# Jammu & Kashmir State Electricity Regulatory Commission



## Order

on

True-Up for FY 2014-15,
Annual Performance Review for FY 2015-16,
Aggregate Revenue Requirement for 2<sup>nd</sup> MYT Control
Period from FY 2016-17 to FY 2020-21

Retail Tariff for FY 2016-17 for

and

Power Development Department (Distribution), Govt. of J&K

> Srinagar October 2016

## Jammu & Kashmir State Electricity Regulatory Commission

Website: <a href="http://www.jkserc.nic.in">http://www.jkserc.nic.in</a> & Email ID: <a href="jkserc@gmail.com">jkserc@nic.in</a> Summer (May to Oct.): H. No. 101, Sector-A, Bagh-I-Hyder, Hyderpora Chowk, Srinagar – 190005 (J&K) Ph. No.: 0194-2434582, Fax: 0194-2431817 Winter (Nov to April): Ambedkar (Panama) Chowk, Railway Road, Jammu-180006 (J&K) Ph. Nos.: 0191-2470160, 2470183, Fax: 0191-2479367, 2470163



### **Before**

## Jammu & Kashmir State Electricity Regulatory Commission

Petition No: JKSERC/65 of 2016

#### In The Matter Of:

Filing of Petition for approval of True-Up for FY 2014-15, Annual Performance Review (APR) for FY 2015-16, Aggregate Revenue Requirement (ARR) for 2<sup>nd</sup> MYT Control Period FY 2016-17 to FY 2020-21 and Tariff proposal for FY 2016-17 for Jammu and Kashmir Power Development Department - Distribution Business.

#### And

### In The Matter Of:

Jammu and Kashmir Power Development Department-Distribution, Srinagar/Jammu

### **ORDER**

Order No. 38-JKSERC of 2016 (Passed on 7<sup>th</sup> October, 2016)

1. This Order relates to True-Up for FY 2014-15, Annual Performance Review (APR) for FY 2015-16, Aggregate Revenue Requirement (ARR) for the 2<sup>nd</sup> Multi Year Tariff (MYT) Control Period from FY 2016-17 to FY 2020-21 and Tariff proposal for FY 2016-17 filed by the Jammu & Kashmir Power Development Department-Distribution (hereinafter referred to as JKPDD-D or the Petitioner or the Utility) before the Jammu & Kashmir State Electricity Regulatory Commission (hereinafter referred to as JKSERC or the Commission). The Petition was filed as per the JKSERC (Multi Year Distribution Tariff) Regulations, 2012 as amended from time to time and in accordance with the J&K Electricity Act, 2010.





- 2. As per the JKSERC (Multi Year Distribution Regulations), 2012, the Utility was required to file the Petition for approval of Business Plan for the 2<sup>nd</sup> MYT Period FY 2016-17 to FY 2020-21 by 31<sup>st</sup> August, 2015, and based on the approved Business Plan, the Petition for approval of ARR for the Control Period along with tariff proposal for the 1<sup>st</sup> year of Control Period i.e. FY 2016-17 was required to be filed by or before 30<sup>th</sup> November, 2015.
- 3. The Utility filed the Business Plan Petition in time on 31<sup>st</sup> August, 2015 and the Commission approved the Business Plan vide its Order No 48- JKSERC of 2015 on 14<sup>th</sup> October, 2015. However, JKPDD-D failed to file the Petition for True-Up for FY 2014-15, Annual Performance Review (APR) for FY 2015-16, Aggregate Revenue Requirement for the 2<sup>nd</sup> Multi Year Tariff (MYT) Control Period from FY 2016-17 to FY 2020-21 and Tariff proposal for FY 2016-17 by 30<sup>th</sup> November, 2015 and instead moved an application before the Commission on 7<sup>th</sup> December, 2015 seeking extension upto 31<sup>st</sup> December, 2015 on account of delay in necessary approvals regarding budgetary support by the Government to meet the revenue gap. The Commission granted the extension in time through Order passed on 11<sup>th</sup> December, 2015.
- 4. The Utility once again moved an application on 4<sup>th</sup> January, 2016 seeking another extension in time for filing of the Petition till 31<sup>st</sup> January, 2016. The Commission expressing its displeasure reluctantly extended the time upto 31<sup>st</sup> January, 2016. The Utility sought yet another extension on 1<sup>st</sup> February, 2016 for filing of the Petition upto 29<sup>th</sup> February, 2016. The Commission while disposing the application asked the Utility to take a call on how it proposes to deal with the tariff issue after 1<sup>st</sup> April, 2016 when the validity of the Tariff Period expires since by extending the date upto 29<sup>th</sup> February, 2016, the new tariff would not be available by 1<sup>st</sup> April, 2016 because of the procedural requirements as stipulated in the Act/ Regulations. The Commission in the same Order had sought relevant information from the Utility with the intention of initiating the proceedings for determination of tariff for FY 2016-17 on a Suo-motu basis.
- 5. The Utility finally filed the Petition for True-Up for FY 2014-15, Annual Performance Review (APR) for FY 2015-16, Aggregate Revenue Requirement for the 2<sup>nd</sup> Multi Year Tariff (MYT) Control Period from FY 2016-17 to FY 2020-21 and Tariff proposal for FY 2016-17 on 3<sup>rd</sup> March, 2016. On detailed analysis of the Petition, the Commission observed several information gaps and discrepancies in the Petition for which additional information was sought from the Petitioner vide Commission's letters No. JKSERC/ Secy/ 52/2015/1467-68 dated 4<sup>th</sup> March, 2016, JKSERC/Secy/52/2015/1498-99 dated 10<sup>th</sup> March, 2016, JKSERC/ Secy/52/ 2015/1577-78 dated 24<sup>th</sup> March, 2016 and JKSERC/ Secy/ 52/ 2015/46-48 dated 6<sup>th</sup> April, 2016.
- 6. The Commission held a technical validation session with the Petitioner on 9<sup>th</sup> March, 2016, took into consideration additional submissions made by the Petitioner and admitted the Petition on the same day.
- 7. The Commission vide its letter no. JKSERC/Secy/52/2015/1490-94 dated 9<sup>th</sup> March, 2016 directed the Petitioner to publish the gist of the Petition for True-Up for





FY 2014-15, Annual Performance Review (APR) for FY 2015-16, Aggregate Revenue Requirement for the 2<sup>nd</sup> Multi Year Tariff (MYT) Control Period from FY 2016-17 to FY 2020-21 and Tariff proposal for FY 2016-17 as public notice and invite comments/ objections/ suggestions from the stakeholders on the above mentioned petitions filed.

- 8. The approved gist of the Petition was published by the Petitioner in several widely read newspapers on 10<sup>th</sup>, 11<sup>th</sup>, 12<sup>th</sup> and 13<sup>th</sup> of March, 2016.
- 9. The copy of the Petition was also made available on the websites of the Commission and the Petitioner.
- 10. The stakeholders were requested to submit their written comments/ suggestions/ objections latest by 25<sup>th</sup> March, 2016. The stakeholders were also given an option to be heard in person at the public hearings.

### **Meeting of the State Advisory Committee**

- 11. The Commission convened a meeting with the Members of the State Advisory Committee (SAC) on 17<sup>th</sup> March, 2016 for the purpose of discussing the Petition for True-Up for FY 2014-15, Annual Performance Review (APR) for FY 2015-16, Aggregate Revenue Requirement for the 2<sup>nd</sup> Multi Year Tariff (MYT) Control period from FY 2016-17 to FY 2020-21 and Tariff proposal for FY 2016-17 filed by the JKPDD-D.
- 12. JKPDD gave a PowerPoint presentation providing a gist of the Petition filed by the Utility for True-Up for FY 2014-15, APR for FY 2015-16 and Aggregate Revenue Requirement for the 2<sup>nd</sup> MYT Control Period FY 2016-17 to FY 2020-21 and tariff proposal for FY 2016-17.
- 13. Several points were raised and discussed during the SAC meeting, which have been noted by the Commission and suggestions made by the members of the Committee and other points discussed have been considered by the Commission in this Order.

### **Public Hearings**

14. In order to maintain transparency in the tariff setting process, the Commission involved the stakeholders by initiating a public consultation process to elicit their views on various aspects of the Petition filed by the Petitioner. Accordingly, Public hearings were held at Srinagar and Jammu as per the details summarized in following table.

**Table 1: Details of Public Hearings** 

Place/ city	Date	Location
Srinagar	26.03.2016	J&K IMPA, Srinagar
Jammu	29.03.2016	Conference Hall, JKSERC





15. Various industrial organizations and consumer bodies attended the public hearings and represented their interests. The comments/ objections/ suggestions received during the hearings have been duly considered while finalizing this Order.

### Extension of applicability of the Tariff Order for FY 2015-16

- 16. As the Petitioner had failed to sufficiently respond to additional information sought by the Commission vide letter no. JKSERC/ Secy/ 52/ 2015/46-48 dated 6th April, 2016, the Commission, vide letter no. JKSERC/ Secy/ 52/2015/52-54 dated 12th April, 2016, sent a last reminder to the Utility for furnishing of the necessary information sought by the Commission, particularly the certified information/ documentary evidence of the budgetary allocation from GoJK for meeting the revenue gap of the Utility for FY 2014-15, FY 2015-16 and FY 2016-17.
- 17. The Utility instead of furnishing the required information filed another Petition before the Commission seeking extension of the applicability of retail tariffs of FY 2015-16 for a further period of one month i.e. for the month of April 2016. During the hearing on the above referenced Petition, the Utility filed another application seeking further extension in time to furnish the requisite information to the Commission. The Petitioner requested to extend the applicability of the Tariff Order of FY 2015-16 by a period of three months i.e. till end of June 2016 in order to enable the Utility to raise energy bills for period beyond 1st April, 2016 when the validity of the Tariff Order of FY 2015-16 expired. In light of the above, the Commission on 27<sup>th</sup> April, 2016 reluctantly extended the validity of the Tariff Order of JKPDD-D notified by Order No. 39-JKSERC of 2015 dated 18<sup>th</sup> August, 2015 beyond March 2016 upto the end of June 2016.
- 18. The Petitioner, yet again on 23<sup>rd</sup> July, 2016, filed an application to the Commission seeking further extension in the timeline to file the requisite information on the ground that the Utility being a Government department is dependent on the budgetary support from the GoJK for meeting the gap between ARR and revenue income and the letter from the Government committing the same is still awaited. In light of the above, the Petitioner requested to extend the applicability of the Tariff Order of FY 2015-16 further by a period of three months i.e. till end of September 2016 in order to enable the Utility to raise energy bills for period beyond 30<sup>th</sup> June, 2016 when the validity of the Order of the Commission dated 27<sup>th</sup> April, 2016 expired. Under the given circumstance, the Commission was left with no choice but to extend the validity of the Tariff Order of JKPDD-D notified by Order No. 39-JKSERC of 2015 dated 18<sup>th</sup> August, 2015 beyond 30<sup>th</sup> June, 2016 upto 30<sup>th</sup> September, 2016 unless amended or modified by an Order of the Commission.
- 19. Finally, the Utility submitted a letter dated 28<sup>th</sup> July, 2016 duly authenticated by the Director Finance, PDD indicating that the GoJK will provide the necessary support to the Utility to meet the revenue gap for FY 2016-17.
- 20. The Commission views that any adverse impact on the revenues of the Utility due to the delayed filing of the Petition and seeking repeated extensions of the applicability of the Petition shall be to the account of the Utility and shall have to be absorbed by the Utility.





### **Approved Aggregate Revenue Requirement and Revenue Gap**

21. The Commission has analyzed the cost for each of the items of the ARR in detail in this Order and has accordingly passed this Order on True-up for FY 2014-15, Annual Performance Review for FY 2015-16, Aggregate Revenue Requirement for FY 2016-17 to FY 2020-21 and Retail Tariffs for FY 2016-17 as summarized in the table below:

Table 2: Approved ARR and revenue gap at existing tariffs for FY 2014-15 to FY 2020-21 (Rs. Cr.)

Particulars	FY 2014-15	FY 2015-16	FY 2016-17	FY 2017-18	FY 2018-18	FY 2019-20	FY 2020-21
Costs							
Power Purchase Cost	3,746	4,261	4,202	4,349	4,356	4,307	4,814
Water usage charges	469	482	533	574	604	604	604
Intra-state transmission Charges	89	96	102	108	115	123	134
Operation and Maintenance Cost	538	572	558	597	641	690	744
Interest on Long Term Debt	13	13	12	12	12	13	14
Depreciation	6	6	6	7	7	8	9
Interest on Working Capital	58	69	75	82	90	100	110
<b>Total Costs</b>	4,920	5,499	5,488	5,728	5,826	5,845	6,429
Add: Return on Equity	0	0	0	0	0	0	0
Less: Non-Tariff Income	15	16	16	17	18	19	20
Aggregate Revenue Requirement	4,905	5,484	5,472	5,711	5,808	5,826	6,409
Less: Revenue from existing tariff	2,194	2,677	2,935	3,195	3,537	3,918	4,346
Revenue gap @ existing tariff	(2,711)	(2,806)	(2,537)	(2,516)	(2,271)	(1,908)	(2,062)

## **Approved Retail Tariffs for FY 2016-17**

- 22. Section 55 (g) of the J&K Act 2010 provides that the tariff determined by the Commission shall progressively reflect the cost of supply of electricity and also reduce the cross subsidy within the period specified by the Commission. NTP 2016 restricts the cross subsidy within +/- 20% of the cost of supply while determining the tariff.
- 23. A trajectory for reduction of AT&C losses upto 15% by FY 2019-20 has been fixed for turnaround of the power sector in the J&K state under the UDAY scheme. Further, the Utility has committed to eliminate the gap between ACS and ARR by FY 2019-20. Achievement of these targets pre-supposes steady increase in tariff to offset incremental costs in supply of power and to reduce the revenue gap which has increased substantially over the years in the case of the State power distribution utility.
- 24. It is pertinent to note that there has been no tariff hike in the state during FY 2014-15 and FY 2015-16. In fact, the State Government has reduced the electricity duty from 22% to 10% (12% reduction) which has given further relief to the consumers.





- 25. In the present scenario, each and every category of the consumer in the State, Government as well as Non-Government, is availing substantial subsidy ranging from 7% to 60% vis-à-vis the average cost of supply of the Utility for FY 2016-17. In view of the above, an increase in the tariff in the State is overdue so that it progressively matches the cost of supply in 4-5 years and to gradually reduce the ACS-ARR gap.
- 26. The GoJK in its Power Budget Speech for FY 2016-17 announced that it shall provide a subsidy to the tune of Rs 1,728.37 Cr to the JKPDD-D. Further, the Petitioner filed a supplementary Petition dated 30<sup>th</sup> June, 2016 supported by a letter dated 28<sup>th</sup> July, 2016 duly authenticated by the Director Finance, PDD indicating that the GoJK will provide the necessary support to the Utility to meet the revenue gap for FY 2016-17. Besides, the Utility also submitted in the supplementary Petition that the GoJK shall provide upto 30 units of free power and waiver of fixed charges for all metered BPL domestic consumers. The subsidy shall be provided from 1st January, 2017 by which time the GoJK would have consolidated, verified and authenticated the Aadhar linked list of BPL consumers in the State. However, no details pertaining to the number of such BPL domestic consumers in the State and the mechanism through which the GoJK shall provide subsidy were provided by the Utility. The Utility, in the Supplementary Petition, also submitted that in order to discourage the use of arc/induction furnaces in the State, the tariff of Power Intensive Unit (PIU) category should be brought closer to the actual cost of supply of the Utility.
- 27. The Commission, while working towards achievement of the objective for considering tariff hike during FY 2016-17, has ensured that no tariff shock is given to the common consumer and the interest of weaker section, in particular, is adequately protected. In case of other common consumers, the prudent loss figures at the national level have been the guiding principal for considering tariff revision so that the inefficiencies of the Utility such as high T&D loss are not passed on to the consumers.
- 28. Thus, while the average increase in tariff has been restricted to 10% or below in case of common consumers (BPL- 5%), the same has been revised appropriately to match the average cost of supply at the approved T&D loss levels in case of other category of consumers like Central/ State Government which don't deserve subsidy. Accordingly, the category-wise proposed and approved tariff for FY 2016-17 is as summarised in the following table:

Table 3: Category-wise proposed and approved tariff hike for FY 2016-17 (Rs/kWh)

Consumer Categories	Average CoS at proposed T&D loss level (42.40%)	Average CoS at approved T&D loss level (38.56%)	Existing average tariff for FY 2016-17 before tariff revision	Average Tariff Hike proposed by the Petitioner (%)	Average Tariff Hike approved by the Commission (%)	Approved average tariff for FY 2016- 17 after tariff revision	Average uncovered Gap
Domestic	8.03	6.88	2.77	23%	10%*	3.05	3.83
Non-Domestic/ Commercial	8.03	6.88	3.48	25%	10%	3.83	3.04
State/Central Govt. Dept.	8.03	6.88	6.42	0%	9%	7.00	(0.12)
Agriculture	8.03	6.88	3.05	14%	10%	3.35	3.53
Public Street Lighting	8.03	6.88	4.37	24%	60%	7.00	(0.12)
LT Public Water Works	8.03	6.88	4.67	36%	50%	7.00	(0.12)





Consumer Categories	Average CoS at proposed T&D loss level (42.40%)	Average CoS at approved T&D loss level (38.56%)	Existing average tariff for FY 2016-17 before tariff revision	Average Tariff Hike proposed by the Petitioner (%)	Average Tariff Hike approved by the Commission (%)	Approved average tariff for FY 2016- 17 after tariff revision	Average uncovered Gap
HT Public Water Works	8.03	6.88	5.23	42%	34%	7.00	(0.12)
LT Industrial Supply	8.03	6.88	3.43	14%	10%	3.76	3.12
HT Industrial Supply	8.03	6.88	3.86	15%	9%	4.21	2.67
HT-PIU Industrial Supply	8.03	6.88	4.58	15%	11%	5.07	1.81
General Purpose/ Bulk Supply	8.03	6.88	5.53	11%	5%	5.79	1.09
Average	8.03	6.88	3.69	18%	13.5%	4.19	2.69

<sup>\*5%</sup> for the BPL category

29. Even after tariff revision for FY 2016-17, there would remain an unmet revenue gap of Rs. 2,141.85 Cr as shown in the following table:

Table 4: Revenue Gap for FY 2016-17 (Rs. Cr.)

Particulars	<b>Proposed by Petitioner</b>	Approved by Commission
Aggregate Revenue Requirement	6384.33	5471.74
Revenue Realisation @ revised tariffs	3313.58	3329.88
Revenue Gap @ revised tariffs	3070.75	2141.85

- As stated earlier, the GoJK in its Power Budget Speech for FY 2016-17 announced that 30. it shall provide a subsidy to the tune of Rs. 1,728.37 Cr to the JKPDD-D. The Commission appreciates this step of the GoJK which shall ensure that the JKPDD-D graduates to a more transparent accounting system. Further, the Petitioner in the supplementary Petition duly supported by a letter from the Director Finance, PDD, submitted that the GoJK shall provide the necessary support to the Utility to meet the revenue gap for FY 2016-17. Accordingly, in light of Section 59 of the J&K Electricity Act, 2010 and Regulation 35 of the JKSERC Distribution Tariff Regulations, 2012, GoJK shall provide subsidy of Rs. 1,728.37 Cr and the remaining Operational Funding Requirement to be provided by the State Government would be Rs. 413.48 Cr (i.e. Rs. 2,141.85 - 1,728.37 Cr). The Commission directs that the subsidies proposed to be provided by the Government in terms of the announcements made in the Budget Speech shall be regulated strictly in terms of the provisions of the Section 59 of the Act read with the JKSERC Distribution Tariff Regulations, 2012. The Utility shall keep the Commission posted with the details.
- 31. As a measure for Demand Side Management (DSM), the Commission decides to introduce the Time of Day (ToD) tariff in a phased manner beginning with HT consumers with load above 1 MVA connected at 33 KV levels. In order to ensure that introduction of such a tariff structure serves its desired result of flattening the Utility's load curve and not as an additional source of revenue for the Utility, the Commission has kept the level of surcharge during peak hours and rebate during off peak hours at same level. Moreover, the duration for which peak hour surcharge and off peak hour rebate would be applicable has also been kept the same as summarized in the following table:

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Table 5: Approved ToD Charges for FY 2016-17 for HT consumers with load above 1 MVA connected at 33 KV levels

Peak Hours	Surcharge on Energy Charges	Off Peak Hours	Rebate on Energy Charges
(6 hours) 0600-0800 Hrs & 1800-2200 Hrs.	10%	( <b>6 hours</b> ) 2300-0500 Hrs	10%

# for other than peak and off-peak hours normal Energy Charges shall be applicable

- 32. As another measure for DSM, the Commission had earlier introduced kVAh tariffs for consumers with load above 100 KW. The Commission now decides to extend the kVAh tariffs to consumers with load above 50 KW in the Low Tension Industrial Supply category. Further, the Commission has approved the kVAh tariffs at a discount to the kWh tariffs for the same category in order to incentivize the consumers to shift to the kVAh tariff regime.
- 33. The existing tariffs for FY 2015-16 along with approved tariffs for FY 2016-17 are summarised in the following table:

Table 6: Category-wise proposed and approved tariffs for FY 2016-17

S. No.	Tariff Category	Existing Tariff FY 2015-16	Proposed by the Petitioner for FY 2016-17		Approved by the ( for FY 201	
		Rs/ kWh	Rs/ kWh	Hike (%)	Rs/ kWh	Hike (%)
1	Domestic					
	Below Poverty Line (Consu	mption upto 30 units/ mo	nth)			
	Energy Charges (Rs./kWh)	1.19	1.35	13.45%	1.25	5.00%
	Fixed Charges (Rs./KW or part thereof/ month)	5.00	5.00	0%	5.00	0%
	Metered (Rs./kWh)					
	up to 100 units per month	1.54		47.40%	1.69	10%
	101-200 units per month	2.00	2.27	13.50%	2.20	10%
	201-400 units per month	3.00	3.41	13.67%	3.30	10%
	>400 units per month	3.20	3.64	13.75%	3.52	10%
	>800 units per month	-	4.20	31.25%	-	-
	Fixed Charges (Rs./KW or part thereof/ month)					
	For all units	5.00	8.00	60.0%	5.50	10%
	Un Metered (Rs./month)					
	up to 1/4 KW	89	335	276.40%	99	11%
	1/4-1/2 KW	295	333	13.56%	325	11%
	1/2-3/4 KW	445	CCA	49.21%	490	11%
	3/4-1 KW	585	664	13.50%	650	11%
	1 KW to 2 KW	Rs. 585 + Rs.140 for every additional ½ KW or part thereof upto 2 KW	1301	79.45%	Rs. 650 +Rs.155 for every additional ½ KW or part thereof upto 2 KW	11%

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No.	Tariff Category	Existing Tariff FY 2015-16	Proposed by the FY 201		Approved by the Commission for FY 2016-17		
		Rs/ kWh	Rs/ kWh	Hike (%)	Rs/ kWh	Hike (%)	
	Above 2 KW	Rs. 1,145 + Rs.460 for every additional ½ KW or part thereof above 2 kW	Rs. 1,301 + Rs.460 for every additional ½ KW or part thereof above 2 KW	13.62%	Rs.1,270+ Rs.510 for every additional <sup>1</sup> / <sub>4</sub> KW or part thereof above 2 KW	11%	
2	Non Domestic/Commercia	ıl					
	Metered Connection						
	Single Phase						
	up to 100 units/month	2.55	2.90	13.73%	2.81	10%	
	101-200 units/month	2.70	4.44	64.44%	2.97	10%	
	201-300 units/month	3.90		13.85%	4.29	10%	
	>300 units per month	4.20	4.78	13.81%	4.62	10%	
	Three phase						
$\longrightarrow$	For all units	4.55	5.12	12.53%	5.01	10%	
$\longrightarrow$	Fixed Charges (Rs./kW/mor						
$\longrightarrow$	Single Phase	40.00	48.00	20.00%	44.00	10%	
$\longrightarrow$	Three phase	95.00	114.00	20.00%	104.50	10%	
$\longrightarrow$	Y7 3.6 / *						
$\longrightarrow$	Un Metered	200		102.020/	210.00	110/	
$\rightarrow$	up to 1/4 KW	280	819.90	192.82%	310.00	11%	
$\longrightarrow$	1/4-1/2 KW	720	1,620,41	13.88%	800.00 1587.00	11%	
	1/2-1 KW Above 1 KW and part	1430	1628.41	13.87%	1587.00	11%	
	thereof for every kW above 1 kW	1925	2192.09	13.87%	2136.00	11%	
3	State/central						
	Govt. department						
	Metered connection						
$\longrightarrow$	Energy Charges (Rs/kWh)	6.30	6.3	0%	6.88	9%	
	11 KV supply	2.5% rebate on energy charges			2.5% rebate on energy charges		
	33 KV supply	5% rebate on energy charges			5% rebate on energy charges		
	Fixed Charges (Rs./kW/month)	30	30	0%	30	0%	
4	Agriculture						
	Metered						
	Energy Charges (Rs./kWh)						
	0-10 HP	0.60	0.74	23.33%	0.66	10%	
	11-20 HP	0.65		13.85%	0.72	10%	
$\longrightarrow$	Above 20 HP	4.75	5.42	14.11%	5.23	10%	
$\longrightarrow$	Fixed Charges for connecte	,	<u> </u>				
$\longrightarrow$	0-10 HP	15	20	33.33%	15	0%	
$\longrightarrow$	11-20 HP	20		0.00%	20	0%	
I	Above 20 HP	40	40	0.00%	40	0%	
	Un Metered (Rs/HP/mont) 0-10 HP	·	<u> </u>	22.240/	205.25	1 1 0/	
	U-111 HP	185	228	23.24%	205.35 222.00	11%	
		200		14.00%	7.7.7.00	11%	
	11-20 HP	200	1 15 1				
	11-20 HP Above 20 HP	200 1275	1454	14.04%	1415.25	11%	
5	11-20 HP Above 20 HP Public Street Lighting		1454				
5	11-20 HP Above 20 HP		6.3				

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S. No.	Tariff Category	Existing Tariff FY 2015-16		e Petitioner for 16-17	Approved by the Commission for FY 2016-17		
		Rs/ kWh	Rs/ kWh	Hike (%)	Rs/ kWh	Hike (%)	
	Unmetered connection						
	(Rs./KW/month or part thereof)	1350	3024	124.00%	3200	137%	
6	LT Public water works						
	Metered						
	Energy Charge (Rs./ KWh)	5.55	6.33	14.05%	6.87	24%	
	Fixed Charge (Rs./kW/month)	45	54	20.00%	50	11%	
	Unmetered connection						
	(Rs./kW/month)	1465	4438.95	203.00%	_*	-	
7	HT Public water works						
	Metered Connection						
	11 KV supply						
	Energy Charge (Rs/kVAh)	3.95	5.73	45.06%	5.41	37%	
	Demand Charge (Rs./kVA/month)	220	264	20.00%	242	10%	
	33 KV supply and Above			45.05			
	Energy Charge (Rs/kVAh)	3.75	5.44	45.07%	5.14	37%	
	Demand Charge (Rs./kVA/month)	210	252	20.00%	231	10%	
8	LT Industrial supply						
	LTIS I						
	For consumers with connec	eted load < 50 KW					
	Energy Charge (Rs/kWh)	3	3.41	13.67%	3.30	10%	
	Fixed Charge	47	56	19.15%	50.00	5%	
	(Rs./kW/month)				30.00	3 70	
	For consumers with connec	ted load > 50 KW, kVA	h tariff shall be appli	cable	_	T	
	Energy Charges (Rs./kVAh)*	-			3.09	-	
	Fixed Charges (Rs./kVA/month)	-			47.00	-	
	LTIS II (upto 15 HP)						
	Energy Charge (Rs/kWh)	3	3.41	13.67%	3.30	10%	
	Fixed Charge (Rs./kW/month)	20	25	25.00%	21	5%	
9	HT Industrial supply						
	11 KV supply	2.60	2.01	10.4004	2.05	100/	
	Energy Charge (Rs/kVAh)  Demand Charge	2.68	3.04 156	13.43%	2.95	10%	
	(Rs./kVA/month)	150	150	20.0070	130.3	370	
	33 KV supply and above	2.6	2.05	10.150	2.00	100	
	Energy Charge (Rs/kVAh)	2.6	2.95	13.46%	2.86	10%	
	Demand Charge (Rs./kVA/month)	130	156	20.00%	136.5	5%	
10	HT PIU						
	11 KV supply						
	Energy Charge (Rs/ kVAh)	3.21	3.64	13.40%	3.60		
	Demand Charge (Rs./kVA/month)	195	234	20.00%	205	11%	
	33 KV supply and above						

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S. No.	Tariff Category	Existing Tariff FY 2015-16	Proposed by the Petitioner for FY 2016-17		Approved by the for FY 20	
		Rs/ kWh	Rs/ kWh	Hike (%)	Rs/ kWh	Hike (%)
	Energy Charge (Rs./ kVAh)	2.98	3.38	13.42%	3.34	
	Demand Charge (Rs./kVA/month)	190	228	20.00%	200	
11	Bulk supply					
	11 KV supply					
	Energy Charge (Rs./ kVAh)	3.78	4.29	13.49%	4.00	
	Demand Charge (Rs./kVA/month)	193	193	0.00%	193	
	33 KV supply and above					4.7%
	Energy Charge (Rs./ kVAh)	3.62	4.11	13.54%	3.85	
	Demand Charge (Rs./kVA/month)	187	187	0.00%	187	

<sup>\*</sup>The Commission has not approved any tariff for unmetered category in LT public water works as there are no unmetered consumers in this category as per the submission made by the Petitioner before the Commission

### Implementation of the Order

- 34. The Commission has passed the present Order after admitting the Petition for True-Up for FY 2014-15, Annual Performance Review (APR) for FY 2015-16, Aggregate Revenue Requirement for the 2<sup>nd</sup> Multi Year Tariff (MYT) Control Period from FY 2016-17 to FY 2020-21 and Tariff proposal for FY 2016-17 of JKPDD-D with modifications and conditions. The Commission directs that this Order be implemented along with directions given and conditions mentioned in the detailed Order and schedules attached. It is further ordered that JKPDD-D is permitted to issue bills to consumers only in accordance with provisions of this Tariff Order and JKSERC (Supply Code) Regulations, 2011.
- 35. This Tariff Order shall come into effect from 1<sup>st</sup> October, 2016 and shall remain valid up to 31<sup>st</sup> March, 2017, unless amended or modified or extended by an Order of this Commission.
- 36. JKPDD-D must take immediate steps for implementation and publication of this Order as per Regulation 51, Chapter-V of the JKSERC (Conduct of Business) Regulations, 2005.
- 37. The Commission directs that this Order be implemented along with directions given and conditions mentioned in the detailed Order.





38. In exercise of the powers vested in it under the Jammu & Kashmir Electricity Act, 2010 (Act XIII of 2010), the Commission hereby passes this Order today i.e. on the 7<sup>th</sup> October, 2016.

Ordered as above, read with attached detailed reasons, grounds and conditions.

Date: 07.10.2016 (Basharat Ahmad Dhar)

Place: Srinagar Chairperson





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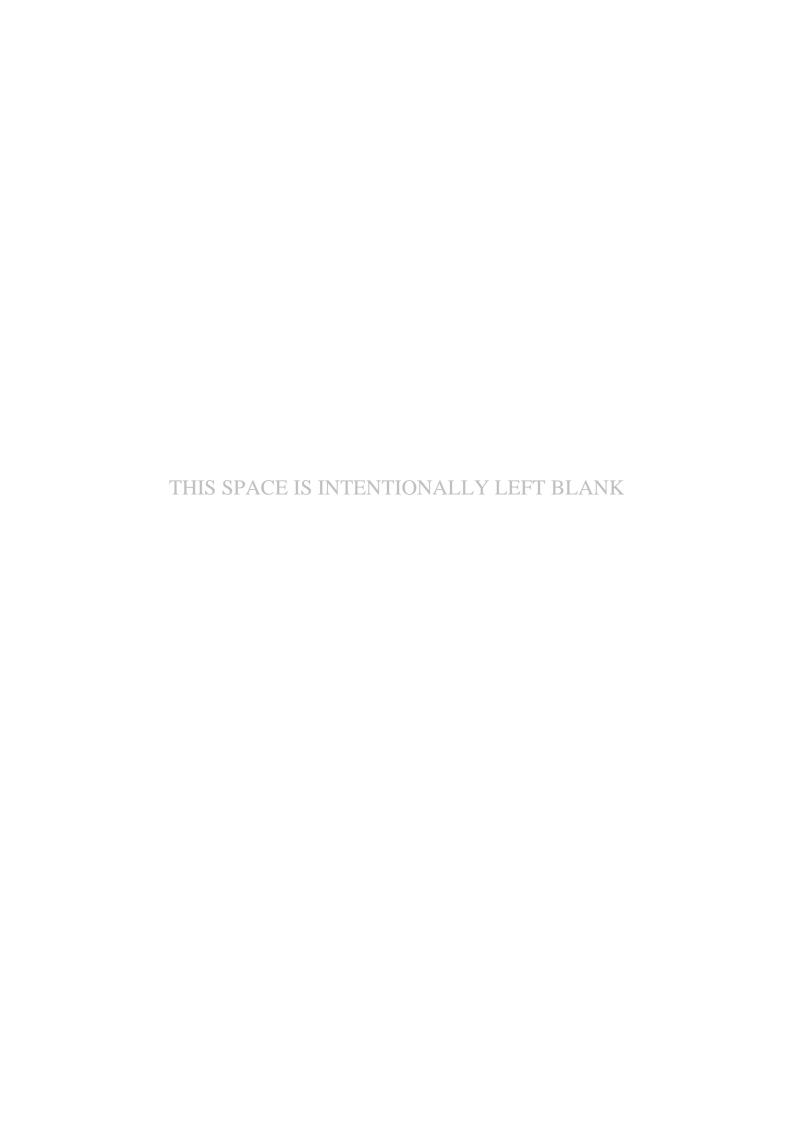




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#### **CHAPTER 1: INTRODUCTION**

## Jammu & Kashmir State Electricity Regulatory Commission

- 1.1. The Jammu & Kashmir State Electricity Regulatory Commission (hereinafter referred to as the Commission) is a statutory body setup under an Act of the State Legislature to regulate power sector in the State of Jammu &Kashmir.
- 1.2. Section 71 of the Jammu & Kashmir Electricity Act, 2010 has described the various functions required to be discharged by the Commission. These functions have been summarised below:
  - (a) determine the tariff for generation, supply, transmission and wheeling of electricity, wholesale, bulk or retail, as the case may be, within the State:
    - Provided that where open access has been permitted to a category of consumers under section 36, the State Commission shall determine only the wheeling charges and surcharge thereon, if any, for the said category of consumers;
  - (b) regulate electricity purchase and procurement process of distribution licensees including the price at which electricity shall be procured from the generating companies or licensees or from other sources through agreements for purchase of power for distribution and supply within the State;
  - (c) facilitate intra-state transmission and wheeling of electricity;
  - (d) issue license to persons seeking to act as transmission licensees, distribution licensees and electricity traders with respect to their operations within the State:
  - (e) promote co-generation and generation of electricity from renewable sources of energy by providing suitable measures for connectivity with the grid and sale of electricity to any person, and also specify, for purchase of electricity from such sources, a percentage of the total consumption of electricity in the area of a distribution licensee:
  - (f) adjudicate upon the disputes between the licensees, and generating companies and to refer any dispute for arbitration;
  - (g) levy fee for the purposes of the Act;
  - (h) specify State Grid Code consistent with the Grid Code specified under the Electricity Act, 2003 (Central);
  - (i) specify or enforce standards with respect to quality, continuity and reliability of service by licensees;





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- (j) fix the trading margin in the intra-State trading of electricity, if considered, necessary; and
- (k) discharge such other functions as may be assigned to it under this Act.
- 1.3. The Commission shall ensure transparency while exercising its powers and discharging its functions.
- 1.4. In discharge of its functions, the Commission shall be guided by the State Electricity Policy, State Electricity Plan, and Tariff Policy published under the provisions of the Act.

### Jammu & Kashmir Power Development Department

- 1.5. JKPDD, viz. Power Development Department (PDD), Government of Jammu & Kashmir is the sole transmission and distribution utility in the State of Jammu and Kashmir.
- 1.6. The Government of Jammu & Kashmir (GoJK), vide GO no. 264 PDD of 2012 dated 5<sup>th</sup> September, 2012, ordered for unbundling of JKPDD and setting up of one transmission company, two distribution companies (one each for Jammu and Kashmir divisions) and one trading company with the function of a holding company. In line with the above order, GoJK has ordered for setting up of the following companies vide GO no. 285 PDD of 2012 dated 21<sup>st</sup> September, 2012:
  - (a) Jammu & Kashmir State Power Transmission Company Limited
  - (b) Jammu & Kashmir State Power Trading Company Limited
  - (c) Jammu Power Distribution Company Limited
  - (d) Kashmir Power Distribution Company Limited
- 1.7. As unbundling was not complete, the Commission vide its Order No. JKSERC/135 of 2013 dated 25<sup>th</sup> April, 2013 approved separate ARR for the Distribution business of JKPDD for the entire MYT Control Period from FY 2013-14 to FY 2015-16.
- 1.8. The Commission passed an Order on Annual Performance Review (APR) for FY 2013-14, Aggregate Revenue Requirement and Tariff for FY 2014-15 on 24<sup>th</sup> June, 2014.
- 1.9. The Commission passed an Order on the True up for FY 2013-14, Annual Performance Review (APR) for FY 2014-15 and Aggregate Revenue Requirement and Tariff for FY 2015-16 on 18<sup>th</sup> August 2015.
- 1.10. The Commission passed an Order on the Business Plan of JKPDD-D for the 2<sup>nd</sup> MYT Control Period FY 2016-17 to FY 2020-21 on 14<sup>th</sup> October, 2015.



1.11. JKPDD-D has now filed the Petition for True-Up for FY 2014-15, Annual Performance Review (APR) for FY 2015-16 and Aggregate Revenue Requirement for the 2<sup>nd</sup> MYT Control Period FY 2016-17 to FY 2020-21 and tariff proposal for FY 2016-17 as per the provisions of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012 and JKSERC (Conduct of Business) Regulations, 2005.

### **Scope of the Present Order**

1.12. The ambit of the present Order extends to approval of True-Up for FY 2014-15, Annual Performance Review (APR) for FY 2015-16 and Aggregate Revenue Requirement for the 2<sup>nd</sup> MYT Control Period FY 2016-17 to FY 2020-21 and tariff for FY 2016-17 for the distribution business of JKPDD (hereinafter referred to as JKPDD-D of the Petitioner).

## **Procedural History**

- 1.13. As per the JKSERC Regulations (Multi Year Distribution Regulations), 2012, the utility was required to file the Petition for approval of Business Plan for the 2nd MYT Period by 31st August 2015 and based on the approved Business Plan, the Petition for approval of ARR for the Control Period along with tariff proposal for the 1st year of Control Period was required to be filed by or before 30th November 2015.
- 1.14. The Utility filed the Business Plan petition in time on 31st August, 2015 and the Commission approved the Business Plan vide its order No 48- JKSERC of 2015 on 14th October, 2015. However, JKPDD-D failed to file the Petition for True-Up for FY 2014-15, Annual Performance Review (APR) for FY 2015-16, Aggregate Revenue Requirement for the 2nd Multi Year Tariff (MYT) Control Period from FY 2016-17 to FY 2020-21 and Tariff proposal for FY 2016-17 by 30th November 2015 and instead moved an application before the Commission on 7th December 2015 seeking extension upto 31st December 2015 on account of delay in necessary approvals regarding budgetary support by the Govt. to meet the revenue gap. The Commission granted the extension in time through Order passed on 11th December 2015.
- 1.15. The Utility once again moved an application on 4<sup>th</sup> January, 2016 seeking another extension in time for filing of the Petition till 31<sup>st</sup> January, 2016. The Commission expressing its displeasure reluctantly extended the time upto 31<sup>st</sup> January, 2016.
- 1.16. The Utility sought another extension on 1<sup>st</sup> February, 2016 for filing of the Petition upto 29<sup>th</sup> February, 2016. The Commission while disposing the application asked the utility to take a call on how it proposes to deal with the tariff issue after 1st April 2016 when the validity of the Tariff Period expires since by extending the date upto 29th February 2016, the new tariff would not be available by 1st April 2016 because of the procedural requirements as stipulated in the Act/Regulations. The Commission in the same order had sought relevant information from the utility with the intention of initiating the proceedings for determination of tariff for FY 2016-17 suo-motu.



- 1.17. The Utility filed the Petition for True-Up for FY 2014-15, Annual Performance Review (APR) for FY 2015-16, Aggregate Revenue Requirement for the 2nd Multi Year Tariff (MYT) Control Period from FY 2016-17 to FY 2020-21 and Tariff proposal for FY 2016-17 on 3rd March 2016. On detailed analysis of the Petition, the Commission observed several information gaps and discrepancies in the Petition for which additional information was sought from the Petitioner vide Commission's letters No. JKSERC/Secy/52/2015/1467-68 dated 4<sup>th</sup> March, 2016, JKSERC/Secy/52/2015/1498-99 dated 10<sup>th</sup> March, 2016, JKSERC/ Secy/52/2015/1577-78 dated 24<sup>th</sup> March, 2016 and JKSERC/ Secy/ 52/2015/46-48 dated 6<sup>th</sup> April, 2016.
- 1.18. The Commission held a technical validation session with the Petitioner on 9<sup>th</sup> March, 2016 and admitted the Petition on the same day.
- 1.19. The Commission vide its letter no. JKSERC/Secy/52/ 2015/ 1490-94 dated 9<sup>th</sup> March, 2016 directed the Petitioner to publish the gist of the Petition for True-Up for FY 2014-15, Annual Performance Review (APR) for FY 2015-16, Aggregate Revenue Requirement for the 2<sup>nd</sup> Multi Year Tariff (MYT) Control Period from FY 2016-17 to FY 2020-21 and Tariff proposal for FY 2016-17 as public notice and invite comments/ objections/ suggestions from the stakeholders on the above mentioned petition filed.
- 1.20. The copy of the Petition was also made available on the websites of the Commission and the Petitioner.
- 1.21. The stakeholders were requested to submit their written comments/ suggestions/ objections latest by 25<sup>th</sup> March, 2016. The stakeholders were also given an option to be heard in person at the public hearings.

## **Meeting of the State Advisory Committee**

- 1.22. The Commission convened a meeting with the Members of the State Advisory Committee (SAC) on 17<sup>th</sup> March 2016 for the purpose of discussing the Petition filed by the JKPDD-D.
- 1.23. JKPDD gave a Power Point presentation providing a gist of the Petition filed by the Utility for True-Up for FY 2014-15, APR for FY 2015-16 and Aggregate Revenue Requirement for the 2<sup>nd</sup> MYT Control Period FY 2016-17 to FY 2020-21 and tariff proposal for FY 2016-17.
- 1.24. Some of the key points raised and discussed by the members of the Committee are summarized below:
  - (a) The Members of the SAC inquired the reasons for the change in proposed trajectory of the T&D losses for the second MYT control period in comparison to the trajectory approved by the Commission in the Business Plan for the Control Period. The JKPDD informed that since it had already executed an agreement with the Govt. of India under UDAY scheme, the Utility was asked to submit a copy of the same to the Commission and share





the benchmarks for loss reductions and metering etc. as agreed to with the Commission. The Members of the SAC suggested that the T&D loss trajectory for the second MYT Control Period may be aligned with trajectory agreed under the UDAY scheme, as far as possible.

- (b) The Members of the SAC asked the officers of the JKPDD-D that as there has been no procurement of energy meters by JKPDD-D in the past, how unmetered consumers have been shown as converted to metered consumers during the year. The officers of the JKPDD-D stated that while there have been issues in meter procurement, the JKPDD-D has procured some meters under the R-APDRP scheme. The officers informed the Members of the SAC that meters are still available under the scheme.
- (c) The Members of the SAC asked the officers of the JKPDD-D whether the targets shown for converting unmetered consumers to metered consumers in FY 2015-16 shall be achieved considering that only sixteen days are remaining for the ending of the financial year. The officers of the JKPDD-D stated that these targets may have to be revised downwards.
- (d) The Members of the SAC asked the officers of the JKPDD-D about the procedure for checking the quality of the meters and other material for works under execution under R-APDRP being procured. DCP JKPDD-D stated that world class procedures are being followed for monitoring of quality of material. Besides independent consultants, a three member team is involved along with a CE level officers for monitoring the quality of procured material. The officers of the JKPDD-D stated that there are no quality issues but problems are faced because of undeclared load of consumers. They further stated that they are trying to find out ways to tackle these issues.
- (e) The Members of the SAC suggested that efforts should be made to publicize the metering initiatives and educate the public on the need for adopting metered connections. The DCP JKPDD-D appreciated the suggestions of the SAC Member and stated that seminars and meetings shall be conducted to promote conservation.
- (f) The Members of the SAC asked the officers of the JKPDD-D about the reasons for not submitting the circle wise T&D Losses. JKPDD-D stated that circle wise T&D losses are not used to calculate the energy balance anywhere in India but the JKPDD-D will try and submit it next year. It was however, pointed out that for carrying and monitoring all power reforms programmes, a distribution circle is considered as a profit center. Therefore, the contention of the JKPDD-D is not correct. Unless the performance of each profit center is known, how can the weak spots be identified and remedial measures taken?
- (g) One of the Members of the SAC stated that against the prudent T&D Loss of about 21%, JKPDD-D has projected a T&D losses of nearly 43% for FY 2016-17. The Members of the SAC stated that this is a very serious matter and asked about where these losses were occurring. The officers of the JKPDD-D stated that most of the losses were occurring in the urban areas as



- 60% of the power is being consumed in the urban areas. They further stated that R-APDRP scheme is targeted at reduction of losses in the urban areas.
- (h) One of the Members of the SAC stated that even suburban areas, on the periphery of urban areas do not have proper electricity network and suggested that the network, mainly the LT network needs lot of improvement along with metering to reduce losses. The officers of the JKPDD-D stated that R-APDRP scheme also involved system strengthening and upgradation works.
- (i) The Chairman, JKSERC, citing the recommendations of Parliamentary Standing Committee on power reforms that Utilities are now supposed to have the breakup of technical and commercial losses in distribution, stated that high distribution loss of J&K PDD is a matter of worry and these have to be reduced to contain the power purchase bill. It was suggested that T&D loss trajectory shall have to be aligned to the trajectory agreed by the JKPDD-D under the UDAY scheme and related figures for approval of ARR worked accordingly. JKPDD has already been asked by the Commission to furnish a copy of the agreement in this regard.
- (j) The Members of the SAC asked the officers of the JKPDD-D if the department had capitalized Rs 127.50 Cr in FY 2015-16 as claimed in the Petition. The officers of the JKPDD-D stated that activities under R-APDRP Part-A had been completed and capitalization plan submitted is expected to be achieved.
- (k) The Members of the SAC asked the officers of the JKPDD-D about why is the load curtailment schedule not publicized in advance. The officers of the JKPDD-D stated that the schedule is uploaded on the website of the JKPDD-D but measures shall be taken to publicize the same in advance. They also stated that sometimes the load curtailment has to be resorted to under distress conditions which cannot be foreseen and consumers intimated in advance.
- (l) In the matter of JKPDD's proposal to introduce TOD tariff, the Members of the SAC stated that the industrial consumers are already facing difficulties on account of power interruptions and poor quality supply. TOD Tariff regime shall further reduce competitiveness of the goods produced in the State. The Members of the SAC stated that JKPDD-D must ensure the quality and reliability of supply round the clock before the implementation of the scheme.
- (m) The Chairman, JKSERC, asked the officers of the JKPDD-D about how the TOD scheme was designed, what were the objectives of implementing such a scheme and whether there was any reason that the time period for offering rebate on consumption was lesser than the duration when peak time charges were proposed to be levied. He asked the Utility to clearly come out and justify whether the proposal is only a DSM measure, as projected or it is aimed to generate some more revenue. The Utility was also asked to submit the details of its preparedness to introduce TOD regime giving the status of



compliant metering and data downloading facilities in place. The Chairman also asked the utility to submit the likely impact of the TOD regime on the load curve of various regions and the State as a whole. The officers of the JKPDD-D stated that the scheme is designed only as a Demand Side Management (DSM) measure. They also stated that duration of hours with rebate shall be reworked.

- (n) With regard to JKPDD's proposal for lowering the slab for application of kVAh tariff, the Members of the SAC favored the implementation of the same being an important measure to control Power Factor and consequent Reactive Energy flow system on such categories/groups of consumers who have compliant metering in place.
- (o) On the issue of JKPDD's proposal for merging of tariff slabs in domestic categories of consumers, the officers of the JKPDD-D stated that not many domestic consumers were in the tariff slab up to 100 units hence it was proposed to merge it with the next slab of consumption between 200 to 300 units. The Members of the SAC questioned that if there are not too many consumers in the slab, this will not result in significant increase in revenue for the JKPDD-D. JKPDD-D was asked to provide slab wise data on consumers, connected load and sales for analysis of its tariff proposal.
- (p) Discussing the Utility's tariff proposal for unmetered domestic consumer, it was stated that the tariff had been unbundled last year on the basis of a proposal submitted by the Utility itself and now the JKPDD-D was proposing to undo the same. JKPDD was asked to submit the rationale for reversing the proposal, supported with details like number of consumers each slab with sale/revenue.
- (q) The Members of the SAC stated that fixed charges were introduced a few years ago to incentivize the consumers to declare their load. The Members of the SAC suggested that fixed charges may not be increased as it may not impact the revenue to that extent but discourage the consumer to disclose their actual load. JKPDD-D stated that fixed charges in other states such as Delhi was much higher than the prevailing tariff in J&K.
- (r) The Chairman, JKSERC stated that the Commission shall take a view on the same as the financial impact of the proposal has to be assessed. The officers of the JKPDD-D were advised to clarify the background about the philosophy/ rationale behind targeting tariff hikes for smaller consumers. JKPDD-D stated that it is trying to reduce the cross subsidy within the tariff slabs of the consumer category. The SAC Members opined that the tariff hikes were earlier targeted for the unmetered consumers to discourage unmetered consumption. Since the Utility has failed over the years to meter these unmetered installations despite repeated directions from the Commission, how could the Utility justify any exorbitant increase in tariff for such categories.





- (s) The Utility was asked for the reasons for not rationalizing the tariff slabs for consumers in the Non-domestic category like that done for domestic category. It was stated that there has to be a basis for each of these proposals.
- (t) JKPDD-D was asked for the reasons for the proposal for combining tariff slabs for consumers with pump sets having load less than 10 HP and above 10 HP. The Members of the SAC were generally of the opinion that most of the consumers had pump sets with connected load of 10 HP or below, which needs to be considered by the Commission. The Officers of the JKPDD-D stated that the hike proposed in tariff in the Agriculture category shall primarily impact State Govt. consumers. They were asked to submit the relevant details to the Commission.
- (u) JKPDD-D was asked for the methodology behind proposing increase in tariff for public street light, particularly in unmetered category. JKPDD-D stated that proposal has been worked out considering a rate of Rs 6.33/unit, for the average hours of use per month.
- (v) The Members of the SAC asked the officers of the JKPDD-D for the reason for providing unmetered power supply to the water supply schemes and for proposing flat rate tariff for such consumers when JKPDD has submitted that 100% metering is in place in public water works installation.
- (w) Some Members of the SAC stated that for the LT Industry category, the proposed increase in tariff shall burden the industries further.
- (x) The Members of the SAC asked the officers of the JKPDD-D for the reasons for not proposing any increase in fixed charges for Bulk supply category consumers and also for the tariff applicable to the Central/State Govt. consumers. The officers of JKPDD-D were advised to submit an explanatory note detailing the reasons and justification for proposed tariff hike for each category.
- (y) One of the SAC members pointed out that JKPDD in its energy bills is levying surcharge on surcharge on account of delayed payments in the previous months which is not in accordance with the methodology specified by the Commission in its tariff orders. The Chairman, JKSERC of the Commission informed the house that in its tariff order for Distribution sector for FY 2015-16, the Commission has clearly illustrated the method of levying surcharge by working examples. The Utility submitted that this problems arose due to an error in its billing software which has now been rectified.
- The Members of the SAC were of the view that there should be reasonable incremental hike in electricity tariff every year which also sees acceptability by the consumers. During the last two years in view of JKPDD-D's not proposing any hike and undertaking of J&K Govt. that the revenue gap shall be met out of the State budget, the JKSERC, under provisions of Section 59 of the Act did not approve any tariff hike during these years. Moreover, the electricity consumers of the State since October, 2015 got a considerable



relief on overall electricity bills on account of electricity duty which has been reduced by the Govt. from 22% to 10%. Keeping these factors in view, the SAC advised that the JKSERC should analyze the tariff proposal and approve a reasonable hike in the tariff for FY 2016-17, simultaneously taking care that none of the consumer categories/slabs are given a tariff shock.

1.25. Several other points were also raised and discussed during the SAC meeting, which also have been noted by the Commission and suggestions made by the members of the Committee on above-mentioned points and other points discussed have been considered by the Commission in this Order. The participants of the SAC meeting are listed in **Annexure 1**.

### **Inviting Public Comments**

1.26. The Petitioner published a public notice indicating the salient features of its Petition and inviting objections and suggestions from the consumers and other stakeholders. The public notice containing the gist of the Petition along with the schedules of public hearing appeared in the following newspapers:

. No.	Newspaper	Date of Publication
1	Kashmir Times	10.3.2016
2	Northern Lines	10.3.2016
3	Daily Excelsior	11.3.2016
4	Amar Ujjala	11.3.2016
5	Greater Kashmir	12.3.2016
6	Daily Aftab	13.3.2016

**Table 7: List of Newspapers** 

- 1.27. The copies of the Petitions were made available for purchase on all working days for consumers from Utility's offices in Jammu, Srinagar and Leh. The copy of Petition was also made available on websites of the Commission and the Petitioner.
- 1.28. The public notice advised respondents to submit (in person or by post or by fax) four copies of their comments/ suggestions/ objections written either in English, Hindi or Urdu to the Commission with a copy to JKPDD-D. The last date for submitting the comments/ suggestions/ objections was 25<sup>th</sup> March, 2016. Respondents were also given the option to be heard in person during the public hearings conducted by the Commission on 26<sup>th</sup> March 2016 at Srinagar and on 29<sup>th</sup> March 2016 at Jammu.
- 1.29. The Commission and Petitioner received objections/ comments in writing from fourteen (14) respondents. The list of stakeholders who responded to the public notice on Petition in writing and those who attended the public hearings is provided in **Annexure 2** and **Annexure 3**, respectively of this Order.



- 1.30. The Commission held public hearings on 26<sup>th</sup> March 2016 at Srinagar and on 29<sup>th</sup> March 2016 at Jammu, to discuss the issues related to the Petition filed by JKPDD-D for approval of the Commission. The public hearings enabled the utility to present its case and to respond to the objections raised by various respondents.
- 1.31. The issues and concerns voiced by various stakeholders have been carefully examined by the Commission. The major issues discussed during the public hearing, the objections raised by the respondents and the observations made by the Commission, have been summarized in **Chapter 3** of this Order.

### Extension of applicability of the Tariff Order for FY 2015-16

- 1.32. As the Petitioner had failed to sufficiently respond to additional information sought by the Commission vide letter no. JKSERC/ Secy/ 52/ 2015/46-48 dated 6th April, 2016, the Commission, vide letter no. JKSERC/ Secy/ 52/2015/52-54 dated 12th April, 2016, sent a last reminder to the Utility for furnishing of the necessary information sought by the Commission, particularly the certified information/ documentary evidence of the budgetary allocation from GoJK for meeting the revenue gap of the Utility for FY 2014-15, FY 2015-16 and FY 2016-17.
- 1.33. The Utility instead of furnishing the required information filed another Petition before the Commission seeking extension of the applicability of retail tariffs of FY 2015-16 for a further period of one month i.e. for the month of April 2016. During the hearing on the above referenced Petition, the Utility filed another application seeking further extension in time to furnish the requisite information to the Commission. The Petitioner requested to extend the applicability of the Tariff Order of FY 2015-16 by a period of three months i.e. till end of June 2016 in order to enable the Utility to raise energy bills for period beyond 1st April, 2016 when the validity of the Tariff Order of FY 2015-16 expired. In light of the above, the Commission on 27th April, 2016 reluctantly extended the validity of the Tariff Order of JKPDD-D notified by Order No. 39-JKSERC of 2015 dated 18th August, 2015 beyond March 2016 upto the end of June 2016.
- 1.34. The Petitioner, yet again on 23rd July, 2016, filed an application to the Commission seeking further extension in the timeline to file the requisite information on the ground that the Utility being a Government department is dependent on the budgetary support from the GoJK for meeting the gap between ARR and revenue income and the letter from the Government committing the same is still awaited. In light of the above, the Petitioner requested to extend the applicability of the Tariff Order of FY 2015-16 further by a period of three months i.e. till end of September 2016 in order to enable the Utility to raise energy bills for period beyond 30th June, 2016 when the validity of the Order of the Commission dated 27th April, 2016 expired. Under the given circumstance, the Commission was left with no choice but to extend the validity of the Tariff Order of JKPDD-D notified by Order No. 39-JKSERC of 2015 dated 18th August, 2015 beyond 30th June, 2016 upto 30th September, 2016 unless amended or modified by an Order of the Commission



1.35. The Petitioner filed a supplementary Petition dated 30th June, 2016 supported by a letter dated 28th July, 2016 duly authenticated by the Director Finance, PDD indicating that the GoJK will provide the necessary support to the Utility to meet the revenue gap for FY 2016-17. Besides, the Utility also submitted in the supplementary Petition that the GoJK shall provide upto 30 units of free power and waiver of fixed charges for all metered BPL domestic consumers. The subsidy shall be provided from 1st January, 2017 by which time the GoJK would have consolidated, verified and authenticated the Aadhar linked list of BPL consumers in the State. However, no details pertaining to the number of such BPL domestic consumers in the State and the mechanism through which the GoJK shall provide subsidy were provided by the Utility. The Utility, in the Supplementary Petition, also submitted that in order to discourage the use of arc/induction furnaces in the State, the tariff of Power Intensive Unit (PIU) category should be brought closer to the actual cost of supply of the Utility.





### **CHAPTER 2: SUMMARY OF THE PETITION**

2.1 This section contains a summary of the Petition for True-Up for FY 2014-15, APR for FY 2015-16, ARR for 2<sup>nd</sup> MYT Control Period FY 2016-17 to FY 2020-21 and Tariff proposal for FY 2016-17 submitted by JKPDD-D.

### **Metering Plan**

2.2 JKPDD-D plans to meter all the unmetered connections in various customer categories by FY 2018-19. The metering plan for the period FY 2015-16 to FY 2018-19 is given in the table below:

Table 8: Metering Plan for the period FY 2015-16 to FY 2018-19

Category	Total No. of Installations Ending March 15	No. of Metered Installations	No. of Un- metered Installatio ns	No. of meters to be installed during FY 2015- 16	No. of meters to be installed during FY 2016- 17	No. of meters to be installed during FY 2017- 18	No. of meters to be installed during FY 2018-19	Total requirement of energy meters for 100% Metering*
Domestic	1,390,856	711,503	679,353	181,129	222,867	306,001	308,560	1,018,557
Other Categories	234,566	133,363	101,203	21,246	29,670	38,708	39,542	129,166
Total	1,625,422	844,866	780,556	202,374	252,537	344,709	348,103	1,147,723

<sup>\*</sup>Includes 367167 no. of meters to be installed for the new installations

### **Consumers, Connected Load and Sales**

2.3 The actuals submitted by the Petitioner for FY 2014-15 and the revised estimates for FY 2015-16 which are in line with the consumers, connected load and sales approved by the Hon'ble Commission in the Order for the Business Plan dated 14 Oct' 2015 are tabulated below:

Table 9: Actual No of Consumers for FY 2014-15 and Revised Estimates for FY 2015-16

Sl. No.	Consumer Category	FY 2014-15 (Actual)	FY 2015-16 (RE)
1	Domestic		
	- Metered	711,503	892,632
	- Unmetered	679,353	645,385
2	Non-Domestic / Commercial		
	- Metered	118,398	138,123
	- Unmetered	62,718	59,582
3	Agriculture		
	- Metered	13,144	14,245
	- Unmetered	6,224	5,913
4	State / Central Govt. Department		
	- Metered	11,040	11,320
	- Unmetered	0	0





Sl. No.	Consumer Category	FY 2014-15 (Actual)	FY 2015-16 (RE)
5	Public Street Lighting		
	- Metered	121	154
	- Unmetered	141	118
6	LT industrial Supply		
	- Metered	19,487	20,932
	- Unmetered	0	0
7	HT Industrial Supply		
	- Metered	714	785
	- Unmetered	0	0
8	HT-PIU Industrial Supply		
	- Metered	13	13
	- Unmetered	0	0
9	LT Public Water Works		
	- Metered	1,700	2,087
	- Unmetered	418	397
10	HT Public Water Works		
	- Metered	298	265
	- Unmetered	0	0
11	Bulk Supply		
	Metered	150	158
	Unmetered	0	0
12	Temporary/Misc.	0	0
	Grand Total	1,625,422	1,792,108

Table 10: Actual Connected Load for FY 2014-15 and Revised Estimates for FY 2015-16 (MW)

Sl. No.	Consumer Category	FY 2014-15 (Actual)	FY 2015-16 (RE)
1	Domestic		
	- Metered	984	1,180
	- Unmetered	423	402
2	Non-Domestic / Commercial		
	- Metered	262	303
	- Unmetered	51	48
3	Agriculture		
	- Metered	106	115
	- Unmetered	27	26
4	State / Central Govt. Department		
	- Metered	226	253
	- Unmetered	0	0
5	Public Street Lighting		
	- Metered	7	9
	- Unmetered	5	4
6	LT industrial Supply		
	- Metered	249	279



Sl. No.	Consumer Category	FY 2014-15 (Actual)	FY 2015-16 (RE)
	- Unmetered	0	0
7	HT Industrial Supply		
	- Metered	322	361
	- Unmetered	0	0
8	HT-PIU Industrial Supply		
	- Metered	33	33
	- Unmetered	0	0
9	LT Public Water Works		
	- Metered	74	82
	- Unmetered	19	18
10	HT Public Water Works		
	- Metered	25	26
	- Unmetered	0	0
11	Bulk Supply		
	Metered	62	68
	Unmetered	0	0
12	Temporary/Misc.	0	0
	Grand Total	2,875	3,206

Table 11: Actual Sales for FY 2014-15 and Revised Estimates for FY 2015-16 (MU's)

Sl. No.	Consumer Category	FY 2014-15 (Actual)	FY 2015-16 (RE)
1	Domestic		
	- Metered	1,804	2,275
	- Unmetered	852	710
2	Non-Domestic / Commercial		
	- Metered	473	632
	- Unmetered	347	289
3	Agriculture		
	- Metered	207	235
	- Unmetered	74	62
4	State / Central Govt. Department		
	- Metered	719	805
	- Unmetered	0	0
5	Public Street Lighting		
	- Metered	20	28
	- Unmetered	28	23
6	LT industrial Supply		
	- Metered	338	378
	- Unmetered	0	0
7	HT Industrial Supply		
	- Metered	821	920
	- Unmetered	0	0
8	HT-PIU Industrial Supply		
	- Metered	110	110



Sl. No.	Consumer Category	FY 2014-15 (Actual)	FY 2015-16 (RE)
	- Unmetered	0	0
9	LT Public Water Works		
	- Metered	212	274
	- Unmetered	196	163
10	HT Public Water Works		
	- Metered	132	139
	- Unmetered	0	0
11	Bulk Supply		
	Metered	161	177
	Unmetered	0	0
12	Temporary/Misc.	0	0
	Grand Total	6,493	7,220

2.4 For the 5-year MYT Control Period (FY 2016-17 to FY 2020-21), the Petitioner has projected no of consumers on the basis of historical trends and the CAGR across different categories. The connected load has been projected on the basis of growth in number of consumers and CAGR and energy sales have been projected on the basis of category-wise historical growth in energy sales in each of the consumer category, growth in number of consumers, growth in connected load and the projected metering plan. Category wise no of consumers, connected load and energy sales as submitted by the Petitioner for the 5-Year MYT Control Period is given as under:

Table 12: Projected No of Consumers for MYT Control Period FY 2016-17 to FY 2020-21

Sl. No.	Consumer Category	2016-17 (Proj.)	2017-18 (Proj.)	2018-19 (Proj.)	2019-20 (Proj.)	2020-21 (Proj.)
1	Domestic					
	- Metered	1,115,499	1,421,500	1,730,060	1,799,262	1,871,233
	- Unmetered	484,039	242,020	0	0	0
2	Non-Domestic / Commercial					
	- Metered	164,881	199,798	235,470	249,598	264,574
	- Unmetered	44,687	22,343	0	0	0
3	Agriculture					
	- Metered	16,832	20,219	23,670	24,972	26,346
	- Unmetered	4,435	2,217	0	0	0
4	State/Central Govt.					
	- Metered	12,226	13,204	14,260	15,401	16,633
	- Unmetered	0	0	0	0	0
5	Public Street Lighting					
	- Metered	199	260	323	342	363
	- Unmetered	88	44	0	0	0
6	LT industrial Supply					
	- Metered	22,188	23,519	24,930	26,426	28,012
	- Unmetered	0	0	0	0	0
7	HT Industrial Supply					
	- Metered	848	916	989	1,068	1,153





Sl. No.	Consumer Category	2016-17 (Proj.)	2017-18 (Proj.)	2018-19 (Proj.)	2019-20 (Proj.)	2020-21 (Proj.)
	- Unmetered	0	0	0	0	0
8	HT-PIU Industrial Supply					
	- Metered	13	13	13	13	13
	- Unmetered	0	0	0	0	0
9	LT Public Water Works					
	- Metered	2,367	2,710	3,066	3,290	3,529
	- Unmetered	298	149	0	0	0
10	HT Public Water Works					
	- Metered	278	292	307	322	338
	- Unmetered	0	0	0	0	0
11	Bulk Supply					
	Metered	174	191	210	231	254
	Unmetered	0	0	0	0	0
12	Temporary/Misc.	0	0	0	0	0
	Grand Total	1,869,050	1,949,395	2,033,299	2,120,926	2,212,448

Table 13: Projected Connected Load for MYT Control Period FY 2016-17 to FY 2020-21

Sl. No.	Consumer Category	2016-17 (Proj.)	2017-18 (Proj.)	2018-19 (Proj.)	2019-20 (Proj.)	2020-21 (Proj.)
1	Domestic					
	- Metered	1,476	1,847	2,246	2,524	2,837
	- Unmetered	301	151	0	0	0
2	Non-Domestic / Commercial					
	- Metered	359	426	500	562	631
	- Unmetered	36	18	0	0	0
3	Agriculture					
	- Metered	129	146	165	174	183
	- Unmetered	19	10	0	0	0
4	State / Central Govt.					
	- Metered	283	318	356	398	446
	- Unmetered	0	0	0	0	0
5	Public Street Lighting					
	- Metered	10	13	15	16	17
	- Unmetered	3	2	0	0	0
6	LT industrial Supply					
	- Metered	313	350	392	440	492
	- Unmetered	0	0	0	0	0
7	HT Industrial Supply					
	- Metered	404	453	507	568	636
	- Unmetered	0	0	0	0	0
8	HT-PIU Industrial Supply					
	- Metered	33	33	33	33	33
	- Unmetered	0	0	0	0	0
9	LT Public Water Works					
	- Metered	93	108	123	132	142





Sl. No.	Consumer Category	2016-17 (Proj.)	2017-18 (Proj.)	2018-19 (Proj.)	2019-20 (Proj.)	2020-21 (Proj.)
	- Unmetered	13	7	0	0	0
10	HT Public Water Works					
	- Metered	28	29	30	32	33
	- Unmetered	0	0	0	0	0
11	Bulk Supply					
	Metered	75	82	90	99	109
	Unmetered	0	0	0	0	0
12	Temporary/Misc.	0	0	0	0	0
	Grand Total	3,577	3,992	4,458	4,977	5,560

Table 14: Projected Sales for MYT Control Period FY 2016-17 to FY 2020-21 (MU's)

Sl. No.	<b>Consumer Category</b>	2016-17 (Proj.)	2017-18 (Proj.)	2018-19 (Proj.)	2019-20 (Proj.)	2020-21 (Proj.)
1	Domestic	(2 200)	(110,11)	(110,11)	(110]1)	(110,11)
	- Metered	2,843	3,597	4,480	5,017	5,619
	- Unmetered	533	266	0	0	0
2	Non-Domestic / Commercial					
	- Metered	760	934	1,124	1,222	1,329
	- Unmetered	217	108	0	0	0
3	Agriculture					
	- Metered	310	411	539	675	845
	- Unmetered	47	23	0	0	0
4	State / Central Govt.					
	- Metered	846	890	935	983	1,034
	- Unmetered	0	0	0	0	0
5	Public Street Lighting					
	- Metered	40	58	80	99	123
	- Unmetered	18	9	0	0	0
6	LT industrial Supply					
	- Metered	400	423	447	473	500
	- Unmetered	0	0	0	0	0
7	HT Industrial Supply					
	- Metered	1,049	1,196	1,363	1,554	1,772
	- Unmetered	0	0	0	0	0
8	HT-PIU Industrial Supply					
	- Metered	115	121	127	133	140
	- Unmetered	0	0	0	0	0
9	LT Public Water Works					
	- Metered	324	396	470	486	502
	- Unmetered	122	61	0	0	0
10	HT Public Water Works					
	- Metered	146	153	161	169	177
	- Unmetered	0	0	0	0	0
11	Bulk Supply					
	Metered	187	199	211	223	237





Sl. No.	Consumer Category	2016-17 (Proj.)	2017-18 (Proj.)	2018-19 (Proj.)	2019-20 (Proj.)	2020-21 (Proj.)
	Unmetered	0	0	0	0	0
12	Temporary/Misc.	0	0	0	0	0
	Grand Total	7,955	8,845	9,937	11,034	12,277

### Distribution losses & energy balance

2.5 The actual distribution loss for FY 2014-15, revised estimates of FY 2015-16, projections for 2nd Control Period FY 2016-17 to FY 2020-21 submitted in the Petition and revised submissions (based on the loss trajectory agreed by the GoJK/ Utility in the MoU signed under MoU with the GoI) made by Petitioner have been summarized below.

Table 15: Distribution loss trajectory as per original submission

Particulars	FY 2014-15	FY 2015-16	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
	Actual	RE	Proj.	Proj.	Proj.	Proj.	Proj.
Distribution Loss (%)	49.02%	44%	40%	36%	32%	28%	24%

Table 16: Distribution loss trajectory as per revised submission

Particulars	FY 2014-15	FY 2015-16	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
	Actual	RE	Proj.	Proj.	Proj.	Proj.	Proj.
Distribution Loss (%)	49.02%	44%	40%	35%	25%	15%	15%

2.6 The energy balance as submitted by the Petitioner is summarised below:

Table 17: Actual Energy Balance for FY 2014-15 and Revised Estimates for FY 2015-16 (MU)

Description	Unit	2014-15 (Actual)	2015-16 (RE)
Energy Sales	MU	6,493.37	7,220.41
Losses	MU	6,243.28	5,673.18
Distribution Losses	%	49.02%	44.00%
Total Energy required at Transmission –Distribution Interface	MU	12,736.65	12,893.59
Net Energy delivered into distribution system	MU	12,736.65	12,893.66
Intra-State Transmission losses	%	4.00%	4.00%
Intra-State Transmission losses	MU	530.69	537.24
Total energy injected into state transmission system	MU	13,267.34	13,430.89
Energy injected into state transmission system by JKSPDC plants	MU	2,430.50	2,430.50
Net energy available from CPSUs	MU	10,836.85	11,000.40
Interstate state transmission loss	MU	404.70	410.80
Gross energy available from CPSUs	MU	11,241.54	11,411.20

Table 18: Revised Energy Balance for 2nd Control Period from FY 2016-17 to FY 2020-21 (MU)

Description	Unit	2016-17 (Proj.)	2017-18 (Proj.)	2018-19 (Proj.)	2019-20 (Proj.)	2020-21 (Proj.)
Energy Sales	MU	7,955.44	8,844.89	9,936.69	11,034.38	12,276.65







Description	Unit	2016-17 (Proj.)	2017-18 (Proj.)	2018-19 (Proj.)	2019-20 (Proj.)	2020-21 (Proj.)
Losses	MU	5,303.93	4,762.92	3,312.39	1,947.92	2,167.00
Distribution Losses	%	40%	35%	25%	15%	15%
Energy required	MU	13,259.93	13,608.92	13,249.39	12,981.92	14,445.00
Net Energy delivered into distribution system	MU	13,259.93	13,608.92	13,249.39	12,981.92	14,445.00
Intra-State Transmission losses	%	4.00%	4.00%	4.00%	4.00%	4.00%
Intra-State Transmission losses	MU	552.47	566.99	552.05	540.93	601.82
Total energy injected into state transmission system	MU	13259.07	13607.52	13248.92	12981.62	14443.12
Energy injected into state transmission system by JKSPDC plants	MU	3,081.52	3,609.26	3,992.33	3,992.33	3,992.33
Net energy available from CPSUs	MU	10730.33	10565.53	9808.80	9530.90	11053.14
Interstate state transmission loss	MU	400.72	394.56	366.30	355.93	412.77
Gross energy available from CPSUs	MU	11131.05	10960.10	10175.11	9886.83	11465.92

## **Aggregate Revenue Requirement**

2.7 The following tables summarise the ARR as submitted by the Petitioner:

Table 19: Aggregate Revenue Requirement for FY 2014-15 (Rs Cr)

Particulars	Approved by JKSERC in MYT Order dated 25.04.2013	Submitted by Petitioner in last year's Review Petition	Approved by JKSERC in last year's Tariff Order dated 18.08.2015	Actual Submitted now
Power Purchase Cost	3,180.04	4,382.02	3,837.45	4,453.98
Water Usage Charges (JKSPDC + NHPC)	305.65	518.82	436.20	518.82
Intra-state transmission charges	128.11	89.37	89.37	152.58
O&M Expenses	473.42	543.53	523.07	543.53
Interest on Loans	18.33	14.78	13.36	15.42
Depreciation	7.92	6.15	5.95	5.95
Interest on Working Capital	51.77	59.82	62.04	51.44
Add: Return on Equity	0.00	0.00	0.00	0.00
Gross ARR	4,165.24	5,614.49	4,967.44	5,489.93
Less: Non-tariff income	14.80	14.79	14.79	14.79
Net ARR	4,150.44	5,599.70	4,952.65	5,726.92
Revenue assessed @ existing tariff	1,825.74	2,154.52	2,255.26	1,813.72
Revenue Gap	(2,324.70)	(3,445.18)	(2,697.39)	(3,913.19)







Table 20: Aggregate Revenue Requirement for FY 2015-16 (Rs Cr)

Particulars	Approved by JKSERC in MYT Order dated 25.04.2013	Approved by JKSERC in last year's Tariff Order dated 18.08.2015	Revised Estimates Now
Power Purchase Cost	3,610.93	4,373.30	4,655.78
Water Usage Charges (JKSPDC + NHPC)	305.65	518.82	533.43
Intra-state transmission charges	148.18	96.48	161.88
O&M Expenses	524.01	563.54	588.04
Interest on Loans	21.28	14.91	16.13
Depreciation	9.47	6.99	6.11
Interest on Working Capital	59.58	71.19	71.09
Add: Return on Equity	0.00	0.00	0.00
Gross ARR	4,679.10	5,645.23	5,857.17
Less: Non-tariff income	15.54	15.53	15.53
Net ARR (A)	4,663.56	5,629.70	6,016.94
Revenue assessed @ existing tariff	2,111.05	2,580.57	2,590.43
Revenue Gap @ Existing Tariff	(2,552.51)	(3,049.13)	(3,426.50)

Table 21: Aggregate Revenue Requirement for 2nd MYT Control Period from FY 2016-17 to FY 2020-21 as per original Submission (Rs Cr)

ARR Components	FY 2016-17 Proj.	FY 2017-18 Proj.	FY 2018-19 Proj.	FY 2019-20 Proj.	FY 2020-21 Proj.
Power Purchase Cost	4,859	5,227	5,800	6,395	7,079
Water usage charges	584	625	655	655	655
Intra-state transmission Charges	176	198	249	325	380
Operation and Maintenance Cost	681	788	910	1,049	1,205
Interest on Long Term Debt	17	18	20	21	23
Depreciation	6	7	7	8	9
Interest on Working Capital	78	87	98	109	122
Total Costs	6,401	6,950	7,739	8,562	9,472
Add: Return on Equity	0	0	0	0	0
Less: Non-Tariff Income	16	17	18	19	20
Aggregate Revenue Requirement	6,384	6,933	7,721	8,543	9,453
Less: Revenue from existing tariff	2,812	3,122	3,508	3,895	4,334
Revenue gap @ existing tariff	(3,572)	(3,811)	(4,213)	(4,648)	(5,119)

Table 22: Aggregate Revenue Requirement for 2nd MYT Control Period from FY 2016-17 to FY 2020-21 as per revised submission (Rs Cr)

ARR Components	FY 2016-17 Proj.	FY 2017-18 Proj.	FY 2018-19 Proj.	FY 2019-20 Proj.	FY 2020-21 Proj.
Power Purchase Cost	4,859	5,102	5,188	5,367	6,236
Water usage charges	584	625	655	655	655
Intra-state transmission Charges	176	198	249	325	380
Operation and Maintenance Cost	681	788	910	1,049	1,205
Interest on Long Term Debt	17	18	20	21	23





ARR Components	FY 2016-17 Proj.	FY 2017-18 Proj.	FY 2018-19 Proj.	FY 2019-20 Proj.	FY 2020-21 Proj.
Depreciation	6	7	7	8	9
Interest on Working Capital	78	87	98	109	122
Total Costs	6,401	6,825	7,127	7,534	8,629
Add: Return on Equity	0	0	0	0	0
Less: Non-Tariff Income	16	17	18	19	20
Aggregate Revenue Requirement	6,384	6,808	7,109	7,515	8,609
Less: Revenue from existing tariff	2,812	3,122	3,508	3,895	4,334
Revenue gap @ existing tariff	(3,572)	(3,686)	(3,601)	(3,620)	(4,276)

# **Cost of Supply**

2.8 The projected average cost of supply as against overall average realization submitted by Petitioner is summarized below:

Table 23: Average Cost of Supply submitted by the Petitioner

Sl. No.	Description	2014-15 @ loss level (49.02%)	2015-16 @ Proj loss level (44.00%)	2016-17 @ Proj loss level (40.00%)	2017-18 @Proj loss level (35.00%)	2018-19 @Proj loss level (25.00%)	2019-20 @Proj loss level (15.00%)	2020-21 @Proj loss level (15.00%)
1	Energy Sale (MU)	6,493.37	7,220.41	7,955.44	8,844.89	9,936.69	11,034.38	12,276.65
2	Average cost of Supply	8.82	8.33	8.03*	7.70*	7.15*	6.81*	7.01*

<sup>\*</sup>Based on revised submission

## Details of tariff revision proposal for FY 2016-17

JKPDD-D has proposed to partially bridge/ reduce the revenue gap for the FY 2016-17 of Rs. 3,572.14 Cr through additional revenue from proposed tariff revision across consumer categories. While the unmet revenue gap is proposed to be funded through budgetary support from Government of J&K. The increase in tariff will reduce the revenue gap for FY 2016-17 by Rs 506.52 Cr. The proposed tariff for various consumer categories is as shown below:

**Table 24: Proposed Tariff Structure for FY 2016-17** 

S. No	Tariff Category	Existing Tariff (FY 2015- 16)	Tariff Category	Proposed Tariff (FY 2016- 17)
1	Domestic		Domestic	
	Below Poverty Line (Consumption upto 30 units/ month)		Below Poverty Line (Consumption upto 30 units/ month)	
	Energy Charges (Rs./kWh)	1.19	Energy Charges (Rs./kWh)	1.35
	Fixed Charges (Rs./KW or part thereof/ month)	5	Fixed Charges (Rs./KW or part thereof/month)	5
	Metered (Rs./kWh)		Metered (Rs./kWh)	
	up to 100 units per month	1.54	up to 200 units per month	2.27







		Existing		Proposed
S.	TD +00 C /	Tariff		Tariff
No	Tariff Category	(FY 2015-	T +00 C +	(FY 2016-
		16)	Tariff Category	17)
	101-200 units per month	2		
	201-400 units per month	3	201-400 units per month	3.41
	>400 units per month	3.2	400-800 units per month	3.64
	_		>800 units per month	4.20
	Fixed Charges (Rs./KW or part		Fixed Charges (Rs./KW or part	
	thereof/month)		thereof/month)	
	For all units	5	For all units	8
	Un Metered (Rs./month)		Un Metered	
	` ´		(Rs./month)	
	up to 1/4 KW	89	up to 1/2 KW	335
	1/4-1/2 KW	295	up 10 1/2 KW	333
	1/2-3/4 KW	445	1/2-1 KW	664
	3/4-1 KW	585	1/2 1 KW	00-1
	1-11/4KW	725		
	11/4-11/2KW	865	1-2 KW	1301
	11/2-13/4KW	1005	12 KW	1301
	13/4-2KW	1145		
		Rs. 1,145 +		Rs.1,301+
		Rs.460 for		Rs.460
		every		for every
	Above 2 KW	additional 1/4	Above 2 KW	additional 1/4
		KW or part		KW or part
		thereof above		thereof
		2 KW		above 2 KW
2	Non Domestic/Commercial		Non Domestic/Commercial	
	Metered Connection		Metered Connection	
	Single Phase		Single Phase	
	up to 100 units/month	2.55	up to 100 units/month	2.9
	101-200 units/month	2.7	101-300 units/month	4.44
	201-300 units/month	3.9	101-300 units/month	4.44
	>300 units per month	4.2	>300 units per month	4.78
	Three phase		Three phase	
	For all units	4.55	For all units	5.12
	Fixed Charges (Rs./KW/month)		Fixed Charges (Rs./KW/month)	
	Single Phase	40	Single Phase	48
	Three phase	95	Three phase	114
	Un Metered		Un Metered	
	up to 1/4 KW	280		010.0
	1/4-1/2 KW	720	up to 1/2 KW	819.9
	1/2-1 KW	1430	1/2-1 KW	1628.41
	Above 1 KW and part thereof for every KW above 1 KW	1925	Above 1 KW and part thereof for every KW above 1 KW	2192.09
	CVCI y A II WOOVE I AW		For all loads >20 KW, kVAh tariff shall be	
			applicable	
3	State/ Central Govt.		State/ Central Govt.	
J	department		department	
	11 KV supply	6.3	11 KV supply	6.3
1	33 KV supply and above	6.3	33 KV supply and above	6.3





S. No	Tariff Category	Existing Tariff (FY 2015-		Proposed Tariff (FY 2016-
110		16)	Tariff Category	17)
	Fixed Charges (Rs./KW/month)		Fixed Charges (Rs./KW/month)	
	For metered consumers	30	For metered consumers	30
			For all loads >20KW, kVAh tariff applicable	shall be
4	Agriculture		Agriculture	
	Metered		Metered	
	Energy Charges (Rs./kWh)		Energy Charges (Rs./kWh)	
	0-10 HP	0.6	Connected load <= 20 HP	0.74
	11-20 HP	0.65		
	Above 20 HP	4.75	Connected Load > 20 HP	5.42
	Fixed Charges for connected load (Rs/HP/month)		Fixed Charges for connected load (Rs/HP/month)	
	0-10 HP	15	H-4- 20 HD	20
	11-20 HP	20	Upto 20 HP	20
	Above 20 HP	40	Above 20 HP	40
	Un Metered (Rs/HP/month)		Un Metered (Rs/HP/month)	
	0-10 HP	185	H-4- 20 HD	229
	11-20 HP	200	Upto 20 HP	228
	Above 20 HP	1275	Above 20 HP	1454
5	Public Street Lighting		Public Street Lighting	
	Metered connection		Metered connection	
	Energy Charge (Rs./kWh)	5	Energy Charge (Rs./kWh)	6.3
	Fixed Charge (Rs./KW)	40	Fixed Charge (Rs./KW)	48
	Unmetered connection		Unmetered connection	
	(Rs./KW/month or part thereof)	1350	(Rs./KW/month or part thereof)	3024
			For all loads >20KW, kVAh tariff applicable	shall be
6	Public water works		Public water works	
	LT Connection		LT Connection	
	Metered		Metered	
	Energy Charge (Rs./kWh)	5.55	Energy Charge (Rs./kWh)	6.33
	Fixed Charge (Rs./KW/month)	45	Fixed Charge (Rs./KW/month)	54
	Unmetered connection		Unmetered connection	
	(Rs./KW/month)	1465	(Rs./KW/month)	4438.95
			For all loads >20 KW, kVAh tar applicable	iff shall be
7	Dublic woter			
7	Public water works		Public water works HT Connection	
	HT Connection  Metered Connection		Metered Connection	
	Meterea Connection  11 KV supply	+	11 KV supply	
	Energy Charge (Rs/kVAh)	3.95	Energy Charge (Rs./kVAh)	5.73
	Demand Charge		Demand Charge	3.13
	(Rs./KVA/month)	220	(Rs./KVA/month)	264
	33 KV supply and Above		33 KV supply and Above	
	Energy Charge (Rs/kVAh)	3.75	Energy Charge (Rs./kVAh)	5.44
	Demand Charge	210	Demand Charge	252
	(Rs./KVA/month)		(Rs./KVA/month)	





S. No	Tariff Category	Existing Tariff (FY 2015- 16)	Tariff Category	Proposed Tariff (FY 2016- 17)
8	LT Industrial supply		LT Industrial supply	
	LTIS I		LTIS I	
	Energy Charge (Rs./kWh)	3	Energy Charge (Rs./kWh)	3.41
	Fixed Charge (Rs./KW/month)	47	Fixed Charge (Rs./KW/month)	56
	LTIS II		LTIS II	
	Energy Charge (Rs/kWh)	3	Energy Charge (Rs./kWh)	3.41
	Fixed Charge (Rs./KW/month)	20	Fixed Charge (Rs./KW/month)	25
			For all loads >20 KW, kVAh tarabe applicable	iff shall
9	HT Industrial supply		HT Industrial supply	
	11 KV supply		11 KV supply	
	Energy Charge (Rs/kVAh)	2.68	Energy Charge (Rs./ kVAh)	3.04
	Demand Charge	130	Demand Charge	156
	(Rs./KVA/month)	130	(Rs./KVA/month)	130
	33 KV supply and above		33 KV supply and above	
	Energy Charge (Rs/kVAh)	2.6	Energy Charge (Rs./kVAh)	2.95
	Demand Charge	130	Demand Charge	156
	(Rs./KVA/month)	130	(Rs./KVA/month)	130
10	HT PIU		HT PIU	
	11 KV supply		11 KV supply	
	Energy Charge (Rs/kVAh)	3.21	Energy Charge (Rs./ kVAh)	3.64
	Demand Charge	195	Demand Charge	234
	(Rs./KVA/month)	193	(Rs./KVA/month)	234
	33 KV supply and above		33 KV supply and above	
	Energy Charge (Rs./ kVAh)	2.98	Energy Charge (Rs./ kVAh)	3.38
	Demand Charge	190	Demand Charge	228
	(Rs./KVA/month)	190	(Rs./KVA/month)	228
11	Bulk supply		Bulk supply	
	11 KV supply		11 KV supply	
	Energy Charge (Rs./ kVAh)	3.78	Energy Charge (Rs./ kVAh)	4.29
	Demand Charge		Demand Charge	
	(Rs./KVA/month)	193	(Rs./KVA/month)	193
	33 KV supply and above		33 KV supply and above	
	Energy Charge (Rs./ kVAh)	3.62	Energy Charge (Rs./ kVAh)	4.11
	Demand Charge	187	Demand Charge	187
	(Rs./KVA/month)	10/	(Rs./KVA/month)	10/

2.10 The JKPDD has proposed some measures for DSM for efficient energy management:

# Time of Day (TOD) Tariff Design

2.11 JKPDD proposes to introduce TOD tariff for HT consumers only during FY 2016-17 and the TOD tariff design proposed is as under:





Table 25: ToD proposal for FY 2016-17

Peak Hours	Surcharge on Energy Charges	Off-Peak Hours	Rebate on Energy
0500-0900 hrs & 1800-2200 hrs ( <b>8 hours</b> )	20%	0100-0500 hrs* ( <b>4 hours</b> )	10%

<sup>#</sup> For other than peak and off-peak hours normal Energy Charges shall be applicable

# kVAh Tariff for all loads above 20 KW:

2.12 kVAh tariff is already being applied to the consumers with loads above 100 KW and now JKPDD has proposed to extend the kVAh tariff to all loads above 20 KW. The kWh and kVAh tariff in each category have been proposed to be kept at par with each other so that at unity power factor there is no disparity in the charges paid by the consumers in the same category for same consumption.







<sup>\*</sup>Petitioner had now revised duration of off-peak hours to 6 hours from 2300-0500 hours

#### **CHAPTER 3: PUBLIC CONSULTATION PROCESS**

- 3.1 The Commission directed JKPDD-D to publish the gist of the proposal indicating the salient features of its Petition for inviting objections and suggestions from the consumers and other stakeholders. The JKPDD-D published a gist of the Petition in several widely circulated newspapers in the State on 10<sup>th</sup>, 11<sup>th</sup>, 12<sup>th</sup> and 13<sup>th</sup> March, 2016.
- 3.2 The schedule of the public notices for conducting public hearings in Srinagar and Jammu was also published as part of the gist of the Petition.
- 3.3 The copies of the Petition as submitted by JKPDD-D were made available to the stakeholders from the following offices of JKPDD-D on payment of photocopying charges:
  - (a) Development Commissioner (Power), PDD Complex, Janipur, Jammu
  - (b) Chief Engineer, Commercial and Survey Wing, Gladni, Narwal Bala, Jammu
  - (c) Chief Engineer, EM & RE Wing, Kashmir, Exhibition Ground, Srinagar
  - (d) Chief Engineer, EM&RE Wing, Canal Power House, Jammu
  - (e) SE, EM & RE, Circle, Choglamsar, Leh
- 3.4 Copies were also made available to be downloaded from JKPDD-D website: <a href="https://www.jkpdd.gov.in">www.jkpdd.gov.in</a> and Commission website: <a href="https://www.jkserc.nic.in">www.jkserc.nic.in</a>.
- 3.5 The public notice advised respondents to submit (in person or by post or by fax) their objections written either in English, Hindi or Urdu to the Commission with copies to JKPDD-D. Respondents were also given the option to be heard in person during the public hearings conducted by the Commission. The last date for submitting the comments/ objections on the petition was 25<sup>th</sup> March, 2016.
- 3.6 JKPDD-D were asked to reply to each of the objections/ comments/ suggestions received within three days of the receipt of the same but not later than 27<sup>th</sup> March, 2016 for all the objections/ comments/suggestions received till 25<sup>th</sup> March, 2016.
- 3.7 The Stakeholders were advised to submit their rejoinders on replies provided by JKPDD-D either during the public hearing or latest by 29<sup>th</sup> March, 2016.
- 3.8 The Commission and Petitioner received objections/ comments in writing from fourteen (14) respondents. The list of stakeholders who responded to the public notice on the Petition in writing and those who attended the public hearing is provided in **Annexure 2** and **Annexure 3**, respectively.
- 3.9 The Commission held public hearings on 26<sup>th</sup> March, 2016, at Srinagar and on 29<sup>th</sup> March, 2016, at Jammu, to discuss the Petition filed by JKPDD-D for True-Up for FY 2014-15, APR for FY 2015-16 and ARR for 2<sup>nd</sup> MYT Control Period FY 2016-17 to FY 2020-21 and tariff proposal for FY 2016-17.





- 3.10 The respondents were given an opportunity to put forth their comments and suggestions on the Petition. The Commission also allowed persons who had not submitted written responses but attended the public hearings to express their views, regarding the petition and the general functioning of JKPDD-D.
- 3.11 The issues raised during the public hearing process, the responses of JKPDD-D and the Commission's observations are detailed below:

## Failure to provide requisite details and information in the Petition

3.12 The Commission received several objections stating that JKPDD-D has failed to provide requisite details, information and particulars as prescribed in the formats which are necessary to justify their claims and revenue requirements. The Objectors further submitted that JKPDD-D has not given any justification for the substantial increase in proposed expenditure for MYT Control period and requested the Commission to apply a prudence check.

## **Petitioner's Response**

3.13 JKPDD submitted that has it has tried to provide all the relevant information in the formats required under MYT Regulations in support of the Petition.

#### **Commission's View**

3.14 The Commission observed that there are a number of deficiencies in the Petition submitted by JKPDD-D and directed the JKPDD-D to provide detailed clarifications and additional data as communicated through various letters by the Commission. Further, the information furnished by the Petitioner lacks authenticity. The Commission also notes that data submitted in the Petition by JKPDD-D and that provided in PDD's Year Book, resource plan / Budget estimates of the State Government/ CAG seldom match. The Commission directs the Petitioner to submit authentic and reconciled figures of power purchase, O&M expenses, capital investment as well as revenue with those of the State Budget/CAG in future.

# **Delay in filing of Petition**

3.15 The Objector has submitted that the petition submitted by JKPDD-D should be rejected by the Hon'ble Commission on account of delay in filing of the petition.

### **Petitioner's Response**

3.16 The Petitioner submitted that it shall strive to file the Petitions in time, in future.





### **Commission's Analysis**

- 3.17 The Commission observes that the Petitioner had to file the MYT petition for the 2<sup>nd</sup> MYT Control period from FY 2016-17 to FY 2020-21 by 30<sup>th</sup> November, 2015. Instead the Petitioner filed the Petition on 3rd March, 2016, after seeking multiple extensions from the Commission.
- 3.18 The Commission takes strong objection to the fact that the Utility has time and again failed to adhere to the timelines of Regulatory filings as stipulated in the Conduct of Business, Regulations 2005/ MYT Distribution Tariff Regulations, 2012.
- 3.19 The Commission directs the Petitioner to file the Petitions on time, in the future. If the Petitioner fails to do so, the Commission shall be forced to initiate Suo-motu proceedings for determination of tariff besides taking penal action against the Utility.

## **Power Purchase Cost**

- 3.20 The Objectors submitted that the power purchase quantum and cost has not been estimated in accordance with Regulation 18 and 19 of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012. It was further mentioned that the Petitioner should explain the variance in the actual power purchase cost for FY 2014-15 and FY 2015-16 over the approved cost for the same period.
- 3.21 The power purchase quantum ought to have been based on the demand estimates made in accordance with Tariff Regulations 16 and 17 for metered and unmetered sales, augmented by the distribution loss determined in accordance with Tariff Regulation 18 and Transmission loss. The demand estimates for metered sales and unmetered sales have not been estimated in accordance with methodology provided under Tariff Regulations 16 and 17.
- 3.22 The Objectors further submitted that JKPDD-D has projected unwarranted substantial increase in the power purchase cost per unit for the Control period over the approved power purchase cost. The cost of energy available from the State generating companies ought to have been taken as per the approved rates of the Commission and that of energy purchased from Central Generating stations ought to have been taken as per the CERC's orders.
- 3.23 The Objectors also submitted that the power purchase department of the Utility lacks sufficient administrative support.





3.24 The Petitioner stated that it is regularly estimating the unrestricted and restricted power and energy demand of the state based on the past trends and historical data to arrive at power purchase quantum to be arranged through various sources. Also periodic electric power survey of the country is conducted by the Central Electricity Authority (CEA) to forecast region wise/state wise demand of electricity on short term and long term basis. The energy consumption during last five years and demand forecast done by CEA for 12<sup>th</sup> & 13<sup>th</sup> five year plan for the state of J&K has been summarised in following table.

Year	2011-12	2012-13	2013-14	2014-15	2015-16	2016-17
Un-restricted energy requirement –MU	13992	14425	14872	15333	15808	16298
Restricted energy requirement -MU	12504	13083	13749	14503	15351	16298
Un-restricted Peak load –MW	2419	2471	2523	2577	2631	2687
Restricted peak load –MW	1802	1934	2086	2261	2460	2687

Table 26: Energy Forecast for J&K State by CEA Estimates

- 3.25 The sales in the metered and unmetered categories have been assessed on a proper methodology in a transparent manner. The sales in unmetered category have been calculated by working the units backwards from the amount billed on the basis of connected load.
- 3.26 Apart from the power available from JKSPDC generating stations and share of central generating stations, the JKPDD has arranged power from short term sources as average power exchange rates are cheaper than other long term sources. The tariff for JKSPDC generating stations is being determined by JKSERC and the tariff for Central generating stations is determined by CERC, however for the power purchased through short term sources, the JKPDD ensures that such power is purchased on the average exchange rates not higher than the average pooled price.

#### **Commission's View**

- 3.27 The Commission has undertaken a detailed analysis of the power purchase quantum and cost of the Petitioner for True-Up for FY 2014-15, APR for FY 2015-16, determination of ARR for 2<sup>nd</sup> MYT Control Period FY 2016-17 to FY 2020-21 and Tariff Proposal for FY 2016-17 in relevant sections of this Order.
- 3.28 Further, the Petitioner should ensure that adequate administrative support is provided in the power purchase department since the power purchase cost forms the most substantial cost in the ARR of the Petitioner.



# **Operation and Maintenance Expenses**

- 3.29 The Objectors submitted that the Petitioner has projected a substantial increase of 10.28% in O&M expenses in the revised estimates for FY 2016-17 as compared to the approved expenditure for the same period. Neither any break-up of the expenses nor any detail or justification has been provided by the Utility.
- 3.30 The Objectors also submitted that the employee expenses as compared to other states are too high. Moreover, the ratio of employees to the number of consumers in the State as well as to the units sold is extra-ordinarily high as compared to other electricity utilities in other states.

## **Petitioner's Response**

- 3.31 The Petitioner submitted that the Operation and Maintenance expenses have been determined on the basis of norms specified in Regulation 22.1 of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012. The breakup of the various components of the O&M expenses i.e. employees cost, A&G expenses and repairs & maintenance expenses have been provided in detail in the regulatory formats attached with the Petition.
- 3.32 The Petitioner further stated that the employee expenses, which constitute the majority of the O&M expenses are fixed in nature and the employees are employed and paid by the J&K Government in the same manner as the other Government employees of the state. JKPDD-D also stressed that it does not get sufficient funds for repair and maintenance of its assets as required under the norms. Therefore, the Petitioner is constrained to restrict its expenditure within the budgetary allocation.

### **Commission's Analysis**

3.33 The Commission has undertaken a detailed analysis of the O&M cost in relevant sections of this Order.

### **Distribution loss level**

- 3.34 The Objectors submitted that distribution loss levels in the State were too high. For FY 2017-18, on one hand Petitioner has not projected any unmetered consumer while on the other hand; the loss levels of 32% as submitted by Petitioner were substantially high.
- 3.35 The Objectors also pointed out that the claim of reduction of losses is erroneous and misleading and the Petitioner should justify its claims. Moreover, the measures taken by the Petitioner are only in those areas/circle stations where the distribution loss is already within tolerable limits. Thus, the Petitioner was asked to provide data on circle wise distribution loss quantity and percentage with respect to present status, measures taken and achievements made towards reduction of losses; however the Petitioner failed to provide the same.



3.36 The Objectors also submitted that according to the recommendations of Abraham Committee Report, the Petitioner had fixed target of 43% combined T&D loss level for FY 2007-08 and was expected to reduce the loss level by 4% every year. In view of the recommendations of the Abraham Committee Report, the T&D losses for FY 2013-14 should have been 19% and that at the end of the MYT Control period, the Petitioner should have been able to reduce the T&D losses to 11% as depicted in the following table:

**Abraham Committee Recommended** Year **Proposed Distribution Losses** T&D loss 2007-08 49.31% 43% 2008-09 61.31% 39% 2009-10 62.06% 35% 2010-11 58.70% 31% 2011-12 56.40% 27% 55.50% 2012-13 (R.E) 23% 2013-14 (Proj.) 49.50% 19% 2014-15 (Proj.) 46.10% 15%

11%

Table 27: Projected T&D Loss vs. Targeted Loss from FY 2007-08 to FY 2015-16

3.37 As can be seen the performance of the Petitioner is much below the required level. Due to extremely high loss to the tune of 50%, the bonafide consumers are compelled to pay twice the cost of electricity. The Objectors submitted that no justification has been provided by the Petitioner for putting the burden of such high level losses on the consumers which are clearly on account of inefficiency of the utility itself.

41.00%

3.38 The Objectors submitted that the States like Uttarakhand and Himachal Pradesh also have similar characteristics as that of our State i.e. scattered population, difficult terrain, low load density and long sub-transmission and distribution lines etc. but the loss levels are much lower and are in the range of 12-17% only.

### **Petitioner's Response**

2015-16 (Proj.)

3.39 The Petitioner has submitted that there are huge commercial losses because of power theft and injudicious use of electricity. The T&D losses that have remained historically high have been brought down to a present level of 52% from 62% in FY 2008-09 by the efforts made by the department within limited resources available. However massive reforms are required to improve the functioning of the distribution sector and achieve a prudent loss level.







- 3.40 Further, the Petitioner conveyed that they are committed to reduction of losses and in fact has proposed a realistic trajectory for reduction of losses. Urban Areas are being covered under R-APDRP for loss containment. State govt. is pursuing Union Power Ministry to include and fund smaller townships (having population of over 4000 as per 2001 census) on same lines as has been done under R-APDRP. Under R-APDRP scheme 30 Towns have been identified as project areas in J&K State with the objective of achieving a target of 15% AT&C loss with minimum 3% every year on sustained basis for a period of five years in the project areas. The project areas include 11 towns in Jammu region including Jammu City and 19 towns in Kashmir region including Srinagar City.
- 3.41 The other areas are proposed to be covered under newly launched reform programs of GOI namely DDUGJY and IPDS. The department has framed DPRs for DDUGJY and IPDS schemes of GOI for Rs 1249.68 Cr and 450.39 Cr respectively. The schemes cover almost all the areas of the state where T&D loss reduction shall be achieved as per the trajectories fixed by MOP GOI.
- 3.42 The Petitioner further submitted that the accurate area wise or circle wise distribution loss levels shall be made available once complete system metering, boundary and DT metering is put in place in all the circles of the utility. The department is in the process of system metering, boundary metering and DT metering of 30 major towns of the state under RAPDRP for the very purpose of calculating accurate area wise distribution loss.

#### **Commission's View**

- 3.43 The Commission is concerned with the lack of reliable data regarding the actual loss level of the Petitioner. The Petitioner has failed to comply with the data requirements specified in the JKSERC (Multi-year Distribution Tariff) Regulations 2012. A pre-requisite for determining the actual loss levels is the completion of metering at system and consumer levels. The Petitioner is directed to comply with the timelines specified for metering in the Order on Business Plan for 2<sup>nd</sup> the MYT Control Period dated 14<sup>th</sup> October, 2015.
- 3.44 The Commission agrees with the Objectors that the losses projected by the Petitioner are very high. The T&D losses of the Petitioner are amongst the highest in the country and urgent intervention is required for rectification of this situation.
- 3.45 The Commission finds no merit in the Petitioner's submission of attributing the high loss levels in the state to injudicious use of electricity. It is the responsibility of the Petitioner to carry out metering of all unmetered consumers as per the provisions of the Act, undertake appropriate investments in the network to plug leakages and conduct regular vigilance checks on suspected cases of theft and unauthorized use of electricity. Moreover, the Utility has agreed to bring down the AT&C loss levels to 15% by end of FY 2019-20, under the UDAY scheme. The Utility is directed to make all out efforts to achieve the desired loss trajectory.





3.46 In view of above and in accordance with the methodology adopted in the previous Tariff Orders, the Commission shall disallow any additional power purchase over and above the target loss level as the Commission feels that such inefficiencies cannot be passed on to the law-abiding consumers. This shall ensure that tariffs are reflective of prudent costs and the consumer is not burdened with the inefficiencies of the Petitioner.

# **Electricity Duty**

3.47 The Objectors submitted that the tariff may be determined after adjusting the applicable electricity duty payable by the consumers to the Government, which is perhaps the highest in the country. They also referred to the announcement made by the then Hon'ble Chief Minister of the State during his last independence day speech announcing reduction in electricity duty, which has not been implemented till date.

### **Petitioner's Response**

3.48 The Electricity Duty is levied by the State Government and the Petitioner has no control over it.

#### **Commission's View**

3.49 The levy of Electricity Duty under the J&K State Electricity (Duty) Act 1963 is the matter of State Government. Moreover, the GoJK has reduced the electricity duty in the State from 22% to 10% vide Notification SRO-387 dated 27<sup>th</sup> October, 2015.

# **Depreciation**

3.50 The Objectors submitted that the Petitioner has claimed depreciation in violation of the Regulation 24 (b) of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012. Since JKPDD-D is a Govt. Department, the assets are created out of the Govt. funds and as such in terms of the aforementioned regulation, no deprecation is to be allowed on the assets funded by the Govt. funds. The Objector also submitted that the Petitioner has not provided the proper and necessary details for calculation of the depreciation and as such it cannot be allowed to claim depreciation at a consolidated rate without giving asset-wise break-up and relevant rate applicable.

### **Petitioner's Response**

3.51 The Petitioner submitted that since the Commission has already taken a view on this, it is further left to the Commission to decide the course of action.





#### **Commission's View**

- 3.52 As per the Regulation 24 (b) of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012, depreciation will not be allowed on assets to be funded by capital subsidies, consumer contributions or Government grants. Accordingly, the Commission asked the Petitioner to submit bifurcation of Gross Fixed Assets (GFA) & Capital Works-in-Progress (CWIP) funded through grants and long-term loans (REC, PFC etc).
- 3.53 As the Petitioner submitted that the exercise of segregation of assets into transmission and distribution functions of the utility is under progress; the details of financing of GFA for distribution business will be furnished after the bifurcation is completed.
- 3.54 In the absence of above-mentioned details, the Commission has provisionally approved depreciation on the outstanding balance of loans as on 31<sup>st</sup> March of each financial year. No depreciation has been considered on remaining amount of GFA as it is considered to have been funded through grants from State/Central Government.
- 3.55 However, this is subject to true up on the basis of submission of actual segregation of GFA into that financed through loans and grants.
- 3.56 With regard to the rate of depreciation, the Commission noted that till such time the study for segregation of assets is complete, the average rate of depreciation as approved in previous Tariff Orders shall be considered.

# **Interest on Working Capital**

- 3.57 The Objectors submitted that the Petitioner has not computed working capital as per Regulation 26 of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012 as it has not reduced the amount of security deposits from customers from the estimated amount of working capital.
- 3.58 Further the rate of interest of 14.75% is higher than the J&K Bank Advance Rate as specified by the above mentioned regulations. Moreover, the concept of PLR is now defunct and has been replaced by the Base Rate concept. Moreover, the Objectors pointed out that as the Petitioner has not taken any working capital loan and as such all its working capital requirements are funded through State Government funds, no interest on working capital should be allowed.

### **Petitioner's Response**

3.59 The Petitioner submitted that since the Commission has already taken a view on this, it is further left to the Commission to decide the course of action.







#### **Commission's View**

- 3.60 The Commission has estimated the normative working capital requirement in line with the Regulation 26 of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012 which states that:
  - "the rate of interest for computation of interest on normative working capital shall be considered equal to the J&K Bank Advance Rate as of the date on which the petition for determination of tariff is accepted by the Commission"
- 3.61 Accordingly, the Commission has considered the applicable J&K Bank Advance rate of 14.00% to determine the cost towards interest on working capital for the 2<sup>nd</sup> MYT Control Period.

# **Water Usage Charges**

3.62 The Objectors submitted that a substantial amount has been claimed on account of water usage charges for the Control Period and again no justifications have been given for such charges. They said that these charges form part of the expenses of the generating companies which further form part of the power generation tariff payable to the generating companies. The Objectors said that there is no justification for claiming such expenditure in the revenue requirements of JKPDD-D for the control period.

## **Petitioner's Response**

3.63 The Petitioner submitted that the Commission has approved the water usage charges of JKSPDC and NHPC as a pass through expense with the direction that the funds to discharge the liability will be provided to the utility by the State Government over and above the budgetary allocation for power purchase as claimed by the Petitioner. Hence, the JKPDD has claimed the same in its Aggregate Revenue Requirement as a pass through expense.

#### **Commission's View**

- 3.64 The Commission accepts the response of the Petitioner. The water usage charges are levied pursuant to the Orders passed by the State Water Resource Regulatory Authority, Government of Jammu & Kashmir from time to time. However, as it is a pass through expense, the Commission has not included it in the generation tariff for JKSPDC and accordingly allows it in the present Petition over and above the generation cost with the direction that the funds to discharge this liability will be provided to the Utility by the Government over and above the budgetary allocation for power purchase as claimed by the Petitioner.
- 3.65 Further, the Commission has applied a thorough prudence check while approving the water usage charges and has verified the water usage charges levied on the utility as per the actual bills.



#### Power Factor Discount/ kVAh Tariff

- 3.66 The Objectors requested the Commission to grant rebate for consumers having Power Factor (PF) above 0.95 as per the practice followed in other states.
- 3.67 It was also pointed out that since the Commission in the Tariff Order dated 16<sup>th</sup> April, 2012 had directed that kVAh based billing be introduced only after the requisite infrastructure is in place, JKPDD-D has not spoken anything about the same.

### **Petitioner's Response**

- 3.68 The Petitioner submitted that the power factor incentive is already inbuilt in kVAh tariff. If the consumer improves its power factor, the bill of the consumer will automatically reduce.
- 3.69 The Petitioner further submitted that the necessary infrastructure is in place for the implementation of kVAh based tariff. Hence, the Petitioner has requested the Commission to approve the proposal for implementation of kVAh based tariff for all loads above 20 KW except domestic consumers.

#### **Commission's View**

3.70 The Commission had earlier introduced kVAh based tariffs for all consumers with load above 100 KW and is now extending the same to all consumers with load above 50 KW. Under the kVAh tariff regime, the power factor incentive is already inbuilt in the kVAh tariff. If the consumer improves its power factor, the increase in efficiency of the system will result in decrease in electricity bills.

# **Re-Categorization of Consumer Category**

- 3.71 The Objectors submitted that the Commission in the Retail Tariff Order for FY 2012-13 while issuing directions under the clause (E) New Directives has directed JKPPD for rationalization of consumer categories and to undertake reclassification of consumer categories in J&K based on national/ State level power data in consultation with CEA for the purpose of rationalization of consumer categories.
- 3.72 Based on the above directive, the consumer category HT-PIU Industrial supply may be merged with consumer category HT-Industrial Supply because the power intensive units were facing discrimination in the form of higher power tariff as compared to HT Industrial Supply consumer category. Even the CEA has not created power intensive units as a separate category.
- 3.73 It was also stated that many of the states are moving towards creating single category for each broad based nature of consumption like agriculture, domestic, industry, commercial and public works. After creation of such broad categories for the purpose of tariff design, the specific differentiation are recognized through well recognized aspects such as power factor, load factor, voltage level etc.





3.74 The Objectors have requested the Commission to reframe the tariffs for industrial category of consumers by making more categories i.e. in the LT category, the industrial consumers can be re-arranged as upto 20 kW & other being 20 to 100 kW. Further, In the HT category, the industrial consumers can be re-arranged as 100 kW, 100 to 250 kW, 251 to 500 kW, 500 kW to 1000 kW & the last one being 1000 kW & above.

**Table 28: Categorization of HT Consumers** 

The industrial Consumers: HT Category							
Upto 100kW	100 to 250 kW	251-500 kW	500kW to 1000kW	1000kW			

- 3.75 The Objectors submitted that the categorization would segregate the dishonest consumers and the penalty can be imposed on them according to their sanctioned load and actual usage. Further, the categorization would do justice to the honest SSI units who pay their fair part.
- 3.76 It was proposed that there should be only two industrial supply categories i.e. Large Industrial Power Supply (LS) identifying HT Industrial Supply above 100 KW metered on kVAh and Small Industrial Power Supply (LS) including LT Industrial Supply under 100 KW metered on kWh.
- 3.77 The Objectors submitted that the telecom service providers should be treated as a separate category and its tariff should be between domestic and industrial category in view of it being an essential service. One of the Objectors argued that the telecom companies should be charged at par with the central department. Another objector submitted that the power to should be provided to the telecom sector at the nominal cost.
- 3.78 The Objectors also submitted that the service industries under thrust areas identified by the State Level Apex Committee and also the MSME Act should be classified under the Industrial category rather than commercial category and tariff of LT/HT industrial supply may be made applicable.

### **Petitioner's Response**

- 3.79 The Petitioner stated that re-categorization and rationalization of consumer categories in spirit of the National Tariff Policy would mean having minimum number of consumer categories and abolishing cross subsidized slabs within the categories. The tariff of all the categories should reflect the cost of supply. JKPDD would also not like to have endless categories and slabs in its tariff schedule.
- 3.80 In regard to categorization of telecom service providers, the Petitioner has submitted that the Petitioner is billing the Telecom towers under the Non-Domestic Category as per the Tariff Schedule approved by the Hon'ble Commission on 18.08.2015.





3.81 As far as service industry is concerned it does not qualify for industrial tariff neither by definition of Industry as far as tariff schedule of JKSERC is concerned nor does the policy of the Govt. of J&K for service industry define anything in this regard.

#### **Commission's View**

- 3.82 For categorization of various consumer categories, the Commission is guided by the clause 56 (3) of the J&K Electricity Act, 2010 according to which:
  - "(3) The Commission shall not, while determining the tariff under the Act, show undue preference to any consumer of electricity but may differentiate according to the consumer's load factor, power factor, voltage, total consumption of electricity during any specified period or the time at which the supply is required or the geographical position of any area, the nature of supply and the purpose for which the supply is required."
- 3.83 With regards to re-categorization of the service industries under thrust areas, the Commission is of the view that it is the prerogative of the Govt. under the State Policies to define which benefits/ incentives are to be extended to a sector after it is declared as an industry. Subsidies on account of electricity tariff, if any, to such sector/units shall have to be dealt as per the provisions of Section 59 of the J&K Electricity Act 2010.

#### **External Transmission Losses**

3.84 The Objectors submitted that the Inter-state transmission losses of 3.60% as claimed by the Petitioner should be thoroughly verified and the standards applied in other states should be applied while approving such charges.

## **Petitioner's Response**

3.85 The Petitioner stated that it had taken the inter-state transmission losses as 3.6% which was also the approved figure of the Commission.

### Commission's View

3.86 The inter-state transmission losses are approved based on transmission losses applicable in northern region. The other State Commissions also follow the same approach. Accordingly, the Commission has approved the inter-state transmission loss levels at 3.60%.

# Payment of bills through debit/credit card

3.87 The Objectors submitted that the consumers of the State should be provided with an option of payment of bills through credit or debit cards.





3.88 The Objector also stated that the Petitioner may also use the M-PESA facility provided by the telecom service provider Vodafone so that the consumer can pay bills from any part of the country, anytime which would also lead to lesser defaults on payments by the consumers.

### **Petitioner's Response**

3.89 The Petitioner submitted that although the consumers of JKPDD can now make payment of electricity bills online through J&K bank, the department will however try to further improve its services and shall try to provide best possible services to its consumers in respect of bill payment and bill information. A number of service providers like Vodafone, HDFC bank etc are approaching JKPDD for providing such services and the JKPDD shall evaluate such offers in the best interest of its consumers and the utility itself.

#### **Commission's View**

3.90 The Commission has noted the response of the Petitioner and appreciates the steps taken by it towards providing more convenience to the consumers with respect to payment of bills. The Commission directs the Petitioner to explore more options regarding online bill information and its downloading and payment of bills which could be in terms of e-payment through Net Banking, credit/ debit cards, kiosks, mobile collection vans etc.

# Payment of fixed charges for consumption of electricity

3.91 The Objectors submitted that despite of the fact that most of the areas of the State don't get 24 hours power supply, the consumers in such areas still have to pay fixed charges. The consumers should be charged only for the quantum of electricity consumed by them.

### **Petitioner's Response**

3.92 The Petitioner submitted that billing of consumers in normal course is done strictly as per the retail distribution tariff in vogue for various categories of consumers. However if any consumer or a group of consumers is found involved in illegal and unauthorized use of electricity, then such consumers are dealt in accordance with the Supply Code Regulations and billed accordingly for the offense. Further any billing errors can be reported to the consumer care centers of JKPDD for rectification.

#### **Commission's View**

3.93 The Commission directs the Petitioner that billing of the consumers should be strictly done as per the approved tariff schedule for the particular category of consumers.





3.94 Moreover, the Petitioner may develop a transparent mechanism for linking the load curtailment or shedding in an area to the proportion of the level of the losses in the area. Similar exercise was done in Maharashtra with positive results. For this purpose, the Utility shall notify details of the energy inputs, energy billed and revenue collected on each feeder on a monthly basis.

# **Billing of Printing Press Units**

3.95 One of the Objectors submitted that inspite of the provision of the Tariff Order for charging a category of printing press units under industrial tariff; the Petitioner continues to bill these units on commercial tariff rates.

## **Petitioner's Response**

3.96 The Petitioner submitted that it will look into the matter.

#### **Commission's Analysis**

3.97 The Commission directs the Utility that the printing presses as are qualifying under LT- Industrial supply category should be charged at the tariff applicable for the category of consumers only.

# **Annual Revenue Requirement**

- 3.98 The Objectors asked the Petitioner to justify the revenue gap of Rs 3065 Cr submitted in the ARR for the supply of power & recovery.
- 3.99 The Objector submitted that JKPDD-D in its petition has shown a collection of Rs 1813.72 Cr against approved revenue of Rs 2255.26 Cr in FY 2014-15. The gap in recovery highlights the inefficiency of working of the Department and the honest consumers are being punished for the same.

### **Petitioner's Response**

- 3.100 The Petitioner has submitted that the revenue deficit has been computed by deducting the ARR from the proposed revenue. A number of schemes are being implemented in the state which will help in bringing down the losses during the 2<sup>nd</sup> MYT Control Period and with the reduction in losses, the sales shall increase resulting in increase in revenue and reduction in the revenue deficit.
- 3.101 The Petitioner has further submitted that the revenue approved by the Hon'ble Commission for the FY 2014-15 was Rs. 2255.26 Crores. However, the actual revenue billed by the Department during the FY 2014-15 is Rs. 1813.72 Crores.



### **Commission's Analysis**

- 3.102 The Commission has approved the ARR in accordance with the JKSERC (Multi Year Distribution Regulations), 2012 and after applying a thorough prudence check.
- 3.103 The Commission notes with concern that the Petitioner has one of the lowest collection efficiency. The Commission approves the revenue gap after assuming 100% collection efficiency and hence the inefficiency of the Petitioner has not been passed on to the consumers. Further, the Commission has given the target of 100% collection efficiency for the next control Period in the Order of the Business Plan dated. 14<sup>th</sup> October 2015

# **Hike in Fixed Charges**

3.104 The Objector submitted that the Petitioner after claiming depreciation every year should decrease the fixed charges since the cost of Plant & Machinery has reduced considerably. However, the Petitioner is always increasing the cost of fixed charges.

### **Petitioner's Response**

3.105 The Petitioner submitted that the fixed charges comprise of the O&M expenses, depreciation, interest on loans, interest on working capital etc. The same have been projected by the JKPDD-D as per the JKSERC (Multi Year Distribution Tariff) Regulations, 2012.

## Commission's Analysis

- 3.106 The fixed charges of a Utility comprise of O&M cost, interest on loan, depreciation etc. Generally, there tends to be an inflationary increase in O&M expenses of an Utility over the years. Moreover, any amount of capital investment incurred by the Utility increases the GFA as well as debt levels of the Utility owing to which there may be on overall increase in the depreciation and interest expense of the Utility. The AFC (Annual Fixed Charge) portion of power generators levied through generation tariff is also a part of fixed charges of the Utility which may not necessarily decrease year on year.
- 3.107 Therefore, the contention of the Objector that fixed charges should decrease every year may not be necessarily correct.

# Non-Payment by Govt. & Departments/ bodies.

3.108 The Objector submitted that the Govt. has agreed that the Central Govt. & the State Govt. departments are not paying their power bills as per their fair usage and there is also a delay in payments. Therefore, increasing the rate across all categories of consumers shall be futile.





3.109 The Petitioner has submitted that the Central and the State Government Departments are paying their dues in a timely manner.

### Commission's Analysis

3.110 The Commission directs the Petitioner to recover all their dues in timely manner which shall also have a positive impact on the collection efficiency of the Utility.

# **Security Deposits**

3.111 The Objector submitted that the Petitioner is charging security deposits ranging from 5 to even 8 months charges even when the Commission has ordered that the security deposit charges shall be the sum of monthly charges of 2 months.

### **Petitioner's Response**

3.112 The Petitioner has submitted that it is charging security deposit which is a sum of monthly charges of 2 months strictly as per the Regulations of the Supply Code.

### Commission's Analysis

3.113 The Commission directs the Petitioner to charge the security deposits as per the relevant provisions of the Supply Code/ Security Deposit Regulations. The Commission further clarifies that if any consumer has faced such an issue, the consumer can approach the Commission or the JKPDD-D directly for relief.

# **Change of category for Defence establishments (MES)**

- 3.114 The Objectors proposed to create a separate category for Defence or MES which is already present in other states. Further, the Petitioner has stated J&K is the only state wherein the tariff for MES is higher than the commercial load and general bulk supply. The Objectors have proposed 2 options to decide a suitable tariff for MES category:
  - i. The electricity consumption by Defence should fall under general bulk supply since the entire consumption is being used for education, training, offices, domestic, public street lighting and water work purposes.
  - ii. 56% of energy consumed should be charged at Rs 3.20 /KWh and Rs 5.00 / KWh as being done for group housing societies and remaining should continue to be charged at Rs 6.30 /KWh and Rs 30.00 /KWh. Therefore a composite tariff of Rs 4.65 /KWh and Rs 16.75 /KWh should be made applicable for MES.





3.115 The Objectors requested the Commission to direct the Petitioner to provide lower tariffs for MES since it supplies power to the Defence installations and accommodations wherein it is not possible to apply for separate electric connections. The MES wheels power from supplier to the consumer by incurring an expenditure of Rs 6.95 per kWh.

### **Petitioner's Response**

3.116 The Petitioner submitted that it is billing the Defence and paramilitary forces under the State/Central Government Departments as per the Tariff Schedule approved by the Commission on 18.08.2015.

### Commission's Analysis

3.117 The Objector has filed a separate Petition for the same with the Commission and the Commission shall dispose of the Petition separately as per law.

### **Audited Accounts**

3.118 The Objector has stated that the Petitioner has not submitted its annual accounts and hence the authenticity of the figures submitted in the petition cannot be ensured.

### **Petitioner's Response**

3.119 The Petitioner has submitted that the accounts for the FY 2013-14 authenticated by Director Finance have been submitted to the Hon'ble Commission. Further, the accounts submitted along with this tariff petition for FY 2014-15 have been reconciled with the figures of the State Budget.

### **Commission's Analysis**

3.120 The Commission has directed the Petitioner time and again to submit the audited accounts, but the Petitioner has failed to do so. In absence of the audited accounts, the Commission has provisionally approved the ARR after detailed analysis and prudence check. The same shall be Trued-up after submission of actual data based on audited accounts. The Commission has ensured that any inefficiency of the Petitioner is not passed on to the consumers.

# Metering

3.121 The Objectors have submitted that JKPDD-D has failed to achieve 100% metering as mandated in the Electricity Act and has also failed to meet the targets set in its metering plan submitted in the earlier MYT Petition. The Objectors further stated that infusion of funds in centrally funded schemes have also not yielded results to reduce the distribution losses of the Petitioner which are highest in the county.







- 3.122 The Objectors have also submitted that the Petitioner is seeking extension in completion of metering task on one pretext or the other and the extension has again been sought till March 2019. Further, the Petitioner has defaulted on various orders issued by the Commission on testing of meters, installation of meter testing lab in Srinagar, using CMRI machines for meter reading, charging fixed charges from various categories of consumers, failure to check theft and misuse of electricity and by installation of meters on poles. The objector has requested the Hon'ble Commission to penalize the utility for the same.
- 3.123 The Objectors have requested the Hon'ble Commission to direct the Petitioner to draw an action plan to tackle the menace of illegal connections. Also, The Petitioner should be directed to provide only metered supply to Religious Institutions/Public parks viz. Central security parks, police station parks etc.
- 3.124 The Objectors have pointed out that according to the data submitted in the ARR, the domestic unmetered connections in the state have increased indicating that no action has been taken by JKPDD. Further, the Petitioner has proposed a tariff hike in all the categories which puts the burden on industrial sectors which has fully metred connections and is also suffering because of global market condition.

- 3.125 The Petitioner has submitted that it had envisaged to meter all its consumers by the end of the FY 2015-16 at the beginning of the first MYT Control Period. But the pace of metering has been very slow during the last couple of years due to resource constraints and some bottlenecks. Now some important reform programs like RAPDRP, IPDS, DDUGJY launched by MOP GOI in distribution sector are being implemented in the state also by JKPDD and metering is a very essential component of these schemes. These schemes are time bound and are likely to be completed in coming 2 to 3 years. Keeping in view the implementation of these schemes and support from the state budget, the JKPDD has revised the metering plan and now proposes to meter all the consumers by the end of FY 2018-19.
- 3.126 The Petitioner has further stated that in the review meeting of the PDD on 29th October, 2015 with the Hon'ble Chief Minister in Chair, it has been decided that owing to repeated failure of tendering process a parallel mechanism for procurement and installation of meters through a central Government Agency should be put in place in addition to the procurement through tenders so that the metering process is expedited and completed within two years. Separately, request has been made to CEA, BEE, PFC & REC to assist in identifying Central Agencies who can parallely undertake metering in the State as directed by Hon'ble Chief Minister. In the meantime more than 2000 meters have been procured under RAPDRP through Trunkey Contractor and their installation has been initiated.



### **Commission's Analysis**

- 3.127 The Commission notes that the Petitioner has time and again failed to meet the targets to achieve 100% metering in the State and to comply with the numerous directives and Orders of the Commission in the past. The Commission in the Order of the Business Plan dated 14<sup>th</sup> October 2015 had directed the Petitioner to place the facts before the State Legislature for seeking approval of the revised dead line to achieve 100% metering in the State. The Commission had also directed the licensee to immediately comply with the earlier directives of the Commission that no new connection shall be allowed without installation of proper meters.
- 3.128 The Commission re-iterates its earlier directions and directs the Utility to make all out efforts to achieve 100% metering in the State.

# **Sales Projections**

- 3.129 The Objectors stated that appropriate transmission and distribution infrastructure should be put in place for supply of projected sales. Further, the procurement of all materials under all the schemes should be procured through Procurement and Management Wing of JKPDD on all India competition basis with strict third party inspections to ensure quality of the material.
- 3.130 The Objectors have submitted that the projected sales of the Petitioner can be reduced by proposer assessment of energy to unmetered categories, introducing ghost consumers in billing categories and by launching special drives to curb electricity theft.
- 3.131 The Objectors have pointed out several discrepancies in the data submitted in the petition for consumers for different categories of consumers like:
  - Growth in connected load and energy billed for non-domestic commercial category even when there is decrease in actual no of consumers from projected consumers for FY 2014-15.
- ii. Reduced connected load and energy billed by approximately 3% for non-domestic commercial category in FY 2015-16 when the decrease in actual no of consumers from projected consumers is of about 30%.
- iii. Reduced connected load and energy billed by approximately 3% and 8.29% for domestic category in FY 2014-15 when the decrease in actual no of consumers from projected consumers is of about 31%. Similar trends can be observed in FY 2015-16.
- iv. Growth in connected load and energy billed by 1.92% and 30.53% respectively for agricultural category even when there is decrease in actual no of consumers from projected consumers for FY 2014-15. Further, there is a shortfall in revenue billed by 11.59%.





- v. For unmetered consumers in agricultural sector, the Petitioner has shown an increase in no of consumers with an increase in energy billed, but has shown a drop in revenue for FY 2014-15.
- vi. For state and central Govt. departments, the Petitioner has shown an increase in no of consumers, connected load and energy billed but has shown a drop in revenue for FY 2014-15.
- vii. Presence of unmetered category in public street lighting and LT Public Works is a matter of concern.
- viii. Growth in energy billed even when there is a reduction in no of consumers and connected load for FY 2014-15 and FY 2015-16.

- 3.132 The Petitioner has submitted that it is committed to provide the consumers of J&K reliable power. Further, the schemes like RGGVY, R-APDRP, and DDUGJY have been approved by the Government of India wherein the DPRs are approved district wise and the amount is sanctioned accordingly under the scheme.
- 3.133 In regards to projection of sales, the Petitioner has submitted that for the 5-year MYT control period (FY 2016-17 to FY 2020-21) the energy sale projections have been made on the basis of category-wise historical growth in energy sales in each of the consumer category, growth in number of consumers, growth in connected load and the projected metering plan. Further, as per the proposed metering plan which has been approved by the Hon'ble Commission in its Order for the Business Plan for the 2<sup>nd</sup> MYT Control Period, it is proposed to meter all the unmetered consumers by FY 2018-19. Hence, the sales has been projected keeping in view the reduction in the no. of unmetered consumers.

### **Commission's Analysis**

- 3.134 The Commission had taken serious view of the concern raised by the Objector regarding requirement of appropriate transmission and distribution network in the state in its Order of the Business Plan dated 14<sup>th</sup> October 2015 and had accordingly directed the Petitioner to ensure timely execution of envisaged capital investment schemes and aggressive pursual for release of funds by the GoJK. The Commission is of the view that adequate capital investment for network strengthening and improvement in infrastructure gains is even more important in J&K owing to the alarmingly high T&D losses in the State
- 3.135 With regards to the discrepancies observed in the data submitted in the Petition by the Petitioner, the Commission has undertaken a detailed analysis of data and approved the same after prudence check.





## **Underground Cabling**

3.136 The Objector has submitted that since the Petitioner has started laying cables on poles, it would be economically more viable if underground cabling is performed since over ground cabling would be exposed to harsh climatic conditions which would lead to huge losses. Underground cabling is technologically advanced and more durable. The Objector has requested the Hon'ble Commission to ensure that investments made by the Petitioner are of the suitable technology.

## **Petitioner's Response**

3.137 The Petitioner has submitted that it has prepared proposals for underground cabling in Gulmarg and Pahalgam in the first phase. Once these proposals are finalized the work of underground cabling in these areas shall be completed and the same shall be extended to other areas of the state.

### Commission's Analysis

3.138 The Commission appreciates the steps taken by the Petitioner for underground cabling. The Petitioner should make all out efforts for expeditious finalisation and implementation of the proposal for underground cabling and extend the same to other areas of the State.

# ToD tariff proposal

- 3.139 The Objectors have stated that the necessary studies for implementation of ToD tariff have also not been conducted by the Petitioner and ToD tariff has been arbitrarily proposed by JKPDD-D. The proposal for ToD for HT consumers has not been justified by actual consumption pattern with details of peak and off peak periods.
- 3.140 Further, the proposal of 8 hours of peak hours and 20% surcharge during peak hours is not as per the practices in other states like Maharashtra and Gujarat which have peak of only 4 hours and 5-10 % peak surcharge. Also, the off peak rebate is to the tune of 15-20% in other states. The Objectors also pointed out that this proposal would require industries working for 24 hours to operate in two or three shifts which is impossible considering the infrastructure and legal framework. Also, the Government Industrial Policy requires the industries to increase employment and production levels and hence, it is unjustified to charge higher tariff from them during peak hours.
- 3.141 The Objectors also submitted that the states in which ToD tariff has been introduced have developed proper infrastructure to facilitate the consumer to purchase power from alternative sources during peak hours. Since, there are no alternative energy suppliers in the state, it would be impossible for HT industrial consumers to shift their load from peak to off peak times. Moreover, there are many HT consumers wherein manufacturing activities are of continuous nature. Thus, these consumers do not have the option of shutting down operations during peak hours and increase operations during off peak hours.





- 3.142 The Objectors have also stated that ToD tariff for HT consumers is not justified since HT consumption is only 11% of the total consumption.
- 3.143 The Objectors have requested the Hon'ble Commission to reject the ToD tariff for HT consumers until a detailed analysis of consumption is provided by the Petitioner along with resolution mechanism for disputes relating to peak and non-peak consumption. Further, the Petitioner should also provide infrastructure to facilitate the consumers to purchase power from private distribution utilities during peak hours.
- 3.144 Another Objector is of the opinion that ToD tariff if at all necessary should be applicable to all categories of consumers but with rebate of not less than 15% for night hours 22.00 hours—06.00 hours i.e. 8 hours for industry as per other states

3.145 The Petitioner submitted that Time of Day (TOD) tariff design is recognized as an important Demand Side Management (DSM) measure which is used as a means of incentivizing consumers to shift a portion of their loads from peak times to offpeak times, thereby improving the system load factor, reduce the demand on the system during peak period and relieve system capacity constraints. This tariff design features electricity tariffs that vary by time period, being higher in peak periods and lower in off-peak period. The simplest TOD tariff can be structured as a two period tariff, a peak period and an off-peak period. The average monthly load curve for the FY 2014-15 has also been submitted along with the petition wherein the peak and off peak hours have been depicted. Further, the revised ToD tariff proposal incorporating inputs from the SAC Meeting on 17<sup>th</sup> March, 2016 has been submitted to the Hon'ble Commission and is also given below:

Table 29: Proposed ToD Charges for FY 2016-17

Peak Hours	Surcharge on Energy Charges	Off Peak Hours	Rebate on Energy
0500-0900 Hrs. and 1800-2200 Hrs. ( <b>8 hours</b> )	20%	0100-0500 Hrs* ( <b>4 hours</b> )	10%

<sup>#</sup> for other than peak and off-peak hours normal Energy Charges shall be applicable

### **Commission's Analysis**

- 3.146 The Commission notes the concern of the Objectors regarding the various anomalies in the ToD proposal of the Petitioner. However, Commission is also of the view that ToD Tariff is one of the principle of the DSM which is being adopted by the progressive utilities of the world.
- 3.147 Analysis of the load curve of the State shows a peak in demand during the evening, which is met through power purchases from high cost sources such as gas/ diesel/naphtha based generation plants, traders, the Unscheduled Interchange (UI)/





<sup>\*</sup>The Petitioner has now revised the duration of off-peak hours to 6 hours from 2300-0500 hours

- Deviation Settlement Mechanism (DSM) pool, etc. which are generally more expensive as compared to the base load stations. This increase in the power purchase costs leads to a higher cost of supply during the peak load hours.
- 3.148 The Regulation 36 of the J&KSERC (Multi Year Distribution Tariff) Regulations, 2012 provides for implementation of Time-of-Day (TOD) tariffs as an instrument to provide signals to consumers and help the utility in maintaining a better system profile. The relevant extract has been summarized below:
  - "(3) The time of day tariff would be structured across three time slabs to denote normal, peak and off-peak periods. The time periods would vary according to different seasons of the year i.e. summer, winter and the monsoon season. The peak tariff would be 20%-30% higher than the normal tariff and the off-peak tariff would be priced 15%-20% lower than the normal tariff, as and when time of day tariff is introduced.
  - (4) Time of Day tariff shall be introduced in a phased manner, wherein in phase 1 it would be compulsory for HT Consumers, in phase 2 compulsory for LT consumers consuming more than 25 KW and in phase 3 compulsory for LT consumers consuming more than 10 KW.
  - (5) The peak and off-peak hours during seasons shall be as notified by the State Load Despatch Centres in advance."
- 3.149 Therefore, the Commission is of the view that ToD tariff regime should be introduced in the State beginning with HT consumers with load above 1 MVA getting supply at 33 KV levels and above in the first phase. However, taking note of the concerns of the Objectors and ensuring that such a tariff regime serves its desired result of flattening the Utility's load curve and not as an additional source of revenue for the Utility, the Commission has kept the level of surcharge during peak hours and rebate during off-peak hours at same level. Moreover, the duration for which peak hour surcharge and off peak hour rebate would be applicable has also been kept the same. The details of the ToD tariffs as applicable have been mentioned in the **Chapter on Tariff Design**.
- 3.150 The Commission directs the Utility to devise a transparent mechanism for billing of such consumers and submit to the Commission, within one month of notification of this Tariff Order, the format for billing devised by the Utility for the same.
- 3.151 The Commission also directs the Utility to monitor the impact of the ToD tariff on the load curve of the Utility on a month on month basis and submit a detailed impact analysis report to the Commission along with the next Tariff Petition.

# **Demand Side Measure (DSM)**

3.152 The Objector has submitted that the Petitioner has not submitted any steps taken by it for Demand Side Management and thus it may be inferred that the Petitioner is not serious towards it.



- 3.153 The Petitioner submitted that Time of Day (TOD) tariff design has been proposed which is recognized as an important Demand Side Management (DSM) measure as a means of incentivizing consumers to shift a portion of their loads from peak times to off-peak times, thereby improving the system load factor, reduce the demand on the system during peak period and relieve system capacity constraints.
- 3.154 The Petitioner has further submitted that The Bureau of Energy Efficiency (BEE) has launched a programme for capacity building of Distribution Companies. The objective of the programme is capacity building of Discoms for carrying out load management programme, energy conservation programme, load growth programme, Development of DSM action plan and implementation of DSM activities in their respective areas. The main components of the programme are as under:
  - i. Establishment of DSM cell by each Discom selected under this programme.
  - ii. Creation of about 500 master trainers on DSM and energy efficiency from the officials of Discoms.
  - iii. Capacity building of about 5000 officials of Discoms by these master trainers.
  - iv. Load research and preparation of DSM Action Plan for each Discom.
  - v. Adoption and Notification of DSM regulation by respective State Electricity Regulatory Commission.
  - vi. Incorporation of DSM plan along with Multi Tear Tariff (MYT).
  - vii. Implementation of DSM programs by the Discom.
  - viii. Monitoring and verification of the DSM measures and reporting to SERC.
- 3.155 BEE and Energy Efficiency Services Ltd. (EESL) a joint venture company of NTPC, PFC, REC and Powergrid have entered into a MOU in March 2014 for implementation of the above Capacity Building of Discoms programme. In terms of the MOU BEE will allocate funds and financial support to EESL for providing manpower/consultancy support to the selected Discom along with coordination with EESL for timely implementation of the activities assigned under the programme.
- 3.156 The Petitioner in June, 2015 has signed a MOU with BEE for capacity building of Discom programme. The purpose of the MOU is to facilitate training of trainers, workshops for capacity building and providing manpower and consultancy support for development and implementation of DSM action plan in the state. As per the obligations of the MOU the following action has been taken:
  - i. EESL has deputed one consultant under manpower support to JKPDD.
  - ii. JKPDD has constituted DSM cells in survey divisions of Jammu and Srinagar under the control of Chief Engineer Commercial and Survey Wing who is the nodal agency for energy conservation.
  - iii. EESL has framed tender document for hiring of agency for JKPDD for survey, load research and analysis.





- iv. Training of trainer programme is being conducted by the BEE at National Power training Institute (NPTI) Faridabad. JKPDD has forwarded a list of 30 engineers to NPTI and 16 of them have undergone training.
- 3.157 The Petitioner further informed that The P&MM wing of the department has floated tender on 5th February, 2016 for procurement of 411670 no. of 7 watt LED lamps for distribution among various categories of consumers under standard operating procedure. The last date of submission of e-bids is on 09.03.2016. The P&MM wing of the department has floated another tender on 9th February, 2016 for procurement of 1000 no. 60/120 watt LED luminaries for street lighting. The last date of submission of e-bid is on 12.03.2016.

# **Commission's Analysis**

- 3.158 The Commission appreciates the steps taken by the Utility towards procurement of LED lamps. The Commission directs the Petitioner to submit a detailed DSM Plan highlighting procurement as well as installation/distribution of 80 lacs LED 80 Lacs LED lamps for under the DELP program as agreed by the Utility under the UDAY scheme, along with the next APR/Tariff Petition.
- 3.159 The Petitioner is also directed to undertake consumer awareness programmes for optimum utilisation of resources and to foster long term behavioural changes.

## **Sharing of Passive Infrastructure**

3.160 The Objector has submitted that the petition submitted by the Petitioner is silent on sharing on Power infrastructure with Telecom providers. The sharing of infrastructure will not only make telecommunications reliable and affordable but will also restrict growth of telecom towers and release of carbon contents into the atmosphere.

### **Petitioner's Response**

3.161 The Petitioner has submitted that it has not received the proposal for sharing of passive infrastructure from the consumers.

### Commission's Analysis

3.162 The Objector may submit a detailed proposal for sharing of infrastructure to the Petitioner with the copy to the Commission.

# Single Connection for Power and Light Load

3.163 The Objector has pointed out that even though the Commission has issued orders for one single connection for light load and power load, the Petitioner is still issuing two bills.





3.164 The Petitioner submitted that it is providing single connection for power and light load. The Department will look into the matter on a case to case basis.

### **Commission's Analysis**

3.165 The Objector may approach the Commission citing evidence in case of violation of the Commission's Orders by the utility.

# **Setting up of CGRF and Ombudsman**

3.166 The Objector has submitted that the Petitioner has failed to establish a Consumer Redressal Forum as per the relevant provisions of the Electricity Act, 2010.

## **Petitioner's Response**

3.167 The Petitioner has submitted that the Government of Jammu and Kashmir has accorded sanction to the Constitution of Committee to recommend modalities to implement the provisions regarding Consumer Grievance Redressal Forum (CGRF) as per the State Electricity Act 2010 and Jammu & Kashmir State Electricity Regulatory Commission (Consumer Redressal Forum, Ombudsman and Consumer Advocacy) Regulations, 2012. The Committee shall comprise of the following members:

1. Principal Secretary to Government

Chairman

Planning and Development Department

2. Principal Secretary to Government

Member

Power Development Department

3. Commissioner/Secretary to Government

Member

### **Commission's Analysis**

- 3.168 The Commission in its Tariff Order dated 18<sup>th</sup> August 2015 had directed the Petitioner to establish CGRF as per the provisions of Sec 36 (5) of the J&K Electricity Act and also establish Coordination Forum and District Committees as per the provisions of Sec 128 of the Act in order to provide a forum to the consumers for redressal of their grievances and to bring in efficiency and transparency in the system.
- 3.169 The Commission again directs the Petitioner to establish and operationalize CGRF and District Committees and submit the report to the Commission within 3 months of the issue of the Order. The Commission also directs the Petitioner to setup a Centralised Customer Care Center for timely resolution of complaints of the consumer. The telephone numbers for the same should be given wide publicity.



#### **Provision of Pre-Paid Meters**

3.170 The Objector has requested the Hon'ble Commission to include a provision for pre-paid meters in the tariff order which shall help in advance revenue realization for the state and to perform energy audit.

### **Petitioner's Response**

3.171 The Petitioner has submitted that it is initiating the process of introduction of prepaid metering and will submit a proposal to the State Government in this regard.

### **Commission's Analysis**

- 3.172 The Commission directs the Petitioner to prepare a roadmap for installation of prepaid meters in the State. For starters, the Utility may begin with installation of pre-paid meters in all Government installations. The Utility may also explore installation of pre-paid meters in various Group Housing Societies.
- 3.173 The Utility is directed to submit a report/ roadmap in this regard within six (6) months of issuance of this Tariff Order.

# **Early Payment Discount**

3.174 The Objector has requested the Hon'ble Commission to include a provision for discount on account of early payment of electricity bills or a rebate on timely payment of bills i.e. within 15 days time.

### **Petitioner's Response**

3.175 The Petitioner has stated that it has noted the submission of the Objector and asked the Hon'ble Commission to take a decision in this regard.

# Commission's Analysis

3.176 The Commission is of the view that the consumers are billed only after the consumption of power during the month and since the power department is operating on commercial lines, the department should be paid on time for the services rendered i.e. supplying of electricity. Therefore, the Commission does not find any rationale for including a provision for rebate on early payment. However, in case of pre-paid metering wherein the customer pays in advance, a suitable provision of rebate in such cases may be looked into by the Utility.

## **Billing**

3.177 The Objectors submitted that timely bills are not raised by the Petitioner which results into delay in payment beyond the due date by the consumers.





- 3.178 The Objectors also submitted that the bills are not raised on the standard pattern by JKPDD-D across the state and in some areas like Doda, Bhaderwah, Akhnoor etc., the bills are provided on average basis.
- 3.179 The Objectors have also stated that flat rate bills are being issued on a higher side as compared to actual consumption of telecom sites and average of last year's consumption in the same duration should be used for billing in cases of faulty meter.

3.180 The Petitioner has submitted that the billing is being done by the department in a timely manner and there is no delay in issuance of bills to the consumer.

### **Commission's Analysis**

- 3.181 The Commission takes note of submission made by the Petitioner and directs the utility to issue timely bills. The Petitioner should also ensure and facilitate online bill information and downloading.
- 3.182 Further, the Commission directs the Petitioner to bill the consumers as per the provisions in the Tariff Order.

# Late Payment Surcharge

3.183 One of the Objector pointed out that Petitioner is charging a late payment surcharge 15% at compounded rate of interest rather than 15% simple rate of interest. The Objector has requested the Hon'ble Commission to direct the Petitioner to reverse the extra delayed payment surcharges charges collected by it.

### **Petitioner's Response**

3.184 The Petitioner has noted the submission of the Objector and will look into the matter on a case to case basis.

### Commission's Analysis

3.185 The Commission directs the Petitioner to charge the late payment surcharge strictly as per the provisions of JKSERC (Multi Year Distribution Regulations), 2012.

# Voltage wise break up of Cost of supply

3.186 The Objectors have pointed out that the Petitioner has not taken voltage wise losses and cost of supply which is resulting in overcharging of consumers at 66KV since the cost of supply is lower on 66KV systems.





3.187 The Objectors further stated that the Commission had directed the Petitioner to determine voltage wise cost of supply. The Petitioner had then replied that the feeder wise energy accounts for dedicated feeders are being prepared separately on monthly basis. Hence it is not difficult to work out the voltage wise losses but no solid action has been taken so far by the Petitioner. In absence of the voltage wise cost of supply, the Petitioner has requested the Hon'ble Commission to direct the Petitioner to introduce a separate tariff for 66 KV systems or include a provisio for rebate on energy and fixed charges on 33 KV.

### **Petitioner's Response**

3.188 The Petitioner submitted that while metering of 11 KV feeders is in place, the metering of other voltages is still on progress. As there is not adequate data to determine voltage wise cost of supply at other voltage levels, the tariff proposal for FY 2016-17 has been prepared considering average cost of supply in line with the provisions of National Tariff Policy. However, the Petitioner is in the process for determination of voltage-wise losses so that Cost of Supply could be implemented appropriately.

### **Commission's Analysis**

- 3.189 The Commission views that in order for the tariffs to each category of consumers to reflect the cost of supply of electricity, the exact cost to serve at the various voltage levels (at which the consumers are connected), namely 33 kV, 11 kV and Low Tension (LT) needs to be calculated, based on which tariffs for the consumers at the respective voltage levels should be determined. However, for an accurate voltage wise Cost of Supply study, energy accounting at all voltage level is necessary (not just 11 kV and above), which is only possible if energy meters are installed at every interface. Therefore, installation of appropriate energy meters at all levels in the T&D network is essential to undertake such a study.
- 3.190 Thus, in the absence of data on the status and results of the energy accounting process and in the interest of establishment of regulatory discipline (in a scenario of less than 100% metering), the Commission, vide its Tariff Orders, has been determining tariffs based on the average cost of supply across all consumer categories, while allowing only the justified/ prudent distribution costs and not burdening the consumers with the inefficiencies of the Petitioner.

# **Rebate for Labour Intensive Industry**

3.191 The Objector has requested the Hon'ble Commission to give a rebate of at least 5% for labour intensive units where labour engagement is more than 100 persons for every MW of power supplied.

### **Petitioner's Response**

3.192 The Petitioner submitted that it has noted the submission of the Objector and the Commission may take a decision on this matter.







- 3.193 As per clause 56 (3) of the J&K Electricity Act, 2010:
  - "(3) The Commission shall not, while determining the tariff under the Act, show undue preference to any consumer of electricity but may differentiate according to the consumer's load factor, power factor, voltage, total consumption of electricity during any specified period or the time at which the supply is required or the geographical position of any area, the nature of supply and the purpose for which the supply is required."
- 3.194 The above clause of the Act does not allow the Commission to differentiate any consumers based on the number of persons for every MW employed. Thus, the Commission finds no rationale in providing any rebate for such labour intensive units.

#### Tariff related issues

- 3.195 The Objectors have asked the Petitioner to elaborate the efforts undertaken to increase the revenue without increasing the tariff rates.
- 3.196 The Objectors have stated that the tariff submitted by the Petitioner has not been computed according to the relevant provisions of J&K State Electricity Act, 2010 or JKSERC (Multi Year Distribution Tariff Regulations), 2012. The Commission has directed the Petitioner to submit consumer category wise and voltage wise actual cost of supply indicating details of voltage wise segregation of losses. In absence of this data, the Petitioner has not taken any basis for determining tariff for different categories of consumers.
- 3.197 The Objectors have strongly opposed the tariff hike and also asked the Petitioner to justify a 10-15 % increase in tariff for all categories except for State and Central Government Departments.
- 3.198 The Objectors have stated that the domestic consumers cannot afford to pay higher tariffs and the consumers should not be penalized by increasing the flat rate since the onus of metering should be borne by the utility and not the consumer. Also, increase in tariffs for commercial, industrial and agriculture categories will further affect the economic vibration and pose a serious threat to employee retention in the private sector.
- 3.199 The Objectors have also submitted that all state and central departments should be charged at cost of supply plus basis.
- 3.200 The Objector have stated that tourism has been declared as an industry, the benefits of industrial tariff has not been provided to this industry. The Objectors have further pointed out that the fixed charges should be adjusted in the actual consumption of the consumer and not charged extra.





- 3.201 The Objectors have asked the Petitioner to eliminate cost subsidies and not to burden the industrial consumers with it. Further, according to the data submitted by the Petitioner, HT industries consume only 12.64% of the total energy and 11.2% of total connected load and hence, the utility will not suffer a significant impact in absence of tariff hike in this category.
- 3.202 The Objectors have pointed out the difference between the average cost of supply and the overall average tariff and stated that it stresses the need for improvements in efficiency and rationalization of tariff to reflect the cost of supply and a need to eliminate cross-subsidies, which seems to be missing on account of high T&D loss, under recoveries for the amount billed and non- adherence of the principle of cost of supply at different voltages for different classes of consumers in the exercise of fixation of tariff.
- 3.203 Another Objector has proposed that the power structure can be simplified by reducing domestic metered connection categories to two slabs of upto 500 units and above 500 units a month. Further, unmetered connections should not be permitted since excess drawl takes place there.
- 3.204 Objectors have submitted that the Hon'ble Commission can propose a separate tariff for Religious/Charitable institutions and also for Railways since Jammu-Jalandhar line is almost completed.

#### **Petitioner's Response**

- 3.205 The Petitioner has submitted that the tariff for the industrial category is one of the lowest in the country and it has proposed to recover the prudent cost of supply from various categories of consumers without passing inefficiencies of the system to any category of consumer in the state through:
  - i. Bringing the high end categories like State/Central Government Department, Public Street Lighting and Public Water Works at par with the prudent cost of supply. The corresponding budgetary provisions shall be provided to respective departments.
  - ii. Giving a reasonable tariff hike without any tariff shock to the consumer categories like Domestic, Non-Domestic, Agriculture, Industrial and Bulk supply. The remaining cost up to the prudent level shall be claimed as direct subsidy from the concerned department for the respective categories







- 3.206 Further, the Petitioner has submitted that it has started implementing the R-APDRP part-B in various clusters which is aimed at reducing the AT&C losses to the level of 15% once the program is fully implemented. Also, it has intensified enforcement and inspection drive across the state to check the misuse or any illegal use of electricity. All the billing centres have been integrated with the data and data recovery centres at Srinagar and Jammu respectively where billing of energy, issuance of regular bills and recovery of the revenue is monitored. Online billing and bill payments has been introduced in certain revenue making areas. System metering which includes feeder and DT metering has also been taken up in various towns and areas. Losses on a number of feeders are being regularly monitored in data centres.
- 3.207 In regard to tariff hike in different categories, the Petitioner has justified it with the following reasons:
  - i. **Domestic Metered:** The Petitioner has merged the 1<sup>st</sup> and 2<sup>nd</sup> slab as per the slabs in Himachal Pradesh and Delhi since Himachal Pradesh has 2<sup>nd</sup> and 3<sup>rd</sup> slab of the range 125 units to 300 units and above 300 units and Delhi has the slab ranges from 0 units to 200 units, 201 units to 400 units, 401 units to 600 units etc.
  - ii. **Domestic Unmetered**: The Petitioner has proposed to reduce the no of slabs from 9 to 4 since it will persuade more no of consumers to move to the metred category and will also increase the consumer base in a single category.
  - iii. **Non-Domestic Metered**: The Petitioner has proposed to reduce the no of slabs from 4 to 3 and to merge the 2<sup>nd</sup> and 3<sup>rd</sup> slab as there is no BPL slab in the non-domestic category. The small and large consumers can be clubbed in the two categories bifurcated on the basis of load and a slab wise tariff can be introduced. This will help the Petitioner in monitoring the consumption of the consumers in the category.
  - iv. **Non-Domestic Unmetered**: The Petitioner has proposed to merge the first two slabs since it will persuade more no of consumers to move to the metred category.
- 3.208 With regards to the tariff for tourism industry, the Petitioner has submitted that is issuing bills to the relevant category of consumers as per the Tariff Schedule approved by the Hon'ble Commission in its Tariff Order dated 18.08.2015.
- 3.209 With regards to difference between average cost of supply and average tariff, the Petitioner has submitted that it is committed to bring down the distribution losses to the targets agreed under the MoU signed under the UDAY scheme. A number of schemes like the R-APDRP, DDUGJY and IPDS are being implemented in the state which will help the utility to achieve the desired loss levels and thus reduce the gap between average cost of supply and the average realization.





3.210 The Commission has undertaken a detailed analysis of tariff related issues in the relevant sections of this Tariff Order.

# **RPO Compliance**

3.211 The Objector has submitted that the Petitioner has not complied with RPO targets.

### Petitioner's Response.

3.212 The Petitioner submitted that it is presently meeting the non-solar RPO to the extent generated by the small/mini hydro stations of JKSPDC in the state which is around 30% of non-solar RPO target fixed by the Hon'ble Commission. No separate funds are being earmarked for the Department under the State Government budgetary provisions for renewable energy purchase. However, the Government has given its consent for purchase of bundled power (thermal with solar) from NTPC. Accordingly, the Petitioner is pursuing purchase of 300 to 400 MW of bundled power from Sangrauli station of NTPC which will enable it to meet the solar power purchase obligation.

#### **Commission's Analysis**

3.213 The Commission expresses serious concern over the non-serious attitude of the Petitioner and its failure to achieve RPO targets time and again. The Commission in its Tariff Order dated 18<sup>th</sup> August 2015 had disallowed a part of the power purchase cost on account of non-compliance of RPO and had directed the Petitioner to open a separate account for meeting the annual fixed obligation of renewable energy, which shall include carry forward balances and purchase of RECs to meet shortfall, if any. Further, the Commission had directed that no diversion of funds earmarked for meeting the RPO targets would be allowed. The Commission again directs the Petitioner to ensure compliance to its earlier directives and ensure that RPO targets are met by initiating timely action for inviting competitive bids for procurement of solar/ non-solar power or alternately purchase RECs.

#### **Industrial Dedicated Feeders**

3.214 The Objector has requested the Commission to direct the Petitioner to install dedicated industrial feeders which shall help in ascertaining the actual distribution loss in connection to supply to industrial category consumers and industrial consumers will not be a victim of distribution loss incurred on account of other categories

#### **Petitioner's Response**

3.215 The Petitioner submitted that it has noted the submission of the Objector.





3.216 The Commission is of the view that the Petitioner may look into the matter and perform a detailed cost benefit analysis for the Objector's proposal.

# Suggestions for Improving Operational Efficiency of JKPDD-D

- 3.217 The Objectors have suggested that feeder wise losses should be calculated by the Petitioner and hours of supply on a particular feeder should be based on the T&D loss of the feeder. Further, feeder wise incentive and penalty should be imposed on the officer responsible for a particular which encourage detection of theft and illegal activity.
- 3.218 The Petitioner should create special Police squad, one in each District to deal exclusively for power theft and also to provide security to inspection staff of the utility during checking.
- 3.219 The Objector has also requested the Hon'ble Commission to direct the Petitioner to progressively replace Low Tension Distribution Network either by Aerial Cable bunching or if possible by 11 KV Network and install 11 KV to 440 KV Step down Transformers.
- 3.220 The Objectors have submitted various suggestions to the Petitioner such as rotation of meter readers for meter reading, sample checks of meter reading, Immediate Replacement of electromechanical meters by electronic meters, managing load on DT's and ensuring that it is not above 80% of transformation capacity, prioritizing disconnection based on amount and / or age of arrears, development of 3<sup>rd</sup> party meter testing labs and enforcing vigilance action to curb theft.
- 3.221 The Objectors have also stated that the Department should make efforts to curb the pilferage of power by constituting a task force for each area to conduct raids and taking penal actions against the responsible officers
- 3.222 The Petitioner must gauge the actual position regarding theft and submit the data to the Hon'ble Commission for further suggestions and analysis.
- 3.223 The Objectors have suggested to privatize the job of metering and meter reading and draw an action plan to organize the cost centres up to division level to make them accountable for their performance.

#### Petitioner's Response

3.224 The Petitioner has failed to respond to this query of the Objector.





- 3.225 With regards to the feeder wise assessment of losses, the Commission directs the utility to perform feeder wise energy audit and consumer indexing. The Petitioner is also directed to develop a transparent mechanism for linking the load curtailment or shedding on a feeder to the proportion of the level of the losses on that feeder.
- 3.226 The Commission had earlier directed to constitute a task force to carry out massive raids and also make the officers responsible for theft/pilferage in their areas. The Commission again directs the utility to comply with the earlier directive and submit quarterly reports on Theft Detection and Penalty imposed and realized to the Commission and make available these reports in the public domain so the efforts of the utility in curbing theft can be recognized by the masses.
- 3.227 The Petitioner should also take note of the suggestions given by the Objectors along with various directives issued by the Commission in the past for managing load, establishment of meter testing labs and should make all the efforts to reduce the operational inefficiency.







#### **CHAPTER 4: TRUE-UP FOR FY 2014-15**

- 4.1 As per Regulation 14 of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012 and as amended vide Commission's Order dated 2 July, 2013:
  - a) The Commission shall True-Up expenses either as part of the Tariff order or issue Order/s for True-Up of expenses preceding the Tariff order of ensuing year.
  - b) An order for True-Up of Expenses shall be issued on annual basis.
  - c) An order for True-Up of Expenses shall be on the basis of expense estimates made in the beginning of the year under consideration and actual expenses booked in the audited books of account of the Distribution Licensee for the year.
  - d) Where audited books of account are not available at the time of true-up provisional books of accounts shall be used for the True- Up process.
  - e) Estimates of expenses for the ensuing year shall be on the basis of corresponding figures in the order for True-Up of Expenses of the previous year and Tariff order of the current year.
- 4.2 The Petitioner has submitted the Petition for True-Up for FY 2014-15 based on the actual performance of the Utility during FY 2014-15.
- 4.3 Since the Petitioner did not submit either copy of audited accounts nor did the Utility provide any basis/ proofs for submission of 'actual' figures, the Commission directed the Utility to submit audited accounts of FY 2014-15 in line with the above-said Regulations. However, Petitioner failed to provide the same.
- 4.4 In the absence of audited accounts, the Commission has provisionally Trued-Up the costs and revenue for FY 2014-15 in this Order. However, it has not allowed any incentive/ penalty for gains/ losses on over/under achievement of targets for uncontrollable parameters. The sharing of gains/ losses will be determined once the Utility submits audited annual accounts for the year.

# **Energy Sales**

#### **Petitioners Submission**

4.5 JKPDD-D caters to a diverse consumer mix constituting of domestic, commercial, industrial, agriculture and other consumers. JKPDD-D submitted that at the end of FY 2014-15, total number of consumers catered by JKPDD-D system was 16,25,422 having a total connected load of 2,875 MW as summarized in the following tables.





Table 30: Category wise number of Consumers (Nos) for FY 2014-15

Consumer Category	Approved by JKSERC in MYT Order	Submitted by Petitioner in last year's Review Petition	Approved by JKSERC in last year's Tariff Order dated 18.08.2014	Actual submitted now
Domestic				
Metered	1,140,403	711,503	711,503	711,503
Un-metered	525,865	686,694	686,694	679,353
Non - Domestic/ Commercial				
Metered	137,013	118,398	118,398	118,398
Un-metered	29,863	61,334	61,334	62,718
Agriculture				
Metered	14,502	13,144	13,144	13,144
Un-metered	2,488	6,054	6,054	6,224
State/ Central Govt. Departments	10,014	10,781	10,781	11,040
Public Street Lighting				
Metered	149	121	121	121
Un-metered	102	137	137	141
LT Industrial Supply				
Metered	19,545	19,446	19,446	19,487
Un-metered	0	0	0	0
HT Industrial Supply	720	714	714	714
HT PIU	17	13	13	13
LT Public Water Works				
Metered	1,515	1,700	1,700	1,700
Un-metered	404	580	580	418
HT Public Water Works	132	252	252	298
Bulk Supply	142	144	144	150
TOTAL	1,882,873	1,631,015	1,631,015	1,625,422

Table 31: Category wise connected load (MW) for FY 2014-15

Consumer Category	Approved by JKSERC in MYT Order	Submitted by Petitioner in last year's Review Petition	Approved by JKSERC in last year's Tariff Order dated 18.08.2015	Actual submitted now
Domestic				
Metered	863	984	984	984
Un-metered	438	422	422	423
Non - Domestic/ Commercial				





Consumer Category	Approved by JKSERC in MYT Order	Submitted by Petitioner in last year's Review Petition	Approved by JKSERC in last year's Tariff Order dated 18.08.2015	Actual submitted now
Metered	251	262	262	262
Un-metered	33	46	46	51
Agriculture				
Metered	102	106	106	106
Un-metered	33	46	46	27
State/ Central Govt. Departments	205	214	214	226
Public Street Lighting				
Metered	6	7	7	7
Un-metered	5	5	5	5
LT Industrial Supply				
Metered	253	251	251	249
Un-metered	0	0	0	0
HT Industrial Supply	336	324	324	322
HT PIU	37	33	33	33
LT Public Water Works				
Metered	49	74	74	74
Un-metered	25	28	28	19
HT Public Water Works	21	28	28	25
Bulk Supply	50	59	59	62
TOTAL	2,705	2,889	2,889	2,875

- 4.6 As per the Regulation 16 of the JKSERC (Multi Year Distribution) Regulation 2012, energy sale is an uncontrollable parameter. The metered energy sales for FY 2014-15 is based on the actual sale of energy during the year.
- 4.7 The sales in the un-metered category as per the Regulation 17 of the above mentioned regulations have been assessed by working out the units backwards from the amount billed on connected load basis in each slab. This has enabled the department to assess the unmetered sales in a realistic manner particularly in the domestic category and commercial category where the unmetered sales are significant.
- 4.8 The category-wise energy sales as submitted by the Petitioner have been summarized in following table.



Table 32: Energy Sales (MU) for FY 2014-15 as submitted by the Petitioner

Consumer Category	Approved by JKSERC in MYT Order	Submitted by Petitioner in last year's Review Petition	Approved by JKSERC in last year's Tariff Order dated 18.08.2014	Actual submitted now
Domestic				
Metered	1,494	1,804	1,804	1,804
Un-metered	789	941	941	852
Non - Domestic/ Commercial				
Metered	513	473	473	473
Un-metered	107	243	243	347
Agriculture				
Metered	265	207	207	207
Un-metered	71	90	90	74
State/ Central Govt. Departments	538	608	608	719
Public Street Lighting				
Metered	23	20	20	20
Un-metered	16	25	25	28
LT Industrial Supply				
Metered	399	339	339	338
Un-metered	0	0	0	0
HT Industrial Supply	705	872	872	821
HT PIU	123	117	117	110
LT Public Water Works				
Metered	210	212	212	212
Un-metered	246	189	189	196
HT Public Water Works	106	167	167	132
Bulk Supply	162	167	167	161
TOTAL	5,767	6,474	6,474	6,494

4.9 As per the Regulation 16 of the JKSERC (Multi Year Distribution) Regulation 2012, energy sale is an uncontrollable parameter. Therefore, the Commission provisionally approves the number of consumers, connected load and energy sales as per the submission of the Petitioner.





4.10 Accordingly, number of consumers, connected load and energy sales for FY 2014-15 as approved by the Commission have been summarized in following table:

Table 33: Approved number of consumers, connected load (MW) & Energy Sales (MU) for FY 2014-15

Consumer Category	Consumers (Nos.)	Connected Load (MW)	Energy sales (MU)
Domestic			
Metered	711,503	984	1,804
Un-metered	679,353	423	852
Non - Domestic/ Commercial			
Metered	118,398	262	473
Un-metered	62,718	51	347
Agriculture			
Metered	13,144	106	207
Un-metered	6,224	27	74
State/ Central Govt. Departments	11,040	226	719
Public Street Lighting			
Metered	121	7	20
Un-metered	141	5	28
LT Industrial Supply			
Metered	19,487	249	338
Un-metered	0	0	0
HT Industrial Supply	714	322	821
HT PIU	13	33	110
LT Public Water Works			
Metered	1,700	74	212
Un-metered	418	19	196
HT Public Water Works	298	25	132
Bulk Supply	150	62	161
TOTAL	1,625,422	2,875	6,494

# **Losses and Energy Requirement**

### **Petitioners Submission**

- 4.11 The distribution loss for FY 2014-15 as reported by the Utility is 49.02%. The Petitioner further submitted that the department is taking all the possible administrative and technical measures to reduce the distribution loss.
- 4.12 The distribution loss level achieved during FY 2014-15 against the submissions/ approved target in the previous Petitions/ Orders have been summarized below.





Table 34: Distribution losses submitted by the Petitioner for FY 2014-15 (%)

Particulars	Approved by JKSERC in MYT Order	Submitted by Petitioner in last year's Review Petition	Approved by JKSERC in last year's Tariff Order dated 18.08.2014	Actual submitted now
Distribution Loss	41.42%	47.00%	41.42%	49.02%

4.13 In addition to above, the Petitioner submitted that estimated inter-state and intrastate transmission losses should be approx. 3.6% and 4.0%, respectively which are same as approved by the Commission in the MYT Order dated 25<sup>th</sup> April, 2013 and same have been summarized in the following table.

Table 35: Inter-State and Intra-State Transmission Loss submitted by the Petitioner for FY 2014-15 (%)

Particulars	App. by JKSERC in MYT Order	Actual submitted now
Inter-state transmission loss	3.6%	3.56%
Intra-state transmission loss	4.0%	4.0%

4.14 The energy requirement at the transmission periphery (within State) during FY 2014-15 based on actual energy sales and distribution and intra-state transmission losses as submitted by the Petitioner has been summarized in the following table.

Table 36: Estimates of energy requirement (MU) submitted by the Petitioner for FY 2014-15

Sl. No.	Description	Submitted now by Petitioner
1	Energy Sales(MU)	6,494
2	Distribution Losses (%)	49.02%
3	Total Energy required at Dist. Periphery(MU)	12,738
4	Intra-State Transmission losses (%)	4.00%
5	Total Energy Requirement (MU) at Transmission Periphery	13,268

# **Commissions Analysis**

- 4.15 The Commission views that even though the JKPDD-D has brought down losses in last two-three years, the T&D losses in the State are still very high. Further, the Commission noted with concern that JKPDD-D has repeatedly failed to achieve the target for loss reduction as set out by the Commission in its previous Tariff Orders.
- 4.16 The Commission in its MYT Order for period from FY 2013-14 to 2015-16 dated 25th April, 2013 had set the target for T&D loss of 43.76% for FY 2014-15 which included 41.42% of distribution losses and 4.0% of intra-state transmission losses. The targets for T&D losses were approved after taking into consideration the JKPDD-D's commitment for metering and implementation of Central Government assisted R-APDRP scheme in the State. However, the Petitioner has completely failed in achieving those targets.





- 4.17 The Commission is of the view that any inefficiency on account of the Petitioner should not be passed on to the consumers of the State. Further, T&D losses are considered controllable parameter in terms of the Regulation 9.2 of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012. Accordingly, the Commission approves the same aggregate T&D loss for FY 2014-15 i.e. 43.76% (corresponding to distribution loss of 41.42% and intra-state transmission loss of 4.0%) and any additional power purchase to meet the T&D losses over and above the target loss level has been disallowed by the Commission.
- 4.18 In addition, the Commission has approved the inter-state transmission losses as per the average transmission losses for northern region during FY 2014-15 as per the report of Northern Region Load Despatch Centre (NRLDC). Accordingly, the Commission has approved inter-state transmission losses at 3.6% for FY 2014-15.

Particulars	Approved by JKSERC in MYT Order	Submitted by Petitioner in last year's Review Petition	Approved by JKSERC in last year's Tariff Order dated 18.08.2014	Actual submitted now	Approved now by JKSERC
Distribution Loss (%)	41.42%	47.00%	41.42%	49.02%	41.42%
Intra-state Transmission loss (%)	4.0%	4.0%	4.0%	4.0%	4.0%
Inter-state Transmission loss (%)	3.60%	3.60%	3.60%	3.60%	3.60%

Table 37: Approved Distribution and Transmission Losses for FY 2014-15 (%)

4.19 Based on the approved energy sales, distribution loss and intra-state transmission loss, the approved energy requirement at transmission periphery (within state) for FY 2014-15 has been summarized in the following table.

Particulars	Submitted now by Petitioner	Approved now by JKSERC
ENERGY REQUIREMENT		
Energy Sales	6,494	6,494
Add: Distribution Loss (%)	49.02%	41.42%
Distribution Loss (MU)	6,244	4,591
Energy Req. @ Dist. periphery	12,738	11,084
Add: Intra-state Trans. Loss (%)	4.00%	4.00%
Intra-state Trans. Loss (MU)	531	462
Energy Req. @ Trans. Periphery (MU)	13,268	11,546

Table 38: Approved energy requirement for FY 2014-15 (in MU)

# **Power Purchase Quantum**

#### **Petitioner's Submission**

4.20 JKPDD-D submitted that the energy requirement for the State during FY 2014-15 has been met from following sources:







- (a) Power Purchase from JKSPDC
- (b) Power Purchase from CPSUs (including free power from select stations)
- (c) Power Purchase from other sources (including UI/ bilateral sources/ banking arrangements, etc.)
- 4.21 The Petitioner has submitted that the total energy available from own generating stations and JKSPDC during FY 2014-15 was 2,431 MU.
- 4.22 Further, JKPDD-D also has firm allocated share in Central Generating Stations (CGSs) of NTPC Ltd, NHPC Ltd, Tehri Hydro Development Corporation (THDC), Satluj Jal Vidyut Nigam Limited (SJVNL) and Nuclear Power Corporation Limited (NPCIL). JKPDD-D has also long term arrangements for purchase of power from PTC India Ltd. Accordingly, the Petitioner has submitted net energy availability from CGSs (through long term power purchase) during FY 2014-15 as 11,090 MU.
- 4.23 In addition to above, JKPDD-D has also entered into banking arrangements with the neighboring states and has banked certain quantum of surplus energy available in the summer/monsoon months. Net Banking during FY 2013-14 has been considered as zero which is as per the approach followed by the Commission in the past.
- 4.24 Further, during FY 2014-15, the JKPDD-D has purchased energy on short term basis to meet shortfall in energy requirement. JKPDD-D purchased 152.00 MU during FY 2014-15 from short term sources as summarized below:

Table 39: Short Term Purchase during FY 2014-15 (in MU)

Name of Source	Actual
IEX	152.00
Total	152.00

#### **Renewable purchase Obligation (RPO)**

- 4.25 In addition to above, as per the provisions of the JKSERC (Renewable Power Purchase Obligation, its compliance and REC Framework implementation) Regulation, 2011, JKPDD-D had to meet Solar RPO target of 0.75% of energy requirement and non-solar RPO target of 5.25% of energy requirement during FY 2014-15. The JKPDD-D submitted it does not have any grid connected solar tie up as yet due to non-availability of the grid connected solar in the state. However, the department is trying for a solar tie up with neighboring state.
- 4.26 In case of non-solar RPO target, the JKPDD-D submitted it has met the target to the extent non-solar RE power available from mini/small hydro stations/ IPPs in the state. During FY 2014-15, the Petitioner has submitted that 200.88 MUs were available from mini hydro stations of JKSPDC. Accordingly, Petitioner submitted that it has met non-solar RPO target to the extent of 200.88 MUs during FY 2014-15.



4.27 Based on above, JKPDD-D has submitted that total energy available during FY 2014-15 from all sources was 13,672 MU. Considering inter-state transmission losses, the energy available at transmission periphery during FY 2014-15 is projected at 13,267 MU.

#### **Commissions Analysis**

- 4.28 As mentioned in the Petitioner's submission, JKPDD-D procures power from its own sources, state owned generating company namely JKSPDC, allocated/unallocated share in CGSs, banking arrangements, short term purchase, UI, and any other source.
- 4.29 In order to approve the energy availability from JKSPDC stations, the Commission provisionally approves the actuals submitted by the Petitioner which is subject to submission of authentic data based on audited accounts. Accordingly, the Commission provisionally approves net energy available from JKSPDC to be 2,431 MU for FY 2014-15.
- 4.30 The energy availability from CGSs including NTPC, NHPC, NPCIL etc. has been determined on the basis of long term allocated share to JKPDD-D from these stations along with proportion of un-allocated share available during past two years. The average availability from these stations has been worked out, and accordingly, the Commission provisionally approves energy available from CPSUs to be 10,706 MU for FY 2014-15.
- 4.31 The Commission has considered the actual power purchased from short-term sources during FY 2014-15 in accordance with the Regulation 19 (d) of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012 which states as follows:
  - "If there is a short term requirement of power by the Distribution Licensee over and above the quantum as approved by the Commission and such requirement is on account of any factor beyond the control of the Licensee (shortage/non-availability of fuel, snow capping of hydro resources inhibiting power generation in sources stipulated in the plan, unplanned/forced outages of power generating units or acts of God), then the cost shall be directly passed on to the customer without prior approval of the Commission."
- 4.32 Accordingly, the Commission has approved power purchase from short term source i.e. IEX of 152.00 MU during FY 2014-15.

#### Renewable purchase Obligation (RPO)

4.33 In addition to above, the Commission notes that even though JKPDD-D has to procure 6% of its total energy requirement from renewable energy sources during FY 2014-15 as per the RPO targets approved vide JKSERC (Renewable Power Purchase Obligation, its Compliance and REC Framework implementation) Regulations, 2011 and JKSERC Notification No. JKSERC/27 dated 5th March, 2013; the Petitioner has not completely met its RPO targets.





- 4.34 The estimated energy requirement for FY 2014-15 based on actual energy sales and approved loss for the period has been approved by the Commission at 11,546 MU as indicated in Table 38. Accordingly, the RPO target for FY 2014-15 based on obligation of 6% of energy requirement works out to 693 MU which includes solar RPO target of 87 MU and non-solar RPO target of 606 MU. Out of the above estimated target, the JKPDD-D submitted it has met 200.88 MU of non-solar RPO target through purchase of mini/ small hydro power from JKSPDC.
- 4.35 Thus, the entire solar RPO target of 87 MU and partial non-solar RPO target of 405 MU remained unmet during the year. The Commission notes with concern that the Petitioner has neither achieved the specified RPO targets for the year nor has the Utility opened a separate account for meeting the annual fixed obligation of renewable energy as directed by the Commission in the previous Tariff Orders.
- 4.36 The Petitioner is directed to ensure that the RPO targets are met in future and for this purpose they should initiate timely action for inviting competitive bids for procurement of solar/ non-solar power or alternately purchase RECs. The Commission directs that in future years the Petitioner should make all out efforts to meet RPO targets and any non-compliance shall invite penal action.

#### Disallowance of power purchase quantum

- 4.37 As stated in Para 4.17 of this Order, the Commission has disallowed additional power purchase over and above the target loss level of 43.76% by the Petitioner during FY 2014-15. Disallowed units of power purchase works out to 1,785 MU. Likewise shortfall in RPO targets has been disallowed.
- 4.38 Based on the above analysis and considering inter-state transmission losses at 3.60% for FY 2014-15, the approved energy availability from all sources during FY 2014-15 has been summarized in the following table:

Table 40: Source-wise approved energy availability during FY 2014-15 (in MU)

Source	Submitted now by Petitioner	Approved now by JKSERC
A. State-owned Stations		
JKPDD - Own Stations		
Diesel	0	0
Sub-Total (A)	0	0
B. JKPDC – Thermal		
Kalakote	0	0
Gas Turbine-I	0	0
Gas Turbine-II	0	0
Sub-Total (B)	0	0
C. JKPDC – Hydel		
LJHP	552	552
USHP-I	75	75





	Submitted	Approved now
Source	now by Petitioner	by JKSERC
USHP-II	279	279
Ganderbal	19	19
Chenani-I	72	72
Chenani-II	6	6
Chenani-III	6	6
Sewa-III	0	0
Karnah	6	6
Sumoor	0	0
Bazgo	0	0
Hunder	1	1
Iqbal Bridge	4	4
Sanjak	0	0
Badherwah	2	2
Pahalgam	7	7
Haftal	1	1
Marpachoo	1	1
Igo-Mercellong	1	1
Stakna	0	0
Matchil	0	0
<b>Sub-Total</b> ( <b>C</b> )* ( includes 201 MUs reflected in non-solar RPO)	1032	1032
Baglihar (D)	1399	1399
Total State Generation (A+B+C+D)	2431	2421
E. NTPC		
Anta(G)	177	177
Anta(LNG+L)		
Auriaya(G)	158	158
Auriaya(LNG+L)		
Dadri(G) Dadri(LNG+L)	235	235
Unchahar-I	132	132
Unchahar-II	241	241
Unchahar-III	162	162
Rihand-I	528	528
Rihand-II		747
	1/4/1	
Rihand-III	747 505	
Rihand-III Singrauli	505	505
Singrauli	505 165	505 165
Singrauli Farraka	505 165 94	505 165 94
Singrauli Farraka Talcher	505 165 94 0	505 165 94 0
Singrauli Farraka Talcher Kahalgaon-I	505 165 94 0 216	505 165 94 0 216
Singrauli Farraka Talcher	505 165 94 0	505 165 94 0





Korba-III  Mouda Sipat-I Sipat-II	now by Petitioner  44  57  149	Approved now by JKSERC 44 57
Mouda Sipat-I	44 57 149	
Sipat-I	149	57
Sipat-II	~ A	149
	54	54
Vindhyachal-I	66	66
Vindhyachal-2	51	51
Vindhyachal-3	58	58
Vindhyachal-4	76	76
Sub-Total (E)	4661	4661
F. NHPC		
Salal	749	749
Free power	419	419
Tanakpur	23	23
Chamera-I	98	98
Chamera-II	139	139
Chamera-III	94	94
Uri-I	652	652
Free power	370	370
Uri-II	139	139
Free power	154	154
Dulhasti	243	243
Free power	259	259
Dhauliganga	62	62
Sewa-II	46	46
Free power	76	76
Nimao Bazgo	40	40
Free power	29	29
Chutak	10	10
Free power	24	24
Parbati-III	61	61
Sub-Total (F)	3687	3687
SJVNL(G)	691	691
THDC (H)	196	196
THDC Koteshwar (I)	75	75
J. PTC India Ltd.		
PTC (Tala)	58	58
PTC (BHEP)	490	490
Sub-Total (J)	548	548
K. NPCIL		
NAPS	258	258
RAPP 3&4	262	262
RAPP 5&6	171	171
TAPS 3&4	19	19





Source	Submitted now by Petitioner	Approved now by JKSERC
KAPS	66	66
Sub-Total (K)	776	776
JHAJJAR (L)	71	71
M. Total - Outside State sources (E+F+G+H+I+J+K+L)	10,706	10,706
N. Other (incl. ST Purchase)		
NVVN/IEX	152	152
Renewable* (201 MUs of non-solar RPO already reflected in the energy supplied by JKSPDC)	0	0
UI (-)/(+)	384	384
Sub-total (N)	536	536
Banking (O)	0	0
Power purchase disallowed (P)	0	-1785
Gross Energy Availability (M + N +O – P)	13672	11887
Less: Inter-state Transmission Loss @ 3.6%	405	340
Net Energy Availability	13267	11546

<sup>\*1032</sup> MUs under sub-total (C) includes 201 MUs accounted towards Non Solar RPO compliance

### **Power Purchase Cost**

# Power Purchase from JKSPDC

#### **Petitioner's Submission**

4.39 Based on the actual billing of JKSPDC stations during FY 2014-15, Petitioner has estimated power purchase cost from JKSPDC generating stations for FY 2014-15 as Rs. 485.26 Cr at the rate of Rs 1.997 per unit.

## Commission's Analysis

4.40 The Commission has approved the cost of power purchased from the JKSPDC stations on the basis of the approved energy quantum from each station and the approved tariff of each project as per the JKSPDC's Tariff Order for FY 2014-15. The approved cost of power purchased for FY 2014-15 from all JKSPDC stations works out to Rs 469.14 Cr at the rate of Rs 1.93 per unit.





#### Power Purchase from CGSs and Other sources

#### **Petitioner's Submission**

4.41 The cost of the power purchased from central generating stations of NTPC, NHPC, NPCIL, other long term sources and short term purchases for FY 2014-15 has been determined based on the actual billing for FY 2014-15. Accordingly, the Petitioner has submitted that the cost of power purchase from CGSs and short term sources for FY 2014-15 to be Rs. 3,541.12 Cr including Rs. 200 Cr of arrears and reactive energy charges of Rs 50.98 Cr. This cost is excluding water usage charges from NHPC stations, which have been projected separately.

#### **Commission's Analysis**

- 4.42 The Commission has approved cost of power purchase based on actuals submitted by the Petitioner after analysis of the power purchase bills submitted by the Petitioner. Accordingly, the Commission approves cost of power purchase from CGSs as Rs. 3,501.21 Cr including Rs 200 Cr of arrears. This includes reactive energy (RE) charges of Rs. 50.98 Cr and surcharge pertaining to current year of Rs. 18.98 Cr for FY 2014-15. In addition, the Commission approves Rs. 40.89 Cr as power purchase cost from short term sources during FY 2014-15.
- 4.43 Thus, total cost of power purchase from CGSs including cost of purchase from short term sources works out to Rs. 3,542.10 Cr at the rate of Rs 3.11 per unit.

#### Inter-state transmission Charges

#### **Petitioner's Submission**

4.44 Inter-state transmission charges payable to PGCIL are based on the total capacity allocation in transmission network. JKPDD-D has a mix of firm and infirm capacity allocation from various Central Generating Stations which is being revised by Ministry of Power at regular intervals. Inter-state transmission charges based on the actual billing for FY 2014-15 have been submitted as Rs. 427.59 Cr by JKPDD-D.

#### Commission's Analysis

4.45 The Commission approves the inter-state transmission Charges as Rs. 427.59 Cr as per submission made by JKPDD-D subject to true up based on audited accounts.

#### Disallowance of Power Purchase costs

4.46 As stated above in Para 4.37, the Commission has disallowed additional power purchase over and above the target loss level by the licensee during the review period. The disallowed units of power purchase works out to be 1,785 MU for FY 2014-15.







4.47 The cost of power purchase of units disallowed has been considered as the approved average power purchase rate of gross power purchase from JKSPDC and CGSs which works out to Rs. 3.25 per unit for FY 2014-15. The following table summarizes the cost of power purchase disallowed by the Commission for the MYT control period.

Table 41: Disallowed power purchase cost by the Commission for FY 2014-15 (Rs Cr)

Sl. No.	Description	<b>UoM</b>	2014-15
A	Cost of power purchase from JKSPDC & CGSs (incl. inter-state transmission charges)	Rs Cr	4,438.83
В	Quantum of power purchased from JKSPDC & CGSs (Gross)	MU	13,672
C	Average rate of power purchase	Rs/KWh	3.25
D	Power purchase units disallowed by the Commission	MU	1,785
E	Disallowed power purchase cost (C * D / 10)	Rs Cr	579.66

4.48 In addition, the Commission has disallowed the amount earmarked for achieving RPO, to the extent of shortfall in the RPO targets. As stated in para 4.35 of this Order, solar RPO target of 87 MUs and partial non-solar RPO target of 405 MUs remained unmet during the year. Accordingly, the disallowed amount on account of non-achievement of RPO targets during the year is summarized in the following tables:

Table 42: Cost of power purchase earmarked for meeting the RPO targets (Rs Cr)

Particulars	Quantum (MU)	Rate* (Rs/KWh)	Cost (Rs Cr)	Average Cost (Rs/kWh)
Solar sources	87	8.08	70.296	-
Non-solar sources	405	5.00	202.5	-
Total	492	-	272.796	5.54

<sup>\*</sup>As per the rates for solar and non-solar energy sources approved for FY 2014-15 in the last year's Order dated 24<sup>th</sup> June, 2014

Table 43: Disallowed power purchase amount on account of shortfall in RPO targets (Rs Cr)

Sl. No.	Description	<b>UoM</b>	2014-15
A	Average cost of power purchase from solar and non-solar sources earmarked for meeting the RPO targets	Rs/kWh	5.57
В	Average rate of power purchase of JKPDD-D during FY 2014- 15	Rs/kWh	3.25
C	Difference in average rates of power purchase (A-B)	Rs/KWh	2.30
D	Quantum of RPO targets unmet by the Utility	MU	490
E	Disallowed power purchase amount on account of shortfall in RPO targets (C * D / 10)	Rs Cr	113.60

4.49 Based on above, the summary of power purchase cost submitted by the Petitioner and approved by the Commission for FY 2014-15 has been presented in following table.







<sup>^</sup> It does not include cost of 201 MU of RPO met through JKSPDC owned small-hydro stations.

Table 44: Approved power purchase cost from all sources for FY 2014-15 (Rs Cr)

Particulars	Submitted now by Petitioner	Approved now by JKSERC
Power Purchase from JKSPDC	485.26	469.14
Power Purchased from CGSs (including short term/UI)	3,541.12	3,542.10
Inter-state Transmission charges	427.59	427.59
Sub-total Sub-total	4,453.98	4,438.83
Cost of power purchase disallowed	0.00	-579.66
Disallowed power purchase amount on account of shortfall in RPO targets	0.00	-113.06
<b>Total Power Purchase cost</b>	4,453.98	3,746.11

# Water Usage Charges

#### **Petitioner's Submission**

- 4.50 The Commission in its Tariff Order dated 18<sup>th</sup> August, 2015 approved Rs. 436.20 Cr. as pass through expense on account of water usage charges payable to JKSPDC and NHPC for FY 2014-15.
- 4.51 The Petitioner further submitted that the NHPC has raised the bills payable during FY 2014-15 on account of water usage charges amounting to Rs. 213.47 Cr.

#### **Commission's Analysis**

- 4.52 The Commission vide its Order dated 18<sup>th</sup> August, 2015 approved the reimbursement of water usage charges payable by the Petitioner in FY 2014-15 in the light of the orders passed by the State Water Resource Regulatory Authority from time to time.
- 4.53 Accordingly, the Commission approves Rs. 305.65 Cr as pass through expense on account of water usage charges of JKSPDC for FY 2014-15.
- 4.54 In case of water usage charges for NHPC stations, the Commission directed the Petitioner to provide station-wise and monthly details of water usage charges payable to NHPC stations for the past years. On scrutiny of the bills submitted by the Petitioner, it was observed that the water usage charges of NHPC for FY 2014-15 amounted to Rs 163.35 Cr which the Commission approves.
- 4.55 Thus, total water usage charges approved by the Commission for FY 2014-15 works out to Rs. 469.00 Cr with the direction that the funds to discharge this liability will be provided to the utility by the Government over and above the budgetary allocation for power purchase as claimed by the Petitioner.





# **Operation & Maintenance (O&M) Expenses**

#### **Petitioner's Submission**

- 4.56 The Petitioner submitted that the Operation and Maintenance (O&M) expenses comprise of employee expenses, Repair & Maintenance (R&M) expenses and Administrative & General (A&G) expenses.
- 4.57 The actuals of O&M expenses for FY 2014-15 as submitted by the Petitioner is summarized in the following table:

Particulars.	Approved by JKSERC in MYT Order	Submitted by Petitioner in last year's Review Petition	Approved by JKSERC in last year's Tariff Order dated 18.08.2015	Actual submitted now
Employee Expenses	410.63	474.53	463.62	474.53
Admin & General Expenses	21.60	34.63	24.32	34.63
R&M Expenses	41.19	34.37	35.13	34.37
Total	473.42	543.53	523.06	543.53

Table 45: O&M Expenses for FY 2014-15 (Rs. Cr)

# Commission's Analysis

4.58 The O&M expenses for the FY 2014-15 are approved by the Commission in accordance with Regulation 22 of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012 and methodology approved in MYT Order dated 25<sup>th</sup> April, 2013. Accordingly, the Commission has approved separate norms for each of the components of O&M expenses viz., Employee cost, R&M expense and A&G expense.

#### Employee expenses

4.59 As per Regulation 22.1 of the above-mentioned regulations, employee cost for 'n' year (EMPn) during the MYT period would be determined on the basis of norm for employee cost (EMPb) escalated by average Consumer Price Index (CPI) inflation rate for immediately preceding three years and includes provisions for one-time costs such as Pay commission arrears, etc. The formula for projection of employee cost is as follows:

#### **EMP<sub>n</sub>** = (**EMP<sub>b</sub>** \* **CPI Inflation Rate**) + **Provisions**

Where,

 $EMP_n = Employee expense for year 'n'$ 

 $EMP_b = Employee$  expense as per norm

*CPI Inflation* = average increase in *CPI for immediately preceding three years* 

*Provisions = Provisions for uncontrollable or one-time expenses* 





4.60 Accordingly, the Commission has fixed the norm for employee cost on the basis of employee cost per personnel. The actual bifurcated employee cost and number of employees for distribution business for FY 2010-11 and FY 2011-12 has been considered to determine employee cost per personnel for FY 2010-11 and FY 2011-12 which comes to Rs. 2 lakh per employee and Rs. 3.20 lakh per employee, respectively. An average of the two is then calculated to arrive at EMP<sub>b</sub> for the MYT period which works out to be Rs. 2.60 lakh per employee. The following table summarises the computation of norm for employee cost.

**Table 46: Norm for Employee Expenses** 

Description	Units	2010-11	2011-12
Apportioned employee cost for previous years	Rs Cr	302.44	377.56
Number of employees as per Year Book for FY 2011-12	No.	15,399	11,959
Employee cost per personnel	Rs Cr/employee	0.020	0.032
EMP <sub>b</sub>	Rs Cr/employee	0.0	26

- 4.61 This EMPb is then escalated by average CPI index for previous three years worked out to be 7.14% per annum to arrive at EMPn without adjustment for provisions. This is then multiplied by number of employees during FY 2014-15 to arrive at employee cost for FY 2014-15. The number of employees for FY 2014-15 has been considered based on actual employees for FY 2014-15 as per the year book for the year. Further, the provision for 6<sup>th</sup> Pay Commission arrears is allowed as pass through during the MYT period in the ratio allocated to distribution business. Accordingly, 87% of the cost pertaining to 6<sup>th</sup> Pay Commission arrears of Rs.42.81 Cr had been allocated to distribution business for MYT period which works out to Rs.37.38 Cr.
- 4.62 Based on above, the approved employee expenses for FY 2014-15 have been summarised in following table.

Table 47: Approved Employee Expenses for FY 2014-15 (Rs Cr)

Description	Units	Norm	2014-15
$EMP_b(A)$	Rs Cr/employee	0.026	
CPI Inflation rate (B)	%	7.14%	
Number of employees (C)	No.		15,015
$EMP_n (D = A * B)$	Rs Cr/employee		0.029
Employee Expenses without provisions $(E = C * D)$	Rs Cr		441.34
Arrears for 6th Pay Commission	Rs Cr		42.81
Allocated to Distribution (87% of total) (F)	Rs Cr		37.38
Employee expenses with provisions $(G = E + F)$	Rs Cr		478.72







#### A&G expenses

4.63 As per Regulation 22.3 of the above-mentioned regulations, A&G cost for 'n' year (A&Gn) during the MYT period would be determined on the basis of norm for A&G cost (A&Gb) escalated by average Wholesale Price Index (WPI) inflation rate for immediately preceding three years including any past arrears/ provisions being beyond the control of the Petitioner. The formula for projection of A&G cost is as follows:

# $A\&G_n = (A\&G_b * WPI Inflation Rate) + Provisions$

Where,

 $A\&G_n = A\&G$  costs for year 'n'

 $A\&G_b = A\&G$  costs as per norm

WPI Inflation = average increase in WPI for immediately preceding three years

*Provisions = Provisions for uncontrollable or one-time expenses* 

4.64 Accordingly, the Commission has fixed the norm for A&G cost on the basis of A&G cost per personnel. The actual bifurcated A&G cost and number of employees for distribution business for FY 2010-11 and FY 2011-12 has been considered to determine A&G cost per personnel for FY 2010-11 and FY 2011-12 which comes to Rs.0.12 lakh per employee and Rs.0.19 lakh per employee, respectively. An average of the two is then calculated to arrive at A&Gb which works out to be Rs.0.16 lakh per employee. The following table summarises the computation of norm for A&G cost.

Table 48: Norm for A&G costs

Description	Units	2010-11	2011-12
Apportioned A&G cost for previous years	Rs Cr	18.53	23.03
Number of employees as per Year Book for FY 2011-12	No.	15,399	11,959
A&G cost per personnel	Rs Cr/employee	0.001	0.002
A&G <sub>b</sub>	Rs Cr/employee	0.002	

- 4.65 This A&Gb is then escalated by average WPI index for previous three years worked out to 1.86% per annum to arrive at A&Gn without adjustment for provisions. As the JKPDD-D has claimed no adjustments for A&G, the Commission has also not considered any provisions for A&G cost.
- 4.66 Based on above, the approved A&G expenses for FY 2014-15 have been summarised in following table.

Table 49: Approved A&G Expenses for FY 2014-15 (Rs Cr)

Description	Units	Norm	2014-15
<b>A&amp;G</b> <sub>b</sub> ( <b>A</b> )	Rs Cr/employee	0.002	
WPI Inflation rate (B)	%	1.86%	
Number of employees (C)	No.		15,015
$\mathbf{A\&G_n} (\mathbf{D} = \mathbf{A} * \mathbf{B})$	Rs Cr/employee		0.0016





Description	Units	Norm	2014-15
$\mathbf{A\&G\ Costs}\ (\mathbf{E}=\mathbf{C}*\mathbf{D})$	Rs Cr		24.37

#### **R&M** Expenses

4.67 As per Regulation 22.2 of the above-mentioned regulations, R&M cost for 'n' is to be determined based on average proportion (i.e. K) of actual R&M costs of opening Gross fixed assets (GFA) for previous years. The formula for projection of R&M cost is as follows:

$$R&M_n = K_b * GFA_n$$

Where,  $R \& M_n = R \& M \ Cost \ for \ year \ 'n'$   $GFA_n = opening \ GFA \ for \ year \ 'n'$  $K_b = Percentage \ point \ as \ norm$ 

- 4.68 The Commission has estimated the 'K' factor by considering the average of proportion of R&M costs of the opening GFA for FY 2010-11 and FY 2011-12. The actual bifurcated R&M costs for JKPDD-D have been considered at Rs. 25.04 Cr and Rs. 27.78 Cr for FY 2010-11 and FY 2011-12, respectively. In case of absence of asset-wise break up of GFA and basis of segregation to transmission and distribution business, the Commission has considered the opening GFA for FY 2010-11 and FY 2011-12 as per its approval in previous Tariff Orders. Further, the approved GFA for JKPDD-D as whole is bifurcated to transmission and distribution function in the same ratio as submitted by the Petitioner i.e. 26:74 ratio, respectively. Accordingly, approved GFA for FY 2010-11 and FY 2011-12 for distribution function has been considered at Rs.1,805.71 Cr and Rs.2,161.17 Cr, respectively.
- 4.69 Based on above, proportion of R&M costs to opening GFA for FY 2010-11 and FY 2011-12 works out to 1.39% & 1.29%, respectively. Thus 'Kb' is determined as average of previous year's ratios i.e. 1.34% of opening GFA for year 'n'.
- 4.70 The determination of norm for R&M cost (i.e. K factor) has been summarised in following table.

Table 50: Norm for R&M Expenses

Description	Units	2010-11	2011-12
Apportioned R&M cost for previous years	Rs Cr	25.04	27.78
Approved opening GFA as per previous Tariff Orders for JKPDD as whole	Rs Cr	2,440.15	2,920.50
Proportion of GFA attributable to distribution business	%	74%	74%
Opening GFA for JKPDD-D	Rs Cr	1,805.71	2,161.17
R&M Cost/ opening GFA	%	1.39%	1.29%
K <sub>b</sub> (norm)	%	1.34%	⁄o



4.71 The normative 'Kb' factor is then multiplied by the approved opening GFA for FY 2014-15 as approved by the Commission in the MYT Order. The approved R&M costs for the MYT period have been summarised below.

Table 51: Approved R&M Expenses for FY 2014-15 (Rs Cr)

Description	Units	Norm	2014-15
K <sub>b</sub>	%	1.34%	
Opening GFA for JKPDD-D as per Order dated 18 <sup>th</sup> August, 2015 for APR for FY 2014-15	Rs Cr		2,629.08
Approved R&M costs	Rs Cr		35.13

4.72 The following table summarizes the O&M cost as submitted by the Petitioner and as computed by the Commission for FY 2014-15:

Table 52: Approved O&M Expenses for FY 2014-15 (Rs. Cr)

Particulars	Approved in MYT Order	Approved by JKSERC in last year's Tariff Order dated 18.08.2015	Submitted now by Petitioner	Approved by JKSERC
Employee Expenses	410.63	463.62	474.53	478.72
Admin & General Expenses	21.60	24.32	34.63	24.37
R&M Expenses	41.19	35.13	34.37	35.13
Total	473.42	523.06	543.53	538.22

- 4.73 Since JKPDD-D is a Government owned Utility and is funded by the State Government, the Commission had directed the Petitioner to furnish certified information on O&M expenses for FY 2014-15 duly authenticated by the Power Development Department (PDD), GoJK. However, the Petitioner failed to do so.
- 4.74 In the absence of the same, the Commission provisionally approves the O&M expenses as determined in the previous paragraphs. The same shall be Trued-up on submission of audited data/ certified information on O&M expenses for FY 2014-15 duly authenticated by the Power Development Department (PDD), GoJK.

# Capital expenditure and Capitalization

#### **Petitioner's Submission**

4.75 The Petitioner submitted that it incurred capital expenditure of Rs 167.78 Cr during FY 2014-15 while the actual capitalisation was Rs 128.22 Cr.

#### Commission's Analysis

4.76 The Petitioner was directed by the Commission to submit certified information on capital investment for FY 2014-15 duly authenticated by the Power Development Department, GoJK. However, the Petitioner failed to provide the same.







- 4.77 Moreover, the Commission observed discrepancies in the capital expenditure figures submitted in the Petition and those submitted in the distribution formats. The Commission accordingly directed the Petitioner to submit justifications for the same. In reply, the Petitioner submitted that the actual capital expenditure during FY 2014-15 was Rs 167.69 Cr as indicated in the scheme-wise details in the distribution formats. In absence of certified information, the Commission has provisionally approved capital expenditure based on the scheme-wise details submitted in the distribution formats along with the Petition.
- 4.78 The Petitioner was also directed by the Commission to submit scheme-wise details of actual capitalisation during FY 2014-15. However, the Petitioner failed to provide the same.
- 4.79 The Commission observed that the total capitalisation of Rs 128.22 Cr as submitted by the Petitioner matched with the scheme-wise capitalisation approved by the Commission in the APR Order for FY 2014-15 dated 18.8.2015. Thus, in the absence of scheme-wise information, the Commission provisionally approves the capitalisation as approved in the APR Order for FY 2014-15.
- 4.80 The details of approved capital investment for FY 2014-15 are provided in the table below:

Approved in last Approved by the Actuals App. in MYT **Particulars** Commission vear's APR **Order** Submitted now Order **RGGVY Projects** 0.00 10.40 10.40 10.40 0.00 **PMRP Projects** 0.00 0.00 0.00 **R-APDRP Projects** 800.00 73.74 73.74 73.74 New Distribution Works 81.49 34.15 70.40 70.40 **REC Funded Projects** 50.00 7.94 13.15 13.15 Others 44.84 0.00 0.00 0.00 976.33 126.22 167.69 167.69 **Total** 

Table 53: Approved Capital Investment FY 2014-15 (Rs Cr)

Table 54: Approved Capitalisation FY 2014-15 (Rs Cr)

Particulars	App. in MYT Order	Approved in last year's APR Order	Actuals submitted now	Approved by the Commission
RGGVY Projects	87.11	57.81		57.81
PMRP Projects	0.00	0.00		0.00
R-APDRP Projects	552.28	29.50		29.50
New Distribution Works	56.26	26.12		26.12
REC Funded Projects	34.52	6.03		6.03
Others	30.96	8.77		8.77
Total	761.13	128.22	128.22	128.22



# **Gross Fixed Assets (GFA)**

#### **Petitioner's Submission**

4.81 The Petitioner submitted that based on the closing GFA of FY 2013-14 and the actual capitalisation during FY 2014-15, it has submitted the closing GFA of FY 2014-15 as summarised in the following table:

Approved by Sub. By **Commission in** App. In MYT **Petitioner in last** Actual last year's Tariff **Particulars** Order year's review **Submitted now** Order dated Petition 18.08.2015 2,629.08 Opening Balance 3,083.25 2,629.08 2,629.08 Addition during the 761.13 128.22 128.22 128.22 year **Closing Balance** 3,844.38 2,757.30 2,757.30 2,757.30

Table 55: GFA for FY 2014-15 as submitted by the Petitioner (Rs Cr)

#### **Commission's Analysis**

- 4.82 The opening GFA of FY 2014-15 has been considered as per the approved closing GFA of FY 2013-14 in the last year's True-up Order for FY 2013-14 dated 18.8.2015.
- 4.83 Based on the approved opening GFA and the approved capitalization for FY 2014-15, the Commission approves Rs. 2,757.30 Cr as closing GFA for FY 2014-15.
- 4.84 The following table summarizes opening GFA, assets capitalized and closing GFA for FY 2014-15 as submitted by Petitioner and provisionally approved by the Commission:

ParticularsSubmitted now by by PetitionerApproved now by JKSERCOpening Balance2,629.082,629.08Addition during the year128.22128.22Closing Balance2,757.302,757.30

Table 56: Approved GFA for FY 2014-15 (Rs. Cr)

# **Depreciation**

#### **Petitioner's Submission**

4.85 The JKPDD-D has determined depreciation on closing GFA for FY 2013-14 which is funded through REC loan only. The Petitioner has applied the average depreciation rate of 3.6% on the closing GFA to estimate the depreciation for FY 2014-15 which works out to Rs. 5.95 Cr.







- 4.86 The Regulation 24 (b) of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012 provides that depreciation shall not be allowed on assets funded by capital subsidies, consumer contributions or grants. However, as details of segregated assets into transmission and distribution functions of the utility and the financing of GFA for distribution business have not been submitted separately, the Commission has approved the depreciation on the assets funded by loan from REC only which is in accordance with the methodology approved by the Commission in MYT Order dated 25<sup>th</sup> April, 2013.
- 4.87 With regard to rate of depreciation, the Commission has considered the average rate of depreciation of 3.6% for calculation of depreciation, considering useful asset life of 25 years and a residual value of 10% as also approved by it in MYT Order dated 25<sup>th</sup> April, 2013.
- 4.88 The Commission has calculated the depreciation on the average GFA during the year as the additions to the GFA take place throughout the year and the average of the opening and closing GFA gives a more realistic view.
- 4.89 The depreciation cost as submitted now by Petitioner and provisionally approved now by the Commission has been summarized in following table:

Approved by **Commission in** App. In MYT Actual Approved now **Particulars** last year's Tariff Order **Submitted now** by Commission Order dated 18.08.2015 Opening GFA 202.73 162.17 162.17 162.17 Additions to GFA 34.52 6.03 6.03 6.03 Closing GFA 237.25 168.21 168.20 168.21 165.19 **Average GFA** 219.99 165.19 165.19 Depreciation Rate 3.60% 3.60% 3.60% 3.60% **Total** 7.92 5.95 5.95 5.95

Table 57: Approved depreciation charges for FY 2014-15 (Rs Cr)

# **Interest and Finance Charges**

#### **Interest on Loans**

#### **Petitioner's Submission**

4.90 Based on the actual loan balance, receipts and repayments during FY 2014-15 and the interest rate of 9.39% as applied by the Commission in MYT Order, the Petitioner has estimated interest and finance charges as Rs. 15.42 Cr for FY 2014-15.







- 4.91 The Commission has approved the interest and finance charges on loan as per the following approach:
  - (a) The opening balance of term liabilities as on 1<sup>st</sup> April, 2014 has been considered as per the closing balance of FY 2013-14 as on 31<sup>st</sup> March, 2014 approved by the Commission in the last year's True-up Order for FY 2013-14 dated 18.8 2015.
  - (b) Additions in loan during the year have been considered as per approved capitalization for REC funded projects i.e. Rs. 6.03 Cr.
  - (c) Regarding of repayment of loan during the year, the Commission while conducting the APR for FY 2014-15 in the last year's Tariff Order had asked the Utility to submit proofs of actual loan addition and repayments during FY 2014-15. The Petitioner had then submitted that it had repaid the loan amounting to Rs 15.55 Cr during the FY 2014-15. The Commission has accordingly considered Rs 15.55 Cr as loan repaid during the year.
  - (d) Rate of interest has been considered as 9.39% and is the same as considered in the MYT Order dated 25<sup>th</sup> April, 2013.
- 4.92 The Commission has calculated the interest on the average loan balance during the year and not on the closing loan balance as the receipts and repayments take place throughout the year and the average of the opening and closing loan balance gives a more realistic view.
- 4.93 Based on the above approach, the following table summarizes the interest and finance charges submitted now by Petitioner and provisionally approved by the Commission for FY 2014-15:

Table 58: Approved Interest and Finance Charges for FY 2014-15 (Rs. Cr)

Particulars	Approved in MYT Order	Approved in last year's Order	Actual submitted now by Petitioner	Approved now by JKSERC
Opening Loan balance (REC funded projects only)	183.48	146.99	162.01	146.99
Additions during the year (REC funded projects only)	34.52	6.03	13.14	6.03
Actual Repayments during the year	11.00	15.55	8.76	15.55
Closing Loan balance	207.00	137.48	166.39	137.48
Average Loan Balance	195.24	142.24	164.20	142.24
Rate of interest (%)	9.39%	9.39%	9.39%	9.39%
Interest on Term Loans	18.33	13.36	15.42	13.36



#### **Interest on Working Capital**

- 4.94 The Petitioner submitted that it has claimed normative interest on working capital for the MYT control period as per the relevant provisions of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012. The methodology considered for estimating normative working capital requirements:
  - (a) O&M expenses for 1 month;
  - (b) Maintenance spares @ 1% of opening GFA;
  - (c) Receivables for 2 months
- 4.95 The interest on working capital has been considered at normative interest rate of 14.75%. Accordingly, the Petitioner has projected interest on normative working capital for FY 2014-15 as Rs. 51.44 Cr.

#### Commission's Analysis

- 4.96 The Commission has estimated the interest on normative working capital as per Regulation 26 of the JKSERC (Multi Year Tariff Distribution) Regulations, 2012. Accordingly, the normative working capital requirements for FY 2014-15 has been projected on the basis of the following methodology:
  - (a) O&M expenses for one month;
  - (b) Two months equivalent of expected revenue;
  - (c) Maintenance spares @ 40% of R&M expenses for one month;

Less: Security deposits from consumers, if any.

- 4.97 Further, as per the Regulation, the rate of interest for computation of interest on normative working capital shall be considered equal to the J&K Bank Advance Rate as on date on which the Petition for determination of tariff is accepted by the Commission. Accordingly, the Commission has considered interest rate for working capital as equivalent to J&K Bank Advance rate i.e. 14.00% for computation of interest on working capital for FY 2014-15.
- 4.98 The interest on normative working capital as approved in the MYT Order, last year's Order, submitted now by Petitioner and approved now by the Commission for FY 2014-15 has been summarized in following table.

Table 59: Approved Interest on Working Capital for FY 2014-15 (in Rs. Cr.)

Particulars	Approved in MYT Order	Approved in last year's Order	Submitted now by Petitioner	Approved now by JKSERC
O & M Expenses for one month	39.45	43.59	45.29	44.85
Revenue for two months	304.29	375.88	202.29	365.71#



Particulars	Approved in MYT Order	Approved in last year's Order	Submitted now by Petitioner	Approved now by JKSERC
Maintenance Spares @ 40% of R&M expenses for one month	1.37	1.17	1.15	1.17
Normative Working Capital	345.11	420.64	348.73*	411.73
Rate of Interest	15.00%	14.75%	14.75%	14.00%
Interest on Working Capital	51.77	62.04	51.44	57.64

<sup>\*</sup>Petitioner has incorrectly computed the normative working capital requirement as Rs 348.73 Cr instead of Rs 248.73 Cr. #Revenue for two months is higher than that submitted by Petitioner as revenue at existing tariffs based on approved number of consumers, connected load, energy sales and existing tariffs has been computed and approved as Rs. 2,194.24 Cr against revenue of Rs 1,813.72 Cr submitted by Petitioner.

# **Return on Equity**

#### **Petitioner's Submission**

4.99 The JKSERC MYT Regulations, 2012, has approved pre-tax rate of reasonable return of 15.5% for Distribution Company. JKPDD-D does not have any normative equity as the entire capital expenditure has been funded by way of grants, except for a small portion of term debt. Further, the capital expenditure proposed in the MYT period is expected to be totally funded by way of Grants from GoJK or GoI. Hence, the Petitioner has not claimed any return on equity for FY 2014-15.

#### Commission's Analysis

4.100 The Commission accepts the submission made by the Petitioner and has not approved any return on equity for FY 2014-15.

#### Non-tariff Income

#### **Petitioner's Submission**

4.101 Non-Tariff Income consists of all those incomes from the business of retail supply of power excluding the income earned from sale of power. Non-Tariff income includes income from delayed payment charges (surcharge), rentals for meters and other equipments, miscellaneous charges from consumers (comprising of services rendered to consumers like reconnection/ disconnection, fuse off calls, etc.). The Petitioner has computed non-tariff income for FY 2014-15 to be Rs 14.79 Cr.

## Commission's Analysis

4.102 The Commission accepts the submission made by the Petitioner and provisionally approves non-tariff income for FY 2014-15 at Rs. 14.79 Cr.







# **Intra-state transmission charges**

#### **Petitioner's Submission**

4.103 The Intra-state transmission charges of Rs 152.58 Cr for FY 2014-15 have been considered as per the ARR petition for the transmission business of JKPDD for FY 2014-15.

## Commission's Analysis

4.104 The Commission has considered the intra-state transmission charges as per the ARR approved in the APR Order for FY 2014-15 for JKPDD-Transmission business dated 28<sup>th</sup> February, 2015. Accordingly, the intra-state transmission charges for FY 2014-15 have been approved as Rs. 89.37 Cr.

# Sharing of aggregate gains/losses

#### **Petitioner's Submission**

4.105 The Petitioner in its True-Up Petition for FY 2014-15 has not made any claim for sharing of aggregate gains/ losses on account of AT&C losses being controllable in nature as per the JKSERC (Multi Year Distribution Tariff) Regulations, 2012.

# Commission's Analysis

- 4.106 The Regulation 11.2 of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012, provides for sharing of gains/ losses on account of controllable factors of Aggregate AT&C loses as follows:
  - "11.2 The approved aggregate loss to the Distribution Licensee on account of controllable factor of aggregate technical and commercial (AT&C) losses shall be dealt with in the following manner:
  - (a) One-third of the amount of such loss may be passed on as an additional charge in tariff over such period as may be stipulated in the Order of the Commission; and
  - (b) The balance amount of loss shall be absorbed by the Distribution Licensee."
- 4.107 However, Regulation 8.2, as amended as per Commission's notification dated 2nd July, 2013, states that any Truing-Up of expenses shall be done on basis of audited accounts only. The relevant Regulation has been reproduced as follows:
  - "Provided that truing up of expenses for any year shall be carried out on the basis of the audited annual accounts for the year subject to prudence check by the Commission."





4.108 Thus, in absence of established/ authenticated baseline data and audited accounts for the year, it is not in the fitness of things to estimate sharing of gains and losses on basis of provisional accounts as part of provisional True-Up exercise. Thus, the Commission has not considered any sharing of gains/ losses on account of controllable factors and same will be considered at the time of submission of audited accounts for the year.

# Aggregate Revenue Requirement (ARR) for FY 2014-15

4.109 Based on the various components as discussed above, the summary of ARR for the FY 2014-15 as submitted by the Petitioner and as approved by the Commission has been summarized in the following table

Table 60: Summary of ARR for FY 2014-15 (Cr	Table 60:	Summary	of ARR	for FY	2014-15	(Cr)
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ARR Components	App. In MYT Order	Sub. by Petitioner in last year's review Petition	Approved by Commission in last year's Tariff Order dated 18.08.2015	Actual submitted now by the Petitioner	Approved now by Commission
Costs					
Power Purchase Cost	3,180.05	4,382.02	3,837.45	4,453.98	3,746.11
Water usage charges (JKSPDC+NHPC).	305.65	518.82	436.20	518.82	469.00
Intra-state transmission Charges	128.11	89.37	89.37	152.88	89.37
Operation and Maintenance Cost	473.42	543.53	523.06	543.53	538.22
Interest Cost	18.33	14.87	13.36	15.42	13.36
Depreciation	7.92	6.15	5.95	5.95	5.95
Interest on Working Capital	51.77	59.82	62.04	51.44	57.64
<b>Total Costs</b>	4,165.24	5,614.57	4,967.43	5,742.02	4,919.65
Add: Return on Equity	0.00	0.00	0.00	0.00	0.00
Less: Non-Tariff Income	14.80	14.79	14.79	14.79	14.79
Aggregate Revenue Requirement	4,150.44	5,599.78	4,952.64	5,727.22	4,904.86

# **Revenue from Sale of Power at Existing Tariffs**

#### **Petitioner's Submission**

4.110 Based on the energy sales, number of consumers and connected load based for FY 2014-15 and the category-wise approved tariffs as per the MYT Order, the revenue assessed at the existing tariff by the Petitioner for FY 2014-15 works out to Rs. 1,813.72 Cr.







- 4.111 The Commission has computed the revenue from sale of power at existing tariffs for FY 2014-15 based on the approved number of consumers, connected load, energy sales as per this Order and existing tariffs as per the MYT Order.
- 4.112 Accordingly, the Commission has now determined the revenue realization for FY 2014-15 as Rs. 2,194.24 Cr instead of Rs 1,813.72 Cr as submitted by the Petitioner as summarized in the following table:

Particulars	Submitted now by Petitioner	Approved now by JKSERC
Domestic	510.34	598.46
Non-Domestic/Commercial	213.94	229.51
Agriculture	75.48	90.94
State/ Central Govt. Department	307.36	461.11
Public Street Lighting	18.93	18.13
LT Industrial Supply	98.22	115.04
HT Industrial Supply	259.45	317.95
HT-PIU Industrial Supply	37.94	50.63
LT Public Water Works	173.26	154.88
HT Public Water Works	58.40	69.11
General Purpose Bulk	60.40	88.49
Total	1,813.72	2,194.24

4.113 It is pertinent to note that even though the Commission has considered slab-wise energy sales, number of consumers and connected as submitted by the Petitioner and the existing tariff of each category as per the MYT Order, the revenue from sale of power submitted by the Petitioner is lower than that computed by the Commission by Rs 368.03 Cr. On detailed scrutiny of the Petitioner's submission, it was observed that neither the fixed charges nor the energy charges for various categories of consumers matched with the charges computed by the Commission. Moreover, in some cases, the fixed charges of some categories of consumers were not considered by the Petitioner in its computation at all.

# Revenue Gap

## **Petitioner's Submission**

4.114 Based on the actual ARR for FY 2014-15 i.e. Rs. 5,727.22 Cr and assessed revenue realization for FY 2014-15 i.e. Rs. 1,813.72 Cr, the Petitioner has submitted revenue gap at existing tariffs for FY 2014-15 to be Rs. 3,913.50 Cr.

#### **Commission's Analysis**

4.115 Based on the approved ARR as well as approved revenue assessed for FY 2014-15, the Commission has provisionally determined revenue gap for FY 2014-15 as summarized in the following table:





Approved Approved **Submitted** SI. in last Approved now in MYT **Particulars** now by No. vear's by JKSERC Petitioner Order Order Aggregate Revenue 4,150.44 4,952.64 5,727.22 4,904.86 Requirement 2 Revenue Assessed 1,825.72 2,255.27 1,813.72 2,194.24 3 **Revenue Gap** (2,324.72)(2,697.37)(3,913.50)(2,710.62)

Table 62: Approved revenue gap at existing tariffs for FY 2014-15 (Rs Cr)

- 4.116 Further, as per the approach adopted by the Commission for cost coverage in its previous Tariff Orders, the Commission has determined Average Cost of Supply at Approved Loss Level (ACOSAL) to measure approved cost of supply keeping in mind approved losses, Average Cost of Supply at Zero Loss level (ACOSZL) to determine tariffs to recover atleast power purchase and other distribution costs without booking huge losses simply to avoid tariff shock to consumers and Average Cost of Supply at Prudent Loss level (ACOSPL) to determine gradual movement towards recovery of average cost of supply at targeted/prudent loss levels.
- 4.117 For computation of average cost of supply at different loss levels, the Commission considered the following:
  - (a) Average Cost of Supply at Approved Loss (ACOS<sub>AL</sub>): The Commission has calculated the ACOS<sub>AL</sub> by dividing the overall ARR of the utility by the approved energy sales quantum (units) for the corresponding financial year.
  - (b) Average Cost of Supply at Zero Loss (ACOS<sub>ZL</sub>): The Commission has calculated the ACOS<sub>ZL</sub> by dividing the overall ARR of the utility by the quantum (units) of power purchased for the corresponding financial year.
  - (c) **Average Cost of Supply at Prudent Loss (ACOS**<sub>PL</sub>): The Commission has calculated the ACOS<sub>PL</sub> by dividing the overall ARR of the utility by the quantum (units) of energy that would have been billed corresponding to the prudent level of T&D losses.
  - (d) **Prudent level of T&D losses:** The Commission has considered T&D losses of 23.65% as the prudent level of T&D losses (the average T&D loss at the national level as per the Central Electricity Authority). The Commission feels that fixing the prudent T&D loss level at 15% (in line with the Abraham Committee Report targets) will be unrealistic as the current T&D loss in the state is above 45%. Moreover, only a few states in the country have actually been able to achieve this target level of 15% loss. As such, the Commission has decided to consider an average value of T&D loss across all states in the country as the prudent level.
- 4.118 It is also pertinent to mention here, that even though the Commission determines ACOSPL i.e. average cost of supply at prudent loss levels, it is a benchmark figure aimed to move tariffs in direction of cost recovery; however same has to be matched by performance and efficiency improvement by the JKPDD-D.



**JKSERC** 



4.119 The following table summarizes ACOSAL, ACOSZL and ACOSPL as approved by the Commission in the MYT Order, approved in the last year's Order, submitted now by the Petitioner and approved now by the Commission for FY 2014-15:

Table 63: Approved average COS for FY 2014-15 (Rs/kWh)

Sl. No.	Particulars	Derivation	Approved in MYT Order	Approved in last year's Order	Submitted now by Petitioner	Approved now by JKSERC
A	Energy Sales (MU)	-	5,767	6,474	6,494	6,494
В	T&D Losses (%)	-	43.76%	43.76	51.06%	43.76%
С	Power Purchase Quantum (MU)	-	10,637	11,850	13,673	11,887
D	Aggregate Revenue Requirement (Rs Cr)	-	4,150.44	4,952.64	5,727.22	4,871.77
E	COS as actual / approved losses (CoS <sub>AL</sub> ) (Rs/KWh)	[ E = D/ A * 10 ]	7.20	7.65	8.82	7.55
F	CoS at Zero Losses (CoSzl) (Rs/KWh)	[F=D/C* 10]	4.05	4.30	4.32	4.25
G	CoS at Prudent Losses (CoS <sub>PL</sub> ) (Rs/KWh)	[G = D/(C * (1-H)) *10]	5.32	5.64	-	5.56
Н	Approved average realization rate	-	3.17	3.48	2.79	3.38

Note 1: The prudent loss level for FY 2014-15 is considered as 23.65% (as per monthly statistics by CEA, www.cea.nic.in)





### **CHAPTER 5: ANNUAL PERFORMANCE REVIEW FOR FY 2015-16**

As per Regulation 8.2 of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012 and as amended vide Commission's Order dated 2 July, 2013, the Licensee shall submit the Annual Performance Review Report as part of annual review on actual performance as per the timelines specified to assess the performance vis-à-vis the targets approved by the Commission at the beginning of the Control Period. The relevant provision has been summarized below:

"8.2 The Licensee shall submit the Annual Performance Review Report as part of annual review on actual performance as per the timelines specified to assess the performance vis-à-vis the targets approved by the Commission at the beginning of the Control Period. This shall include annual statements of its performance and accounts including the latest available audited/actual accounts and the tariff worked out in accordance with these Regulations.

Provided that truing up of expenses for any year shall be carried out on the basis of the audited annual accounts for the year subject to prudence check by the Commission."

- 5.2 Based on above, the Petitioner submitted the Petition for APR for FY 2015-16 based on the performance of the Utility during the period under review.
- 5.3 The Commission has provisionally approved the APR for FY 2015-16 in this Tariff Order, however it has not allowed any incentive/ penalty for gains/ losses on over/under achievement of targets for uncontrollable parameters as the review is based on provisional data. The sharing of gains/ losses will be determined at the time of True up based on audited annual accounts for the year and submission of actual data.
- 5.4 This section summarizes the projections for annual performance review for FY 2015-16 as submitted by Petitioner and as approved by the Commission.

# **Energy Sales**

### **Petitioners Submission**

- 5.5 JKPDD-D caters to a diverse consumer mix constituting of domestic, commercial, industrial and agriculture consumers. JKPDD-D submitted that at the end of FY 2014-15, the total number of consumers catered by JKPDD-D system was 16, 25,422 having a total connected load of 2,875 MW.
- 5.6 Based on the performance of the Utility during FY 2015-16, a further 1,66,866 number of consumers and connected load of 331.20 MW are estimated to be added during the period under review as summarized in the following tables:





Table 64: Revised estimates of Consumers (Nos) for FY 2015-16

Consumer Category	Approved by JKSERC in MYT Order	Submitted by Petitioner in Business Plan Petition	Approved by JKSERC in Order on Business Plan dated 14.10.2015	Revised Estimates now
Domestic	1,685,423	1,538,017	1,538,017	1,538,017
Metered	1,685,423	1,538,017	1,538,017	1,538,017
Un-metered	0	0	0	0
Non - Domestic/ Commercial	170,688	197,705	197,705	197,705
Metered	170,688	197,705	197,705	197,705
Un-metered	0	0	0	0
Agriculture	17,443	20,158	20,158	20,158
Metered	17,443	20,158	20,158	20,158
Un-metered	0	0	0	0
State/ Central Govt. Departments	10,220	11,320	11,320	11,320
Public Street Lighting	258	271	271	271
Metered	258	271	271	271
Un-metered	0	0	0	0
LT Industrial Supply	19,737	20,932	20,932	20,932
Metered	19,737	20,932	20,932	20,932
Un-metered	0	0	0	0
HT Industrial Supply	745	785	785	785
HT PIU	17	14	13	13
LT Public Water Works	1,991	2,484	2,484	2,484
Metered	1,991	2,484	2,484	2,484
Un-metered	0	0	0	0
HT Public Water Works	136	265	265	265
Bulk Supply	146	158	158	158
TOTAL	1,906,804	1,792,109	1,792,108	1,792,108

Table 65: Revised estimates of connected load (MW) for FY 2015-16

Consumer Category	Approved by JKSERC in MYT Order	Submitted by Petitioner in Business Plan Petition	Approved by JKSERC in Order on Business Plan dated 14.10.2015	Revised Estimates now
Domestic	1,439	1,581	1,581	1,581
Metered	1,439	1,180	1,180	1,180
Un-metered	0	402	402	402
Non - Domestic/ Commercial	317	352	352	352



Consumer Category	Approved by JKSERC in MYT Order	Submitted by Petitioner in Business Plan Petition	Approved by JKSERC in Order on Business Plan dated 14.10.2015	Revised Estimates now
Metered	317	303	303	303
Un-metered	0	48	48	48
Agriculture	141	140	140	140
Metered	141	115	115	115
Un-metered	0	26	26	26
State/ Central Govt. Departments	219	253	253	253
Public Street Lighting	12	13	13	13
Metered	12	9	9	9
Un-metered	0	4	4	4
LT Industrial Supply	261	279	279	279
Metered	261	279	279	279
Un-metered	0	0	0	0
HT Industrial Supply	378	361	361	361
HT PIU	37	33	33	33
LT Public Water Works	76	100	100	100
Metered	76	82	82	82
Un-metered	0	18	18	18
HT Public Water Works	23	26	26	26
Bulk Supply	52	68	68	68
TOTAL	2,958	3,206	3,206	3,206

- As per the Regulation 16 of the JKSERC (Multi Year Distribution) Regulation 2012, energy sale is an uncontrollable parameter. The sales in the un-metered category as per the Regulation 17 of the above mentioned regulations have been assessed by working out the units backwards from the amount billed on connected load basis in each slab. This has enabled the department to assess the unmetered sales in a realistic manner particularly in the domestic category and commercial category where the unmetered sales are significant.
- 5.8 The category wise energy sales as submitted by the Petitioner have been summarized in following table.

Table 66: Revised Estimates of Energy Sales (MU) for FY 2015-16

Consumer Category	Approved by JKSERC in MYT Order	Submitted by Petitioner in Business Plan Petition	Approved by JKSERC in Order on Business Plan dated 14.10.2015	Revised Estimates now
Domestic	2,731	2,985	2,985	2,985





Consumer Category	Approved by JKSERC in MYT Order	Submitted by Petitioner in Business Plan Petition	Approved by JKSERC in Order on Business Plan dated 14.10.2015	Revised Estimates now
Metered	2,731	2,275	2,275	2,275
Un-metered	0	710	710	710
Non - Domestic/ Commercial	740	921	921	921
Metered	740	632	632	632
Un-metered	0	289	289	289
Agriculture	368	297	297	297
Metered	368	235	235	235
Un-metered	0	62	62	62
State/ Central Govt. Departments	554	805	805	805
Public Street Lighting	44	51	51	51
Metered	44	28	28	28
Un-metered	0	23	23	23
LT Industrial Supply	419	378	378	378
Metered	419	378	378	378
Un-metered	0	0	0	0
HT Industrial Supply	768	920	920	920
HT PIU	128	110	110	110
LT Public Water Works	491	438	438	438
Metered	491	274	274	274
Un-metered	0	163	163	163
HT Public Water Works	112	139	139	139
Bulk Supply	172	177	177	177
TOTAL	6,526	7,220	7,220	7,220

# **Commissions Analysis**

The Commission observes that the revised estimates of consumers, connected load and energy sales submitted by the Petitioner is in line with those approved by the Commission in the Order on Business Plan for the 2<sup>nd</sup> MYT Control Period dated 14<sup>th</sup> October, 2015. Moreover, as per the Regulation 16 of the JKSERC (Multi Year Distribution) Regulation 2012, energy sale is an uncontrollable parameter. Therefore, the Commission provisionally approves the number of consumers, connected load and energy sales as per the submission of the Petitioner. However, the same shall be Trued-Up at the time of submission of audited accounts and verifiable data.





5.10 Accordingly, number of consumers, connected load and energy sales for FY 2015-16 as approved by the Commission have been summarized in following table:

Table 67: Approved number of consumers, connected load (MW) & Energy Sales (MU) for FY 2015-16

Consumer Category	Consumers (Nos.)	Connected Load (MW)	Energy sales (MU)
Domestic	1,538,017	1,581	2,985
Metered	1,538,017	1,180	2,275
Un-metered	0	402	710
Non - Domestic/ Commercial	197,705	352	921
Metered	197,705	303	632
Un-metered	0	48	289
Agriculture	20,158	140	297
Metered	20,158	115	235
Un-metered	0	26	62
State/ Central Govt. Departments	11,320	253	805
Public Street Lighting	271	13	51
Metered	271	9	28
Un-metered	0	4	23
LT Industrial Supply	20,932	279	378
Metered	20,932	279	378
Un-metered	0	0	0
HT Industrial Supply	785	361	920
HT PIU	13	33	110
LT Public Water Works	2,484	100	438
Metered	2,484	82	274
Un-metered	0	18	163
HT Public Water Works	265	26	139
Bulk Supply	158	68	177
TOTAL	1,792,108	3,206	7,220

# **Losses and Energy Requirement**

#### **Petitioners Submission**

5.11 The distribution loss for FY 2015-16 as reported by the Utility is 44.0%. Further, the JKPDD-D submitted that it has initiated several steps to reduce the distribution losses which have historically remained very high. The department is implementing R-APDRP in 30 major towns of the State. The department has also constituted special Enforcement Team in addition to the routine inspection squads at all levels. The teams regularly conduct inspections of all the categories of consumers. During the inspections the illegal connections, defective energy meters, illegal hooking, load in use as against the sanctioned load, incidences of under billing, inspection of capacitors etc., are identified and it is ensured that the defaulters are dealt under rules. The department is taking all the possible administrative and technical measures to reduce the distribution loss and the results during the period are very encouraging.







5.12 The distribution loss level achieved during FY 2015-16 against the approved target in the previous Orders are summarized below.

Table 68: Revised estimates of distribution losses for FY 2015-16 (%)

Particulars	Approved by JKSERC in MYT Order	Submitted by Petitioner in Business Plan Petition	Approved by JKSERC in Order on Business Plan dated 14.10.2015	Revised Estimates now
Distribution Loss	39.85%	44.00%	39.85%	44.00%

5.13 In addition to above, the Petitioner submitted that estimated inter-state and intrastate transmission losses should be approx. 3.6% and 4.0%, respectively which are same as approved by the Commission in the MYT order dated 25<sup>th</sup> April, 2013 and same has been summarized in the following table.

Table 69: Revised estimates of Inter-State and Intra-State Transmission Loss for FY 2015-16 (%)

Particulars	App. by JKSERC in MYT Order	Proj. in APR by JKPDD-D
Inter-state transmission loss	3.6%	3.6%
Intra-state transmission loss	4.0%	4.0%

5.14 The revised estimates of energy requirement at the transmission periphery (within State) during FY 2015-16 based on revised energy sales and estimated distribution and intra-state transmission losses has been summarized in the following table.

Table 70: Revised estimates of energy requirement (MU) for FY 2015-16

Sl. No.	Description	Submitted now by Petitioner
1	Energy Sales(MU)	7,220
2	Distribution Losses (%)	44.00%
3	Total Energy required at Dist. Periphery(MU)	12,894
4	Intra-State Transmission losses (%)	4.00%
5	Total Energy Requirement (MU) at Transmission Periphery	13,431

### **Commissions Analysis**

- 5.15 The Commission views that even though the JKPDD-D has brought down losses in last two-three years, the T&D losses in the State are still very high. Further, the Commission noted with concern that JKPDD-D has repeatedly failed to achieve the target for loss reduction as set out by the Commission in its previous Tariff Orders.
- 5.16 The Commission in its MYT Order for period from FY 2013-14 to 2015-16 dated 25<sup>th</sup> April, 2013 had set the target for T&D loss of 42.26% for FY 2015-16 which included 39.85% of distribution losses and 4.0% of intra-state transmission losses. The targets for T&D losses were approved after taking into consideration the JKPDD-D's commitment for metering and implementation of Central Government assisted R-APDRP scheme in the State. In view of above, the Commission directs the JKPDD-D to make serious efforts to achieve the targets set out for reduction in





losses and any inefficiency on account of the licensee should not be passed on to the consumers.

- 5.17 Thus, the Commission approves the same aggregate T&D loss for FY 2015-16 i.e. 42.26% (corresponding to distribution loss of 39.85% and intra-state transmission loss of 4.0%) and any additional power purchase to meet the T&D losses over and above the target loss level has been disallowed by the Commission.
- 5.18 In addition, the Commission has approved the inter-state transmission losses as per the average transmission losses for northern region during FY 2015-16 as per the report of Northern Region Load Despatch Centre (NRLDC). Accordingly, the Commission has approved inter-state transmission losses at 3.6% for FY 2015-16.

Particulars	Submitted now by Petitioner	Approved now by JKSERC
Distribution Loss (%)	44.00%	39.85%
Intra-state Transmission loss (%)	4.0%	4.0%

3.6%

3.6%

Table 71: Approved distribution and transmission Losses FY 2015-16 (%)

5.19 Based on the approved energy sales, distribution loss and intra-state transmission loss, the approved energy requirement at transmission periphery (within state) for FY 2015-16 has been summarized in the following table.

Particulars	Submitted now by Petitioner	Approved now by JKSERC
ENERGY REQUIREMENT		
Energy Sales	7,220	7,220
Add: Distribution Loss (%)	44.00%	39.85%
Distribution Loss (MU)	5,673	4,784
Energy Req. @ Dist. periphery	12,894	12,005
Add: Intra-state Trans. Loss (%)	4.00%	4.00%
Intra-state Trans. Loss (MU)	537	500
Energy Req. @ Trans. Periphery (MU)	13,431	12,505

Table 72: Approved energy requirement for FY 2015-16 (in MU)

# **Power Purchase Quantum**

Inter-state Transmission loss (%)

5.20 Power purchase expense is the largest component of the ARR, which forms approximately 80% of the total revenue requirement for a year. Hence, it is imperative that this element of cost is estimated with utmost care and prudence. The Commission has exercised due caution in estimating power purchase cost of JKPDD-D for FY 2015-16.

### **Petitioner's Submission**

5.21 JKPDD-D submitted that the energy requirement for the State during FY 2015-16



**JKSERC** 



has been met from following sources:

- (a) Power Purchase from JKSPDC
- (b) Power Purchase from CPSUs (including free power from select stations)
- (c) Power Purchase from other sources (including UI/ bilateral and banking arrangements, etc)
- 5.22 The Petitioner has submitted that the total energy available from own generating stations and JKSPDC during FY 2015-16 is estimated to be 2431 MU.
- 5.23 Further, JKPDD-D also has firm allocated share in Central Generating Stations (CSGs) of NTPC Ltd, NHPC Ltd, Tehri Hydro Development Corporation (THDC), Satluj Jal Vidyut Nigam Limited (SJVNL) and Nuclear Power Corporation Limited (NPCIL). In addition, some power is also available from unallocated share from CSGs during the year. JKPDD-D has considered the firm allocation of power and unallocated share from different plants of CGS during FY 2015-16. Accordingly, the Petitioner has submitted net energy availability from CGSs (through long term power purchase) during FY 2015-16 is estimated to be 10,478 MU.
- 5.24 In addition to above, JKPDD-D has also entered into banking arrangements with the neighboring states and has banked certain quantum of surplus energy available in the summer/monsoon months. Net Banking during FY 2015-16 has been assumed as zero which is as per the approach followed by the Commission in the past. Further, during FY 2015-16, the JKPDD-D has projected purchase of 296 MU of energy on short term basis to meet shortfall in energy requirement.

# Renewable purchase Obligation (RPO)

- 5.25 As per the provisions of the JKSERC (Renewable Power Purchase Obligation, its compliance and REC Framework implementation) Regulation, 2011, JKPDD-D has to meet Solar RPO target of 0.75% of energy requirement and non-solar RPO target of 5.25% of energy requirement during FY 2015-16.
- 5.26 The Petitioner also submitted that it has estimated RPO target for FY 2015-16 as 838.08 MU out of which it will meet non-solar RPO of 200.88 MU from purchase of power from mini/small hydel stations of JKSPDC. The projected RPO target for FY 2015-16 as submitted by the Petitioner has been summarized below.

Table 73: Projected details of RPO FY 2015-16 (MU)

Renewable energy requirement	FY2015-16 RE
RPO Target	
Solar Power	96.70
Non-Solar	741.38
Total RE (MUs)	838.08
RE Available from Mini Hydel Plants	200.88
Total RE available	200.88
Remaining RPO to be met	



Renewable energy requirement	FY2015-16 RE
Solar	96.70
Non Solar	540.50
Total	637.20

5.27 Thus, JKPDD-D has submitted that total energy available during FY 2015-16 from all sources is estimated at 13,842 MU. Considering inter-state transmission losses, the energy available at transmission periphery during FY 2014-15 is estimated at 13,431 MU.

# **Commissions Analysis**

- 5.28 As mentioned in the Petitioner's submission, JKPDD-D procures power from its own sources, state owned generating company namely JKSPDC, allocated/unallocated share in CGSs, banking arrangement, short term purchase, UI, and any other source.
- 5.29 In order to approve the energy availability from JKSPDC stations, the Commission observes that the energy availability from JKSPDC's stations as submitted by the Petitioner is in line with that approved by the Commission for FY 2015-16 in the last year's Order dated 18<sup>th</sup> August, 2015. The Commission finds it prudent to adopt the same figures for energy availability from JKSPDC's stations for FY 2015-16 as approved by the Commission in the last year's Order dated 18<sup>th</sup> August, 2015. The same shall be Trued-up based on submission of audited data. Accordingly, the Commission approves net energy available from JKSPDC as 2460 MU for FY 2015-16.
- 5.30 Similarly, in order to approve the energy availability from CGSs including NTPC, NHPC, NPCIL etc, the Commission observes that the energy availability from CGS as submitted by the Petitioner is in line with that approved by the Commission for FY 2015-16 in the last year's Order dated 18<sup>th</sup> August, 2015. The Commission finds it prudent to adopt the same figures for energy availability from CGSs for FY 2015-16 as approved by the Commission in the for FY 2015-16 in the last year's Order dated 18<sup>th</sup> August, 2015. Accordingly, the Commission approves net energy available from CGSs as 10,478 MUs for FY 2015-16.
- 5.31 The Commission has not projected any power availability from short-term sources since the Commission, in accordance with the Regulation 19(d) of the JKSERC (Distribution Multi Year Tariff) Regulation 2012, will approve such requirement on account of any factor beyond the control of the Licensee only such as shortage/ non-availability of fuel, snow capping of hydro resources inhibiting power generation in sources stipulated in the plan, unplanned/forced outages of power generating units or acts of God and after submission of supporting documents.

### Renewable purchase Obligation (RPO)

5.32 The RPO target in accordance with the JKSERC (Renewable Power Purchase Obligation, its Compliance and REC Framework implementation) Regulations, 2011 and JKSERC Notification No. 44/JKSERC of 2015 dated 5th August, 2015 is as follows:







Table 74: Renewable Purchase Obligation (RPO) for FY 2015-16

Description	2015-16
Solar	0.75%
Non-Solar	5.75%
Total	6.50%

- 5.33 The estimated energy requirement for FY 2015-16 based on estimates of energy sales and loss for the period has been approved by the Commission at 12,505 MU as indicated in Table 72 of this Order. Thus, the target for the power purchase from renewable sources works out to 813 MU, out of which the solar RPO target is 94 MU and non-solar RPO target is 719 MU. Since, non-solar RPO can be met through purchase of already tied up power from small hydro stations of JKSPDC having installed capacity < 25 MW and the projected power availability from JKSPDC's small hydro stations during FY 2015-16 is 201 MU, thus the requirement of non-solar power/ RECs to meet non-solar RPO is revised to 518 MU. Accordingly, the Commission approves the target of 518 MU of non-solar and 94 MU of solar RPO targets for FY 2015-16.
- 5.34 However, the Commission notes with concern that the Petitioner has failed to meet its RPO targets in the previous years. The Petitioner is directed to ensure that the RPO targets are met in future and for this purpose they should initiate timely action for inviting competitive bids for procurement of solar/non-solar power or alternately purchase RECs. The Commission directs that in future years the Petitioner should make all out efforts to meet RPO targets and any non-compliance shall invite penal action.

# Disallowance of power purchase quantum

- 5.35 As stated in Para 5.17 of this Order, the Commission has disallowed additional power purchase over and above the target loss level of 42.26% by the Petitioner during FY 2015-16. Disallowed units of power purchase works out to 669 MU.
- 5.36 Based on the above analysis and considering inter-state transmission losses at 3.60% for FY 2015-16, the projected and approved energy availability from all sources during FY 2015-16 has been summarized in the following table:

Table 75: Source-wise approved energy availability during FY 2015-16 (in MU)

Source	Submitted now by Petitioner	Approved now by JKSERC
A. State-owned Stations		
JKPDD - Own Stations		
Diesel	0	24
Sub-Total (A)	0	24
B. JKPDC – Thermal		
Kalakote	0	0
Gas Turbine-I	0	5



	Submitted	Approved now
Source	now by Petitioner	by JKSERC
Gas Turbine-II	0	0
Sub-Total (B)	0	5
C. JKPDC – Hydel		
LJHP	552	552
USHP-I	75	75
USHP-II	279	279
Ganderbal	19	19
Chenani-I	72	72
Chenani-II	6	6
Chenani-III	6	6
Sewa-III	0	0
Karnah	6	6
Sumoor	0	0
Bazgo	0	0
Hunder	1	1
Iqbal Bridge	4	4
Sanjak	0	0
Badherwah	2	2
Pahalgam	7	7
Haftal	1	1
Marpachoo	1	1
Igo-Mercellong	1	1
Stakna	0	0
Matchil	0	0
<b>Sub-Total</b> (C)* (includes 201 MUs reflected in non-solar RPO)	1,032	1,032
Baglihar (D)	1,399	1,399
Total State Generation (A+B+C+D)	2,431	2,460
E NUMBER		
E. NTPC		
Anta(G)	181	181
Anta(LNG+L)		
Auriaya (J.N.C. I.)	151	151
Auriaya (LNG+L) Dadri (G)		
Dadri (LNG+L)	234	234
Unchahar-I	122	122
Unchahar-II	244	244
Unchahar-III	141	141
Rihand-I	540	540
Rihand-II		
	746	746
Rihand-III	438	438
Singrauli	152	152







		Submitted	Approved now
Farraka         94         94           Talcher         0         0           Kahalgaon-I         215         215           Kahalgaon-II         576         576           Nctp-2         69         69           Korba-I         83         83           Korba-III         39         39           Mouda         52         52           Sipat-I         151         151           Sipat-II         69         69           Vindhyachal-I         69         69           Vindhyachal-I         69         69           Vindhyachal-3         60         60           Vindhyachal-4         67         67           Sub-Total (E)         4,531         4,531           Free power         409         409           Sala         748         748           Free power         409         409           Tanakpur         21         21           Chamera-II         132         132           Chamera-III         89         89           Uri-I         588         588           Free power         232         239           Free power	Source	now by Petitioner	by JKSERC
Kahalgaon-I         215         215           Kahalgaon-II         576         576           Nctp-2         69         69           Korba-I         83         83           Korba-III         39         39           Mouda         52         52           Sipat-I         151         151           Sipat-III         56         56           Vindhyachal-I         69         69           Vindhyachal-2         52         52           Vindhyachal-3         60         60           Vindhyachal-4         67         67           Sub-Total (E)         4,531         4,531           F. NHPC	Farraka		94
Kahalgaon-II         576         576           Nctp-2         69         69           Korba-I         83         83           Korba-III         39         39           Mouda         52         52           Sipat-I         151         151           Sipat-III         56         56           Vindhyachal-I         69         69           Vindhyachal-2         52         52           Vindhyachal-3         60         60           Vindhyachal-4         67         67           Sub-Total (E)         4,531         4,531           F. NHPC         5         52           Salal         748         748           Free power         409         409           409         409         409           Tanakpur         21         21           Chamera-II         132         132           Chamera-III         89         89           Uri-I         588         588           Free power         172         172           Duhasti         239         239           Free power         172         172           Dhauliganga	Talcher	0	0
Nctp-2	Kahalgaon-I	215	215
Korba-III	Kahalgaon-II	576	576
Korba-III         39         39           Mouda         52         52           Sipat-I         151         151           Sipat-II         56         56           Vindhyachal-I         69         69           Vindhyachal-2         52         52           Vindhyachal-3         60         60           Vindhyachal-4         67         67           Sub-Total (E)         4,531         4,531           F. NHPC	Nctp-2	69	69
Mouda         52         52           Sipat-I         151         151           Sipat-II         56         56           Vindhyachal-1         69         69           Vindhyachal-2         52         52           Vindhyachal-3         60         60           Vindhyachal-4         67         67           Sub-Total (E)         4,531         4,531           F. NHPC	Korba-I	83	83
Sipat-II         56         56           Vindhyachal-I         69         69           Vindhyachal-2         52         52           Vindhyachal-3         60         60           Vindhyachal-4         67         67           Sub-Total (E)         4,531         4,531           F. NHPC         *** Pree power           Salal         748         748           Free power         409         409           Tanakpur         21         21           Chamera-II         132         132           Chamera-III         89         89           Uri-I         588         588           Free power         328         328           Uri-II         159         159           Free power         172         172           Dulhasti         239         239           Free power         254         254           Dhauliganga         41         41           Sewa-II         45         45           Free power         75         75           Nimao Bazgo         58         58           Free power         10         10           Ch	Korba-III	39	39
Sipat-II         56         56           Vindhyachal-I         69         69           Vindhyachal-2         52         52           Vindhyachal-3         60         60           Vindhyachal-4         67         67           Sub-Total (E)         4,531         4,531           F. NHPC	Mouda	52	52
Vindhyachal-I         69         69           Vindhyachal-2         52         52           Vindhyachal-3         60         60           Vindhyachal-4         67         67           Sub-Total (E)         4,531         4,531           F. NHPC         ****         ****           Salal         748         748           Free power         409         409           Tanakpur         21         21           Chamera-I         96         96           Chamera-III         89         89           Uri-I         588         588           Free power         328         328           Uri-II         159         159           Free power         172         172           Dulhasti         239         239           Free power         254         254           Dhauliganga         41         41           Sewa-II         45         45           Free power         75         75           Nimao Bazgo         58         58           Free power         10         10           Chutak         39         39           Free po	Sipat-I	151	151
Vindhyachal-2         52         52           Vindhyachal-3         60         60           Vindhyachal-4         67         67           Sub-Total (E)         4,531         4,531           F. NHPC	Sipat-II	56	56
Vindhyachal-3         60         60           Vindhyachal-4         67         67           Sub-Total (E)         4,531         4,531           F. NHPC         409         409           Salal         748         748           Free power         409         409           Tanakpur         21         21           Chamera-I         96         96           Chamera-III         89         89           Uri-I         588         588           Free power         328         328           Uri-II         159         159           Free power         172         172           Dulhasti         239         239           Free power         254         254           Dhauliganga         41         41           Sewa-II         45         45           Free power         75         75           Nimao Bazgo         58         58           Free power         10         10           Chutak         39         39           Free power         24         24           Pree power         24         24           Pree power	Vindhyachal-I	69	69
Vindhyachal-3         60         60           Vindhyachal-4         67         67           Sub-Total (E)         4,531         4,531           F. NHPC         409         409           Salal         748         748           Free power         409         409           Tanakpur         21         21           Chamera-I         96         96           Chamera-III         89         89           Uri-I         588         588           Free power         328         328           Uri-II         159         159           Free power         172         172           Dulhasti         239         239           Free power         254         254           Dhauliganga         41         41           Sewa-II         45         45           Free power         75         75           Nimao Bazgo         58         58           Free power         10         10           Chutak         39         39           Free power         24         24           Pree power         24         24           Pree power	Vindhyachal-2	52	52
Sub-Total (E)       4,531       4,531         F. NHPC       748       748         Salal       748       748         Free power       409       409         Tanakpur       21       21         Chamera-II       96       96         Chamera-III       89       89         Uri-I       588       588         Free power       328       328         Uri-II       159       159         Free power       172       172         Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       <	Vindhyachal-3	60	60
F. NHPC       Salal       748       748         Free power       409       409         Tanakpur       21       21         Chamera-II       96       96         Chamera-III       89       89         Uri-I       588       588         Free power       328       328         Uri-II       159       159         Free power       172       172         Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.       50       55	Vindhyachal-4	67	67
Salal       748       748         Free power       409       409         Tanakpur       21       21         Chamera-II       96       96         Chamera-III       89       89         Uri-I       588       588         Free power       328       328         Uri-II       159       159         Free power       172       172         Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.       50       50       50         L. PTC India Ltd.       50<	Sub-Total (E)	4,531	4,531
Free power       409       409         Tanakpur       21       21         Chamera-II       96       96         Chamera-III       89       89         Uri-I       588       588         Free power       328       328         Uri-II       159       159         Free power       172       172         Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.       50       55	F. NHPC		
Tanakpur       21       21         Chamera-I       96       96         Chamera-III       132       132         Chamera-III       89       89         Uri-I       588       588         Free power       328       328         Uri-II       159       159         Free power       172       172         Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.       51       52	Salal	748	748
Chamera-II       96       96         Chamera-III       132       132         Chamera-III       89       89         Uri-I       588       588         Free power       328       328         Uri-II       159       159         Free power       172       172         Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.       50       50	Free power	409	409
Chamera-III       132       132         Chamera-III       89       89         Uri-I       588       588         Free power       328       328         Uri-II       159       159         Free power       172       172         Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.       50       50	Tanakpur	21	21
Chamera-III       89       89         Uri-I       588       588         Free power       328       328         Uri-II       159       159         Free power       172       172         Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.       589       58	Chamera-I	96	96
Uri-I       588       588         Free power       328       328         Uri-II       159       159         Free power       172       172         Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.	Chamera-II	132	132
Free power       328       328         Uri-II       159       159         Free power       172       172         Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.       528       52	Chamera-III	89	89
Uri-II       159       159         Free power       172       172         Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.	Uri-I	588	588
Free power       172       172         Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.	Free power	328	328
Dulhasti       239       239         Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.	Uri-II	159	159
Free power       254       254         Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.	Free power	172	172
Dhauliganga       41       41         Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.	Dulhasti	239	239
Sewa-II       45       45         Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.	Free power	254	254
Free power       75       75         Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.	Dhauliganga	41	41
Nimao Bazgo       58       58         Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.	Sewa-II	45	45
Free power       10       10         Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.	Free power	75	75
Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.	Nimao Bazgo	58	58
Chutak       39       39         Free power       24       24         Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.		10	10
Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.	-	39	39
Parbati-III       54       54         Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.		24	24
Sub-Total (F)       3581       3582         SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.		54	54
SJVNL(G)       768       769         THDC (H)       197       197         THDC Koteshwar (I)       75       75         J. PTC India Ltd.		3581	3582
THDC (H)         197         197           THDC Koteshwar (I)         75         75           J. PTC India Ltd.		768	769
THDC Koteshwar (I) 75 75  J. PTC India Ltd.		197	197
J. PTC India Ltd.		75	75
	100		
		61	61
PTC(BHEP) 431 431			



Source	Submitted now by Petitioner	Approved now by JKSERC
PTC (APL)	49	49
Sub-Total (J)	541	541
K. NPCIL		
NAPS	218	218
RAPP 3&4	263	263
RAPP 5&6	172	172
TAPS 3&4	74	74
KAPS	21	21
Sub-Total (K)	748	747
JHAJJAR (L)	36	36
M. Total - Outside State sources (E+F+G+H+I+J+K+L)	10,478	10,478
N. Other (incl. ST Purchase)		
NVVN/IEX	296	0
Renewable* (201 MUs of non-solar RPO already reflected in the energy supplied by JKSPDC)	637	612
<i>UI</i> (-)/(+)	0	0
Sub-total (N)	933	612
Banking (O)	0	0
<u> </u>	0	-669
Power purchase disallowed (P)	U	-009
Gross Energy Availability (M + N +O – P)	13,842	12,881
Less: Inter-state Transmission Loss @ 3.6%	411	376
Net Energy Availability	13,431	12,505

<sup>\*1032</sup> MUs under sub-total (C) includes 201 MUs accounted towards Non-Solar RPO compliance

### **Power Purchase Cost**

# Power Purchase from JKSPDC

### **Petitioner's Submission**

5.37 For projecting power procurement cost, the Petitioner has submitted that tariff for the State owned generating stations has been escalated at 3% p.a. over FY 2014-15 approved tariff. The estimated power purchase cost from JKSPDC generating stations for FY 2015-16 has been submitted as Rs. 499.82 Cr at an average rate of Rs 2.03 per unit.

# **Commission's Analysis**

5.38 The Commission has approved the cost of power purchased from JKSPDC stations on the basis of estimates of energy quantum approved in the previous paragraphs of the Order and the approved tariff for FY 2015-16 as per the JKSPDC's Tariff Order





for FY 2015-16. The approved cost of power purchased for FY 2015-16 works out to Rs 458.72 Cr at an average rate of Rs. 1.86 per unit.

# Power Purchase from CGSs and Other sources

### **Petitioner's Submission**

- 5.39 The cost of purchase from the central generating stations for the period under review is estimated based on the following assumptions:
  - a) Fixed cost for the FY 2015-16 has been projected considering a 5% escalation over the estimated fixed cost for various stations for FY 2014-15 over the previous year.
  - b) Variable cost for each NTPC generating stations for FY 2015-16 has been projected based on the increase in the actual average variable cost per unit for the FY 2014-15 over the previous year.
  - c) Other charges (tax, incentives, etc) for the FY 2015-16 have been estimated at similar level as submitted for full year of FY 2014-15.
  - d) For nuclear plants i.e. KAPP and TAPP single part tariff increase in the actual average variable cost per unit during FY 2014-15 over the previous year have been considered for projecting the power purchase cost for the FY 2015-16.
  - e) Variable cost for each NHPC generating stations for the FY 2015-16 has been projected based on the increase in the actual average variable cost per unit during FY 2014-15 over the previous year.
  - f) Variable cost for other generating stations namely SJVNL, THDC, THDC Koteshwar, PTC (Tala), PTC (BHEP), PTC (APL) and Jhajjar for the FY 2015-16 has been projected based on the increase in the actual average variable cost per unit during the FY 2014-15 over the previous year.
- 5.40 Accordingly, the Petitioner has submitted that the cost of power purchase from CGSs and short term sources for FY 2015-16 is estimated to be Rs. 3,434.35 Cr. This cost includes supplementary charges of Rs 175.30 Cr.

# Commission's Analysis

- 5.41 For the purpose of calculation of power purchase cost from CGSs, the Commission has adopted the following methodology as per the methodology followed in the MYT Order as well as last year's Order:
  - (a) In case of NTPC stations, the Commission had approved the per unit variable cost (including FPA) for FY 2015-16 by escalating the per unit variable cost approved for FY 2014-15 by 3%. The fixed charges for NTPC stations have been based on the Annual Fixed Charges (AFC) approved by CERC in its latest Tariff Orders.



- (b) In case of NHPC stations and other hydel stations, the station wise actual charges paid by the Petitioner for FY 2014-15 have been considered for working out the charges to be paid in FY 2015-16.
- (c) In case of NPCIL stations, the Commission has estimated the variable cost per unit for FY 2015-16 by considering the actual variable cost per unit for FY 2014-15 in accordance with principles stated in the MYT order for the FY 2013-14 to FY 2015-16.
- 5.42 Accordingly, the Commission approves cost of power purchase from CGSs as Rs. 3,312.83 Cr. This includes reactive energy (RE) charges of Rs. 50.98 Cr. Since the power purchase cost for FY 2015-16 is based on estimates submitted by the Petitioner, the Commission does not find it prudent to approve any supplementary charges at this moment. The same shall be approved at the time of True-up subject to submission of actual bills/ audited information. Thus, total cost of power purchase from CGSs works out to Rs. 3,312.83 Cr.

### Cost of Renewable Energy procurement

#### **Petitioner's Submission**

5.43 The Petitioner submitted that in order to estimate the power purchase cost from the renewable sources of power, the generic levellised tariff as per JKSERC's Order on Renewable Energy Sources dated 28th February, 2015 has been adopted. The tariff for solar generating stations and hydel generating stations for FY 2015-16 has been considered as Rs. 6.06/ unit and Rs 3.96/unit respectively. Thus, the cost of power purchase from the renewable sources of power for the FY 2015-16 is estimated to be Rs 272.64 Cr.

### **Commission's Analysis**

5.44 Since, it is mandatory to procure power from Renewable Energy Sources (RES) as per the JKSERC (Renewable Power Purchase Obligation, its Compliance and REC framework Implementation) Regulations, 2011; the Commission has projected the power purchase cost from RES as per the rates summarized in following table.

Table 76: Approved power purchase cost from Renewable Energy Sources for FY 2015-16 (Rs Cr)

Description	Quantum (MU)	Rate* (Rs/KWh)	Cost (Rs Cr)
Solar sources	94	6.06	56.84
Non-solar sources	518^	3.96	205.19
Total	612		262.02

<sup>\*</sup>As per JKSERC's Order on generic levellised tariff from RES dated 28th February, 2015, the tariff for solar generating stations and hydel generating stations for FY 2015-16 is Rs. 6.06/ unit and Rs 3.96/unit respectively;





<sup>^</sup> It does not include 201 MU of RPO met through JKSPDC owned small-hydro stations.

# Inter-state Transmission Charges

#### **Petitioner's Submission**

5.45 Inter-state Transmission charges payable to PGCIL are based on the total capacity allocation in the transmission network. The Petitioner has estimated the inter-state transmission charges to be Rs 448.97 Cr.

### Commission's Analysis

5.46 The Commission provisionally approves the inter-state transmission charges as projected by the Petitioner i.e. Rs 448.97 Cr for FY 2015-16 subject to True-up based on audited accounts.

### Disallowance of Power Purchase costs

- 5.47 As stated above in Para 5.17, the Commission has disallowed additional power purchase over and above the target loss level by the licensee during the review period. The disallowed units of power purchase works out to be 669 MU for FY 2015-16.
- 5.48 The cost of power purchase of units disallowed has been considered as the approved average power purchase rate of gross power purchase from JKSPDC and CGSs which works out to Rs. 3.31 per unit for FY 2015-16. The following table summarizes the cost of power purchase disallowed by the Commission for the MYT control period.

Table 77: Disallowed power purchase cost by the Commission for FY 2015-16 (Rs Cr)

Sl. No.	Description	<b>UoM</b>	2015-16
A	Cost of power purchase from JKSPDC & CGSs (incl. inter-state transmission charges)	Rs Cr	4,482.54
В	Quantum of power purchased from JKSPDC & CGSs (Gross)	MU	13,550
C	Average rate of power purchase	Rs/KWh	3.31
D	Power purchase units disallowed by the Commission	MU	669
E	Disallowed Power purchase cost (C * D / 10)	Rs Cr	221.18

5.49 Based on above, the summary of power purchase cost proposed by the Petitioner and approved by the Commission for FY 2015-16 has been presented in following table:

Table 78: Approved power purchase cost from all sources for FY 2015-16 (Rs Cr)

Particulars	Submitted now by Petitioner	Approved now by JKSERC
Power Purchase from JKSPDC	449.82	458.72
Power Purchased from CGSs (including short term/UI)	3,434.35	3,312.83
Inter-state Transmission charges	448.97	448.97





Renewable Energy purchase	272.64	262.02
Sub-total Sub-total	4,655.78	4,482.54
Cost of power purchase disallowed	0.00	-221.18
Total Power Purchase cost	4,655.78	4,261.36

# Water Usage Charges

### **Petitioner's Submission**

- 5.50 The JKPDD has re-worked the water usage charges at Rs. 320.28 Crore for the FY 2015-16 as per the revised rates notified by the J&K State Water Resources Regulatory Authority vide its Order No. 89/JKSWRRA of 2014 dated 24th December, 2014.
- 5.51 In addition to above, the Petitioner submitted that the NHPC has also raised the bills payable during the period under review on account of water usage charges amounting to Rs. 213.17 Cr. Thus, JKPDD-D has claimed pass through of water usage charges pertaining to JKSPDC and NHPC for FY 2015-16 as Rs. 533.45 Cr.

# **Commission's Analysis**

- 5.52 The Commission has re-worked the water usage charges for FY 2015-16 as per the revised rates notified by the J&K State Water Resources Regulatory Authority vide its Order No. 89/JKSWRRA of 2014 dated 24th December, 2014 according to which the water usage charges of JKSPDC for FY 2015-16 work out to Rs 318.88 Cr.
- 5.53 The Commission also provisionally approves the water usage charges of NHPC as Rs 163.35 Cr as approved for FY 2014-15, subject to submission of actual bills at the time of True-up.
- 5.54 Thus, total water usage charges approved by the Commission during FY 2015-16 works out to Rs. 482.23 Cr.

# **Operation & Maintenance (O&M) Expenses**

#### **Petitioner's Submission**

- 5.55 The Petitioner submitted that the Operation and Maintenance (O&M) expenses comprise of employee expenses, Repair & Maintenance (R&M) expenses and Administrative & General (A&G) expenses.
- 5.56 The revised estimates of O&M expenses for FY 2015-16 as submitted by the Petitioner is summarized in the following table:

Table 79: O&M Expenses for FY 2015-16 submitted by the Petitioner (Rs. Cr)





Particulars	Approved by JKSERC in MYT Order	Submitted by Petitioner in last year's Review Petition	Approved by JKSERC in last year's Tariff Order dated 18.08.2015	Revised Estimates now
Employee Expenses	449.45	505.15	501.14	515.18
Admin & General Expenses	23.20	37.20	25.56	36.82
R&M Expenses	51.36	35.54	36.84	36.05
Total	524.02	577.89	563.54	588.05

# **Commission's Analysis**

5.57 The O&M expenses for the FY 2015-16 are approved by the Commission in accordance with Regulation 22 of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012 and methodology approved in MYT Order dated 25<sup>th</sup> April, 2013. Accordingly, the Commission has approved separate norms for each of the components of O&M expenses viz., Employee cost, R&M expense and A&G expense.

# Employee expenses

5.58 As per Regulation 22.1 of the above-mentioned regulations, employee cost for 'n' year (EMP<sub>n</sub>) during the MYT period would be determined on the basis of norm for employee cost (EMP<sub>b</sub>) escalated by average Consumer Price Index (CPI) inflation rate for immediately preceding three years and includes provisions for one-time costs such as Pay commission arrears, etc. The formula for projection of employee cost is as follows:

# $EMP_n = (EMP_b * CPI Inflation Rate) + Provisions$

Where.

 $EMP_n = Employee expense for year 'n'$ 

 $EMP_b = Employee$  expense as per norm

CPI Inflation = average increase in CPI for immediately preceding three years

*Provisions = Provisions for uncontrollable or one-time expenses* 

5.59 Accordingly, the Commission has fixed the norm for employee cost on the basis of employee cost per personnel. The actual bifurcated employee cost and number of employees for distribution business for FY 2010-11 and FY 2011-12 has been considered to determine employee cost per personnel for FY 2010-11 and FY 2011-12 which comes to Rs.2 lakh per employee and Rs.3.20 lakh per employee, respectively. An average of the two is then calculated to arrive at EMP<sub>b</sub> for the MYT period which works out to be Rs.2.60 lakh per employee. The following table summarises the computation of norm for employee cost.

**Table 80: Norm for Employee Expenses** 

Description	Units	2010-11	2011-12
Apportioned employee cost for previous years	Rs Cr	302.44	377.56
Number of employees as per Year Book for FY 2011-12	No.	15,399	11,959





Description	Units	2010-11	2011-12
Employee cost per personnel	Rs Cr/employee	0.020	0.032
EMP <sub>b</sub>	Rs Cr/employee	0.0	26

- 5.60 This EMP<sub>b</sub> is then escalated by average CPI index for previous three years worked out to be 7.14% per annum to arrive at EMP<sub>n</sub> without adjustment for provisions. This is then multiplied by number of employees during FY 2015-16 to arrive at employee cost for FY 2015-16. The number of employees for FY 2015-16 have been considered same as that for FY 2014-15. Further, the provision for 6<sup>th</sup> Pay Commission arrears is allowed as pass through during the MYT period in the ratio allocated to distribution business. Accordingly, 87% of the cost pertaining to 6<sup>th</sup> Pay Commission arrears of Rs.42.81 Cr had been allocated to distribution business for MYT period which works out to Rs.37.38 Cr.
- 5.61 Based on above, the approved employee expenses for FY 2015-16 have been summarised in following table.

Description Units Norm 2015-16  $EMP_b(A)$ Rs Cr/employee 0.026 CPI Inflation rate (B) % 7.14% Number of employees (C) No. 15,015  $EMP_n (D = A * B)$ Rs Cr/employee 0.031 Employee Expenses without provisions (E = C \* D)Rs Cr 472.84 Arrears for 6th Pay Commission 42.81 Rs Cr Allocated to Distribution (87% of total) (F) 37.38 Rs Cr

Rs Cr

510.23

Table 81: Approved employee expenses for FY 2015-16 (Rs Cr)

### A&G expenses

As per Regulation 22.3 of the above-mentioned regulations, A&G cost for 'n' year (A&G<sub>n</sub>) during the MYT period would be determined on the basis of norm for A&G cost (A&G<sub>b</sub>) escalated by average Wholesale Price Index (WPI) inflation rate for immediately preceding three years including any past arrears/ provisions being beyond the control of the Petitioner. The formula for projection of A&G cost is as follows:

### $A\&G_n = (A\&G_b * WPI Inflation Rate) + Provisions$

Employee expenses with provisions (G = E + F)

Where.

 $A\&G_n = A\&G \ costs \ for \ year \ 'n'$ 

 $A\&G_b = A\&G$  costs as per norm

WPI Inflation = average increase in WPI for immediately preceding three years

*Provisions = Provisions for uncontrollable or one-time expenses* 

5.63 Accordingly, the Commission has fixed the norm for A&G cost on the basis of A&G cost per personnel. The actual bifurcated A&G cost and number of employees for distribution business for FY 2010-11 and FY 2011-12 has been considered to



determine A&G cost per personnel for FY 2010-11 and FY 2011-12 which comes to Rs.0.12 lakh per employee and Rs.0.19 lakh per employee, respectively. An average of the two is then calculated to arrive at  $A\&G_b$  which works out to be Rs.0.16 lakh per employee. The following table summarises the computation of norm for A&G cost.

Table 82: Norm for A&G costs

Description	Units	2010-11	2011-12
Apportioned A&G cost for previous years	Rs Cr	18.53	23.03
Number of employees as per Year Book for FY 2011-12	No.	15,399	11,959
A&G cost per personnel	Rs Cr/employee	0.001	0.002
A&G <sub>b</sub>	Rs Cr/employee	yee 0.002	

- 5.64 This A&G<sub>b</sub> is then escalated by average WPI index for previous three years worked out to 5.13% per annum to arrive at A&G<sub>n</sub> without adjustment for provisions. As the JKPDD-D has claimed no adjustments for A&G, the Commission has also not considered any provisions for A&G cost.
- 5.65 Based on above, the approved A&G expenses for FY 2015-16 have been summarised in following table.

Table 83: Approved A&G Expenses for FY 2015-16 (Rs Cr)

Description	Units	Norm	2015-16
<b>A&amp;G</b> <sub>b</sub> ( <b>A</b> )	Rs Cr/employee	0.002	
WPI Inflation rate (B)	%	1.86%	
Number of employees (C)	No.		15,015
$\mathbf{A\&G_n}\left(\mathbf{D}=\mathbf{A}*\mathbf{B}\right)$	Rs Cr/ employee		0.0017
$\mathbf{A\&G\ Costs}\ (\mathbf{E} = \mathbf{C} * \mathbf{D})$	Rs Cr		24.82

### **R&M** Expenses

As per Regulation 22.2 of the above-mentioned regulations, R&M cost for 'n' is to be determined based on average proportion (i.e. K) of actual R&M costs of opening Gross fixed assets (GFA) for previous years. The formula for projection of R&M cost is as follows:

$$R&M_n = K_b * GFA_n$$

Where,

 $R\&M_n = R\&M \ Cost \ for \ year \ 'n'$ 

 $GFA_n = opening GFA for year 'n'$ 

 $K_b = Percentage point as norm$ 

5.67 The Commission has estimated the 'K' factor by considering the average of proportion of R&M costs of the opening GFA for FY 2010-11 and FY 2011-12. The actual bifurcated R&M costs for JKPDD-D have been considered at Rs.25.04 Cr and



Rs.27.78 Cr for FY 2010-11 and FY 2011-12, respectively. In case of absence of asset-wise break up of GFA and basis of segregation to transmission and distribution business, the Commission has considered the opening GFA for FY 2010-11 and FY 2011-12 as per its approval in previous Tariff Orders. Further, the approved GFA for JKPDD-D as whole is bifurcated to transmission and distribution function in the same ratio as submitted by the Petitioner i.e. 26:74 ratio, respectively. Accordingly, approved GFA for FY 2010-11 and FY 2011-12 for distribution function has been considered at Rs.1,805.71 Cr and Rs.2,161.17 Cr, respectively.

- 5.68 Based on above, proportion of R&M costs to opening GFA for FY 2010-11 and FY 2011-12 works out to 1.39% & 1.29%, respectively. Thus 'Kb' is determined as average of previous year's ratios i.e. 1.34% of opening GFA for year 'n'.
- 5.69 The determination of norm for R&M cost (i.e. K factor) has been summarised in following table.

**Description** Units 2010-11 2011-12 Apportioned R&M cost for previous years 25.04 27.78 Rs Cr Approved opening GFA as per previous Rs Cr 2,920.50 2,440.15 Tariff Orders for JKPDD as whole Proportion of GFA attributable to distribution % 74% 74% Opening GFA for JKPDD-D 2,161.17 Rs Cr 1,805.71 R&M Cost/ opening GFA 1.39% 1.29% % K<sub>b</sub> (norm) 1.34% %

Table 84: Norm for R&M Expenses

5.70 The normative 'K<sub>b</sub>' factor is then multiplied by the approved opening GFA for FY 2015-16 which is the closing GFA of FY 2014-15 as approved in this Order earlier. The approved R&M costs for the MYT period have been summarised below.

Table 85: Approved R&M Expenses for FY 2015-16 (Rs Cr)

Description	Units	Norm	2015-16
K <sub>b</sub>	%	1.34%	
Opening GFA for JKPDD-D	Rs Cr		2,757.30
Approved R&M costs	Rs Cr		36.84

5.71 The following table summarizes the O&M cost as proposed by the Petitioner and as approved by the Commission for FY 2015-16:

Table 86: Approved O&M Expenses for FY 2015-16 (Rs. Cr)

Particulars	Approved in MYT Order	Approved by JKSERC in last year's Tariff Order dated 18.08.2015	Submitted now by Petitioner	Approved now by JKSERC
Employee Expenses	449.45	501.14	515.18	510.23
Admin & General Expenses	23.20	25.56	36.82	24.82



Particulars	Approved in MYT Order	Approved by JKSERC in last year's Tariff Order dated 18.08.2015	Submitted now by Petitioner	Approved now by JKSERC
R&M Expenses	51.36	36.84	36.05	36.84
Total	524.02	563.54	588.05	571.89

# Capital expenditure and Capitalization

### **Petitioner's Submission**

5.72 The revised capital investment plan for various schemes for FY 2015-16 as submitted by the Petitioner is summarised in the following table:

Table 87: Revised capital investment for FY 2015-16 as submitted by Petitioner (Rs Cr)

Particulars	App. in MYT Order	Submitted by Petitioner in Business Plan Petition	Approved by Commission in Order on Business Plan dated 14.10.2015	Revised Estimates now
RAPDRP	771.61	750.00	750.00	750.00
DDUGJY	0.00	0.00	0.00	0.00
State Plan Schemes	108.65	80.00	80.00	80.00
REC Funded Schemes	75.00	20.00	20.00	20.00
Others	26.62	0.00	0.00	0.00
Total	981.88	850.00	850.00	850.00

5.73 The JKPDD has submitted that assets valuing Rs. 127.50 Crore are estimated to be capitalized during FY 2015-16 which also included the capitalization of the ongoing schemes of the previous years.

### Commission's Analysis

- 5.74 The Petitioner was directed by the Commission to submit certified information on capital investment for FY 2015-16 duly authenticated by the Power Development Department, GoJK. However, the Petitioner failed to provide the same.
- The Commission observes that the estimates of capital investment as well as 5.75 capitalisation as submitted by the Petitioner are in line with the figures approved by the Commission in the Order on Business Plan for 2<sup>nd</sup> MYT Control Period dated 14th October, 2015. In the absence of certified information, the Commission has provisionally approved capital expenditure as well as the capitalisation based on the scheme-wise details submitted by the Petitioner.
- 5.76 The details of approved capital investment for FY 2015-16 are provided in the table below:

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Table 88: Approved capital investment for FY 2015-16 (Rs Cr)

Particulars	App. in MYT Order	Approved by Commission in Order on Business Plan dated 14.10.2015	Revised Estimates now	Approved by the Commission
RAPDRP	771.61	750.00	750.00	750.00
DDUGJY	0.00	0.00	0.00	0.00
State Plan Schemes	108.65	80.00	80.00	80.00
REC Funded Schemes	75.00	20.00	20.00	20.00
Others	26.62	0.00	0.00	0.00
Total	981.88	850.00	850.00	850.00

Table 89: Approved capitalisation for FY 2015-16 (Rs Cr)

Particulars	App. in MYT Order	Approved by Commission in Order on Business Plan dated 14.10.2015	Revised Estimates now	Approved by the Commission
RAPDRP	532.68	112.50	112.50	112.50
DDUGJY	0.00	0.00	0.00	0.00
State Plan Schemes	75.01	0.00	0.00	0.00
REC Funded Schemes	18.38	3.00	3.00	3.00
Others	51.78	12.00	12.00	12.00
Total	677.85	127.50	127.50	127.50

# **Gross Fixed Assets (GFA)**

### **Petitioner's Submission**

5.77 The Petitioner submitted that based on the closing GFA of FY 2014-15 and the capitalisation during FY 2015-16, it has estimated the closing GFA of FY 2015-16 as summarised in the following table:

Table 90: Revised estimates of GFA for FY 2015-16 (Rs. Cr)

Particulars	App. In MYT Order	Submitted by Petitioner in Business Plan Petition	Approved by Commission in Order on Business Plan dated 14.10.2015	Revised Estimates now
Opening Balance	3,844.38	2,757.29	2,757.30	2,757.30
Addition during the year	677.85	340.00	127.50	127.50
Closing Balance	4,522.22	3,097.29	2,884.80	2,884.80





### **Commission's Analysis**

- 5.78 The closing GFA of FY 2014-15 as approved by the Commission in this Order has been considered as opening GFA for FY 2015-16.
- 5.79 Based on the approved opening GFA and the approved capitalization for FY 2015-16, the Commission approves Rs. 2,884.80 Cr as closing GFA for FY 2015-16.
- 5.80 The following table summarizes opening GFA, assets capitalized and closing GFA for FY 2015-16 as submitted by Petitioner and provisionally approved by the Commission subject to the submission of audited statements at the time of True-Up:

Particulars	App. In MYT Order	Approved by Commission in Order on Business Plan dated 14.10.2015	Revised Estimates now	Approved by Commission
Opening Balance	3,844.38	2,757.30	2,757.30	2,757.30
Addition during the year	677.85	127.50	127.50	127.50
Closing Balance	4,522.22	2,884.80	2,884.80	2,884.80

Table 91: Provisionally approved GFA for FY 2015-16 (Rs. Cr)

# **Depreciation**

### **Petitioner's Submission**

5.81 The JKPDD-D has estimated depreciation on average GFA for FY 2015-16 which is funded through REC loan only. The Petitioner has applied the average depreciation rate of 3.6% on the average GFA to estimate the depreciation for FY 2015-16 which works out to Rs. 6.11 Cr.

# Commission's Analysis

- 5.82 The Regulation 24 (b) of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012 provides that depreciation shall not be allowed on assets funded by capital subsidies, consumer contributions or grants. However, as details of segregated assets into transmission and distribution functions of the utility and the financing of GFA for distribution business have not been submitted separately, the Commission has approved the depreciation on the assets funded by loan from REC only which is in accordance with the methodology approved by the Commission in MYT Order dated 25<sup>th</sup> April, 2013.
- 5.83 With regard to rate of depreciation, the Commission has considered the average rate of depreciation of 3.6% for calculation of depreciation, considering useful asset life of 25 years and a residual value of 10% as also approved by it in MYT Order dated 25<sup>th</sup> April, 2013.





- 5.84 The Commission has calculated the depreciation on the average GFA during the year and not on the closing GFA as the additions to the GFA take place throughout the year and the average of the opening and closing GFA gives a more realistic view.
- 5.85 The depreciation cost as approved in previous MYT Order, projected now by Petitioner and provisionally approved now by the Commission subject to the submission of audited accounts at the time of True–Up for FY 2015-16 has been summarized in following table:

Table 92: Provisionally approved depreciation charges for FY 2015-16 (Rs Cr)

Particulars	App. In MYT Order	Approved by Commission in last year's Tariff Order dated 24.06.2014	Revised Estimates now	Approved now by Commission
Opening GFA	237.25	168.21	168.20	168.21
Additions to GFA	51.78	51.78	3.00	3.00
Closing GFA	289.02	219.98	171.20	171.21
Average GFA	263.13	194.09	169.70	169.71
Depreciation Rate	3.60%	3.60%	3.60%	3.60%
Total	9.47	6.99	6.11	6.11

# **Interest and Finance Charges**

#### **Interest on Loans**

### **Petitioner's Submission**

5.86 Based on the estimates of loan balance, receipts and repayments during FY 2015-16 and the interest rate of 9.39% as applied by the Commission in MYT Order, the Petitioner has estimated interest and finance charges as Rs. 16.13 Cr for FY 2015-16.

# Commission's Analysis

- 5.87 The Commission has approved the interest and finance charges on loan as per the following approach:
  - (a) The opening balance of term liabilities as on 1<sup>st</sup> April, 2015 has been considered as per the closing balance of the term liabilities on 31<sup>st</sup> March, 2015 as approved by the Commission in this Order.
  - (b) Additions in loan during the year have been considered as per approved capitalization for REC funded projects i.e. Rs. 3.00 Cr.
  - (c) Repayment of loan has been considered to be Rs 9.32 Cr as submitted by the Petitioner.





- (d) Rate of interest has been considered as 9.39% and is the same as considered in the MYT Order dated 25<sup>th</sup> April, 2013.
- 5.88 Based on the above approach, the following table summarizes the interest and finance charges approved in previous MYT Order, submitted now by Petitioner and provisionally approved now by the Commission for FY 2015-16 subject to submission of audited accounts at the time of true-up.

Table 93: Provisionally approved Interest and Finance Charges for FY 2015-16 (Rs. Cr)

Particulars	Approved in MYT Order	Approved in last year's Order	Submitted now by Petitioner	Approved now by JKSERC
Opening loan balance (REC funded projects only)	207.00	137.48	166.39	137.48
Additions during the year (REC funded projects only)	51.78	51.78	20.00	3.00
Actual Repayments during the year	12.50	9.27	9.32	9.32
Closing Loan balance	246.27	179.98	177.07	131.16
Average Loan Balance	226.63	158.73	171.73	134.32
Rate of interest (%)	9.39%	9.39%	9.39%	9.39%
Interest on Term Loans	21.28	14.91	16.13	12.61

### **Interest on Working Capital**

- 5.89 The Petitioner submitted that it has claimed normative interest on working capital for the MYT control period as per the relevant provisions of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012. The methodology considered for estimating normative working capital requirements:
  - (a) O&M expenses for 1 month;
  - (b) Maintenance spares @ 1% of opening GFA;
  - (c) Receivables for 2 months
- 5.90 The interest on working capital has been considered at normative interest rate of 14.75%. Accordingly, the Petitioner has projected interest on normative working capital for FY 2015-16 as Rs. 71.09 Cr.

### Commission's Analysis

- 5.91 The Commission has estimated the interest on normative working capital as per Regulation 26 of the JKSERC (Multi Year Tariff Distribution) Regulations, 2012. Accordingly, the normative working capital requirements for FY 2015-16 has been projected on the basis of the following methodology:
  - (a) O&M expenses for one month;
  - (b) Two months equivalent of expected revenue;





- (c) Maintenance spares @ 40% of R&M expenses for one month;
- (d) Less: Security deposits from consumers, if any.
- 5.92 Further, as per the Regulation, the rate of interest for computation of interest on normative working capital shall be considered equal to the J&K Bank Advance Rate as on date on which the Petition for determination of tariff is accepted by the Commission. Accordingly, the Commission has considered interest rate for working capital as equivalent to J&K Bank Advance rate i.e. 14.00% for computation of interest on working capital for FY 2015-16.
- 5.93 Accordingly, the interest on normative working capital as approved in the MYT Order, last year's Order, submitted now by Petitioner and approved now by the Commission for FY 2015-16 has been summarized in following table.

Approved in Approved in Approved now **Submitted now Particulars** last year's MYT Order by JKSERC by Petitioner **Order** O & M Expenses for one month 43.67 46.96 49.00 47.66 Expected Revenue for two months 351.84 430.09 431.74 446.19\* Maintenance Spares @ 40% of R&M 1.71 1.23 1.20 1.23 expenses for one month **Normative Working Capital** 397.22 478.28 481.94 495.08 Rate of Interest 15.00% 14.75% 14.75% 14.00% 59.58 70.55 71.09 69.31 **Interest on Working Capital** 

Table 94: Approved Interest on Working Capital for FY 2015-16 (in Rs. Cr.)

# **Return on Equity**

### **Petitioner's Submission**

5.94 The JKSERC MYT Regulations, 2012, has approved pre-tax rate of reasonable return of 15.5% for Distribution company. JKPDD-D does not have any normative equity as the entire capital expenditure has been funded by way of grants, except for a small portion of term debt. Further, the capital expenditure in the MYT period is expected to be totally funded by way of Grants from GoJK or GoI. Hence, the Petitioner has not claimed any return on equity for FY 2015-16.

### Commission's Analysis

5.95 The Commission accepts the submission made by the Petitioner and has not approved any return on equity for FY 2015-16.





<sup>\*</sup> Revenue for two months is higher than that submitted by Petitioner as revenue at existing tariffs based on approved number of consumers, connected load, energy sales and existing tariffs has been computed and approved as Rs. 2,677.14 Cr against revenue of Rs 2,590.43 Cr submitted by Petitioner.

### Non-tariff Income

### **Petitioner's Submission**

5.96 Non-Tariff Income consists of all those incomes from the business of retail supply of power excluding the income earned from sale of power. Non-Tariff income includes income from delayed payment charges (surcharge), rentals for meters and other equipments, miscellaneous charges from consumers (comprising of services rendered to consumers like reconnection/ disconnection, fuse off calls, etc.). The Petitioner has computed non-tariff income for FY 2015-16 by escalating non-tariff income for FY 2014-15 by 5% which works out to be Rs 15.53 Cr.

# Commission's Analysis

5.97 The Commission accepts the submission made by the Petitioner and provisionally approves non-tariff income for FY 2015-16 at Rs. 15.53 Cr. However, this is subject to True-Up based on audited accounts for the year.

# **Intra-state transmission charges**

### **Petitioner's Submission**

5.98 The intra-state transmission charges for FY 2015-16 have been considered as per the ARR for the transmission business of JKPDD for FY 2015-16 as submitted by the Petitioner in the APR petition of its transmission business for FY 2015-16 i.e. Rs 161.88 Cr.

# Commission's Analysis

5.99 The Commission has considered the intra-state transmission charges as per the ARR approved in the APR Order for FY 2015-16 for JKPDD-Transmission business dated 31<sup>st</sup> March, 2016. Accordingly, the intra-state transmission charges for FY 2015-16 have been approved as Rs. 95.64 Cr.

# Sharing of aggregate gains/losses

### **Petitioner's Submission**

5.100 The Petitioner in its APR Petition for FY 2015-16 has not made any claim for sharing of aggregate gains/ losses on account of AT&C losses being controllable in nature as per the JKSERC (Multi Year Distribution Tariff) Regulations, 2012.

# **Commission's Analysis**

5.101 The Regulation 11.2 of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012, provides for sharing of gains/ losses on account of controllable factors of Aggregate AT&C loses as follows:







- "11.2 The approved aggregate loss to the Distribution Licensee on account of controllable factor of aggregate technical and commercial (AT&C) losses shall be dealt with in the following manner:
- (a) One-third of the amount of such loss may be passed on as an additional charge in tariff over such period as may be stipulated in the Order of the Commission; and
- (b) The balance amount of loss shall be absorbed by the Distribution Licensee."
- 5.102 However, Regulation 8.2, as amended as per Commission's Order dated 2<sup>nd</sup> July, 2013, states that any truing up of expenses shall be done on basis of audited accounts only. The relevant Regulation has been reproduced as follows:
  - "Provided that truing up of expenses for any year shall be carried out on the basis of the audited annual accounts for the year subject to prudence check by the Commission."
- 5.103 Thus, in absence of established/ authenticated baseline data and audited accounts for the year, it is not in the fitness of things to estimate sharing of gains and losses on basis of provisional accounts as part of review exercise. Thus, the Commission has not considered any sharing of gains/ losses on account of controllable factors and same will be considered at the time of True-Up based on audited accounts for the year.

# Aggregate Revenue Requirement (ARR) for FY 2015-16

5.104 Based on the various components as discussed above, the summary of ARR for the FY 2015-16 as submitted by the Petitioner and as approved by the Commission has been summarized in the following table

Table 95: Summary of ARR for FY 2015-16 (Cr)

Aggregate Revenue Requirement	App. In MYT Order	Sub. by Petitioner in last year's review Petition	Approved by Commission in last year's Tariff Order dated 18.08.2015	Revised Estimates now	Approved now by Commission
Costs					
Power Purchase Cost	3,610.94	4,442.17	4,373.30	4,655.78	4,261.36
Water usage charges (JKSPDC+NHPC).	305.65	518.82	518.82	533.45	482.23
Intra-state transmission Charges	148.18	96.48	96.48	161.88	95.64
Operation and Maintenance Cost	524.02	577.89	563.54	588.05	571.89
Interest Cost	21.28	15.70	14.91	16.13	12.61
Depreciation	9.47	6.49	6.99	6.11	6.11
Interest on Working Capital	59.58	68.25	70.55	71.09	69.31





Aggregate Revenue Requirement	App. In MYT Order	Sub. by Petitioner in last year's review Petition	Approved by Commission in last year's Tariff Order dated 18.08.2015	Revised Estimates now	Approved now by Commission
<b>Total Costs</b>	4,679.13	5,725.80	5,644.58	6,032.48	5,499.15
Add: Return on Equity	0.00	0.00	0.00	0.00	0.00
Less: Non-Tariff Income	15.54	15.53	15.53	15.53	15.53
Aggregate Revenue Requirement	4,663.59	5,710.27	5,629.05	6,016.95	5,483.62

# **Revenue from Sale of Power at Existing Tariffs**

### **Petitioner's Submission**

5.105 Based on the energy sales, number of consumers and connected load based for the period under review and the category-wise approved tariffs as per the Order for FY 2015-16 dated 18<sup>th</sup> August, 2015, the revenue assessed at the existing tariff by the Petitioner for FY 2015-16 works out to Rs. 2,590.43 Cr.

### Commission's Analysis

- 5.106 The Commission has computed the revenue from sale of power at existing tariffs for FY 2015-16 based on the approved number of consumers, connected load, energy sales as per this Order and existing tariffs as per the Order dated 18<sup>th</sup> August, 2015.
- 5.107 Accordingly, the Commission has now determined the revenue realization for FY 2015-16 as Rs. 2,677.14 Cr instead of Rs 2,590.43 Cr as submitted by the Petitioner as summarized in the following table:

Table 96: Revenue from sale of power at existing tariffs for FY 2015-16 (Rs Cr)

Particulars	Submitted now by Petitioner	Approved now by JKSERC
Domestic	857.23	847.95
Non-Domestic/Commercial	302.11	302.11
Agriculture	86.82	96.80
State/ Central Govt. Department	516.15	516.15
Public Street Lighting	20.69	20.69
LT Industrial Supply	129.25	128.79
HT Industrial Supply	302.77	356.20
HT-PIU Industrial Supply	42.97	50.56
LT Public Water Works	188.22	188.22
HT Public Water Works	61.70	72.58
General Purpose Bulk	82.52	97.08
Total	2,590.43	2,677.14



# Revenue Gap

### **Petitioner's Submission**

5.108 Based on the revised estimates of ARR for FY 2015-16 i.e. Rs. 6,016.95 Cr and assessed revenue realization for FY 2015-16 i.e. Rs 2,590.43 Cr, the Petitioner has estimated revenue gap at existing tariffs for FY 2015-16 to be Rs. 3,426.51 Cr.

# Commission's Analysis

5.109 Based on the approved ARR as well as approved revenue assessed for FY 2015-16, the Commission has provisionally determined revenue gap for FY 2015-16 as summarized in the following table:

Sl. No.	Particulars	Approved in MYT Order	Approved in last year's Order	Submitted now by Petitioner	Approved now by JKSERC
1	Aggregate Revenue Requirement	4,663.59	5,629.05	6,016.95	5,483.62
2	Revenue Assessed	2,111.04	2,580.56	2,590.43	2,677.14
3	Revenue Gap	(2,552.55)	(3,048.49)	(3,426.51)	(2,806.48)

Table 97: Approved revenue gap at existing tariffs for FY 2015-16 (Rs Cr)

- 5.110 Further, as per the approach adopted by the Commission for cost coverage in its previous Tariff Orders, the Commission has determined Average Cost of Supply at Approved Loss Level (ACOS<sub>AL</sub>) to measure approved cost of supply keeping in mind approved losses, Average Cost of Supply at Zero Loss level (ACOS<sub>ZL</sub>) to determine tariffs to recover atleast power purchase and other distribution costs without booking huge losses simply to avoid tariff shock to consumers and Average Cost of Supply at Prudent Loss level (ACOS<sub>PL</sub>) to determine gradual movement towards recovery of average cost of supply at targeted/prudent loss levels.
- 5.111 For computation of average cost of supply at different loss levels, the Commission considered the following:
  - (a) Average Cost of Supply at Approved Loss (ACOS<sub>AL</sub>): The Commission has calculated the ACOS<sub>AL</sub> by dividing the overall ARR of the utility by the approved energy sales quantum (units) for the corresponding financial year.
  - (b) Average Cost of Supply at Zero Loss (ACOS<sub>ZL</sub>): The Commission has calculated the ACOS<sub>ZL</sub> by dividing the overall ARR of the utility by the quantum (units) of power purchased for the corresponding financial year.
  - (c) Average Cost of Supply at Prudent Loss (ACOS<sub>PL</sub>): The Commission has calculated the ACOS<sub>PL</sub> by dividing the overall ARR of the utility by the quantum (units) of energy that would have been billed corresponding to the prudent level of T&D losses.



- (d) **Prudent level of T&D losses:** The Commission has considered T&D losses of 23.65% as the prudent level of T&D losses (the average T&D loss at the national level as per the Central Electricity Authority). The Commission feels that fixing the prudent T&D loss level at 15% (in line with the Abraham Committee Report targets) will be unrealistic as the current T&D loss in the state is above 50%. Moreover, only a few states in the country have actually been able to achieve this target level of 15% loss. As such, the Commission has decided to consider an average value of T&D loss across all states in the country as the prudent level.
- 5.112 It is also pertinent to mention here, that even though the Commission determines ACOS<sub>PL</sub> i.e. average cost of supply at prudent loss levels, it is a benchmark figure aimed to move tariffs in direction of cost recovery; however same has to be matched by performance and efficiency improvement by the JKPDD-D.
- 5.113 The following table summarizes ACOS<sub>AL</sub>, ACOS<sub>ZL</sub> and ACOS<sub>PL</sub> as approved by the Commission in the MYT Order, approved in the last year's Order, proposed now by the Petitioner and approved now by the Commission for FY 2015-16:

**Submitted** Approved in Approved Sl. Approved in **Particulars Derivation** last year's now by now by No. **MYT Order JKSERC** Order Petitioner 7,220 Energy Sales (MU) 6,526 7,220 7,220 A T&D Losses (%) В 42.26% 42.26% 46.24% 42.26%  $\mathbf{C}$ Power Purchase Quantum (MU) 11,303 12,505 13,431 12,505 Aggregate Revenue Requirement (Rs Cr) 4,663.59 6,016.95 D 5,629.05 5,534.51 COS as actual / approved losses (CoS<sub>AL</sub>) [E = D/A\* $\mathbf{E}$ 7.15 7.80 8.33 7.59 (Rs/kWh) 10]  $F = D / C^*$  $\mathbf{F}$ CoS at Zero Losses (CoSzL) (Rs/kWh) 4.13 4.50 4.48 4.39

5.40

3.23

5.90

3.57

3.59

5.74

3.71

Table 98: Approved average COS for FY 2015-16 (Rs/KWh)

Note 1: The prudent loss level for FY 2015-16 is considered as 23.65% (as per monthly statistics by CEA, www.cea.nic.in)

10]

 $G = D/C^*$ 

(1-H)) \*10]



CoS at Prudent Losses (CoS<sub>PL</sub>)

Approved average realization rate

 $\mathbf{G}$ 

Η

(Rs/kWh)



# CHAPTER 6: ARR FOR 2<sup>ND</sup> MYT CONTROL PERIOD FROM FY 2016-17 TO FY 2020-21

# **Metering Plan**

6.1 The Commission had approved the metering plan for the 2<sup>nd</sup> MYT Control Period in its Order on Business Plan for the 2<sup>nd</sup> MYT Control Period FY 2016-17 to FY 2020-21 dated 14<sup>th</sup> October, 2015. The same is reproduced in the following section:

### **Petitioners Submission**

6.2 JKPDD-D plans to meter all the unmetered connections in various customer categories by FY 2018-19. The metering plan for the period FY 2015-16 to FY 2018-19 is given in the table below:

No. of No. of Total No. of No. of Total No. of No. of No. of Unrequirement meters to meters to meters to meters to Installation Metered metered be be of energy Category be installed be installed installed s Ending Installation installed Installation meters for during during March 15 during during 100% FY 18 FY 19 FY 16 **FY 17** metering\* Domestic 1.390.856 711,503 679,353 181.129 222,867 306,001 308,560 1.018.557 Other 234,566 133,363 101,203 21,246 29,670 38,708 39,542 129,166 Categories 1,625,422 844,866 780,556 202,374 252,537 344,709 348,103 1,147,723

Table 99: Proposed metering plan

# **Commissions Analysis**

6.3 The J&K Electricity Act 2010 mandated supply of electricity to all consumers through correct meters only and that the power supply was not legally possible to unmetered consumers beyond April, 2012. The relevant provision of the J&K Electricity Act 2010 has been reproduced below:

"49. Use, etc., of meters.—(1) No licensee shall supply electricity, after the expiry of two years from the commencement of the Act, except through installation of a correct meter in accordance with the regulations to be made in this behalf by the Commission:

....

Provided further that the Commission may, by notification, extend the said period of two years for a class or classes of persons or for such area as may be specified in that notification."

6.4 However, JKPDD-D through its Petition dated 25th April 2012, citing its inability in accomplishing installation of 100% correct meters at all levels and to all persons by 28th April 2012 [being the cut-off date as per Section 49 (1) of the J&K





<sup>\*</sup>Includes 367167 no. of meters to be installed for the new installations

Electricity Act 2010], requested the Commission to extend the period. The Commission vide its Order dated 26th April 2012 and in exercise of the powers vested in it under the second proviso to Section 49 (1) of the Act extended the period for supply of electricity, beyond the expiry of two years from the commencement of the Act for installation of correct meters upto 30th June, 2013. The Petitioner once again failed to meet the above deadline citing various challenges and constraints on the ground level.

- 6.5 The Commission, while approving the Business Plan of the Petitioner for the first MYT Control Period directed the Petitioner to develop a comprehensive metering plan for achieving 100 % metering in the State by the end of first MYT control period i.e. FY 2015-16. On failure of the Petitioner to provide any details in this behalf, the Commission initiated Suo-moto proceedings for obtaining revised metering plan from the Petitioner. Accordingly, the Commission vide its Order dated 21st April 2014 adopted the revised metering plan finally submitted by the Petitioner for achieving 100% metering by end of FY 2015-16.
- 6.6 The Commission, observing extremely slow progress on the revised timelines set for achieving 100% metering by end of FY 2015-16, had repeatedly issued various directives to the Petitioner in the previous Tariff Orders to adhere to the revised timeline set for the purpose to which the Petitioner time and again submitted that it was making all out efforts to achieve the desired efforts, even though the ground reality indicated a different picture.
- 6.7 Also, the Petitioner continued to supply varying data to the Commission related to projected metering plan. The data submitted was highly inconsistent and could not be considered on record. The following table provides an abstract of the metering plans submitted before the Commission from time to time by JKPDD-D for completion of 100% metering by the end of FY 2015-16.

Table 100: Summary of the Metering Plans and Timelines Proposed by Petitioner in the past

Sl. No.	Time of Submission	Consumer Metering Proposed (No's)			
SI. NO.		FY 2013-14	FY 2014-15	FY 2015-16	Total
	25.04.2012 (Request for extension in deadlines for 100% metering prescribed in Section 49 (1) of Act)	3,15,570			
1		(Ending March, 2013)			7,85,961
1		4,70,391	_	_	7,83,901
		(Ending June, 2013)			
2	30.11.2012 (In MYT Petition 2013-14)	2,30,274	3,74,859	5,58,723	11,63,856
3	20.11.2013 (In response to Commission's Order in Suo- moto proceedings)	4,13,572	2,95,866	3,87,935	10,97,373
4	17.02.2014 (In response to Commission's Order in Suo- moto proceedings)	2,56,209	5,07,380	3,39,877	11,03,466
5	17.02.2014 (PDD, APR & Tariff Petition)	1,10,089	3,58,270	6,10,766	10,79,125





Sl. No.	Time of Cubmission	Consumer Metering Proposed (No's)					
SI. INO.	Time of Submission	FY 2013-14	FY 2014-15	FY 2015-16	Total		
6	25.02.2014 (In response to Commission's Order in Suo- moto proceedings)	1,09,789	3,26,962	7,69,643	12,06,394		
7	28.02.2014 (Final APR petition for FY 2013-14)	1,09,789	3,69,203	6,12,239	10,91,231		
8	08.05.2015 (Final APR petition for FY 2014-15)	-	33,635	10,39,872	10,73,507		

- 6.8 The Petitioner has once again failed to meet the timelines and has yet again submitted a revised metering plan wherein it plans to meter all unmetered consumers in various categories by end of FY 2018-19 as summarized in Table 99 of this Order. Moreover, the Petitioner in its proposed metering plan has not considered the provisions as laid down in Section 49 (1) of the Act and the directives issued by the Commission in this context which states that no new connections can be released except through installation of a correct meter by the Petitioner.
- 6.9 The Commission takes strong objection to the fact that the Petitioner has time and again failed to meet the deadlines set for achieving 100% metering in the State and has consistently failed to comply to the numerous directives and Orders of the Commission in the past. The failure to meter all consumers even after extension of deadline for 100% metering coupled with the fact that there have been huge variations in the submission of the Utility from time to time shows lack of seriousness on the part of the Petitioner.
- 6.10 In the Tariff Order for FY 2015-16 dated 18th August 2015, the Commission had directed:

"As there has been serious deviation from the mandate given by the State Legislature under Section 49(1) of the Act 2010 for completion of metering within a period of 2 years from the date of notification of the J&K Electricity Act, 2010, the JKPDD-D needs to place the facts before the State Legislature for ratification of the extended dead line for achieving 100% metering in the State"

- 6.11 Accordingly, the Commission vide its letter no. JKSERC/Secy/27/2015/607-08 dated 8th September 2015 enquired from the Petitioner on the status of compliance with the above directive of the Commission. In response, the Petitioner submitted that it is yet to approach the GoJK for placing the facts before the State Legislature for ratification of the extended dead line.
- 6.12 In view of the stipulation under Sec 49 of the Act which debars the licensee to supply electricity to consumers except through installation of correct meter after expiry of 2 years from the commencement of the Act, the Commission again directs the Petitioner to place the facts before the State Legislature for seeking approval of the revised dead line in the State. The Commission also direct the licensee to immediately comply with the earlier directives of the Commission that no new connection shall be allowed without installation of proper meters.



6.13 In view of above and for the purposes of approval of sales and demand forecast for the 2nd MYT Control Period, the Commission provisionally takes note of the submission made by the Petitioner for metering of the un-metered consumers subject to compliance with the above directions by the Petitioner. It shall be the responsibility of the licensee to seek necessary approval of the State Legislature on the proposed extended timelines for achieving 100% metering as early as possible.

# **Sales Projections**

## **Petitioners Submission**

6.14 The projections of category wise number of consumers, connected load and energy sales have been made in line with those approved by the Commission in the Order on Business Plan for the 2<sup>nd</sup> MYT Control Period dated 14<sup>th</sup> October, 2015.

Table 101: Projected consumers growth during Control Period FY 2016-17 to FY 2020-21

Consumer Categories	FY 2016-17 Projected	FY 2017-18 Projected	FY 2018-19 Projected	FY 2019-20 Projected	FY 2020-21 Projected
Domestic	1,599,538	1,663,519	1,730,060	1,799,262	1,871,233
Metered	1,115,499	1,421,500	1,730,060	1,799,262	1,871,233
Unmetered	484,039	242,020	0	0	0
N.Dom/Com	209,567	222,141	235,470	249,598	264,574
Metered	164,881	199,798	235,470	249,598	264,574
Unmetered	44,687	22,343	0	0	0
Ir <b>ri/Agr</b>	21,267	22,436	23,670	24,972	26,346
Metered	16,832	20,219	23,670	24,972	26,346
Unmetered	4,435	2,217	0	0	0
St/Central	12,226	13,204	14,260	15,401	16,633
Metered	12,226	13,204	14,260	15,401	16,633
Unmetered	0	0	0	0	0
Pub. Light.	287	304	323	342	363
Metered	199	260	323	342	363
Unmetered	88	44	0	0	0
LT Industry	22,188	23,519	24,930	26,426	28,012
Metered	22,188	23,519	24,930	26,426	28,012
Unmetered	0	0	0	0	0
HT Industry	848	916	989	1,068	1,153
Metered	848	916	989	1,068	1,153
Unmetered	0	0	0	0	0
HT. P. Inten	13	13	13	13	13
Metered	13	13	13	13	13
Unmetered	0	0	0	0	0
LT. Pub. WW	2,665	2,859	3,066	3,290	3,529



Consumer Categories	FY 2016-17 Projected	FY 2017-18 Projected	FY 2018-19 Projected	FY 2019-20 Projected	FY 2020-21 Projected
Metered	2,367	2,710	3,066	3,290	3,529
Unmetered	298	149	0	0	0
HT. Pub. WW	278	292	307	322	338
Metered	278	292	307	322	338
Unmetered	0	0	0	0	0
Gen. Bulk	174	191	210	231	254
Metered	174	191	210	231	254
Unmetered	0	0	0	0	0
Temporary/Mis c.	0	0	0	0	0
Total	1,869,051	1,949,394	2,033,298	2,120,925	2,212,448

Table 102: Projected Load (MW) growth during Control Period (FY 2016-17 to FY 2020-21)

Consumer Categories	FY 2016-17 Projected	FY 2017-18 Projected	FY 2018-19 Projected	FY 2019-20 Projected	FY 2020-21 Projected
Domestic	1,777.57	1,997.99	2,245.74	2,524.21	2,837.21
Metered	1,476.18	1,847.29	2,245.74	2,524.21	2,837.21
Unmetered	301.39	150.69	0.00	0.00	0.00
N.Dom./Com	395.44	444.47	499.59	561.53	631.16
Metered	359.10	426.30	499.59	561.53	631.16
Unmetered	36.34	18.17	0.00	0.00	0.00
Irri/Agr	147.93	156.07	164.65	173.71	183.26
Metered	128.76	146.48	164.65	173.71	183.26
Unmetered	19.17	9.59	0.00	0.00	0.00
St/Central	283.49	317.51	355.62	398.29	446.08
Metered	283.49	317.51	355.62	398.29	446.08
Unmetered	0.00	0.00	0.00	0.00	0.00
Pub. Light.	13.27	14.07	14.91	15.80	16.75
Metered	10.26	12.56	14.91	15.80	16.75
Unmetered	3.01	1.50	0.00	0.00	0.00
LT Industry	312.85	350.39	392.44	439.53	492.27
Metered	312.85	350.39	392.44	439.53	492.27
Unmetered	0.00	0.00	0.00	0.00	0.00
HT Industry	404.08	452.57	506.88	567.70	635.83
Metered	404.08	452.57	506.88	567.70	635.83
Unmetered	0.00	0.00	0.00	0.00	0.00
HT. P. Inten	33.37	33.37	33.37	33.37	33.37
Metered	33.37	33.37	33.37	33.37	33.37
Unmetered	0.00	0.00	0.00	0.00	0.00
LT. Pub. WW	106.91	114.68	123.03	131.98	141.58
Metered	93.44	107.95	123.03	131.98	141.58



Consumer Categories	FY 2016-17 Projected	FY 2017-18 Projected	FY 2018-19 Projected	FY 2019-20 Projected	FY 2020-21 Projected
Unmetered	13.47	6.73	0.00	0.00	0.00
HT. Pub. WW	27.51	28.88	30.33	31.84	33.44
Metered	27.51	28.88	30.33	31.84	33.44
Unmetered	0.00	0.00	0.00	0.00	0.00
Gen. Bulk	74.55	82.00	90.20	99.22	109.15
Metered	74.55	82.00	90.20	99.22	109.15
Unmetered	0.00	0.00	0.00	0.00	0.00
Temporary/Misc	0.00	0.00	0.00	0.00	0.00
Total	3,576.96	3,992.01	4,456.74	4,977.19	5,560.10

Table 103: Projected Sales (MU) for the Control Period (FY 2016-17 to FY 2020-21)

Consumer Categories	FY 2016-17 Projected	FY 2017-18 Projected	FY 2018-19 Projected	FY 2019-20 Projected	FY 2020-21 Projected
Domestic	3,375.60	3,863.02	4,479.67	5,017.23	5,619.29
Metered	2,843.01	3,596.73	4,479.67	5,017.23	5,619.29
Unmetered	532.58	266.29	0.00	0.00	0.00
N.Dom./Com	976.59	1,042.80	1,124.21	1,222.16	1,328.64
Metered	759.83	934.41	1,124.21	1,222.16	1,328.64
Unmetered	216.77	108.38	0.00	0.00	0.00
Ir <b>ri./Agri.</b>	356.33	434.60	538.53	674.60	845.06
Metered	309.77	411.32	538.53	674.60	845.06
Unmetered	46.56	23.28	0.00	0.00	0.00
St/Central	846.16	889.62	935.32	983.36	1,033.88
Metered	846.16	889.62	935.32	983.36	1,033.88
Unmetered	0	0	0	0	0
Pub. Light.	57.53	66.82	80.47	99.39	122.76
Metered	39.53	58.02	80.47	99.39	122.76
Unmetered	18.00	8.80	0.00	0.00	0.00
LT Industry	399.96	422.85	447.05	472.64	499.69
Metered	399.96	422.85	447.05	472.64	499.69
Unmetered	0.00	0.00	0.00	0.00	0.00
HT Industry	1,048.64	1,195.62	1,363.21	1,554.28	1,772.14
Metered	1,048.64	1,195.62	1,363.21	1,554.28	1,772.14
Unmetered	0	0	0	0	0
HT. PIU	115.03	120.78	126.82	133.16	139.81
Metered	115.03	120.78	126.82	133.16	139.81
Unmetered	0	0	0	0	0
LT. Pub. WW	446.59	457.27	470.32	485.81	501.81
Metered	324.16	396.05	470.32	485.81	501.81
Unmetered	122.43	61.21	0.00	0.00	0.00
HT. Pub. WW	145.62	152.90	160.54	168.57	177.00
Metered	145.62	152.90	160.54	168.57	177.00
Unmetered	0	0	0	0	0
Gen. Bulk	187.39	198.63	210.55	223.18	236.57
Metered	187.39	198.63	210.55	223.18	236.57
Unmetered	0	0	0	0	0
Temporary/Misc.	0	0	0	0	0



Consumer	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Categories	Projected	Projected	Projected	Projected	Projected
Total	7,955.42	8,844.91	9,936.67	11,034.38	12,276.67

## **Commissions Analysis**

6.15 The Commission had approved the projections of number of consumers, connected load and energy sales in its Order on Business Plan for 2<sup>nd</sup> MYT Control Period dated 14<sup>th</sup> October, 2015. The Commission observes that the projections submitted by the Petitioner are in line with the figures approved in the Order on Business Plan. Thus, the Commission approves the projections for number of consumers, connected load and energy sales as submitted by the Petitioner.

Table 104: Approved consumers growth during Control Period FY 2016-17 to FY 2020-21

Consumer Categories	FY 2016-17 Projected	FY 2017-18 Projected	FY 2018-19 Projected	FY 2019-20 Projected	FY 2020-21 Projected
Domestic	1,599,538	1,663,519	1,730,060	1,799,262	1,871,233
Metered	1,115,499	1,421,500	1,730,060	1,799,262	1,871,233
Unmetered	484,039	242,020	0	0	0
N.Dom/Com	209,567	222,141	235,470	249,598	264,574
Metered	164,881	199,798	235,470	249,598	264,574
Unmetered	44,687	22,343	0	0	0
Irri./Agri.	21,267	22,436	23,670	24,972	26,346
Metered	16,832	20,219	23,670	24,972	26,346
Unmetered	4,435	2,217	0	0	0
St/Central	12,226	13,204	14,260	15,401	16,633
Metered	12,226	13,204	14,260	15,401	16,633
Unmetered	0	0	0	0	0
Pub. Light.	287	304	323	342	363
Metered	199	260	323	342	363
Unmetered	88	44	0	0	0
LT Industry	22,188	23,519	24,930	26,426	28,012
Metered	22,188	23,519	24,930	26,426	28,012
Unmetered	0	0	0	0	0
HT Industry	848	916	989	1,068	1,153
Metered	848	916	989	1,068	1,153
Unmetered	0	0	0	0	0
HT. P. Inten	13	13	13	13	13
Metered	13	13	13	13	13
Unmetered	0	0	0	0	0
LT. Pub. WW	2,665	2,859	3,066	3,290	3,529
Metered	2,367	2,710	3,066	3,290	3,529
Unmetered	298	149	0	0	0





Consumer Categories	FY 2016-17 Projected	FY 2017-18 Projected	FY 2018-19 Projected	FY 2019-20 Projected	FY 2020-21 Projected
HT. Pub. WW	278	292	307	322	338
Metered	278	292	307	322	338
Unmetered	0	0	0	0	0
Gen. Bulk	174	191	210	231	254
Metered	174	191	210	231	254
Unmetered	0	0	0	0	0
Temporary/Mis c.	0	0	0	0	0
Total	1,869,051	1,949,394	2,033,298	2,120,925	2,212,448

Table 105: Approved Load (MW) growth during Control Period (FY 2016-17 to FY 2020-21)

Consumer	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Categories	Projected	Projected	Projected	Projected	Projected
Domestic	1,777.57	1,997.99	2,245.74	2,524.21	2,837.21
Metered	1,476.18	1,847.29	2,245.74	2,524.21	2,837.21
Unmetered	301.39	150.69	0.00	0.00	0.00
N.Dom./Com	395.44	444.47	499.59	561.53	631.16
Metered	359.10	426.30	499.59	561.53	631.16
Unmetered	36.34	18.17	0.00	0.00	0.00
Irri/Agr	147.93	156.07	164.65	173.71	183.26
Metered	128.76	146.48	164.65	173.71	183.26
Unmetered	19.17	9.59	0.00	0.00	0.00
St/Central	283.49	317.51	355.62	398.29	446.08
Metered	283.49	317.51	355.62	398.29	446.08
Unmetered	0.00	0.00	0.00	0.00	0.00
Pub. Light.	13.27	14.07	14.91	15.80	16.75
Metered	10.26	12.56	14.91	15.80	16.75
Unmetered	3.01	1.50	0.00	0.00	0.00
LT Industry	312.85	350.39	392.44	439.53	492.27
Metered	312.85	350.39	392.44	439.53	492.27
Unmetered	0.00	0.00	0.00	0.00	0.00
HT Industry	404.08	452.57	506.88	567.70	635.83
Metered	404.08	452.57	506.88	567.70	635.83
Unmetered	0.00	0.00	0.00	0.00	0.00
HT. P. Inten	33.37	33.37	33.37	33.37	33.37
Metered	33.37	33.37	33.37	33.37	33.37
Unmetered	0.00	0.00	0.00	0.00	0.00
LT. Pub. WW	106.91	114.68	123.03	131.98	141.58
Metered	93.44	107.95	123.03	131.98	141.58
Unmetered	13.47	6.73	0.00	0.00	0.00
HT. Pub. WW	27.51	28.88	30.33	31.84	33.44

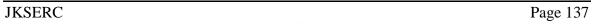




Consumer Categories	FY 2016-17 Projected	FY 2017-18 Projected	FY 2018-19 Projected	FY 2019-20 Projected	FY 2020-21 Projected
Metered	27.51	28.88	30.33	31.84	33.44
Unmetered	0.00	0.00	0.00	0.00	0.00
Gen. Bulk	74.55	82.00	90.20	99.22	109.15
Metered	74.55	82.00	90.20	99.22	109.15
Unmetered	0.00	0.00	0.00	0.00	0.00
Temporary/Misc	0.00	0.00	0.00	0.00	0.00
Total	3,576.96	3,992.01	4,456.74	4,977.19	5,560.10

Table 106: Approved Sales (MU) for the Control Period (FY 2016-17 to FY 2020-21)

Consumer Categories	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Categories	Projected	Projected	Projected	Projected	Projected
Domestic	3,375.60	3,863.02	4,479.67	5,017.23	5,619.29
Metered	2,843.01	3,596.73	4,479.67	5,017.23	5,619.29
Unmetered	532.58	266.29	0.00	0.00	0.00
N.Dom./Com	976.59	1,042.80	1,124.21	1,222.16	1,328.64
Metered	759.83	934.41	1,124.21	1,222.16	1,328.64
Unmetered	216.77	108.38	0.00	0.00	0.00
Ir <b>ri./Agri.</b>	356.33	434.60	538.53	674.60	845.06
Metered	309.77	411.32	538.53	674.60	845.06
Unmetered	46.56	23.28	0.00	0.00	0.00
St/Central	846.16	889.62	935.32	983.36	1,033.88
Metered	846.16	889.62	935.32	983.36	1,033.88
Unmetered	0	0	0	0	0
Pub. Light.	57.53	66.82	80.47	99.39	122.76
Metered	39.53	58.02	80.47	99.39	122.76
Unmetered	18.00	8.80	0.00	0.00	0.00
LT Industry	399.96	422.85	447.05	472.64	499.69
Metered	399.96	422.85	447.05	472.64	499.69
Unmetered	0.00	0.00	0.00	0.00	0.00
HT Industry	1,048.64	1,195.62	1,363.21	1,554.28	1,772.14
Metered	1,048.64	1,195.62	1,363.21	1,554.28	1,772.14
Unmetered	0	0	0	0	0
HT. PIU	115.03	120.78	126.82	133.16	139.81
Metered	115.03	120.78	126.82	133.16	139.81
Unmetered	0	0	0	0	0
LT. Pub. WW	446.59	457.27	470.32	485.81	501.81
Metered	324.16	396.05	470.32	485.81	501.81
Unmetered	122.43	61.21	0.00	0.00	0.00
HT. Pub. WW	145.62	152.90	160.54	168.57	177.00
Metered	145.62	152.90	160.54	168.57	177.00
Unmetered	0	0	0	0	0
Gen. Bulk	187.39	198.63	210.55	223.18	236.57
Metered	187.39	198.63	210.55	223.18	236.57
Unmetered	0	0	0	0	0
Temporary/Misc.	0	0	0	0	0
Total	7,955.42	8,844.91	9,936.67	11,034.38	12,276.67





## **Losses and Energy Requirement**

#### **Petitioners Submission**

- 6.16 The Petitioner submitted that the distribution loss levels in J&K have remained historically high due to various socio-economic and geographical reasons. With its continued efforts the JKPDD has reduced the distribution losses from 58.34% in FY 2010-11 to 49.02% in FY 2014-15. JKPDD-D further submitted that it is making all efforts to reduce distribution losses in the State.
- 6.17 Considering the capital investment being proposed and other measures being carried out to reduce distribution losses, distribution loss trajectory as proposed by the Petitioner has been summarized in following tables:

Table 107: Proposed distribution loss trajectory for the MYT Control Period (in %)

Description	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
	Projected	Projected	Projected	Projected	Projected
Distribution Losses	40.0%	36.0%	32.0%	28%	24%

#### **Commissions Analysis**

6.18 The Commission had approved the distribution loss trajectory for the Control Period in its Order on Business Plan for 2<sup>nd</sup> MYT Control Period dated 14<sup>th</sup> October, 2015. The approved loss trajectory is reproduced in the following table:

Table 108: Distribution loss trajectory approved by the Commission in the Business Plan for 2<sup>nd</sup> MYT Control Period (in %)

Decemention			MYT Period		
Description	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Distribution Loss	36.00%	32.50%	29.50%	26.75%	24.00%

6.19 However, the Commission notes that the GoJK/ Utility has entered into a Memorandum of Understanding with the Ministry of Power, Government of India under the UDAY (Ujjwal Discom Assurance Yojna) scheme for operational and financial turnaround of the utility. Under the scheme, the Utility has committed to bring down the AT&C loss levels in the State to 15% by the end of FY 2019-20 as per the following trajectory:

Table 109: AT&C loss trajectory agreed by the Utility in the UDAY scheme (in %)

Particular	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20
AT&C loss	46.00%	35.00%	25.00%	15.00%

6.20 Accordingly, the revised AT&C loss trajectory adopted by the Commission for the 2<sup>nd</sup> MYT Control Period is as indicated in the following table:





Table 110: AT&C loss trajectory adopted now for the MYT Control Period (in %)

Particular	FY 2016-	FY 2017-	FY 2018-	FY 2019-	FY 2020-
	17	18	19	20	21
AT&C loss	36.00%	32.50%	25.00%	15.00%	14.00%

6.21 Further, the Commission, in the Order on Business Plan had also approved a target of 100% collection efficiency for each year of the 2<sup>nd</sup> MYT Control Period. Therefore, based on 100% collection efficiency, the distribution as well as T&D loss trajectory for the 2<sup>nd</sup> MYT Control Period is summarized in the following table:

Table 111: Approved distribution loss trajectory (in %)

Democratica		MYT Period							
Description	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21				
Intra-State Transmission Losses*	4.00%	4.00%	4.00%	4.00%	4.00%				
Distribution Losses	36.00%	32.50%	25.00%	15.00%	14.00%				
Aggregate T&D Losses	38.56%	35.20%	28.00%	18.40%	17.44%				

<sup>\*</sup>Trajectory for Intra-State transmission losses may be revised at the time of APR, if any revised trajectory is approved by the Commission in the APR/ARR Order of JKPDD-T

6.22 Based on its approved energy sales and loss trajectory, the energy requirement for the 2<sup>nd</sup> MYT Control Period has been summarized in following table:

Table 112: Approved energy requirement for 2<sup>nd</sup> MYT Control Period

<b>Particulars</b>	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Energy requirement					
Energy Sales	7955	8845	9937	11034	12277
Add: Distribution Loss (%)	36.00%	32.50%	25.00%	15.00%	14.00%
Distribution Loss (MU)	4475	4259	3312	1947	1999
Energy Req. @ Dist. Periphery	12430	13104	13249	12982	14275
Add: Intra-state Trans. Loss (%)	4.00%	4.00%	4.00%	4.00%	4.00%
Intra-state Trans. Loss (MU)	518	546	552	541	595
Energy Req. @ Trans. Periphery	12948	13650	13801	13523	14870

## **Power Purchase Quantum**

## **Petitioner's Submission**

6.23 The Petitioner submitted that the energy availability from the JKSPDC stations as well as CGSs for the MYT Control Period has been considered in line with the quantum approved by the Commission in Order on Business Plan for the MYT Control Period as summarized in the following table:





Table 113: Projected energy availability from JKSPDC Stations for MYT Control Period FY 2016-17 to FY 2020-21 (in MUs)

S. No.	Source	Plant Capacity (MW)	2016-17 Projected	2017-18 Projected	2018-19 Projected	2019-20 Projected	2020-21 Projected
A)	JKPDD's Own generation (Diesel)	23.41	0.00	0.00	0.00	0.00	0.00
B)	JKSPDC's Generation - Thermal						
1	Kalakote	0.00	0.00	0.00	0.00	0.00	0.00
2	Gas Turbine-I	75.00	0.00	0.00	0.00	0.00	0.00
3	Gas Turbine-II	100.00	0.00	0.00	0.00	0.00	0.00
	Sub-Total (B)	175.00	0.00	0.00	0.00	0.00	0.00
C)	JKSPDC's Generation - Hydel						
1	LJHP	105.00	552.10	552.10	552.10	552.10	552.10
2	USHP-I	22.60	75.09	75.09	75.09	75.09	75.09
3	USHP-II	105.00	278.96	278.96	278.96	278.96	278.96
4	Ganderbal	15.00	18.66	18.66	18.66	18.66	18.66
5	Chenani-I	23.30	71.99	71.99	71.99	71.99	71.99
6	Chenani-II	2.00	6.31	6.31	6.31	6.31	6.31
7	Chenani-III	7.50	6.20	6.20	6.20	6.20	6.20
8	Sewa-III	9.00	0.00	0.00	0.00	0.00	0.00
9	Karnah	2.00	5.76	5.76	5.76	5.76	5.76
10	Sumoor	0.10	0.08	0.08	0.08	0.08	0.08
11	Bazgo	0.30	0.26	0.26	0.26	0.26	0.26
12	Hunder	0.40	0.77	0.77	0.77	0.77	0.77
13	Iqbal Bridge	3.75	4.22	4.22	4.22	4.22	4.22
14	Sanjak	1.26	0.49	0.49	0.49	0.49	0.49
15	Badherwah	1.00	1.82	1.82	1.82	1.82	1.82
16	Pahalgam	3.00	6.60	6.60	6.60	6.60	6.60
17	Haftal	1.00	0.91	0.91	0.91	0.91	0.91
18	Marpachoo	0.75	0.65	0.65	0.65	0.65	0.65
19	Igo-Mercellong	3.00	1.08	1.08	1.08	1.08	1.08
20	Matchil	0.35	0.00	0.00	0.00	0.00	0.00
21	Stakna	4.00	0.00	0.00	0.00	0.00	0.00
22	New Ganderbal	93.00	0.00	0.00	383.06	383.06	383.06
23	Lower Kalnai	48.00	0.00	219.32	219.32	219.32	219.32
24	Parnai	37.50	0.00	192.76	192.76	192.76	192.76
25	Dah	9.00	0.00	60.72	60.72	60.72	60.72
26	Hanu	9.00	0.00	54.94	54.94	54.94	54.94
	Sub-Total ©		1031.94	1559.68	1942.75	1942.75	1942.75
D)	Baglihar	450.00	1398.56	1398.56	1398.56	1398.56	1398.56
	BHEP II	450.00	651.02	651.02	651.02	651.02	651.02
	Sub Total (D)		2049.58	2049.58	2049.58	2049.58	2049.58
	Grand Total (A+B+C+D)		3081.518	3609.263	3992.325	3992.325	3992.325





6.24 Other than own generation and power available from JKSPDC, the JKPDD-D sources power mainly from CPSUs such as NTPC, NHPC and other hydro power projects. JKPDD-D also has share in generation from SJVNL, THDC, TALA (through PTC), KWHEP (through PTC) and NPCIL Plants (i.e. NAPS & RAPP). The projected energy availability from CPSUs for MYT control period has been summarized in the following table.

Table 114: Projected energy availability from CGSs during the MYT Control Period FY 2016-17 to FY 2020-21 (in MUs)

S. No.	Source	Plant Capacity (MW)	JKPDD Share	FY 2016-17 Projected	FY 2017-18 Projected	FY 2018-19 Projected	FY 2019-20 Projected	FY 2020-21 Projected
A	NTPC							
1	Anta(G)	419	10.26%	181	181	0	0	0
2	Anta(L)	417	10.2070	101	101	U	U	U
3	Auriaya(G)	663	9.05%	151	47	0	0	0
4	Auriaya(L)	003	7.03 /0	131	7/	U	U	U
5	Dadri(G)	830	8.31%	234	234	0	0	0
6	Dadri(L)	650	0.5170	234	234	U	U	U
7	Unchahar-I	420	3.81%	122	122	122	0	122
8	Unchahar-II	420	8.81%	244	244	244	0	0
9	Unchahar-III	210	7.62%	141	141	141	141	141
10	Rihand-I	1,000	8.30%	540	540	540	540	540
11	Rihand-II	1,000	10.80%	746	746	746	746	746
12	Rihand-III	1000	8.20%	438	438	438	223	438
13	Singrauli	2,000	1.30%	152	152	152	152	152
14	Farraka	1,600	0.88%	94	94	0	94	94
15	Talcher	1,000	0.00%	0	0	0	0	0
16	Kahalagaon-I	840	3.69%	215	215	29	0	0
17	Kahalagaon- II	1,500	5.53%	576	576	576	0	360
18	Nctp-2	980	1.22%	69	0	69	69	69
19	Korba-I	2,100	1.02%	83	83	83	83	83
20	Korba-III	500	1.58%	39	39	39	39	39
21	Mouda	500	1.58%	45	0	52	52	52
22	Sipat-I	1,980	1.58%	151	151	151	151	151
23	Sipat-II	1,000	1.31%	56	56	56	56	56
24	Vindhyachal- 1	1,260	1.27%	69	69	69	69	69
25	Vindhyachal- 2	1,000	1.30%	52	52	52	52	52
26	Vindhyachal- 3	1,000	1.31%	60	60	60	60	60
27	Vindhyachal- 4	500	1.58%	67	67	67	67	67
A	Sub Total			4,525	4,307	3,321	2,379	3,014





S. No.	Source	Plant Capacity (MW)	JKPDD Share	FY 2016-17 Projected	FY 2017-18 Projected	FY 2018-19 Projected	FY 2019-20 Projected	FY 2020-21 Projected
В	NHPC	(1 <b>V1 VV</b> )		Frojecteu	Frojecteu	Projecteu	Frojected	Frojecteu
1	Salal	690	34.35%	748	748	748	748	748
	Free Power		12.00%	409	409	409	409	409
2	Tanakpur	94	7.45%	21	21	21	21	21
3	Chamera-I	540	3.89%	96	96	96	96	96
4	Chamera-II	300	10.33%	132	132	132	132	132
5	Chamera-III	231	10.39%	89	89	89	89	89
6	Uri-I	480	33.96%	588	588	588	588	588
	Free Power		12.00%	328	328	328	328	328
7	Dulhasti	390	24.36%	239	239	239	239	239
	Free Power		12.00%	254	254	254	254	254
8	Dauhaliganga	280	9.64%	41	41	41	41	41
9	Sewa-II	120	22.50%	45	45	45	45	45
	Free Power			75	75	75	75	75
10	Nimo Bazgo	45	100.00%	0	0	0	0	0
	Free Power			10	10	10	10	10
11	Chutak	44	100.00%	0	0	0	0	0
	Free Power			24	24	24	24	24
12	Uri-II	240	35.42%	159	159	159	159	159
	Free Power			172	172	172	172	172
13	Parbati-III	520	10.38%	54	54	54	54	54
В	Sub Total			3,484	3,484	3,484	3,484	3,484
3	SJVNL	1500	9.27%	663	663	663	663	663
	SJVNL RAMPUR	343	9.04%	105	105	105	105	105
	Total			768	768	769	769	769
4	THDC	1000	7.10%	197	197	197	197	197
	Total			197	197	197	197	197
5	THDC- KOTESHW AR	400	6.75%	75	75	75	75	75
	Total			75	75	75	75	75
6	PTC INDIA LTD.							
	PTC(Tala)	1020	1.76%	61	61	61	61	61
	PTC(BHEP)			431	431	431	431	431
	PTC(APL)			49	49	49	49	49
	PTC (IEX)			0	0	100	648	1295
	Sub-Total (6)			541	541	641	1189	1836
7	NPCIL							
	NAPs	440	10.91%	218	218	218	218	218
	RAPP 3&4	440	7.95%	263	263	263	263	263
	RAPP 5&6	440	12.73%	172	172	172	172	172
	TAPS 3&4	1080	1.33%	74	74	74	74	74





S. No.	Source	Plant Capacity (MW)	JKPDD Share	FY 2016-17 Projected	FY 2017-18 Projected	FY 2018-19 Projected	FY 2019-20 Projected	FY 2020-21 Projected
	KAPS	440	0.89%	21	21	21	21	21
	Sub-Total (7)			748	748	748	748	748
8	JHAJJAR	1500	1.13%	0	0	0	0	0
	Sub-Total (8)			0	0	0	0	0
	<b>Grand Total</b>			10338	10120	9233	8840	10122

## Renewable purchase Obligation (RPO)

6.25 As per the provisions of the JKSERC (Renewable Power Purchase Obligation, its compliance and REC Framework implementation) Regulation, 2011 and JKSERC Notification No. 44/JKSERC of 2015 dated 5<sup>th</sup> August, 2015, JKPDD-D has to meet Solar and non-solar RPO targets during the MYT Control Period as summarized in the following table:

Table 115: RPO targets for the MYT Control Period FY 2016-17 to FY 2020-21

<b>RPO Target</b>	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Solar	1.00%	1.25%	1.50%	1.75%	2.00%
Non Solar	6.50%	7.25%	8.00%	8.75%	9.50%

6.26 JKPDD submitted that it is meeting the RPO targets to the extent available from mini/ small hydro stations owned by JKSPDC in the state. The remaining RPO to be met by the Petitioner is summarized in the following table:

Table 116: RPO to be met during Control Period FY 2016-17 to FY 2020-21 as projected by the Petitioner (in MU's)

Particulars	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Remaining RPO to be					
met					
Solar	132.59	170.09	198.73	227.18	288.86
Non Solar	660.96	670.00	743.37	819.35	1055.55
Total	793.55	840.10	942.11	1046.53	1344.42

## **Commissions Analysis**

- 6.27 The JKPDD-D procures power from its own sources, state owned generating company namely JKSPDC, allocated/ unallocated share in CGSs, banking arrangement, short term purchase, UI and any other source.
- 6.28 The Commission had approved the power procurement plan for the 2<sup>nd</sup> MYT Control Period in its Order on Business Plan for the Control Period dated 14<sup>th</sup> October, 2015. However, it is pertinent to note that the Commission has now adopted a revised T&D loss trajectory for the MYT Control Period as discussed in the previous paragraphs. Moreover, for the projection of energy availability from JKSPDC's thermal station, the Commission had considered the net energy generated and sent out in FY 2015-16 as approved in the Tariff Order for FY 2015-16 dated 18<sup>th</sup> August 2015 while approving the power purchase from JKSPDC in





the Order on Business Plan. The Commission has now approved the Annual Fixed Charges for JKSPDC's stations for FY 2016-17 vide Order dated 31<sup>st</sup> March, 2016. The Commission finds it prudent to revise the availability from JKSPDC's stations based on the JKSPDC's Tariff Order for FY 2016-17. In view of above, the Commission has revised the power procurement plan for the MYT Control Period as elucidated in the following sections.

- 6.29 For the projection of energy availability from JKPDD own station and JKSPDC thermal station (existing stations/ existing tie-up), the Commission has considered the net energy estimated to be generated and sent out in FY 2016-17 as approved in the Tariff Order for FY 2016-17 dated 31<sup>st</sup> March, 2016. The same has been considered for the remaining years of the MYT period.
- 6.30 Besides, the Petitioner has also projected energy availability from new stations/ new tie-ups with JKSPDC stations to cater to the increased demand in future years. The Commission has approved the energy availability from new stations/ new tie-ups as per the submission of the Petitioner.
- 6.31 The energy availability from CPSU's stations including NTPC, NHPC, NPCIL etc. has been estimated on the basis of long term allocated share to JKPDD-D from these stations along with proportion of un-allocated share available during past two years. The average availability from these stations has been worked out, which is then used to estimate the future availability during the MYT period. Accordingly, the Commission has considered the availability from the CPSU's stations as approved in this Order for FY 2015-16.
- 6.32 The Commission has not projected any power availability from short-term sources since the Commission, in accordance with the Regulation 19(d) of the JKSERC (Distribution Multi Year Tariff) Regulation 2012, will approve such requirement on account of any factor beyond the control of the Licensee only such as shortage/non-availability of fuel, snow capping of hydro resources inhibiting power generation in sources stipulated in the plan, unplanned/forced outages of power generating units or acts of God and after submission of supporting documents.

## Renewable purchase Obligation (RPO)

6.33 As per the provisions of the JKSERC (Renewable Power Purchase Obligation, its compliance and REC Framework implementation) Regulation, 2011 and JKSERC Notification No. 44/JKSERC of 2015 dated 5th August, 2015, JKPDD-D has to meet Solar and non-solar RPO targets during the MYT Control Period as summarized in the following table:

Table 117: RPO targets for the MYT Control Period FY 2016-17 to FY 2020-21

RPO Target	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Solar	1.00%	1.25%	1.50%	1.75%	2.00%
Non Solar	6.50%	7.25%	8.00%	8.75%	9.50%

6.34 It is pertinent to note that as per the recently notified National Tariff Policy, 2016:





"the SERCs shall also reserve a minimum percentage for purchase of solar energy from the date of notification of this policy which shall be such that it **reaches 8% of total consumption of energy**, excluding Hydro Power, by March 2022 or as notified by the Central Government from time to time".

Accordingly, in view of the above, the Commission shall be revising the RPO targets for the Obligated entities in the State, shortly.

- 6.35 For the purpose of projections for the MYT period, the Commission has estimated the power availability from renewable energy sources during the MYT period on the basis of the RPO targets as summarized in Table 117 and approved energy requirement as summarized in Table 112 this Order. The same shall be revised at the time of APR/ True-up based on the revised RPO targets to be notified by the Commission in due course of time.
- 6.36 Non-solar RPO can be met through purchase of already tied up power from small hydro stations of JKSPDC having installed capacity < 25 MW and accordingly Commission has approved the quantum purchased from such stations only.
- 6.37 The solar RPO has to be met through power purchase from solar energy generator, purchase of solar Renewable energy certificates (RECs) available in the power exchange or by way of inviting competitive bids.
- 6.38 As stated earlier, the Utility has entered into a Memorandum of Understanding with the Ministry of Power, Government of India under the UDAY scheme under which the Discoms need to comply with the RPO outstanding since 1<sup>st</sup> April, 2012 within a period to be decided in consultation with MoP. The shortfall in the RPO targets of the Utility since 1<sup>st</sup> April, 2012 is as indicated in the following table:

**Table 118: Shortfall in RPO targets (MUs)** 

Shortfall in RPO Target	FY 2012- 13	FY 2013- 14	FY 2014- 15	Total shortfall
Solar	22	26	87	135
Non Solar	149	255	405	809
Total	171	281	492	944

- 6.39 The Commission has taken note of the above shortfall in the RPO targets and will deal with the matter separately.
- 6.40 Accordingly, the Commission approves net energy to be procured from solar & non-solar sources (other than already tied up power from small hydro stations of JKSPDC) as summarized in the following table:

Table 119: Approved quantum of renewable energy to be purchased (in MUs)

	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
(A) RPO					
Targets					
Solar	129	171	207	237	297





	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21				
Non-Solar	842	990	1104	1183	1413				
Total	971	1160	1311	1420	1710				
Availability of Non-Solar Power from existing sources ( < 25 MW)									
Non-Solar From JKSPDC	475	591	591	591	591				
(B) Remaining RPO to be met									
Solar	129	171	207	237	297				
Non-Solar	366	399	513	592	822				
Total	496	569	720	829	1119				

- 6.41 The Commission notes that the Petitioner has consistently failed to meet the RPO targets in the past. Also, the Commission had directed JKPDD-D to chalk out a comprehensive plan for fulfilment of the Renewable Purchase Obligation (RPO) and ensure compliance. In order to make the compliance with RPO targets more effective, the Commission had directed the JKPDD-D to open a separate account for meeting the annual fixed obligation of renewable energy. It was also directed that JKPDD-D shall review the position with the Nodal Agencies periodically and report the progress to the Commission. Further, the utilization of the funds created in this account shall be decided by the Utility in consultation with the Commission as per the relevant regulations. However, the Petitioner has failed to comply with this directive of the Commission.
- 6.42 Commission takes strong objection to the non-serious attitude of the Petitioner. The Petitioner has failed to initiate any meaningful action to meet the RPO targets in the next Control Period. As directed by the Commission in the previous Tariff Orders, the Petitioner should open a separate account for meeting the annual fixed obligation of renewable energy. In accordance with the provisions of RPO Regulations, the Utility shall purchase RECs to meet shortfall, if any. Further, no diversion of funds earmarked for meeting the RPO targets would be allowed by the Commission.
- 6.43 Further, as per the methodology followed earlier, the Commission has disallowed additional power purchase to meet the T&D losses over and above the target loss level by the licensee during the MYT period. The disallowed units of power purchase works out to be 1279 MU, 1173 MU, 1564 MU, 1962 MU and 854 MU for FY 2016-17, FY 2017-18, FY 2018-19, FY 2019-20 and FY 2020-21 respectively.
- 6.44 Based on the above analysis, the approved energy availability from all sources of power for the MYT control period has been summarized in the following table.





Table 120: Approved energy availability for the MYT Period (in MUs)

S. No.	Particulars	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
	State-owned Stations	2010 17	2017 10	2010 17		
A	JKPDD - Own Stations					
1	Diesel	24	24	24	24	24
	Sub-Total (A)	24	24	24	24	24
В	JKPDC - Thermal					
1	Kalakote	0	0	0	0	0
2	Gas Turbine-I	5	5	5	5	5
3	Gas Turbine-II	0	0	0	0	0
	Sub-Total (B)	5	5	5	5	5
C	JKPDC - Hydel					
1	LJHP	602	602	602	602	602
2	USHP-I	105	105	105	105	105
3	USHP-II	442	442	442	442	442
4	Ganderbal	89	89	89	89	89
5	Chenani-I	109	109	109	109	109
6	Chenani-II	12	12	12	12	12
7	Chenani-III	36	36	36	36	36
8	Sewa-III	33	33	33	33	33
9	Karnah	11	11	11	11	11
10	Sumoor	0	0	0	0	0
11	Bazgo	1	1	1	1	1
12	Hunder	2	2	2	2	2
13	Iqbal Bridge	21	21	21	21	21
14	Sanjak	4	4	4	4	4
15	Badherwah	9	9	9	9	9
16	Pahalgam	17	17	17	17	17
17	Haftal	5	5	5	5	5
18	Marpachoo	4	4	4	4	4
19	Igo-Mercellong	16	16	16	16	16
20	Matchil	0	0	0	0	0
21	Stakna	4	4	4	4	4
22	New Ganderbal	0	0	383	383	383
23	Lower Kalnai	0	219	219	219	219
24	Parnai	0	193	193	193	193
25	Dah	0	61	61	61	61
26	Hanu	0	55	55	55	55
	Sub-Total (C)	1524	2052	2435	2435	2435





S. No.	Particulars	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
D	Baglihar	1399	1399	1399	1399	1399
	Bhep II	651	651	651	651	651.02
	Sub-Total (D)	2050	2050	2050	2050	2050
	Total State owned					
	generation (A+B+C+D)	3603	4130	4513	4513	4513
1	NTPC					
1	Anta (G)	101	101	101	101	101
2	Anta (L)	181	181	181	181	181
3	Auriaya(G)	151	1.7.1	1.51	151	151
4	Auriaya(L)	151	151	151	151	151
5	Dadri(G)	224	224	224	224	224
6	Dadri(L)	234	234	234	234	234
7	Unchahar-I	122	122	122	122	122
8	Unchahar-II	244	244	244	244	244
9	Unchahar-III	141	141	141	141	141
10	Rihand-I	540	540	540	540	540
11	Rihand-II	746	746	746	746	746
12	Rihand III	438	438	438	438	438
13	Singrauli	152	152	152	152	152
14	Farraka	94	94	94	94	94
15	Talcher	0	0	0	0	0
16	Kahalgaon-I	215	215	215	215	215
17	Kahalgaon-II	576	576	576	576	576
18	Nctp-2	69	69	69	69	69
19	Korba-I	83	83	83	83	83
20	Korba-III	39	39	39	39	39
21	Mouda	52	52	52	52	52
22	Sipat-I	151	151	151	151	151
23	Sipat-II	56	56	56	56	56
24	Vindhyachal-1	69	69	69	69	69
25	Vindhyachal-2	52	52	52	52	52
26	Vindhyachal-3	60	60	60	60	60
27	Vindhyachal-4	67	67	67	67	67
A	Sub-Total (1-27)	4,531	4,531	4,531	4,531	4,531
_	NHDC					
2	NHPC	740	740	740	740	740
1	Salal	748	748	748	748	748
_	Free power	409	409	409	409	409
2	Tanakpur	21	21	21	21	21
3	Chamera-I	96	96	96	96	96
4	Chamera-II	132	132	132	132	132
5	Chamera-III	89	89	89	89	89





S. No.	Particulars	FY	FY	FY	FY	FY
		2016-17	2017-18	2018-19	2019-20	2020-21
6	Uri	588	588	588	588	588
	Free power	328	328	328	328	328
7	Dulhasti	239	239	239	239	239
	Free power	254	254	254	254	254
8	Dauhaliganga	41	41	41	41	41
9	Sewa II	45	45	45	45	45
	Free Power	75	75	75	75	75
10	Nimo Bazgo	58	58	58	58	58
	Free Power	10	10	10	10	10
11	Chutak	39	39	39	39	39
	Free Power	24	24	24	24	24
12	Uri-II	159	159	159	159	159
	Free Power	172	172	172	172	172
13	Parbati-III	54	54	54	54	54
В	Sub-Total (1-13)	3,582	3,582	3,582	3,582	3,582
3	SJVNL	663	663	663	663	663
	SJVNL Rampur	105	105	105	105	105
С	Sub- Total	769	769	769	769	769
4	THDC	197	197	197	197	197
D	Sub- Total	197	197	197	197	197
5	THDC (Koteshwar)	75	75	75	75	75
E	Sub- Total	75	75	75	75	75
6	PTC India					
	PTC (Tala)	61	61	61	61	61
	PTC (BHEP)	431	431	431	431	431
	PTC (KWHEP)	49	49	49	49	49
F	Sub- Total	541	541	541	541	541
7	NPCIL					
<u>.</u>	NAPs	218	218	218	218	218
	RAPP 3 & 4	263	263	263	263	263
	Rapp 5&6	172	172	172	172	172
	TAPS 3&4	74	74	74	74	74
	KAPS	21	21	21	21	21
G	Sub-Total (7)	747	747	747	747	747
G	~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~		, .,	, .,	, . ,	
8	Jhajjar	36	36	36	36	36
<u>в</u> Н	Sub-Total (8)	36	36	36	36	36





S. No.	Particulars	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
	Grand Total (From Outside Sources)	10,478	10,478	10,478	10,478	10,478
I	Short-Term Purchases					
1	PTC/ NVVN	0	0	0	0	0
2	Renewable	496	569	720	829	1119
	Total - Short term/ Renewable energy purchases	496	569	720	829	1119
J	Power traded (disallowed)	-1279	-1173	-1564	-1962	-854
	Gross Energy Availability	13297	14005	14148	13859	15257
	Less: Inter-state Transmission Loss	349	355	347	336	387
	Net Energy Availability	12948	13650	13801	13523	14870

## **Power Purchase Cost**

## Power Purchase from JKSPDC

## **Petitioner's Submission**

- 6.45 For projecting power procurement cost, tariff for the State owned generating stations has been escalated at 3% p.a. over 2014-15 approved tariff. For projecting the cost of power purchase of the upcoming power plants, per unit cost has been considered equivalent to the average per unit power purchase cost of the existing JKSPDC plants. Per unit cost of BHEP-II has been taken equivalent to the existing per unit cost of Bhaglihar stage I.
- 6.46 The details of power purchase cost of the JKSPDC plants for the MYT Control Period as submitted by the Petitioner is given in the table below:

Table 121: Projected Power Purchase Cost of JKSPDC for the MYT Control Period (Rs. Crore)

S.No	Source	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
	<b>State Owned Stations</b>					
A)	PDD					
1	Diesel	0.00	0.00	0.00	0.00	0.00
	Sub-Total	0.00	0.00	0.00	0.00	0.00
B)	Thermal					
1	Kalakote	0.00	0.00	0.00	0.00	0.00
2	Gas-Turbine-I	0.00	0.00	0.00	0.00	0.00
3	Gas-Turbine-II	0.00	0.00	0.00	0.00	0.00
	Sub-Total	0.00	0.00	0.00	0.00	0.00
<b>C</b> )	Hydel					
1	LJHP	32.90	33.88	34.90	35.95	37.03





S.No	Source	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
2	USHP-I	4.93	5.07	5.23	5.38	5.54
3	USHP-II	25.03	25.78	26.55	27.35	28.17
4	Ganderbal	0.86	0.88	0.91	0.93	0.96
5	Chenani-I	5.57	5.73	5.91	6.08	6.27
6	Chenani-II	0.64	0.66	0.68	0.70	0.72
7	Chenani-III	0.90	0.93	0.96	0.99	1.01
8	Sewa-III	0.00	0.00	0.00	0.00	0.00
9	Kamah	1.80	1.85	1.91	1.97	2.03
10	Sumoor	0.03	0.03	0.03	0.03	0.03
11	Bazgo	0.09	0.09	0.09	0.10	0.10
12	Hunder	0.21	0.21	0.22	0.23	0.23
13	Iqbal Bridge	0.80	0.82	0.85	0.87	0.90
14	Sanjak	0.24	0.24	0.25	0.26	0.27
15	Badherwah	0.25	0.26	0.27	0.28	0.29
16	Pahalgam	3.34	3.44	3.54	3.65	3.76
17	Haftal	0.42	0.43	0.45	0.46	0.47
18	Manpachoo	0.31	0.32	0.33	0.34	0.35
19	Igo-Mercellong	0.50	0.51	0.53	0.54	0.56
20	Matchil	0.00	0.00	0.00	0.00	0.00
21	Stakna	0.00	0.00	0.00	0.00	0.00
22	New Ganderbal	0.00	0.00	29.83	30.72	31.64
23	Lower Kalnai	0.00	16.75	17.25	17.76	18.30
24	Parnai	0.00	14.72	15.16	15.61	16.08
25	Dah	0.00	4.64	4.78	4.92	5.07
26	Hanu	0.00	4.19	4.32	4.45	4.58
	Sub-Total	78.79	121.44	154.91	159.56	164.35
<b>D</b> )	Baglihar	436.03	449.11	462.58	476.46	490.75
	BHEP-II	202.97	209.06	215.33	221.79	228.44
	Sub-Total (D)	639.00	658.17	677.91	698.25	719.20
	Grand Total (A+B+C+D)	717.79	779.61	832.83	857.81	883.55

## **Commissions Analysis**

- 6.47 The Commission has approved the power purchase cost from JKSPDC as per the rates approved in the JKSPDC's Tariff Order for FY 2016-17 passed by the Commission on 31<sup>st</sup> March, 2016. The same rates have been considered for the entire MYT Control Period. For projecting the cost of power purchase of the upcoming power plants, per unit cost has been considered as per the submission of the Petitioner.
- 6.48 The total power purchase cost from state generation stations for FY 2016-17 computed by the Commission is summarized in the following table:

Table 122: Approved power purchase cost details from State Stations for MYT Control Period (Rs Cr)

S.No	Source	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
1	LJHP	30.67	30.67	30.67	30.67	30.67
2	USHP-I	5.37	5.37	5.37	5.37	5.37
3	USHP-II	22.51	22.51	22.51	22.51	22.51
4	Ganderbal	4.55	4.55	4.55	4.55	4.55



S.No	Source	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
5	Chenani-I	5.55	5.55	5.55	5.55	5.55
6	Chenani-II	0.61	0.61	0.61	0.61	0.61
7	Chenani-III	1.85	1.85	1.85	1.85	1.85
8	Sewa-III	1.67	1.67	1.67	1.67	1.67
9	Kamah	0.57	0.57	0.57	0.57	0.57
10	Sumoor	0.02	0.02	0.02	0.02	0.02
11	Bazgo	0.06	0.06	0.06	0.06	0.06
12	Hunder	0.09	0.09	0.09	0.09	0.09
13	Iqbal Bridge	1.07	1.07	1.07	1.07	1.07
14	Sanjak	0.22	0.22	0.22	0.22	0.22
15	Badherwah	0.48	0.48	0.48	0.48	0.48
16	Pahalgam	0.87	0.87	0.87	0.87	0.87
17	Haftal	0.25	0.25	0.25	0.25	0.25
18	Manpachoo	0.19	0.19	0.19	0.19	0.19
19	Igo-Mercellong	0.80	0.80	0.80	0.80	0.80
20	Matchil	0.00	0.00	0.00	0.00	0.00
21	Stakna	0.22	0.22	0.22	0.22	0.22
22	New Ganderbal	0.00	0.00	29.83	30.72	31.64
23	Lower Kalnai	0.00	16.75	17.25	17.76	18.30
24	Parnai	0.00	14.72	15.16	15.61	16.08
25	Dah	0.00	4.64	4.78	4.92	5.07
26	Hanu	0.00	4.19	4.32	4.45	4.58
27	Baglihar	436.03	449.11	462.58	476.46	490.75
28	BHEP-II	202.97	209.06	215.33	221.79	228.44
	Total	639.00	658.17	677.91	698.25	719.20

## Power Purchase from CGSs and other sources

## **Petitioner's Submission**

- 6.49 The cost of purchase from the central generating stations for the period under review is estimated based on the following assumptions:
  - a) Fixed cost for the MYT period has been projected considering a 5% escalation over the estimated fixed cost for various stations for FY 2015-16.
  - b) Variable cost for each NTPC generating stations has been projected based on the increase in the actual average variable cost per unit for the FY 2014-15 over the previous year.
  - c) Other charges (tax, incentives, etc) have been estimated at similar level as submitted for full year of FY 2015-16.
  - d) For nuclear plants i.e. KAPP and TAPP single part tariff increase in the actual average variable cost per unit during FY 2014-15 over the previous year have been considered for projecting the power purchase cost for the MYT period.
  - e) Variable cost for each NHPC generating stations has been projected based on the increase in the actual average variable cost per unit during FY 2014-15 over the previous year.



f) Variable cost for other generating stations namely SJVNL, THDC, THDC Koteshwar, PTC (Tala), PTC (BHEP), PTC (APL) and Jhajjar has been projected based on the increase in the actual average variable cost per unit during the FY 2014-15 over the previous year.

Table 123: Projected Power Purchase Cost of CGs for the MYT Control Period (Rs. Crore)

Source	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
NTPC Stations					
Anta(G)	80.217	81.351	25.719	26.970	28.283
Anta(L)	80.217	01.331	23.719	20.970	26.263
Auriaya(G)	85.929	44.573	26.598	27.918	29.303
Auriaya(L)	63.929	44.373	20.396	27.910	29.303
Dadri(G)	122.352	123.793	31.771	33.359	35.027
Dadri(L)	122.332	123.793	31.771	33.337	33.027
Unchahar-I	37.532	38.054	38.602	12.351	39.781
Unchahar-II	103.673	112.028	29.577	30.923	32.336
Unchahar-III	43.383	44.212	45.082	45.996	46.955
Rihand-I	191.466	227.116	271.099	325.453	355.218
Rihand-II	286.364	343.326	414.968	505.251	619.213
Rihand-III	207.237	252.401	311.084	242.802	487.672
Singrauli	32.998	35.885	39.064	42.566	46.428
Farraka	39.424	40.441	11.983	12.457	12.955
Talcher	1.170	1.170	1.170	1.170	1.170
Kahalagaon-I	78.274	79.396	79.396 32.149 25.98		27.286
Kahalagaon-II	218.614	222.481	226.540	90.286	182.585
Nctp-2	49.399 18.014 18.856 19.739		19.739	20.667	
Korba-I	13.512 14.146 14.811		15.508	16.238	
Korba-III	9.950	10.267	10.601	10.951	11.319
Mouda	43.996	12.686	13.320	13.986	14.685
Sipat-I	43.525	44.622	45.774	46.982	48.252
Sipat-II	15.069	15.410	15.767	16.143	16.537
Vindhyachal-1	19.481	21.232	23.165	25.303	27.665
Vindhyachal-2	14.393	15.708			20.576
Vindhyachal-3	15.377	15.693			16.739
Vindhyachal-4	20.742	21.302	21.890	22.507	23.156
Nctp-1	0.170	0.170	0.170	0.170	0.170
Jhanor-Gandhar	0.204	0.205	0.207	0.209	0.211
Kawas	0.192	0.193	0.194	0.195	0.197
Sub-Total(1-27)	1774.645	1835.877	1703.353	1630.339	2160.626
NHPC (Hydro Plants)					
Salal	76.614	78.641	80.769	83.004	85.350
Free Power					
Tanakpur	6.789	7.006	7.235	7.474	7.726
Chamera-I	17.380	17.989	18.623	19.282	19.967
Chamera-II	43.093	44.686	46.346	48.076	49.880
Chamera-III	58.701	66.325	75.279	85.821	98.262
Uri-I	104.060	106.890	109.861	112.981	116.256
Free Power					
Dulhasti	150.479	155.278	160.287	165.516	170.977





Source	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Free Power					
Dauhaliganga	15.121	15.576	16.054	16.556	17.082
Sewa-II	23.037	23.682	24.359	25.070	25.817
Free Power					
Nimo Bazgo	56.003	58.800	61.736	64.820	68.057
Free Power		66.823			
Chutak	63.645		70.161	73.665	77.344
Free Power					
Uri-II	61.609	63.276	65.027	66.865	68.796
Free Power					
Parbati-III	29.379	29.986	30.622	31.291	31.993
Sub-Total(1-13)	705.911	734.958	766.359	800.421	837.509
SJVNL	237.755	273.150	315.585	366.595	428.056
SJVNL RAMPUR	0.000	0.000	0.000	0.000	0.000
Total	237.755	273.150	315.585	366.595	428.056
THDC	97.178	99.816	102.586	105.495	108.549
Total	97.178	99.816	102.586	105.495	108.549
THDC-KOTESHWAR	30.595	31.394	32.233	33.114	34.038
Total	30.595	31.394	32.233	33.114	34.038
PTC INDIA LTD.					
PTC(Tala)	12.323	12.324	12.324	12.324	12.325
PTC(BHEP)	155.162	155.163	155.164	155.165	155.166
PTC(APL)	0.000	0.000	0.000	0.000	0.000
PTC(IEX)	1.632	1.632	15.717	77.694	127.558
Sub-Total (6)	185.960	185.962	200.046	262.024	311.890
NPCIL					
NAPs	55.012	55.049	55.087	55.124	55.162
RAPP 3&4	75.051	75.148	75.244	75.341	75.437
RAPP 5&6	60.380	60.432	60.484	60.536	60.588
TAPS 3&4	21.284	21.284	21.284	21.284	21.284
KAPS	7.068	7.904	8.839	9.886	11.058
Sub-Total (7)	218.796	219.817	220.938	222.171	223.529
JHAJJAR	25.752	27.039	28.391	29.811	31.301
Sub-Total (8)	25.752	27.039	28.391	29.811	31.301
Short Term Purchase					
POSOCO (OA)	4.633	4.633	4.633	4.633	4.633
POSOCO (FEES & CHARGES)	1.736	1.736	1.736	1.736	1.736
Total U.I charges	6.369	6.369	6.369	6.369	6.369
RE Charges	29.429	29.429	29.429	29.429	29.429
Interest on RE	13.828	13.828	13.828	13.828	13.828
PSEB, BBMB & OTHERS	1.356	1.356	1.356	1.356	1.356
GRAND TOTAL	3327.575	3458.995	3420.474	3500.952	4186.480

# **Commission's Analysis**

6.50 For the purpose of calculation of power purchase cost from CGSs, the Commission has adopted the following methodology:





- (a) In case of NTPC stations, the Commission had approved the per unit variable cost (including FPA) for the MYT Period based on the approved rates as per the latest Tariff Orders by CERC which have been further escalated at 3% per annum to arrive at variable cost per unit for each year of the Control Period. The fixed charges for NTPC stations have been based on the Annual Fixed Charges (AFC) approved by CERC in its latest Tariff Orders.
  - (b) In case of NHPC stations and other hydel stations, the station wise actual charges paid by the Petitioner for FY 2014-15 have been considered for working out the charges to be paid in the Control Period.
  - (c) In case of NPCIL stations, the Commission has estimated the variable cost per unit by considering the actual variable cost per unit for FY 2014-15 in accordance with principles adopted by the Commission in the 1<sup>st</sup> MYT period.
- 6.51 It is pertinent to note that CERC is yet to notify the Annual Fixed Charges (AFC) for the period FY 2014-19 for various central generating stations supplying power to JKPDD-D. The Commission, in this Order, has projected the power purchase costs based on latest available Tariff Orders. The same shall be revised/ True-up by the Commission at the time of APR/ True-up based on the Tariff Orders for the period FY 2014-19 to be notified by the CERC.
- 6.52 The total power purchase cost from CGSs for the 2<sup>nd</sup> MYT Control Period computed by the Commission is summarized in the following table.

Table 124: Approved power purchase Cost of CGs for the MYT Control Period (Rs. Crore)

Name of the station	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
NTPC					
ANTA GAS	81.65	83.46	85.33	87.25	89.23
AURAIYA GAS	87.60	89.57	91.59	93.69	95.84
DADRI GAS	123.93	126.91	129.98	133.14	136.40
FARAKKA	39.04	39.90	40.79	41.70	42.64
KAHALGAON-I	77.71	79.48	81.31	83.19	85.13
NCTPS (Dadri) [Extn.]	41.26	42.03	42.82	43.63	44.47
RIHAND -I	144.12	146.85	149.66	152.56	155.54
RIHAND -II	211.99	215.82	219.76	223.82	228.00
SINGRAULI	29.02	29.57	30.14	30.73	31.33
UNCHAHAR-I	38.17	39.02	39.90	40.80	41.74
UNCHAHAR-II	92.86	94.90	97.00	99.17	101.40
UNCHAHAR-III	43.41	44.25	45.11	46.00	46.92
KAHALGAON STAGE-II	219.99	224.47	229.07	233.82	238.70
Mejia 6	0.00	0.00	0.00	0.00	0.00
APCL - Jhajjar (Unit - 1)	39.37	39.85	40.34	40.85	41.37
Rihand-III	127.68	129.99	132.37	134.82	137.34
Talcher	1.17	1.17	1.17	1.17	1.17
Korba-I	12.78	13.03	13.28	13.55	13.82
Korba-III	9.60	9.71	9.82	9.94	10.06
Mouda	31.31	31.95	32.60	33.28	33.97





Name of the station	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Sipat-I	42.69	43.36	44.05	44.75	45.48
Sipat-II	14.87	15.11	15.35	15.61	15.87
Vindhyachal-I	17.15	17.49	17.85	18.21	18.59
Vindhyachal-2	12.66	12.91	13.16	13.43	13.70
Vindhyachal-3	15.23	15.49	15.75	16.03	16.31
Vindhyachal-4	19.90	20.21	20.52	20.84	21.18
NCTP-1	0.17	0.17	0.17	0.17	0.17
Jhanor-Gandhar	0.20	0.20	0.20	0.20	0.20
Kawas	0.19	0.19	0.19	0.19	0.19
Total NTPC	1576	1607	1639	1673	1707
Nuclear					
RAPS - 3&4	74.87	74.87	74.87	74.87	74.87
RAPS - 5	61.42	61.42	61.42	61.42	61.42
NPCIL - NAPS	54.94	54.94	54.94	54.94	54.94
TAPS 3&4	18.21	18.21	18.21	18.21	18.21
KAPS	6.25	6.25	6.25	6.25	6.25
Total Nuclear	215.69	215.69	215.69	215.69	215.69
NHPC stations					
CHAMERA-I	16.21	16.21	16.21	16.21	16.21
CHAMERA-II	40.12	40.12	40.12	40.12	40.12
CHAMERA-III	46.71	46.71	46.71	46.71	46.71
DHAULIGANGA	14.30 14.30 14.30		14.30	14.30	14.30
DULHASTI	141.55	141.55	141.55	141.55	141.55
Dulhasti Free	0.00	0.00	0.00	0.00	0.00
SALAL	72.83	72.83	72.83	72.83	72.83
Salal Free	0.00	0.00	0.00	0.00	0.00
TANAKPUR	6.38	6.38	6.38	6.38	6.38
URI-I	98.81	98.81	98.81	98.81	98.81
Uri Free	0.00	0.00	0.00	0.00	0.00
Sewa-II	21.77	21.77	21.77	21.77	21.77
Sewa-II Free	0.00	0.00	0.00	0.00	0.00
Chutak	324.82	324.82	324.82	324.82	324.82
Chutak Free	0.00	0.00	0.00	0.00	0.00
Nimao Bazgo	137.19	137.19	137.19	137.19	137.19
Niamo Bazgo Free	0.00	0.00	0.00	0.00	0.00
Uri-II	58.48	58.48	58.48	58.48	58.48
Uri -II Free	0.00	0.00	0.00	0.00	0.00
Parbati III	28.16	28.16	28.16	28.16	28.16
Total NHPC	1007.33	1007.33	1007.33	1007.33	1007.33
Others					
NJPC (SATLUJ)	187.09	187.09	187.09	187.09	187.09
TEHRI HEP	92.19	92.19	92.19	92.19	92.19
Koteshwar (THDC)	29.07	29.07	29.07	29.07	29.07
TALA HEP	12.38	12.38	12.38	12.38	12.38
PTC (Tala, BHEP, APL)	172.80	172.80	172.80	172.80	172.80
PTC (IEX)	0.00	0.00	0.00	0.00	0.00
Total Others	493.52	493.52	493.52	493.52	493.52
RE charges	50.98	50.98	50.98	50.98	50.98
GRAND TOTAL	3,343.24	3,374.56	3,406.82	3,440.05	3,474.28





#### Cost of Renewable Energy procurement

#### **Petitioner's Submission**

- 6.53 To estimate the power purchase cost from the renewable sources of power, the generic levellised tariff as per JKSERC's Order on Renewable Energy Sources dated 28<sup>th</sup> February, 2015 has been adopted by the Petitioner. The tariff for solar generating stations and hydel generating stations for each year of Control Period has been considered as Rs. 6.06/ unit and Rs 3.96/ unit respectively.
- 6.54 The cost of power purchase from the renewable sources of power for the MYT Control Period as projected by the Petitioner is given in the table below:

Table 125: Proposed cost of renewable energy procurement (Rs Crore)

RPO	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Solar	80.35	103.08	120.43	137.67	175.05
Non Solar	261.74	265.32	294.38	324.46	418.00
Total	342.09	368.40	414.81	462.13	593.05

## **Commission's Analysis**

- 6.55 For the purpose of determination of cost of renewable energy procurement, the Commission has considered the tariff for solar energy as Rs 4.98/ unit while the tariff for non-solar (hydel generating stations) has been considered as Rs 4.01/ unit as per the JKSERC's Order on generic levellised tariff from RES for FY 2016-17 dated 21<sup>st</sup> April, 2016. The same rates have been considered for remaining years of the Control Period as well.
- 6.56 Therefore, based on the approved quantum of renewable energy to be procured during the MYT Control Period as indicated in Table 119 of this Order, the cost of power purchase from the renewable sources of power for the MYT Control Period as approved by the Commission is as shown in the table below:

Table 126: Approved power purchase cost from Renewable Energy Sources for MYT Period (Rs Cr)

Particulars	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Solar sources	64.48	84.97	103.09	117.85	148.11
Non-solar sources*	146.92	159.87	205.78	237.52	329.52
Total	211.40	244.84	308.87	355.37	477.62

<sup>^</sup> It does not include cost of non-solar RPO met through JKSPDC owned small-hydro stations.

## Inter-state Transmission Charges

#### **Petitioner's Submission**

6.57 Inter-state Transmission charges payable to PGCIL are based on the total capacity allocation in the transmission network. For projecting the PGCIL transmission charges for the Control Period, an escalation of 5% over the estimated FY 15-16 transmission charges has been considered by the Petitioner.





6.58 Accordingly, the inter-state transmission charges as submitted by the Petitioner are summarized in the following table:

Table 127: Proposed inter-state transmission charges for the Control Period (Rs Cr)

Particulars	FY 2016-	FY 2017-	FY 2018-	FY 2019-	FY 2020-
	17	18	19	20	21
Inter-State transmission charges	471.42	494.99	519.74	545.73	573.02

## **Commission's Analysis**

- 6.59 The Commission had approved Rs 448.97 Cr as inter-state transmission charges for FY 2015-16 in Para 5.46 of this Order. The Commission approves the same charges for each year of the 2<sup>nd</sup> MYT Control Period as well.
- 6.60 Accordingly, the inter-state transmission charges as approved by the Commission are summarized in the following table:

Table 128: Approved inter-state transmission charges for the Control Period (Rs Cr)

Particulars	FY 2016-	FY 2017-	FY 2018-	FY 2019-	FY 2020-
	17	18	19	20	21
Inter-State transmission charges	448.97	448.97	448.97	448.97	448.97

#### **Disallowance of Power Purchase costs**

- As stated above in Para 6.43, the Commission has disallowed additional power purchase to meet the T&D losses over and above the target loss level by the licensee during the MYT period. The disallowed units of power purchase works out to be 1279 MU, 1173 MU, 1564 MU, 1962 MU and 854 MU for FY 2016-17, FY 2017-18, FY 2018-19, FY 2019-20 and FY 2020-21 respectively.
- 6.62 The cost of power purchase of units disallowed has been considered as the approved average power purchase rate of gross power purchase from JKSPDC and CGSs. The following table summarizes the cost of power purchase disallowed by the Commission for the MYT control period.

Table 129: Disallowed power purchase cost by the Commission for MYT Control Period (Rs Cr)

Sl. No	Description	<b>UoM</b>	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
A	Cost of power purchase from JKSPDC, CGSs and RES (incl. inter-state transmission charges)	Rs Cr	3342.24	3374.56	3406.83	3440.06	3474.29
В	Quantum of power purchased from JKSPDC, CGSs and RES (Gross)	MU	14228	14822	15365	15484	15724
C	Average rate of power purchase	Rs/KWh	3.25	3.19	3.16	3.18	3.24
D	Power purchase units disallowed by the Commission	MU	1279	1173	1564	1962	854
E	Disallowed Power purchase cost (C * D / 10)	Rs Cr	415.18	373.63	493.63	624.72	276.44





6.63 Based on above, the summary of power purchase cost projected by the Petitioner and approved by the Commission has been presented in the following table.

	Table 130: App	roved power pu	ırchase cost from	all sources	(Rs Cr)
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Particulars	FY 20	16-17	FY 20	17-18	FY 20	18-19	FY 20	19-20	FY 20	20-21
i ai uculais	Sub. by JKPDD	App. By Comm.	Sub. by JKPDD	App. By Comm						
Power Purchase from JKSPDC	718	613	780	654	833	685	858	687	884	689
Power Purchased from CGSs (including short term/UI)	3328	3343	3459	3375	3420	3407	3501	3440	4186	3474
Interstate Transmission charges	471	449	495	449	520	449	546	449	573	449
Renewable purchase	342	211	368	245	415	309	462	355	593	478
Power purchase cost disallowed		-415		-374		-494		-625		-276
Total Power Purchase cost	4859	4202	5102	4349	5188	4356	5367	4307	6236	4814

6.64 The Commission has observed that the Utility is procuring costly power from various generating stations. The Petitioner is directed to explore options for offloading of costly Power Purchase Agreements (PPAs). The Petitioner is also directed to not opt for costly unallocated quota of Government of India for procurement of power as power at much cheaper rates is available from various alternative sources.

# **Water Usage Charges**

## **Petitioner's Submission**

6.65 The Commission had approved the water usage charges of JKSPDC generating stations and the NHPC generating stations at Rs. 305.65 Crore and Rs. 213.17 Crore respectively for the FY 2015-16 in its Tariff Order dated 18.08.2015. The water usage charges have been re-computed by the Petitioner as per the revised rates notified by the J&K State Water Resources Regulatory Authority vide its Order No. 89/JKSWRRA of 2014 dated 24th December, 2014. The re-computed water usage charges for the MYT Control Period are given in the table below:

Table 131: Proposed Water Usage Charges for the MYT Control Period (Rs Cr)

Water Usage Charges	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
JKSPDC	371.06	412.22	442.10	442.10	442.10
NHPC	213.17	213.17	213.17	213.17	213.17
Total	584.23	625.39	655.27	655.27	655.27



6.66 The order of the JKSWRRA is valid for a period of three years. The JKPDD has therefore computed the water usage charges for the first three years of the MYT Control Period i.e. FY 2016-17, FY 2017-18 and FY 2018-19 as per the Order of JKSWRRA. Further, the same water usage charges have been adopted for the FY 2019-20 and FY 2020-21 subject to the revision of water usage charges by the JKSWRRA and true up of the FY 2019-20 and FY 2020-21.

## **Commission's Analysis**

- 6.67 The Commission had directed the Petitioner to submit station-wise details of water usage charge clearly indicating the water usage charge per unit of JKSPDC and total quantum of energy procured for each year of 2<sup>nd</sup> MYT Control Period. In reply, the Petitioner submitted that water usage charges for existing stations works out to Rs 320.28 Cr for each year of the MYT period while for the new stations, the water usage charges worked out to Rs 50.96 Cr, Rs 91.94 Cr and Rs 121.82 Cr for FY 2016-17, FY 2017-18 and FY 2018-19.
- 6.68 The Commission has re-worked the water usage charges as per Order of JKSWRRA according to which the water usage charges for existing stations work out to Rs 318.88 Cr while for the new stations, the same work out to Rs 50.74 Cr, Rs 91.87 Cr, Rs 121.73 Cr, Rs 121.73 and Rs 121.73 Cr for FY 2016-17, FY 2017-18, FY 2018-19, FY 2019-20 and FY 2020-21 respectively. The Commission accordingly approves the water usage charges from JKSPDC's stations as summarised in the following table:

Table 132: Approved Water Usage Charges of JKSPDC for the MYT Control Period (Rs Cr)

Water Usage Charges	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Existing Stations	318.88	318.88	318.88	318.88	318.88
New Stations	50.74	91.87	121.73	121.73	121.73
Total	369.62	410.75	440.61	440.61	440.61

- 6.69 In case of water usage charges payable for NHPC stations, the Commission provisionally approves the water usage charges as Rs 163.35 Cr for the MYT period as approved for FY 2014-15 in this Order. The same shall be True-up subject to submission of actual bills at the time of APR/True-up.
- 6.70 Accordingly, total water usage charges approved by the Commission for the MYT period are summarized in the following table which are to be provided to the Petitioner by the State Govt. in addition to the budget for power purchase:

Table 133: Approved Water Usage Charges for the MYT Control Period (Rs Cr)

Water Usage Charges	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
JKSPDC	369.62	410.75	440.61	440.61	440.61
NHPC	163.35	163.35	163.35	163.35	163.35
Total	532.97	574.11	603.96	603.96	603.96





## **Operation & Maintenance Expenses**

#### **Petitioner's Submission**

6.71 The employee expenses, administrative and general Expenses and R&M expenses that have been projected for the MYT period based on the Distribution Tariff Regulations, 2012 and as per the methodology adopted by the Commission in the previous MYT period.

Table 134: Projected operation and maintenance expenses for the Control Period (Rs Cr)

O&M Expenditure	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Employee Cost	601.03	697.82	806.77	929.27	1,066.84
R&M Cost	37.72	42.23	48.82	58.25	69.40
A&G Expenditure	42.06	47.82	54.14	61.07	68.66
Total O&M expenses	680.81	787.87	909.73	1,048.59	1,204.90

## Commission's Analysis

6.72 The component wise O&M expenses have been approved by the Commission in accordance with Regulation 22 of the JKSERC (Multi Year Distribution Tariff) Regulations, 2012.

## Employee expenses

6.73 As per Regulation 22.1 of the above-mentioned regulations, employee cost for 'n' year (EMP<sub>n</sub>) during the MYT period would be determined on the basis of norm for employee cost (EMP<sub>b</sub>) escalated by average Consumer Price Index (CPI) inflation rate for immediately preceding three years and includes provisions for one-time costs such as Pay commission arrears, etc. The formula for projection of employee cost is as follows:

## $EMP_n = (EMP_b * CPI Inflation Rate) + Provisions$

Where,

 $EMP_n = Employee$  expense for year 'n'

 $EMP_b = Employee \ expense \ as \ per \ norm$ 

CPI Inflation = average increase in CPI for immediately preceding three years

*Provisions = Provisions for uncontrollable or one-time expenses* 

6.74 Accordingly, the Commission has fixed the norm for employee cost on the basis of employee cost per personnel. The actual employee cost and number of employees for distribution business for FY 2013-14 and FY 2014-15 has been considered to determine employee cost per personnel for FY 2013-14 and FY 2014-15 which comes to Rs. 2.9 lakh per employee and Rs. 3.20 lakh per employee, respectively. An average of the two is then calculated to arrive at EMP<sub>b</sub> for the MYT period which works out to be Rs. 3.00 lakh per employee. The following table summarises the computation of norm for employee cost.





**Table 135: Norm for Employee Expenses** 

Description	Units	2013-14	2014-15
Apportioned employee cost for previous years	Rs Cr	407.32	474.53
Number of employees as per Year Book for FY 2013-14 and FY 2014-15	No.	14,062	15,015
Employee cost per personnel	Rs Cr/employee	0.029	0.032
EMP <sub>b</sub>	Rs Cr/employee	0.0	30

- 6.75 This EMP<sub>b</sub> is then escalated by average CPI index for previous three years worked out to be 7.14% per annum to arrive at EMP<sub>n</sub> without adjustment for provisions. This is then multiplied by number of employees during each year of the Control Period to arrive at employee cost for the MYT period. The number of employees for the MYT period have been considered same as that for FY 2015-16.
- 6.76 Based on above, the approved employee expenses for the 2<sup>nd</sup> MYT period have been summarised in following table.

Table 136: Approved employee expenses for the MYT period (Rs Cr)

Description	Units	Norm	2016-17	2017-18	2018-19	2019-20	2020-21
EMP <sub>b</sub> (A)	Rs Cr/employee	0.030					
CPI Inflation rate (B)	%	7.14%					
Number of employees (C)	No.		15,015	15,015	15,015	15,015	15,015
$EMP_n (D = A * B)$	Rs Cr/employee		0.032	0.035	0.037	0.040	0.043
Employee Expenses $(E = C * D)$	Rs Cr		487.19	521.97	559.23	599.16	641.93

## A&G expenses

6.77 As per Regulation 22.3 of the above-mentioned regulations, A&G cost for 'n' year (A&G<sub>n</sub>) during the MYT period would be determined on the basis of norm for A&G cost (A&G<sub>b</sub>) escalated by average Wholesale Price Index (WPI) inflation rate for immediately preceding three years including any past arrears/ provisions being beyond the control of the Petitioner. The formula for projection of A&G cost is as follows:

### $A\&G_n = (A\&G_b * WPI Inflation Rate) + Provisions$

Where,

 $A\&G_n = A\&G \ costs \ for \ year \ 'n'$ 

 $A\&G_b = A\&G$  costs as per norm

*WPI Inflation* = average increase in *WPI for immediately preceding three years* 

Provisions = Provisions for uncontrollable or one-time expenses

6.78 Accordingly, the Commission has fixed the norm for A&G cost on the basis of A&G cost per personnel. The actual A&G cost and number of employees for distribution business for FY 2013-14 and FY 2014-15 has been considered to determine A&G cost per personnel for FY 2013-14 and FY 2014-15 which comes to Rs. 0.22 lakh per employee and Rs. 0.23 lakh per employee, respectively. An average of the two is then calculated to arrive at A&G<sub>b</sub> which works out to be Rs. 0.225 lakh per





employee. The following table summarises the computation of norm for A&G cost.

DescriptionUnits2013-142014-15Apportioned A&G cost for previous yearsRs Cr30.8934.63Number of employees as per Year Book for FY 2013-14 and FY 2014-15No.14,06215,015

Rs Cr/employee

Rs Cr/employee

0.0022

0.0023

0.00225

Table 137: Norm for A&G costs

- 6.79 This A&G<sub>b</sub> is then escalated by average WPI index for previous three years worked out to 1.86% per annum to arrive at A&G<sub>n</sub> without adjustment for provisions. As the JKPDD-D has claimed no adjustments for A&G, the Commission has also not considered any provisions for A&G cost.
- 6.80 Based on above, the approved A&G expenses for the MYT period have been summarised in following table.

Description Units 2016-17 2017-18 2018-19 2019-20 2020-21 Norm Rs Cr/employee 0.002  $A\&G_b(A)$ WPI Inflation rate (B) 1.86% 15,015 Number of employees (C) No. 15,015 15,015 15,015 15,015  $\mathbf{A\&G_n}\left(\mathbf{D}=\mathbf{A}*\mathbf{B}\right)$ Rs Cr/ employee 0.0023 0.0023 0.0024 0.0024 0.0025 Rs Cr  $\mathbf{A\&G\ Costs\ (E=C*D)}$ 34.43 35.07 35.72 36.39 37.06

Table 138: Approved A&G Expenses for MYT period (Rs Cr)

#### **R&M** Expenses

A&G cost per personnel

A&G<sub>b</sub>

As per Regulation 22.2 of the above-mentioned regulations, R&M cost for 'n' is to be determined based on average proportion (i.e. K) of actual R&M costs of opening Gross fixed assets (GFA) for previous years. The formula for projection of R&M cost is as follows:

$$R&M_n = K_b * GFA_n$$

Where.

 $R\&M_n = R\&M \ Cost \ for \ year \ 'n'$ 

 $GFA_n = opening GFA for year 'n'$ 

 $K_b = Percentage point as norm$ 

6.82 The Commission has estimated the 'K' factor by considering the average of proportion of R&M costs of the opening GFA for FY 2013-14 and FY 2014-15. The actual R&M costs for JKPDD-D have been considered at Rs. 30.90 Cr and Rs. 34.37 Cr for FY 2013-14 and FY 2014-15, respectively. The Commission has considered the opening GFA for FY 2013-14 and FY 2014-15 as per its approval in the presious Tariff Orders. Accordingly, approved GFA for FY 2013-14 and FY 2014-15 for distribution function has been considered at Rs. 2,542.71 Cr and Rs. 2,629.08 Cr,





respectively.

- 6.83 Based on above, proportion of R&M costs to opening GFA for FY 2013-14 and FY 2014-15 works out to 1.22% & 1.31%, respectively. Thus 'Kb' is determined as average of previous year's ratios i.e. 1.26% of opening GFA for year 'n'.
- 6.84 The determination of norm for R&M cost (i.e. K factor) has been summarised in following table.

Table 139: Norm for R&M Expenses

Description	Units	2013-14	2014-15
Apportioned R&M cost for previous years	Rs Cr	30.90	34.37
Approved opening GFA as per previous Tariff Orders for JKPDD-D	Rs Cr	2,542.71	2,629.08
R&M Cost/ opening GFA	%	1.22%	1.31%
K <sub>b</sub> (norm)	%	1.26%	

6.85 The normative 'K<sub>b</sub>' factor is then multiplied by the approved opening GFA for each year of the MYT period as approved in by the Commission in Order on Business Plan for the 2<sup>nd</sup> MYT Control Period dated 14<sup>th</sup> October, 2015. The approved R&M costs for the MYT period have been summarised below.

Table 140: Approved R&M Expenses for the MYT period (Rs Cr)

Description	Units	Norm	2016-17	2017-18	2018-19	2019-20	2020-21
K <sub>b</sub>	%	1.26%					
Opening GFA for JKPDD-D	Rs Cr		2,884.80	3,192.53	3,644.01	4,352.57	5,175.97
Approved R&M costs	Rs Cr		36.39	40.27	45.96	54.90	65.28

6.86 The following table summarizes the O&M cost as proposed by the Petitioner and as approved by the Commission for the 2<sup>nd</sup> MYT Control Period:

Table 141: Projected and approved O&M Expenses for the MYT period (Rs. Cr)

	FY 2016-17		FY 2017-18		FY 2018-19		FY 2019-20		FY 2020-21	
Particulars.	Sub. by JKPDD	App. By Comm.	Sub. by JKPDD	App. By Comm						
Employee Expenses	601.03	487.19	697.82	521.97	806.77	559.23	929.27	599.16	1066.84	641.93
Admin & General Expenses	42.04	34.43	47.81	35.07	54.13	35.72	61.05	36.39	68.64	37.06
R&M Expenses	37.72	36.39	42.23	40.27	48.82	45.96	58.25	54.90	69.40	65.28
Total	680.79	558.01	787.86	597.31	909.72	640.92	1048.57	690.44	1204.88	744.27

## Capital expenditure and Capitalization

## **Petitioners Submission**

6.87 The following sub-section summaries the scheme-wise details of projected capital expenditure as submitted by JKPDD-D for the entire MYT period from FY 2016-17





to FY 2020-21. The proposed capital expenditure plan is in line with the approval granted by the Commission in the Order on Business Plan.

#### A. R-APDRP Works

- 6.88 The JKPDD-D is undertaking several works under the Restructured Accelerated Power Development Programme (R-APDRP) scheme to bring down T&D losses which at present are considerably high in the State. Works have been planned under Part A and Part B of the scheme.
- 6.89 Part A works cover GIS Mapping, Feeder Metering, DT Metering, Asset Mapping, application of Information Technology and supervisory Control and Data Acquisition (SCADA) /DMS in distribution sector, while Part-B is aimed to strengthen Distribution System at 11 KV level in identified project areas. 30 towns have been identified as project areas in J&K state with population of above 10,000 as per 2001 Census. The GoI has sanctioned Rs 151.99 Cr for Part-A and Rs 1,665.27 Cr for part-B of R-APDRP. DPR for SCADA/DMS for Jammu and Srinagar cities has been approved at an estimated cost of Rs 52.89 Cr.

#### **B. DDUGJY Works**

6.90 Government of India (GoI) has launched Deen Dayal Upadhayaya Gram Jyoti Yojana (DDUGJY) for the rural areas in the country. JKPDD is undertaking works under this scheme primarily for strengthening and augmentation of sub transmission & distribution infrastructure in rural areas and separation of agricultural and non agricultural feeders. Works planned under this scheme are physical and virtual separation of feeders, creation of new substations along with associated lines, installation of new distribution transformers, capacitors, and augmentation of existing substations and transformers, metering and micro grid and off grid distribution network. The total cost of this scheme for the state of J&K is estimated to be Rs.1249.68 Cr.

### C. IPDS

6.91 Government of India (GoI) has launched Integrated Power Development Scheme for urban areas in the country. Works planned under this scheme by JKPDD are strengthening of sub transmission and distribution network by creation of new sub stations, installation of new distribution transformers, capacitors, renovation and modernization of existing sub stations and lines, implementation of IT applications, ERP and metering. JKPDD proposes to incur an estimated cost of Rs.450.39 Cr for the works under IPDS.

## D. State Plan Schemes funded by Govt. of J&K

- 6.92 JKPDD-D proposes to undertake the following works under the state plan scheme during the MYT Control Period starting from FY2016-17 to FY 2020-21:
  - Up gradation and augmentation of 33/11/6.6 KV Receiving Stations
  - Construction of new 33/11 KV Receiving Stations





- Construction of new 33KV feeders & segregation of existing feeders
- Construction of new 11KV line & segregation of existing feeders
- Construction of new distribution sub stations and augmentation existing sub stations
- Construction and Laying of new LT lines.
- HT/LT improvement works
- Consumer metering
- 6.93 The expense incurred on state plan schemes from FY 2013-14 to FY 2015-16 is Rs. 191.39 Cr. Based on the past trend, JKPDD proposes to incur an expenditure of Rs. 600 Cr for the entire MYT period subject to the availability of funds State Plan.

## E. REC Funded Projects

JKPDD has also been implementing schemes such as electrification works, irrigation pump sets schemes and other works through loan availed from the Rural Electrification Corporation. The expenditure incurred by the JKPDD under the REC scheme during the period FY 2012-13 to FY 2014-15 is Rs. 42.28 Cr. Based on the past trend, the total amount estimated to be incurred under the REC Schemes for the 5-year MYT Control Period from FY 2016-17 to FY 2020-21 is Rs. 150 Cr.

## **Summary of Capital Investment**

6.95 Summary of capital investment proposed during MYT control period is given below:

Table 142: Proposed capital investment for Control Period (in Rs Cr.)

S.No.	Schemes	Scheme Provision	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
1	RAPDRP	1,665.27	841.53	0.00	0.00	0.00	0.00
2	DDUGJY	1,249.68	400.00	500.00	349.68	0.00	0.00
3	IPDS	450.39	100.00	150.00	200.39	0.00	0.00
4	State Plan Schemes	600.00	90.00	100.00	100.00	110.00	120.00
5	REC Funded Schemes	150.00	20.00	25.00	30.00	30.00	25.00
6	Total	4,115.34	1,451.53	775.00	680.07	140.00	145.00

6.96 The capitalization plan as submitted by the Petitioner is summarized in the following table:

Table 143: Capitalization Plan submitted by the Petitioner for the Control Period (FY 2016-17 to FY 2020-21) (in Rs. Cr.)

Schemes	Scheme	FY	FY	FY	FY	FY
	provision	2016-17	2017-18	2018-19	2019-20	2020-21
RAPDRP	1,665.27	238.73	276.23	355.81	397.88	210.38





Schemes	Scheme provision	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
DDUGJY	1,249.68	60.00	135.00	207.45	252.45	294.94
IPDS	450.39	15.00	37.50	72.56	85.06	102.58
State Plan	600.00	25.50	44.50	68.00	94.00	102.00
REC Funded Schemes	150.00	6.00	10.75	17.25	24.00	25.50
Total	4,115.34	345.23	503.98	721.07	853.39	735.40

#### **Commission's Analysis**

- 6.97 The Commission has approved the capital investment as well as capitalisation plan of the Petitioner for the 2<sup>nd</sup> MYT Control Period in its Order on Business Plan for the Control Period dated 14<sup>th</sup> October, 2015.
- 6.98 The Commission had directed the Petitioner to submit revised capital expenditure plan, if any, in light of the revised AT&C loss trajectory agreed by the Utility under the UDAY scheme. The Petitioner submitted there have been no changes in the Capital Investment Plan and its financing in light of the changes proposed in the T&D Loss trajectory agreed under the UDAY scheme.
- 6.99 During the course of the public hearings as well as the meeting of the SAC, the Petitioner reported that additional amount of Rs 1,200 Cr is likely to become available to the power distribution sector out of the Hon'ble Prime Minister's package for the J&K power sector. The Petitioner is directed to give the details and action plan for the same.
- 6.100 The Commission thus adopts the capital investment and the capitalisation plan already approved by the Commission in the Order on Business Plan dated 14<sup>th</sup> October, 2015. The same has been reproduced in the following tables:

Table 144: Approved capital investment for Control Period (in Rs Cr.)

S.No.	Schemes	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
1	RAPDRP	841.53	0.00	0.00	0.00	0.00
2	DDUGJY	400.00	500.00	349.68	0.00	0.00
3	IPDS	100.00	150.00	200.39	0.00	0.00
4	State Plan Schemes	90.00	100.00	100.00	110.00	120.00
5	REC Funded Schemes	20.00	25.00	30.00	30.00	25.00
6	Total	1,451.53	775.00	680.07	140.00	145.00



Scheme FΥ FY FΥ FY FY **Schemes** provision 2016-17 2017-18 2018-19 2019-20 2020-21 **RAPDRP** 1,665.27 238.73 276.23 355.81 397.88 210.38 DDUGJY 1,249.68 22.50 82.50 194.95 222.45 277.44 **IPDS** 450.39 15.00 37.50 72.56 85.06 102.58 State Plan 25.50 44.50 94.00 102.00 600.00 68.00 REC Funded 10.75 17.25 25.50 150.00 6.00 24.00 Schemes Total 4,115.34 307.73 451.48 708.57 823.39 717.90

Table 145: Approved Capitalization Plan for the Control Period (in Rs. Cr.)

6.101 The Commission in the past has observed that the Petitioner has not been able to undertake capital expenditure as planned. For better monitoring of the capital investment plan drawn by the Petitioner, the Commission directs the Petitioner to submit the details of the physical and financial milestones/ targets along with progress achieved vis-à-vis the action plan on strengthening of distribution infrastructure, as projected by the Petitioner in the Petition, to the Commission on a quarterly basis.

## **Gross Fixed Assets (GFA)**

#### **Petitioner's Submission**

6.102 Based on the capital expenditure plan and capitalization schedule as detailed for the FY 2015-16 and the MYT Control Period, the following Opening and Closing GFA and capitalization for the MYT Control Period has been proposed by the Petitioner:

**Additions during the Particulars Opening GFA Closing GFA** Year FY 2016-17 2884.80 345.23 3230.03 FY 2017-18 3230.03 503.98 3734.01 FY 2018-19 3734.01 721.07 4455.08 FY 2019-20 4455.08 853.39 5308.47 FY 2020-21 5308.47 735.40 6043.87

Table 146: Projected GFA for MYT period (Rs. Cr)

#### Commission's Analysis

- 6.103 The closing GFA of FY 2015-16 as approved by the Commission in this Order has been considered as opening GFA for FY 2016-17.
- 6.104 Additions to GFA for each year of the Control Period have been considered as per the approved capitalization for the corresponding year.
- 6.105 The following table summarizes opening GFA, assets capitalized and closing GFA for the MYT period as projected by Petitioner and approved by the Commission subject to the submission of audited statements at the time of true up:





Table 147: Approved GFA for MYT period (Rs. Cr)

	FY 20	16-17	FY 20	17-18	FY 20	18-19	FY 20	FY 2019-20 FY 2020-2		20-21
Particulars.	Sub. by JKPDD	App. By Comm.	Sub. by JKPDD	App. By Comm	Sub. by JKPDD	App. By Comm	Sub. by JKPDD	App. By Comm	Sub. by JKPDD	App. By Comm
Opening Balance	2884.80	2,884.80	3,230.03	3,192.53	3,734.01	3,644.01	4,455.08	4,352.57	5,308.47	5,175.97
Addition during the year	345.23	307.73	503.98	451.48	721.07	708.57	853.39	823.39	735.40	717.90
Closing Balance	3,230.03	3,192.53	3,734.01	3,644.01	4,455.08	4,352.57	5,308.47	5,175.97	6,043.87	5,893.86

## **Depreciation**

#### **Petitioner's Submission**

6.106 The following table summarizes the projected depreciation cost for the MYT period as submitted by the Petitioner.

Table 148: Projected depreciation for MYT period (Rs Cr)

Particulars	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Opening GFA	171.20	177.20	187.95	205.20	229.20
Additions	6.00	10.75	17.25	24.00	25.50
Closing GFA	177.20	187.95	205.20	229.20	254.70
Average GFA	174.20	182.58	196.58	217.20	241.95
Average Depreciation Rate	3.60%	3.60%	3.60%	3.60%	3.60%
Depreciation for the Year	6.27	6.57	7.08	7.82	8.71

#### **Commission's Analysis**

- 6.107 As per Regulation 24(d) of the JKSERC (Multi-Year Distribution) Tariff Regulations, 2012, depreciation shall not be allowed on assets funded by capital subsidies, consumer contributions or grants. Thus, depreciation can be charged only on the additions made to GFA which have been financed through loans (i.e. portion of capitalization for REC funded projects).
- 6.108 The Commission in accordance with the aforesaid Regulation approves the depreciation charge only on the portion of capitalization for REC funded projects.
- 6.109 The Commission has calculated the depreciation on the average GFA during the year and not on the closing GFA as the additions to the GFA take place throughout the year and the average of the opening and closing GFA provides a more realistic assessment of the depreciation.
- 6.110 Accordingly, the depreciation cost as provisionally approved by the Commission for the given period has been summarized in following table.





Table 149: Approved depreciation for MYT period (Rs Cr)

	FY 20	16-17	FY 20	17-18	FY 20	18-19	FY 20	19-20	FY 20	20-21
Particulars.	Sub. by JKPDD	App. By Comm.	Sub. by JKPDD	App. By Comm						
Opening GFA	171.20	171.21	177.20	177.21	187.95	187.96	205.20	205.21	229.20	229.21
Additions to GFA	6.00	6.00	10.75	10.75	17.25	17.25	24.00	24.00	25.50	25.50
Closing GFA	177.20	177.21	187.95	187.96	205.20	205.21	229.20	229.21	254.70	254.71
Average GFA	174.20	174.21	182.58	182.58	196.58	196.58	217.20	217.21	241.95	241.96
Depreciation Rate	3.60%	3.60%	3.60%	3.60%	3.60%	3.60%	3.60%	3.60%	3.60%	3.60%
Total	6.27	6.27	6.57	6.57	7.08	7.08	7.82	7.82	8.71	8.71

## **Interest and Finance Charges**

#### **Interest on Loans**

#### **Petitioner's Submission**

6.111 Based on the projections of the REC loan balances, receipts and payments, the interest and finance charges have been summarized below:

Table 150: Projected Interest and Finance charges for MYT period (Rs Cr)

Particulars	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Opening Loan	177.08	187.22	201.61	220.03	237.53
Receipts during the year	20.00	25.00	30.00	30.00	25.00
Loan Repayment	9.85	10.61	11.58	12.50	13.13
Closing Loan	187.22	201.61	220.03	237.53	249.40
Average Loan	182.15	194.42	210.82	228.78	243.47
Rate of Interest (%)	9.39%	9.39%	9.39%	9.39%	9.39%
Interest Cost on Avg. Loans	17.10	18.26	19.80	21.48	22.86

## **Commission's Analysis**

- 6.112 The Commission has approved the interest and finance charges on loan as per the following approach:
  - (a) The outstanding balance of term liabilities as on 31<sup>st</sup> March, 2016 has been considered as per closing loan balance of FY 2015-16.
  - (b) Additions in loan during the year have been considered as per approved capitalization for REC funded projects for the MYT period.
  - (c) In the absence of actual loan details, the repayments as well as rate of interest has been considered as 9.39% as considered by the Petitioner.





- 6.113 The Commission has calculated the interest on the average balance of loans during the year as the receipts and repayments take place throughout the year and the average of the opening and closing loan balance gives a more realistic assessment of the same.
- 6.114 Based on the above approach, the following table summarizes the interest and finance charges for the MYT period as approved by the Commission:

FY 2016-17 FY 2017-18 FY 2018-19 FY 2019-20 FY 2020-21 Particulars. Sub. by App. By JKPDD JKPDD JKPDD Comm. Comm Comm JKPDD Comm **JKPDD** Comm Opening Loan 131.16 177.07 187.22 127.31 201.61 127.45 220.03 237.53 144.62 133.12 balance Receipts during the 20.00 6.00 25.00 10.75 30.00 17.25 30.00 24.00 25.00 25.50 year Repayments during 9.85 9.85 10.61 10.61 11.58 11.58 12.50 12.50 13.13 13.13 the year **Closing Loan** 187.22 127.31 201.61 127.45 220.03 133.12 237.53 249.40 156.99 144.62 balance 129.23 194.42 Average Loan 182.15 127.38 210.82 130.28 228.78 138.87 243.47 150.80 **Interest on Term** 

11.96

Table 151: Approved Interest and Finance charges for MYT period (Rs Cr)

#### **Interest on Working Capital**

12.14

18.26

#### **Petitioner's Submission**

17.10

Loans @ 9.39%

6.115 JKPDD-D has projected the working capital and the interest on working capital in accordance with the Regulation 26 of the JKSERC (Multi Year Distribution Tariff) Regulation 2012. The interest worked out on the working capital is as under:

19.80

12.23

21.48

13.04

22.86

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14.16

Particulars	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
O&M expenses for 1 month	56.73	65.66	75.81	87.38	100.41
Expected revenue for two months	468.70	520.37	584.61	649.19	722.28
Maintenance spares @ 40% of R&M expense for 1 month	1.26	1.41	1.63	1.94	2.31
Total Working Capital requirement	526.69	587.44	662.05	738.51	825.00
Rate of Interest	14.75%	14.75%	14.75%	14.75%	14.75%
Interest on Working Capital	77.69	86.65	97.65	108.93	121.69

Table 152: Projected Interest on Working Capital for MYT period (Rs Cr)

#### **Commission's Analysis**

6.116 The Commission has estimated the interest on normative working capital as per Regulation 26 of the JKSERC (Multi Year Tariff Distribution) Regulations, 2012.





- 6.117 The normative working capital requirement has been calculated on the basis of the following methodology:
  - a) O&M expenses for one month
  - b) Two months equivalent of expected revenue
  - c) Maintenance of spares @ 40% of R&M expenses for 1 month
  - d) Less: Security Deposit from consumers, if any
- 6.118 Further, as per the Regulation, the rate of interest for computation of interest on normative working capital shall be considered equal to the J&K Bank Advance Rate as on date on which the Petition for determination of tariff is accepted by the Commission. Accordingly, the Commission has considered interest rate for working capital as equivalent to J&K Bank Advance rate i.e. 14.00% for computation of interest on working capital for the MYT period.
- 6.119 Accordingly, the approved Interest on Working Capital for MYT period is as per the following table:

FY 2018-19 FY 2016-17 FY 2017-18 FY 2019-20 FY 2020-21 Particulars. Sub. by App. By Sub. by Sub. by App. By Sub. by Sub. by App. By App. By App. By **JKPDD** Comm. **JKPDD** Comm **JKPDD** Comm **JKPDD** Comm **JKPDD** Comm O & M Expenses 56.73 46.50 65.65 49.78 75.81 53.41 87.38 57.54 100.41 62.02 for 1 month **Expected Revenue** 468.70 486.67 520.37 722.28 532.47 584.61 589.49 649.19 652.92 724.42 for two months Maintenance Spares @ 40% of 1.34 1.94 1.26 1.21 1.41 1.63 1.53 1.83 2.31 2.18 R&M expenses for 1 month. Normative 526.69 534.39 587.43 583.59 662.05 644.43 738.51 712.29 825.00 788.61 **Working Capital** Rate of Interest 14.75% 14.00% 14.75% 14.00% 14.75% 14.00% 14.75% 14.00% 14.75% 14.00% Interest on 77.69 74.81 86.65 81.70 97.65 90.22 108.93 99.72 121.69 110.41

Table 153: Approved Interest on Working Capital for MYT period (Rs Cr)

## **Return on Equity**

**Working Capital** 

#### **Petitioner's Submission**

6.120 The Petitioner has not proposed any return on equity.

#### **Commission's Analysis**

6.121 The Commission accepts the submission made by the Petitioner and has not approved any return on equity





## **Intra-state transmission charges**

#### **Petitioner's Submission**

6.122 The intra-state transmission charges have been considered by the Petitioner as per the ARR projected for the 2nd MYT Control Period for the JKPDD transmission business as given in the table below:

Table 154: Proposed intra-state transmission charges for MYT period (Rs Cr)

Description	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Intra-Sate Transmission Charges	175.68	198.38	249.44	325.11	379.57

## Commission's Analysis

- 6.123 The Commission has considered the intra-state transmission charges as per the ARR approved in the MYT Order for the 2<sup>nd</sup> Control Period for JKPDD-Transmission business dated 31<sup>st</sup> March, 2016.
- 6.124 Accordingly, the intra-state transmission charges for the MYT period have been approved as summarized in the following table:

Table 155: Approved intra-state transmission charges for MYT period (Rs Cr)

	FY 20	FY 2016-17 F		FY 2017-18 FY 2		018-19 FY 20		19-20 FY 20		20-21
Particulars	Sub. by JKPDD	App. By Comm.	Sub. by JKPDD	App. By Comm						
Intra-state transmission charges	175.7	101.6	198.4	107.9	249.4	115.2	325.1	123.1	379.6	133.6

## **Non-tariff Income (NTI)**

### **Petitioner's Submission**

6.125 The Petitioner has projected the non-tariff income for the MYT period by considering 5% year-on-year growth.

#### Commission's Analysis

6.126 The Commission accepts the submission made by JKPDD-D and approves non-tariff income for FY 2016-17 by escalating the approved Non-Tariff Income for FY 2015-16 by 5%. Thereafter, to compute the NTI for the remaining years of the MYT period, 5% year on year growth has been considered.







Table 156: Approved non-tariff income for MYT period (Rs Cr)

	FY 2016-17		FY 20	FY 2017-18		FY 2018-19		FY 2019-20		FY 2020-21	
Particulars	Sub. by JKPDD	App. By Comm.	Sub. by JKPDD	App. By Comm							
NTI	16.3	16.3	17.1	17.1	18.0	18.0	18.9	18.9	19.8	19.8	

# Aggregate Revenue Requirement (ARR) for the 2<sup>nd</sup> MYT Control Period

6.127 Based on the various components as discussed above, the ARR for the the MYT period as projected by the Petitioner and as approved by the Commission has been summarized in the following table.

Table 157: Summary of ARR for the MYT period (Rs Cr)

	FY 20	16-17	FY 20	17-18	FY 20	18-19	FY 20	19-20	FY 20	20-21
Particulars	Sub. by JKPDD	App. By Comm.	Sub. by JKPDD	App. By Comm						
Costs										
Power Purchase Cost	4,859	4,202	5,102	4,349	5,188	4,356	5,367	4,307	6,236	4,814
Water usage charges	584	533	625	574	655	604	655	604	655	604
Intra-state transmission Charges	176	102	198	108	249	115	325	123	380	134
Operation and Maintenance Cost	681	558	788	597	910	641	1,049	690	1,205	744
Interest on Long Term Debt	17	12	18	12	20	12	21	13	23	14
Depreciation	6	6	7	7	7	7	8	8	9	9
Interest on Working Capital	78	75	87	82	98	90	109	100	122	110
Total Costs	6,401	5,488	6,825	5,728	7,127	5,826	7,534	5,845	8,629	6,429
Add: Return on Equity	0	0	0	0	0	0	0	0	0	0
Less: Non-Tariff Income	16	16	17	17	18	18	19	19	20	20
Aggregate Revenue Requirement	6,384	5,472	6,808	5,711	7,109	5,808	7,515	5,826	8,609	6,409

## **Revenue from Sale of Power at Existing Tariffs**

#### **Petitioner's Submission**

6.128 The Petitioner has submitted the revenue from sale of power for the MYT period on the basis of revised estimates and projections of energy sales and prevalent tariff for supply to various categories of consumers.





Table 158: Proposed revenue from sale of power at existing tariffs for MYT period (Rs Cr)

Description	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Revenue from sale of power at existing tariffs	2812	3122	3508	3895	4334

## Commission's Analysis

- 6.129 The Commission has approved the revenue from sale of power based on the number of consumers, connected load and energy sales for the MYT period approved in this Order and the prevailing tariffs approved in the Order for FY 2015-16 dated 18<sup>th</sup> August, 2015.
- 6.130 The revenue from sale of power for the MYT period at 100% collection efficiency as approved by the Commission is summarized in the following table:

Table 159: Approved revenue from sale of power at existing tariffs for MYT period (Rs Cr)

Particulars	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Domestic	934.48	1003.94	1114.28	1273.31	1452.47
Non- Domestic/Commercial	340.01	389.60	445.16	485.43	529.40
Agriculture	108.71	123.66	145.23	180.61	224.84
State/ Central Govt. Department	529.96	557.88	587.32	618.37	651.12
Public Street Lighting	25.13	32.05	40.95	50.45	62.19
LT Industrial Supply	137.13	146.05	155.61	165.87	176.87
HT Industrial Supply	404.79	460.03	522.84	594.25	675.44
HT-PIU Industrial Supply	52.63	54.80	118.21	59.47	61.99
LT Public Water Works	208.63	237.48	267.67	276.75	286.15
HT Public Water Works	76.21	78.68	82.61	86.74	91.08
General Purpose Bulk	103.64	110.68	118.21	126.29	134.94
Total	2,934.64	3,194.85	3,536.96	3,917.54	4,346.49

# Revenue Gap

#### **Petitioner's Submission**

6.131 The Petitioner submitted that based on the assessed revenue realization, the revenue gap at existing tariff for FY 2016-17 works out to Rs 3,572 Cr.

Table 160: Proposed Revenue Gap at Existing Tariffs for the MYT period (Rs Cr)

Description	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Aggregate Revenue Requirement.	6,384	6,808	7,109	7,515	8,609
Revenue Assessed at existing tariffs	2,812	3,122	3,508	3,895	4,334





Description	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	FY 2020-21
Revenue Gap	(3,572)	(3,686)	(3,601)	(3,620)	(4,276)

## Commission's Analysis

6.132 Based on the revenue realization calculated as per the energy sales and cost per unit approved in this Order, the revenue gap approved for the MYT period is summarized in the following tables:

Table 161: Approved Revenue Gap at Existing Tariffs for MYT period (Rs Cr)

	FY 20	16-17	FY 20	17-18	FY 20	18-19	FY 20	19-20	FY 20	20-21
Particulars	Sub. by JKPDD	App. By Comm.	Sub. by JKPDD	App. By Comm						
Aggregate Revenue Requirement	6,384	5,472	6,808	5,711	7,109	5,808	7,515	5,826	8,609	6,409
Revenue Assessed at existing tariffs	2,812	2,935	3,122	3,195	3,508	3,537	3,895	3,918	4,334	4,346
Revenue Gap	(3,572)	(2,537)	(3,686)	(2,516)	(3,601)	(2,271)	(3,620)	(1,908)	(4,276)	(2,062)

- 6.133 For computation of average cost of supply at different loss levels, the Commission considered the following:
  - (a) **Average Cost of Supply at Approved Loss (ACOS**<sub>AL</sub>): The Commission has calculated the ACOS<sub>AL</sub> by dividing the overall ARR of the utility by the approved energy sales quantum (units) for the corresponding financial year.
  - (b) **Average Cost of Supply at Zero Loss (ACOS**<sub>ZL</sub>): The Commission has calculated the ACOS<sub>ZL</sub> by dividing the overall ARR of the utility by the quantum (units) of power purchased for the corresponding financial year.
  - (c) **Average Cost of Supply at Prudent Loss (ACOS**<sub>PL</sub>): The Commission has calculated the ACOS<sub>PL</sub> by dividing the overall ARR of the utility by the quantum (units) of energy that would have been billed corresponding to the prudent level of T&D losses.
  - (d) **Prudent level of T&D losses:** The Commission has considered T&D losses of 23.65% as the prudent level of T&D losses (the average T&D loss at the national level as per the Central Electricity Authority).
- 6.134 It is also pertinent to mention here, that even though the Commission determines ACOSPL i.e. average cost of supply at prudent loss levels, it is a benchmark figure aimed to move tariffs in direction of cost recovery; however same has to be matched by performance and efficiency improvement by the JKPDD-D. At present, the tariffs in the State are fixed to recover ACOS at Zero Losses only.





6.135 The following table summarizes ACOSAL, ACOSZL and ACOSPL as proposed now by the Petitioner and approved now by the Commission for MYT period:

Table 162: Projected and approved average COS for FY 2016-17 (Rs/KWh)

Sl. No.	Particulars	Derivation	Projected by Petitioner	Approved now by Commission
A	Energy Sales (MU)	-	7955	7955
В	T&D Losses (%)	-	42.40%	38.56%
С	Power Purchase Quantum (MU)	-	13,811	12,948
D	Aggregate Revenue Requirement (Rs Cr)	-	6384	5471
Е	CoS as actual / approved losses (CoS <sub>AL</sub> ) (Rs/kWh)	[ E = D/ A * 10 ]	8.06	6.88
F	CoS at Zero Losses (CoSzl) (Rs/kWh)	[ F = D / C * 10 ]	5.03	4.53
G	CoS at Prudent Losses (CoS <sub>PL</sub> ) (Rs/kWh)	[G = D/(C * (1-H)) *10]	- *	5.53
Н	Average realization rate		3.53	3.69

Note: \* The Petitioner has not submitted any estimates for prudent loss levels.

Note 2: The prudent loss level for FY 2015-16 is considered as 23.65% (as per monthly statistics by CEA, www.cea.nic.in)





## **CHAPTER 7: TREATMENT OF REVENUE GAP**

7.1. As shown in Table 161 in this Order, the approved revenue from existing tariffs leaves a revenue gap of Rs. 2,537 Cr for FY 2016-17.

#### Petitioner's submission

7.2. The Petitioner has submitted that at average cost of supply of the Utility at Rs 8.03/kWh at the projected T&D loss levels of 42.40%, an average revenue of Rs. 3.55/kWh leaves an uncovered gap of nearly 56% as summarized in the following table:

Table 163: Average CoS and Existing Average Tariff as submitted by Petitioner for FY 2016-17

Consumer Categories	Average CoS at proposed T&D loss level (42.40%)	Existing Average Tariff as submitted by Petitioner		oposed T&D loss l (42.40%)
	Rs/kWh	Rs/kWh	Rs/kWh	%
Domestic	8.03	2.71	5.31	66%
Non-Domestic/ Commercial	8.03	3.48	4.54	57%
State/Central Govt. Dept.	8.03	6.42	1.60	20%
Agriculture	8.03	2.83	5.20	65%
Public Street Lighting	8.03	4.37	3.66	46%
LT Public Water Works	8.03	4.67	3.35	42%
HT Public Water Works	8.03	4.62	3.41	42%
LT Industrial Supply	8.03	3.44	4.58	57%
HT Industrial Supply	8.03	3.28	4.74	59%
HT-PIU Industrial Supply	8.03	3.89	4.14	52%
General Purpose/ Bulk Supply	8.03	4.70	3.32	41%
Average	8.03	3.53	4.49	56%

#### **Commission's Analysis**

7.3. With an average cost of supply at Rs 6.88/ kWh at approved T&D loss levels of 38.56%, average revenue of Rs 3.69/ kWh at existing tariffs leaves an uncovered gap of nearly 46%. Even with an average cost of supply at Rs 5.53/ kWh at prudent T&D loss level of 23.65%, average revenue of Rs 3.69/ kWh at existing tariffs leaves an uncovered gap of nearly 33% as summarized in the following table:







Table 164: Average CoS and Existing Average Tariff as approved by the Commission for FY 2016-17

Consumer Categories	Average CoS at approved T&D loss level (38.56%)	Average CoS at prudent T&D loss level (23.65%)	Existing Average Tariff	Gap at approved T&D loss level (38.56%)		Gap at prudent T&D loss level (23.65%)	
	Rs/kWh	Rs/kWh	Rs/kWh	Rs/kWh	%	Rs/kWh	%
Domestic	6.88	5.53	2.77	4.11	60%	2.77	50%
Non-Domestic/ Commercial	6.88	5.53	3.48	3.40	49%	2.05	37%
State/Central Govt. Dept.	6.88	5.53	6.42	0.46	7%	-0.89	-16%
Agriculture	6.88	5.53	3.05	3.83	56%	2.48	45%
Public Street Lighting	6.88	5.53	4.37	2.51	37%	1.17	21%
LT Public Water Works	6.88	5.53	4.67	2.21	32%	0.86	16%
HT Public Water Works	6.88	5.53	5.23	1.65	24%	0.30	5%
LT Industrial Supply	6.88	5.53	3.43	3.45	50%	2.11	38%
HT Industrial Supply	6.88	5.53	3.86	3.02	44%	1.67	30%
HT-PIU Industrial Supply	6.88	5.53	4.58	2.30	34%	0.96	17%
General Purpose/ Bulk Supply	6.88	5.53	5.53	1.35	20%	0.00	0%
Average	6.88	5.53	3.69	3.19	46%	1.85	33%

- 7.4. The Commission is of the view that passing on the tariff hike to meet the entire revenue gap of FY 2016-17 i.e. Rs 2,537 Cr would lead to an increase in tariff by nearly 86%, which would amount to tariff shock.
- 7.5. Section 55 (g) of the J&K act 2010 provides that the tariff determined by the Commission shall progressively reflect the cost of supply of electricity and also reduce the cross subsidy within the period specified by the Commission. NTP 2016 restricts the cross subsidy within +/- 20% of the cost of supply while determining the tariff.
- 7.6. A trajectory for reduction of AT&C losses upto 15% by FY 2019-20 has been fixed for turnaround of the power sector in the J&K state under the UDAY scheme. Further, the Utility has committed to eliminate the gap between ACS and ARR by FY 2019-20. Achievement of these targets pre-supposes steady increase in tariff to offset incremental costs in supply of power and to reduce the revenue gap which has increased substantially over the years in case of the State power distribution utility.
- 7.7. It is pertinent to note that there has been no tariff hike in the state during FY 2014-15 and FY 2015-16. In fact, the State Government has reduced the electricity duty from 22% to 10% (12% reduction) which has given further relief to the consumers.
- 7.8. In the present scenario, each and every category of the consumer in the State, Government as well as Non- Government, is availing substantial subsidy ranging from 7% to 60% vis-à-vis the average cost of supply of the Utility for FY 2016-17 as indicated in the Table 164.





- 7.9. In view of the above, an increase in the tariff in the State is overdue so that it progressively matches the cost of supply in 4-5 years and to gradually reduce the ACS-ARR gap. Accordingly, while working towards achievement of this objective for considering tariff hike during FY 2016-17, it has been ensured that no tariff shock is given to the common consumer and the interest of weaker section, in particular, is adequately protected.
- 7.10. Thus, while the average increase in tariff has been restricted to 10% or below in case of common consumers (BPL-5%), the same has been revised appropriately to match the average cost of supply at the approved T&D loss levels in case of other category of consumers which don't deserve subsidy. Accordingly, the category-wise proposed and approved tariff for FY 2016-17 is as summarised in the following table:

Table 165: Category-wise proposed and approved tariff hike for FY 2016-17

Consumer Categories	Average CoS at proposed T&D loss level (42.40%)	Average CoS at approved T&D loss level (38.56%)	Existing average tariff for FY 2016- 17 before tariff revision	Tariff Hike proposed by the Petitioner (%)	Tariff Hike approved by the Commission (%)	Approved average tariff for FY 2016-17 after tariff revision
Domestic	8.03	6.88	2.77	23%	10%*	3.05
Non-Domestic/ Commercial	8.03	6.88	3.48	25%	10%	3.83
State/Central Govt. Dept.	8.03	6.88	6.42	0%	7%	6.88
Agriculture	8.03	6.88	3.05	14%	10%	3.35
Public Street Lighting	8.03	6.88	4.37	24%	60%	7.00
LT Public Water Works	8.03	6.88	4.67	36%	50%	7.00
HT Public Water Works	8.03	6.88	5.23	42%	34%	7.00
LT Industrial Supply	8.03	6.88	3.43	14%	10%	3.76
HT Industrial Supply	8.03	6.88	3.86	15%	9%	4.21
HT-PIU Industrial Supply	8.03	6.88	4.58	15%	11%	5.07
General Purpose/ Bulk Supply	8.03	6.88	5.53	11%	4.7%	5.79
Average	8.03	6.88	3.69	18%	13.5%	4.19

<sup>\*5%</sup> for the BPL category

7.11. Against the proposed total revenue demand projected at Rs. 3,313.58 Cr by JKPDD-D, the Commission has approved total revenue demand at Rs. 3,329.88 Cr at the approved tariffs (as detailed in Chapter 8: Tariff Design of this Order) and approved sales figures for FY 2016-17. The following table summarizes the category-wise revenue demand as proposed by Petitioner and approved by the Commission:

Table 166: Proposed and approved revenue demand for FY 2016-17 (Rs Cr)

Particulars	Proposed by Petitioner	Approved by Commission
Domestic	1124.61	1029.71
Non-Domestic/Commercial	423.63	374.37
Agriculture	114.84	119.29
State/ Central Govt. Department	543.28	592.33





Particulars	Proposed by Petitioner	Approved by Commission
Public Street Lighting	31.26	40.29
LT Industrial Supply	157.37	150.21
HT Industrial Supply	394.62	441.56
HT-PIU Industrial Supply	51.28	58.31
LT Public Water Works	282.88	313.22
HT Public Water Works	92.11	102.11
General Purpose Bulk	97.66	108.49
Total	3313.58	3329.88

7.12. The revenue gap for FY 2016-17 based on the approved values of gross ARR and the tariff as proposed by Petitioner and approved by the Commission has been summarized in the following table.

Table 167: Revenue Gap for FY 2016-17 (Rs Cr)

Particulars	Proposed by Petitioner	Approved by Commission
Aggregate Revenue Requirement	6384.33	5471.74
Revenue Realisation @ revised tariffs	3313.58	3329.88
Revenue Gap @ revised tariffs	3070.75	2141.85

- 7.13. The GoJK in its Power Budget Speech for FY 2016-17 announced that it shall provide a subsidy to the tune of Rs 1,728.37 Cr to the JKPDD-D. The Commission appreciates this step of the GoJK which shall ensure that the JKPDD-D graduates to a more transparent accounting system. Further, the Petitioner in the supplementary Petition duly supported by the letter from Director Finance, PDD, submitted that the GoJK shall provide the necessary support to the Utility to meet the revenue gap for FY 2016-17. Accordingly, in light of Section 59 of the J&K Electricity Act, 2010 and Regulation 35 of the JKSERC Distribution Tariff Regulations, 2012, GoJK shall provide subsidy of Rs 1,728.37 Cr and the remaining Operational Funding Requirement to be provided by the State Government would be Rs 413.48 Cr (i.e. Rs 2,141.85 - 1,728.37 Cr). The Commission directs that the subsidies proposed to be provided by the Government in terms of the announcements made in the Budget Speech shall be regulated strictly in terms of the provisions of the Section 59 of the Act read with the JKSERC Distribution Tariff Regulations, 2012. The Utility shall keep the Commission posted with the details.
- 7.14. At the approved tariff, the average gap with respect to the average cost of supply based on approved losses (of 38.56%) of Rs. 6.88/kWh comes to Rs.2.69/kWh which indicate dependence on subsidy/ Government support to the extent of 39%. Consumer category wise tariff is compared with the average cost of supply indicating the Government/ Subsidy dependence in the table provided below:





Table 168: Average CoS and approved average Tariff for FY 2016-17

Consumer Categories	Average CoS at approved T&D loss level (38.56%)	Approved Average Tariff	Ga	р
	Rs/kWh	Rs/kWh	Rs/kWh	%
Domestic	6.88	3.05	3.83	56%
Non-Domestic/ Commercial	6.88	3.83	3.04	44%
State/Central Govt. Dept.	6.88	6.88	(0.12)	(2%)
Agriculture	6.88	3.35	3.53	51%
Public Street Lighting	6.88	6.88	(0.12)	(2%)
LT Public Water Works	6.88	6.88	(0.12)	(2%)
HT Public Water Works	6.88	6.88	(0.12)	(2%)
LT Industrial Supply	6.88	3.76	3.12	45%
HT Industrial Supply	6.88	4.21	2.67	39%
HT-PIU Industrial Supply	6.88	5.07	1.81	26%
General Purpose/ Bulk Supply	6.88	6.06	1.09	16%
Average	6.88	4.19	2.69	39%

7.15. As stated earlier, the Commission has designed the tariffs for various categories with an objective of gradually reducing the cross subsidy with respect to average cost of supply. Accordingly, the Commission has gradually increased the coverage of average Cost of supply through category-wise average tariffs. The following table summarizes the category-wise percentage of average CoS at approved loss level of 38.56% covered through average tariff based on existing rates and approved rates.

Table 169: Average tariff as proportion of average cost of supply for FY 2016-17

Category	Average tariff at existing rates as proportion of Average CoS (%)	Average tariff at approved rates as proportion of Average CoS (%)	
Domestic	40%	44%	
Non-Domestic/ Commercial	51%	56%	
State/Central Govt. Dept.	93%	102%	
Agriculture	44%	49%	
Public Street Lighting	64%	102%	
LT Public Water Works	68%	102%	
HT Public Water Works	76%	102%	
LT Industrial Supply	50%	55%	
HT Industrial Supply	56%	61%	
HT-PIU Industrial Supply	67%	74%	
General Purpose/ Bulk Supply	80%	84%	
Total	54%	61%	





- 7.16. As a way forward, the Commission, here, would like to point out that JKPDD-D could increase their revenue collection by being more efficient in bringing down the T&D loss levels during the 2<sup>nd</sup> MYT Control period. For instance, if JKPDD brings down the loss level by 1% from the approved loss level of 38.56% (FY 2016-17), they will be able to generate greater energy sales, resulting in additional revenue to the tune of Rs. 47.76 Cr.
- 7.17. The revenues at the approved tariffs at different levels of T&D losses are provided below for demonstration:

Table 170: Revenues at different loss levels (estimated for FY 2016-17)

Particulars	Approved	Loss levels for demonstration		
T&D Loss Level	38.56%	30.00%	20.00%	15.00%
Energy Input (MU)	12,948	12,948	12,948	12,948
Sales in MU	7,955	9,064	10,359	11,006
Revenue (Rs Cr)*	3,330	3,794	4,336	4,607
Average Tariff (Rs/kWh)	4.19	4.19	4.19	4.19
Average CoS	6.88	6.04	5.28	4.97
Gap (Rs/kWh)	2.69	1.85	1.10	0.79

<sup>\*</sup>At average tariff rate based on approved tariffs





### **CHAPTER 8: TARIFF DESIGN**

## Issue 1: Bundling/ Unbundling of tariff slabs in various consumer categories

8.1 The Petitioner has proposed bundling/ merging of various slabs in the Domestic, Non-Domestic and Agriculture category. This proposal of merging various slabs has resulted in abnormal tariff increases in various lower consumption slabs as indicated in the following table:

Consumer Categories (existing Slabs)	Consumer Categories (proposed Slabs)	Effective Tariff Hike post merging of Slabs (%)
Domestic (Metered)		
up to 100 units per month	4 - 200	47.40%
101-200 units per month	up to 200 units per month	
Domestic (Un Metered)		
up to 1/4 KW	10 VIV	276.40%
1/4-1/2 KW	up to 1/2 KW	
1/2-3/4 KW	1/2 1 1/1	49.20%
3/4-1 KW	1/2-1 KW	
1-11/4KW		79.45%
11/4-11/2KW	1.2 274	50.40%
11/2-13/4KW	1-2 KW	29.45%
13/4-2KW		
Non-Domestic/ Commercial (Metered)		
101-200 units per month	101 200 4 / 4	64.44%
201-300 units/month	101-300 units/month	
Non-Domestic (Un Metered)		
up to 1/4 KW	10 VIII	192.82%
1/2-3/4 KW	up to 1/2 KW	49.21%

- 8.2 Contrary to the Utility's proposal of bundling various slabs in the present Petition, the Utility, in its earlier Tariff Petition, had proposed unbundling of various slabs for rationalization of tariff structure as they were facing critical problems at the ground level to revise the load. This was agreed to by the Commission, although reluctantly. Now, the Utility is proposing bundling/ merging of various slabs for which no rationale has been provided by the Utility.
- 8.3 Accordingly, the Commission finds no rationale in merging of the slabs as proposed by the Petitioner and decides to continue with the existing slabs as approved for FY 2015-16.





#### **Issue 2: Increase in fixed charges of various categories**

- 8.4 Nominal fixed charges were introduced a few years ago to incentivize the consumers to declare their load. This has resulted in increase in declared connected load of the Utility from 1700 MW in FY 2011-12 to nearly 3200 MW at the end of FY 2015-16.
- 8.5 In order to curb the high level of AT&C losses in the State, the Utility is in the process of regularizing the illegal as well as the flat rate consumers. In order to aid the Utility's drive for curbing of AT&C loss, the Commission decides to increase the fixed charges in some categories marginally in order to incentivize the consumers to declare their load.

### Issue 3: Time of Day (ToD) Tariff

8.6 The Petitioner has proposed to introduce ToD tariff for HT consumers in the State as DSM measure as a means of incentivizing consumers to shift a portion of their loads from peak times to off-peak times, thereby improving the system load factor, reduce the demand on the system during peak period and relieve system capacity constraints. ToD proposal of the Utility is as summarized below:

Table 171: Proposed ToD Charges for FY 2016-17 as submitted by Petitioner

Peak Hours	Surcharge on Energy Charges	Off Peak Hours	Rebate on Energy
0500-0900 Hrs. and 1800-2200 Hrs ( <b>8 hours</b> )	20%	0100-0500 Hrs* ( <b>4 hours</b> )	10%

<sup>#</sup> for other than peak and off-peak hours normal Energy Charges shall be applicable

- 8.7 The Commission had directed the Utility to submit detailed impact analysis of the ToD proposal on the load curve as well as the power purchase cost of the Utility. While replying to the Commission, the Utility seems to have backtracked on its earlier proposal and submitted vide letter no. CE/C&S/J/T-32/140 dated 7<sup>th</sup> April, 2016 that:
  - "...in the first phase the Department has proposed ToD Tariff only for the HT consumers which do not have a significant impact on the load curve of the Discom. The JKPDD-D will share the impact on power purchase cost of such a load curve when the ToD Tariff will be extended to include the Domestic and non-domestic consumers which constitute a significant portion of the consumers in the state..."
- 8.8 The Commission is of the view that ToD Tariff is one of the principle of the DSM which is adopted by the progressive utilities of the world.
- 8.9 Analysis of the load curve of the State shows a peak in demand during the evening, which is met through power purchases from high cost sources such as gas/diesel/naphtha based generation plants, traders, the Unscheduled Interchange (UI)/Deviation Settlement Mechanism (DSM) pool, etc. which are generally more expensive as compared to the base load stations.





<sup>\*</sup>The Petitioner has now revised the duration of off-peak hours to 6 hours i.e. from 2300-0500 hours

- 8.10 This increase in the power purchase costs leads to a higher cost of supply during the peak load hours. The Regulation 36 of the J&KSERC (Multi Year Distribution Tariff) Regulations, 2012 provides for implementation of Time-of-Day (TOD) tariffs as an instrument to provide signals to consumers and help the utility in maintaining a better system profile. The relevant extract has been summarized below:
  - "(3) The time of day tariff would be structured across three time slabs to denote normal, peak and off-peak periods. The time periods would vary according to different seasons of the year i.e. summer, winter and the monsoon season. The peak tariff would be 20%-30% higher than the normal tariff and the off-peak tariff would be priced 15%-20% lower than the normal tariff, as and when time of day tariff is introduced.
  - (4) Time of Day tariff shall be introduced in a phased manner, wherein in phase 1 it would be compulsory for HT Consumers, in phase 2 compulsory for LT consumers consuming more than 25 KW and in phase 3 compulsory for LT consumers consuming more than 10 KW.
  - (5) The peak and off-peak hours during seasons shall be as notified by the State Load Despatch Centres in advance."
- 8.11 Therefore, the Commission is of the view that ToD tariff regime should be introduced in the State beginning with HT consumers with load above 1 MVA getting supply at 33 KV level and above in the first phase. However, taking note of the concerns raised by various stakeholders during the public consultation process and ensuring that such a tariff regime serves its desired result of flattening the Utility's load curve and not as an additional source of revenue for the Utility, the Commission has kept the level of surcharge during peak hours and rebate during off peak hours at same level. Moreover, the duration for which peak hour surcharge and off peak hour rebate would be applicable has also been kept the same as summarized in the following table:

Table 172: Approved ToD Charges for FY 2016-17

Peak Hours	Surcharge on Energy Charges	Off Peak Hours	Rebate on Energy Charges
0600-0800 Hrs & 1800-2200 Hrs. ( <b>6 hours</b> )	10%	2300-0500 Hrs ( <b>6 hours</b> )	10%

 ${\it\#for\ other\ than\ peak\ and\ off-peak\ hours\ normal\ Energy\ Charges\ shall\ be\ applicable}$ 

- 8.12 The Commission directs the Utility to devise a transparent mechanism for billing of such consumers and submit to the Commission, within one month of notification of this Tariff Order, the format for billing devised by the Utility for the same.
- 8.13 The Commission also directs the Utility to monitor the impact of the ToD tariff on the load curve of the Utility on a month on month basis and submit a detailed impact analysis report to the Commission along with the next Tariff Petition.



#### **Issue 4: kVAh Tariff for all loads above 20 KW:**

- 8.14 kVAh tariff is already being applied to the consumers with loads above 100 KW and now JKPDD has proposed to extend the kVAh tariff to all loads above 20 KW. The kWh and kVAh tariff in each category have been proposed to be kept at par with each other so that at unity power factor there is no disparity in the charges paid by the consumers in the same category for same consumption.
- 8.15 As another measure for DSM, the Commission had earlier introduced kVAh tariffs for consumers with load above 100 KW. The Commission now decides to extend the kVAh tariffs to consumers with load above 50 KW in the Low Tension Industrial Supply category.
- 8.16 Further, the Commission has approved the kVAh tariffs at a discount to the kWh tariffs for the same category in order to incentivize the consumers to shift to the kVAh tariff regime.
- 8.17 The Commission directs the Utility to monitor the improvements in the system efficiency and impact on the Utility's load curve so the same could be extended for consumers with lower loads.
- 8.18 Further, Commission also directs the Petitioner to make all out efforts to ensure that the proposed infrastructure is in place for shifting other category of consumers to kVAh based tariffs in future and report on the compliance within six months from issue of this Order.





## **Domestic Supply**

#### **Applicability**

- 8.19 The Commission has fixed the applicability of the domestic tariff for supplies pertaining to domestic premises, religious institutions, group housing societies, orphanages, old-age and infirm homes, charitable institutions providing services free of cost or on nominal charges, post offices at residences of villagers and residential premises of architects, engineers, advocates, doctors, teachers, artists, weavers, stitching and embroidery workers occupying not more than 20% of built up area for respective professional purposes.
- 8.20 In addition, a separate Below Poverty Line (BPL) consumer category had been created to provide relief to socio-economic backward consumers for consumption upto 30 units/month. It should be noted that only those consumers will be included in the BPL category who would submit a BPL certificate from the Competent Authority of the State Government. In case consumption within this category exceeds beyond 30 units/ month, the consumption over and above 30 units/ month would be charged as per the applicable rates for domestic (metered) category in accordance with the relevant consumption slab.

#### **Character of Services**

- (a) Alternating current (A.C.) 50 Hz, 230 Volts, for Single-phase upto a load of 5 kW
- (b) A.C, 50 Hz, three phase, 400 volts for load above 5 kW upto 100 kW (115 kVA)
- 8.21 In the domestic category, JKPDD-D has proposed to merge various slabs besides proposing an increase in energy charges as well as fixed charges resulting in an overall tariff increase of 23% as summarized in the following table:

Tariff Category	Existing Tariff FY 2015-16	Tariff Category	Proposed Tariff FY 2016-17	% increase
Domestic				
Below Poverty Line (Consumption upto 30 units/month)		Below Poverty Line (Consumption upto 30 units/month)		
Energy Charges (Rs./kWh)	1.19	Energy Charges (Rs./kWh)	1.25	13.45%
Fixed Charges (Rs./kW or part thereof/ month)	5	Fixed Charges (Rs./kW or part thereof/ month)	5	0.00%
Metered (Rs./kWh)		Metered (Rs./kWh)		
up to 100 units per month	1.54	um to 200 surits man manth	2.27	47.40%
101-200 units per month	2	up to 200 units per month	2.21	13.50%
201-400 units per month	3	201-400 units per month	3.41	13.67%
>400 units per month	3.2	400-800 units per month	3.64	13.75%
		>800 units per month	4.2	31.25%





Tariff Category	Existing Tariff FY 2015-16	Tariff Category	Proposed Tariff FY 2016-17	% increase
Fixed Charges (Rs./kW or part		Fixed Charges (Rs./kW or		
thereof/ month) For all units	5	part thereof/ month) For all units	8	60.00%
Un Metered (Rs./month)		Un Metered (Rs./month)		
up to 1/4 KW	89	up to 1/2 KW	335	276.40%
1/4-1/2 KW	295	up 10 1/2 KW	333	13.56%
1/2-3/4 KW	445	1/2-1 KW	664	49.21%
3/4-1 KW	585	1/2 1 KW	001	13.50%
1-11/4KW	725			79.45%
11/4-11/2KW	865	1-2KW	1301	50.40%
11/2-13/4KW	1005	1-2KW	1301	29.45%
13/4-2KW	1145			13.62%
	Rs. 1,145 + Rs.460 for		Rs.1301+ Rs.460	
	every additional		for every additional	
Above 2 KW	1/4	Above 2 KW	1/4	13.62%
	kW or part		kW or part	
	thereof		thereof	
	above 2		above 2	
	kW		kW	

- 8.22 The Commission has approved an overall 10% increase in the energy charges as well as fixed charges for the metered consumers except for the BPL category, wherein the Commission has approved an increase of 5% in the energy charges.
- 8.23 In order to discourage Flat Rate tariffs and to encourage consumers to shift on to the metered connection and billing regime, the Commission has approved a higher tariff increase in all the slabs in the Flat Rate tariff for the domestic consumers. The Commission has approved a 11% hike in the various slabs in the Domestic Category Flat rate tariffs.

#### **Rate of Charge**

**Table 173: Approved Tariff for Domestic Supply** 

Description	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17
Below Poverty Line (Consumption upto 30 units/month)		
Energy charges (Rs./kWh)	1.19	1.25
Fixed Charges (Rs./KW or part thereof / month)	5.00	5.00
Metered Consumers		
Energy Charges for Metered Connection (Rs. / kWh)		
upto 100 units/ month	1.54	1.69
101- 200 units /month	2.00	2.20
201 - 400 units /month	3.00	3.30
> 400 units /month	3.20	3.52





Description	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17
Fixed Charges for contracted load (Rs./kW or part thereof / month)		
For all units	5.00	5.50
<b>Un-metered Consumers</b>		
Flat Rate (Rs. / month)		
upto 1/4 kW	89	99
above 1/4 kW upto 1/2 kW	295	325
above 1/2 kW upto 3/4 kW	445	495
above 3/4 kW upto 1 kW	585	650
	Rs. 585 + Rs.140 for every	Rs. 650 + Rs.155 for every
above 1 KW upto 2 KW	additional ¼ kW or part	additional ¼ kW or part
	thereof upto 2KW	thereof upto 2KW
above 2 kW	Rs. 1,145 + Rs.460 for every	Rs. 1,270 + Rs.510 for every
	additional ¼ kW or part	additional ¼ kW or part
	thereof above 2 kW	thereof above 2 kW

## Illustration for computation of electricity charges:

a) <u>Metered Connection:</u> Assuming connected load of 3.0 KW and monthly power consumption of 756 kWh

	Description	Electricity Rate (Rs/ kWh)	No. of units (kWh)	Total Charge (Rs)
	<b>Energy Charges for Metered Connection</b>			
(i)	upto 100 units/ month	1.69	100	169
(ii)	101- 200 units /month	2.20	100	220
(iii)	201 - 400 units /month	3.30	200	660
(iv)	> 400 units /month	3.52	356	1253.12
A	TOTAL ENERGY CHARGES		756	2,302.12
	Fixed Charges for contracted load	(Rs/ KW)	Load (KW)	Total Charge (Rs)
	For all units	5.50	3.0	16.5
В	TOTAL FIXED CHARGES		3.0	16.5
C	TOTAL CHARGES IN Rs. (A+B)			2,318.62*

<sup>\*</sup>Note: This excludes Electricity duty and any other cess levied by the State Government

## b) <u>Unmetered Connection:</u> Assuming connected load of 3.0 KW

	Description	Electricity Rate (Rs/month)	Total Charge (Rs)
	Flat Rate Tariff		
(i)	Above 2 KW	Rs. 1,270 + Rs.510 for every	1,270+(510*4) =3,310



Description	Electricity Rate (Rs/month)	Total Charge (Rs)
	additional ¼ kW	
	or part	
	thereof above	
	2KW	
TOTAL CHARGES IN Rs.		3,310*

\*Note: This excludes Electricity duty and any other cess levied by the State Government

- 8.24 Group housing societies can avail single point power supply. The energy bill of a housing society shall be divided by the number of houses in it, to determine the consumption in each house.
- 8.25 If there are 10 houses in a society the consumption shall be charged in the following manner: The first 1000 (100 x 10) units would be charged at Rs 1.54/unit; the next 1000 (100 x 10) units at Rs 2.00/unit; next 2000 (200 x 10) units at Rs 3.00/unit and the remaining units at Rs 3.20/unit along with fixed charges for entire load at Rs.5 per kW per month.
- 8.26 Any matter regarding supply to Group Housing societies should be as per the Regulations laid down in JKSERC (Supply Code) Regulations, 2011;
  - "4.120. The consumer shall not supply any energy supplied to him by the Licensee to another person or other premises unless he holds a suitable sanction or licence for distribution and sale of energy granted by the Commission/State Government or has been exempted by the Commission from holding license for sale.
  - 4.121. In case of commercial, office or residential complexes including residential complexes constructed by an employer for his employees, where power supply is availed originally in the name of the builder or promoter of the complex and who subsequently transfers the ownership of the complex, either entirely, to different individuals or partly to different individuals retaining the balance for lease, the power supply may be continued in the following methods.
  - i) The builder or promoter of the complex in whose name the supply continues, is permitted to extend power supply to the individual owners of the flats etc. or to the lessee by installing sub-meters and to collect the cost of consumption of power from them on no-profit no-loss basis (i.e. sharing of expenses of consumption of electricity) and this shall not be treated as unauthorized extension of supply or resale of energy.
  - ii) In case the promoter or builder of the complex does not wish to have any stake in the complex after promoting the complex, the service connection originally availed may be permitted to be transferred in the name of an Association or Society that may be formed in the complex and registered and the service agency so formed is permitted to extend supply to the individual owners of the flats etc. or lessees by installing sub-meters and to collect the cost for consumption of power from them on a no-profit no-loss basis (i.e. sharing of expenses of consumption of electricity) and this shall not be treated as unauthorized



extension or resale of energy.

Provided that the tariff charged from ultimate consumers should under no circumstance exceed that prescribed by the Commission for the respective tariff category.

4.122 A panchayat/cooperative or a registered association of consumers may apply for supply of electricity to a group of consumers at a single point. In such cases, the body that has taken the connection shall be responsible for all payments of electrical charges to the Licensee and for collection from the consumers. Provided that the provisions of this clause shall not in any way affect the right of a person residing in the housing unit sold or leased by such a Cooperative Group Housing Society to demand supply of electricity directly from the distribution licensee of the area. Provided that the tariff charged from ultimate consumers should under no circumstance exceed that prescribed by the Commission for the respective tariff category."







## **Non-Domestic/ Commercial Supply**

## **Applicability**

- 8.27 This tariff category shall be applicable to the following: shops, showrooms, business houses, offices, educational/ technical institutions, clubs, meeting halls, places of public entertainment, hotels, cinemas, hospitals, dispensaries, clinics, nursing homes, X-ray units, diagnostic centers, pathological labs, fisheries, aquaculture, sericulture, dairy, hatcheries, printing presses (other than those qualifying to be charged under the LT industrial supply category), milk chilling centers, poultry farms, cattle breeding farms, nurseries, plantations, mushroom growing, carpenters and furniture makers, juice centers, hoardings and advertisement services, typing institutes, internet cafes, STD/ ISD PCO's, FAX/ photocopy shops, tailoring shops, photo studios and color labs, laundries, cycle shops, compressors for filling air, restaurants, eating establishments, guest houses, marriage gardens, welding transformer and lathe machines for repair works and services, book binders, petrol pumps and service stations, lifts and other appliances in shopping centers and offices, tourist house boats, and similar other establishments.
- 8.28 In addition, any connection not covered under the other categories shall be billed under this category. However, this would exclude connections pertaining to State/Central Government or Defence services, which have been included in a separate category.

#### **Character of Services**

- (a) AC, 50 Hz, 230 Volts, Single-phase upto a load of 5 kW.
- (b) AC, 50 Hz, three phase, 400 volts supply for load above 5 kW upto 100 kW (115 kVA).
- 8.29 In the Non-domestic category, JKPDD-D has proposed to merge various slabs besides proposing an increase in energy charges as well as fixed charges resulting in an overall tariff increase of 25%. The Petitioner has also proposed to introduce kVAh tariff for all consumers with connected load above 20KW.
- 8.30 The proposal of the Petitioner is summarized in the following table:

Tariff Category	Existing Tariff FY 2015-16	Tariff Category	Proposed Tariff FY 2016-17	% increase
Non-Domestic/ Commercial				
Metered Connection		Metered Connection		
Single Phase		Single Phase		
up to 100 units/month	2.55	up to 100 units/month	2.9	13.73%
101-200 units/month	2.7	101-300 units/month	4.44	64.44%
201-300 units/month	3.9	101-300 uniis/monin	4.44	13.85%
>300 units per month	4.2	>300 units per month	4.78	13.81%
Three phase		Three phase		



Tariff Category	Existing Tariff FY 2015-16	Tariff Category	Proposed Tariff FY 2016-17	% increase
For all units	4.55	For all units	5.12	12.53%
Fixed Charges		Fixed Charges		
(Rs./kW/month)		(Rs./kW/month)		
Single Phase	40	Single Phase	48	20.00%
Three phase	95	Three phase	114	20.00%
Un Metered		Un Metered		
up to 1/4 KW	280	un to 1/2 VW	819.9	192.82%
1/4-1/2 KW	720	up to 1/2 KW	019.9	13.88%
1/2-1 KW	1430	1/2-1 KW	1628.41	13.87%
Above 1 KW*	1925	Above 1 KW*	2192.09	13.87%
* and part thereof for every kW above 1 kW	1925	* and part thereof for every kW above 1 kW	2192.09	13.87%
		For all loads >20kW, k	VAh tariff shall	be applicable

- 8.31 The Commission has approved an overall 10% increase in the energy charges as well as fixed charges for the metered consumers in the Non-domestic/commercial category.
- 8.32 In order to discourage Flat Rate tariffs and to encourage consumers to shift on to the metered connection and billing regime, the Commission has approved a higher tariff increase in all the slabs in the Flat Rate tariff for the non-domestic/commercial consumers. The Commission has approved a 11% hike in the various slabs in the Non-Domestic Category Flat rate tariffs.

Table 174: Approved Tariff for Non Domestic/ Commercial Supply

Particulars	Existing Tariff for FY 2015-16	Revised Tariff for FY 2016-17	
Metered Non-Domestic Tariff			
Energy Charges (Rs./KWh)			
Single Phase			
Upto 100 units/month	2.55	2.81	
101 to 200 units/month	2.70	2.97	
201 to 300 units/month	3.90	4.29	
Above 300 units/month	4.20	4.62	
Three Phase			
For all units	4.55	5.01	
Fixed Charges (Rs. / kW / month)  Load (in kW) to be rounded off to the next 1/2 kW for the purpose of application of Fixed Charges.  (Example: 0.25 kW to be charges as 0.5 kW and 1.2 kW to be charged as 1.5 kW and so on.)  For connections with sanctioned load below 100kW (115 kVA) supplied and metered on HT, 5% rebate on energy charges of Non-Domestic/Commercial Tariff shall be allowed.			
Single Phase	40.00	44.00	
Three Phase	95.00	104.50	





Particulars	Existing Tariff for FY 2015-16	Revised Tariff for FY 2016-17
Un-Metered Non-Domestic Tariff		
Flat Rate Charges (Rs. / month)		
Upto 1/4 kW	280	310
above 1/4 kW upto 1/2 kW	720	800
above 1/2 kW upto 1 kW	1,430	1,587
above 1 kW and part thereof for every kW above 1 kW	1,925	2,136

- 8.33 Any matter regarding supply to Commercial Complexes with Single Point Delivery/supply should be as per the Regulations laid down in JKSERC (Supply Code) Regulations, 2011;
  - "4.120. The consumer shall not supply any energy supplied to him by the Licensee to another person or other premises unless he holds a suitable sanction or licence for distribution and sale of energy granted by the Commission/State Government or has been exempted by the Commission from holding license for sale.
  - 4.121. In case of commercial, office or residential complexes including residential complexes constructed by an employer for his employees, where power supply is availed originally in the name of the builder or promoter of the complex and who subsequently transfers the ownership of the complex, either entirely, to different individuals or partly to different individuals retaining the balance for lease, the power supply may be continued in the following methods.
  - i) The builder or promoter of the complex in whose name the supply continues, is permitted to extend power supply to the individual owners of the flats etc. or to the lessee by installing sub-meters and to collect the cost of consumption of power from them on no-profit no-loss basis (i.e. sharing of expenses of consumption of electricity) and this shall not be treated as unauthorized extension of supply or resale of energy.
  - ii) In case the promoter or builder of the complex does not wish to have any stake in the complex after promoting the complex, the service connection originally availed may be permitted to be transferred in the name of an Association or Society that may be formed in the complex and registered and the service agency so formed is permitted to extend supply to the individual owners of the flats etc. or lessees by installing sub-meters and to collect the cost for consumption of power from them on a no-profit no-loss basis (i.e. sharing of expenses of consumption of electricity) and this shall not be treated as unauthorized extension or resale of energy.

Provided that the tariff charged from ultimate consumers should under no circumstance exceed that prescribed by the Commission for the respective tariff category.

4.122 A panchayat/cooperative or a registered association of consumers may apply





for supply of electricity to a group of consumers at a single point. In such cases, the body that has taken the connection shall be responsible for all payments of electrical charges to the Licensee and for collection from the consumers. Provided that the provisions of this clause shall not in any way affect the right of a person residing in the housing unit sold or leased by such a Cooperative Group Housing Society to demand supply of electricity directly from the distribution licensee of the area. Provided that the tariff charged from ultimate consumers should under no circumstance exceed that prescribed by the Commission for the respective tariff category."







## **State/ Central Government Departments**

## **Applicability**

- 8.34 The Commission has fixed the applicability of the State/ Central Government department category to all connections including educational/technical institutions, taken by Departments of the State and the Central Governments, defence and para-military forces excluding public sector enterprises/ undertakings.
- 8.35 This shall not include connections taken for agricultural purposes, water pumping and street lighting by the Central/ State Government Departments for which tariffs provided in the appropriate tariff schedules shall apply.

#### **Character of Services**

- (a) AC, 50 Hz, 230 Volts; Single-phase upto a load of 5 KW
- (b) AC, 50 Hz, three phase; 400 volts supply for sanctioned load above 5 KW upto 100 KW (115 KVA)
- (c) AC, 50 Hz, three phase; 11 KV supply for sanctioned load above 100 kW (115 KVA) upto 1 MVA
- (d) AC, 50 Hz, three phase; 33 KV and above supply for sanctioned load above 1 MVA
- 8.36 The Petitioner has not proposed any hike for this category of consumers. The Petitioner has however proposed to introduce kVAh based tariff for consumers with load above 20KW.
- 8.37 The Commission has designed the tariff of this category keeping in mind the average cost of supply of the Utility for FY 2016-17 at approved T&D losses, which works out to Rs 6.88/kWh. Accordingly, the Commission has approved 9% increase in the energy charges while no hike in fixed charges has been approved for this category of consumers.

Table 175: Approved Tariff for State/ Central Government Departments

Particulars	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17		
Energy Charges (Rs./ kWh)	6.30	6.88		
11 kV Supply	2.5% rebate on energy charges			
33 kV and above Supply	5.0% rebate on energy charges			
Fixed Charges Rs./ kW				
Load (in kW) to be rounded off to the next whole number for the purpose of application of Fixed Charges.				
For metered consumers	30.00	30.00		







## **Agricultural Supply**

## **Applicability**

8.38 The Commission has fixed applicability of the agricultural tariff to agricultural loads and lift irrigation connections including threshers. This is also applicable to State Govt. lift irrigation and pumping loads in this category.

#### **Character of Services**

- (a) AC, 50 Hz, 230 Volts, Single-phase upto a load of 5 KW (6.70 HP)
- (b) AC, 50 Hz, three phase, 400 volts supply for sanctioned load upto 100 KW (134 HP)
- (c) AC, 50 Hz, three phase, 11kV supply for sanctioned load above 100 KW (134 HP) upto 1 MVA
- (d) AC,50 Hz, three phase, 33/66 KV supply for sanctioned load above 1 MVA
- 8.39 In the agriculture supply category, JKPDD-D has proposed to merge various slabs besides proposing an increase in energy charges as well as fixed charges resulting in an overall tariff increase of 14% as summarized in the following table:

Tariff Category	Existing Tariff FY 2015-16	Tariff Category	Proposed Tariff FY 2016-17	% increase
Agriculture				
Metered				
Energy Charges (Rs./KWh) *		Energy Charges Rs./KWh) *		
0-10 HP	0.6	Connected load <= 20 HP	0.74	23.33%
11-20 HP	0.65	(in Rs./kWH)	0.74	13.85%
Above 20 HP	4.75	Connected Load > 20 HP (in Rs./kVAh)	5.42	14.11%
Fixed Charges for connected load (Rs/HP/month)		Fixed Charges for connected load (Rs/HP/month)		
0-10 HP	15	Unto 20 HB	20	33.33%
11-20 HP	20	Upto 20 HP	20	0.00%
Above 20 HP	40	Above 20 HP	40	0.00%
Un Metered (Rs/HP/month)				
0-10 HP	185	Unto 20 HB	229	23.24%
11-20 HP	200	Upto 20 HP	228	14.00%
Above 20 HP	1275	Above 20 HP	1454	14.04%

8.40 For the metered category, the Commission has approved an 10% increase in the energy charges while no hike has been approved in the fixed charges for the consumers in the Non-domestic/commercial category.



8.41 In order to discourage Flat Rate tariffs and to encourage consumers to shift on to the metered connection and billing regime, the Commission has approved a higher tariff increase in all the slabs in the Flat Rate tariff for the non-domestic/commercial consumers. The Commission has approved a 11% hike in the various slabs in the Agriculture supply Category Flat rate tariffs.

**Table 176: Approved Tariff for Agriculture Supply** 

Particulars	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17
Metered Tariff		
Energy Charges (Rs./KWh) *		
0 to 10 HP	0.60	0.66
11 to 20 HP	0.65	0.72
Above 20 HP	4.75	5.23
Fixed Charges for connected load (Rs/HP/month)		
0 - 10 HP	15.00	15.00
11 to 20 HP	20.00	20.00
Above 20 HP	40.00	40.00
* 2.5% & 5% rebate on Energy Charges for connection a	t 11 kV and 33 kV and	above respectively.
Flat Rate Un-metered for connected load (Rs./HP month)		
0 to 10 HP	185	205.35
11 to 20 HP	200	222.00
Above 20 HP	1,275	1,415.25







## **Public Street Lighting**

## **Applicability**

8.42 The tariffs for this category will be applicable to public street lighting established and maintained by Corporations, Municipalities, Town Area/ Notified Area Committees, other local bodies and agencies authorized by the State Government to establish and maintain public street lighting.

#### **Character of Services**

- (a) AC, 50 Hz, 230 Volts, Single-phase upto a load of 5 kW;
- (b) AC, 50 Hz, three phase, 400 volts supply for load above 5 kW.
- 8.43 For the metered category, the Petitioner has proposed 26% in the energy charges and 20% increase in the fixed charges. While for the flat rate category, a hike of 124% has been proposed by the Petitioner resulting in an overall increase of 24% in the public street light category as summarized in the table below. The Petitioner has also proposed to introduce kVAh tariff for all consumers with connected load above 20KW.

Tariff Category	Existing Tariff FY 2015-16	Proposed Tariff FY 2016-17	% increase
<b>Public Street Lighting</b>			
Metered connection			
Energy Charge (Rs./kWH)	5	6.3	26.00%
Fixed Charge (Rs./kW)	40	48	20.00%
Unmetered connection			
(Rs./kW/month or part thereof)	1350	3024	124.00%
		For loads above 20KW, applicable	kVAh tariff shall be

- 8.44 The Commission has designed the tariff of this category keeping in mind the average cost of supply of the Utility for FY 2016-17 at approved T&D losses, which works out to Rs 6.88/kWh.
- 8.45 In order to discourage Flat Rate tariffs and to encourage consumers to shift on to the metered connection and billing regime, the Commission has approved a higher tariff increase in all the slabs in the Flat Rate tariff for the non-domestic/commercial consumers. The Commission has approved a 137% hike in the various slabs in the public street light category Flat rate tariffs.





8.46 The Commission further directs that the Petitioner should convert all the unmetered consumers in this category into metered consumers within a time span of one year from the date of notification of this Order. The Commission shall not approve any tariff for unmetered consumption in this category from the next financial year onwards.

**Table 177: Approved Tariff for Public Street Lighting** 

Particulars	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17	
Metered Tariff			
Energy Charge			
Rs./ KWh	5.00	7.10	
Fixed Charge  Load (in kW) to be rounded off to the next whole number for the purpose of application of Fixed Charges			
Rs./ KWh (for metered consumers)	40.00	55.00	
Un-metered Tariff			
Rs./ kW/ month or any part thereof	1,350	3,200	







## LT Public Water Works

## **Applicability**

8.47 The tariffs for this consumer category shall apply to water works and sewerages/drainage installations established and maintained by Corporations, Municipalities, Town Area/ Notified Area Committees, other local bodies and Government agencies authorized by the State Government to establish and maintain public water works/ sewerage installations.

#### **Character of Services**

- (a) AC, 50 Hz, 230 Volts, Single-phase upto a load of 5 KW (6 kVA)
- (b) AC, 50 Hz, three phase, 400 volts supply for sanctioned load upto 100 KW
- 8.48 For the metered category, the Petitioner has proposed 14.05% in the energy charges and 20% increase in the fixed charges. While for the flat rate category, a hike of 203% has been proposed by the Petitioner resulting in an overall increase of 36% in the LT public water works category as summarized in the table below. The Petitioner has also proposed to introduce kVAh tariff for all consumers with connected load above 20KW.

Tariff Category	Existing Tariff FY 2015-16	Proposed Tariff FY 2016-17	% increase
LT public water works			
Metered connection			
Energy Charge (Rs./kWH)	5.55	6.33	14.05%
Fixed Charge (Rs./kW)	45	54	20.00%
Unmetered connection			
(Rs./kW/month or part thereof)	1465	4439	124.00%
		For all loads >20kW, kVAh tariff shall be applicable	

8.49 The Commission has designed the tariff of this category keeping in mind the average cost of supply of the Utility for FY 2016-17 at approved T&D losses, which works out to Rs 6.88/kWh.

### Rate of Charge

Table 178: Approved Tariff for LT Public Water Works

Particulars	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17
Metered Tariff		
Energy Charge		
For all Units (Rs./ KWh)	5.55	6.87
Fixed Charges		







# MYT Order for 2<sup>nd</sup> MYT Control Period FY 2016-17 to FY 2020-21 and retail tariff for FY 2016-17

Particulars	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17
Load (in kW) to be rounded off to the next whole number	per for the purpose of app	olication of Fixed Charges
For metered consumers (Rs./ kW/ month)	45.00	50.00
Un-metered Charge		
Rs. / kW /month	1,465	-







#### **HT Public Water Works**

# **Applicability**

7.1 The tariffs for this consumer category shall apply to water works and sewerages/drainage installations established and maintained by Corporations, Municipalities, Town Area/ Notified Area Committees, other local bodies and Government agencies authorized by the State Government to establish and maintain public water works/ sewerage installations.

#### **Character of Services**

- (a) AC, 50 Hz, three phase; 11 kV supply for load upto 1 MVA.
- (b) AC, 50 Hz, three phase; 33 kV and above supply for sanctioned load above 1 MVA
- 7.2 The Petitioner has proposed 45.06% in the energy charges and 20% increase in the demand charges for the consumers in the HT public water works category resulting in an overall increase of 37%. While for the flat rate category, a hike of 203% has been proposed by the Petitioner resulting in an overall increase of 42% in the LT public water works category as summarized in the following table:

Tariff Category	Existing Tariff FY 2015-16	Proposed Tariff FY 2016-17	% increase
HT public water works			
Metered connection (11 KV supply)			
Energy Charge (Rs./kWH)	3.95	5.73	45.06%
Demand Charge (Rs./kVA/month)	220	264	20.00%
Metered connection (33 KV and above)			
Energy Charge (Rs./kWH)	3.75	5.44	45.06%
Demand Charge (Rs./kVA/month)	210	252	20%

- 7.3 The Commission has approved an increase of 37% in the energy charges and 10% in the fixed charges for this category.
- 7.4 The Commission has ensured that the tariff for this category of consumers is lower than the tariff for LT public water works as cost of supply for this category shall be lower owing to lower levels of losses in the HT system.





# **Rate of Charge**

**Table 179: Approved Tariff for HT Public Water Works** 

Particulars	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17		
Metered Consumers				
11 kV Supply				
Energy Charge (Rs./ kVAh) *	3.95	5.41		
Demand Charge (Rs./ kVA/ Month) *^	220	242		
* For Connections above 100 kW metered on LT, Additional 5% Surcharge on Demand and Energy Charges at 11 KV tariff shall be chargeable  ^ Or part thereof on billing demand				
33 kV and above Supply				
Energy Charge (Rs./ kVAh)	3.75	5.14		
Demand Charge (Rs./ kVA/ Month) ^	210	231		
^ Or part thereof on billing demand				





# LT Industrial Supply

# **Applicability**

- 7.5 The Commission has decided that LT industrial supply shall be applicable to all units registered with the Industries & Commerce Department, Government of J&K, and covered under the Factories Act. The list of entities covered shall include various industrial installations and workshops with manufacturing facilities, where raw materials are converted to finished goods. This shall mean and include all energy consumed in factory, offices, stores, canteen, compound lighting, etc. and the consumption for residential use therein.
- 7.6 LTIS II shall be applicable to "Atta Chakkis, Rice huskers, Oil expellers, cotton grinning" in rural and unorganized sector having load upto 15 HP (11.19 kW). LTIS I would include all LT industrial consumers except those covered under LTIS II.

#### **Character of Services**

- (a) AC, 50 Hz, 230 Volts, single-phase upto a load of 5 kW.
- (b) AC, 50 Hz, three phase, 400 volts supply for sanctioned load upto 100 kW
- 7.7 The Petitioner has proposed increase of 13.67% in the energy charges for LTIS-I and LTIS-II. While an increase of 19.15% and 25.0% in the fixed charges for LTIS-I and LTIS-II categories respectively has been proposed resulting in an overall increase in tariff of 14%.

Tariff Category	Existing Tariff FY 2015-16	Proposed Tariff FY 2016-17	% increase
LT industrial supply			
LTIS-I			
Energy Charge (Rs./kWh)	3.00	3.41	13.67%
Fixed Charge (Rs./kW/month)	47	56	19.15%
LTIS-II			
Energy Charge (Rs./kWh)	3.00	3.41	13.67%
Fixed Charge (Rs./kW/month)	20	25	25.00%

- 7.8 The Commission has approved a 10% increase in the energy charges and 5% increase in the fixed charges for LT industrial supply category.
- 7.9 Moreover, the Commission has introduced kVAh tariff for all the consumers in this category with connected load above 50 KW.





Table 180: Approved Tariff for LT Industrial Category

Particulars	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17	
LTIS I (for all metered consumers except those covered under LTIS II)			
For consumers with connected load < 50 KW			
Energy Charges (Rs./KWh)	3.00	3.30	
Fixed Charges (Rs./kW/month) ^	47	50.00	
For consumers with connected load > 50 KW, kVAh tariff shall be	e applicable		
Energy Charges (Rs./kVAh) *	#	3.09	
Fixed Charges (Rs./kVA/month) ^	#	47.00	
* For Connections with sanctioned load below 100 kW supplied and metered on HT, 5% rebate on Energy Charges shall be allowed.  ^ Load (in kW) to be rounded off to the next whole number for the purpose of application of Fixed Charges.			
LTIS II (for all metered consumers and having load up to 15 HP			
Energy Charges (Rs./KWh)	3.00	3.30	
Fixed Charges (Rs./kW/month) ^	20	21.00	
* For Connections with sanctioned load below 100 kW supplied and metered on HT, 5% rebate on Energy Charges shall be allowed.  ^ Load (in kW) to be rounded off to the next whole number for the purpose of application of Fixed Charges.			

<sup>#</sup>There was no differentiation between charges for consumers with connected below 50KW and consumers with connected load above 50KW in FY 2015-16. All the consumers were billed under kWh tariff







# **HT Industrial Supply**

# **Applicability**

7.10 HT industrial supply shall be applicable to all units registered with the Industries department, Government of J&K, and covered under the Factories Act. The list of entities covered shall include various industrial installations and workshops with manufacturing facilities, where raw materials are converted to finished goods. This shall mean and include all energy consumed in factory, offices, stores, canteen, compound lighting, etc. and residential use therein, excluding power intensive industries.

#### **Character of Services**

- (a) AC, 3 phase; 50 Hz on 11 KV with sanctioned load above 100 kW upto 1 MVA
- (b) AC, 3 phase; 50 Hz, 33 KV and above for sanctioned load of 1 MVA and above
- 7.11 The Petitioner has proposed increase of 13.4% in the energy charges and 20% increase in demand charges for all the consumers in this category resulting in an overall increase in tariff of 15%.

Tariff Category	Existing Tariff FY 2015-16	Proposed Tariff FY 2016-17	% increase
HT Industrial Supply			
Metered Connection (11 KV supply)			
Energy Charge (Rs./kWH)	2.68	3.04	13.4%
Demand Charge (Rs./kVA/month)	130	156	20.00%
Metered Connection (33 KV supply and above)			
Energy Charge (Rs./kWH)	2.60	2.95	13.4%
Demand Charge (Rs./kVA/month)	130	156	20%

7.12 The Commission has approved an increase of 10% in the energy charges and 5% in the fixed charges for HT industrial supply category.

Table 181: Approved Tariff for HT Industrial Category

Particulars	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17
11 kV Supply		
Energy Charge (Rs./ KVAh) *	2.68	2.95
Demand Charge (Rs./ kVA/ Month) *^	130	136.5

 $<sup>\</sup>ast$  For Connections with sanctioned load above 100 kW metered on LT, Additional 5% Surcharge on Demand & Energy Charges at 11 KV tariff shall be chargeable;

<sup>^</sup> Or part thereof on Billing Demand







Particulars	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17
33 kV Supply#		
Energy Charge (Rs./ KVAh)**	2.60	2.86
Demand Charge (Rs./ kVA/ month) ^	130	136.50

<sup>#</sup> ToD tariff applicable





<sup>\*\*</sup> Rebate to Connections at higher voltages: For  $66\ kV-1.5\%$  on the Energy Charge for  $33\ kV$  Supply;

<sup>^</sup> Or part thereof on Billing Demand

<sup>(</sup>a) The billing demand for any month shall be taken to be the higher of the actual maximum recorded demand or 75% of the Contract Demand.

<sup>(</sup>b) The demand in excess of contracted load shall be billed in accordance with para nos. 11.10, 11.11 and 11.12 of the Chapter 11: Terms and Conditions of Tariff/Definitions of this Order.

# **HT Industrial Supply for Power Intensive Industries**

# **Applicability**

- 7.13 The Commission has decided that HT Industrial Supply for Power Intensive Industries shall be applicable to all units registered with the Industries & Commerce Department, Government of J&K, and covered under the Factories Act. This category shall apply to HT consumers manufacturing any one of the following products and/ or industries engaged in any one or more of the processes listed below and/ or using induction/ arc furnaces. This shall mean and include all energy consumed in factory, offices, stores, canteen, compound lighting, etc. and the consumption for residential use therein.
  - (a) Calcium carbide
  - (b) Caustic soda
  - (c) Charge chrome
  - (d) Ferro manganese
  - (e) Ferro silicon
  - (f) Ferro alloys
  - (g) Potassium chlorate
  - (h) Silicon carbide
  - (i) Sodium chlorate
  - (j) Sodium metal
  - (k) Chlorates/ per chlorates
  - (l) Melting of metals and alloys
  - (m) Industries engaged in electro-chemical/electro-thermal processes
  - (n) Industries using induction/ arc furnace
  - (o) In other cases, where the cost of power is more than 25% of the cost of the product manufactured.

#### **Character of Services**

(a) AC, 3 phase; 50 Hz, 11 KV upto 1 MVA





- (b) AC, 3 phase; 50 Hz, 33 KV and above for load of 1 MVA and above
- 7.14 The Petitioner has proposed increase of 13.4% in the energy charges and 20% increase in demand charges for all the consumers in this category resulting in an overall increase in tariff of 15%.

Tariff Category	Existing Tariff FY 2015-16	Proposed Tariff FY 2016-17	% increase
HT PIU			
11 KV supply			
Energy Charge (Rs./kWh)	3.21	3.64	13.4%
Demand Charge (Rs./kVA/month)	195	234	20.00%
33 KV and above supply#			
Energy Charge (Rs./kWh)	2.98	3.38	13.4%
Demand Charge (Rs./kVA/month)	190	228	20%

7.15 The Commission has approved an average tariff hike of 11% for the HT PIU category.

Table 182: Approved Tariff for HT Industrial Supply for Power Intensive Industries

Particulars	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17		
11 kV Supply				
Energy Charge (Rs./ kVAh)	3.21	3.60		
Demand Charge (Rs./ kVA/ Month) ^	195	205		
^ Or part thereof on Billing Demand				
33 kV Supply#				
Energy Charge (Rs./ kVAh) *	2.98	3.34		
Demand Charge (Rs./ kVA/ month) ^	190	200		
#ToD tariff applicable				
* Rebate to Connections at higher voltages: For 66 kV – 1.5% on the Energy Charge for 33 kV Supply;				
^ Or part thereof on Billing Demand				

- (a) The billing demand for any month shall be taken to be the higher of the actual maximum recorded demand or 75% of the Contract Demand.
- (b) The demand in excess of contracted load shall be billed in accordance with para nos. 11.10, 11.11 and 11.12 of the Chapter 11: Terms and Conditions of Tariff/Definitions of this Order.





# **General Purpose Bulk Supply**

# **Applicability**

- 7.16 This category contains all non-industrial consumers having mixed type of load greater than 100 kW (115 kVA). This includes domestic consumers, offices, educational/ technical institutions, religious institutions, residential colonies, commercial establishments and other similar loads.
- 7.17 All connections having load of 100 kW or above and not covered in any other categories shall be billed under tariffs applicable to this category. However, any such connections belonging to State/ Central Governments, Defence and Paramilitary forces shall not be considered in this category.

#### **Character of Services**

- (a) AC, 3 phase; 50 Hz on 11 KV upto 1 MVA.
- (b) AC, 3 phase; 50 Hz on 33 KV and above for load of 1 MVA and above
- 7.18 The Petitioner has proposed increase of 13.4% in the energy charges while no hike has been proposed for demand charges for the consumers in this category resulting in an overall increase in tariff of 11%.

Tariff Category	Existing Tariff FY 2015-16	Proposed Tariff FY 2016-17	% increase
Bulk Supply			
11 KV supply			
Energy Charge (Rs./kWH)	3.78	4.29	13.4%
Demand Charge (Rs./kVA/month)	193	193	0%
33 KV supply and above			
Energy Charge (Rs./kWH)	3.62	4.11	13.5%
Demand Charge (Rs./kVA/month)	187	187	0%

7.19 The Commission has approved an average hike of 4.7% for this category.

# **Rate of Charge**

Table 183: Approved Tariff for General Purpose Bulk Supply

Particulars	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17	
11 kV Supply			
Energy Charge (Rs./ kVAh) *	3.78	4.00	
Demand Charge (Rs./ kVA/ Month) *^	193	193	
* For Connections above 100 kW metered on LT, Additional 5% Surcharge on Demand and Energy Charges at 11 KV tariff shall be chargeable  ^ Or part thereof on Billing Demand			
33 KV Supply			
Energy Charge (Rs./ kVAh)**	3.62	3.85	





Particulars	Existing Tariff for FY 2015-16	Approved Tariff for FY 2016-17	
Demand Charge (Rs./ kVA/ month) ^	187	187	
** Rebate to Connections at higher voltages: For 66 kV – 1.5% on the Energy Charge for 33 kV Supply;  ^ Or part thereof on Billing Demand			

- (a) The billing demand for any month shall be taken to be the higher of the actual maximum recorded demand or 75% of the Contract Demand.
- (b) The demand in excess of contracted load shall be billed in accordance with para nos. 11.10, 11.11 and 11.12 of the Chapter 11: Terms and Conditions of Tariff/Definitions of this Order.





# LT and HT Temporary Connections

# **Applicability**

7.20 The Commission has fixed the applicability of this category to all loads of temporary nature, such as exhibitions, touring talkies, circuses, fairs, marriages, temporary agricultural loads, temporary supply for construction including civil works by Government departments and other similar purposes.

# **Rate of Charge**

7.21 The Commission has approved the tariff for temporary connections at 1.5 times the applicable rates (on fixed/ demand and energy charges).

# **Time Period for Temporary Connection**

7.22 Temporary connections shall be granted for a period of upto 3 months at a time. However, if the period of temporary connection is extended beyond 3 months, the tariff would be two times of the applicable fixed/demand and energy charges.







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#### **CHAPTER 9: DIRECTIVES**

9.1 The Commission, based on its analysis of the Petition and the compliance to previous directives submitted by the Petitioner along with information and suggestions received during the public consultation process on the functioning of the Petitioner, directs the Petitioner to comply with the following directives:

## Directive

# ACTION PLAN FOR MEETING THE MILESTONES AGREED WITH GOI UNDER UDAY

The JKPDD-D has entered into a Memorandum of Understanding with the Ministry of Power, Government of India under the UDAY (Ujjwal Discom Assurance Yojna) scheme for operational and financial turnaround of the Utility. Under the scheme, the Utility has committed to achieve the following operational milestones:

Milestone	Timeline
100% Feeder Metering	30 June 2016
100% DT Metering	30 June 2017
Energy Audit upto 11 KV levels in rural areas	31 March 2017
Feeder Improvement Programme	March 2017
Physical Feeder Segregation	March 2018
Smart Meters for consumers (other than agriculture) consuming above 500 units/ month	31 December 2017
Smart Meters for consumers (other than agriculture) consuming above 200 units/ month	31 December 2019
Electricity Access to 3.56 lacs unconnected households	FY 2019-20
Implementing ERP systems	March 2017
Replacing atleast 10% of agriculture pumps with energy efficient pumps	March 2019
Providing 80 Lacs LED bulbs for domestic and other categories under DELP program	FY 2017-18

#### Directive 1

The Commission directs the Utility to submit a detailed action plan for implementation/achievement of above operational milestones agreed by the Utility under the UDAY scheme. The action plan shall be submitted within one (1) month of notification of this Order.

Further, as directed by the Commission vide D.O. No. JKSERC/ PS/06 dated 26<sup>th</sup> April, 2016, for installation of smart meters as envisaged under the UDAY scheme, the Petitioner should take undertake a detailed cost benefit analysis in light of the experience gained elsewhere in the country and also the protocol/ specification, if any, standardised by the CEA for equipment/communication. Besides procurement of meters, it would also involve development of supporting infrastructure which based on the past experiences in the State of J&K, may be a costlier and a time consuming affair. Since System and consumer metering holds key to the implementation of power reforms for turnaround of the power sector in the State, the issue may need priority consideration.

Besides, the Utility is directed to submit the monthly monitoring formats as specified in the Bipartite MoU executed by the Utility with the GOI, to the Commission.



Directive					
	SUBSIDIES TO BE PROVIDED BY THE STATE GOVERNMENT				
Directive 2  The Commission directs that the subsidies proposed to be provided by the Gotterms of the announcements made in the Budget Speech shall be regulated strong the provisions of the Section 59 of the Act read with the JKSERC Distraction Regulations, 2012. The Utility shall keep the Commission posted with the decided and the subsidies proposed to be provided by the Gotter and the Section 59 of the Act read with the JKSERC Distraction and the subsidies proposed to be provided by the Gotter and the Section 59 of the Act read with the JKSERC Distraction and the Section 59 of the Act read with the JKSERC Distraction and the Section 59 of the Act read with the JKSERC Distraction and the Section 59 of the Act read with the JKSERC Distraction and the Section 59 of the Act read with the JKSERC Distraction and the Section 59 of the Act read with the JKSERC Distraction and the Section 59 of the Act read with the JKSERC Distraction and the Section 59 of the Act read with the JKSERC Distraction and the Section 59 of the Act read with the JKSERC Distraction and the Section 59 of the Act read with the JKSERC Distraction and the Section 59 of the Act read with the JKSERC Distraction and the Section 59 of the Act read with the JKSERC Distraction and the Section 59 of the Act read with the Section 59 of the Act rea					
	CAPITAL INVESTMENT AND CAPITALIZATION PLAN ALONG WITH DETAILS OF SOURCE OF FUNDING				
Directive 3	The Commission in the past has observed that the Petitioner has not been able to undertake the capital expenditure as planned. For better monitoring of the capital investment plan drawn by the Petitioner, the Commission directs the Petitioner to submit the details of the physical and financial milestones/ targets along with progress achieved vis-à-vis the action plan on strengthening of distribution infrastructure and reducing the T&D losses, as projected by the Petitioner in the Petition, on a quarterly basis.				
	ONLINE BILLING AND E-PAYMENTS AGAINST BILLS				
Directive 4	The Commission directs the Petitioner to explore more options regarding online bill information and its downloading and payment of bills which could be in terms of e-payment through Net Banking, credit/debit cards, kiosks, mobile collection vans etc.				
	PRE-PAID METERING				
Directive 5	The Commission directs the Petitioner to prepare a roadmap for installation of prepaid meters in the State. For starters, the Utility may begin with installation of pre-paid meters in all Government installations. The Utility may also explore installation of pre-paid meters in various Group Housing Societies.				
	The Utility is directed to submit a report/ roadmap in this regard within six (6) months of issuance of this Tariff Order.				
	FEEDER WISE ACCOUNT OF LOSSES AND LINKING POWER CURTAILMENT TO LOSSES				
Directive 6	The Commission directs the Utility to conduct feeder-wise energy audit and consumer indexing for estimating the base T&D loss level. Subsequently, the Petitioner should identify feeders with high loss levels and develop a holistic loss reduction plan for reducing distribution losses on such feeders.				
	The Petitioner is also directed to develop a transparent mechanism for linking the load curtailment or shedding on a feeder to the proportion of the level of the losses on that feeder.  NO GOVERNMENT INSTALLATIONS WITHOUT ENERGY METERS				
Directive 7	The Commission directs the Utility to ensure that there are no Government installations in the State without proper energy meters. The Commission further directs that there would not tariff for unmetered consumers in Public Street Lights category after a period of one year from the date of issuance of this Tariff Order.				
	TOD TARIFF				
	The Commission has introduced ToD tariff in the State for consumers with load above 1 MVA connected at 33KV level and above.				
Directive 8	The Commission directs the Utility to devise a transparent mechanism for billing of such consumers and submit to the Commission, within one month of notification of this Tariff Order, the format for billing devised by the Utility for the same.				
	The Commission also directs the Utility to monitor the impact of the ToD tariff on the load curve of the Utility on a month on month basis and submit a detailed impact analysis report to the Commission along with the next Tariff Petition.				



Directive				
	kVAh TARIFF			
Directive 9	The Commission has now introduced kVAh tariffs for consumers with load above 50 KW. The Commission directs the Utility to monitor the improvements in the system efficiency and impact on the Utility's load curve/reactive energy drawal so the same could be extended for consumers with lower loads.  Further, Commission also directs the Petitioner to make all out efforts to ensure that the proposed infrastructure is in place for shifting other category of consumers to kVAh based tariffs in future and report on the compliance within six months from issue of this Order.			
	DEMAND SIDE MANAGEMENT MEASURES			
Directive 10	The J&K SERC (Multi Year Distribution Tariff) Regulations, 2012 provide that the Petitioner should develop a comprehensive power purchase and procurement plan after accounting for DSM plan. Hence, the Commission directs the Petitioner to submit a detailed DSM Plan highlighting procurement as well as installation/ distribution of the 80 Lacs LED lamps for under the DELP program as agreed by the Utility under the UDAY scheme, along with the next APR/Tariff Petition.			
	The Petitioner is also directed to undertake consumer awareness programmes for optimum utilisation of resources and to foster long term behavioural changes.			
	ESTABLISHMENT OF CGRF/ CUSTOMER CARE CENTRE			
Directive 11	The Commission notes with concern that the state of J&K is amongst the only two States in the country who do not have a Consumer Grievance Redressal Forum (CGRF)/Ombudsman. The Commission, in the earlier Orders, had repeatedly directed the Petitioner, to establish CGRF as per the provisions of Sec 36 (5) of the J&K Electricity Act, 2010 and also establish Coordination Forum and District Committees as per the provisions of Sec 128 of the Act in order to provide a forum to the consumers for redressal of their grievances and to bring in efficiency and transparency in the system.  The Utility submitted that Government of J&K has accorded sanction to Constitution of Committee to recommend modalities to implement the provisions regarding Consumer Grievance Redressal Forum (CGRF) as per the State Electricity Act 2010 and Jammu & Kashmir State Electricity Regulatory Commission (Consumer Redressal Forum, Ombudsman and Consumer Advocacy) Regulations, 2012.  The Commission directs the Petitioner to expedite the steps for making the CGRF operational and submit a report in this regard within 3 months of the issue of this Order.			
	<u>Customer Care Centre</u>			
	The Commission also directs the Petitioner to setup a Centralised Customer Care Centre for timely resolution of complaints of the consumer. The telephone numbers for the same should be given wide publicity.			
	POWER PROCUREMENT			
Directive 12	The Commission has observed that the Utility is procuring costly power from various generating stations. The Petitioner is directed to explore options for offloading of costly Power Purchase Agreements (PPAs). The Petitioner is also directed to not opt for costly unallocated quota of Government of India for procurement of power as power at much cheaper rates is available from various alternative sources.			
	The Commission also directs the Utility that if there is any short term requirement of power over and above the tied up power available from long term sources as approved by the Commission and such requirement is on account of any factor beyond the control of the			



#### Directive

Licensee such as shortage/non-availability of fuel, snow capping of hydro resources inhibiting power generation in sources stipulated in the plan, unplanned/forced outages of power generating units or acts of God etc., then the Utility shall procure such short term requirement of power only through a transparent mechanism.

Moreover, as per notification No 23/2/4/2015- R&R of the Ministry of Power, Government of India, all future procurement of power for short term is required to be done through ebidding portal only, by the procurer(s) themselves or through Authorised representative from  $4^{th}$  April, 2016, onwards.

#### RENEWABLE PURCHASE OBLIGATION (RPO)

The Commission directs the Petitioner to open a separate account for meeting the annual fixed obligation of renewable energy, which shall include carry forward balances and purchase of RECs to meet shortfall, if any. Further, no diversion of funds earmarked for meeting the RPO targets would be allowed by the Commission.

The Commission also directs the Petitioner to ensure that it meets its RPO targets by initiating timely action for inviting competitive bids for procurement of solar/ non-solar power or alternately purchase RECs.

#### **Directive 13**

The Petitioner submitted that the Government has given its consent for purchase of bundled power (thermal with solar) from NTPC. Accordingly, JKPDD is pursuing purchase of 300 to 400 MW of bundled power from Sangrauli station of NTPC. This tie up will enable department to meet the solar power purchase obligation. The Commission directs the Petitioner to expedite the process for purchase of same and keep the Commission posted with the progress.

Moreover, as per the UDAY scheme, the Discoms need to comply with the RPO outstanding since 1<sup>st</sup> April, 2012 within a period to be decided in consultation with MoP. The details of the shortfall in RPO compliance of JKPDD-D since FY 2012-13 have been worked out in this Order. The Utility is directed to take note of the same as the necessary Orders on this behalf are being issued by the Commission separately.

#### TIMELY FILING OF TARIFF PETITIONS

The Commission had directed the Petitioner to set up a special cell to attend to regulatory affairs in order to monitor timely implementation of the directions issued by the Commission and also to file the Tariff Petitions on time. As the Petitioner has failed to establish such regulatory cell, the Commission takes strong objection to the non-serious attitude of the Petitioner towards compliance of the directive issued by the Commission. The Commission shall be forced to take punitive measures against the Petitioner, under Sections 102 and 106 of the J&K Electricity Act, 2010, for its inaction.

#### Directive 14

The Commission takes strong objection to the fact that the Utility has time and again failed to adhere to the timelines of Regulatory filings as stipulated in the Conduct of Business, Regulations 2005/MYT Distribution Tariff Regulations, 2012.

The Commission directs the Petitioner to file the Petitions on time, in the future. If the Petitioner fails to do so, the Commission shall be forced to initiate Suo-motu proceedings for determination of tariff besides taking penal action against the Utility.



#### **CHAPTER 10: TARIFF SCHEDULE FOR FY 2016-17**

# **Schedule 1: Domestic Supply**

## **Applicability**

- 10.1 The Commission has fixed the applicability of the domestic tariff for supplies pertaining to domestic premises, religious institutions, group housing societies, orphanages, old-age and infirm homes, charitable institutions providing services free of cost or on nominal charges, post offices at residences of villagers and residential premises of architects, engineers, advocates, doctors, teachers, artists, weavers, stitching and embroidery workers occupying not more than 20% of built up area fo respective professional purposes.
- In addition, a separate Below Poverty Line (BPL) consumer category has been created to provide relief to socio-economic backward consumers for consumption upto 30 units/month. It should be noted that only those consumers will be included in the BPL category who would submit a BPL certificate from the Competent Authority of the State Government. In case consumption within this category exceeds beyond 30 units/ month, the consumption over and above 30 units/ month would be charged as per the applicable rates for domestic (metered) category in accordance with the relevant consumption slab.

#### **Character of Services**

- (a) Alternating current (A.C.) 50 Hz, 230 Volts, for Single-phase upto a load of 5 kW
- (b) A.C, 50 Hz, three phase, 400 volts for load above 5 kW upto 100 kW (115 kVA)

**Table 184: Approved Tariff for Domestic Supply** 

Description	Approved Tariff for FY 2016-17
Below Poverty Line (Consumption upto 30 units/month)	
Energy charges (Rs./KWh)	1.25
Fixed Charges (Rs./kW or part thereof / month)	5.00
Metered Consumers	
Energy Charges for Metered Connection (Rs. / KWh)	
upto 100 units/ month	1.69
101- 200 units /month	2.20
201 - 400 units /month	3.30
> 400 units /month	3.52
Fixed Charges for contracted load (Rs./kW or part thereof / month)	
For all units	5.50







Description	Approved Tariff for FY 2016-17
<b>Un-metered Consumers</b>	
Flat Rate (Rs. / month)	
upto 1/4 kW	99
above 1/4 kW upto 1/2 kW	325
above 1/2 kW upto 3/4 kW	495
above 3/4 kW upto 1 kW	650
1 1 V.W 2 V.W.	Rs. 650 + Rs.155 for every additional 1/4
above 1 KW upto 2 KW	kW or part thereof upto 2KW
above 2 kW	Rs. 1,270 + Rs.510 for every additional <sup>1</sup> / <sub>4</sub>
	kW or part thereof above 2 kW

# Illustration for computation of electricity charges:

a) <u>Metered Connection:</u> Assuming connected load of 3.0 KW and monthly power consumption of 756 kWh

	Description	Electricity Rate (Rs/ kWh)	No. of units (kWh)	Total Charge (Rs)
	<b>Energy Charges for Metered Connection</b>			
(i)	upto 100 units/ month	1.69	100	169
(ii)	101- 200 units /month	2.20	100	220
(iii)	201 - 400 units /month	3.30	200	660
(iv)	> 400 units /month	3.52	356	1253.12
A	TOTAL ENERGY CHARGES		756	2,302.12
	Fixed Charges for contracted load	(Rs/ KW)	Load (KW)	Total Charge (Rs)
	For all units	5.50	3.0	16.5
В	TOTAL FIXED CHARGES		3.0	16.5
C	TOTAL CHARGES IN Rs. (A + B)			2,318.62*

<sup>\*</sup>Note: This excludes Electricity duty and any other cess levied by the State Government

# b) <u>Unmetered Connection:</u> Assuming connected load of 3.0 KW

	Description	Electricity Rate (Rs/month)	Total Charge (Rs)
	Flat Rate Tariff		
(i)	Above 2 KW	Rs. 1,270 + Rs.510 for every additional ¼ kW or part thereof above 2KW	1,270+(510*4) =3,310
	TOTAL CHARGES IN Rs.		3,310*

<sup>\*</sup>Note: This excludes Electricity duty and any other cess levied by the State Government





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- Group housing societies can avail single point power supply. The energy bill of a 10.3 housing society shall be divided by the number of houses in it, to determine the consumption in each house.
- 10.4 If there are 10 houses in a society the consumption shall be charged in the following manner: The first 1000 (100 x 10) units would be charged at Rs 1.54/unit; the next 1000 (100 x 10) units at Rs 2.00/unit; next 2000 (200 x 10) units at Rs 3.00/unit and the remaining units at Rs 3.20/unit along with fixed charges for entire load at Rs.5 per kW per month.
- 10.5 Any matter regarding supply to Group Housing societies should be as per the Regulations laid down in JKSERC (Supply Code) Regulations, 2011;
  - "4.120. The consumer shall not supply any energy supplied to him by the Licensee to another person or other premises unless he holds a suitable sanction or licence for distribution and sale of energy granted by the Commission/State Government or has been exempted by the Commission from holding license for sale.
  - 4.121. In case of commercial, office or residential complexes including residential complexes constructed by an employer for his employees, where power supply is availed originally in the name of the builder or promoter of the complex and who subsequently transfers the ownership of the complex, either entirely, to different individuals or partly to different individuals retaining the balance for lease, the power supply may be continued in the following methods.
  - iii) The builder or promoter of the complex in whose name the supply continues, is permitted to extend power supply to the individual owners of the flats etc. or to the lessee by installing sub-meters and to collect the cost of consumption of power from them on no-profit no-loss basis (i.e. sharing of expenses of consumption of electricity) and this shall not be treated as unauthorized extension of supply or resale of energy.
  - iv) In case the promoter or builder of the complex does not wish to have any stake in the complex after promoting the complex, the service connection originally availed may be permitted to be transferred in the name of an Association or Society that may be formed in the complex and registered and the service agency so formed is permitted to extend supply to the individual owners of the flats etc. or lessees by installing sub-meters and to collect the cost for consumption of power from them on a no-profit no-loss basis (i.e. sharing of expenses of consumption of electricity) and this shall not be treated as unauthorized extension or resale of energy.

Provided that the tariff charged from ultimate consumers should under no circumstance exceed that prescribed by the Commission for the respective tariff category.

4.122 A panchayat/cooperative or a registered association of consumers may apply for supply of electricity to a group of consumers at a single point. In such cases, the body that has taken the connection shall be responsible for all payments of electrical

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charges to the Licensee and for collection from the consumers. Provided that the provisions of this clause shall not in any way affect the right of a person residing in the housing unit sold or leased by such a Cooperative Group Housing Society to demand supply of electricity directly from the distribution licensee of the area. Provided that the tariff charged from ultimate consumers should under no circumstance exceed that prescribed by the Commission for the respective tariff category."





# Schedule 2: Non-Domestic/ Commercial Supply

# **Applicability**

- This tariff category shall be applicable to the following: shops, showrooms, business houses, offices, educational/ technical institutions, clubs, meeting halls, places of public entertainment, hotels, cinemas, hospitals, dispensaries, clinics, nursing homes, X-ray units, diagnostic centers, pathological labs, fisheries, aqua-culture, sericulture, dairy, hatcheries, printing presses (other than those qualifying to be charged under the LT industrial supply category), milk chilling centers, poultry farms, cattle breeding farms, nurseries, plantations, mushroom growing, carpenters and furniture makers, juice centers, hoardings and advertisement services, typing institutes, internet cafes, STD/ ISD PCO's, FAX/ photocopy shops, tailoring shops, photo studios and color labs, laundries, cycle shops, compressors for filling air, restaurants, eating establishments, guest houses, marriage gardens, welding transformer and lathe machines for repair works and services, book binders, petrol pumps and service stations, lifts and other appliances in shopping centers and offices, tourist house boats, and similar other establishments.
- 10.7 In addition, any connection not covered under the other categories shall be billed under this category. However, this would exclude connections pertaining to State/ Central Government or Defence services, which have been included in a separate category.

#### **Character of Services**

- (a) AC, 50 Hz, 230 Volts, Single-phase upto a load of 5 kW.
- (b) AC, 50 Hz, three phase, 400 volts supply for load above 5 kW upto 100 kW (115 kVA).

# **Rate of Charge**

Table 185: Approved Tariff for Non Domestic/ Commercial Supply

Particulars	Approved Tariff for FY 2016-17	
Metered Non-Domestic Tariff		
Energy Charges (Rs./KWh)		
Single Phase		
Upto 100 units/month	2.81	
101 to 200 units/month	2.97	
201 to 300 units/month	4.29	
Above 300 units/month	4.62	
Three Phase		
For all units	5.01	

Fixed Charges (Rs. / kW / month)

Load (in kW) to be rounded off to the next 1/2 kW for the purpose of application of Fixed Charges. (Example: 0.25 kW to be charges as 0.5 kW and 1.2 kW to be charged as 1.5 kW and so on.)







Particulars	Approved Tariff for FY 2016-17
For connections with sanctioned load below 100kW (115 kVA) supplied and metered on HT, 5% rebat on energy charges of Non-Domestic/Commercial Tariff shall be allowed.	
Single Phase	44.00
Three Phase	104.50
<b>Un-Metered Non-Domestic Tariff</b>	
Flat Rate Charges (Rs. / month)	
Upto 1/4 kW	310
above 1/4 kW upto 1/2 kW	800
above 1/2 kW upto 1 kW	1,587
above 1 kW and part thereof for every kW above 1 kW	2,136

- 10.8 Any matter regarding supply to Commercial Complexes with Single Point Delivery/supply should be as per the Regulations laid down in JKSERC (Supply Code) Regulations, 2011;
  - "4.120. The consumer shall not supply any energy supplied to him by the Licensee to another person or other premises unless he holds a suitable sanction or licence for distribution and sale of energy granted by the Commission/State Government or has been exempted by the Commission from holding license for sale.
  - 4.121. In case of commercial, office or residential complexes including residential complexes constructed by an employer for his employees, where power supply is availed originally in the name of the builder or promoter of the complex and who subsequently transfers the ownership of the complex, either entirely, to different individuals or partly to different individuals retaining the balance for lease, the power supply may be continued in the following methods.
  - iii) The builder or promoter of the complex in whose name the supply continues, is permitted to extend power supply to the individual owners of the flats etc. or to the lessee by installing sub-meters and to collect the cost of consumption of power from them on no-profit no-loss basis (i.e. sharing of expenses of consumption of electricity) and this shall not be treated as unauthorized extension of supply or resale of energy.
  - iv) In case the promoter or builder of the complex does not wish to have any stake in the complex after promoting the complex, the service connection originally availed may be permitted to be transferred in the name of an Association or Society that may be formed in the complex and registered and the service agency so formed is permitted to extend supply to the individual owners of the flats etc. or lessees by installing sub-meters and to collect the cost for consumption of power from them on a no-profit no-loss basis (i.e. sharing of expenses of consumption of electricity) and this shall not be treated as unauthorized extension or resale of energy.

Provided that the tariff charged from ultimate consumers should under no circumstance exceed that prescribed by the Commission for the respective tariff category.





4.122 A panchayat/cooperative or a registered association of consumers may apply for supply of electricity to a group of consumers at a single point. In such cases, the body that has taken the connection shall be responsible for all payments of electrical charges to the Licensee and for collection from the consumers. Provided that the provisions of this clause shall not in any way affect the right of a person residing in the housing unit sold or leased by such a Cooperative Group Housing Society to demand supply of electricity directly from the distribution licensee of the area. Provided that the tariff charged from ultimate consumers should under no circumstance exceed that prescribed by the Commission for the respective tariff category."





# **Schedule 3: State/ Central Government Departments**

# **Applicability**

- 10.9 The Commission has fixed the applicability of the State/ Central Government department category to all connections including educational/technical institutions, taken by Departments of the State and the Central Governments, defence and paramilitary forces excluding public sector enterprises/ undertakings.
- 10.10 This shall not include connections taken for agricultural purposes, water pumping and street lighting by the Central/ State Government Departments for which tariffs provided in the appropriate tariff schedules shall apply.

#### **Character of Services**

- (a) AC, 50 Hz, 230 Volts; Single-phase upto a load of 5 kW
- (b) AC, 50 Hz, three phase; 400 volts supply for sanctioned load above 5 kW upto 100 kW (115 kVA)
- (c) AC, 50 Hz, three phase; 11 kV supply for sanctioned load above 100 kW (115 kVA) upto 1 MVA
- (d) AC, 50 Hz, three phase; 33 kV and above supply for sanctioned load above 1 MVA

**Table 186: Approved Tariff for State/ Central Government Departments** 

Particulars Approved Tariff for FY 20	
Energy Charges (Rs./ KWh)	6.88
11 kV Supply	2.5% rebate on energy charges
33 kV and above Supply	5.0% rebate on energy charges
Fixed Charges Rs./ kW  Load (in kW) to be rounded off to the next whole number for the purpose of application of Fixed Charges.	
For metered consumers	30.00







# **Schedule 4: Agricultural Supply**

# **Applicability**

10.11 The Commission has fixed applicability of the agricultural tariff to agricultural loads and lift irrigation connections including threshers. This is also applicable to State Govt. lift irrigation and pumping loads in this category.

# **Character of Services**

- (a) AC, 50 Hz, 230 Volts, Single-phase upto a load of 5 KW (6.70 HP)
- (b) AC, 50 Hz, three phase, 400 volts supply for sanctioned load upto 100 KW (134 HP)
- (c) AC, 50 Hz, three phase, 11kV supply for sanctioned load above 100 KW (134 HP) upto 1 MVA
- (d) AC,50 Hz, three phase, 33/66kV supply for sanctioned load above 1 MVA

**Table 187: Approved Tariff for Agriculture Supply** 

Particulars	Approved Tariff for FY 2016-17	
Metered Tariff		
Energy Charges (Rs./KWh) *		
0 to 10 HP	0.66	
11 to 20 HP	0.72	
Above 20 HP	5.23	
Fixed Charges for connected load (Rs/HP/month)		
0 - 10 HP	15.00	
11 to 20 HP	20.00	
Above 20 HP	40.00	
* 2.5% & 5% rebate on Energy Charges for connection at 11 kV and 33 kV and above respectively.		
Flat Rate Un-metered for connected load (Rs./HP month)		
0 to 10 HP	205.35	
11 to 20 HP	222.00	
Above 20 HP	1,415.25	







# **Schedule 5: Public Street Lighting**

# **Applicability**

10.12 The tariffs for this category will be applicable to public street lighting established and maintained by Corporations, Municipalities, Town Area/ Notified Area Committees, other local bodies and agencies authorized by the State Government to establish and maintain public street lighting.

## **Character of Services**

- (a) AC, 50 Hz, 230 Volts, Single-phase upto a load of 5 kW;
- (b) AC, 50 Hz, three phase, 400 volts supply for load above 5 kW.

**Table 188: Approved Tariff for Public Street Lighting** 

Particulars	Approved Tariff for FY 2016-17
Metered Tariff	
Energy Charge	
Rs./ KWh	7.10
Fixed Charge Load (in kW) to be rounded off to the next whole number for the purpose of application of Fixed Charges	
Rs./ KWh (for metered consumers)	55.00
Un-metered Tariff	
Rs./ kW/ month or any part thereof	3,200







# **Schedule 6: LT Public Water Works**

# **Applicability**

10.13 The tariffs for this consumer category shall apply to water works and sewerages/drainage installations established and maintained by Corporations, Municipalities, Town Area/ Notified Area Committees, other local bodies and Government agencies authorized by the State Government to establish and maintain public water works/sewerage installations.

#### **Character of Services**

- (a) AC, 50 Hz, 230 Volts, Single-phase upto a load of 5 kW (6 kVA)
- (b) AC, 50 Hz, three phase, 400 volts supply for sanctioned load upto 100 kW

**Table 189: Approved Tariff for LT Public Water Works** 

Particulars	Approved Tariff for FY 2016-17
Metered Tariff	
Energy Charge	
For all Units (Rs./ KWh)	6.87
Fixed Charges Load (in kW) to be rounded off to the next whole number for the purpose of application of Fixed Charges	
For metered consumers (Rs./ kW/ month)	50.00
Un-metered Charge	
Rs. / kW /month	-







# **Schedule 7: HT Public Water Works**

# **Applicability**

10.14 The tariffs for this consumer category shall apply to water works and sewerages/drainage installations established and maintained by Corporations, Municipalities, Town Area/ Notified Area Committees, other local bodies and Government agencies authorized by the State Government to establish and maintain public water works/sewerage installations.

#### **Character of Services**

- (a) AC, 50 Hz, three phase; 11 kV supply for load upto 1 MVA.
- (b) AC, 50 Hz, three phase; 33 kV and above supply for sanctioned load above 1 MVA

Table 190: Approved Tariff for HT Public Water Works

Particulars	Approved Tariff for FY 2016-17
Metered Consumers	
11 kV Supply	
Energy Charge (Rs./ KVAh) *	5.41
Demand Charge (Rs./ kVA/ Month) *^	242
* For Connections above 100 kW metered on LT, Additional 5% Surcharge on Demand and Energy Charges at 11 KV tariff shall be chargeable  ^ Or part thereof on billing demand	
33 kV and above Supply	
Energy Charge (Rs./ KVAh)	5.14
Demand Charge (Rs./ kVA/ Month) ^	231
^ Or part thereof on billing demand	







# **Schedule 8: LT Industrial Supply**

# **Applicability**

- 10.15 The Commission has decided that LT industrial supply shall be applicable to all units registered with the Industries & Commerce Department, Government of J&K, and covered under the Factories Act. The list of entities covered shall include various industrial installations and workshops with manufacturing facilities, where raw materials are converted to finished goods. This shall mean and include all energy consumed in factory, offices, stores, canteen, compound lighting, etc. and the consumption for residential use therein.
- 10.16 LTIS II shall be applicable to "Atta Chakkis, Rice huskers, Oil expellers, cotton grinning" in rural and unorganized sector having load upto 15 HP (11.19 kW). LTIS I would include all LT industrial consumers except those covered under LTIS II.

#### **Character of Services**

- (a) AC, 50 Hz, 230 Volts, single-phase upto a load of 5 kW.
- (b) AC, 50 Hz, three phase, 400 volts supply for sanctioned load upto 100 kW

Table 191: Approved Tariff for LT Industrial Category

Tuble 151. Approved Turni for DI madastral Category		
Particulars	Approved Tariff for FY 2016-17	
LTIS I		
(for all metered consumers except those covered under LTIS II)		
For consumers with load <50 KW		
Energy Charges (Rs./KWh)	3.30	
Fixed Charges (Rs./kW/month) ^	50.0	
For consumers with load >50 KW, kVAh tariff shall be applicable		
Energy Charges (Rs./kVAh)	3.09	
Fixed Charges (Rs./kVA/month) ^	47	
* For Connections with sanctioned load below 100 kW supplied and metered on HT, 5% rebate on Energy Charges shall be allowed.  ^ Load (in kW) to be rounded off to the next whole number for the purpose of application of Fixed Charges.		
LTIS II		
(for all metered consumers and having load up to 15 HP		
Energy Charges (Rs./KWh) *	3.30	
Fixed Charges (Rs./kW/month) ^	21.00	
* For Connections with sanctioned load below 100 kW supplied and metered on HT, 5% rebate on Energy Charges shall be allowed.  ^ Load (in kW) to be rounded off to the next whole number for the purpose of application of Fixed Charges.		







# **Schedule 9: HT Industrial Supply**

# **Applicability**

10.17 The Commission has decided that HT industrial supply shall be applicable to all units registered with the Industries department, Government of J&K, and covered under the Factories Act. The list of entities covered shall include various industrial installations and workshops with manufacturing facilities, where raw materials are converted to finished goods. This shall mean and include all energy consumed in factory, offices, stores, canteen, compound lighting, etc. and residential use therein, excluding power intensive industries.

#### **Character of Services**

- (a) AC, 3 phase; 50 Hz on 11 KV with sanctioned load above 100 kW upto 1 MVA
- (b) AC, 3 phase; 50 Hz, 33 KV and above for sanctioned load of 1 MVA and above

Table 192: Approved Tariff for HT Industrial Category

Particulars	Approved Tariff for FY 2016-17
11 KV Supply	
Energy Charge (Rs./ KVAh) *	2.95
Demand Charge (Rs./ kVA/ Month) *^	136.5
* For Connections with sanctioned load above 100 kW metered on LT, Additional 5% Surcharge on Demand & Energy Charges at 11 KV tariff shall be chargeable;  ^ Or part thereof on Billing Demand	
33 KV Supply#	
Energy Charge (Rs./ KVAh)**	2.86
Demand Charge (Rs./ kVA/ month) ^	136.50
#ToD tariff applicable	
** Rebate to Connections at higher voltages: For 66 kV – 1.5% on the Energy Charge for 33 kV Supply;	
^ Or part thereof on Billing Demand	

- (a) The billing demand for any month shall be taken to be the higher of the actual maximum recorded demand or 75% of the Contract Demand.
- (b) The demand in excess of contracted load shall be billed in accordance with para nos. 11.10, 11.11 and 11.12 of the Chapter 11: Terms and Conditions of Tariff/Definitions of this Order.





# Schedule 10: HT Industrial Supply for Power Intensive Industries

# **Applicability**

- 10.18 The Commission has decided that HT Industrial Supply for Power Intensive Industries shall be applicable to all units registered with the Industries & Commerce Department, Government of J&K, and covered under the Factories Act. This category shall apply to HT consumers manufacturing any one of the following products and/ or industries engaged in any one or more of the processes listed below and/ or using induction/ arc furnaces. This shall mean and include all energy consumed in factory, offices, stores, canteen, compound lighting, etc. and the consumption for residential use therein.
  - (a) Calcium carbide
  - (b) Caustic soda
  - (c) Charge chrome
  - (d) Ferro manganese
  - (e) Ferro silicon
  - (f) Ferro alloys
  - (g) Potassium chlorate
  - (h) Silicon carbide
  - (i) Sodium chlorate
  - (j) Sodium metal
  - (k) Chlorates/ per chlorates
  - (l) Melting of metals and alloys
  - (m) Industries engaged in electro-chemical/electro-thermal processes
  - (n) Industries using induction/ arc furnace
  - (o) In other cases, where the cost of power is more than 25% of the cost of the product manufactured.

#### **Character of Services**

(a) AC, 3 phase; 50 Hz, 11 KV upto 1 MVA





(b) AC, 3 phase; 50 Hz, 33 KV and above for load of 1 MVA and above

Table 193: Approved Tariff for HT Industrial Supply for Power Intensive Industries

Particulars	Approved Tariff for FY 2016-17
11 KV Supply	
Energy Charge (Rs./ kVAh)	3.60
Demand Charge (Rs./ kVA/ Month) ^	205
^ Or part thereof on Billing Demand	
33 KV Supply#	
Energy Charge (Rs./ kVAh) *	3.34
Demand Charge (Rs./ kVA/ month) ^	200
# ToD tariff applicable	
* Rebate to Connections at higher voltages: For 66 kV – 1.5% on the Energy Charge for 33 kV Supply;	
^ Or part thereof on Billing Demand	

- (a) The billing demand for any month shall be taken to be the higher of the actual maximum recorded demand or 75% of the Contract Demand.
- (b) The demand in excess of contracted load shall be billed in accordance with para nos. 11.10, 11.11 and 11.12 of the Chapter 11: Terms and Conditions of Tariff/Definitions of this Order.







# Schedule 11: General Purpose Bulk Supply

# **Applicability**

- 10.19 This category contains all non-industrial consumers having mixed type of load greater than 100 kW (115 kVA). This includes domestic consumers, offices, educational/ technical institutions, religious institutions, residential colonies, commercial establishments and other similar loads.
- 10.20 All connections having load of 100 kW or above and not covered in any other categories shall be billed under tariffs applicable to this category. However, any such connections belonging to State/ Central Governments, Defence and Para-military forces shall not be considered in this category.

#### **Character of Services**

- (a) AC, 3 phase; 50 Hz on 11 KV upto 1 MVA.
- (b) AC, 3 phase; 50 Hz on 33 KV and above .for load of 1 MVA and above

Table 194: Approved Tariff for General Purpose Bulk Supply

Particulars	Approved Tariff for FY 2016-17
11 KV Supply	
Energy Charge (Rs./ kVAh) *	4.00
Demand Charge (Rs./ KVA/ Month) *^	193
* For Connections above 100 kW metered on LT, Additional 5% Surcharge on Demand and Energy Charges at 11 KV tariff shall be chargeable  ^ Or part thereof on Billing Demand	
33 KV Supply	
Energy Charge (Rs./ kVAh)**	3.85
Demand Charge (Rs./ kVA/ month) ^	187
** Rebate to Connections at higher voltages: For $66  kV - 1.5\%$ on the Energy Charge for 33 kV Supply; ^ Or part thereof on Billing Demand	

- (a) The billing demand for any month shall be taken to be the higher of the actual maximum recorded demand or 75% of the Contract Demand.
- (b) The demand in excess of contracted load shall be billed in accordance with para nos. 11.10, 11.11 and 11.12 of the Chapter 11: Terms and Conditions of Tariff/Definitions of this Order.





# **Schedule 12: LT and HT Temporary Connections**

# **Applicability**

10.21 The Commission has fixed the applicability of this category to all loads of temporary nature, such as exhibitions, touring talkies, circuses, fairs, marriages, temporary agricultural loads, temporary supply for construction including civil works by Government departments and other similar purposes.

# **Rate of Charge**

10.22 The Commission has approved the tariff for temporary connections at 1.5 times the applicable rates (on fixed/ demand and energy charges).

# **Time Period for Temporary Connection**

10.23 Temporary connections shall be granted for a period of upto 3 months at a time. However, if the period of temporary connection is extended beyond 3 months, the tariff would be two times of the applicable fixed/demand and energy charges.





# CHAPTER 11 : TERMS AND CONDITIONS OF TARIFF/DEFINITIONS

11.1 The terms and conditions for application of tariff for the FY 2016-17 as approved by the Commission are provided below.

## **Terms and Conditions of Tariff**

- 11.2 The utility shall provide single phase LT connections upto a load of 5 kW, beyond which all connections shall be three phase in nature.
- 11.3 The PDD-D may provide three phase connections to consumers with a load of less than 5 kW on request from the consumer accompanying justification for the same. Three phase tariff shall be applicable to all such connections.

# **Points of Supply**

11.4 The tariff will be applicable to one point supply unless otherwise specified in the agreement between JKPDD and the consumer.

## **Minimum Agreement Period**

11.5 The minimum period for which JKPDD shall provide a permanent connection for power supply to a consumer shall be two years. Any consumer applying for permanent disconnection of the supply before the expiry of two years, shall pay to the utility, guaranteed charges/ minimum charges/ demand charges for unexpired period of the agreement. However this condition of paying minimum charges can be relaxed for domestic and agriculture consumers.

## **Security Deposit**

- 11.6 All matters regarding Security Deposits will be as per JKSERC (Security Deposit) Regulation, 2008.
- 11.7 All the consumers shall at all times maintain with the utility / licensee an amount equivalent to Electricity Charges for the period as noted hereunder, as security against any default in payment towards the cost of electricity supplied / to be supplied to the consumer during the agreed period of supply of energy:
  - (a) L.T. Agriculture Consumer for three months;
  - (a) L.T. and H.T. Consumers for two months;
  - (b) L.T. temporary consumers for the period for which electricity is required subject to a minimum of three days based consumption @ ten units/kW/per day of applied load at the prevailing tariff;





- (c) The State/ Central Government / local bodies consumers shall be exempt from payment of the security deposit;
- 11.8 With the proviso that consumer shall have to pay additional security deposit at prevailing tariff rate as and when the monthly billing cycle is replaced with bimonthly billing cycle.

## Late payment surcharge

11.9 JKPDD-D shall levy a late payment surcharge @ 1.5% per month on the unpaid (beyond due date) principal amount of energy charges, fixed/demand charges and/or minimum charges as may be the case for authorized connections.

Example 1: In case no payment has been made before due date

- Amount payable on account of energy and fixed/demand charges by due date = Rs. 1,000
- *Due Date* =  $31^{st}$  *May*, 2013
- $Actual\ paid\ by\ due\ date\ = Nil$
- Amount payable after due date but by 30<sup>th</sup> June, 2013 = Rs. 1,015 (1000 + 15)
- Amount payable by  $31^{st}$  July, 2013 = Rs. 1,030 (1000 + 15 + 15) and so on (Note: Surcharge for the period beyond June, 2013 would be computed on the unpaid principal amount only)

Example 2: In case partial payment has been made before due date

- Amount payable on account of energy and fixed/demand charges by due date = Rs. 1,000
- *Due Date* =  $31^{st}$  *May*, 2013
- Actual paid by due date = 500
- Unpaid Amount payable after due date but by  $30^{th}$  June, 2013 = Rs. 507.5 (500 + 7.5)
- Amount payable by  $31^{st}$  July, 2013 = Rs. 515 (500 + 7.5 + 7.5) and so on (Note: Surcharge for the period beyond June, 2013 would be computed on the unpaid principal amount only)

#### **Excess/ Unauthorized Load**

11.10 Any consumer having energy meter with Maximum Demand Indicators (MDI) installed, found to have actual load drawn greater than the Contracted demand shall be levied fixed/demand charges for the excess load, at 2 times the normal rate. The energy charges for consumption proportionate to the excess demand shall also be billed at 2 times the normal rate. Provided that in cases no MDI is installed, the excess load shall be billed as per Regulation 6.27 of JKSERC (Supply Code) Regulations, 2011.





## Example:

- (a) For consumers where fixed charges on the basis of contracted load/demand have been specified:
  - Contracted load = 30 kW, Maximum Demand = 43 kW, Excess Demand = 13 kW (43-13)
  - Recorded consumption for month = 10,320 KWh
  - Consumption corresponding to contracted load =(10,320 / 43 \* 30) = 7,200 KWh;
  - Consumption corresponding to excess demand = (10,320 7,200) = 3,120 KWh
  - Normal Fixed Charge Rate = Rs. 47/kW/month, Normal Energy Charge rate = Rs.3.00/KWh
  - Fixed Charges for contracted load = (30 \* 47) = Rs. 1,410;
  - Fixed Charges for excess load =(13 \* 47 \* 2) = Rs. 1,222;
  - Total Fixed Charges = (1,410 + 1,222) = Rs. 2,632
  - Energy Charges for consumption corresponding to contracted load = (7,200 \* 3) = Rs. 21,600;
  - Energy Charges for consumption corresponding to excess load = (3,120 \* 3\* 2) = Rs. 18,720;
  - Total Energy Charges = (21,600 + 18,720) = Rs. 40,320
- (b) For industrial consumers billed on billable demand:
  - Contracted demand = 500 kVA, Maximum Demand = 800 kVA, Excess Demand = 300 kVA (800-500)
  - Recorded consumption for month = 3,26,400 KVAh
  - Consumption corresponding to contracted demand = (3,26,400 \* 500/800) = 2,04,000 KVAh;
  - Consumption corresponding to excess demand = (3,26,400 2,04,000)= 1,22,400 KVAh
  - Normal Demand Charge Rate = Rs. 130/kVA/month, Normal Energy Charge rate = Rs.2.60/KVAh
  - Fixed Charges for contracted demand = (500 \* 130) = Rs. 65,000;
  - *Fixed Charges for excess demand* = (300 \* 130 \* 2) = Rs. 78,000;
  - Total Fixed Charges = (65,000 + 78,000) = Rs. 1,43,000
  - Energy Charges for consumption corresponding to contracted demand =(2,04,000\*2.60) = Rs. 5,30,400;
  - Energy Charges for consumption corresponding to excess demand = (1.22,400 \* 2.60 \* 2) = Rs. 6,36,480;
  - Total Energy Charges = (5,30,400 + 6,36,480) = Rs. 11,66,880
- 11.11 For LT consumers and HT consumers without Trivector Electronic meters extra billing shall be done for previous six months and will be continued till the excess Connected Load is removed or regularized.





11.12 Connection to such defaulting consumers shall be disconnected immediately, which will be reconnected only after the unauthorized load is removed and a test report is submitted to JKPDD. It can also be reconnected after the excess load is regularized by revising the completion of revised agreement, submission of test report and payment of prescribed charges. JKPDD shall allow the regularization of excess load based on the conditions of the distribution system. In absence of suitable conditions, the consumer shall be required to disconnect the excess load within fifteen days.

## **Electricity Duty**

11.13 The tariffs are exclusive of Electricity Duty (ED) or any other taxes levied by the Government. The ED and any other levy shall be charged extra and remitted to the Government separately, based on the actual payment from consumers.

#### **Power Factor Control**

11.14 All consumers having aggregate inductive load greater than 3 HP and above (except domestic and street lights and such consumers where kVAh tariff has been introduced), shall install capacitors of required KVAR rating provided in the following table:

Rating of individual Inductive Load in HP	kVAR rating of LT capacitors
3	1
5	2
7.5	3
10	4
15	5
20	7
25	9
30	10
40	12.5
50	15
60	17.5
75	20
90	25
100	25
120	30
130	35

Table 195: Ratings of capacitors for inductive load

- 11.15 All such consumers shall be levied a surcharge at 10% on the energy charge (metered or flat), till they have installed the required capacitors.
- 11.16 For LT industrial/ non-domestic connections having welding transformers with total capacity greater than 25% of the total Connected Load, an extra surcharge of Rs. 3/ kVA/ month shall be levied until capacitors of required capacity are installed.

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11.17 The utility shall not release any new LT connections having aggregate inductive load greater than 5 HP/ kVA (except domestic and street light) unless the capacitors of suitable rating are installed.

## **Irregular Power Supply**

- 11.18 Wherever the utility is unable to supply power to the entire area / locality fed by a particular substation for a continuous period of 15 days or more, no electricity charges will be payable by the affected consumers for the period for which the power remains off continuously.
- 11.19 The areas where the power supply is less than 12 hours a day continuously for a period of thirty days, the minimum charges/ fixed charges/ demand charges shall be charged proportionately for the actual period of supply.

## **Government Employees moving with Darbar**

11.20 Government employees moving between Jammu and Srinagar along with Darbar and occupying Government accommodation shall be granted electric connection for a period of six months. On expiry of six months, the utility will disconnect the installation immediately and no charges will be levied for the period the installation remains disconnected. All such installations shall be deemed to be permanent connections for determination of tariff.

## **Stopped / Defective meters**

- 11.21 In case of defective/stuck/stopped/burnt meter, the consumer shall be billed on the basis of average consumption of the past three billing cycles immediately preceding the date of the meter being found/reported defective. These charges shall be leviable for a maximum period of three months only during which time the Licensee is expected to have replaced the defective meter.
- 11.22 In case, the Maximum Demand Indicator (MDI) of the meter at the consumer's installation is found to be faulty or not recording at all (unless tampered), the demand charges shall be calculated based on maximum demand during corresponding months/billing cycle of previous year, when the meter was functional and recording correctly. In case, the recorded MDI of corresponding month/billing cycle of past year is also not available, the average maximum demand as available for lesser period shall be considered.

## **Charges for Dishonoured Cheques**

- 11.23 A consumer, whose cheque has been dishonoured, shall have to make payments either in cash or demand draft.
- 11.24 JKPDD shall charge an interest @ 2.5% per month on the unpaid amount from the due date of payment till the bill amount is entirely paid.





## **Resale of Energy**

- 11.25 Resale of power should be as per the Provisions in the JKSERC (Supply Code) Regulations, 2011.
  - "4.120. The consumer shall not supply any energy supplied to him by the Licensee to another person or other premises unless he holds a suitable sanction or licence for distribution and sale of energy granted by the Commission/State Government or has been exempted by the Commission from holding license for sale.
  - 4.121. In case of commercial, office or residential complexes including residential complexes constructed by an employer for his employees, where power supply is availed originally in the name of the builder or promoter of the complex and who subsequently transfers the ownership of the complex, either entirely, to different individuals or partly to different individuals retaining the balance for lease, the power supply may be continued in the following methods.
  - i) The builder or promoter of the complex in whose name the supply continues, is permitted to extend power supply to the individual owners of the flats etc. or to the lessee by installing sub-meters and to collect the cost of consumption of power from them on no-profit no-loss basis (i.e. sharing of expenses of consumption of electricity) and this shall not be treated as unauthorized extension of supply or resale of energy.
  - ii) In case the promoter or builder of the complex does not wish to have any stake in the complex after promoting the complex, the service connection originally availed may be permitted to be transferred in the name of an Association or Society that may be formed in the complex and registered and the service agency so formed is permitted to extend supply to the individual owners of the flats etc. or lessees by installing sub-meters and to collect the cost for consumption of power from them on a no-profit no-loss basis (i.e. sharing of expenses of consumption of electricity) and this shall not be treated as unauthorized extension or resale of energy.

Provided that the tariff charged from ultimate consumers should under no circumstance exceed that prescribed by the Commission for the respective tariff category.

4.122 A panchayat/cooperative or a registered association of consumers may apply for supply of electricity to a group of consumers at a single point. In such cases, the body that has taken the connection shall be responsible for all payments of electrical charges to the Licensee and for collection from the consumers. Provided that the provisions of this clause shall not in any way affect the right of a person residing in the housing unit sold or leased by such a Cooperative Group Housing Society to demand supply of electricity directly from the distribution licensee of the area. Provided that the tariff charged from ultimate consumers should under no circumstance exceed that prescribed by the Commission for the respective tariff category."





## **Applicability of Tariff**

11.26 In case of any dispute between the utility and the consumers regarding the applicability of Tariff, the decision of the Commission shall be final.

## **Contradiction to the Agreement**

11.27 All conditions prescribed here in shall be applicable to the consumers, notwithstanding, the provisions if any, in the agreement entered by the consumers with the licensee, being to the contrary.

## Rebate for Non-Lighting Use of Solar Energy

- 11.28 During winter months very high consumption of electricity takes place during the morning hours resulting in peaking of demand in morning in addition to the normal peaking witnessed in the evening hours. Climatic conditions in the State are such that hot water is required by domestic as well as commercial consumers and it appears that one of the reasons for this peaking demand in the morning during winter months is use of water heating appliances like geysers and immersion rods etc. These heating appliances are heavy guzzlers of electricity.
- 11.29 This requirement of consumers is real and cannot be curbed or discouraged beyond a point. Therefore, for the sake of proper grid management it is essential that consumers should be nudged and encouraged to opt for alternative methods to meet their water heating and cooling requirements. Solar Water Heaters and/ or Solar Cookers offer an excellent alternative to electrical water heating systems and can help in a big way in reducing the demand particularly during morning hours. The weather conditions in the State are conducive to tapping solar energy for this purpose. Responsible and progressive consumers are already using such devices as it also results in substantial reduction in their own energy bills. Use of Solar Heating is, thus, a win-win situation for consumers as well as the utility.
- 11.30 In order to encourage consumers to switch over to solar water heating systems, the Commission proposes to introduce a monthly rebate of Rs.150.00 for all metered consumers who have installed such solar heating systems with a minimum capacity of 100 litres for meeting their requirement of hot water. To avail this rebate the consumer will be required to give the documentary proof of having obtained JAKEDA or purchase from a registered dealer such a system and an affidavit to the effect that such a system has been installed on his premises and is being used regularly to meet such heating requirements.
- 11.31 This declaration will be verified by Licensee's meter representative. In case, any such declaration is found to be false, the licensee apart from taking appropriate legal action against such consumers would be entitled to recover the entire rebate allowed to such consumers with 100% penalty.





## **Definitions**

#### **Connected Load**

- 11.32 The Connected Load shall mean the sum of the rated capacities in kW/HP of all energy consuming apparatus including portable apparatus duly wired and connected to the power supply system in the consumer's premises. However, this shall not include the load of extension plug sockets, stand-by or spare energy consuming apparatus installed, through change over switch, which cannot be operated simultaneously and any other load exclusively meant for firefighting purposes.
- 11.33 In case of domestic consumers load of geysers plus heaters or of air conditioners without heaters whichever is higher is to be considered.
- 11.34 Any equipment which is under installation and not connected electrically, equipment stored in warehouse/showrooms either as spare or for sale is not to be considered as part of the Connected Load.

#### **Sanctioned Load**

11.35 Sanctioned Load: shall mean load for which JKPDD has agreed to supply from time to time subject to the governing terms and conditions. The total Connected Load is required to be sanctioned by the competent authority.

#### **Contract Demand**

11.36 Contract Demand shall mean the maximum demand for which the consumer has entered into an agreement with the utility. The contract demand cannot be reduced to less than 60% of the sanctioned connected demand.

## **Maximum Demand**

11.37 Maximum Demand for any month shall mean the highest average load measured in kilovolt amperes during any consecutive 30 minutes period of the month.

## **Demand Charges**

11.38 Demand Charges shall mean the amount chargeable based upon the billing demand as defined in the relevant tariff schedule.

## **Average Power Factor**

11.39 Average Power Factor: shall mean the average energy factor and shall be taken as the ratio of the kilo-watt-hours (kWh) to the kilo-volt-ampere hours (kVAh) supplied during any period.







## **CHAPTER 12: SCHEDULE OF MISCELLANEOUS CHARGES**

Table 196: Approved Schedule of miscellaneous charges for FY 2016-17

Sl. No	Description	Units	Approved Charges for FY 2016-17
1	For single phase and three phase connection upto 5 KW		F1 2010-17
1.a	Changing Meter Board in same premises.	Rs	80
1.b	Changing Meter at Consumers request in same premises.	Rs	80
1.c	Resealing PDDs cut-out in Consumers premises.	Rs	25
2	Re –sealing of Meters, Maximum Demand Indicators in Consumers premises		
2.a	Single Phase LT Connection.	Rs	100
2.b	Three phase LT Connection	Rs	150
2.c	HT Connection	Rs	850
3	Meter Testing charge at Consumers request		
3.a	Single phase LT Meter.	Rs	60
3.b	Three phase 4W/3W Meter without CT.	Rs	100
3.c	Three phase 4W/3W Meter with CT	Rs	350
3.d	LT CT Meter	Rs	200
3.e	HT Meter along with metering equipment (CT/PT).	Rs	1200
4	Special meter reading		
4.a	LT Connection	Rs	30
4.b	HT Connection	Rs	250
5	Replacement of burnt Meter (if burnt due to Consumers fault)	Rs	Cost of Meter+15% supervision charges
6	Fuse Off call charges-Replacement		
6.a	PDD's cut out fuse	Rs	25
6.b	LT Consumers fuse	Rs	25
7	Replacement of missing Meter card	Rs/Card	15
8	Replacement of broken glass of Meter	Rs/Glass	40
9	Reconnection/disconnection charges		
9.a	LT Consumers	Rs	50
9.b	HT Consumers	Rs	250
10	Rechecking of installation on request of Consumer		
10.a	Single phase	Rs	100
10.b	Three phase	Rs	250
11	Re-rating of equipment	Rs/ Equipment	120
12	Supervision charge for Service Connection(if service line laid by Consumer through licensed Contractor)		
12.a	Single phase LT connection	Rs	200
12.b	Three phase LT connection	Rs	450
12.c	Loop LT connection	Rs	120
13	Parallel Operation charge for availing Grid support by CPP	Rs/kVA per month	As per JKSERC Regulations





Sl. No	Description	Units	Approved Charges for FY 2016-17
		on the installed capacity of CPP	
14	Shifting of connection	Rs	Actual material cost+15% supervision charge
15	Hiring of Utility's plant and equipment		
15.a	For initial hire agreement period	Rs	1% pm on current schedule of rates
15.b	For subsequent period of hire agreement	Rs	Twice of 15.a
15.c	For LT consumers(more than 100 HP) converting to HT	Rs	Same as 15.a & 15.b
16	Transfer of Name		
16.a	LT	Rs	120
16.b	HT	Rs	600
17	Booklet for HT/LT Tariff	Rs	25
18	Connection/disconnection charges for temporary connection		
18.a	LT temporary connection	Rs	150
18.b	HT temporary connection	Rs	700







## **ANNEXURES**

## Annexure 1: List of participants in State Advisory Committee Meeting

List of participants in State Advisory Committee held on 17<sup>th</sup> March, 2016 at JKSERC Conference Hall, Jammu under the chairmanship of Sh. Basharat Ahmad Dhar, Chairman JKSERC has been summarised in following table.

Table 1: List of participants in SAC meeting

S.No.	Name of the Member/Officers	Department/Organization		
MEMB	MEMBERS OF THE STATE ADVISORY COMMITTEE (SAC), JKSERC			
1.	Sh. Basharat Ahmed Dhar	Hon'ble Chairman, JKSERC		
2.	Dr. S.S.Jamwal	Director, Agriculture Department, Jammu		
3.	Dr. Aijaz Ahmad	Prof. & HOD, EE Dept. NIT Srinagar		
4.	Maj. Gen. Goverdhan Singh	President, J&K Ex-Services League & J&K Paryavaran Sanstha		
5.	Sh. Rakesh Gupta	President, Chamber of Commerce & Industries (CCI)		
6.	Sh. Mohd. Ashraf Mir,	President, Federation Chamber of Industries, Kashmir (FCIK).		
7.	Sh. Lalit Mahajan	President, Bari Brahmana Industries Association, Jammu.		
8.	Sh. Mushtaq Ahmed Wani,	President, Kashmir Chamber of Commerce and Industry, Srinagar.		
9.	Er. Vikram Gour	President, Consumer Welfare Association, Jammu		
REPRE	SENTATIVES			
10.	Sh. Ramesh Chander	Addl. Secretary, Consumer Affairs and Public Distribution Department & TA (Representing Adm. Secretary CAPD)		
11.	Ajay Singh Jawal	Joint Commissioner, Transport Commissioner, Govt. of J&K, Jammu. (Representing Transport Commissioner J&K)		
SPECIA	L INVITEES			
12.	Sh. D.S. Pawar	Ex. Hon'ble Member (T), JKSERC		
13.	Sh. Shafat Sultan	CEO, JAKEDA, Jammu		
OFFICE	ERS OF JKSERC			
14.	Sh. R.K.Seli	Technical Consultant, JKSERC		
15.	Sh. Anil Kumar Gupta	Secretary, JKSERC		
16.	Sh. R.K. Sharma	Supdtt. Engineer, JKSERC		
17.	Smt. Villy Kaul	Dy. Secretary Law, JKSERC		
18.	Sh. Paavan Bargava	Senior Consultant, PWC		
OFFICE	ERS/REPRESENTATIVES OF J	KSPDC		
19.	Sh. Kifayat Hussain Rizvi (IAS)	MD, JKSPDC		
20.	Sh. Ajay Gupta	ED, (Electric) JKSPDC		
21.	Sh. A.Muzaffar Lanker	ED (Civil) JKSPDC		
22.	Sh. Upnder Jit Singh	Director Finance (JKSPDC)		
23.	Sh. Abdul Wahid	Chief Engineer (CID)		
24.	Er. N.A.Kakroo	GM-Technical (JKSPDC)		
25.	Sh. Asif Maqbool Dedru	AGM (A&F)		
26.	Sh. Byomkesh Mallick	Consultant (JKSPDC)		
OFFICE	ERS/REPRESENTATIVES OF J	KPDD		
27.	Sh. Sheikh Gul Ayaz	DCP, JKPDD		
28.	Smt. Shahnaz Goni	Chief Engineer, Commercial & Survey Wing, PDD, J&K		
29.	Sh. B. A. Khan	Chief Engineer, EM & RE Wing, Kashmir		





# MYT Order for 2<sup>nd</sup> MYT Control Period FY 2016-17 to FY 2020-21 and retail tariff for FY 2016-17

S.No.	Name of the Member/Officers	Department/Organization	
30.	Sh. Ravi Chanyal	Chief Engineer, System & Operation Wing, PDD	
31.	Sh. Ashwani Kumar Gupta	Chief Engineer, EM & RE, Jammu	
32.	Er. S.K.Kaul	SE, Commercial and Survey, PDD.	
33.	Sh. Azhar Vakil	AEE, DCP Office , PDD	
34.	Sh. Rohit Bhagotra	AEE, SLDC	
35.	Sh. Siddharth Mehta	Consultant, JKPDD	
36.	Sh. Gaurav Lohani	Consultant, JKPDD	
OTHER	OTHER PARTICIPANTS		
37.	Sh. C.M.Sharma	Dy. Director Agriculture, Jammu	
38.	Sh. Abdul Hammid Baba	Pvt. Secretary, JKSERC	





# Annexure 2: List of stakeholders who responded to the public notice

Table 1: List of objectors

S.No.	Objector	
1.	Hardev Singh, Accountability and Transparency Forum, Jammu	
2.	Devinder Mahajan, Annapurna Laminators Private Limited, Jammu	
3⋅	Rajesh Jain, Association of Industries, Jammu	
4.	K.C Sharma, Chenab Textile Mills, Prop. Sutlej Textiles and Industries Ltd	
5.	Tilak Raj Dua, Towers and Infrastructure Providers Association	
6.	Lalit Mahajan, Bari Brahmana Industries Association, Jammu	
7.	Kaushlendra Kumar Ojha, Military Engineer Services	
8.	Kashmir Chamber of Commerce and Industries Limited, Srinagar	
9.	Shakeel Kalender, Kashmir Centre for Social and Developmental Studies, Srinagar	
10.	Kashmir Rice, Oil & Band Saw Mill Owners Union, Kashmir	
11.	Gulabi Nabi Khan, Kashmir Printers Association, Srinagar	
12.	Rahul Bansal, Narbada Steels Ltd, Jammu	
13.	Vikrant Kuthiala , PHD Chamber of Commerce, J&K Committee, Jammu.	
14.	Vodafone Mobile Services Limited,	





# **Annexure 3: List of participants in Public Hearings**

Table 1: Participants at Hearing held on 26th March 2016 at IMPA, Srinagar

S.No.	Name	Department/Organization
JKSERC		Department Organization
1.	Sh. Basharat Ahmed Dhar	Chairman, JKSERC
2.	Sh. R.K.Seli	Technical Consultant, JKSERC
3.	Sh. Anil Kumar Gupta	Secretary, JKSERC
4.	Smt. Villy Koul	Dy. Secretary (Law), JKSERC
5.	Sh. Ram Krishan Sharma	Accounts Officer, JKSERC
6.	Sh. Abdul Hamid Baba	Pvt. Secretary, JKSERC
7.	Sh. Abdul Gani Kotay	Senior Assistant, JKSERC
8.	Sh. Babu Ram Sharma	Computer Operator, JKSERC
9.	Sh. Ankit Choudhary	Consultant (PWC), JKSERC
J&K PDI	<u> </u>	
10.	Sh. Sheikh Gul Ayaz	Development Commissioner (Power), JKPDD
11.	Smt. Shahnaz Goni	Chief Engineer , C&S, JKPDD, Jammu
12.	Sh. Bashir Ahmad Khan	Chief Engineer, EM&RE, JKPDD, Srinagar
13.	Sh. S.A. Banday	Supdtt. Engineer, M&RE-I, JKPDD, Srinagar
14.	Sh. Hashmat Qazi	Supdtt. Engineer, JKPDD, Srinagar.
15.	Sh. Bashir Ahmad Dar	Supdtt. Engineer, P&D, Circle, Srinagar.
16.	Sh. Mohd. Yousuf Baba	T.O to DC(P), JKPDD, Jammu/Srinagr
17.	Sh. Lateef Ahmad Shah	Executive Engineer, STD-I, Srinagar
18.	Sh. Hilal Ahmed Sheikh	Executive Engineer, ED Circle-I, Srinagar.
19.	Sh. Azhar Vakil	Asstt. Executive Engineer, DC(P) Office, Jammu
20.	Sh. Jaweed Ahmad	Asstt. Executive Engineer, ED Circle-I, Srinagar
21.	Sh. Jasim Bashir	Asstt. Engineer, EM&RE, Srinagar.
22.	Sh. Siddharth Mehta	Consultant, JKPDD
STAKEH	IOLDERS	
23.	Sh. Shah Nasarullah	FKIC, Srinagar
24.	Sh. Mohd. Saleem	KSSIA, Srinagar
25.	Sh. Syed Mohd. Nazim	KSSIA/FCIK, I/E. B.A.M. Khan
26.	Sh. M.Showkat Chowdhary	President, Kashmir Hotel & Reg. Association, Khara
27.	Sh. Shakeel Qalander	Member, KGSDS, , Srinagar
28.	Sh. Faiz Bakshi	Sec. General KCC&I, Srinagar
29.	Sh. Nasir Hamid Khan	KCC&I, Srinagar
30.	Sh. Afaq Qadri	Sr. Vice President, FCIK
31.	Sh. Abid Ali	President IAK Khonmoh, FCIK
32.	Sh. Syeed Fazal	FCIK, Circle-I.
33.	Sh. Mukhmoor Gowhar	Secretary, FCIK, Circle-I.
34.	Sh. M. Farooq Mir, Lasjan	President/Chamber of Hot Mix Plant owner, Srinagar
35.	Sh. Mohd. Shafi Mukhdoomi	Kohimaram, , Srinagar
36.	Sh. Shakeel A. Khan	P. Press Print Land, Srinagar
	Sh. Zahoor Ahmad Malik,	President, Bric kill, Srinagar
37.	Lasjan	
38.	Sh. Mehraj-u-Din	Milad offset, Consumer
	<u> </u>	*
39.	Sh. Mohd. Rafiq	President, Zakura, Consumer

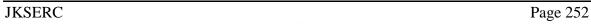




S.No.	Name	Department/Organization
40.	Sh. Zuhoor Ah. Bhat	Consumer
41.	Sh. Mudasir Alam Bhat	JG8 Zainakote, Consumer
42.	Sh. Ovees Qadir	Jamic Power Ltd., Consumer/FCIK
43.	Sh. Javeed Bhat	President, FCIK
44.	Sh. Mohd. Yousuf Tichoo	Vice President, FCIK
45.	Sh. Mohd. Ashraf Khan	FCIK, Consumer
46.	Sh. Ubaid Mehraj	L.Crystals
47.	Sh. Aijaz Ahmad	FCIK, Srinagar
48.	Sh. Gulam Mohd. Tramboo	FCIK, Anantnag
49.	Sh. Gulam Mohd. Bashay	FCIK, Anantnag
50.	Sh. Gh. Mohi-u-Din Pal	FCIK, Budgam
51.	Sh. Manzoor Qadri	FCIK, Ganderbal
52.	Sh. Jeelan Beigh	FCIK, Zakura
53.	Sh. Maqsood Ahmad Bhat	Consumer, Anantnag
54.	Sh. Junaid Ashraf Najar	FCIK, Anantnag
55.	Sh. Manzoor Ahmad Khan	Enterprise, Srinagar
56.	Sh. Farooq Ahmad	KPA, Srinagar
57.	Sh. Nazir Ahmad Magray	Vice President, Gousion Printers
58.	Sh. Abid Hussain	Consumer, Baramulla
59.	Sh. Ab. Rashid Kumar	Consumer, Peer Bagh, Srinagar.

Table 2: Participants at Hearing held on 29th March 2016 at Conference Hall, JKSERC, Jammu

S. No.	Name	Department/ Organisation
JKSERC		
1.	Sh. Basharat Ahmed Dhar	Chairman, JKSERC
2.	Sh. R.K.Seli	Technical Consultant, JKSERC
3.	Sh. Anil Kumar Gupta	Secretary, JKSERC
4.	Sh. Romesh Sharma	Supdtt. Engineer, JKSERC
5.	Smt. Villy Koul	Dy. Secretary (Law), JKSERC
6.	Sh. Ram Krishan Sharma	Accounts Officer, JKSERC
7.	Sh. Abdul Hamid Baba	Pvt. Secretary, JKSERC
8.	Sh. Sunil Bakshi	Estate Officer/Draftsman, JKSERC
9.	Sh. Abdul Gani Kotay	Senior Assistant, JKSERC
10.	Sh. Babu Ram Sharma	Computer Operator, JKSERC
11.	Sh. Ankit Choudhary	Consultant (PwC), JKSERC
12.	Sh. Aayush Mahajan	Consultant (PwC), JKSERC
J&K PD	D	
13.	Sh. Sheikh Gul Ayaz	Development Commissioner (Power), JKPDD
14.	Smt. Shahnaz Goni	Chief Engineer, C&S, JKPDD, Jammu.
15.	Sh. S.K. Koul	Supdtt. Engineer, C&S, JKPDD, Jammu.
16.	Sh. Sanjeev Rathore	Supdtt. Engineer, M&RE, Kathua
17.	Sh. Sudhir Kumar Gupta	Executive Engineer, ED-II, Jammu
18.	Sh. Mohd. Yousuf Baba	Xen / T.O to DC(P), JKPDD, Jammu/Srinagar
19.	Sh. Sanjeev Kumar Bhagat	Executive Engineer, JKPDD, Vijaypur
20.	Sh. Siddharth Mehta	Consultant, JKPDD







S. No.	Name	Department/ Organisation	
STAKE	STAKEHOLDERS/OTHER PARTICIPANTS		
1.	Sh. Vinod Khajuria	Retd. Chief Engineer, Consumer	
2.	Sh. Chander Vadan	Company Secretary, Public Representative	
3.	Sh. Lalit Mahajan	President ,Bari Brahmana Industries Association	
4.	Sh. Devinder Mahajan	Managing Director, Annapurna Laminators & Ltd.	
5.	Sh. Rajesh Jain	President, Association of Industries, Gangyal	
6.	Sh. Annil Suri	Ex-President ,BBIA, Jammu	
7.	Sh. K.C Sharma	Executive President, Chenab Textiles Mills, Kathua	
8.	Sh. Sanjay Saxena	CBH(TAIPA), Bharti Infrastructure	
9.	Sh. Unique Sharma	Bharti Infratel Ltd.	
10.	Sh. R.K. Bansal	Chenab Textile Mills, Kathua	
11.	Sh. Ashok Thakur	Manager, Vodafone	
12.	Sh. Didar Singh	Deputy Manager, Vodafone	
13.	Sh. Harbans Choudhary	Accountability & Transparency Forum, Public Stakeholder	
14.	Sh. Sai Raj	AGE (E/M),MES, GE(U) Udhampur	
15.	Sh. Ashish Bhat	J.E (E/M) MES, GE(U) Udhampur	
16.	Sh. Bipin Sharma	AOI	
17.	Sh. Parshant Mathur	Executive Officer, PHDCCI, Jammu	
18.	Sh. Panil Sharma	Executive Officer, PHDCCI, Jammu	
19.	Sh. Satinder Pal Singh	Manager, Tower Vision	
20.	Sh. Ashwani Bhatt	Assistant Manager, ASCEND Telecom Infrastructure	
21.	Sh. Sanjeev Vig	Association of Industries, Gangyal	
22.	Sh. Rahul Bansal	Narbada Steel Ltd.	
23.	Sh. Viraaj Malhotra	Treasurer, BBIA, Jammu	
24.	Sh. Fayaz Ahmad Wani	Member, BBIA, Jammu	
25.	Sh. Gopal Dass Choudhary	Legal Secretary, Accountability & Transparency Forum	
26.	Sh. Hardev Singh	President ,Accountability & Transparency Forum	





