It is submitted that as per the Commission's directives, the Discom is sincerely striving for reduction in line losses and to bring it to the normative level of line loss trajectory notified by the GoMP/ Commission. It is further submitted that it is the only outcome of Discom's sincere endeavour that, it has performed well on this front as compared to the similar time period of the previous year. Discom also submitted the achievements made in loss level as compared to the similar time period of previous financial year as given in table below:

Months	T&D Losses	Months	T&D Losses	Difference
April 2011	29.01%	April 2012	24.76%	-4.25%
May 2011	40.36%	May 2012	35.26%	-5.10%
June 2011	37.47%	June 2012	32.57%	-4.90%
July 2011	23.66%	July 2012	26.48%	2.82%
August 2011	13.97%	August 2012	12.50%	-1.47%
September 2011	14.75%	September 2012	17.29%	2.54%
October 2011	25.14%	October 2012	23.45%	-1.69%
November 2011	25.76%	November 2012	28.12%	2.36%
Average	27.05%	Average	25.86%	-1.19%

It is also submitted that the Company has strengthened its Vigilance Wing and launched intensive checking drives to curb pilferage of electricity. The Vigilance Cell under the leadership of an Officer of the rank of Chief Engineer assisted by 5 SE's, and substantial no. of EEs, AEs and JEs conducts regular raids to check and to keep surveillance on theft and pilferage of electricity. Discom has submitted the status of raids conducted and no. of connections checked, amounts billed / realized from April 2012 to November 2012 for FY 2012-13, and claimed that the progress achieved against the drive apparently reveals that it has launched a very effective drive against the pilferage of Electricity. The status is given as below:

No. checked	No. of cases of irregularities/theft detected			Total amount billed (Rs. Lakh)			Total amount realised (Rs. Lakh)			No. of cases filed before the Special Court during the month
	Direct Theft	Mal-practice	Total	Direct Theft	Mal-practice	Total	Direct Theft	Mal-practice	Total	
146175	23113	21967	45080	4262.16	5486.49	9748.65	3019.88	2987.39	6007.27	11137

Feeder Separation Scheme: It is submitted that the Discom has also launched a Feeder Separation Scheme in two phases, with an objective to separate agricultural load from rural household load. The phase one covers districts of Indore, Dhar, Khandwa, Khargone, Barwani, Burhanpur and Ratlam, whereas, phase two of the scheme covers Ujjain, Dewas, Mandsaur, Neemuch, Alirajpur, Jhabua and Shajapur Districts. It is clarified that the tie up of finance for the Scheme has been done from REC and ADB, for phase one and phase two respectively. As regard implementation, it is submitted that the awards of both phases have been placed and agreements have also been executed with the agencies and the works are under execution. Further, the effective planning and monitoring system have been developed at corporate level for proper implementation of Feeder Separation Scheme and for ensuring quality of man and materials. It is stated that third party supervision of project under both phases has been included. It is clarified that the progress of project for both the phases is given under the submission in response to the 'Segregation of rural feeders into agricultural and others'.

It is also submitted that the Discom has launched various schemes for system strengthening under the GoMP/TSP, SCSP, Feeder Bifurcation, new irrigation pumps, ADB Second (TR 4 and 5), RGGVY (10th and 11th Plan), JBIC First and Second scheme. It is stated that the detailed Capital Investment Plan is already approved in-principle by the Commission.

It is also averred that, all possible endeavors to redress the very problem of higher line losses and to bring them within the road map prescribed under respective schemes have been taken up. Discom also submitted its expectation that the losses would be brought within the bench mark of the road map after execution of all above schemes.

Central Discom: It is submitted that the efforts for reduction of T&D losses have already been intensified. Further, the Utility is expediting cabling instead of overhead lines in LT networks in Rural as well as in urban area. Also, the meterization of un-metered DL&F connection is also being done promptly so that actual consumption may be recorded to boost sale of electricity.

It is also stated that the AMR of LT high value consumer is implemented. Regional CGMs have been instructed to monitor various activities towards reduction of T&D losses and administrative actions are also being taken to ensure reduction in T&D losses

Period	Input (LU)	Sale (LU)	% T&D Loss
Apr. to Oct. 2011	75557.30	51220.77	32.21
Apr. to Oct. 2012	84485.32	57888.99	31.48

Commission's observations/ directions:

Although all the Discoms have shown reducing trend of losses, efforts to reduce losses need to be further intensified. The Discoms should not only endeavour to achieve the benchmarks but to improve further.

8.2 Meterization of unmetered connections

Commission's Directives:

It is observed that the results so far achieved in meterisation of un-metered connections are far from satisfactory. The Commission finds the attitude of the Discoms on this issue totally untenable. The Discoms have been time and again assuring to improve the meterisation status, however the achievements so far are unsatisfactory. The status of meterisation of unmetered domestic connections particularly in rural area has been very poor and continues to be so. The East Discom is the worst performer in this regard. The Discoms are also not paying due attention to improve meterisation of agricultural DTRs, 33 kV and 11kV feeders so as to ensure proper energy auditing. The targets proposed for completion of meterisation particularly for unmetered rural domestic consumers are unacceptable. The Commission finds the plea of non availability of funds for meterisation totally without merit in backdrop of huge Capex being under taken by Discoms. The management of these companies must realise that there they are contravening and are in default of Sec 55 of the EA, 2003. They must demonstrate on best effort basis, their will and intent to comply failing which they shall be liable for being dealt with appropriately as per provision of the Act. The Commission would like to take this issue separately with the Discoms and if it finds that improvements are not to the desired level, it may take stringent action. The Discoms are directed to file concrete month wise plans/ targets for meterisation of un-metered domestic connections, agricultural DTRs, 33kV and 11kV feeders within a month of issue of this Order so as to ensure that 100% meterisation in this regard is achieved by March,2013.

Discoms' response:

East Discom: It is submitted that the meeting on the issue was convened by the Commission on 13th June, 2012. Further, the factual position in the matter has been apprised to the Commission vide letter no. 5032, dated 12th June, 2012.

West Discom: It is submitted that the Company has made a comprehensive Meterization Plan under Capex Plan, and the Meterization Plan is submitted to the Commission vide letter no. CMD/WZ/05/16509, dated 25th May, 2012. It is stated that the Company is adhering to the implementation of the schemes indicated in the Meterization Plan and works under the schemes are in progress. It is averred that, from the Meterization Plan it is evident that the Company will surely achieve the target of meterisation given by the Commission. The progress of Domestic meterisation for last two quarter of FY 2012-13 submitted by Discom is produced below:

Progress of Domestic meterisation for the Quarter ending on September 2012:

Sr. No.	Name of Circle	Total No. of Domestic Connections as on 30.09.12		Total No. of unmetered connections, as on 30.06.12		New connection served during the quarter without meter		Total No. of unmetered connections incl. unmetered new connections served during the quarter.		Total No. of meters provided to unmetered connection.		Balance Unmetered connections at the end of quarter i.e. 30.06.12		[%] Unmetered	
		Urban	Rural	Urban	Rural	Urban	Rural	Urban	Rural	Urban	Rural	Urban	Rural	Urban	Rural
1	City - Indore	356405	0	0	0	0	0	0	0	0	0	0	0	0	0
2	O&M - Indore	119489	114797	0	1572	0	169	0	1741	0	37	0	1704	0	1.48
3	O&M - Khandwa	48271	105554	0	26071	0	546	0	26617	0	2173	0	24444	0	23.16
4	O&M - Burhanpur	45971	45795	0	4523	0	240	0	4763	0	46	0	4717	0	10.3
5	O&M - Kargone	55802	143606	0	17774	0	870	0	18644	0	1003	0	17641	0	12.28
6	O&M - Barwani	35116	91198	0	14667	0	0	0	14667	0	3585	0	11082	0	12.15
7	O&M - Dhar	37382	194846	0	19764	0	0	0	19764	0	106	0	19658	0	10.09
8	O&M - Jhabua	25263	151553	0	83645	0	1142	0	84787	0	0	0	84787	0	55.95
IR TOTAL		723699	847349	0	168016	0	2967	0	170983	0	6950	0	164033	0	19.36
1	O&M - Ujjain	126912	132004	0	2620	0	0	0	2620	0	23	0	2597	0	1.97
2	O&M - Dewas	61264	121589	0	49082	0	12	0	49094	0	891	0	48203	0	39.64
3	O&M - Shajapur	41252	100776	0	18617	0	568	0	19185	0	517	0	18668	0	18.52
4	O&M - Ratlam	77807	122693	0	34331	0	1731	0	36062	0	4575	0	31487	0	25.66
5	O&M - Mandsaur	53271	135523	0	25186	0	1364	0	26550	0	1060	0	25490	0	18.81
6	O&M - Neemuch	39320	66154	0	7673	0	856	0	8529	0	3299	0	5230	0	7.91
UR TOTAL		399826	678739	0	137509	0	4531	0	142040	0	10365	0	131675	0	19.4
WZ TOTAL		1123525	1526088	0	305525	0	7498	0	313023	0	17315	0	295708	0	19.38

The progress of Feeder Meterisation as on 30th September, 2012, submitted is produced below:

Details of 33kV Feeder Meterisation

Sr. No.	Name of Circle	Total No. of 33 kV Feeders from E.H.V. S/s.	No. of 33 kV Import/Export points at S/s. and other locations	Total	Meters Installed for energy Audit out of Col.			Meters Not Installed for energy Audit out of Col.		Total	Locations where recording could not done due to ME/Meter defective or other reason out of Col.		Total	% Meterization w.r.t. Total Feeder	% Defective Meter/ME w.r.t. Total Meterized Feeder	No. of ME/Meter defective	
					No. 3	No. 4	Total	No. 3	No. 4		No. 6	No. 7				ME	Meter
1	2	3	4	5=3+4	6	7	8=6+7	9	10	11=9+10	12	13	14=12+13	15	16	19	20
1	Indore City	52	214	266	52	173	225	0	41	41	0	70	70	84.59	31.11	29	18
2	Indore O&M	83	139	222	83	134	217	0	5	5	0	56	56	97.75	25.81	51	17
3	Khandwa	26	92	118	26	87	113	0	3	3	0	14	14	95.76	12.39	15	17
4	Burhanpur	15	45	60	15	21	36	0	24	24	0	24	24	60	66.67	18	16
5	Kargone	44	128	172	44	99	143	0	29	29	0	46	46	83.14	32.17	23	23
6	Barwani	20	6	26	20	6	26	0	0	0	0	0	0	100	0	0	0
7	Dhar	51	157	208	51	114	165	0	43	43	0	47	47	79.33	28.48	45	25
8	Jhabua	22	25	47	22	19	41	0	7	7	0	17	17	87.23	41.46	7	4
TOTAL IR		313	806	1119	313	653	966	0	152	152	0	274	274	86.33	28.36	188	120
1	Ujjain	75	270	345	75	183	258	0	87	87	0	61	61	74.78	23.64	61	37
2	Dewas	58	114	172	58	91	149	0	23	23	0	36	36	86.63	24.16	32	21
3	Shajapur	56	136	192	56	102	158	0	34	34	0	30	30	82.29	18.99	30	19
4	Ratlam	44	110	154	44	93	137	0	17	17	0	9	9	88.96	6.57	9	3
5	Mandsaur	32	123	155	32	80	112	0	43	43	0	37	37	72.26	33.04	37	37
6	Neemuch	21	67	88	21	51	72	0	16	16	0	22	22	81.82	30.56	22	22
TOTAL UR		286	820	1106	286	600	886	0	220	220	0	195	195	80.11	22.01	191	139
TOTAL WZ Co.		599	1626	2225	599	1253	1852	0	372	372	0	469	469	83.24	25.32	379	259

Details of 11kV Feeder Meterisation:

Sr. No.	Name of Circle	Total No. of 11 kV Feeders from		No. of 11 kV Import/Export points at other locations	Total	Meters Installed for energy Audit out of Col.			Meters Not Installed for energy Audit out of Col.		Total	Locations where recording could not done due to ME/Meter defective or other reason out of Col.		Total	% Meterization w.r.t. Total Feeder	% Defective Meter/ME w.r.t. Total Meterized Feeder	No. of ME/Meter defective	
		E.H.V. S/s.	33/11 kV S/s.			No. 3+4	No. 5	Total	No. 3+4	No. 5		No. 7	No. 8				ME	Meter
1	Indore City	0	296	8	304	292	8	300	4	0	4	17	0	17	98.68	5.67	17	6
2	Indore O&M	10	417	43	470	373	40	413	54	3	57	117	34	151	87.87	36.56	118	22
3	Khandwa	4	221	25	250	127	19	146	98	6	104	107	11	118	58.4	80.82	118	107
4	Burhanpur	3	115	20	138	73	20	93	45	0	45	36	1	37	67.39	39.78	36	42
5	Khargone	0	331	5	336	202	4	206	129	1	130	120	4	124	61.31	60.19	58	62
6	Barwani	0	156	7	163	114	5	119	42	2	44	79	2	81	73.01	68.07	29	52
7	Dhar	12	398	16	426	308	1	309	102	15	117	168	1	169	72.54	54.69	150	96
8	Jhabua	0	118	0	118	98	0	98	20	0	20	46	0	46	83.05	46.94	38	17
TOTAL IR		29	2052	124	2205	1587	97	1684	494	27	521	690	53	743	76.37	44.12	564	404
1	Ujjain	13	520	47	580	401	47	448	132	0	132	66	0	66	77.24	14.73	66	22
2	Dewas	6	325	12	343	130	6	136	201	6	207	65	1	66	39.65	48.53	0	24
3	Shajapur	3	304	9	316	248	9	257	59	0	59	133	3	136	81.33	52.92	140	150
4	Ratlam	2	299	66	367	243	18	261	58	48	106	130	0	130	71.12	49.81	88	92
5	Mandsaur	13	280	12	305	200	12	212	93	0	93	126	9	135	69.51	63.68	135	135
6	Neemuch	4	165	10	179	112	4	116	57	6	63	28	0	28	64.8	24.14	28	28
TOTAL UR		41	1893	156	2090	1334	96	1430	600	60	660	548	13	561	68.42	39.23	457	451
TOTAL WZ Co.		70	3945	280	4295	2921	193	3114	1094	87	1181	1238	66	1304	72.5	41.88	1021	855

Central Discom: It is stated that the quarter wise Meterization Plan of un-metered domestic connections as well as that of 33 kV and 11 kV feeders has already been submitted to the Commission, and as such these plans still prevail. It is submitted that in order to achieve 100% meterisation, the work of meterization of un-metered DL&F connection is covered under various ongoing schemes, and contract for feeder meterization work has been awarded accordingly. It is further stated that monthly targets for meterisation for the FY 2013-14 and FY 2014-15 have been prepared. Such monthly targets submitted by Discom are produced below:

Monthly Target for Meterisation for FY 2013-14

Region	Apr-12	May-12	Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Total
Bhopal	1300	1300	1300	1300	1300	1300	1300	1300	1300	1300	1300	1300	15600
Gwalior	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	20400
MPMKVVCL	3000	3000	3000	3000	3000	3000	3000	3000	3000	3000	3000	3000	36000

Monthly Target for Meterisation for FY 2014-15

Region	Apr-13	May-13	Jun-13	Jul-13	Aug-13	Sep-13	Oct-13	Nov-13	Dec-13	Jan-14	Feb-14	Mar-14	Total
Bhopal	300	300	300	300	300	300	300	300	200	200	200	125	3125
Gwalior	400	400	400	400	400	400	400	400	400	400	400	475	4875
MPMKVVCL	700	700	700	700	700	700	700	700	600	600	600	600	8000

Commission's observations/ directions:

During the meeting held on 5th February, 2013 with the MDs of the Discoms and MPPMCL the issue of delay in meterisation of feeders, agricultural DTRs and unmetered domestic consumers was discussed. Discoms assured the Commission that all urban unmetered domestic connections would be provided with meters by end of June, 2013. Meterisation with respect to feeders, agricultural DTRs and unmetered rural domestic consumers would be completed by end of March, 2014. The Commission directs Discoms to ensure 100% meterisation by end of March, 2014.

8.3 Capex. Plan for reduction of technical losses:

Commission's directives:

The plans as submitted by the Discoms were reviewed by the Commission and the Discoms were directed to ensure that these plans include provisions for 100% meterisation of un-metered connections including meterisation of agricultural DTRs. The matter is under further review of the Commission.

Discoms' response:

East Discom: It is submitted that the Commission has already granted in-principle approval to the Capex Plan in SMP no. 58 of 2011.

West Discom: It is submitted that as per the directives, the comprehensive Capex Plan for FY 2011-12 to FY 2015-16 has been submitted to the Commission in accordance with the Regulation. The Commission vide Order dated 2nd July, 2012, in Petition no. 75/2011 granted in-principle approval to the Capex Plan for the FY 2011-12 to FY 2015-16.

Central Discom: It is submitted that the Capex Plan has been approved in-principle by the Commission vide Order dated 7th November, 2012 in Petition no. 68/2011.

Commission's observations/ directions:

Discoms while submitting their Capex plans had assured the Commission that these plans cover meterisation of unmetered connections. In addition it was also assured that all new connections would be served with meters for which adequate provisions of meters have been made in the plans. The licensees should closely monitor progress of implementation of the Capex plans and ensure that as directed earlier, 100 % meterisation is achieved by end of March, 2014. The Discoms should also monitor and inform the benefits accrued on execution of schemes under the Capex plans.

8.4 Installation of meters having facility to record average monthly demand on domestic category of consumers:

Commission Directives:

One of the Discom has proposed contract demand based tariff for domestic consumers. However as may be seen from the status reported, it would be premature to introduce such tariff unless all such consumers are provided with appropriate meters. The Discoms are directed to complete the work in FY 12-13.

Discoms' response:

East Discom: It is submitted that the Company is procuring / installing the meters having facility to record maximum monthly demand. Further, it is clarified that the Company at

present is not having any plan to procure / install the meters having the facility to record average monthly demand, however, the possibility is being explored to procure the meters having this additional feature.

West Discom: It is submitted that the MPPKVVCL, Indore is keen to comply with the direction. As regards installation it is submitted that the process has started to install meters having a connected load of 10 kW in Indore city. It also submitted its decision that now, single phase or three phase meter having feature of recording average monthly demand will be procured.

Central Discom: It is submitted that all the domestic connections are being provided with demand meter, which are capable of recording maximum demand.

Commission's observations/ directions: It is observed that, in the Tariff Petition for FY 2013-14 Discoms have not proposed demand based tariff for domestic consumers. Further, in view of the status reported, the Commission reiterates its earlier observation that, it would be premature to introduce demand based tariff unless all such consumers are provided with appropriate meters.

8.5 Segregation of rural feeders into agricultural and others:

Commission's Directives:

The Commission in Tariff Order for FY 2011-12 had issued directives which reads as '*The Commission directs that the progress of implementation of these schemes be included in the progress reports on Capex directed to be submitted herein before.*' After analyzing the response the Commission in the Tariff Order for FY 2012-13 had observed that '*Discoms have indicated that they are going in a big way for implementation of the feeder separation scheme having completion target by Jan, 2013. The Discoms are directed to submit the progress regularly.*'

Discoms' response:

East Discom: It is submitted that Feeder Separation Scheme has a provision to separate 1645 no. of 11 kV feeders. The progress as on August, 2012 submitted, is produced below:

Sr. No.	Target of FSP for FY-12 (No. of feeders)	Progress as on Mar 12 (No. of feeders)	No. of new Domestic connections proposed to be given as on Aug 12 (Cumulative)	No. of new Domestic connections proposed to be given in FY-13	Target of FSP for FY-13 (No. of feeders)	Achievement on Aug'12 (No. of feeders)
1	303	127	12643	45157	1518	425

West Discom: It is submitted that the Discom has also launched a Feeder Separation Scheme in two phases, with an objective to separate agricultural load from rural household load. Phase one covers Districts of Indore, Dhar, Khandwa, Khargone, Barwani, Burhanpur and Ratlam, whereas, phase two of the scheme covers 7 districts i.e. Ujjain, Dewas, Mandsaur, Neemuch, Alirajpur, Jhabua and Shajapur Districts. It is clarified that the tie up of finance for the scheme has been done with REC and ADB, for phase one and phase two respectively. As regard implementation, it is submitted that the awards of both phases have been placed and agreements have also been executed with the agency and the works are under execution. Further, the effective planning and monitoring system have been developed at corporate level for proper implementation of Feeder Separation Scheme and for ensuring quality of man and materials. It is stated that provision for third party supervision of the project under both phases has been made. The progress of the project for both the phases against provision till November, 2012 is produced below:

Feeder Separation Progress (FSP, RGGVY, and ADB) – Indore Region

Sr. No.	District	Provision in various scheme as per Master Plan								Progressive achievement upto Nov. 2012							
		RGGVY		ADB		FS		TOTAL		RGGVY		ADB		FS		TOTAL	
		F	V	F	V	F	V	F	V	F	V	F	V	F	V	F	V
1	Indore	2	17	70	79	212	529	284	625	2	17	25	49	135	358	162	424
2	Dhar	0	0	63	281	181	1056	244	1337	0	0	63	281	164	449	227	730
3	Burhanpur	0	0	0		66	258	66	258	0	0	0	0	58	178	58	178
4	Khandwa	0	0	0	0	135	705	135	705	0	0	0	0	63	170	63	170
5	Khargone	0	0	0	0	266	1156	266	1156	0	0			117	292	117	292
6	Barwani	0	0	0	0	144	662	144	662					62	152	62	152
7	Jhabua	0	0	0	0	52	752	52	752	0	0	0	0	18	120	18	120
8	Alirajpur	0	0	0		28	529	28	529	0	0	0	0	17	96	17	96
Total Indore Region		2	17	133	360	1084	5658	1219	6024	2	17	88	330	634	1815	724	2162

Note: 'F'- Feeders, 'V'- Villages

Feeder Separation Progress (FSP, RGGVY, and ADB) – Ujjain Region

Sr. No.	District	Provision in various scheme as per Master Plan								Progressive achievement upto Nov. 2012							
		RGGVY*		ADB		FS		TOTAL		RGGVY		ADB		FS		TOTAL	
		F	V	F	V	F	V	F	V	F	V	F	V	F	V	F	V
9	Ujjain	119	544	0	0	216	552	335	1096	119	420	0	0	93	239	212	659
10	Ratlam	4	8	0	0	198	1045	202	1053	4	4	0	0	139	390	143	394
11	Dewas	0	0	38	312	183	743	221	1055	0	0	38	132	77	221	115	353
12	Shajapur	0	0	0	0	273	1106	273	1106	0	0	0	0	98	438	98	438
13	Mandsaur	0	0	0	0	234	906	234	906	0	0	0	0	89	354	89	354
14	Neemuch	0	0	0	0	158	674	158	674	0	0	0	0	50	186	50	186
Total Ujjain Region		123	552	38	312	1262	5026	1423	5890	123	424	38	132	546	1828	707	2384
Grand Total (WZ)		125	569	171	652	2346	10837	2642	11914	125	441	126	462	1180	3643	1431	4546

Note: 'F'- Feeders, 'V'- Villages, '*'- RGGVY/Departmental

Central Discom: It submitted the progress of works related with Feeder Separation Scheme for Central Discom, is given below:

Sr. No.	District	Provision in various scheme as per Master Plan								Progressive achievement upto Nov. 2012							
		RGGVY		ADB		FS		TOTAL		RGGVY		ADB		FS		TOTAL	
		F	V	F	V	F	V	F	V	F	V	F	V	F	V	F	V
1	Bhopal	4	0	22	141	43	357	69	498	0	0	14	94	36	226	50	320
2	Raisen	29	0	22	194	76	1231	127	1425	0	0	22	132	51	310	73	442
3	Harda	46	0	6	117	7	396	59	513	45	205	0	0	4	16	49	221
4	Hoshagabad	15	0	54	391	43	538	112	929	0	0	40	224	22	146	62	370
5	Sehore	64	0	0	0	91	1019	155	1019	0	0	0	0	71	336	71	336
6	Vidisha	7	0	0	0	86	1533	93	1533	0	0	0	0	61	547	61	547
7	Betul	101	0	0	0	29	1343	130	1343	65	319	0	0	19	321	84	640
8	Rajgarh	52	0	0	0	134	1677	186	1677	0	0	0	0	55	471	55	471
Total Bhopal Region		318	0	104	843	509	8094	931	8937	110	524	76	450	319	2373	505	3347
9	Shivpuri	33	0	0	0	97	1306	130	1306	25	68	0	0	54	403	79	471
10	Guna	43	0	0	0	143	1260	186	1260	43	488	0	0	41	196	84	684
11	Ashok Nagar	16	0	0	0	47	818	63	818	16	284	0	0	45	321	61	605
12	Gwalior	21	0	0	0	94	612	115	612	0	0	0	0	35	172	35	172
13	Datia	18	0	0	0	54	584	72	584	17	139	0	0	17	106	34	245
14	Sheopur	21	0	0	0	31	527	52	527	17	89	0	0	19	91	36	180
15	Bhind	17	0	0	0	60	917	77	917	0	0	0	0	23	202	23	202
16	Morena	35	0	0	0	68	782	103	782	16	64	0	0	23	130	39	194
Total Gwalior Region		204	0	0	0	594	6806	798	6806	134	1132	0	0	257	1621	391	2753
Total (CZ)		522	0	104	843	1103	14900	1729	15743	244	1656	76	450	576	3994	896	6100

Note: 'F' - Feeders, 'V' - Villages

Commission's observations/ directions:

During the meeting with the MDs of the Discoms and MPPMCL on 5th Feb, 2013 the Commission was informed that the work of feeder segregation is being given the highest priority and shall be completed soon. The Commission directs the Discoms to submit the quarterly status of progress of this scheme.

8.6 Minimum supply hours:

Commission's directives:

The Commission directs the licensees to maintain the minimum daily supply hours as directed in the tariff order for FY 11-12 during this year also.

Discoms' response:

East Discom: The status of average supply hours from April to October - 2012 is given in table below:

Month	Rural	THQ	DHQ	CHQ
April 2012	14:12	19:09	22:48	23:46
May 2012	16:47	20:49	24:00	24:00
June 2012	13:51	19:25	24:00	23:58
July 2012	14:31	18:01	23:35	23:48
August 2012	22:44	23:08	23:58	24:00
September 2012	23:25	23:40	24:00	24:00
October 2012	17:53	22:14	23:57	24:00

West Discom: The average supply hours from April to October - 2012, is given in table below:

Sr. No.	Month	CHQ.		DIS.	THQ	RURAL		
		INDORE	UJJAIN			MIX.	DLF	IRR.
1	April 2012	23:53:37	23:46:24	23:53:11	18:53:08	12:28:25		
2	May 2012	23:53:38	23:46:25	23:53:10	18:52:40	12:29:12		
3	June 2012	23:53:39	23:46:26	23:53:10	18:52:09	12:30:03		
4	July 2012	23:53:43	23:46:26	23:53:10	18:51:42	12:30:39		
5	August 2012	23:53:50	23:46:24	23:53:12	18:51:13	12:31:01		
6	September 2012	23:54:14	23:46:18	23:53:20	18:50:16	12:29:21	18:28:33	07:31:47
7	October 2012	23:54:10	23:46:19	23:53:19	18:50:28	12:29:35	18:28:33	07:31:47

Central Discom: The average supply hours for the FY 2011-12 and FY 2012-13 (up to November 2012) are given in table below:

Sr. No.	Month	CHQ	DHQ	THQ	Rural (3Ph+1Ph)		
					Mixed	DLF	Irrigation
1	2011-12	23.07	21.28	17.43	13.44		
2	2012-13 (upto Nov.12)	23.73	23.18	21.52	17.15	19.33	7.58

Sr. No.	Month	CHQ	DHQ	THQ	Rural (3Ph+1Ph)		
					Mixed	DLF	Irrigation
1	April 2011	22.55	21.02	17.44	12.54	-	-
2	May 2011	22.48	20.29	16.38	12.14	-	-
3	June 2011	22.56	20.45	17.34	14.13	-	-

4	July 2011	23.17	21.14	17.43	13.15	-	-
5	August 2011	23.44	22.56	20.10	16.11	-	-
6	September 2011	24.00	24.00	22.22	22.27	-	-
7	October 2011	23.16	21.27	16.40	11.52	-	-
8	November 2011	23.00	20.14	14.51	10.30	-	-
9	December 2011	23.01	20.17	14.02	10.09	-	-
10	January 2012	23.36	22.03	18.30	14.47	-	-
11	February 2012	23.06	20.26	15.59	11.03	-	-
12	March 2012	23.01	22.05	19.37	13.51	-	-
13	April 2012	23.54	23.53	23.09	16.30	-	-
14	May 2012	24.00	24.00	23.44	19.14	-	-
15	June 2012	24.00	24.00	23.13	13.35	-	-
16	July 2012	24.00	23.23	20.20	15.35	-	-
17	August 2012	24.00	24.00	23.55	23.20	-	-
18	September 2012	23.47	23.51	23.28	22.58	23.19	7.59
19	October 2012	23.41	21.57	18.08	14.05	17.46	7.58
20	November 2012	23.40	21.59	17.42	13.25	17.33	7.57
	Avg. (Apr.11-Mar.12)	23.07	21.28	17.43	13.44		
	Avg. (Apr.12-Nov.12)	23.73	23.18	21.52	17.15	19.33	7.58
	Avg. (Apr.11-Nov.12)	23.33	22.04	19.06	14.92	19.33	7.58

Commission's observations/ directions: The Commission directs the Licensees that the minimum daily supply hours as directed in the Tariff Order for FY 2012-13 shall be maintained in all areas until the feeder segregation activity is complete and 24 hours supply is commenced.

8.7 Appointment of Franchisees:

Commission's Directives:

The status of appointment of franchisees is not very encouraging. The Commission would like to continue to review the status.

Discoms' response:

East Discom: It is submitted that the Company has appointed M/s Essel Vidyut Vitaran (Sagar) Pvt. Ltd. as Distribution Franchisee (DF) for distribution and supply of electricity in Sagar City, and this has already been apprised to the Commission vide letter no. EZ/Comml/FD/3629 dated 23rd June 2012. As regard to operation it is submitted that the Franchisee has started operating its function w.e.f. 1st Dec, 2012.

West Discom: M/s Essel Vidyut Vitaran (Ujjain) Pvt. Ltd., have been appointed

distribution franchisee for Ujjain City. The franchise is yet to commence the functioning as fulfillment of some of conditions of the agreement is under process.

Central Discom: M/s Essel Vidyut Vitaran (Gwalior) Pvt. Ltd., have been appointed distribution franchisee for Gwalior City. The franchise is yet to commence the functioning as fulfillment of some of conditions of the agreement is under process.

Commission's observations/ directions: As per the Electricity Act, 2003, the Distribution Licensee may appoint Distribution Franchisee for distribution of electricity in its Area of Supply. However, the Distribution Licensee is responsible for all actions of Franchisee related to the delegated functions. Discoms should exercise due diligence not only while appointing the Franchisees but also during their day to day functioning, so that the interest of consumers as well as financial health of Discoms remain intact/protected. Discoms should update the Commission on the status from time to time.

8.8 Issue of tariff card with first bill based on new tariff :

Commission's Directives:

The Commission directs that the practice of providing tariff cards should be continued for tariff Order of FY 2012-13.

Discoms' response:

East Discom: It is submitted that the Company has arranged to print Tariff cards for Tariff Order FY 2012-13 for different categories of the consumers and the same have been provided to the field units for their onward distribution to the consumers.

West Discom: It is submitted that the information related to tariff for FY 2012-13 is issued to consumers of the Company.

Central Discom: It is submitted that the Tariff cards showing the tariff provisions have been issued to LT consumers, and in addition, tariff schedule booklets have been providing to all HT consumers.

Commission's observations/ directions: The Commission directs that the practice of providing tariff cards should be continued for Tariff Order of FY 2013-14.

8.9 Filing of ARR and tariff proposals in Hindi language

Commission's Directives:

The Commission had directed the Discoms after receipt of ARR/ Tariff proposals to file Hindi version. Subsequently the Discoms have submitted the Hindi version which was made public. The next filing of ARR/ tariff proposals should be made in Hindi and

English.

Discoms' response:

Hindi version of the main petition has been submitted subsequent to filing of petition in English but before issue of public notice.

Commission's observations/ directions: Subsequent to the filing of the ARR/Tariff Petition in English, Discoms have submitted its Hindi version which was made public. The next filing of ARR/ tariff proposals should also be made in Hindi and English.

8.10 Accounting of rebates/incentives/ surcharge:

Commission's Directives:

The West and Central Discoms have not submitted desired details. Discoms should at least submit details pertaining to HT consumers with their next ARR proposals.

Discoms' response:

East Discom: It is submitted that compliance of the said directive has already been done by the Company, and this has been recorded in the Tariff Order.

West Discom: It is submitted that the Discom is implementing R-APDRP project, in which M/s TCS is developing a billing soft ware. However , in the revenue model these details have been provided.

Central Discom: It is submitted that the Discom has complied with the Commission's directive by incorporating the details of rebate, surcharge and other requisite details in their submission in soft copy.

Commission's observations/ directions: The Discoms are directed to continue to compile the requisite details in respect of HT consumers and submit with their next ARR/ tariff proposal. They should also collect and submit the details in respect of LT consumers.

8.11 Maintaining uniform accounts:

Commission's Directives:

The Commission is not satisfied with the response and would like Discoms to bring parity in maintaining the accounts at an early date.

Discoms' response:

East Discom: It is submitted that the efforts towards compliance of directives are being taken.

West Discom: It is submitted that though a Company was incorporated on 31st May, 2002, however, the commercial operations commenced from 1st June 2005 pursuant to the Government of Madhya Pradesh Notification no. 226 dated 31st May, 2005. It is submitted that Schedule VI to the Companies Act, 1956 provides the manner in which every Company shall prepare its Balance Sheet, Statement of Profit and Loss and notes thereto, which stands revised vide notification dated 30th March, 2011. It is stated that the requirements of the Revised Schedule VI, do not apply to companies as referred to in the proviso to Section 211 (1) and Section 211 (2) of the Companies Act, i.e., any insurance or banking company, or any company engaged in the generation or supply of electricity or to any other class of company for which a form of Balance Sheet and Profit and Loss account has been specified in or under any other Act governing such class of company. It further submitted that the guidance note issued by Institute of Chartered Accountants of India has clarified that for companies engaged in the generation and supply of electricity, neither the Electricity Act, 2003, nor the rules framed there under, prescribe any specific format for presentation of Financial Statements by an electricity company. It is also stated that Section 616(c) of the Companies Act states that the Companies Act will apply to electricity companies, to the extent it is not contrary to the requirements of the Electricity Act, 2003.

It is submitted that in view of this, revised Schedule VI may be followed by such companies till the time any other format is prescribed by the relevant statute. It is also clarified that as such, the financial statements are being prepared as per revised Schedule VI of the Companies Act 1956, this ensure uniform presentations in the accounts of all Discoms from the FY 2011-12 onwards. It is submitted that the company prepares its Financial Statements under historical cost basis in accordance with Generally Accepted Accounting Principles (GAAP) and the Accounting Standards as notified by the Companies (Accounting Standard) Rules, 2006.

It is also submitted that Enterprise Resource Planning (ERP) project of MPPKVCL, Indore is proposed for procurement, customization, implementation and subsequent support of ERP application systems for Finance, HR, Material Management and Project Management modules are in scope of implementation, and this ERP implementation will ensure best accounting practices and regulatory compliance.

Central Discom: It is submitted that the ERP program which covers the accounting part is in progress, and maintaining of uniform accounts will be implemented after completion of such ERP program.

Commission's observations/ directions: The Commission reiterates that Discoms should bring about uniformity in maintaining the accounts at an early date. MPPMCL which is the holding Company of all the Discoms is directed to coordinate with the Discoms to bring about such uniformity.

8.12 Compliance of Regulations:

Commission's Directives:

The Commission in Tariff Order for FY 2011-12 had issued directives which reads as *'The Commission directs that in future the petition be filed strictly in accordance with provisions of the regulations and if a Licensee wishes to draw the attention on some specific issues, it can be done through additional submissions in the petition.'* After analyzing the response the Commission in Tariff Order for FY 2012-13 had observed that *'The compliance of the directives should be maintained in future also.'*

Discoms' response:

East Discom: It is submitted that the instant Petition is according to the provisions of the prevailing Regulations of the MPERC.

West Discom: It is submitted that Discom is committed to adhere to directives issued by the Commission.

Central Discom: It is submitted that the Petition has been filed in accordance with the provisions of the Regulations.

Commission's observations/ directions: The compliance of the directives should be maintained in future also.

8.13 Mandatory demand based tariff for all Non-domestic LV consumers having load in excess of 25 HP

Commission's Directives:

The Commission in Tariff Order for FY 2011-12 had issued directives which reads as *The Commission intends to introduce mandatory demand based tariff for all Non-domestic LV consumers from 2012-13 having load in excess of 25 HP. The Discoms are directed to ensure that meters having features to record the maximum demand be installed on all such connections and report compliance.* After analyzing the response the Commission in Tariff Order for FY 2012-13 had observed the *'The compliance of the directives is yet to be done by the Central and West Discom. They are directed to comply this directive in FY 2012-13.'*

Discoms' response:

East Discom: It is submitted that directives issued is not applicable to it.

West Discom: It is submitted that meters having features to record the maximum

demand have been installed on the consumers of non-domestic category having connected load above 25 HP.

Central Discom: It is submitted that all the high value LT consumers having connected load in excess of 25 H.P. are being provided with A.M.R. meters. Further, for this contract has been awarded to two different contractors. It also submitted the status of AMR as on 30th November, 2012, which is produced below:

Region	AMR Points	Installation	Downloading of MRD file	Generation of Bill
Bhopal	4560	4061	3129	2601
Gwalior	3834	3820	1997	1239

Commission’s observations/ directions:

The Commission directs the Central Discom to expedite the installation of AMR meters on remaining installations.

8.14 Removal of ceiling on connected load in LT demand based tariff

Commission’s Directives:

The Commission has not considered the removal of ceiling on connected load in case of demand based tariff LT consumers for reasons explained in this Order in the Chapter on “Public objections and comments on licensees’ petitions”. However, the Commission directs that the compliance with regard to installation of AMR metering on all LT connections having demand based tariff having load in excess of 25 HP be ensured during FY 2012-13.

Discoms’ response:

East Discom: It submitted the present status in respect of LT High Value consumers, which is produced below:

Region	Meter Read by AMR/MRI	Meters read by A2Z (AMR/MRI)	Total Meters read
Jabalpur	2225	570	2795
Sagar	832	148	980
Rewa	1168	146	1314
TOTAL	4225	864	5089

West Discom: It is submitted that the Company has created a separate Cell ‘MT-2’ under the leadership of a SE rank Officer to deal with the AMR metering. It further submitted that the progress of LT AMR metering, which is produced below:

LIST OF AMR CONDUCTED OF LT METERS												
Sr. No	Circle Name	Total No. of Meters	No. of Meters provided by Circles	Balance Meters where Modems are to be provided	AMR Done							
					Apr-12	May-12	Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12
1	Indore	4223	4173	50	3305	3342	3347	3201	3128	3140	3191	3112
2	Indore O & M	1008	1008	0	786	773	647	742	735	786	789	796
3	Dhar	215	55	160	0	0	0	0	0	0	0	0
4	Khandwa	201	161	40	55	99	97	83	85	55	43	69
5	Burhanpur	138	98	40	20	59	76	78	73	79	75	56
6	Khargone	224	214	10	83	80	79	80	125	123	125	92
7	Barwani	268	103	165	0	0	0	0	0	0	0	0
8	Jhabua	75	45	30	21	28	23	22	21	19	20	17
9	Ujjain	946	725	221	191	195	189	186	176	160	198	199
10	Dewas	401	292	109	176	191	183	194	209	187	170	189
11	Shajapur	279	239	40	93	102	91	94	133	136	85	83
12	Ratlam	553	519	34	343	331	318	347	338	323	273	271
13	Mandsour	315	291	24	103	107	101	116	120	108	108	116
14	Neemuch	422	395	27	87	100	100	107	111	100	100	100
Total		9268	8318	950	5263	5407	5251	5250	5254	5216	5177	5100
% AMR Done					63	65	63	63	63	63	62	61

Central Discom: It is submitted that the AMR status of LT high value consumers as on 30th November, 2012 has already been covered /submitted under point no.13 above.

Commission's observations/ directions: In a meeting held with the MDs of the Discoms and the MPPMCL on 5th Feb, 2013, the Discoms informed that they have provided AMR meters on consumers to whom the demand based tariff is applicable and the contract demand is in excess of 25 HP. The Commission has dealt with this issue suitably in the chapter on Tariff Design.

FRESH DIRECTIVES

8.15 Payment of interest on consumer security deposit

Commission's observations/ directions:

During public hearings on the petition, some of the consumers have raised the issue that the petitioners are not paying interest on consumer security deposit at the bank rate as specified in the Regulations. The Commission directs Discoms to ensure that the payment of interest on consumer security deposit be strictly made in accordance with the stipulations of the Regulations.

8.16 Assessment consumption for billing to consumers:

Commission's observations/ directions:

During public hearings on the petition, some of the consumers have raised the issue that the petitioners are issuing the bills on assessed consumption even if the meter is working correctly and there is no evidence of any malpractice or theft. The Supply Code, 2004 (as amended) provides for billing in case of defective/ dysfunctional meters is reproduced below:

“9.17. In order to recover the energy charges for the duration when the meter remains dysfunctional, average monthly consumption of previous three meter reading cycles shall be the basis of billing. In case a check-meter is available, the readings of the meter may also be used for assessment of consumption. In case of HT consumers if during the period when the main meter is defective, the check meter is not installed or is also found defective, the quantity of electricity supplied shall be determined as stated above; provided that if in the opinion of the licensee, the conditions in the consumer’s installation during the month in question were such as to render billing on such average consumption not equitable either to the consumer or to the licensee, the electricity supplied during such period shall be determined by the in charge of the local area circle of the licensee. In the event of the consumer not being satisfied with such determination, he may appeal to the in charge of the local Region of the licensee whose decision shall normally be acceptable.”

The Supply code also provides for method of assessment of charges in case of theft of electricity.

The Commission has taken serious note of this practice. The Commission directs Discoms that unless the meter is found defective/ dysfunctional or tampered or evidence of theft of energy in the premises is established, no consumer should be billed on the basis of any kind of assessment of consumption other than the consumption that is recorded in the meter. The Commission directs the Discoms to submit compliance report on this directive within a month from the date of issue this order.

Annexure-1 (List of Objectors)

<u>LIST OF OBJECTORS OF EAST DISCOM</u>	
Sr. No.	Name and address of the Objector
1	Shri Lilamber Patel, Advocate, L-41, Housing Board Colony, Narsinghpur
2	Shri Ramesh Patel, Adhyaksh, Bhartiya Kisan Union, Teh. Sihora, Dist. Jabalpur
3	Shri Sushil Kumar Rai, Gram Post Teh. Badwara, Dist. Katni
4	Shri Rajnarayan Bharadwaj, Plot No. 453, Opp. Patel Atta Chakki, Sanjivani Nagar, Gadha, Jabalpur
5	Shri Shashank Dubey, 9, Brahpuri Colony, MGM School ke Pas, Hathital, Jabalpur
6	Shri D.R. Jeswani, General Secretary, M/s. Mahakoshal Udyog Sangh, Industrial Area, Richhai, Jabalpur 482010
7	M/s. HJI-Division of Orient Paper Mills, P.O. Amlai Paper Mills – 484117 Dist. Anuppur
8	M/s. Prism Cement Ltd., Manakahari, Satna
9	Shri P.G. Najpandey, M/s. Nagrik Upbhokta Margdarshak Manch, 6/47, Ramnagar, Aadhartal, Jabalpur
10	Shri Pawan Kumar Jain, Madhya Pradesh Vidyut Mandal Abhiyanta Sangh, Shade No. 13, Vidyut Nagar, P.O. Rampur, Jabalpur
11	Shri Y.K. Shilpkar, M.P. Vidyut Mandal Aarkshit varg Adhikari/Karmchari Sangh, ND 2, MPSEB, Colony, Rampur, Jabalpur
12	Shri H.P.Agrawal, Chief Electrical Distribution Engineer, West Central Railway, Indira Market, G.M. Office, Jabalpur 482001
13	M/s. Jabalpur Entertainment Complexes Pvt. Ltd., South Avenue Mall, Adjoining Perfect Pottery, Narmada Road, Jabalpur
14	Shri Shankar Nagdeo, and Shri Ravi Gupta, M/s. Mahakoshal Chamber of Commerce and Industry, Chamber Bhawan, Civic Centre, Marhatal, Jabalpur 482002
15	Shri Subhash Chandra, Adhyaksh, M/s. Citigen Welfare Association, Jabalpur
16	Shri Shivanand Pandey, Advocate, Jabalpur
17	Shri Vijay Jain, M/s. MP Bijli Karmchari Mahasangh, Jabalpur
18	Shri Lalit Sen, Shikshak Sangh, Jabalpur
19	Shri R.S Saxena, M.P. Vidyut Mandal, Vahan Chalak Parichalak Sangh, Sambadh Janta Union, Jabalpur (M.P)

<u>LIST OF OBJECTORS OF WEST DISCOM</u>	
Sr. No.	Name and address of the Objector
1	Shri Kailash Yadav, Kshipra Upbhokta Sangrakshan Samiti, 17, Durga Colony, Ankpat Marg,Ujjain
2	Shri Arvind Bagdi, Parshad Ward No.52, 30, Shradhanand Marg, Chhawani, Sanyogita Ganj, Indore.
3	Shri Indra Singh Chouhan, Gram Post Kharwa, Teh. Pandhana, Dist. Poorv Nimad, Khandwa
4	Shri Praveen Kumar Jain, Jaipur and Bikaner Bank ke Samne, 23/2, Shankumarg Freeganj, Ujjain
5	Shri S.M. Jain, M/s. All India Induction Furnaces M.P. Chapter, C/o. Venus Alloys Pvt. Ltd., 67, Industrial Area, Mandsaur - 458001 (M.P.)
6	Shri S.M. Jain, M/s. Venus Alloys Pvt. Ltd., 67, Industrial Area, Mandsaur - 458001 (M.P.)
7	M/s. Moira Steels Limited, Vill. Sejwaya, Ghatabillod, Dist. Dhar, M.P.
8	Shri Pankaj Bansal, M/s. Shivangi Rolling Mills Pvt Ltd. 16/9, Race Course Road, Tongia Compound, Indore
9	M/s. Jaideep Ispat and Alloys Pvt. Ltd., 103, Laxmi Tower, M.G.Road, Indore
10	Shri Ravindra Singh Narang, M/s. Sardar Ispat Pvt. Ltd., Tejpur, Gadbad Bridge, A.B. Road, Indore - 452012.
11	M/s. Bharti Ingots Pvt. Ltd., Plot No. 808-F, Sect-III, Pithampur, Dist. Dhar
12	Dr. Gautam Kothari, Rashtrakshetra Karmanishtha Sangh "Rakshak", 231, Saket Nagar, Indore - 452018
13	Shri Ravi Jhavar, M/s. United Metals (India), 42, Shilnath Camp, Indore-452003.
14	M/s. Shreeyam Power and Steel Industires Ltd., Shree Mahadeo House, 10/2, South Tukoganj, Indore
15	Dr. Gautam Kothari, M/s. Electricity Consumers Society, C/o. AIMO (MPSB), Industrial Estate, Pologround, Indore
16	Shri Mahesh Mittal, M/s. All India Manufacturers Organisation, Industrial Estate, Pologround, Indore - 452015
17	Shri M.C. Rawat, The Madhya Pradesh Textile Mills Association, Jal Sabhagrah, 56/1, South Tukoganj, Indore - 452001
18	M/s. Grasim Industries Ltd., Birlagram, Nagda - 456331
19	Shri Sanjay Jain, Divisional Manager- Plant Engineering, M/s Kirloskar Brothers Ltd., Behind Railway Station, Dewas - 455001

20	Shri Dharmendra Salgiya, M/s. Indira Securities P.Ltd., 28/2, Old Palasiya, Shop No. 104-105, Amar darshan Apartment, Indore
21	Shri R.S. Goyal, 51 Prakash Nagar, Newawar Road, Indore
22	Shri B.L. Jajoo, President, M/s. MP Cold Storage, 115-B, Industrial State, Pologround, Indore
23	Shri Satish Sood, M/s Oasis Distilleries Ltd., H-102, B-2, Metro Towers, Vijay Nagar, Indore-10
24	Shri Dilip Jain, M/S Mahavir Cot Fibers, Pansemal Khetia Road, Khatia, Tahsil Pansemal, Dist. Barwani.
25	Shri Ashok Badjatiya, M/s. Association of Industries Madhya Pradesh, Udyog Bhavan, Industrial Estate, Pologround, Indore-452 015
26	M/s. Agroha Enterprises P. Ltd., 374/2, Dhanlaxmi Udyog Nagar, Musakhedi, Nemawar Road, Indore
27	Shri Manish Shrimali, M/s. Tirupati Fibers, Julwania Road, Khargone.
28	Shri Pawan Goyal, M/s. Pawan Cotton Industries, Verla Road, Sendhwa Dist. Barwani
29	Shri Manjit Chawala, M/s. Harman Cotex, Bistan Road, Opp. Dejla Dewada Colony, Khargone - 451001.
30	Shri Kailash Khandelwal, M/s. M.P. Cotton Processors and Traders Association, C/o Vikas Cot Fiber Pvt. Ltd., Verla Road Sendhwa, Dist. Barwani
31	Shri Kailashchand Khandelwal, M/s. Sendhwa Cotton Association, C/o Vikas Cot Fiber Pvt. Ltd., Verla Road Sendhwa, Dist. Barwani
32	Shri Manjit Singh Chawala, Adhyaksh, Mandi Vyapari Sangh, Vyapari Vishranti Bhawan, Krishi Upaj Mandi Parisar, Bistan Road, Khargone, Dist. Khargone- 451001
33	Shri M.V. Bhale, M/s. Dewas Varishtha Nagrik Sanstha, Varishtha Nagrik Sanstha Bhawan, Dewas - 455001
34	M/s. Dhanalaxmi Solvex Pvt. Ltd., Shajapur
35	M/s. Dhanalaxmi Solvex Pvt. Ltd., A.B. Road, Dewas
36	M/s. Pooja Soya Industries Pvt Ltd, 201, Bansi Plaza, 581, M.G. Road, Indore- 452001
37	Shri Ashok Khandelia, M/s. Association Industries, Dewas, 1/B/1, 1/B/2 A I.S. Gajra Industrial Area No.1, A.B. Road, Dewas
38	M/s. Masand Agro Equipment Pvt. Ltd., 70, Shastri Market, Indore
39	Shri Ramnarayan Sharma, President, Varisth Nagrik Manch, Prakash Nagar, 37, Prakash Nagar, Indore
40	Shri Kamalesh Goyal, M/s. Shivmoti Nagar Rahvasi Sangh, Shiv Moti Nagar, Mandir Parisar, Nemawar Road, Indore
41	Shri Gopal Bansal M/s. Agrawal Parisad (Reg.) Indore, 18, Vabhav Chamber 1st Floor, 7/1, Usha Ganj, Indore
42	M/s. Divya Jyoti Industries Ltd., 92/3, Sapna Sangita Main Road, Indore - 452001

43	M/s. Kasyap Sweetners Limited, Chetanya Gram, Badnawar, Distt. Dhar - 454660
44	Shri Sanjay Kumar Agrawal, M/s. Upbhokta Hit Prahari, 970, Manak Chowk, Mhow, Indore
45	Shri Sushil Sharma, Shri Umesh Tiwari, Prantiya Mahamantri, Vidyut Mandal Karmachari Union M.P., 197, K Sector, A Scheme No.71, Gumasta Nagar, Main Road, Indore
46	Shri S.K.Upadhyaya, Dy. GM (Elect.), MOIL, Nagpur
47	Shri Narendra Singh Yadav, Zila Mahamantri Congress Committee, 157 LIG, Vikash Nagar, Dewas
48	Shri D.B. Singh, M/s. Idea Cellular Ltd., 139-140 Electronics Complex, Pardeshipura, Indore
49	Shri Kalyan Mundra, Adhyaksh, Rashtriya Upbhokta Parishad, Indore
50	Shri Shankarlal Rathore, EE, Water Resources Division, Old Palasiya, Indore
51	M/s. National Steel and Agro Industries Ltd. , 401, Mahakosh House, 7/5, South Tukogang, Nath Mandir Road, Indore

<u>LIST OF OBJECTORS OF CENTRAL DISCOM</u>	
Sr. No.	Name and Address of the Objector
1	M/s. Shree Golden City Welfare and Maintenance Cooperative Society Ltd. 13, Shree Golden City Jatkhedi, Hoshangabad Road, Bhopal
2	Shri N K Jain, B-6, Alkapuri, Habibganj, Bhopal
3	Shri Din Dayal, Advocate, B-7, Alkapuri, Habibganj, Bhopal
4	Shri Hari Shankar Sahu and Smt. Sarika Sahu, C-17 Nehru Nagar, Bhopal 462003
5	Shri Rajeev Koshal, M/s. Govindpura Industries Association, Association Complex, Industrial Area, Govindpura, Bhopal 462023
6	Shri I.C. Jindal, M/s. Magnum Iron and Steel Pvt. Ltd. A-4, Industrial Area Banmore, Dist. Morena
7	Shri K.N. Mathur, M/s. HEG Limited (Graphite Division), Mandideep, Dist. Raisen
8	Shri S. Pal, Chief Executive, M/s. Anant Spinning Mills, Mandideep, Dist. Raisen
9	Shri V.D. Dubey, M/s. Upbhokta and Manavadhikar Manch, Bhind
10	Shri Ashish Upadhyay, Addl. Commissioner, Adivasi Vikash, Madhya Pradesh
11	Shri D.R. Tanwar, W.R.D. Surbhi Velly, Duplex No. 3 Near Rishi Velly, Vaishali Nagar, Bhopal
12	Shri K.S. Parihar, Director, BLA Power Ltd., Mumbai
13	Shri U.C. Dafal, House Owners Association, Bhopal
14	Shri Kamal Rathi, E-2/48 Arera Colony, Bhopal
15	Sayed Abdul Hussan and Shri Poojan Singh, Advocate, Bhopal
16	Shri Vikramaditya Sharma, Bhopal
17	Shri Suhas Virani, Secretary, Bhopal Hostel Owner's Association, C/o Vindhyashree Girls Hostel, 50, Zone-II, MP Nagar, Bhopal- 462011
18	Shri Vikas Virani, A-66, Shahapura, Bhopal
19	Shri Sanjay Tripathi, Viom Network 162, Modi Heights, 1st and 2nd Floor, Near PF Office, MP Nagar, Zone-II, Bhopal
20	Shri Abhay Dubey (Spokesperson), Shri P.C. Sharma (President, City Congress) and Shri Yogendra Guddu Chouhan (Spokesperson, City Congress), M.P Congress Committee, Indira Bhawan, Shivaji Nagar, Bhopal- 462016

TARIFF SCHEDULES

Annexure-2 (Tariff Schedules for Low Tension Consumers)

**ANNEXURE TO THE TARIFF ORDER PASSED BY MPERC FOR
FINANCIAL YEAR 2013-14**

**MADHYA PRADESH ELECTRICITY REGULATORY COMMISSION
TARIFF SCHEDULES FOR LOW TENSION CONSUMERS**

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Tariff Schedule- LV-1**DOMESTIC:****Applicability:**

This tariff is applicable for light, fan and power for residential use only. Dharamshalas, old age houses, rescue houses, orphanages, places of worship and religious institutions will also be covered under this category.

Tariff:

LV 1.1 (Consumers having sanctioned load not more than 100 watts (0.1 kW) and consumption not more than 30 units per month)

(a) **Energy Charge and Fixed Charge** – For metered connection

Monthly Consumption (units)	Energy Charge (paise per unit) Urban/ Rural areas	Monthly Fixed Charge (Rs.)
Up to 30 units	290	NIL

(b) **Minimum Charges:** Rs. 40 per connection per month as minimum charges is applicable to this category of consumers.

LV 1.2

(i) **Energy Charge and Fixed Charge** – For metered connection

Monthly Consumption Slab (units)	Energy Charge with telescopic benefit (paise per unit) Urban/ Rural areas	Monthly Fixed Charge (Rs.)	
		Urban areas	Rural areas
Up to 50 units	340	40 per connection	25 per connection
51 to 100 units	385	65 per connection	40 per connection

Monthly Consumption Slab (units)	Energy Charge with telescopic benefit (paise per unit) Urban/ Rural areas	Monthly Fixed Charge (Rs.)	
101 to 300 units	480	75 for each 0.5 kW of authorised load	50 for each 0.5 kW of authorised load
301 to 500 units	520	80 for each 0.5 kW of authorised load	70 for each 0.5 kW of authorised load
Above 500 units	555	85 for each 0.5 kW of authorised load	70 for each 0.5 kW of authorised load

Minimum Charges: Rs. 60 per connection per month as minimum charges towards energy charges are applicable for above categories.

Note: The Authorized Load shall be as defined in the Madhya Pradesh Electricity Supply Code, 2004, as amended from time to time. (Every 75 units of consumption per month or part thereof shall be considered equal to 0.5 kW of authorised load. Example: If consumption during the month is 125 units, then the authorised load will be taken as 1 kW. In case the consumption is 350 units then the authorised load will be taken as 2.5 kW.)

Temporary/ DTR meter connection	Energy Charge (paise per unit) Urban/ Rural areas	Monthly Fixed Charge (Rs.)	
		Urban areas	Rural areas
Temporary connection for construction of own house (max. up to one year).	675	300 for each one kW of sanctioned or connected or recorded load, whichever is the highest	200 for each one kW of sanctioned or connected or recorded load, whichever is the highest

Temporary/ DTR meter connection	Energy Charge (paise per unit) Urban/ Rural areas	Monthly Fixed Charge (Rs.)	
		Urban areas	Rural areas
Temporary connection for social/ marriage purposes and religious functions.	675	40 for each 1 kW of sanctioned or connected or recorded load, whichever is highest, for each 24 hours duration or part thereof.	20 for each 1 kW of sanctioned or connected or recorded load, whichever is highest, for each 24 hours duration or part thereof.
Supply through DTR meter for clusters of Jhuggi/Jhopadi till individual meters are provided	300	NIL	NIL

Minimum Charges: Rs. 500/- per connection per month is applicable towards energy charges for temporary connection and no minimum charges are applicable for supply through DTR meter for clusters of Jhuggi/Jhopadi.

(ii) Energy Charge and Fixed Charge for un-metered domestic connections:

Particulars	Units and Energy Charge to be billed per month for unmetered connections (paise per unit)	Monthly Fixed Charge (Rs.)
Un-metered connection in urban areas	100 units @ 420 per unit	75 per connection
Un-metered connection in rural areas	55 units @ 340 per unit	30 per connection

Minimum charges: No minimum charges are applicable to this category of consumers

Specific Terms and Conditions for LV-1 category:

- a) The Energy Charges corresponding to consumption recorded in DTR meter shall be equally divided amongst all consumers connected to that DTR for the purpose of billing. The Distribution Licensee will obtain consent of such consumers for billing as per above procedure.
- b) In case Energy Charges for actual consumption are less than minimum charges, minimum charges shall be billed towards energy charges. All other charges, as applicable, shall also be billed.
- c) Other terms and conditions shall be as specified under General Terms and Conditions for Low Tension Tariff.

Tariff Schedule – LV-2**NON-DOMESTIC:****LV 2.1****Applicability:**

This tariff is applicable for light, fan and power to Educational Institutions including workshops and laboratories of Engineering Colleges / Polytechnics/ITIs (which are registered with /affiliated/ recognized by the relevant Govt. body or university), Hostels for students or working women or sports persons (run either by Govt. or individuals)

Tariff:

Tariff shall be as given in the following table:

Sub category	Energy Charge (paise/unit) Urban/ Rural areas	Monthly Fixed Charge (Rs.)	
		Urban areas	Rural areas
Sanctioned load based tariff (only for connected load up to 20 kW)	520	90 per kW	60 per kW
Optional -Demand based Tariff (Only for contract demand above 10 kW and up to 20 kW)	520	180 per kW or 144 per kVA of billing demand	120 per kW or 96 per kVA of billing demand
Mandatory demand based tariff for contract demand above 20 kW	520	180 per kW or 144 per kVA of billing demand	120 per kW or 96 per kVA of billing demand

LV 2.2**Applicability:**

This tariff is applicable for light, fan and power to Railways (for purposes other than traction and supply to Railway Colonies/water supply), Shops/showrooms, Parlours, All Offices, Hospitals and medical care facilities including Primary Health Centers, clinics, nursing homes belonging to either Govt. or public or private organisations, public buildings, guest houses, Circuit Houses, Government Rest Houses, X-ray plant, recognized Small Scale Service Institutions, clubs, restaurants, eating establishments, meeting halls, places of public entertainment, circus shows, hotels, cinemas, professional's chambers (like Advocates, Chartered Accountants, Consultants, Doctors etc.), bottling plants, marriage gardens, marriage houses, advertisement services, advertisement boards/ hoardings, training or coaching institutes, petrol pumps and service stations, tailoring shops, laundries, gymnasiums, health clubs, telecom

towers for mobile communication and any other establishment (except those which are covered in LV 2.1), who is required to pay Commercial tax/service tax/value added tax (VAT)/entertainment tax/luxury tax under any Central/State Acts.

Tariff:

Tariff shall be as given in the following table:

Sub category	Energy Charge (paise/unit) Urban/ Rural areas	Monthly Fixed Charge (Rs.)	
		Urban areas	Rural areas
On all units if monthly consumption is not more than 50 units	540	50 per kW	30 per kW
On all units in case monthly consumption exceeds 50 units	600	85 per kW	60 per kW
Optional demand based Tariff (only for contract demand above 10 kW and up to 20 kW)	525	190 per kW or 152 per kVA of billing demand	120 per kW or 96 per kVA of billing demand
Mandatory demand based tariff for Contract demand above 20 kW	525	190 per kW or 152 per kVA of billing demand	120 per kW or 96 per kVA of billing demand
Temporary connections including Multi point temporary connection at LT for Mela*	715	130 per kW or part thereof of sanctioned or connected or recorded load, whichever is the highest	85 per kW or part thereof of sanctioned or connected or recorded load whichever is the highest

Sub category	Energy Charge (paise/unit) Urban/ Rural areas	Fixed Charges (Rs.)	
		Urban areas	Rural areas
Temporary connection for marriage purposes at marriage gardens or marriage halls or any other premises covered under LV 2.1 and 2.2 categories	715 (Minimum consumption charges shall be billed @ 6 Units per kW or part thereof of sanctioned or connected or recorded load, whichever is the highest for each 24 hours duration or part thereof subject to a minimum of Rs.500/-)	50 for each kW or part thereof of sanctioned or connected or recorded load, whichever is the highest for each 24 hours duration or part thereof	30 for each kW or part thereof of sanctioned or connected or recorded load, whichever is the highest for each 24 hours duration or part thereof
For X-Ray plant	Additional Fixed Charge (Rs. per machine per month)		
Single Phase	450		
Three Phase	650		
Dental X-ray machine	50		

* In case permission for organizing Mela is granted by Competent Authorities of the Government of Madhya Pradesh.

Specific Terms and Conditions for LV-2 category:

- a) **Minimum consumption:** The consumer shall guarantee a minimum annual consumption of 360 units per kW or part thereof in urban areas and 180 units per kW or part thereof in rural areas of **sanctioned load or contract demand (in case of demand based charges)** . However, the load of X-Ray unit shall be excluded while considering the load of the consumer for calculation of minimum consumption. The method of billing minimum consumption shall be as given in General Terms and Conditions of Low Tension tariff.
- b) **Additional Charge for Excess demand:** Shall be billed as given in General Terms and Conditions of Low Tension tariff.

- c) **Rebate in Energy Charges for connection of Telecom Infra Structure situated in rural areas:** In order to give impetus to proliferation of telecommunication services in the rural areas in the State, a rebate of paisa 25 per unit in energy charges shall be given to the connections of mobile communication towers situated in rural areas.
- d) Other terms and conditions shall be as specified under General Terms and Conditions of Low Tension Tariff.
- e) For LV-1 and LV-2: Any consumer having contract demand of 10 kW or more and upto 20 kW may opt for demand based Tariff, however, for the consumers having contract demand in excess of 20 kW demand based tariff is mandatory. The Distribution Licensee shall provide Trivector /Biverctor Meter capable of recording Demand in kVA/kW, kWh, kVAh.

Tariff Schedule – LV-3**PUBLIC WATER WORKS AND STREET LIGHTS****Applicability:**

The tariff **LV-3.1** is applicable for Public Utility Water Supply Schemes, Sewage Treatment Plants, Sewage Pumping Installations run by P.H.E. Department or Local Bodies or Gram Panchayats or any other organization authorised by the Government to supply/ maintain public water works / sewerage installations and shall also be applicable to electric crematorium maintained by local bodies/trusts.

Note: Private water supply scheme, water supply schemes run by institutions for their own use/employees/townships etc. shall not fall in this category. These shall be billed under the appropriate tariff category to which such institution belongs. In case water supply is being used for two or more different purposes then entire consumption shall be billed for purpose for which the tariff is higher.

The tariff **LV-3.2** is applicable to traffic signals and lighting of public streets or public places including parks, town halls, monuments and its institutions, museums, public toilets, public libraries, reading rooms run by the Government or Local Bodies, and Sulabh Shochalaya.

Tariff:

Category of consumers/area of applicability	Energy Charge (paise per unit)	Monthly Fixed Charge (Rs. per kW)	Minimum Charges (Rs)
LV 3.1 Public Water Works			
Municipal Corporation/ Cantonment board	365	140	No Minimum Charges
Municipality/ Nagar Panchayat	365	120	
Gram Panchayat	365	50	
Temporary supply	1.3 times the applicable tariff		
LV 3.2 Street light			
Municipal Corporation/ Cantonment board	380	235	No Minimum Charges
Municipality/ Nagar Panchayat	375	210	
Gram Panchayat	375	50	

Specific Terms and Conditions for LV-3 category:

(a) Incentives for adopting Demand Side Management:

An **incentive** equal to 5 % of Energy Charges shall be given on installation and use of energy saving devices (such as ISI energy efficient motors for pump sets and programmable on-off/ dimmer switch with automation for street lights). **Incentive** will be admissible only if full bill is paid within due dates failing which all consumed units will be charged at normal rates. Such incentive will be admissible from the month following the month in which energy saving devices are put to use and are verified by a person authorized by the Distribution Licensee. This incentive will continue to be allowed till such time these energy saving devices remain in service. The Distribution Licensee is required to arrange wide publicity of above incentive.

(b) Other terms and conditions shall be as specified under General Terms and Conditions of Low Tension Tariff.

Tariff Schedule – LV-4**LT INDUSTRIAL****Applicability:**

Tariff LV-4 is applicable to light, fan and power for operating equipment used by printing press and any other industrial establishments and workshops (where any processing or manufacturing takes place including tyre re-treading). These tariffs are also applicable to cold storage, gur (jaggery) making machines, flour mills, Masala Chakkies, hullers, khandsari units, ginning and pressing units, sugar cane crushers (including sugar cane juicing machine), power looms, dal mills, besan mills, and ice factories and any other manufacturing or processing units (excluding bottling plant) producing/processing food items or processing agriculture produce for preservation/increasing its shelf life and Dairy units (where milk is processed to produce other end products of milk other than chilling, pasteurization etc.)

Tariff:

	Category of consumers	Monthly Fixed Charge (Rs.)		Energy Charge (paise per unit) – Urban / Rural Area
		Urban Areas	Rural Areas	
4.1	Non seasonal consumers			
4.1 a	LT industries having connected load up to 25 HP	90 per HP	30 per HP	400
4.1b	Demand based tariff (Contract demand up to 100HP)	220 per kW or 176 per kVA of billing demand	110 per kW or 88 per kVA of billing demand	520
4.1 c	Demand based tariff (Contract demand more than 100 HP and up to 150 HP) *	300 per kW or 240 per kVA of billing demand	210 per kW or 168 per kVA of billing demand	535

	Category of consumers	Monthly Fixed Charge (Rs.)		Energy Charge (paise per unit) – Urban / Rural Area
		Urban Areas	Rural Areas	
4.1 d	Temporary connection	1.3 times of the applicable tariff		
*In addition, these consumers are also liable to pay transformation loss @ 3% and transformer rent as per the MPERC (Recovery of Expenses and other Charges for providing Electric Line or Plant for the purpose of giving supply) Regulations (Revision-I), 2009.				
4.2 Seasonal Consumers (period of season shall not exceed 180 days continuously). If the declared season or off-season spreads over two tariff periods, then the tariff for the respective period shall be applicable.				
4.2 a	During season	Normal tariff as for Non seasonal consumers	Normal tariff as for Non seasonal consumers	Normal tariff as for Non seasonal consumers
4.2 b	During Off -season	Normal tariff as for Non-seasonal consumers on 10 % of contract demand or actual recorded demand, whichever is more	Normal tariff as for Non-seasonal consumers on 10 % of contract demand or actual recorded demand, whichever is more	120 % of normal tariff as for Non-seasonal consumers

Terms and Conditions:

- (a) The maximum demand of the consumer in each month shall be reckoned as four times the largest amount of kilovolt ampere hours delivered at the point of supply of the consumer during any continuous fifteen minutes in that month.
- (b) Any consumer may opt for demand based tariff, however for the consumers having connected load **above 25 HP** , demand based tariff is mandatory and the licensee shall provide Tri vector/ Bi vector Meter capable of recording Demand in kVA/ kW, kWh, kVAh and Time of Use consumption
- (c) **Minimum Consumption:** Shall be as per following:

(c.1) For connected load up to 100HP

- i. **For LT Industries in rural areas:** The consumer shall guarantee a minimum annual consumption (kWh) based on 180 units per HP or part thereof of contract demand irrespective of whether any energy is consumed or not during the year.
- ii. **For LT Industries in urban areas:** The consumer shall guarantee a minimum annual consumption (kWh) based on 360 units per HP or part

thereof of contract demand irrespective of whether any energy is consumed or not during the year.

- iii. The consumer shall be billed monthly minimum 15 units per HP per month in rural area and 30 units per HP per month in urban area in case the actual consumption is less than above specified units.
- iv. Method of billing of minimum consumption shall be as given in the General Terms and Conditions of Low Tension tariff.

(c.2) For connected load more than 100HP

- i. **For LT Industries in rural areas:** The consumer shall guarantee a minimum annual consumption (kWh) based on 240 units per HP or part thereof of contract demand irrespective of whether any energy is consumed or not during the year.
 - ii. **For LT Industries in urban areas:** The consumer shall guarantee a minimum annual consumption (kWh) based on 480 units per HP or part thereof of contract demand irrespective of whether any energy is consumed or not during the year.
 - iii. The consumer shall be billed monthly minimum 20 units per HP per month or part thereof of contract demand in rural area and 40 units per HP per month or part thereof of contract demand in urban area in case the actual consumption is less than above specified units.
 - iv. **Method of billing of minimum consumption** shall be as given in the General Terms and Conditions of Low Tension Tariff.
- (d) **Additional Charge for Excess Demand:** Shall be billed as given in the General Terms and Conditions of Low Tension Tariff.
- (e) Other terms and conditions shall be as specified under General Terms and Conditions of Low Tension Tariff.
- (f) Other Terms and conditions for **seasonal consumers:**
- i. The consumer has to declare months of season and off season for the financial year 2013-14 within 60 days of issue of Tariff Order and inform the same to the Distribution Licensee. If the consumer has already declared the period of season and off-season during this financial year prior to issue of this Order, same shall be taken into cognizance for the purpose and accepted by the Distribution Licensee.
 - ii. The seasonal period once declared by the consumer cannot be changed during the financial year.

- iii. This tariff is not applicable to composite units having seasonal and other category of loads.
 - iv. The consumer will be required to restrict his monthly off season consumption to 15% of the highest of average monthly consumption during the preceding three seasons. In case this limit is exceeded in any off season month, the consumer will be billed under Non seasonal tariff for the whole financial year as per the tariff in force.
 - v. The consumer will be required to restrict his maximum demand during off season up to 30 % of the contract demand. In case the maximum demand recorded in any month of the declared off season exceeds this limit, the consumer will be billed under Non seasonal tariff for the whole financial year as per the tariff in force.
-

Tariff Schedule – LV - 5**AGRICULTURE AND ALLIED ACTIVITIES****Applicability:**

The tariff **LV-5.1** shall apply to connections for agricultural pump, chaff cutters, threshers, winnowing machines, seeding machines and irrigation pumps of lift irrigation schemes including water drawn by agriculture pumps for use by cattle. This tariff does not include subsidy to be paid by the State Govt. The State Govt. has indicated that subsidy under this tariff category shall be available at rates applicable in FY 2012-13.

The tariff **LV-5.2** shall apply to connections for nurseries, farms growing flowers/ plants/ saplings/ fruits, mushroom and grasslands.

The tariff **LV-5.3** shall apply to connections for fisheries ponds, aquaculture, sericulture, hatcheries, poultry farms, cattle breeding farms and those dairy units only where extraction of milk and its processing such as chilling, pasteurization etc. is done.

The tariff **LV- 5.4** shall apply to connections for permanent agricultural pump, chaff cutters, threshers, winnowing machines, seeding machines and irrigation pumps of lift irrigation schemes including water drawn by agriculture pumps for use by cattle to whom flat rate tariff is applicable.

Tariff:

S. No.	Sub-Category	Monthly Fixed charges (Rs.)	Energy charges (paise per unit)
LV- 5.1			
a) (i)	First 300 units per month	NIL	320
(ii)	Above 300 units up to 750 units in the month	NIL	380
(iii)	Rest of the units in the month	NIL	405
b)	Temporary connections	NIL	405
c)	DTR metered group consumers	NIL	300
LV-5.2			
a) (i)	First 300 units per month	NIL	320
(ii)	Above 300 units up to 750 units in the month	NIL	380

S. No.	Sub-Category	Monthly Fixed charges (Rs.)	Energy charges (paise per unit)
(iii)	Rest of the units in the month	NIL	405
b)	Temporary connections	NIL	405
LV-5.3			
a)	Up to 25 HP in urban areas	55 per HP	375
b)	Up to 25 HP in rural areas	20 per HP	375
c)	Demand based tariff (Contract demand and connected load up to 100 HP) in urban areas	170 per kW or 136 per kVA of billing demand	455
d)	Demand based tariff (Contract demand and connected load up to 100 HP) in rural areas	80 per kW or 64 per kVA of billing demand	455

5.4	Agriculture flat rate tariff exclusive of subsidy*.	Rate payable by the consumer in Rs per HP per month for months of April to September	Rate payable by the consumer in Rs per HP per month for the months of October to March
a)	Three phase- urban	100	100
b)	Three phase- rural	100	100
c)	Single phase urban	100	100
d)	Single phase rural	100	100

*see para 1.2 of terms and conditions

Terms and Conditions:

- 1.1 **Billing of consumers under tariff schedule LV 5.1:** Billing to the consumers covered under tariff schedule LV 5.1 shall be done on a monthly basis based on the consumption recorded in the meter. The consumer shall pay the amount of the bill after adjustment of the subsidy to be paid by the State Govt.

Illustration:

As the billing under tariff schedule LV 5.1 is based on monthly consumption, the consumer irrespective of load of the connections shall pay on the basis of

monthly consumption recorded in the meter. Following table illustrates the billing in case of a general permanent consumer considering the level of subsidy decided by the State Govt. for the year 2013-14:

Monthly consumption in units	Monthly bill	Subsidy to be paid by the State Govt.	Net amount of the bill to be paid by the consumer
100	100 units x Rs.3.2/unit = Rs.320/-	100 units x Rs. 1.95/unit = Rs.195/-	Rs.320 - Rs.195 = Rs. 125/-
500	300 units x Rs.3.2/unit + 200 units x Rs.3.8/unit = Rs 1720/-	300 units x 1.95/unit + 200 units x Rs.2.3/unit = Rs.1045/-	Rs.1720 - Rs. 1045 = Rs.675/-
900	300 units x Rs.3.2/unit + 450 units x Rs.3.8/unit + 150 units x Rs.4.05/unit = Rs.3277.50/-	300 units x 1.95/unit + 200 units x Rs.2.3/unit + 250 units x Rs.2.15/unit + 150 units x Rs.2.40/unit = Rs.1942.50 /-	Rs. 3277.50 - Rs.1942.50/- = Rs.1335/-

1.2 Billing of consumers under tariff schedule LV 5.4:

Rates payable by the consumer under tariff schedule LV 5.4 are exclusive of subsidy. The bill for the consumer covered under the tariff schedule LV 5.4 shall be calculated at the rates specified under the tariff schedule LV 5.1 based on norms for assessment of units per HP specified under condition 1.3 of this schedule. The consumer shall be required to pay at the rates specified under tariff schedule LV 5.4 and the balance amount of the bill shall be paid by the State Govt. as advance subsidy to the Distribution licensee.

Illustration for 3 HP:

For example in case of a consumer having a connection of **3 HP** in rural area on three phase supply, the total bill amount shall be calculated at the rates specified under tariff schedule LV 5.1. The consumer is required to pay the bill in the month of April for Rs. 1800/- for the period from April to September and in October for Rs.1800/- for the period from October to March. Balance amount of the bill is to be paid as subsidy by the State Govt. The details of calculation in this example are shown in the following table:

Period of six months	Assessed sale units for a 3 HP consumer	Total bill for six months	Payment to be made by the consumer in April and October	Balance amount to be paid as subsidy by State Govt.
April to September	50 units/HP/month x 3 HP x 6 months = 900 units	50 units/HP/month x 3 HP x 6 months x Rs.3.20/unit = Rs.2880/-	Rs.100/HP/month x 3 HP x 6 months = Rs. 1800/- to be paid in April	Rs.2880 – Rs.1800 = Rs.1080/- to be paid at the rate of Rs.180 per month
October to March	150 units/HP/month x 3 HP x 6 months = 2700 units	<ol style="list-style-type: none"> 1. 150 units/HP/month x 3 HP = 450 units in a month 2. First 300 units to be billed at the rate of Rs.3.20 per unit and balance at the rate of Rs. 3.80 per unit 3. Bill for 450 units for one month shall be 300 units x Rs.3.20/unit = Rs. 960 /- plus 150 units x Rs.3.80 per unit = Rs.570. Total monthly bill Rs.1530/- 4. Bill for 6 months shall be Rs.1530/ month x 6 months= Rs.9180/- 	Rs.100/HP/month x 3 HP x 6 months = Rs.1800/- to be paid in October	Rs.9180 – Rs.1800 = Rs.7380/- to be paid at the rate of Rs.1230 per month

Illustration for 5 HP:

For example in case of a consumer having a connection of **5 HP** in rural area on three phase supply, the total bill amount shall be calculated at the rates specified under tariff schedule LV 5.1. The consumer is required to pay the bill in the month of April for Rs. 3000/- for the period from April to September and in October for Rs.3000/- for the period from October to March. Balance amount of the bill is to be paid as subsidy by the State Govt. The details of calculation in this example are shown in the following table:

Period of six months	Assessed sale units for a 5 HP consumer	Total bill for six months	Payment to be made by the consumer in April and October	Balance amount to be paid as subsidy by State Govt.
April to September	50 units /HP/month x 5 HP x 6 months = 1500 units	50 units/HP/month x 5 HP x 6 months x Rs.3.20/unit = Rs.4800/-	Rs.100/HP/month x 5 HP x 6 months = Rs. 3000/- to be paid in April	Rs. 4800 – Rs. 3000 = Rs.1800 to be paid at the rate of Rs.300 per month
October to March	150 units/HP/month x 5 HP x 6 months = 4500 units	<ol style="list-style-type: none"> 1. 150 units/HP/month x 5 HP = 750 units in a month 2. First 300 units to be billed at the rate of Rs. 3.20 per unit and balance at the rate of Rs. 3.80 per unit 3. Bill for 750 units for one month shall be as 300 units x Rs.3.20/unit = Rs. 960/- plus 450 units x Rs.3.80 per unit = Rs. 1710/- Total monthly bill Rs. 2670/- 4. Bill for 6 months shall be Rs.2670/ month x 6 months= Rs. 16020/- 	Rs.100/HP/month x 5 HP x 6 months =Rs. 3000/- to be paid in October	Rs.16020 –Rs. 3000 = Rs.13020 to be paid at the rate of Rs. 2170 per month

Illustration for 10 HP:

For example in case of a consumer having a connection of **10 HP** in rural area on three phase supply, the total bill amount shall be calculated at the rates specified under tariff schedule LV 5.1. The consumer is required to pay the bill in the month of April for Rs. 6000/- for the period from April to September and in October for Rs.6000/- for the period from October to March. Balance amount of the bill is to be paid as subsidy by the State Govt. The details of calculation in this example are shown in the following table:

Period of six months	Assessed sale units for a 10HP consumer	Total bill for six months	Payment to be made by the consumer in April and October	Balance amount to be paid as subsidy by State Govt.
April to September	50 units/HP/month x 10 HP x 6 months = 3000 units	<ol style="list-style-type: none"> 50 units/HP/month x 10 HP = 500 units/month First 300 units to be billed at the rate of Rs. 3.20 per unit and balance at the rate of Rs. 3.80 per unit Monthly bill shall be 300 units x Rs.3.20/unit = Rs.960/- + 200 units x Rs.3.80 = Rs.760/- Total monthly bill = Rs.1720/- Bill for 6 months shall be = Rs.10320/- 	Rs.100/HP/month x 10 HP x 6 months = Rs.6000/- to be paid in April	Rs.10320 - Rs.6000 = Rs.4320 to be paid at the rate of Rs.720 per month
October to March	150 units /HP/month x 10 HP x 6 months = 9000 units	<ol style="list-style-type: none"> 150 units/HP/month x 10 HP= 1500 units in a month First 300 units to be billed at the rate of Rs.3.20 per unit, 301 to 750 units i.e. 450 units to be billed at the rate of Rs.3.80 per unit, balance 750 units to be billed at the rate of Rs. 4.05/unit. Bill for 1500 units for one month shall be 300 units x Rs.3.20/unit = Rs. 960/- plus 450 units x Rs.3.80 per unit = Rs.1710, plus 750 units x Rs.4.05/unit = Rs.3037.5/- Total monthly bill Rs.5707.5/- Bill for 6 months shall be Rs.5707.5/ month x 6 months = Rs.34254/- 	Rs.100/HP/month x 10 HP x 6 months = Rs.6000/- to be paid in October	Rs. 34245 - Rs.6000 = Rs.28245 to be paid at the rate of Rs. 4707.5 per month

1.3 **Basis of energy audit and accounting for categories LV 5.1 and LV 5.4:**

- i) For energy audit and accounting purposes, actual billed consumption of metered consumers covered under tariff schedule LV 5.1 and LV 5.4 shall be considered.
- ii) For unmetered agriculture consumers on flat rate under LV 5.4 assessed consumption shall be as per following norms:

Particulars		No. of units per HP of sanctioned load per month			
		Urban Area		Rural Area	
Type of Pump Motor	Nature of connection	April to Sept	Oct to March	April to Sept	Oct to March
Three Phase	Permanent	90	170	50	150
	Temporary	175		155	
Single Phase	Permanent	90	180	60	160
	Temporary	190		170	

1.4 Agricultural consumers opting for temporary supply shall have to pay the charges in advance for three months including those who request to avail connection for one month only subject to replenishment from time to time for extended period and adjustment as per final bill after disconnection. Regarding temporary connection for the purpose of threshing the crops, temporary connection for a period of one month can be served at the end of Rabi and Kharif seasons only with payment of one month's charges in advance.

1.5 Following **incentive*** shall be given to the metered agricultural consumers on installation of energy saving devices –

S. No.	Particulars of Energy Saving Devices	Rate of rebate
1.	ISI / BEE star labeled motors for pump sets	15 paise per unit
2.	ISI / BEE star labeled motors for pump sets and use of frictionless PVC pipes and foot valve	30 paise per unit
3.	ISI / BEE star labeled motors for pump sets and use of frictionless PVC pipes and foot valves along with installation of shunt capacitor of appropriate rating	45 paise per unit

* Incentive shall be allowed on the consumer's contribution part of the normal tariff (full tariff minus amount of Govt. subsidy per unit, if any) for installation of energy saving devices under demand side management. This incentive will be admissible only if full bill is paid within due dates failing which all consumed units will be charged at normal rates. Incentive will be admissible from the month following the month in which Energy Saving Devices are put to use and its verification by a person authorized by the Distribution Licensee. The Distribution Licensee is required to arrange wide publicity to above incentive in rural areas. The licensee is required to place quarterly information regarding incentives provided on its web site.

1.6 Minimum consumption

- (i) **For Metered agricultural consumers (LV-5.1 and LV-5.2):** The consumer shall guarantee a minimum consumption of 30 units per HP or part thereof of connected load per month for the months from April to September and 90 units per HP or part thereof of connected load per month for the months from October to March irrespective of whether any energy is consumed or not during the month.
- (ii) **For other than agricultural use (LV-5.3) :**
 - a) The consumer will guarantee a minimum annual consumption (kWh) based on 180 units/HP or part thereof of contract demand in notified rural areas and 360 units/HP or part thereof of contract demand in urban areas irrespective of whether any energy is consumed or not during the year.
 - b) The consumer shall be billed monthly minimum 15 units per HP per month in rural area and 30 units per HP per month in urban area in case the actual consumption is less than monthly minimum consumption (kWh).
 - c) **Method of billing of minimum consumption** shall be as given in the General Terms and Conditions of Low Tension Tariff.

1.7 **Additional Charge for Excess Demand:** Shall be billed as given in the General Terms and Conditions of Low Tension Tariff.

- 1.8 **Delayed payment surcharge** in case of agriculture consumers on LV - 5.4 flat rate tariff shall be levied @ of Rs 1 every month for each block or part thereof of arrears of Rs.100/-. For other sub categories of this Tariff Schedule, the delayed payment surcharge shall be billed as specified under General Terms and Conditions of Low Tension Tariff.
- 1.9 **Specific conditions for DTR metered consumers:**
- a. All the consumers connected to the DTR shall pay the energy charges for the units worked out based on their actual connected load.
 - b. The Distribution Licensee will obtain consent of such connected consumers for billing as per procedure specified in (a) above.
- 1.10 One lamp up to 40 W is permitted at or near the pump in the power circuit.
- 1.11 The use of three phase agriculture pump by installing external device during the period when the supply is available on single phase, shall be treated as illegal extraction of energy and action as per prevailing rules and Regulations shall be taken against the defaulting consumer.
- 1.12 Other terms and conditions shall be as specified under General Terms and Conditions of Low Tension Tariff.
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GENERAL TERMS AND CONDITIONS OF LOW TENSION TARIFF

1. **Rural Areas** mean those areas notified by the GoMP vide notification no. 2010/F13 /05/13/2006 dated 25th March 2006 as may be amended from time to time. **Urban areas** mean all areas other than those notified by the GoMP as Rural Areas.
2. Rounding off: All bills will be rounded off to the nearest rupee i.e. up to 49 paisa shall be ignored and 50 paisa upwards shall be rounded off to next Rupee.
3. Billing Demand: In case of demand based tariff, the billing demand for the month shall be the actual maximum kVA demand of the consumer during the month or 90% of the contract demand, whichever is higher. The billing demand shall be rounded off to the nearest integer number i.e. fraction of 0.5 or above will be rounded to next higher integer and the fraction of less than 0.5 shall be ignored.
4. Fixed charges billing: Unless specified otherwise, fractional load for the purposes of billing of fixed charges shall be rounded off to nearest integer i.e. fraction of 0.5 or above will be rounded to next higher integer and the fraction of less than 0.5 shall be ignored. However for loads less than one kW/HP, it shall be treated as one kW/HP.
5. **Method of billing of minimum consumption:**
 - A. **For metered agricultural consumers and other than agricultural consumers horticulture activity - LV 5.1 and LV 5.2:** The consumer shall be billed minimum monthly consumption (kWh) specified for his category for the month in which his actual consumption is less than prescribed minimum consumption.
 - B. **For other consumers where applicable :**
 - a. The consumer shall be billed one twelfth of guaranteed annual minimum consumption (kWh) specified for his category each month in case the actual consumption is less than above mentioned minimum consumption.
 - b. During the month in which actual cumulative consumption equals or is greater than the annual minimum guaranteed consumption, no further billing of monthly minimum consumption shall be done in subsequent months of the financial year and only actual recorded consumption shall be billed.
 - c. Tariff minimum consumption shall be adjusted in the month in which cumulative actual or billed monthly consumption exceeds cumulative monthly prorated minimum annual guaranteed consumption. If actual cumulative consumption does not get fully adjusted in that month, adjustment shall continue to be provided in subsequent months of the financial year. The following example illustrates the procedure for monthly billing of consumption where prorated monthly minimum consumption is 100 kWh based on annual consumption of 1200 kWh.

Month	Actual cumulative consumption (kWh)	Cumulative minimum consumption (kWh)	Higher of 2 and 3 (kWh)	Already billed in the year (kWh)	To be billed in the month = (4-5) (kWh)
1	2	3	4	5	6
April	95	100	100	0	100
May	215	200	215	100	115
June	315	300	315	215	100
July	395	400	400	315	85
Aug	530	500	530	400	130
Sept	650	600	650	530	120
Oct	725	700	725	650	75
Nov	805	800	805	725	80
Dec	945	900	945	805	140
Jan	1045	1000	1045	945	100
Feb	1135	1100	1135	1045	90
March	1195	1200	1200	1135	65

6. Additional Charge for Excess Demand: Shall be billed as per following procedure:

- a) **Consumers opting for demand based tariff:** The consumers availing supply at demand based tariff shall restrict their actual maximum demand within the contract demand. However, in case the actual maximum demand recorded in any month exceeds 105% of the contract demand, the tariff in this schedule shall apply to the extent of 105 % of the contract demand only. The consumer shall be charged for demand recorded in excess of 105% of contract demand (termed as Excess Demand) and consumption corresponding thereto at the following rates:-
- b) **Energy charges for Excess Demand:** The consumer shall pay charges @ 1.3 times the tariff for energy charges for consumption corresponding to excess demand in case the maximum demand recorded exceeds the 105% of the contract demand.

Example: If a consumer having a contract demand of 50 kVA records a maximum demand of 60 kVA, the billing of energy charges for excess demand of (60 kVA-52.5 kVA)= 7.5 kVA shall be = (total consumption recorded during the month* 7.5 kVA/maximum recorded demand)*1.3* energy charge unit rate.

- c) **Fixed Charges for Excess Demand:** These charges shall be billed as per following:
- Fixed Charges for Excess Demand when the recorded maximum demand is up to 115% of the contract demand:** Fixed Charges for Excess Demand over and above the 105 % of contract demand shall be charged at 1.3 times the normal rate of Fixed Charges.

2. Fixed Charges for Excess Demand when the recorded maximum demand exceeds 115% of contract demand: In addition to Fixed Charges in 1 above, recorded demand over and above 15 % of the contract demand shall be charged at 2 times the normal rate of Fixed Charges.

- d) The above billing for Excess Demand, applicable to consumers is without prejudice to the Distribution Licensee's right to ask for revision of agreement and other such rights that are provided under the Regulations notified by the Commission or under any other law.
- e) The maximum demand of the consumer in each month shall be reckoned as four times the largest amount of kilovoltampere hours delivered at the point of supply of the consumer during any continuous fifteen minutes in that month.

7. Other Terms and Conditions:

- (a) For **advance payment** made before commencement of consumption period for which bill is prepared, a rebate of 1 % per month on the amount (excluding security deposit) which remains with the Distribution Licensee at the end of calendar month shall be credited to the account of the consumer after adjusting any amount payable to the Distribution Licensee.
- (b) **Incentive for prompt payment:** An incentive for prompt payment @0.25% of the bill amount (excluding Electricity Duty and Cess) shall be given in case the payment is made at least 7 days in advance of the due date of payment where the current month billing amount is equal to or greater than Rs. One Lakh. The consumers in arrears shall not be entitled for this incentive.
- (c) The Sanctioned Load or Connected Load or Contract Demand should not exceed 75 kW / 100 HP except where a higher limit is specified or the category is exempted from the ceiling on connected load. If the consumer exceeds his connected load or contract demand beyond this ceiling on more than two occasions in two billing months during the tariff period, the Distribution Licensee may insist on the consumer to avail HT supply.
- (d) Metering Charges shall be billed as per schedule of Metering and Other Charges as prescribed in MPERC (Recovery of Expenses and other Charges for providing Electric Line or Plant used for the purpose of giving supply), Regulations (Revision-I), 2009. Part of a month will be reckoned as full month for purpose of billing.
- (e) In case the cheque presented by the consumer is dishonoured, without prejudice to Distribution Licensee's rights to take recourse to such other action as may be available under the relevant law, a service charge of Rs. 150 per cheque shall be levied in addition to delayed payment surcharge

- (f) Other charges as stated in Schedule of Miscellaneous Charges shall also be applicable.
- (g) **Welding Surcharge** is applicable to installations with welding transformers, where the connected load of welding transformers exceeds 25% of the total connected load and where suitable capacitors of prescribed capacity have not been installed to ensure power factor of not less than 0.8 (80%) lagging. Welding Surcharge of 75 (seventy five) paisa per unit shall be levied for the consumption of the entire installation during the month. However, no welding surcharge shall be levied when recorded power factor is 0.8 or more.
- (h) For purposes of computing the connected load in kW of the welding transformers, a power factor of 0.6 (60%) shall be applied to the maximum current or kVA rating of such welding transformers.
- (i) Existing LT power consumer shall ensure that LT capacitor of proper rating is provided. In this regard, the Madhya Pradesh Electricity Supply Code, 2004, as amended from time to time may be referred for guidance. It shall be the responsibility of the consumer to ensure that overall average power factor during any month is not less than 0.8 (80%) failing which the consumer shall be liable to pay low power factor surcharge on the entire billed amount against energy charges during the month at the rates given below:

1. For the consumer whose meter is capable of recording average power factor:

- a. Surcharge @ 1 % of energy charges for every 1% fall in power factor below 80% up to 75 %.
- b. Surcharge of 5% plus 1.25% of energy charges for every 1% fall in power factor below 75% up to 70%.

The maximum limit of surcharge will be 10 % of the energy charges billed during the month.

2. For LT consumer having meter not capable of recording average power factor: The consumer shall ensure that LT capacitors of proper rating are provided and are in good working condition. In this regard, the Madhya Pradesh Electricity Supply Code, 2004, as amended from time to time may be referred for guidance. In case of failure to meet the above criteria, the consumer would be levied a low power factor surcharge of 10% on the entire billed amount against energy charges during the month and would be continued to be billed till such time the consumer meets the above criteria .

- (j) Levy of welding / power factor surcharge as indicated hereinabove shall be without prejudice to the rights of the Licensee to disconnect the consumer's

installation, if steps are not taken to improve the power factor by installing suitable shunt capacitors.

- (k) Load Factor incentive: Following slabs of incentive shall be allowed for consumers billed under demand based tariff:

Load factor	Concession in energy charges
For load factor above 25% and up to 30 % load factor on contract demand	12 paise per unit concession on the normal energy charges for all energy consumption over and above 25% load factor during the billing month
For load factor above 30% and up to 40 % load factor on contract demand	In addition to load factor concession available up to 30% load factor , concession at the rate of 24 paise per unit on the normal energy charges for all energy consumption over and above 30 % load factor during the billing month
For load factor above 40% load factor on contract demand	In addition to load factor concession available up to 40% load factor, concession at the rate of 36 paise per unit on the normal energy charges for all energy consumption over and above 40% load factor during the billing month

The **load factor** shall be calculated as per the following formula:

$$\text{Load factor (\%)} = \frac{\text{Monthly consumption X 100}}{\text{No. of hours in the billing month X Demand X PF}}$$

- i. Monthly consumption shall be units (kWh) consumed in the month excluding those received from sources other than Licensee.
- ii. No. of Hours in billing month shall exclude period of scheduled outages in hours.
- iii. Demand shall be maximum demand recorded or contract demand whichever is higher.
- iv. Power factor shall be 0.8 or actual monthly power factor whichever is higher

Note: The Load Factor (%) shall be rounded off to the nearest lower integer. The billing month shall be the period in number of days between the two consecutive dates of meter readings taken for the purpose of billing to the consumer for the period under consideration as a month.

- (l) In case of any dispute on applicability of tariff on a particular LT category, the decision of the Commission shall be final.
- (m) The tariff does not include any tax, cess or duty, etc. on electrical energy that may be payable at any time in accordance with any law then in force. Such charges, if

any, shall also be payable by the consumer in addition to the tariff charges and applicable miscellaneous charges.

- (n) **Delayed payment Surcharge for all categories:** Surcharge at the rate of 1.00 % per month or part thereof on the amount outstanding (including arrears) will be payable if the bills are not paid up to due date subject to a minimum of Rs.5/- per month for total outstanding bill amount up to Rs. 500/- and Rs 10/ per month for amount of bill more than Rs.500/. The part of a month will be reckoned as full month for the purpose of calculation of delayed payment surcharge. The delayed payment surcharge will not be levied for the period after supply to the consumer is permanently disconnected.
- (o) In case of conversion of LT connection into HT connection, it is mandatory on the part of both the consumer and the licensee to get the HT agreement executed before availing supply at HT.

(p) **Power Factor Incentive:**

If the average monthly power factor of the consumer is equal to or more than 85%, incentive shall be payable as follows:

Power Factor	Percentage incentive payable on billed energy charges
Above 85% up to 86%	0.5
Above 86% up to 87%	1.0
Above 87% up to 88%	1.5
Above 88% up to 89%	2.0
Above 89% up to 90%	2.5
Above 90% up to 91%	3.0
Above 91% up to 92%	3.5
Above 92% up to 93%	4.0
Above 93% up to 94%	4.5
Above 94% up to 95%	5.0
Above 95% up to 96%	6.0
Above 96% up to 97%	7.0
Above 97% up to 98%	8.0
Above 98% up to 99%	9.0
Above 99%	10.0

For this purpose, the “average monthly power factor” is defined as the ratio in percentage of total kilowatthours to the total kilovoltampere hours recorded during the month.

- (q) Use of mix loads in one connection: Unless otherwise permitted specifically in the tariff category, the consumer requesting for use of mix loads for different purposes shall be billed for the purpose for which the tariff is higher.

- (r) Consumers in the notified Industrial Growth Centres area receiving supply under urban discipline shall be billed urban tariff.
- (s) No change in the tariff or the tariff structure including minimum charges for any category of consumer is permitted except with prior written permission from the Commission. Any action taken without such written permission of the Commission shall be treated as null and void and shall also be liable for action under relevant provisions of the Electricity Act, 2003.
- (t) All conditions prescribed herein shall be applicable to the consumer notwithstanding if any contrary provisions exist in the agreement entered into by the consumer with the licensee.

8. Additional conditions for Temporary Supply at LT:

- (a) Temporary supply cannot be demanded by a prospective/ existing consumer as a matter of right but will normally be arranged by the Distribution Licensee when a requisition giving due notice is made. The temporary additional supply to an existing consumer also shall be treated as a separate service and charged subject to following conditions. However service under Tatkal Scheme shall be made available within 24 hours according to the charges specified in the order of the Commission regarding Schedule of Miscellaneous Charges.
- (b) Fixed Charge and Energy Charge for temporary supply shall be billed at **1.3** times the normal charges as applicable to relevant category if not specified otherwise specifically.
- (c) Estimated bill amount is payable in advance before serving the temporary connection subject to replenishment from time to time and adjustment as per final bill after disconnection. No interest shall be given to consumers for this advance payment.
- (d) The Sanctioned load or connected load shall not exceed 75 kW / 100 HP.
- (e) The month for the purpose of billing of charges for temporary supply shall mean 30 days from the date of connection. Any period less than 30 days shall be treated as full month for the purpose of billing.
- (f) Connection and disconnection charges and other miscellaneous charges shall be paid separately as may be specified in the Schedule of Miscellaneous Charges.

- (g) Load factor concession shall not be allowed on the consumption for temporary connection.
 - (h) Power factor incentive/penalty shall be applicable at the same rate as applicable for permanent connection.
-

Annexure-3 (Tariff Schedules for High Tension Consumers)

**ANNEXURE TO THE TARIFF ORDER PASSED BY MPERC FOR
FINANCIAL YEAR 2013-14**

**MADHYA PRADESH ELECTRICITY REGULATORY COMMISSION
TARIFF SCHEDULES FOR HIGH TENSION CONSUMERS**

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Tariff Schedule-- HV-1

RAILWAY TRACTION:

Applicability:

This Tariff shall apply to the Railways for Traction loads only.

Tariff:

S. No.	Category of consumer	Monthly Fixed Charge (Rs. per kVA of billing demand per month)	Energy Charge (paise / unit)
1	Railway Traction on 132 kV / 220 kV	265	500

Specific Terms and Conditions:

- (a) In order to give impetus to electrification of Railway network in the State, a rebate of 10% in energy charges for new Railway traction projects shall be allowed for a period of five years from the date of connection for such new projects for which agreements for availing supply from licensee are finalized during 2013-14. The rebate provided in earlier Orders shall remain in force at the rate and for the duration as mentioned in those Tariff Orders.
- (b) The dedicated feeder maintenance charges shall **not** be applicable.
- (c) Guaranteed Annual Minimum Consumption shall be 1500 units (kWh) per kVA of Contract Demand. The method of billing of minimum consumption shall be as given in General Terms and Conditions of High Tension Tariff.
- (d) Power Factor Penalty:
 - i. If the average monthly power factor of the consumer falls below 90 percent, penalty will be levied at the rate of one percent of total energy charges for the month for each one percent fall in the average monthly power factor below 90 percent. **For determination of power factor, lag only logic shall be used and no power factor penalty shall be levied if leading power factor is recorded.**
 - ii. If the average monthly power factor of the consumer falls below 85 percent, the consumer shall be levied a penalty of 5% (five percent) plus @ 2% (two percent) for each one percent fall in his average monthly power factor below 85 percent, on the total amount of bill under the head of “Energy Charge”.

This penalty shall be subject to the condition that overall penalty on account of low power factor does not exceed 35%.

- iii.** For this purpose, the “average monthly power factor” is defined as the ratio expressed in percentage of total kilowatthours recorded to the total kilovoltampere hours recorded during the billing month. This ratio (%) shall be rounded off to the nearest integer figure and the fraction of 0.5 or above will be rounded to next higher integer and the fraction of less than 0.5 shall be ignored.
- iv.** Notwithstanding what has been stated above, if the average power factor of a new connection of the consumer is found to be less than 90% in any month during the first 6 (six) months from the date of connection, the consumer shall be entitled to a maximum period of six months to improve it to not less than 90% subject to following conditions:
- This period of six months shall be reckoned from the month in which the average power factor was found for the first time to be less than 90%.
 - In all cases, the consumer will be billed penal charges for low power factor, but in case the consumer maintains the average power factor in subsequent three months (thus in all four months) to not less than 90%, the charges on account of low power factor billed during the said six months period, shall be withdrawn and credited in next monthly bills.
 - The facility, as mentioned herein, shall be available not more than once to new consumer whose average power factor is less than 90% at any time during 6 months from the date of connection. Thereafter, the charges on account of low average power factor, if found less than 90%, shall be payable as by any other consumer.
- (e)** Other terms and conditions shall be as mentioned in the General Terms and Conditions of High Tension Tariff.
-

Tariff Schedule – HV - 2**COAL MINES:****Applicability:**

This Tariff shall apply to the Coal Mines for power, ventilation, lights, fans, coolers, etc. which shall mean and include all energy consumed for coal mines and lighting in the offices, stores, canteen, compound lighting etc. and the consumption for residential use therein.

Tariff:

S. No.	Sub category	Monthly Fixed Charge (Rs./kVA of billing demand per month)	Energy Charge for consumption up to 50% load factor (paise / unit)	Energy Charge for consumption in excess of 50% load factor (paise / unit)
	Coal Mines			
	11 kV supply	505	545	465
	33 kV supply	515	525	445
	132 kV supply	525	515	435
	220 kV supply	535	505	425

Specific Terms and Conditions:

- a. **Guaranteed Minimum Consumption** shall be on the following basis :

Supply Voltage	Guaranteed annual minimum consumption in units (kWh) per kVA of contract demand
<i>For supply at 220 / 132 kV</i>	1620
<i>For supply at 33 / 11 kV</i>	1200

Note: The method of billing of minimum consumption shall be as given in General Terms and Conditions of High Tension Tariff.

- b. Load Factor Incentive:** The consumer shall be eligible for Load Factor incentive on energy charges as per the scheme given in General Terms and Conditions of High Tension Tariff.
 - c. Time of Day Surcharge / Rebate:** This surcharge/ rebate shall be as specified in General Terms and Conditions of High Tension Tariff.
 - d.** Other terms and conditions shall be as specified under General Terms and Conditions of High Tension Tariff.
-

Tariff Schedule – HV - 3

INDUSTRIAL, NON-INDUSTRIAL AND SHOPPING MALLS

Applicability:

The **tariff HV-3.1 (Industrial)** shall apply to all HT industrial consumers including mines (other than coal mines) for power, light and fan etc. which shall mean and include all energy consumed for factory and lighting in the offices, main factory building, stores, canteen, residential colonies of industries, compound lighting, common and ancillary facilities such as Banks, General purpose shops, Water supply, Sewage pumps, Police Stations etc. in the premises of the industrial units and Dairy units where milk is processed (other than chilling, pasteurization etc.) to produce other end products of milk.

The **tariff HV-3.2 (Non Industrial)** shall apply to establishments like Railway Stations, Offices, Hotels, Hospitals, Institutions etc. (excluding group of consumers) having mixed load for power, light and fan etc. which shall mean and include all energy consumed for lighting in the offices, stores, canteen, compound lighting etc. This shall also cover all other categories of consumers, defined in LT non-domestic category subject to the condition that the HT consumer shall not redistribute/sub-let the energy in any way to other person.

The **tariff HV-3.3 (Shopping malls)** shall apply to establishments of shopping malls having group of non-industrial consumers subject to the specific terms and conditions specified in (e) of this schedule.

Shopping Mall shall be a multi-storeyed shopping centre in an urban area having a system of enclosed walkways with collection of independent retail stores, services and parking areas constructed and maintained by a management firm/ developer as a unit.

The **tariff HV-3.4 (Power intensive industries)** shall apply to Mini Steel Plants (MSP), MSP with rolling mills/ sponge iron plants in the same premises, electro chemical/ electro thermal industry, Ferro alloy industry which shall mean and include all energy consumed for factory and lighting in the offices, main factory building, stores, canteen, residential colonies of industries, compound lighting etc.

Tariff:

S. No.	Sub-Category of consumer	Monthly Fixed Charge (Rs./kVA of billing demand per month)	Energy Charge for consumption up to 50% load factor (paise / unit)	Energy Charge for consumption in excess of 50% load factor (paise / unit)
3.1	Industrial			
	11 kV supply	235	520	460
	33 kV supply	380	510	410
	132 kV supply	480	475	395
	220/400 kV supply	510	455	385
3.2	Non-Industrial			
	11 kV supply	200	550	475
	33 kV supply	310	525	460
	132 kV supply	435	490	425
3.3	Shopping Malls			
	11 kV supply	195	550	475
	33 kV supply	285	530	465
	132 kV supply	405	495	425
3.4	Power intensive industries*			
	33 kV supply	435	405	405
	132 kV supply	560	385	385

*Category HV 3.4 shall not be entitled to load factor incentive. Further energy charges for this category shall be same for entire consumption irrespective of load factor.

Specific Terms and Conditions:

- (a) **Guaranteed Minimum Consumption** for all the above categories shall be on following basis :

Supply Voltage	Sub- category	Guaranteed annual minimum consumption in units (kWh) per kVA of contract demand
<i>For supply at 220/132 kV</i>	Rolling Mills	1200
	Educational institutions	720
	Others	1800
<i>For supply at 33 / 11 kV</i>	Educational institutions	600
	Contract demand up to 100 kVA	600
	Others	1200

Note: The method of billing of minimum consumption shall be as given in General Terms and Conditions of High Tension Tariff.

- (b) **Load Factor Incentive:** The consumer shall be eligible for Load Factor incentive on energy charges as per the scheme given in General Terms and Conditions of High Tension Tariff. However consumers under category HV 3.4 shall not be entitled to load factor incentive.
- (c) **Time of Day Surcharge / Rebate:** This surcharge/ rebate shall be as specified in General Terms and Conditions of High Tension Tariff.
- (d) **Rebate for supply through feeders feeding supply to predominantly to rural areas :** HT consumers of this category receiving supply through rural feeders shall be entitled to 10% rebate on Fixed Charges and 20 % reduction in Minimum Consumption (kWh) as specified above for respective voltage levels.
- (e) **Additional specific terms and conditions for shopping mall**
- (i) Individual end user shall not be levied a rate which is exceeding non-domestic-commercial tariff (LV 2.2) in case of LT connection and HT non-industrial tariff (HV 3.2) in case of HT connection, as determined by the Commission.
- (ii) All end-users shall enter into a tripartite agreement with the Management Firm /developer of the shopping mall and the licensee for availing supply of electricity in the shopping mall in order to get the benefit of the tariff under this category.
- (f) Other terms and conditions shall be as specified under General Terms and Conditions of High Tension Tariff.

Tariff Schedule – HV - 4**SEASONAL:-****Applicability:**

This tariff shall be applicable to such seasonal industries / consumers requiring energy for the production purposes for maximum continuous one hundred eighty days and for a minimum period of three months. **If the declared season/off-season spreads over two tariff periods, then the tariff for the respective period shall be applicable.**

The licensee shall allow this tariff to any industry having seasonal use only.

This tariff shall also be applicable to mini/micro and small hydel plants to meet the essential requirement of power to maintain the plants without any ceiling as to the period for which supply shall be taken.

Tariff:

Category of consumers	Monthly Fixed Charge (Rs./kVA of billing demand per month)	Energy Charge for consumption up to 50% load factor (paise / unit)	Energy Charge for consumption in excess of 50% load factor (paise / unit)
During Season			
11 kV supply	255	500	435
33 kV supply	285	490	420
During Off-Season			
11 kV supply	Rs. 255 on 10% of contract demand or actual recorded demand during the season, whichever is higher	600 i.e. 120% of seasonal Energy Charge	Not applicable
33 kV supply	Rs. 285 on 10% of contract demand or actual recorded demand during the season, whichever is higher	588 i.e. 120% of seasonal Energy Charge	Not applicable

Specific Terms and Conditions:

- a) **Guaranteed Annual Minimum Consumption** shall be 900 units (kWh) per kVA of contract demand. The method of billing of minimum consumption shall be as given in General Terms and Conditions of High Tension Tariff

- b) Load Factor Incentive:** The consumer shall be eligible for Load Factor incentive on energy charges as per the scheme given in General Terms and Conditions of High Tension Tariff.
 - c) Time of Day Surcharge / Rebate:** This surcharge/ rebate shall be as specified in General Terms and Conditions of High Tension Tariff.
 - d)** The consumer has to declare months of season and off season for the tariff year 2013-14 within 60 days of issue of tariff order and inform the same to the licensee. If the consumer has already informed the Licensee of his season/off-season months during this financial year prior to issue of this order, same shall be accepted and shall be valid for this Tariff Order.
 - e)** The seasonal period once declared by the consumer cannot be changed during the year.
 - f)** This tariff schedule is not applicable to composite units having seasonal and other category loads.
 - g)** The consumer will be required to restrict his monthly off season consumption to 15% of highest of the average monthly consumption of the preceding three seasons. In case this limit is exceeded in any off season month, the consumer will be billed under HV-3.1 Industrial Schedule for the whole tariff year.
 - h)** The consumer will be required to restrict his maximum demand during off season to 30 % of the contract demand. In case the maximum demand recorded in any month during the declared off- season exceeds this limit, the consumer will be billed under HV-3.1 Industrial Schedule for the whole year.
 - i)** Other terms and conditions shall be as per the General Terms and Conditions of High Tension Tariff.
-

Tariff Schedule – HV - 5**IRRIGATION, PUBLIC WATER WORKS AND OTHER THAN AGRICULTURAL****Applicability:**

The Tariff Category HV-5.1 shall apply to supply of power to lift irrigation schemes, group irrigation, Public Utility Water Supply schemes, sewage treatment plants /sewage pumping plants and for energy used in lighting pump house.

Note: Private water supply scheme, water supply schemes run by institutions for their own use/employees/townships etc. will not fall in this category but billed under the appropriate tariff category to which such institution belongs. In case water supply is being used for two or more different purposes then the highest tariff shall be applicable.

The tariff category HV-5.2 shall apply to supply of power to other than agriculture pump connections i.e. the connection for hatcheries, fisheries ponds, poultry farms, cattle breeding farms, grasslands, vegetables/ fruits/ floriculture/ mushroom growing units etc. and dairy (for those dairy units where only extraction of milk and its processing such as chilling, pasteurization etc. is done). However, in units where milk is processed to produce other end products of milk, billing shall be done under HV-3.1 (Industrial) category.

Tariff:

No.	Sub-Category	Monthly Fixed Charge (Rs. kVA of billing demand per month)	Energy Charge (paise per unit)
5.1	Public Water Works, Group Irrigation and Lift Irrigation Schemes		
	11 kV supply	170	400
	33 kV supply	190	380
	132 kV supply	210	360
5.2	Other than agricultural use		
	11 kV supply	190	405
	33 kV supply	210	385
	132 kV supply	230	370

Specific Terms and Conditions:

- (a) **Guaranteed Annual Minimum Consumption** shall be 720 units (kWh) per kVA of contract demand. The method of billing of minimum consumption shall be as given in General Terms and Conditions of High Tension Tariff.
- (b) **Time of Day Surcharge / Rebate:** This surcharge/ rebate shall be as specified in General Terms and Conditions of High Tension Tariff.
- (c) **Incentive for adopting Demand Side Management**

An **incentive** equal to 5 % energy charges shall be given on installation and use of energy saving devices (such as ISI energy efficient motors for pump sets). **Incentive** will only be admissible if full bill is paid within due dates failing which all consumed units will be charged at normal rates as the case may be. Such incentive will be admissible from the month following the month in which energy saving devices are put to use and its verification by a person authorized by the licensee. The incentive will continue to be allowed till such time these energy saving devices remain in service. The Distribution Licensee is required to arrange wide publicity for above incentive. The Distribution Licensee is required to place quarterly information regarding incentives provided on its web site.
- (d) Other terms and conditions shall be per the General Terms and Conditions of High Tension Tariff.

Tariff Schedule – HV - 6**BULK RESIDENTIAL USERS****Applicability:**

The tariff category **HV-6.1** is applicable for supply to industrial or any other township (e.g. that of University or academic institutions, hospitals, MES and Border villages etc.) for domestic purpose only such as lighting, fans, heating etc. provided that the connected load for essential common facilities such as Non-domestic supply in residential area, street lighting shall be within the limits specified hereunder:-

- (i) Water supply and Sewage pumping, Hospital - **No limit**
- (ii) Non-domestic/Commercial and other General purpose put together - **20 % of total connected load.**

The tariff category **HV-6.2** is applicable for supply to Registered Cooperative Group Housing Societies as per the Ministry of Power notification no. S.O.798 (E) dated 9th June, 2005 and also to other Registered Group Housing Societies and individual domestic user. The Terms and Conditions to this category of consumers shall be applicable as per the provisions in section 4.77 to 4.95 (both inclusive) of the Madhya Pradesh Electricity Supply Code, 2004 as amended from time to time.

Tariff:

S. No.	Category of consumers	Monthly Fixed Charge (Rs. / kVA of billing demand per month)	Energy Charge for consumption up to 50% load factor (paise / unit)	Energy Charge for consumption in excess of 50% load factor (paise / unit)
1	For Tariff Sub-Category 6.1			
	11 kV supply	215	465	410
	33 kV supply	230	440	390
	132 kV supply	245	425	375
2	For Tariff Sub-Category 6.2			
	11 kV supply	145	475	420
	33 kV supply	150	465	410
	132 kV supply	155	450	395

Specific Terms and Conditions:

- (a) **Guaranteed Annual Minimum Consumption** shall be 780 units (kWh) per kVA of contract demand. The method of billing of minimum consumption shall be as given in General Terms and Conditions of High Tension Tariff.
 - (b) **Load Factor Incentive:** The consumer shall be eligible for Load Factor incentive on energy charges as per the scheme given in General Terms and Conditions of High Tension Tariff.
 - (c) All individual end-users shall enter into a tripartite agreement with the Management of the Group Housing Society and the licensee for availing supply of electricity in the Society in order to get the benefit of the tariff under this category. The individual end user shall not be levied a rate exceeding the tariff applicable to the corresponding LT category.
 - (d) Other terms and conditions shall be as specified under General Terms and Conditions of High Tension Tariff.
-

Tariff Schedule – HV - 7

SYNCHRONIZATION AND START UP POWER FOR GENERATORS CONNECTED TO THE GRID

Applicability:

This Tariff shall apply to those generators who are already connected to the grid but who are not consumers of the Distribution Licensee and seek to avail power for synchronization with the grid or for start-up.

Tariff for all voltages:

Category	Energy Charge (Paise/unit)
Generators for Start up power or synchronization with Grid	575

Terms and Conditions:

- (a) The supply for synchronization with the grid or for start-up power shall not exceed 15% of the capacity of unit of highest rating in the Power Plant.
- (b) The condition for minimum consumption shall not be applicable to the generators including CPP. Billing shall be done for energy recorded on each occasion of availing supply.
- (c) The supply shall not be allowed to the CPP for production purpose for which they may avail stand-by support under the relevant Regulations.
- (d) The synchronization with the grid or the start-up power shall only be made available after commissioning of plant and in the event of outages for annual planned maintenance, other maintenance, forced outages of generating units or also in the event of separation of generator from grid.
- (e) The synchronization with the grid, power shall be provided for a maximum period of 2 hours on each occasion. This time limit shall not be applicable to start up activity
- (f) The generator including CPP shall execute an agreement with the Licensee for meeting the requirement of synchronization with the grid or for start-up power incorporating the above terms and conditions.

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GENERAL TERMS AND CONDITIONS OF HIGH TENSION TARIFF

The following terms and conditions shall be applicable to all HT consumer categories subject to Specific Terms and Conditions for that category as mentioned in the Tariff Schedule of respective category:

- 1.1 The contract demand shall be expressed in whole number only.
- 1.2 Character of Service: The character of service shall be as per the Madhya Pradesh Electricity Supply Code, 2004 as amended from time to time.
- 1.3 Point of Supply:
- (a) The power will be supplied to the consumer ordinarily at a single point for the entire premises.
 - (b) In case of Railway Traction, the supply at each sub-station shall be separately metered and charged.
 - (c) In case of coal mines, the power will be supplied ordinarily at a single point for the entire premises. The power may, however, be supplied, on the request of the consumer, at more than one point subject to technical feasibility. In such cases, metering and billing will be done for each point of supply separately.
- 1.4 **Determination of Demand:** The **maximum demand** of the supply in each month shall be four times the largest number of kilovolt ampere hours delivered at the point of supply during any continuous 15 minutes during the month as per sliding window principle of measurement of demand.
- 1.5 **Billing demand:** The billing demand for the month shall be the actual maximum kVA demand of the consumer during the month or 90% of the contract demand, whichever is higher. The billing demand shall be rounded off to the nearest integer number i.e. the fraction of 0.5 or above will be rounded off to next integer figure and the fraction of less than 0.5 shall be ignored.
- 1.6 **Tariff minimum consumption shall be billed** as follows :
- 1) The consumer shall be billed for guaranteed annual minimum consumption (kWh) based on number of units per kVA of contract demand specified for his category, irrespective of whether any energy is consumed or not during the year.
 - 2) The consumer shall be billed one twelfth of guaranteed annual minimum consumption (kWh) specified for his category each month in case the actual consumption is less than above mentioned minimum consumption.

3) During the month in which actual cumulative consumption equals or greater than the annual minimum guaranteed consumption, no further billing of monthly minimum consumption shall be done in subsequent months of the financial year.

4) Tariff minimum consumption shall be adjusted in the month in which cumulative actual or billed monthly consumption exceeds cumulative monthly prorated minimum annual guaranteed consumption. If actual cumulative consumption does not get fully adjusted in that month, adjustment shall continue to be provided in subsequent months of the financial year. The following example illustrates the procedure for monthly billing of consumption where prorated monthly minimum consumption is 100 kWh based on annual consumption of 1200 kWh.

Month	Actual cumulative consumption (kWh)	Cumulative minimum consumption * (kWh)	Higher of 2 and 3 (kWh)	Already billed in the year (kWh)	To be billed in the month = (4-5) (kWh)
1	2	3	4	5	6
April	95	100	100	0	100
May	215	200	215	100	115
June	315	300	315	215	100
July	395	400	400	315	85
Aug	530	500	530	400	130
Sept	650	600	650	530	120
Oct	725	700	725	650	75
Nov	805	800	805	725	80
Dec	945	900	945	805	140
Jan	1045	1000	1045	945	100
Feb	1135	1100	1135	1045	90
March	1195	1200	1200	1135	65

1.7 **Rounding off:** All bills will be rounded off to the nearest rupee i.e. up to 49 paise shall be ignored and 50 paise upwards shall be rounded off to next Rupee.

Incentive/ Rebate / penalties**1.8 Power Factor Incentive**

Power factor incentive shall be payable as follows:

Power Factor	Percentage incentive payable on billed energy charges
Above 95% and up to 96%	1.0 (one percent)
Above 96% and up to 97%	2.0 (two percent)
Above 97% and up to 98%	3.0 (three percent)
Above 98 % up to 99%	5.0 (five percent)
Above 99 %	7.0 (seven percent)

1.9 Load factor calculation and load factor incentive

1) The **Load Factor** shall be calculated as per the following formula:

$$\text{Load Factor (\%)} = \frac{\text{Monthly consumption X 100}}{\text{No. of hours in the billing month X Demand X PF}}$$

- i. Monthly consumption shall be units (kWh) consumed in the month excluding those received from sources other than Licensee.
- ii. No. of Hours in billing month shall exclude period of scheduled outages in hours.
- iii. Demand shall be maximum demand recorded or contract demand whichever is higher.
- iv. Power factor shall be 0.9 or actual monthly power factor whichever is higher

Note: The load factor (%) shall be rounded off to the nearest lower integer. In case the consumer is getting power through open access, units set off from other sources, the net energy (after deducting units set off from other sources, from the consumed units) billed to consumer shall only be taken for the purpose of working out load factor. The billing month shall be the period in number of days between the two consecutive dates of meter readings taken for the purpose of billing to the consumer.

- 2) **Load Factor (LF) incentive** shall be calculated as per following scheme and shall be given to those categories of consumers where it is specified:

LF Range	Incentive	Computation of % incentive on energy charge (LF=x %)
LF ≤ 75%	No Incentive	= 0.00
LF > 75%	Incentive of 0.10 % for every 1% increase in LF above 75% on the energy charges for incremental consumption above 75% load factor	= (x-75)*0.10

Example,

- Consumer having 72% load factor would not be getting any incentive on energy charges
- Consumer having 82% load factor will get incentive of $[0.10 * (82-75) \%] = 0.7\%$ on energy charges for incremental consumption above 75% load factor.

Note: For working out **incremental consumption**, consumption corresponding to 75 % load factor shall be deducted from total consumption. The above load factor incentive shall apply only to energy charges corresponding to such incremental consumption for which separate rates have been specified.

- 1.10 For **advance payment** made before commencement of consumption period for which bill is prepared, an incentive of 1 % per month on the amount which remains with the licensee at the end of calendar month (excluding security deposit) shall be credited to the account of the consumer after adjusting any amount payable to the licensee.
- 1.11 An incentive for prompt payment @0.25% of the bill amount (excluding Electricity Duty and other Government levies) shall be given in case the payment is made at least 7 days in advance of the due date of payment where the current month billing amount is equal to or greater than Rs. One Lakh. The consumers in arrears shall not be entitled for this incentive.

- 1.12 **Time of Day (ToD) Surcharge / Rebate:** This scheme is applicable to the categories of consumers where it is specified. This is applicable for different periods of the day i.e. normal period, peak load and off-peak load period. The surcharge / rebate on energy charges according to the period of consumption shall be as per following table:

Sr. No.	Peak / Off-peak Period	Surcharge / Rebate on energy charges on energy consumed during the corresponding period
1.	Evening peak load period (6 PM to 10 PM)	15% of Normal rate of Energy Charge as Surcharge
2.	Off peak load period (10 PM to 6 AM next day)	7.5 % of Normal rate of Energy Charge as Rebate

Note: Fixed charges shall always be billed at normal rates i.e. ToD Surcharge / Rebate shall not be applied on Fixed Charges

1.13 **Power Factor Penalty (For consumers other than Railway Traction HV-1)**

- (i) If the average monthly power factor of the consumer falls below 90 percent, the consumer shall be levied a penalty @ 1% (one percent), for each one percent fall in his average monthly power factor below 90 percent, on total amount of bill under the head of “Energy Charges”.
- (ii) If the average monthly power factor of the consumer falls below 85 percent, the consumer shall be levied a penalty of 5% (five percent) plus @ 2% (two percent) for each one percent fall in his average monthly power factor below 85 percent. , on the total amount of bill under the head of “Energy Charges”. This penalty shall be subject to the condition that overall penalty on account of low power factor does not exceed 35%.
- (iii) Should the average monthly power factor fall below 70%, the Distribution Licensee reserves the right to disconnect the consumer’s installation till steps are taken to improve the same to the satisfaction of the Distribution Licensee. This is, however, without prejudice to the levy of penalty charges for low power factor in the event of supply not being disconnected.
- (iv) For this purpose, the “average monthly power factor” is defined as the ratio expressed in percentage of total kilowatthours to the total kilovoltampere hours recorded during the billing month. This ratio (%) shall be rounded off to the nearest integer figure and the fraction of 0.5 or above will be rounded to next higher integer and the fraction of less than 0.5 shall be ignored.
- (v) Notwithstanding what has been stated above, if the average monthly power factor of a new consumer is found to be less than 90% in any month during the first 6 (six) months from the date of connection, the consumer shall be entitled to a

maximum period of six months to improve it to not less than 90% subject to following conditions:

- a) This period of six months shall be reckoned from the month following the month in which the average power factor was found for the first time to be less than 90%.
- b) In all cases, the consumer will be billed the penal charges for low power factor, but in case the consumer maintains the average monthly power factor in subsequent three months (thus in all four months) to not less than 90%, the charges on account of low power factor billed during the said six months period, shall be withdrawn and credited in next monthly bills.
- c) The facility, as mentioned herein, shall be available not more than once to new consumer whose average monthly power factor is less than 90% in any month during 6 months from the date of connection. Thereafter, the charges on account of low average power factor, if found less than 90%, shall be payable as applicable to any other consumer.

1.14 Additional Charges for Excess Demand

- i. The consumer shall at all times restrict their actual maximum demand within the contract demand. In case the actual maximum demand in any month exceeds 105% of the contract demand, the tariffs given in various schedules shall apply to the extent of the 105% of the contract demand only. The consumer shall be charged for excess demand computed as difference of recorded maximum demand and 105% of contract demand on energy charges and fixed charges and while doing so, the other terms and conditions of tariff, if any, shall also be applicable on the said excess demand. The excess demand so computed, if any, in any month shall be charged at the following rates from all consumers except Railway Traction.
- ii. **Energy charges for excess demand:** The consumer shall pay charges @ 1.3 times the tariff for energy charges for consumption corresponding to excess demand in case the maximum demand recorded exceeds 105% of the contract demand.

Example: If a consumer having a contract demand of 200 kVA records a maximum demand of 250 kVA, the billing of energy charges for excess demand of $(250 \text{ kVA} - 210 \text{ kVA}) = 40 \text{ kVA}$ shall be = (total consumption recorded during the month* 40 kVA/maximum recorded demand)*1.3* energy charge unit rate.

- iii. **Fixed charges for Excess Demand:** - These charges shall be billed as per following:

1. **Fixed charges for Excess Demand when the recorded maximum demand is up to 115% of the contract demand:** fixed charges for Excess Demand over and above the 105 % of contract demand shall be charged at 1.3 times the normal fixed charges.
2. **Fixed charges for Excess Demand when the recorded maximum demand exceeds 115% of contract demand:** In addition to fixed charges in 1 above, recorded demand over and above 15 % of the contract demand shall be charged at 2 times the normal fixed charges.

Example for fixed charges billing for excess demand: If the contract demand of a consumer is 100 kVA and the maximum demand recorded in the billing month is 140 kVA, the consumer shall be billed towards fixed charges as under:-

- a) Up to 105 kVA at normal tariff.
 - b) Above 105 kVA up to 115 kVA i.e. for 10 kVA at 1.3 times the normal tariff.
 - c) Above 115 kVA up to 140 kVA i.e. for 25 kVA at 2 times the normal tariff.
- iv. In case of **Railway Traction** the excess demand so computed as per above, if any, in any month shall be charged at the following rates:
- (a) When the recorded maximum demand is up to 115% of contract demand- Excess Demand over and above 105 % of the contract demand—at the rate of Rs. 290 per kVA
 - (b) When the recorded maximum demand exceeds 115% of contract demand: - In addition to fixed charges in (a) above, recorded demand over and above 15 % of the contract demand shall be charged—at the rate of Rs. 398 per kVA

While doing so, other provisions of electricity tariff (such as tariff minimum charge etc.) will also be applicable on aforesaid excess demand.

- v. The excess demand computed in any month will be charged along with the monthly bill and shall be payable by the consumer.
- vi. The billing of excess demand at higher tariff is without prejudice to the Licensee's right to discontinue the supply in accordance with the provisions contained in the Madhya Pradesh Electricity Supply Code, 2004.

- 1.15 **Delayed Payment Surcharge:** Surcharge at the rate of 1.00 % per month or part thereof on the amount outstanding (including arrears) will be payable if the bills are not paid up to due date. The part of a month will be reckoned as full month for the purpose of calculation of delayed payment surcharge. The delayed payment surcharge will not be applicable after supply to the consumer is permanently disconnected.
- 1.16 **Service Charge for Dishonoured Cheques:** In case the cheque(s) presented by the consumer are dishonoured, a service charge at the rate of Rs. 1000/- per cheque shall be levied in addition to delayed payment surcharge as per rules. This is without prejudice to the Distribution Licensee's rights to take action in accordance with any other applicable law.
- 1.17 **Temporary supply at HT:** If any consumer requires supply for a temporary period, the temporary supply shall be treated as a separate service and charged subject to the following conditions:

- (a) Fixed Charges and Energy Charges shall be charged at 1.3 times the normal tariff. The fixed charge shall be recovered for the full billing month or part thereof.
- (b) The consumer shall guarantee minimum consumption (kWh) as applicable to the permanent consumers on pro-rata basis based on number of days as detailed below:

$$\text{Minimum consumption for additional supply for temporary period} = \frac{\text{Annual minimum consumption as applicable to permanent supply} \times \text{No. of days of temporary connection}}{\text{No. of days in the year}}$$

- (c) The billing demand shall be the demand requisitioned by the consumer or the highest monthly maximum demand during the period of supply commencing from the month of connection ending with the billing month, whichever is higher. For example:

Month	Recorded Maximum Demand (kVA)	Billing Demand (kVA)
April	100	100
May	90	100
June	80	100
July	110	110
August	100	110
September	80	110
October	90	110
November	92	110
December	95	110

January	120	120
February	90	120
March	80	120

- (d) The consumer shall pay the estimated charges in advance, before serving the Temporary Connection subject to replenishment from time to time and adjustment as per final bill after disconnection. No interest shall be given on such advance payment.
- (e) The consumer shall pay rental for the metering system.
- (f) Connection and Disconnection Charges shall also be paid.
- (g) In case of existing HT consumer, the temporary connection may be given through existing permanent HT connection on following methodology of assessment:

- i. Deemed contract demand (CD) for the month to be billed for the fixed charge = CD (existing) on normal tariff for permanent connection + CD for temporary connection on normal tariff for temporary supply.
- ii. Billing demand for the month shall be as per tariff order for the deemed contract demand for that month.
- iii. Consumption during the month may be billed for Permanent connection (A)

$$A = \frac{\text{Contract demand (Permanent)}}{\text{Deemed contract demand}} \times \text{Total consumption}$$

$$\text{Consumption of Temporary connection} = \text{Total consumption} - (A)$$

- iv. The consumption worked out above for temporary connection shall be billed at 1.3 times the normal energy charges.
- v. The demand in excess of deemed contract demand as calculated above at (g) (i) shall be treated as Excess Demand. For billing purposes such Excess demand, if any, in any month shall be treated as pertaining to temporary connection load and shall be charged at 1.5 times the normal fixed charges and energy charges of temporary connection. Additional charges for excess demand recorded during the period of temporary connection shall be calculated as given below :

Fixed charges for excess demand = fixed charges per kVA for temporary connection * excess demand* 1.5 (one and half)

Energy charges for excess demand = energy charges per unit for temporary connection * 1.5(one and half)*(excess demand/deemed contract demand)*total consumption

- (h) Load factor incentive shall not be allowed on the consumption for temporary connection.
- (i) Power factor incentives/penalties and the condition for Time of Day Surcharge/ rebate shall be applicable at the same rate as for permanent connection.

Other Terms and Conditions for permanent connections:

- 1.18 The existing 11 kV consumer with contract demand exceeding 300 kVA who want to continue to avail supply at 11 kV at his request, shall be required to pay additional charge at 5 % on the total amount of Fixed Charges and, Energy Charges billed in the month.
- 1.19 The existing 33 kV consumer with contract demand exceeding 10,000 kVA who want to continue to avail supply at 33 kV at his request, shall be required to pay additional charge at 3% on the total amount of Fixed Charges and Energy Charges billed in the month.
- 1.20 The existing 132 kV consumer with contract demand exceeding 50,000 kVA who want to continue to avail supply at 132 kV at his request, shall be required to pay additional charge at 2% on the total amount of Fixed Charges and Energy Charges billed in the month.
- 1.21 Metering Charges shall be billed as per schedule of Metering and Other Charges as prescribed in MPERC (Recovery of Expenses and other Charges for providing Electric Line or Plant used for the purpose of giving Supply), Regulations (Revision-I), 2009 as amended from time to time. Part of a month will be reckoned as full month for purpose of billing.
- 1.22 The tariff does not include any tax or duty, etc. on electrical energy that may be payable at any time in accordance with any law then in force. Such charges, if any, shall be payable by the consumer in addition to the tariff charges.
- 1.23 In case any dispute arises regarding interpretation of this tariff order and/or applicability of this tariff, the decision of the Commission will be final and binding.
- 1.24 No changes in the tariff or the tariff structure including minimum charges for any category of consumer are permitted except with prior written permission of the Commission. Any order without such written permission of the Commission will be treated as null and void and also shall be liable for action under relevant provisions of the Electricity Act, 2003.
- 1.25 In case a consumer, at his request, avails supply at a voltage higher than the standard supply voltage as specified under relevant category, he shall be billed at the rates applicable for actually availed supply voltage and no extra charges shall be levied on account of higher voltage.

- 1.26 All consumers to whom fixed charges are applicable are required to pay fixed charges in each month irrespective of whether any energy is consumed or not.
- 1.27 All conditions prescribed herein shall be applicable notwithstanding if any contrary provisions, exist in the agreement entered into by the consumer with the licensee.
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