

## **PETITION FOR TRUE UP OF FY 2015-16**

Submitted by



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BEFORE THE PUNJAB STATE ELECTRICITY REGULATORY COMMISSION,  
CHANDIGARH

Case No. \_\_\_\_\_

IN THE MATTER OF: Filing of the Petition for the approval of PSPCL's True Up  
petition for FY 2015-16 under Section 62 and 64 of the Electricity Act, 2003 read with  
Regulation 10 of PSERC (Terms and Conditions of Determination of Generation,  
Transmission, Wheeling and Retail Supply Tariff) Regulations, 2014  
AND IN THE MATTER OF: Punjab State Power Corporation limited (hereinafter referred  
as "PSPCL" or "the Petitioner")

The Petitioner respectfully submits as under: -

- 1) The Punjab State Power Corporation Limited (hereinafter referred to as PSPCL) is one of the "Successor Company" duly constituted under Companies Act, 1956 (on 16 April, 2010 Registration No: U40109PB2010SGC033813 - after restructuring of Punjab State Electricity Board (PSEB) by Government of Punjab vide notification dated 16 April, 2010 no; 1/9/08-FB(PR)/196 known as "Punjab Power sector reforms Transfer Scheme"
- 2) The Petitioner submits that the Hon'ble Commission has issued the PSERC (Terms and Conditions of Determination of Generation, Transmission, Wheeling and Retail Supply Tariff) Regulations, 2014 (hereinafter referred to as "PSERC MYT Regulations, 2014") in exercise of powers conferred on it by Section 61 read with Section 181(2) of the Electricity Act 2003 (No. 36 of 2003). The said Regulations shall be applicable to Generating Stations, Transmission system, SLDC and Distribution system where; tariff for generation and transmission is not determined under Section 63 of the Electricity Act, 2003 through transparent process of competitive bidding in accordance with the guidelines issued by the Central Government.
- 3) Accordingly, in line with the above provisions of the PSERC MYT Regulations 2014, the Petitioner is hereby filing MYT Petition for the Control Period from FY 2017-18 to FY 2019-20.
- 4) While filing the MYT application for D&RS Business, PSPCL has endeavoured to comply with the applicable legal and regulatory obligations, directions and stipulations contained in the D&RS License, Tariff Order, the Guidelines and previous ARR and Tariff Orders to the extent possible. In spite of the limitations in the accounting and information systems of the Licensee, inherited from the parent PSEB, it has taken all possible steps to compile and furnish the required details. However, the current ARR application may not be fully compliant in some respects, as are explained with reasons, and therefore, accordingly, PSPCL seeks necessary waivers and relaxation.






## PRAYER TO THE HON'BLE COMMISSION

The Petitioner respectfully prays to the Commission:

- a) To admit the Petition seeking approval of True Up For FY 2015-16;
- b) To approve the True Up petition for Generation & Distribution Business for FY 2015-16
- c) To pass any other order/s as the Hon'ble Commission may deem fit and appropriate under the circumstances of the case and in the interest of justice;
- d) PSPCL also prays to the Hon'ble Commission to take the appropriate view on the revenue gap projected by PSPCL as per the PSERC tariff regulations while determining the tariff for the Control Period.
- e) To condone any error/ omission and to give opportunity to rectify the same;
- f) The filing is being done based on the best available information and in case of any change, the Petitioner may be permitted to make further submissions, addition and alteration to this Petition as may be necessary from time to time.

Date:

BY THE APPLICANT THROUGH  
Er. N.K. Gandhi,  
Chief Engineer / ARR&TR,  
PSPCL, Patiala.



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### List of Abbreviations

Sr.No	Abbreviations	Descriptions
1.	A&G	Administrative and General
2.	AC	Auxiliary Consumption
3.	APR	Annual Performance Review
4.	ARR	Aggregate Revenue Requirement
5.	AS	Accounting Standard
6.	CAGR	Compound Annual Growth Rate
7.	CAPEX	Capital Expenditure
8.	CERC	Central Electricity Regulatory Commission
9.	CGS	Central Generating Station
10.	CoS	Cost of Supply/Service
11.	CPPs	Captive Power Plants
12.	Crs	Crores
13.	CWIP	Capital Work in Progress
14.	DF	Distribution Franchisee
15.	Discom	Distribution Companies
16.	DPS	Delayed Payment Surcharge
17.	DS	Domestic Service
18.	DSM	Demand Side Management
19.	DTC	Distribution Transformer
20.	EA/The Act	The Electricity Act 2003
21.	F&A	Finance & Accounts
22.	FY	Financial Year
23.	GFA	Gross Fixed Assets
24.	G.O.	Government Order
25.	GoI	Government of India
26.	GoP	Government of Punjab
27.	HR	Human Resource
28.	HRA	House Rent Allowance
29.	HT	High Tension
30.	HEP	Hydro Electric Power
31.	IPP	Independent Power Producers
32.	KV	Kilo Volt
33.	kVA	Kilo Volt Ampere
34.	kVAh	Kilo Volt Ampere Hour
35.	kW	Kilo Watt
36.	kWh	Kilo Watt Hour



37.	LF	Load Factor
38.	LT	Low Tension
39.	MD	Maximum Demand
40.	MOD	Merit Order Dispatch
41.	MoP	Ministry of Power
42.	MOU	Memorandum of Understanding
43.	MU	Million Units(Million kWh)
44.	MVA	Mega Volt Ampere
45.	MW	Mega Watt
46.	MYT	Multi Year Tariff
47.	NEP	National Electricity Policy
48.	NTP	National Tariff Policy
49.	NTPC	National Thermal Power Corporation
50.	O&M	Operation & Maintenance
51.	PAF	Plant Availability Factor
52.	PF	Provident Fund
53.	PFC	Power finance Corporation
54.	PLF	Plant Load Factor
55.	PLR	Prime Lending Rate
56.	PPA	Power Purchase Agreement
57.	PSD	Power Service Division
58.	REC	Rural Electrification Corporation
59.	R&M	Repair and Maintenance
60.	ROE	Return on Equity
61.	RPO	Renewable Purchase Obligation
62.	Rs	Rupees
63.	SBI	State Bank of India
64.	SLM	Straight Line Method
65.	SHR	Station Heat Rate
66.	T&D	Transmission and Distribution
67.	PSPCL	Punjab State Power Corporation Limited
68.	PSERC	Punjab State Electricity Regulatory Commission
69.	w.e.f.	With effect from
70.	YoY	Year on Year



## 1 Introduction

### 1.1 Background

#### 1.1.1 Unbundling of Punjab State Electricity Board

The Electricity Act, 2003 ("the Act") was enacted by the Parliament of India on June 10, 2003 (No. 36 of 2003), which envisaged the restructuring of the State Electricity Boards.

In exercise of the powers conferred under sub-section 4 of Section 131 of the Act, the Government of Punjab vide Notification No. 1/9/08-EB(PR) 196 dated April 16, 2010, restructured and unbundled the erstwhile Punjab State Electricity Board, into two successor companies, viz.

- a) Punjab State Power Corporation Ltd. (PSPCL), to undertake generation and distribution business,
- b) Punjab State Transmission Corporation Ltd. (PSTCL), to undertake transmission of electricity along with operation of SLDC functions.

As per the Transfer Scheme, the Government of Punjab has segregated the "transmission business of erstwhile Punjab State Electricity Board". It is reproduced as under

*"The transmission undertaking shall comprise of all assets, liabilities and proceedings, belonging to the Punjab State Electricity Board, concerning the transmission of electricity and the State Load Dispatch Centre (SLDC) function."*

Hence, the PSPCL is left with the Distribution, Generation and allied activities of the erstwhile PSEB.

First Amendment in Transfer Scheme notified by Government of Punjab:

Government of Punjab (GoP) amended the Transfer Scheme vide Notification No. 1/4/04EB (PR)/620 on December 24, 2012 known as Punjab Power Sector Reforms Transfer (First Amendment) Scheme, 2012. The salient features of the aforesaid amendments are as under:

- a) As per the transfer scheme, the funding of the Terminal Benefit Trusts in respect of pension, gratuity and leave encashment of the personnel, shall be a charge on the tariff of PSPCL and PSTCL, respectively, on yearly basis, as may be decided by the Punjab State Electricity Regulatory Commission.
- b) The Terminal Benefit Trusts in respect of pension, gratuity and leave encashment, shall be progressively funded by PSPCL and PSTCL, respectively, as decided by the Punjab State Electricity Regulatory Commission, in the ratio of 88.64:11.36, over a period of 15 Financial Years commencing from April 1, 2014. The terminal benefits liability accruing during the



period of progressive funding, and thereafter, shall be shared in the same ratio by both corporations. Thus, funding shall continue even after the absorption of personnel in PSTCL and the trust shall be administered jointly by the said PSPCL and PSTCL.

- c) It is also mentioned that the actual amount of pension; gratuity and leave encashment paid / to be paid on and with effect from April 16, 2010 to March 31, 2014, shall be shared by PSPCL and PSTCL, in the ratio of 88.64:11.36 on yearly basis.
- d) The General Provident Fund Trust shall be funded by PSPCL and PSTCL both, as per the apportionment made in the opening balance sheet, on and with effect from the April 16, 2010, and the same shall be funded over a period of ten years commencing on and with effect from the April 1, 2013, along with interest as applicable.
- e) Also provided that for the period commencing from April 16, 2010 to March 31, 2013, PSPCL and PSTCL shall be liable to pay interest on the apportioned General Provident Fund liability, at the rate as applicable for the respective financial years.
- f) The PSPCL and PSTCL, shall be liable to pay Interest, as applicable to General Provident Fund from time to time, on the net accruals (or monthly basis) of the General Provident Fund amount on and with effect from the April 16, 2010, to the date of issuance of this notification, and thereafter all the General Provident Fund matters, shall be settled through trust.
- g) Until otherwise directed by the State Government, the PSPCL and PSTCL shall maintain common Trust for pension, gratuity and other terminal benefit liabilities and General Provident Fund, instead of individual trusts for each of the companies and all the contributions shall be made to such Trusts in the aforesaid manner.
- h) The Government of Punjab notified the final opening balance sheet for PSPCL and PSTCL as on the April 16, 2010.

#### 1.1.2 PSERC Tariff Regulations, 2005 and Petitions Filed by PSPCL

Hon'ble Punjab State Electricity Regulatory Commission (PSERC or the Hon'ble Commission) has issued PSERC (Terms and Conditions of Tariff) Regulations, 2005, wherein tariff is being determined on yearly basis.

PSPCL filed the Petition for determination of ARR and Tariff for FY 2016-17, APR of FY 2015-16 and Truing up for FY 2012-13 & FY 2013-14. Hon'ble Commission issued the Order in the matter on July 27, 2016 and determined the tariff for FY 2016-17. In the said Order, Hon'ble Commission decided to undertake the true-up for FY 2012-13 and FY 2013-14 along with ARR Petition for FY 2016-17.

Further, PSPCL filed the MYT Petition for determination of ARR and Tariff for FY 2017-18, APR of FY 2016-17 and Truing up for FY 2014-15. Before Hon'ble Commission on 30<sup>th</sup> November 2016. Order in the matter has not yet been issued by Hon'ble Commission.

## TRUE UP FOR FY 2015-16

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## 2 Final True-up FOR FY 2015-16

### 2.1 Background

In this section, the Petitioner has submitted the True up for FY 2015-16 based on the actual expenses and income as per the audited annual accounts for FY 2015-16. The Petitioner has also presented its submissions regarding certain critical aspects influencing the true-up of the expenses for FY 2015-16.

In light of the above, PSPCL requests the Hon'ble Commission to carry out the final true-up of expenses and revenue submitted in the petition and formats and allow the same as prayed in this petition.

### 2.2 Energy Sales

The actual sales for the FY 2015-16 vis-à-vis the sales approved by the Commission in its review exercise in the ARR/Tariff Order for FY 2016-17 is as summarized below:

**Table 1: True-up Energy Sales for FY 2015-16 (MUs)**

Sr. No.	Category	RE Approved in Review (TO for FY 2016-17)	Actual as per Accounts
1	Domestic	12066.4	12,108.24
2	Commercial (NRS)	3481.06	3,518.24
3	Industrial		
(a)	Small Supply	954.8	951.61
(b)	Medium Supply	2115.88	2,111.44
(c)	Large Supply	10049.12	10,087.13
	<b>Total</b>	<b>13119.8</b>	<b>13150.18</b>
4	Public Lighting	184.84	202.82
5	Bulk Supply	649.02	661.19
6	Railway Traction	165.33	165.64
7	Total Metered Sales (except AP) within State	<b>29666.45</b>	<b>29,806.31</b>
8	AP Consumption	10537	11,523.34
9	Total Sale Within State	<b>40203.45</b>	<b>41,329.65</b>
10	Sales to Outside State	53	137.07
11	Sales to Common Pool Consumers	311	294.51
12	Total Sales (9+10+11)	<b>40567.45</b>	<b>41,761.23</b>

Total sales (including sale to other States and Common Pool consumers) for FY 2015-16 has been higher than that approved by the Hon'ble Commission in the review exercise.

The metered sales within the State for the FY 2015-16 has been 29806.31 MUs, which is quite close to the sales of 29666.45 MUs approved by the Hon'ble Commission in its review exercise in the ARR/Tariff Order for FY 2016-17.

The sales to the industrial category have been little higher by approximately 30 MUs than the sales approved in the review exercise.

The Agricultural Pumpsets (AP) sales during FY 2015-16 has been 11523.34 MUs, which is higher by 986.34 MUs than the sales of 10537 MUs approved by the Hon'ble Commission in the review exercise.

Actual Sale to Outside States for FY 2015-16 is 137.07 MUs, which is higher than the sales of 53 MUs approved by the Hon'ble Commission in the review exercise. The bifurcation of actual outside state sales of 137.07 MUs during FY 2015-16 has been summarized below:

**Table 2: Sale to Outside state during FY 2015-16**

GENERATING STATION	FY 2015-16 ( MUs)
Royalty to HP from Shanan	52.66
Free share from RSD to HP	84.41
Total Outside State Sale	137.07

PSPCL prays to the Hon'ble Commission to consider the actual category-wise sales as submitted above, while trueing up for FY 2015-16.

### 2.3 AP Consumption

PSPCL submits that the Hon'ble Commission had approved the AP consumption of 10537 MUs for FY 2015-16 in the Tariff Order for FY 2016-17, as against 11586 MUs projected by PSPCL in its RE of FY 2015-16. In the revised estimate of FY 2015-16, the Hon'ble Commission has determined the AP consumption based on the month-wise energy pumped in AP feeders. In this Petition, PSPCL has submitted the AP consumption based on sample meter data. The actual AP consumption as recorded for the FY 2015-16 is higher by approx 986 MUs than that approved by the Hon'ble Commission.

PSPCL submits that the Hon'ble Commission has changed the methodology for AP consumption since FY 2010-11. PSPCL submits that the Hon'ble Commission has been



disallowing the actual sales of AP consumers on the grounds of change in methodology for deriving AP consumption. However, PSPCL has complied with most of the directives of the Hon'ble Commission regarding the implementation of metering of AP consumers.

PSPCL submits that disapproval of AP sales ultimately results in huge disallowance in the power purchase cost. It is only the sixth year of PSPCLs functioning as a corporate entity, however, the legacy of disallowances in AP sales as prevalent in the erstwhile PSEB era are still being continued for the PSPCL. PSPCL believes that the whole agenda for carrying out the reform process through unbundling and introducing the Transfer Scheme was to bring in more transparency and accountability in the successor entities. It is therefore essential that such newly created entities be provided with the necessary handholding support so that they have enough funds to meet the stipulated targets.

PSPCL submits that since its incorporation, it is aggressively pursuing the directives issued by the Hon'ble Commission within the overall budgetary constraints. The financial constraints are largely on account of the huge disallowances in actual expenses. The Electricity Act, 2003 mandates that the SERC should safeguard consumers' interest and at the same time, ensure recovery of the cost of electricity in a reasonable manner. PSPCL prays to the Hon'ble Commission to balance the public interest with the financial viability of the Utility, which will be in the long-term interest of the consumers.

PSPCL submits that continued disallowance may lead PSPCL to the same financial crisis as prevalent in erstwhile PSEB. PSPCL submits that the Tariff Policy stipulates that in case the performance of the utilities is below the desired levels, then a suitable trajectory should be approved by the Hon'ble Commission to bring the performance to the desired levels. In this case, PSPCL being a newly incorporated entity, it is prayed that a suitable time frame be provided to it for meeting the desired performance levels and only then impose any disallowances/ penalties, if required.

The AP consumption has been considered based on sample meters as AP consumption based on energy pumped in AP feeders is not a reliable method of assessing the consumption. Further, the computation of AP consumption based on energy pumped in AP feeders involves assumptions with respect to losses on Agriculture feeder and contribution of AP consumption on mixed load feeders and any incorrect assumption shall affect the consumption adversely for PSPCL. Further, working out the final output on the basis of reverse computation is not an appropriate method of computation. Also, this method of calculation is not being adopted by any other SERC. Further, there is hardly any State, having significant AP consumption, which has 100% metering of AP consumers.

Furthermore, the approach adopted by the Hon'ble Commission for calculating AP



consumption based on pumped energy is not correct due to the following reasons:

1. The Hon'ble Commission is wrongly taking AP consumption of Kandi area mixed feeders as 30% of the total consumption whereas PSPCL has calculated the same as 45% of the total consumption. PSPCL has already submitted detailed calculations to this effect to the Hon'ble Commission vide its Memo No. 2944/CC/DTR-121/Vol.11/TR-II dated 23 December, 2013.
2. The Hon'ble Commission had assumed the losses of AP feeders by deducting 2.5% losses of transmission level and 15% of the distribution losses as sub-transmission level losses which is not based on the facts. All new AP connections and shifted connections are on HVDS line only and therefore losses on AP feeders will not exceed 6-10%.

In light of the above, PSPCL prays to the Hon'ble Commission to approve the AP sales as submitted in the Petition.

#### 2.4 Transmission and Distribution (T&D) Losses

The actual T&D losses for FY 2015-16 arrived at based on the actual energy sales, own generation and energy purchase, works out to 14.71%, which is lower than the approved loss level of 15.50%, amounting to an over achievement of 0.79% in comparison to the target given by the Hon'ble Commission for the year.

PSPCL is making concrete efforts to reduce and control the losses and is already at par with some of the efficient utilities in the country. PSPCL has been able to restrict T&D losses to levels below the approved loss level. The loss reduction achieved is because of various loss reduction measures initiated by PSPCL. The lower than approved loss levels are an indication of the significant technical and operational efficiency efforts initiated by the PSPCL to reduce losses in the LT networks.

**Table 3: Approved Vs Actual T&D Losses for FY 2015-16**

Category	FY 2015-16
Overall approved loss reduction trajectory	15.5%
Actual Loss level (including Intra-State transmission losses)	14.71%

In the previous Tariff Orders, the Hon'ble Commission has disallowed part of the sales pertaining to AP consumption and added such disallowed sales to the T&D losses. The re-worked T&D losses being higher than the approved losses, the Hon'ble Commission is disallowing the consequential power purchase cost, by multiplying the excess losses with the average rate of power purchase. However, the average rate of power purchase



considered by the Hon'ble Commission includes the fixed cost of power purchase, which cannot be saved, even if the losses and hence, power purchase quantum is lower. Hence, disallowance of power purchase cost on account of excess losses, if at all considered appropriate, needs to be computed by multiplying the excess losses with the average variable rate of power purchase, after excluding the fixed cost of power purchase. In view of the same, it is prayed that the actual AP sales, which is in accordance with audited annual accounts of the PSPCL be approved for the final truing up for the year.

PSPCL has already taken initiatives to reduce T&D losses, details of which are discussed in the enclosed Compliance Report on directives given by Hon'ble Commission apart from furnishing of regular status of these initiatives.

In light of the above PSPCL prays to the Hon'ble Commission to approve the actual T&D loss of 14.71% for FY 2015-16.

## 2.5 PSPCL's Own Generation

### Gross Generation

PSPCL's actual thermal generation for FY 2015-16 is as indicated in the table below:

**Table 4: Gross and Net Generation for FY 2015-16 (MUs)**

Particulars	RE Approved in FY 2016-17 TO		Actual as per the audited accounts for FY 2015-16	
	Gross	Net	Gross	Net
Stations				
GNDTP	918.30	817.29	918.30	814.87
GGSSIP	3,959.00	3,622.48	3,959.00	3,600.70
GHTP	3,134.83	2,868.37	3,134.83	2,853.38
Total	8,012.13	7,308.14	8,012.13	7,268.95

PSPCL submits that its generating plants are operating as part of integrated grid and abide by the rules and regulations framed by CERC and the Hon'ble Commission to ensure the safety of the grid. In order to manage the frequency, PSPCL has to follow the instructions from Punjab State Load Dispatch Centre (PSLDC). In FY 2015-16, PSPCL has suffered loss of generation because of backing down of its generation on instructions received from PSLDC even though it was available for generation, as shown in the Table below:

**Table 5: Loss of generation due to backing down for FY 2015-16 (MUs)**

Generating station	Gross Generation approved in TO for FY 2016-17 (MUs)	Gross generation as per the audited accounts for FY 2015-16 (MUs)	Loss of Generation due to backing down instructions from SLDC (MUs)	Total Gross generation including loss of generation due to backing down (MUs)
GNDTP	918.30	918.30	2,842.176	3,760.48
GGSTP	3,959.00	3,959.00	6,508.32	10,467.32
GHTP	3,134.83	3,134.83	3,993.79	7,128.62
<b>Total</b>	<b>8,012.13</b>	<b>8,012.13</b>	<b>13,344.28</b>	<b>21,356.42</b>

PSPCL humbly requests the Hon'ble Commission to consider the loss of generation due to backing down instructions of PSLDC for assessing the performance of generating plants.

The details of actual unit wise generation and Plant Availability factor (PAF) (%) of different thermal stations for FY 2015-16 is summarized in the following tables:

**Table 6: GHTP unit wise generation and PAF for FY 2015-16**

Unit	Gross Generation (MUs)	PAF (%)
(Unit 1)	683.12	85.93
(Unit 2)	563.68	93.13
(Unit 3)	971.31	93.56
(Unit 4)	916.73	93.41
<b>TOTAL</b>	<b>3,134.83</b>	<b>91.68</b>

**Table 7: GNDTP unit wise generation and PAF for FY 2015-16**

Unit	Gross Generation (MUs)	PAF (%)
(Unit 1)	180.576	86.74
(Unit 2)	224.040	99.21
(Unit 3)	314.404	89.83
(Unit 4)	199.281	99.10
<b>TOTAL</b>	<b>918.301</b>	<b>93.75</b>

**Table 8: GGSSTP unit wise generation and PAF for FY 2015-16**

Unit	Gross Generation (MUs)	PAF (%)
(Unit 1)	696.45	92.91
(Unit 2)	885.06	98.66



Unit	Gross Generation (MUs)	PAE (%)
(Unit 3)	605.80	99.03
(Unit 4)	609.45	90.10
(Unit 5)	634.04	98.62
(Unit 6)	528.20	88.77
TOTAL	3,959.00	94.68

As can be seen from the above, PSPCL has achieved plant availability higher than the normative target of 85% for the plants at GNDTP, GGSSTP and GHTP.

Further, PSPCL submits that the Hon'ble ATE in its Judgment dated 3 March, 2009 in Appeal No. 96 of 2008 in case of UPRVUNL vs. UPERC & others held as under:

"9. When a plant is taken out for renovation and modernization, obviously the machine cannot be operated and has to necessarily remain out of service during the R&M work. In view of this, the Commission has rightly considered this period as "consequential impossibility of operation of such capacity". Having reached this right conclusion, the Commission could not have taken away the effect of this factual ground reality. Moreover, the Commission itself has amended its Regulation 16 "Norms of Operation" in which it has specified that, "the depreciation and interest on working capital in the annual capacity (in fixed) charges shall only be prorated to such effective capacity".

In the above said Judgment, it is recognized that period of R&M activities shall be treated as consequential impossibility of operation. Accordingly, PSPCL has considered the effective capacity for computation of plant availability for GNDTP plant. As regards the computation of plant availability in case of R&M activities, Hon'ble Commission has also envisaged such situation and specified separate norms for performance parameters in Regulation 36 of PSERC (Terms and Conditions for determination of Generation, Transmission, Wheeling and Retail Supply tariff) Regulations, 2014.

#### Generation Incentive

As per Regulation 10 of the PSERC Tariff Regulations 2005 as amended in 2009, any gain or loss, as the case may be, with respect to excess or under recovery with respect to norms and targets shall be retained/borne by the licensee itself. Further, Regulation 20 and Regulation 37 of PSERC Tariff Regulations 2005 as amended in 2009, specifies that while determining generation tariff, Commission shall be guided by Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2009 as amended from time to time.

The relevant extract of above mentioned Regulations is provided below:

*Regulation 10: Excess or under recovery with respect to norms and targets*

"1. The generating company or the licensee, as the case may be, shall retain the entire gain arising from over achievement of the norms laid down by the Commission in these Regulations or targets set by the Commission from time to time.

2. The generating company or the licensee, as the case may be, shall bear the entire losses on account of its failure to achieve the norms laid down by the Commission or targets set by the Commission from time to time."

*Regulation 20: Cost of generation*

"While determining the cost of generation of each thermal / gas / hydro electric generating stations located within the State, the Commission shall be guided, as far as feasible, by the principles and methodologies of CERC, as amended from time to time."

*Regulation 37: Generation tariff*

"The components of generation tariff shall be as laid down in the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2009 as applicable from time to time."

As can be seen from above, for the determination of generation tariff, PSERC is guided by the norms and principles as laid down in the CERC Tariff Regulations 2009. The Regulation 21 of the CERC Tariff Regulations 2009 states that the recovery of fixed charges inclusive of incentive payable shall be based on the Normative Annual Plant Availability Factor (NAPAF) for each station. The Regulation 26 (i) (a) of the above-mentioned regulations provide that the NAPAF for all thermal generating stations shall be 85%. The relevant extract of CERC Regulations 2009 is summarized below:

*Regulation 21: Computation and Payment of Capacity Charge and Energy Charge for Thermal Generating Stations*

"...(2) The capacity charge (inclusive of incentive) payable to a thermal generating station for a calendar month shall be calculated in accordance with the following formulae:

(a) Generating stations in commercial operation for less than ten (10) years on 1st April of the financial year:

$$AFC \times (NDM / NDY) \times (0.5 + 0.5 \times PAFM / NAPAF) \text{ (in Rupees);}$$



Provided that in case the plant availability factor achieved during a financial year (PAFY) is less than 70%, the total capacity charge for the year shall be restricted to  $AFC \times (0.5 + 35 / NAPAF) \times (PAFY / 70)$  (in Rupees).

(b) For generating stations in commercial operation for ten (10) years or more on 1st April of the year:

$AFC \times (NDM / NDY) \times (PAFM / NAPAF)$  (in Rupees).

Where,

AFC = Annual fixed cost specified for the year, in Rupees.

NAPAF = Normative annual plant availability factor in percentage

NDM = Number of days in the month

NDY = Number of days in the year

PAFM = Plant availability factor achieved during the month, in percent

PAFY = Plant availability factor achieved during the year, in percent"

*Regulation 26 (i): Normative Annual Plant Availability Factor (NAPAF)*

"(a) All thermal generating stations, except those covered under clauses (b), (c), (d), (e) & (f) - 85%"

As regards the generation incentive, the Hon'ble Tribunal has also decided in favor of PSPCL in its Judgment dated 18 October 2012 in PSPCL versus PSERC in the Appeal Nos. 7 of 2011, 46 of 2011 and 122 of 2011. The relevant extract of the said Judgment has been summarized as under:

"...However, for the purpose of tariff, the target plant availability as per the Central Commission's Regulations has to be considered. It may be mentioned in this connection that in the case Punjab State Transmission Corporation vs. PSERC, it has been held that when the provisions of the Tariff Regulations of the Central Commission have been incorporated by reference in the Tariff Regulations of the State Commission, the same is required to be followed and cannot be ignored by the State Commission." (Emphasis added)

Further, Hon'ble ATE in its Judgment dated 11 September, 2014 in Appeal No. 174 of 2012 has reiterated this in Judgment dated 18 October, 2012 and directed as under:

"40.4. The State Commission is not justified in applying the provisions of Tariff Regulations for generation target availability for recovery of fixed charges and incentive. The said approach of the State Commission while deciding issue no. (vi) is illegal and ill-founded. We have decided issue no. (vi) in favor of the appellant as the same issue is covered by the earlier judgment of this Appellate Tribunal dated 18.10.2012 passed in Appeal No. 7 of 2011 & batch wherein it was held that when the

provisions of the Tariff Regulations of the Central Commission have been incorporated by reference in the Tariff Regulations of the State Commission, the same is required to be followed and cannot be ignored by the State Commission. The State Commission has indicated that in the absence of segregated accounts for generation, the incentive cannot be worked out as per the Regulations for which we have given certain directions under paragraph 38. Accordingly, the State Commission shall examine the same issue afresh as per the directions given by this Appellate Tribunal in the aforesaid judgment dated 18.10.2012." (Emphasis added)

In view of the above Hon'ble ATE judgement, information of segregation of cost amongst various functions as per Audited accounts of FY 2015-16 is attached as Annexure - I

#### Auxiliary Consumption

The plant wise revised auxiliary consumption approved by the Hon'ble Commission in the Tariff Order for FY 2015-16 and the actual for the year are submitted as below:

**Table 9: Auxiliary Consumption for FY 2015-16**

Stations	RE Approved in FY2016-17 Tariff Order	Actual for FY 2015-16
GNDTP	11.00%	11.26%
GGSTP	8.50%	9.05%
GHTP	8.50%	8.98%

It is submitted that PSPCL strived hard to achieve the normative auxiliary consumption approved by the Hon'ble Commission. However, the actual auxiliary consumption is slightly higher than that approved by the Hon'ble Commission for all the three Generating Stations.

PSPCL submits that GNDTP, Bathinda is an old generating station whose units have already outlived their useful life of 25 years, as shown in the Table below:

**Table 10: Age details of GNDTP Plant**

Units	Capacity (MW)	COD	Age (Yrs)
U-1	110	22.09.74	44
U-2	110	19.09.75	43
U-3	110	29.03.78	40
U-4	110	31.01.79	39



- a) Furthermore, as per power demand scenario in the State of Punjab, GNDTP units remained under reserve shutdown for longer period and even during operational period; the units were backed down for maximum time as per directions of Power Controller (PC), Patiala. Frequent stop/start after reserve shutdown and running of units under backing down affects the performance of units. During FY 2015-16, there were 32 no. stop/start ups of GNDTP units after reserve shutdown, and total duration of reserve shutdown during FY 2015-16 was 23546.58 hours. During backing down, power generation is reduced but most of the auxiliaries remain running at nearly full load, which results in increase in percentage aux. consumption.
- b) It needs to be appreciated that technology constraints in 110 MW units make it really difficult even for the Original Equipment Manufacturers (OEMs) to commit any guaranteed performance for the units.
- c) As such, the auxiliary consumption remains more or less constant for the generating units; however, the auxiliary consumption for GNDTP is slightly higher, i.e., 11.26 % when compared to the Hon'ble Commission's approved figure of 11.00 %.
- d) In this regard, PSPCL also submits the relaxation provided by other SERCs for the State Generating Companies in their respective states based on the ground realities;
- e) Further, as per the Hon'ble Commission of Maharashtra state in its order dated September 12, 2010 in the matter of petition filed by MSPGCL directed as under:

"MSPGCL submitted that the Auxiliary Consumption for the first six months of FY 2009-10 for Paras was 15.00%, and projected Auxiliary Consumption of 13.38% for second half of the year, which is considerably higher than the approved auxiliary consumption of 9.70% in FY 2009-10, on account of the vintage of the stations and poor quality of coal. MSPGCL further submitted that the capacity of Unit-2 has been derated w.e.f. April 2007 and therefore, the auxiliary consumption for the Unit has increased. The other factors that are responsible for such increase are the partial loading due to inferior quantity of coal and supply of wet coal in the rainy season. MSPGCL has projected the auxiliary consumption of 14.10% for FY 2009-10 and 13.38% for FY 2010-11. It is also observed that there has been a considerable increase in the auxiliary consumption as compared to previous year's 12.18%.

The Commission in its Order dated March 5, 2010 in Case No. 16 of 2008 observed that the Auxiliary Consumption norm suggested by the independent agency (CPRI) for FY 2008-09 for some of the stations was substantially higher than the actual auxiliary consumption and hence, the Commission approved the Auxiliary Consumption norm for FY 2009-10 based on actual auxiliary consumption for FY 2008-09. The Commission at this stage has not revised



the auxiliary consumption norm for FY 2009-10. For FY 2010-11, the Commission has considered the norms suggested by CPRI."

Station	MYT Order	FY 2009-10			FY 2010-11		
		MSPGCL	CPRI	Approved	MSPGCL	CPRI	Approved
Paras	9.70%	14.10%	12.18%	12.18%	13.38%	12.45%	12.45%

Excerpt from UPERC Order for UPRVUNL for FY 2008-09 for allowing relaxation in auxiliary consumption norms

"In order dt.13.10.08, the Commission also observed that it was not averse to consider difficulty, if any, being experienced by the petitioner in achieving the operational norms at the time of determination of tariff. The Commission is aware of consumption of increased quantity of input due to high energy loss in auxiliaries in comparison to that on bench mark values, but petitioner's failure to carry out timely maintenance, which has actually led to higher auxiliary consumptions in the plants, can also not be ignored. The petitioner attributes the failure of maintenance to non-availability of adequate funds due to defaults in payment by the Respondents. In such situation, the Commission is of the view that impact of inefficiency in Obra-A, Obra- B, Harduaganj, Panki and Parichha should be shared by the Petitioner and the Respondents. Half of the increased auxiliary consumption above the benchmarks shall be borne by the Respondents for their failure in timely payment and the rest half shall be afforded by the petitioner for not being diligent in realising its revenue."

In view of the above decision, Auxiliary Consumption as approved by the Commission is given below:

Station	Auxiliary Consumption % (in Regulation)	Aux. consumption % (in Petition)	Aux. consumption % (Approved)
Obra A	10%	12%	11.00%
Obra B	9%	12%	10.50%
Panki	10%	12%	11.00%
Harduaganj	11%	12%	11.50%
Parichha	11%	12%	11.50%



It is further submitted that Regulation 20 of PSERC Tariff Regulations, 2005 as amended from time to time, specifies that while determining cost of generation, the Hon'ble Commission shall be guided by Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2009 as amended from time to time. Regulation 26 (iv) of CERC Tariff Regulations specify that the norms for auxiliary consumption for all thermal generating stations shall be 8.50% except for those mentioned in the said regulations. However, GNDTP having sets of 110 MW/120MW can be compared with Tanda Thermal power station, for which CERC has determined auxiliary consumption to be 12%. Thus, it can be seen that the actual auxiliary consumption for GNDTP station for FY 2015-16 being 11.17% is within the norm specified in the PSERC Regulations read with CERC Tariff Regulations 2009.

Further, the Hon'ble APTEL in its Judgment dated 18 October 2012, held as follows:

"...It appears to us that the Commission is not oblivious of the provisions of the Central Electricity Regulatory Commission Regulations. It is established that the Central Electricity Regulatory Commission Tariff Regulations, 2009 has provided auxiliary consumption at 12%. If the circumstances applicable to Tanda Stations are applicable to and are not different from GNDTP units then there will be not too much of rationale in deviation from the Central Electricity Regulatory Commission norms." (Emphasis added)

From the above ruling, it can be seen that the norm for auxiliary consumption for GNDTP station of 110 MW/120 MW unit sets should be benchmarked with that applicable for Tanda station at 12% in accordance with the provisions of the CERC Regulations.

The actual auxiliary consumption for GNDTP for FY 2015-16 is 11.26% which is lower than norm of 12.00 % as applicable to Tanda Central generating station. Thus, PSPCL prays to Hon'ble Commission to approve the auxiliary consumption for GNDTP at 12.00%.

For GHTP, the value of Auxiliary Consumption for FY2015-16 was 8.98%, which is higher than the norm of 8.5%. The reason for high values of auxiliary consumption for these periods is low PLF on account of low system demand.

## 2.6 Hydro Generation

The station wise actual generation from hydroelectric projects of the PSPCL for FY 2015-16 are compared with the previous submissions made to the Hon'ble Commission and the approvals thereon in the table provided below:

**Table 11: Hydro Generation for FY 2015-16 (MUs)**

Stations	RE Approved in FY 2016-17 TO	Actual as per Audited accounts for FY 2015-16
Shanan	532.62	532.62
UBDC Stage I & II	308.26	320.00
RSD	1958.27	1958.27
MHP	1169.45	1169.45
ASHP	668.53	668.53
Micro Hydel	6	5.94
Gross own Hydro Generation	4643.13	4654.799
Less: Auxiliary Consumption and Transformation Losses	38.74	38.16
Less HP Share in RSD and HP Royalty in Shanan	90	137.07
Net Own Hydro Generation (7-8)	4514.39	4479.568
PSPCL Share from BBMB	4275	4296.58
BBMB Common Pool Share	311	294.51
Net share from BBMB	4586	4591.08
Total	9100.39	9070.658

It is submitted that the hydro generation from own sources has been 9070.658 MUs as against 9100.39 MUs approved for the FY 2015-16 in revised estimates.

The following may be noted with respect to the hydro generation from PSPCL plants during FY 2015-16:

- a) The station-wise auxiliary consumption for FY 2015-16 - is as follows:

**Table 12: Auxiliary Consumption of hydro plants for FY 2015-16 (MUs)**

Stations	Auxiliary Consumption
Shanan	6.38
UBDC	1.98
MHP	20.51
ASHP	2.40
RSD	6.57
Micro Hydro	0.33
TOTAL	38.16



PSPCL humbly prays the Hon'ble Commission that net hydro generation for FY 2015-16 is approved at 9070.658MUs as per the submission under Table 11 above.

**Table 13: Summary of energy availability from own generation & BBMB share**

Particulars	Energy available (MUs)
Thermal	7268.94
Hydel	
Own Generation	4479.56
Share from BBMB (Including common pool share 294.51 MUs)	4591.08
Total Hydel (Own+ BBMB)	9070.65
Total (Hydel+ Thermal)	16339.60

## 2.7 Power Purchase

The net power purchase approved during the review exercise by the Hon'ble Commission in tariff order of FY 17, and the actual quantum of net power purchase made by PSPCL for FY 2015-16 is given in the table below:

**Table 14: Power Purchase for FY 2015-16 (MUs)**

Description	RE Approved in FY 2016-17 TO	Actual as per Audited Accounts FY 2015-16
Net Power Purchase	31534	32,414.04

It may be noted that the net power purchase for FY 2015-16 has been higher than the approved values in revised estimates due to increase in demand during FY 2015-16 and also due to lower generation from State thermal plants, which are running under MOD as per the Hon'ble Commission's directions.

## 2.8 Energy Balance

The energy balance as revised estimates as per TO for FY 2016-17 and compared with the actual energy balance of PSPCL for FY 2015-16 in the following table:

**Table 15: Energy Balance for FY 2015-16 (MUs)**

Description	RE Approved in FY2016-17 TO	Actual as per accounts FY 2015-16
A) Energy Requirement		
Metered Sales	29666	29,806.31
Sales to AP Consumers	10537	11,523.34
Total Sales within the State	40,203.00	41,329.65
T&D losses (%)	15.50%	14.71%
T&D losses	7375	7129.48
Sub Total	47578.00	48459.13
Sale to common pool of consumers	311	294.51
Outside State Sales	53	137.07
Total Requirement	47942	48890.71
B) Energy Available		
Own Gen. - Thermal	7308	7,268.95
Own Gen. - Hydro (Includes Shanan Royalty and free share from RSD to HP)	4514	4,616.64
BBMB Share (Including Common Pool)	4586	4,591.09
Purchase (Net)	31534	32,414.04
Total Available	47942	48890.71

For computing energy balance, PSPCL has also considered Shanan Royalty and free share from RSD to HP in energy requirement and energy availability.

It is submitted that the PSPCL has overachieved the T&D loss target for the FY 2015-16 by 0.79% by achieving a loss level of 14.71% as against the target of 15.50 % given by the Hon'ble Commission for the year.

PSPCL prays to the Hon'ble Commission to approve the energy balance and allow incentive for lower T&D loss of 14.71% than the approved trajectory T&D loss of 15.50% for the FY 2015-16.

## 2.9 Fuel Cost

The values of actual generation parameters, which are the determinants of the fuel cost incurred by PSPCL, for FY 2015-16 are compared with those approved by the Hon'ble Commission for FY 2015-16 in the RE approved in tariff order for FY 2016-17.



**Table 16: Comparison of Fuel Parameters (Approved Vs. Actual) for FY 2015-16**

Description	RE Approved in TO for FY 2016-17	Actual as per audited data
<b>Station Heat Rate (kcal/ kWh)</b>		
GNDTP	2750	2864.79
GGSTP	2450	2847
GHTP (1 & 2)	2450	2512
GHTP (3 & 4)	2428	
<b>Specific Oil Consumption (ml/ kWh)</b>		
GNDTP	0.5	2.31
GGSTP	0.5	0.66
GHTP (1 to 4)	0.5	1.08
<b>Coal transit loss (%)</b>		
GNDTP	1	1.28
GGSTP	1	0.18
GHTP (1 to 4)	1	-0.14
<b>Price of Coal (Rs/ MT)</b>		
GNDTP	4619.61	4691.41
GGSTP	5176.48	5196.14
GHTP (1 to 4)	5158.98	5348
<b>Price of Oil (Rs/ KL)</b>		
GNDTP	45751.99	44198
GGSTP	38467.07	37893.48
GHTP (1 to 4)	44438.5	42052

The coal transit losses for past three years are as under:

**Table 17: Coal transit losses**

Description	FY 2011-12	FY 2012-13	FY 2013-14	FY 2014-15	FY 2015-16
GNDTP	0.96	2.81	2.72	-0.20	1.28
GGSTP	0.79	-0.13	-0.01	-0.69	0.18
GHTP	1.46	2.28	0.94	-0.26	-0.14

From the above, it is observed that the coal transit losses are inconsistent for all three plants. PSPCL submits that the coal transit losses are not within its control and are attributable to the following reasons:

- Calibration of measuring instruments- Weighing of coal at two different locations having different calibration of weighing machines leads to error more than permissible limits.
- The transit loss occurred because of seasonal variation during the transportation of the coal which changes the moisture content of the coal during the transportation.
- The transportation of coal happens through open wagon. As soon as the goods are loaded on the wagon, it becomes owner risk and Railways' disowns the responsibility. It is subject to pilferages at all halts, which is beyond the control of PSPCL.
- During the unloading, small quantities of coal get stuck at the edges of the transport wagons due to moisture and remains undelivered to the plant, contributing to transit losses.

The actual specific oil consumption for FY 2015-16 is more than that approved by Hon'ble Commission due to regular backing down of generation.

PSPCL has achieved lower Station Heat Rate for GHTP Station than that approved by the Hon'ble Commission. However, Station Heat Rate for GGSSTP and GNDTP is slightly more than approved by the Hon'ble Commission for FY 2015-16.

The PSPCL's thermal plant-wise weighted average calorific value of coal and oil for FY 2015-16 has been summarized in the following table.

**Table 18: Weighted average calorific value of coal and oil for FY 2015-16**

Stations	RE of FY 2015-16 for Weighted Average calorific value of coal approved in FY 2016-17 T.O (Kcal/kg)	Actual Weighted Average calorific value of coal (Kcal/Kg)	RE of FY 2015-16 for Weighted Average calorific value of oil approved in T.O FY 2016-17 (Kcal/litre)	Actual Weighted Average calorific value of oil (Kcal/ litre)
GNDTP	4247.9	4,062	9896.65	9,400
GGSSTP	4290.56	4,125	9768.19	9,700
GHTP	4235.75	4,114.00	9875.83	9,500

As regards the deviation in technical parameters, PSPCL submits that the Hon'ble ATE has in the following Judgments advised the relaxation of norms required to be done and also in the context of old generating station:

Judgment dated 31 July, 2009 in Appeal No. 42 & 43 of 2008, in the matter of Haryana Power Generation Company Limited v. Haryana Electricity Regulatory Commission. In the above



decision, the issue that was raised was that the generating company had claimed the Station Heat Rate of 3450 kcal/kWh for its generating stations at Panipat Units 1 to 4, 2700 kcal/kWh for Panipat Units 5 & 6 and 4200 kcal/kWh for Faridabad Thermal Power Station based on their actual performance, vintage etc. The Hon'ble Tribunal was pleased to, inter-alia, hold as under:

"...The State Commission has to balance the interests of the consumers and the generators. If the targets given to the generating company are not achievable, no purpose would be served by setting such targets because such approach would adversely impact the financial position of the generator, which in turn would impact the investment in the electricity industry in the State. On the other hand, if the targets given are too liberal, the cost of power to end user would be higher, which would make the local industry and business uncompetitive. The Tariff Policy also lays emphasis on laying down standard which are achievable and encourage efficient operations. It is essential that the norms laid are not too liberal as to encourage inefficient operations, but at the same time are at least near to those achievable.

17. Therefore under the circumstances, it is essential for the State Commission to arrange for a station-wise study to determine the SHR of the power plants of the appellant. The study may be conducted in a time bound manner. If the study indicates substantial variation (say more than 2-3%) than the benchmarks adopted by the State Commission, after adjusting for reasonable deterioration due to elapse of time, may be re-determined by the State Commission.

The Judgment dated 10 April, 2008 in Appeal no. 86 & 87 of 2007, in the matter of Maharashtra State Power Generation Company Limited v. Maharashtra Electricity Regulatory Commission. Considering the claim of the generating company for a higher Station Heat Rate based on the age of the machines etc. the Hon'ble ATE, inter-alia, held as under:

"If the SHR allowed by the Commission is not achievable then the same could not be in anybody's interest; entity would suffer by not recovering its reasonable cost of supply of the electricity and the consumers would not get the right signal about the pricing of the product they would be using. Determining right price is also essential to send signals to the prospective developers/investors in the sector enabling them to take decision about the investment potential in the sector.

Under the circumstance, we feel that the Commission either on its own or through the Appellant engage appropriate independent agency(ies), who can



carry out a study in a time bound (preferably within three months) manner to reasonably assess the achievable SHR of the plants owned by the Appellant. Such agency may also be asked to suggest measures to improve the SHRs over a period of time."

In the ATE Judgment dated 23 November 2006 in Appeal No. 129 of 2006, in the matter of Gujarat State Electricity Company Limited v. Gujarat Electricity Regulatory Commission, the Hon'ble ATE while considering the claim of the generating company for allowing relaxed norms and parameters for old and vintage units as compared to net generating units who have not outlived their useful life, inter-alia held as under:

"Point C: Whether the claim of station heat rate should be allowed uniformly? Nextly, the learned counsel for the appellant advanced arguments and contended that the first respondent Commission ought not to have fixed the station heat rate for the vintage generating stations at the same level as applicable to a newer generating station. The older generating stations, by the passage of time, station heat rate of such old generating stations would further fall and deteriorate. The same cannot be held to be a deficiency on the part of the appellant. The problem of higher station heat rate is common to all the generating stations throughout India, which factor has been taken note of by various Regulatory Commissions and the CEA, where the generators have been permitted realistic norms. In fact the CERC has allowed higher station heat rates, so also other regulatory Commissions approved higher station heat parameters. That being a decision, it is contended that there is neither reason nor rhyme for the first respondent to have acted differently."

26. There is force in the submission made by the learned counsel for the appellant. Though, in the view of the first respondent Commission, the difference is very narrow but the cumulative effect of all the generating stations has a bearing which should not have been ignored by the first respondent Commission. The contention advanced in this respect deserves to be appreciated and sustained. Point C is answered as above and station heat rate has to be allowed considering the vintage and present condition of the station in view of the CEA recommendations and treatment given by CERC for similarly placed stations under its jurisdiction. We, therefore, order Point 'C' accordingly."

In light of the above submissions, PSPCL requests the Commission to allow the technical performance of stations at relaxed levels.



The approved values of the fuel cost for the thermal plants of the PSPCL in the Tariff Order for FY 2016-17 as compared with the actual for the period are shown in the table below:

**Table 19: Comparison of Fuel Cost (Approved Vs. Actual) for FY 2015-16 (Rs Cr.;**

Description	RE Approved in FY 2016-17 TO(per unit cost)	Actual as per audited accounts
GNDTP Unit I & II	278.95	314.70
GNDTP Unit III & IV		
GGSSTP	1185.56	1,431.21
GHTP(1 & 2)	377.22	1,036.94
GHTP(3 & 4)	566.12	
Total	2407.85	2,782.85

The actual fuel cost for the PSPCL, all thermal plants taken together, works out to Rs. 2,782.84 Cr.; in comparison to Rs. 2407.85 Cr.; approved by the Hon'ble Commission.

**Table 20: Comparison of Fuel Cost (Approved Vs. Actual) for FY 2015-16 (Rs./unit)**

Particulars	Gross Generation (MUs)	Fuel Cost (Rs. Cr.;	Per Unit (Rs./kWh)
As per Tariff Order for FY 2016-17, RE	8,012.13	2,407.85	3.01
PSPCL Actual as per Audited Accounts for FY 2015-16	8,012.13	2,782.85	3.47

As seen from the above table, Hon'ble Commission in tariff Order for FY 2016-17 has approved overall fuel cost of Rs 3.01 per unit however, PSPCL has able to keep the actual fuel cost to Rs 3.47 per unit for FY 2015-16 which is little higher than the approved.

PSPCL has considered the cost under the heads of cost of water, lubricant & consumable stores and Station supplies of Rs. 25.52 Cr.; in the R&M expenses in accordance with philosophy adopted by the Hon'ble Commission in previous Orders.

In light of the above submissions, PSPCL requests the Commission to allow the fuel cost of Rs. 2,782.85 Cr.; as per audited accounts for the FY 2015-16.

## 2.10 Power Purchase Cost

The Hon'ble Commission in the Tariff Order for FY 2015-16 approved a gross power purchase quantum of 32224 MUs at a total cost of Rs 12506.54 Cr., excluding transmission charges amounting to Rs. 1131.72 Cr.; payable to PSTCL. It is submitted that the PSPCL during FY 2015-16 has made actual gross power purchase of 32991.60 MUs at cost of Rs. 13024.47 Cr.; excluding transmission and associated costs of Rs 967.65 Cr.; paid to PSTCL as provided in the audited accounts for the year.

**Table 21: Approved Vs. Actual Power Purchase for FY 2015-16**

Description	RE Approved in FY 2016-17 TO		Actual for FY 2015-16	
	MUs	Rs. Cr.,	MUs	Rs. Cr.,
Power Purchase including PGCIL / Inter-state transmission charges	32,224	12,506.54	32,991.60	13,042.47
Add: PSTCL Transmission Charges paid to PSTCL		1131.72		967.65
Total		13,638.26		14,010.12

The source wise/ plant wise details of power purchase cost from various sources has been summarized in Format 7-B.

There is an increase in actual power purchase cost by Rs. 371.86 Cr.; over the approved power purchase cost for FY 2015-16. The increase is mainly attributing due to the additional power purchase of 524.80 MU's against the approved quantum of power purchase. The same is beyond the control of PSPCL.

PSPCL prays to the Hon'ble Commission to approve the cost of power purchase of Rs.13042.47 Cr.; and transmission charges of Rs. 967.65 Cr.; for FY 2015-16 as per audited annual accounts for the year.

## 2.11 Employee Cost

The Commission approved employee cost of Rs. 4572.59 Cr.; for FY 2015-16 as per revised estimates in Tariff Order for FY 2016-17. The actual employee expenses incurred during the period FY 2015-16 have been Rs. 4398 Cr.; as per the audited annual accounts. The break-up of actual employee cost for FY 2015-16 is summarized in the following table.



**Table 22: Actual Employee Costs for FY 2015-16 (Rs Cr.;**

Item	Amount as per Audited Accounts for FY 2015-16
<b>Salaries &amp; Allowances</b>	
Basic Pay	1,103.48
Overtime	11.70
Dearness Allowance	1,081.75
Fixed medical Allowance	24.00
Conveyance Allowance	31.85
Other Allowances	156.21
Bonus/ Generation Incentive	16.64
Medical Expenses Reimbursement	18.18
<b>Total (1 to 9)</b>	<b>2,443.81</b>
<b>Terminal Benefits</b>	
Earned Leave Encashment	152.58
Gratuity (including arrear)	246.42
Workman's compensation	0.15
<b>Total</b>	<b>399.15</b>
<b>Pension Payments</b>	
Basic Pension	-
Dearness pension	1,309.81
Dearness Allowance	-
Any other expense	132.48
<b>Total</b>	<b>1,442.29</b>
<b>Total Expenses</b>	<b>4,285.25</b>
Less: Amount capitalised	121.48
<b>Net amount</b>	<b>4,163.77</b>
Prior Period*	-
Add: BBMB share	234.22
<b>Net Employee's Cost</b>	<b>4,397.99</b>

\*Note: Employee Costs relating to Prior Period has been considered separately under Prior Period Expenses

PSPCL submits that the employee cost of FY 2015-16 has been lower than that approved by the Hon'ble Commission in tariff order for FY 2015-16.

PSPCL submits that the Hon'ble Commission has been disallowing the employee costs on the grounds that the erstwhile PSEB and PSPCL have not taken adequate steps to control the same. It was further pointed out by the Hon'ble Commission that overall productivity of the employees is not demonstrated by PSPCL.

In this regard, PSPCL submits that it has taken initiatives to reduce the employee cost as well as increasing the productivity and efforts taken by PSPCL have been realized in actual cost of FY 2015-16.

PSPCL submits that a lawful Tripartite Agreement between GOP, Management of the Two successor Companies of erstwhile PSEB namely PSPCL and PSTCL and all unions and associations of PSPCL and PSTCL (erstwhile PSEB) already exists vide which the terms and condition for the working of the employees including payments of salaries, etc., have also been fixed. The Tripartite Agreement has been notified by the Govt. of Punjab, Department of Power vide notification no. 11/80/2010-PE1/1962 dated 24.5.2011.

The PSPCL further submits to the Hon'ble Commission that it is a State Government owned entity and is liable to follow the statutory provisions of the rules and regulations as laid down by the State Government. Accordingly, any increase in employee cost due to revision in DA, arrears of pay, etc., have to be borne by PSPCL and are beyond its control.

Being Government owned company and as per the provisions of the Tripartite Agreement, PSPCL cannot retrench or remove its employees and it is not possible either to deny the payment of the full wages to its employees or otherwise provide any less favorable terms and conditions to the employees.

The fresh recruitments being carried out by PSPCL are strictly after obtaining the approval of the State Government and the salaries and other perquisites are paid to the employees as per the terms and conditions fixed for the employment and notifications issued by GOP from time to time.

With regard to the employee cost, Hon'ble ATE vide its Judgment dated 11.09.2014 in Appeal No 174/2012 and its subsequent Judgment dated 30.3.2015 in review Petition 6/2015 pertaining to the employees cost had held (paragraph 11 of the Judgment dated 30.3.2015) as under:

"This Appellate Tribunal while dealing with the issue of Wholesale Price Index, framed the said issue and discussed the same at length and then decided the said issue. This Appellate Tribunal in its previous judgment also considered the Regulations and the Wholesale Price Index and held that actual costs need to be considered. We after considering the previous judgment and discussion on the said issue at length in our judgment dated 11.09.2014 in the said Appeal No. 174 of 2012, after referring to the decision of the State Commission on the Wholesale Price Index, directed that the actual amount spent, subject to prudence check, is to be considered. We do not find any error



apparent on the face of our judgment dated 11.09.2014 warranting us to review our aforesaid judgment. For a moment, if we accept the contention of the Review Petitioner/State Commission that the finding in para no. 40.1. of our judgment dated 11.09.2014 is to be deleted, then it would result in the Issue No. (ii) framed being rendered without any finding and would also result in the previous decisions also being overruled/reversed. While disposing of the Issue Nos. (i) & (ii) in our judgment in Appeal No. 174 of 2012, we expressed our view in para nos. 17 & 18 of our judgment which we have already quoted above"

Keeping in view the above judgments of Hon'ble APTEL, Hon'ble Commission allowed the actual employee cost for the FY 2011-12 in its tariff order for FY 2013-14. PSPCL therefore prays the Hon'ble Commission that the employee cost of Rs. 4398 Cr.; for FY 2015-16 be approved as per audited annual accounts for the year.

## 2.12 Repair & Maintenance Expenses

The Hon'ble Commission had approved R&M expenses at Rs. 419.56 Cr.; for FY 2015-16 as per RE in the Tariff Order for FY 2016-17 based on normative basis.

The actual R&M expenses for the FY 2015-16 are Rs 386.83 Cr.; as per the audited annual accounts for the year. The details of actual R&M cost for FY 2015-16 has been summarized in the following table.

**Table 23: Actual Repair and Maintenance Expenses for FY 2015-16 (Rs. Cr.)**

Particulars	As Per Audited Accounts of FY 2015-16
Plant & machinery	242.72
Building	15.63
Hydraulic works & civil works	10.52
Line cable & network	70.78
Vehicles	1.79
Furniture & fixtures	0.04
Office equipments	0.27
Operating expenses	25.52
<b>Total</b>	<b>367.27</b>
Add: BBMB share	22.60
<b>Total Expenses</b>	<b>389.87</b>
Less: R&M Expenses Capitalized	3.04
<b>Net expenses</b>	<b>386.83</b>

Add prior period*	-
<b>Total Expenses charged to Revenue</b>	<b>386.83</b>

\* Repair & Maintenance Expenses relating to Prior Period have been considered separately under Prior Period Expenses

PSPCL has also considered the fuel cost under the heads of Cost of water, lubricant & consumable stores and Station supplies of Rs. 25.52 Cr.; in the R&M expenses in accordance with the philosophy adopted by the Hon'ble Commission in previous Orders.

PSPCL submits that Regulation 28 of PSERC Tariff Regulations, 2005 allows the R&M expenses on normative basis only. However, Hon'ble Commission while determining the R&M expenses for FY 2011-12 in tariff Order of FY 2013-14 has approved the R&M expenses as per audited accounts. The Hon'ble Commission while approving the R&M expenses has taken an inconsistent approach, namely wherever, the actual is more than the normative, the normative is adopted and wherever the actual is less than the normative, being lesser, the actual is adopted. The methodology adopted of allowing the actual or normative whichever is less, is an incorrect methodology and contrary to concept of normative wherein the benefit for overachievement should remain with the utility and as per decision of Hon'ble ATE in the Judgment dated 18 October, 2012.

Hon'ble Commission at time of review of FY 2012-13 in its tariff Order of FY 2015-16 has recognized that the approach adopted for allowing R&M expenses is not correct. The relevant extract of the Order is as under:

"3.11.2 ... ..

In the previous years, the Commission had allowed actual or normative expenses whichever are less holding that normative expenses were the maximum allowable expenses and could not be allowed over and above the claim. However, Hon'ble APTEL in its judgment dated 18.10.2012 passed in petition nos.7, 46 and 122 of 2011 filed by PSPCL against the Tariff Orders for FY 2009-10, FY 2010-11 and FY 2011-12 had observed that the PSERC Tariff Regulations provide for allowing R&M and A&G expenses on normative basis and not on normative or actual, whichever is less. " (emphasis added)

In view of the above, PSPCL submits R&M expenses computed on the base R&M expenses for FY 2011-12 which was determined on normative basis as under:

**Table 24: Repair and Maintenance Expenses on normative basis for FY 2015-16 (Rs. Cr.;**

Item	Amount (Rs. Cr.)
------	------------------



Item	Amount (Rs. Cr.)
Base R&M Expenses for Escalation	566.52
WPI (%)	-2.43%
R&M expenses applying WPI	552.75
R&M expenses on assets additions during the year	12.25
Total R&M Expenses for FY 2015-16	565.00

PSPCL humbly requests the Hon'ble Commission to approve the above R&M expenses of Rs.565.00 Cr.; for FY 2015-16.

### 2.13 Administrative & General Expenses

The Hon'ble Commission had approved A&G expenses at Rs. 138.36 Cr for FY 2015-16 as per RE in the Tariff Order for FY 2016-17. The actual A&G expenses for FY 2015-16 are Rs. 186.11 Cr.; as per the audited annual accounts for the year. The details of the actual A&G expenses for FY 2015-16 is summarized below:

**Table 25: Actual Administrative & General Expenses for FY 2015-16 (Rs. Cr.)**

Particulars	As per Audited Accounts of 2015-16
Rent Rates & taxes	4.71
Insurance	0.54
Telephone, postage & Telegram	8.00
Consultancy Fee	0.38
Technical Fee	0.03
Other Professional Charges	13.20
Conveyance & Travelling	34.68
Electricity & Water	12.76
Other	102.96
Freight	10.25
Other Material related expenses	14.95
<b>Total Expenses</b>	<b>202.46</b>
Add: BBMB share	4.93
<b>Total Expenses</b>	<b>207.39</b>
Less: Capitalised	21.28
<b>Net Expenditure</b>	<b>186.11</b>
Add Prior Period*	
<b>Total</b>	<b>186.11</b>

\*Administrative & General Expenses relating to Prior Period have been considered separately under Prior Period Expenses

PSPCL submits that Regulation 28 of PSERC Tariff Regulations, 2005 allows the A&G expenses on normative basis only. However, Hon'ble Commission while determining the A&G expenses for FY 2011-12 in tariff Order of FY 2015-16 has approved the A&G expenses as per audited accounts. The Hon'ble Commission while approving the A&G expenses has taken an inconsistent approach, namely wherever, the actual is more than the normative, the normative is adopted and wherever the actual is less than the normative, being lesser, the actual is adopted. The methodology adopted of allowing the actual or normative whichever is less, is an incorrect methodology and contrary to concept of normative wherein the benefit for overachievement should remain with the utility and as per decision of Hon'ble ATE in the Judgment dated 18 October, 2012.

Hon'ble Commission at time of review of FY 2012-13 in its tariff Order of FY 2013-14 has recognized that the approach adopted for allowing A&G expenses is not correct. The relevant extract of the Order is as under:

"3.12.2 ... ..

In the previous years, the Commission had allowed actual or normative expenses whichever are less holding that normative expenses were the maximum allowable expenses and could not be allowed over and above the claim. However, Hon'ble APTEL in its judgment dated 18.10.2012 passed in petition nos.7, 46 and 122 of 2011 filed by PSPCL against the Tariff Orders for FY 2009-10, FY 2010-11 and FY 2011-12 had observed that the PSERC Tariff Regulations provide for allowing R&M and A&G expenses on normative basis and not on normative or actual, whichever is less. " (emphasis added)

In view of the above, PSPCL submits the A&G expenses computed on the base A&G expenses for FY 2011-12 which was determined on normative basis as under:

**Table 26: Administration and General Expenses on normative basis for FY 2015-16 (Rs. Cr.:**

Item	Amount (Rs. Cr.:
Base A&G Expenses	152.11
WPI (%)	-2.43%
A&G expenses applying WPI	148.42
A&G expenses on asset addition during the year	3.29
License fees, fees for determination of tariff	12.51
Total A&G Expenses for FY 2015-16	164.21



The actual A&G expenses are higher than that derived as normative as during this year, PSPCL has donated money worth Rs. 5 Cr.; to Director/ Culture Affair, Punjab as an initiative towards corporate and social responsibility. This has increased the cost by Rs.5 Cr.; during FY 2015-16.

PSPCL submits that making such donations are in the benefit of the society which is also a responsibility while running a business. The Hon'ble Commission is therefore requested to allow this amount as a pass through to the consumers.

As per Regulation 28(2) (b) of the PSERC Tariff Regulations, 2005 as amended from time to time, PSPCL has considered expenditure on account of license fee, initial or renewal, fee for determination of tariff and audit fee, over and above the normative A&G expenses.

In view of above submissions, PSPCL humbly request the Hon'ble Commission to approve the A&G expenses of Rs. 186.11 Cr.; for FY 2015-16.

#### **2.14 Depreciation**

The Hon'ble Commission had approved depreciation charges at Rs. 991.87 Core for FY 2015-16 as per RE in the Tariff Order for FY 2016-17. However, the actual depreciation cost for the FY 2015-16 as per the audited annual accounts is higher at Rs. 1046.80 Cr.;

PSPCL submits that the depreciation charges during FY 2015-16 are on account of asset added during the year and based on the depreciation rates approved by the Hon'ble Commission in its Regulations.

The PSPCL prays to the Hon'ble Commission to approve the Depreciation Charges of Rs. 1046.80 Cr.; for FY 2015-16 as per audited accounts as proposed above.

#### **2.15 Interest & Finance Charges**

The Hon'ble Commission had approved interest and finance charges at Rs. 1666.98 Cr.; for FY 2015-16 as per RE in the Tariff Order for FY 2016-17. Whereas, the net interest and finance charges for the FY 2015-16 are Rs. 2880.61 Cr.; as per the audited annual accounts for the year. PSPCL submits details of Interest and Finance Cost for debt taken by PSPCL for the FY 2015-16 is Rs. 2880.60 Cr.; As per below table:

**Table 27: Interest and details of loans for the year 2015-16**

Sr. No.	Particulars	Opening Balance as on 01.04.2015	Additions from 01.04.2015 to 31.03.2016	Repayments from 01.04.2015 to 31.03.2016	Closing Balance as on 31.03.2016	Amount of Interest Paid/Payable
<b>A.</b>	<b>Long Term Loans</b>					
1	Non SLR Bonds	340.00	0.00	8.40	331.60	33.28
2	LIC	0.00	0.00	0.00	0.00	0.00
3	REC Limited					
	T & D Scheme Loans	4551.97	654.55	603.02	4603.50	543.37
	R-APDRP	51.15	226.17	0.00	277.32	46.69
	Generation Schemes	1002.81	74.57	307.44	769.94	111.61
4	Commercial Banks:					
	Long Term Loans	2165.15	750.00	295.11	2620.04	281.52
5	PFC Limited					
	Generation Schemes	115.32	0.00	17.73	97.59	12.39
	T&D Schemes	1.24	0.00	0.06	1.18	0.16
6	CSS Loans:					
	APDRP	51.95	0.00	6.31	45.64	5.71
	R-APDRP	385.86	29.86	4.19	411.53	40.25
7	Govt. of Punjab Loans(UDAY BONDS)	0.00	9859.72	0.00	9859.72	3.65
8	RBI Bonds	16.24	1.38	0.00	17.62	1.38
9	GPF Liability	2002.90	0.00	230.02	1772.88	162.73
<b>A.</b>	<b>Total Long Term Loans (1 to 9)</b>	<b>10684.59</b>	<b>11596.25</b>	<b>1472.28</b>	<b>20808.56</b>	<b>1242.74</b>
<b>B.</b>	<b>Working Capital Loans</b>					
(i)	Normal Working capital loans	7736.60	5152.50	9464.10	3425.00	1049.82
(ii)	Bridge Loans					
	- Working Capital Loans raised due to loans recall by GOP	3074.91	0.00	0.28	3074.63	331.16
	- Working Capital Loans raised due to adjustment of Rbi Bonds from subsidy by GOP	1173.12	0.00	0.00	1173.12	126.34



Sr. No.	Particulars	Opening Balance as on 01.04.2015	Additions from 01.04.2015 to 31.03.2016	Repayments from 01.04.2015 to 31.03.2016	Closing Balance as on 31.03.2016	Amount of Interest Paid/Payable
	- Working Capital Loans raised due to excess interest paid to GOP	426.15	0.00	0.00	426.15	45.90
	- Working Capital Loans raised due to carrying cost gap for 2010-11 & 2011-12 as per Tariff Order not released by GOP	379.95	0.00	0.00	379.95	44.67
(iii)	Working Capital Loans raised due to payment towards additional levy for PANEM coal mine	390.00	0.00	0.00	390.00	45.85
(iv)	Working Capital Loans raised due to payment made to PTC Mallana as per orders of Hon'ble Supreme Court	40.00	0.00	0.00	40.00	4.70
<b>B.</b>	<b>Working Capital Loans (i+ii+iii+iv)</b>	<b>13220.73</b>	<b>5152.50</b>	<b>11942.21</b>	<b>6431.02</b>	<b>1648.44</b>
	<b>TOTAL (A+B)</b>	<b>23905.32</b>	<b>16748.75</b>	<b>13414.49</b>	<b>27239.58</b>	<b>2891.18</b>
	Interest On Consumer					192.06
	<b>Total Interest</b>					<b>3083.24</b>
	Less Capitalisation					-382.69
	<b>Net Interest</b>					<b>2700.55</b>
	Guarantee Fees					90.93
	Other Interest					89.13
	<b>Total Interest and Finance Charges</b>					<b>2880.61</b>

PSPCL submits that the short-term borrowings by the PSPCL are higher than the normative working capital requirements as determined by the Hon'ble Commission due to the following reasons;

- Regulatory disallowances on account of high employee costs;
- Regulatory disallowances in fuel cost and power purchase cost;
- Regulatory disallowances in interest & finance charges on accounts of assessed diversion of funds;
- Non-refund of interest payment by the GOP leading to cash flow issues further leading to increased dependence on short-term borrowings.

e) Regulatory disallowances on account of carrying cost

**Interest on Bridge Loans**

PSPCL further submits that it has been under a severe financial crunch and required to take loans and advances to meet its deficit revenue requirements and meeting its statutory payments. PSPCL is not in position to meet its expenditure from the tariff. PSPCL has a total working capital loan of about Rs. 13220.73 Cr.; as on 1 April, 2015. The working capital requirement computed on the normative basis is not sufficient to meet the requirement; hence the interest charges paid by PSPCL on the working capital loans need to be allowed.

The Hon'ble Commission was allowing interest on working capital loans on normative basis. However the commission was allowing additionally interest on the bridge loans as under:

- Interest on Loans taken to replace re-called GOP Loans.
- Interest on Bridge Loan taken in lieu of adjustment of Rs. 981.93 Crore during FY2012-13 against subsidy.
- Interest on Bridge Loans raised on account of non-refund of interest by GOP

On Account of Financial Year	Respective Tariff Order for Financial Years	PSERC as Allowed by Hon'ble Commission (Cr.)	Remarks
2012-13	2012-13	377.76+109.17	Even not discussed during trued up and not allowed
2013-14	2013-14	339.98+110.37+50.73	Even not discussed during trued up and not allowed
2014-15	2014-15	339.68+110.37	Interest on loans of 3022.10 Cr.; taken to replace re-called GoP loans T.O. 2014-15 (Interest on Bridge Loan taken in lieu of adjustment of Rs. 981.93 Crore during FY2012-13 against subsidy.
2015-16	2016-17		Even not discussed the issue of allowing interest on bridge loan
2016-17	2016-17		Even not discussed the issue of allowing interest on bridge loan and has also not allowed the same in FY 13 & FY 14 trudeup

It is therefore requested that Hon'ble PSERC should take cognizance of allowing the interest on



Bridge Loans while truing up for FY-2014-15 and FY 2015-16 and approving the revised estimates of interest on bridge loans for FY 2016-17 and projections of interest on bridge loans for FY 2017-18 in its coming T.O. 2017-18.

### Finance Charges

PSPCL has incurred finance charges of Rs. 180.06 Cr.; during the FY 2015-16 as per the audited Annual Accounts for the year, which comprises payment made towards guarantee fees Rs. 90.93 Cr.; and others bank charges and interest charges Rs. 89.13 Cr.;

The PSPCL humbly prays to the Hon'ble Commission to approve the finance and other charges at Rs. 180.06 Cr.; as per the audited annual accounts for the year for final truing-up for the year.

### Interest on Consumer Security Deposit

PSPCL submits that interest is payable to the consumers on the security deposits as per PSERC (Electricity Supply Code and Related Matters) Regulations, 2007. The interest on Consumer Security Deposits for the FY 2015-16 as per the audited Annual Accounts for the year is at Rs. 192.06 Cr.; The same is compared with the past approvals below:

**Table 28: Interest on Consumer Security Deposit: Approved Vs. Actual (Rs. Cr.)**

Description	RE Approved in TO for FY 2016-17	Actual per audited annual accounts
Interest on Consumer Security Deposit	190	192.06

The interest on Consumer Security Deposit is as per the audited annual accounts of the PSPCL for FY 2015-16. It is prayed to the Hon'ble Commission that the amount of Rs. 192.06 Cr.; as per audited annual accounts be approved for final truing up for the year.

### Capitalization of Interest & Finance Charges

The capitalization of interest and finance charges for FY 2015-16 as per the audited Annual Accounts for the year is at Rs. 382.69 Cr.; it is prayed to the Hon'ble Commission that same be approved.

PSPCL humbly prays the Hon'ble Commission that the total Interest & Finance Charges for the FY 2015-16 at Rs. 2880.61 Cr.; as per actual, in accordance with the audited annual accounts for the year be approved by the Hon'ble Commission.

## 2.16 Prior Period Income/ Expenses

Prior Period Items are defined as those items which arise on account of retrospective changes in the basis of accounting for previous years, short or excess provision made, waiver of any liability relating to revenue expenses of past years is being treated as prior period income and vice-versa. As per the audited annual accounts for FY 2015-16, there is a net Prior Period expenses of Rs. 35.47 Cr., the break-up of which is elaborated in the table below:

**Table 29: Prior period Expenses for FY 2015-16 (Rs. Cr.;**

Item	As per audited annual accounts for FY 2015-16
<b>Income relating to previous year.</b>	
Sale of Power	6.52
Interest income for prior periods	0.15
Excess prov. For depreciation	3.34
Excess provision for Interest & finance Charges	1.17
Other excess provision	7.32
Other Income	1.23
<b>Sub Total</b>	<b>19.73</b>
<b>Prior period expenses / losses</b>	
Operating expenses	2.05
Employee costs	3.07
Depreciation unprovided in previous years	46.70
Interest & finance charges	1.12
Administrative Exps. Previous year	1.50
Freight & other purchase related expenses	0.76
<b>Total</b>	<b>55.20</b>
<b>Net prior period (Credit) / Charges - PSPCL</b>	<b>35.47</b>

PSPCL humbly prays to Hon'ble Commission to approve net prior period expenses of Rs. 35.47 Cr.; for purpose of final true-up for FY 2015-16 as per audited annual accounts.

## 2.17 Non-tariff Income

The break-up actual other income (Non-tariff income) of the PSPCL for the FY 2015-16 as per the audited annual accounts for the year has been provided in the following table.



**Table 30: Non Tariff Income for FY 2015-16 (Rs. Cr)**

Particulars	FY 2015-16
Meter/service rent	90.49
Late payment surcharge	80.30
Theft & pilferage of energy	51.30
Misc. Receipts	321.60
Misc. charges (except PLEC)	14.24
Wheeling charges	339.46
Interest on staff loans & advance	67.00
Income from trading	8.00
Income staff welfare activities	0.05
Excess on verification	-
Investments & bank balances	15.88
Gain on sale of asset	0.01
<b>Total income</b>	<b>988.33</b>
BBMB Income	6.03
<b>Total non tariff income</b>	<b>994.36</b>
<b>Less: Late Payment surcharge</b>	<b>80.30</b>
<b>Less: Rebate for timely payment for Power Purchase</b>	<b>70.11</b>
<b>Net Non-tariff Income</b>	<b>843.95</b>

PSPCL prays to the Hon'ble Commission to not to consider the amount against the Late Payment Surcharge as a part of the Non-Tariff Income for the purpose of true-up for FY 2015-16 . Further, PSPCL submits that the interest on working capital is allowed on normative basis which is lower and does not include the actual interest which PSPCL has to fund on account of late payment. Thus, when the late payments are received from the consumers, the loans taken to fund the gap and the delay in the receipt in payment is to be account and the same is not allowed in the revenue requirements. However, when the consumer pays the late payment surcharge for the delay in the payment, instead of the same being available to set off the costs incurred by PSPCL, the late payment surcharge is included in the non-tariff income to reduce the revenue requirements. There is no compensation to the PSPCL on account of interest accrued on delayed payments against bills issued to the consumer. Accordingly, considering the Late Payment Surcharge as Non-Tariff/ Other Income adversely impacts the cash flow position of the PSPCL.

Hon'ble ATE in Judgment dated October 4, 2007 in Appeal No. 223 of 2006 in the matter of M.P. Electricity Consumers' Society C/o AIMO (MPSEB), v/s Madhya Pradesh Poorva/Madhya/Paschim Kshetra Vidyut Vitaran Companies, Madhya Pradesh Electricity Regulatory Commission; Govt. of Madhya Pradesh through Principal Secretary has held

that the delayed surcharge revenue shall not be considered. The relevant extract of Judgment in as under:

"13. On a consideration of contentions of all parties, we are inclined to agree with the decision of the Commission to not include delayed surcharge revenue in the ARR in view of the fact that the working capital amount has been reduced to the bare minimum, 100% collection is not happening as of now, and therefore, to meet its cash requirements, the Discoms will have to borrow from Banks to compensate for the outstanding payments from consumers."

Several other SERCs and utilities also follow the same approach with respect to income from late payment surcharge. The excerpts from relevant regulations/ orders has been summarized below:

State	Clause No	Relevant extract
Madhya Pradesh State Regulatory Commission	Clause No 2.42 of Terms and Conditions for determination of tariff for supply and wheeling of electricity and methods and principles for fixation of charges Regulation 2009	The late payment surcharge shall not be considered as income for the purpose of determination of gap between Annual Revenue Requirement and Tariff and Other Income.
Madhya Pradesh	APTEL Judgment against Appeal No. 223 of 2006	On a consideration of contentions of all parties, we are inclined to agree with the decision of the Commission to not include delayed surcharge revenue in the ARR in view of the fact that the working capital amount has been reduced to the bare minimum, 100% collection is not happening as of now, and therefore, to meet its cash requirements, the Discoms will have to borrow from Banks to compensate for the outstanding payments from consumers.
Delhi Electricity Regulatory Commission	Clause No. 5.35 of Terms and Conditions for determination of wheeling tariff and retail supply tariff Regulation 2011	All incomes being incidental to electricity business and derived by the Licensee from sources, including but not limited to profit derived from disposal of assets, rents, net late payment surcharge (late payment surcharge less financing cost of late payment surcharge), meter rent (if any), income from investments, income on investment of consumer security deposit and miscellaneous receipts from the consumers shall constitute Non-Tariff Income of the Licensee:
NDPL, New Delhi	APTEL Appeal No 153 of 2009	Commission: As regards the delayed payment surcharge collected by the Petitioner during the year, the



State	Clause No	Relevant extract
		Commission is of the opinion that there is a financing cost associated with the delayed payment surcharge. Therefore, while computing the delayed payment surcharge, the Commission has deducted the carrying cost of financing the same @ 9% per annum. APTEL Judgment: The financing cost of outstanding dues, i.e. the entire principal amount, should be allowed and it should not be limited to late payment surcharge amount alone. While fixing the interest rate, the State Commission should have considered the prevalent SBI prime lending rate.
Bihar Electricity Regulatory Commission	Tariff Order for FY 2011-12	<p>BSEB submitted that the DPS for delayed or non-payment of dues by sundry debtors for sale of energy has been treated as accrued to the extent of certainty of its realization. Accordingly only 5% of the total DPS charge has been considered as realizable from the consumer during the year. However, the total amount (i.e. 100%) of DPS has been shown as recoverable from consumers in consumer ledger maintained at field accounting unit whereas 95% of the same will be taken into accounts in the year of its realization.</p> <p>Commission's View: The Commission agrees with the methodology adopted by BSEB to compute non-tariff income. At the same time, the Commission feels that it is necessary to adjust some components of non-tariff income based on recent developments in the sector which do appropriately reflect the past trend. Accordingly, the Hon'ble BERC has approved Late payment surcharge (on basis of Collection) as proposed by BSEB.</p>

Also, the surcharge for late payment for power purchase is being disallowed by the Hon'ble Commission. On the same analogy, the rebate for timely payment of power purchase should not be considered in the non tariff income.

In view of the above it is prayed that the Late Payment Surcharge of Rs. 80.30 Cr.; and rebate of Rs. 70.11 Cr.; for timely payment of power purchase may not be considered in the non tariff income and accordingly non tariff income of Rs.843.95 Cr.; may be approved.

## 2.18 Subsidy

For FY 2016-17 the total subsidy receivable from the State Government for the FY 2015-16 was Rs. 6,443.63 Cr.; while the PSPCL has actually received Rs. 4847 Cr.;

The computation of subsidy receivable during the year has been summarized in the following table:

**Table 31: Revenue/ Tariff Subsidy Receivable FY 2015-16 (Rs. Cr)**

Particulars	No. of consumers	Consumption as per account (in Mus)	Revenue required			Total amount of subsidy due from GOP	Amount of subsidy received from GOP	Amount of subsidy received from GOP excess/short (+/-)
			Energy charges	Meter rentals and service charges etc.	Total			
AP Consumers	12,43,699	11,513.87	5,311.28	9.00	5,320.28	5,320.28		
Scheduled Castes DS Consumers	13,90,760	2,050.32	1,037.33	15.74	1,053.07	1,053.07		
Non- SC BPL DS Consumers	96,971	136.75	69.03	1.25	70.28	70.28		
<b>Total</b>	<b>27,31,430</b>	<b>13,700.94</b>	<b>6,417.64</b>	<b>25.99</b>	<b>6,443.63</b>	<b>6,443.63</b>	<b>4,847.00</b>	<b>(1,596.63)</b>

The total amount of revenue subsidy received during FY 2015-16 is Rs. 4847 Cr.; against the total subsidy receivable of Rs. 6443.63 Cr.; for the year leading to a shortfall of Rs. 1596.63 Cr.; in receipt of subsidy.

## 2.19 Return on Equity

The Hon'ble Commission has approved a return on equity for FY 2015-16 at the rate of 15.5% worked out at Rs. 942.62 Cr on an equity base of Rs. 6081.43 Cr.;

PSPCL submits that it is facing immense cash crunch due to untimely subsidy payments from the GoP and huge disallowances against actual expenses being incurred by it. In order to achieve the desired operational and financial outcomes/ efficiencies that the Hon'ble Commission has directed the PSPCL to achieve, it is essential for the PSPCL to make necessary investments in the Generation as well as the Distribution business on a year on year basis.

The equity base as on 31 March, 2012 as per the audited annual accounts for FY 2015-16 is Rs. 6081.43 Cr.; Accordingly, PSPCL proposes application of a rate of 15.5% (net) on the equity base for computation of RoE. The RoE proposed by PSPCL and approved by



Hon'ble Commission in accordance with the above is provided in the table below:

**Table 32: Proposed Vs. Approved Return on Equity for FY 2015-16 (Rs. Cr)**

Description	Approved	Proposed	Remarks
Return on Equity	942.62	942.62	Calculated based on 15.50% rate on Government equity holding of Rs 6081.43 Cr.; Additions of assets would be funded through debts

The PSPCL prays to the Hon'ble Commission to consider its approach on allowing Return on Equity to the PSPCL and approve the same at the proposed value of Rs. 942.62 Cr.; as shown in the table above.

## 2.20 Revenue from sale of power

The Hon'ble Commission had revised the revenue from sale of power for the FY 2015-16 at Rs. 23615.28Cr.; in the Tariff Order for FY 2015-16. The revenue from sale of power for the FY 2015-16 as per the audited annual accounts is at Rs.22303.83 Cr.; (Including subsidy receivable on accrual basis) for the year. The category wise comparison of actual revenues for the FY 15 in the table provided below:

**Table 33: Actual Revenues for FY 2015-16 (Rs. Cr.;**

Category	Energy Charges (*)	MMC	PLEC	Surcharge/ Incentive(Net)	Total Revenue
	Rs. Cr.;	Rs. Cr.;	Rs. Cr.;	Rs. Cr.;	Rs. Cr.;
Domestic (Inc. Others)	6439.95	75.39	0.00	-3.99	6550.97
Non-Residential Supply	2193.47	176.45	0.00	-12.86	2361.28
Small Power	564.47	40.24	0.00	0.88	608.06
Medium supply	1282.75	58.35	0.00	-3.64	1338.73
Lagre Supply	6588.77	30.74	171.28	-234.60	6557.34
Pulbic Lighting	123.72	0.45	0.00	0.04	124.21
Bulk Supply & Grid Supply	392.45	3.17	0.00	-7.30	388.32
Railway Traction	114.77	13.36	0.00	-13.69	114.44
Sub Total metered sales within State	17700.35	398.15	171.28	-275.16	18043.35
Agricullture	4637.37	0	0	0	4639.95
Common Pool	135.31	0	0	0	135.31

Category	Energy Charges (*)	MMC	PLEC	Surcharge/ Incentive(Net)	Total Revenue
	Rs. Cr.;	Rs. Cr.;	Rs. Cr.;	Rs. Cr.;	Rs. Cr.;
Outside State (Banking)					29.55
SOP Recognized by PSERC	276.82	0	0	0	276.82
<b>Grand Total</b>	<b>22749.85</b>	<b>398.15</b>	<b>171.28</b>	<b>-275.16</b>	<b>23073.67</b>

The PSPCL prays to the Hon'ble Commission to approve the revenue of Rs. 23073.67 Cr.; Including DS category Subsidy of Rs. 1123.35 Cr.; on a/c of SC & non SC-BPL Domestic consumers and in AP category includes subsidy of Rs. 4637.35 Cr.; on a/c of Free Supply to AP consumers from sale of power as submitted.

## 2.21 True-up of ARR for FY 2015-16

Summary of the item wise submissions and variations therein with respect to the previously approved values are provided in the table below:

**Table 34: Approved Vs. Actual ARR for FY 2015-16 (Rs. Cr)**

Description	RE of FY 2015-16 Approved in TO for FY 2016-17	As per Audited annual accounts for FY 2015-16
Cost of fuel	2407.85	2782.85
Cost of Power Purchase	12506.54	13042.47
Employee cost	4572.59	4398.00
R&M Expenses	419.56	386.83
Admin & General Expenses	138.36	186.11
Depreciation	991.87	1046.80
Interest Charges	1666.98	2880.60
Return on Equity	942.62	942.62
Transmission Charges Payable to PSTCL	1131.72	967.65
Charges Payable to GoP on Power from RSD	20.20	
Provision for DSM fund	0.00	
Other Debits, Extraordinary Items, FBT Etc.		36.07
Prior Period Expenses	214.51	35.47
Recoverable O&M expenses on account of BBMB as per CERC orders dated 12.11.2015 and 21.03.2016.	(175.76)	0.00
Capitalisation of cost of generation during trial stage		
<b>Total Revenue Requirement</b>	<b>24837.04</b>	<b>26705.48</b>



Less: Non-tariff income	985.11	994.36
<b>Net Revenue Requirement</b>	<b>23851.93</b>	<b>25711.12</b>
Total Income	23006.12	23073.67
<b>Gap: Surplus (-)/ Deficit (+) for FY 2014-15</b>	<b>845.81</b>	<b>2637.47</b>
Add: Carrying cost on Gap		605.72
<b>Total Cumulative Gap up to FY 2014-15</b>		<b>3243.19</b>

\*Normative expenditure of Rs. 565 Cr.; for R&M and Rs. 164.21 Cr.; for A&G expense during FY 2015-16 has been requested for approval under the respective sections.

## 2.22 Carrying Cost of Gaps

As summarized in Section I of this tariff petition, the carrying cost on approved regulatory asset is a legitimate cost of the utility and can be recovered till such regulatory assets are not fully liquidated through appropriate tariff adjustment.

It is further submitted that the Hon'ble APTEL in its Judgment dated 18 October 2012, held that there is no justification for restricting the recovery of such costs to a period of 2 years. The relevant extract of the Judgment is provided below:

"11.5 on the basis of the above findings of the Tribunal we decided as under:

- i) When the utility gives its projected expenditure under a head in the ARR, the Commission either accepts it or decides a lower expenditure. However, if in the true up of the ARR subsequently the Commission finds that the expenditure which was denied/ reduced earlier under that head needs to be approved then carrying cost may be allowed for such additional expenditure under that particular head which was denied earlier.
- ii) The utility is entitled to carrying cost on his claim of legitimate expenditure if the expenditure is:
  - a) accepted but recovery is deferred e.g. interest on regulatory assets,
  - b) claim not approved within a reasonable time, and
  - c) disallowed by Commission but subsequently allowed by Superior Authority"

The carrying cost for FY 2015-16 has been calculated as per the provisions of PSERC Tariff Regulations amended in 2009 i.e. at the rate of interest of 14.6 % per annum as per State Bank Advance Rate as on April 1, 2016<sup>1</sup> on the accumulated gap till the year and for half year for the revenue gap during the year.

<sup>1</sup><https://www.sbi.co.in/portal/web/interest-rates/benchmark-prime-lending-rate-historical-data>

The carrying cost for FY 2015-16 detailed in the table below.

**Table 35: Carrying Cost in Revenue Gap for FY 2015-16 (Rs. Cr)**

Details	Amount
Opening Revenue Gap ( PSPCL has not Included Opening Revenue Gap )	
Revenue Gap for the Year	2,637.47
Total Revenue Gap (1+2)	2,637.47
Rate of Interest	14.6%
Carrying Cost on Revenue Gap for the year (for 6 months) FY 16	192.54
Carrying Cost on Revenue Gap for the year (for one 12 months) FY 17	413.18
Total Carrying Cost in Revenue Gap	605.72

PSPCL prays the Hon'ble Commission to allow the carrying cost of Rs. 605.72 Cr on the gap.

## 2.23 Revenue Gap

PSPCL has not included opening revenue gap as per true up for FY 2014-15 Rs. 1020.68 Cr.; under revenue gap estimation for FY 2015-16. PSPCL prays Hon'ble Commission to take appropriate view on the same.

PSPCL has computed a revenue gap at Rs. 2637.47 Cr for FY 2015-16 and carrying cost on the same Rs. 605.72 Cr, the total Gap up to FY 2015-16 amounts to Rs. 3243.19 Cr.;

The PSPCL prays to the Hon'ble Commission to approve the total revenue gap of Rs. 2637.47 Cr.; along with the carrying cost of Rs. 605.72 Cr Cr.; for FY 2015-16.

*(Handwritten signature)*





**Punjab State Power Corporation Limited**  
**Format for True-up of FY 2015-16**

S.No.	Title	Reference
1	Energy Sales	Form 1
2	Tech. & Comm. Details of Thermal Plants	Form 2
3	Maintenance schedule of thermal Power stations	Form 3
4	PSPCL Hydel Stations and Share from BBMB	Form 4
5	Energy balance	Form 5
6	Entitlement from Central Generating Stations	Form 6
7	Power purchase Cost	Form 7
8	Employee Cost	Form 8
9	Total Number of PSPCL Employees	Form 9
10	Employees Productivity Parameters	Form 10
11	Value of Assets and Depreciation Charges	Form 11
12	Depreciation Charges	Form 12
13	Repair and Maintenance Expenses	Form 13
14	Administration and General Expenses	Form 14
15	Details of loans	Form 15
16	Interest and Finance Charges	Form 16
17	Interest Capitalised	Form 17
18	Information regarding restructuring of outstanding loans during the year	Form 18
19	Lease Details	Form 19
20	Non Tariff Income	Form 20
21	Investment Plan (Scheme-wise)	Form 21
22	Investment Plan (Year-wise)	Form 22
23	Capital Base and Return	Form 23
24	Cash flow statement	Form 24
25	Original Cost of Fixed Assets	Form 25
26	Works-in-Progress	Form 26
27	Revenue from Existing Tariff	Form 27
28	Annual Revenue Requirement	Form 28
29	Information regarding Wholesale Price Index (All Commodities)	Form 29
30	Information regarding amount of Equity & Loan	Form 30
31	Information regarding Revenue from Other Business	Form 31
32	Information regarding Bad and Doubtful Debts	Form 32
33	Information regarding Working Capital	Form 33
34	Information regarding Foreign Exchange Rate Variation	Form 34
35	Statement showing the amount of Government subsidy due and received	Form 35
36	Prior period adjustments	Form 36

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**PUNJAB STATE POWER CORPORATION LIMITED**  
**ANNUAL REVENUE REQUIREMENT FOR THE YEAR FY 2016-17**  
**ENERGY SALES YEAR FY 2015-16 (Actual)**  
**FORMAT 1-B**

Sr. No.	Category of Consumer	No. of Consumers at the End of the Year (Nos.)	Connected Load at the End of the Year (KW)	Maximum Demand (MW)		Energy Sale/Demand (MUs)
				Restricted	Unrestricted	
1	Domestic	62,07,589	1,12,06,418.00			12,108.24
2	Commercial (NRS)	9,93,006	35,90,081.00			3,518.24
3	Industrial					
(a)	Small Supply	92,402	10,24,122.00			951.61
(b)	Medium Supply	28,490	17,50,531.00			2,111.44
(c)	Large Supply	7,135	58,69,887.00			10,087.13
(d)	Total	1,28,027	86,44,540			13,150.18
4	Street Lighting	3,978	53,106.00			202.82
5	Bulk Supply					
(a)	HT					
(b)	LT					
(c)	Total	521	3,35,546.00			661.19
6	Railway Traction	8	79,908.00			165.64
7	Total within State (except AP)	73,33,129	2,39,09,599.00			29,806.31
8	AP Consumption					
(a)	Metered	10,307	59,699.00			
(b)	Un-metered	12,33,392	87,39,607.00			
(c)	Total	12,43,699	87,99,306.00			11,523.34
9	AP-High Technology					
10	Compost Plants/Solid waste management plants for Municipalities/Urban Local Bodies					
11	Total Within State	85,76,828	3,27,08,905.00			41,329.65
12	Sales Outside State					137.07
13	Sales to Common Pool Consumers					294.51
14	Sales to Electricity Traders					
15	Sales to Other Distribution Licensees					
16	Total	85,76,828	3,27,08,905.00			41,761.23

PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR FY 2016-17  
TECHNICAL AND COMMERCIAL DETAILS OF THERMAL PLANTS  
GURU NANAK DEV THERMAL PLANT BHATINDA (A)

FORMAT 2A

Sr. No.	Particulars	Unit	FY 2015-16 (Actual)
1.00	2.00	3.00	5.00
1.00	Installed Capacity	MW	460.00
2.00	PLF	%	22.73
3.00	Plant Availability	%	93.75
4.00	Gross Generation	MU	918.30
5.00	Auxiliary Consumption		-
	(i)	MU	103.44
	(ii)	%	11.26
6.00	Net Generation	MU	814.87
7.00	Station Heat Rate	Kcal/kwh	2,864.79
8.00	Specific Oil Consumption	ml/kwh	2.31
9.00	Calorific Value of Oil	Kcal/Litre	9,400.00
10.00	Calorific Value of Coal (Weighted Average)	Kcal/Kg	4,061.81
11.00	Overall heat content	GCal	26,30,741.06
12.00	Heat from oil	GCal	19,911.14
13.00	Heat from coal	GCal	26,10,829.92
14.00	Total Oil Consumption	KL	2,118.21
15.00	Coal Transit Loss	%	1.28
16.00	Total Coal Consumption excluding transit loss	Tonnes	6,42,775.00
17.00	Quantity of PANAM coal	Tonnes	12,603.00
18.00	Quantity of coal other than PANAM coal	Tonnes	6,30,172.00
19.00	Quantity of coal other than PANAM coal including transit loss	Tonnes	6,38,238.20
20.00	Total Quantity of coal required	Tonnes	6,50,841.20
21.00	Price of Coal	Rs./Tonne	4,691.41
22.00	Price of Oil	Rs./KL	44,198.21
23.00	Total Coal Cost	Rs. Crores	305.34
24.00	Total Oil Cost	Rs. Crores	9.36
25.00	Total Fuel Cost	Rs. Crores	314.70
26.00	Expenses Capitalized	Rs. Crores	
27.00	Total Net Fuel Cost	Rs. Crores	314.70



**PUNJAB STATE POWER CORPORATION LIMITED**  
**ANNUAL REVENUE REQUIREMENT FOR THE YEAR 2016-17**  
**TECHNICAL AND COMMERCIAL DETAILS OF THERMAL PLANTS**  
**GGSTP ROOPNAGAR (B)**

**FORMAT 2B**

Sr. No.	Particulars		Unit	FY 2015-16 (Actual)
1.00		2.00	3.00	5.00
1.00	Installed Capacity		MW	1,260.00
2.00	PLF		%	35.77
3.00	Plant Availability		%	94.68
4.00	Gross Generation		MUs	3,959.00
5.00	Auxiliary Consumption			-
6.00	(i)		MUs	358.30
7.00	(ii)		%	9.05
8.00	Net Generation		MUs	3,600.70
9.00	Station Heat Rate		Kcal/kwh	2,847.16
10.00	Specific Oil Consumption		ml/kwh	1.11
11.00	Clorific Value of Oil		Kcal/Litre	9,700.00
12.00	Calorific Value of Coal (wt. Avg.)		Kcal/Kg	4,125.00
13.00	Overall Heat content		Gcal	1,12,71,918.50
14.00	Heat from oil		Gcal	42,769.25
15.00	Heat from coal		Gcal	1,12,29,149.25
16.00	Total Oil Consumption		KL	4,409.20
17.00	Coal Transit Loss (Excl.Panem) *		%	0.18
18.00	Total domestic Coal Consumption (Excl. Transit Loss)		Tonnes	27,22,218.00
19.00	Specific Coal Consumption		Kg/Kwh	0.69
20.00	Quantity of Panem Coal		Tonnes	-
21.00	Quantity of Imported Coal			2,77,981.00
22.00	Qty. of Coal other than Panem Coal (Excl. Transit Loss)		Tonnes	24,44,237.00
23.00	Qty. of Coal other than Panem Coal (Incl. Transit Loss)		Tonnes	24,48,644.56
24.00	Total Quantity of Coal required (Incl. Transit Loss)		Tonnes	27,26,625.56
25.00	Price of Domestic Coal ( Incl. Transit Loss )		Rs./Tonne	5,196.14
26.00	Price of Coal ( Exl. Transit Loss )		Rs./Tonne	5,187.74
27.00	Price of Oil		Rs./KL	37,893.48
28.00	Total Coal Cost		Rs.Crores	1,414.50
29.00	Total Oil Cost		Rs.Crores	16.71
30.00	Total Fuel Cost		Rs.Crores	1,431.21

PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT FOR THE YEAR 2016-17  
TECHNICAL AND COMMERCIAL DETAILS OF THERMAL PLANTS  
GHTP, LEHRA MOHABBAT (UNIT- 1 to 4) - (C)  
FORMAT 2C

Sr. No.	Particulars	Unit	FY 2015-16 (Actual)
1.00		2.00	5.00
1.00	Installed Capacity	MW	920.00
2.00	PLF	%	0.39
3.00	Plant Availability	%	0.92
4.00	Generation	MU	3,134.83
5.00	Auxiliary Consumption		
	(i)	MU	281.45
	(ii)	%	0.09
6.00	Net Generation	MU	2,853.38
7.00	Station Heat Rate	Kcal/kwh	2,512.15
8.00	Specific Oil Consumption	ml/kwh	1.08
9.00	Calorific Value of Oil	Kcal/Litre	9,500.00
10.00	Calorific Value of Coal (Weighted Average)	Kcal/Kg	4,114.00
11.00	Overall heat	GCal	78,75,165.19
12.00	Heat from oil	GCal	32,034.00
13.00	Heat from coal	GCal	78,43,131.19
14.00	Total Oil Consumption	KL	3,372.00
#REF!	Coal Transit Loss (Ex Panem)	%	1.21
17.00	Coal Consumption (excluding Transit loss)	Tonnes	19,06,449.00
18.00	Quantity of PANAM coal	Tonnes	1,74,006.00
19.00	Quantity of coal other than PANAM coal	Tonnes	17,32,443.00
20.00	Quantity of coal other than PANAM coal including transit loss	Tonnes	17,38,284.00
21.00	Total Quantity of coal required	Tonnes	19,12,290.00
22.00	Price of Domestic Coal	Rs./Tonne	5,348.00
23.00	Price of Oil	Rs./KL	42,052.00
24.00	Total Coal Cost	Rs. Crores	1,022.75
25.00	Total Oil Cost	Rs. Crores	14.18
26.00	Total Fuel Cost	Rs. Crores	1,036.93



PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR FY 2016-17  
MAINTENANCE SCHEDULE OF THERMAL POWER STATIONS  
FY 2015-16 (Actual)  
FORMAT 3B

Sr. No.	Plant / Unit	From	To	Days	Type of Mtc.
1	2	3	4	5	6
1	GNDTP				
	Unit I	01.05.2015	30.05.2015	30.00	
	Unit II	-	-	-	
	Unit III	01.04.2015	15.04.2015 (Contd. From 16.03.2015)	15.00	AOH
	Unit IV				
	Total			45.00	
2	GGSTP				
	Unit-I	5.12.15	29.12.15	24	Annual Mtc.
	Unit-II	-	-	-	-
	Unit-III	-	-	-	-
	Unit-IV	10.04.15	8.05.15	29	Annual Mtc.
	Unit-V	-	-	-	-
	Unit-VI	-	-	-	-
	Total			53	
3	GHTP				
	Unit I	-	-	-	-
	Unit II	-	-	-	-
	Unit III	(Contd. From 09.03.2015)	22.04.2015	21.55 days during 2015-16 (Total 44.55 days)	Capital O/H HPT/ IPT
	Unit IV	14.10.2015 (12:50 hrs)	07.11.2015 (10:43 hrs)	23.91 days	Annual O/H
	Total			45.46	

PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR FY 2016-17  
GENERATION AT PSPCL HYDEL STATIONS AND SHARE FROM BBMB  
FORMAT 4

Sr. No.	Particulars	FY 2015-16
		Actual
1	2	6
A)	OWN GENERATION	
I)	Capacity (MW)	
1	Shanan HEP	110.00
2	UBDC Hydel Project	91.35
	Stage-I	
	Stage-II	
	Total	
3	Mukerian Hydel Project	207.00
	MHP Stage-II	-
4	Anandpur Sahib Hydel Project	134.00
5	Ranjit Sagar Project	600.00
6	Micro Hydel Projects	5.60
7	Total	1,147.95
II)	Gross Generation(MU)	
1	Shanan HEP	532.62
	UBDC Stage 1	160.00
	UBDC Stage 2	160.00
2	UBDC Hydel Project	320.00
3	Mukerian Hydel Project	1,169.45
	MHP Stage-II	-
4	Anandpur Sahib Hydel Project	668.53
5	Ranjit Sagar Project	1,958.27
6	Micro Hydel Projects	5.94
7	Total	4,654.80
8	Aux Consumption (MU) & Transformation Losses (MU)	38.16
	Less: Free share from RSD	
9	Net Hydel Generation (MU)	4,616.64
B)	Share from BBMB (MU)	
1	Bhakra	2,651.03
2	Deher	1,353.32
3	Pong	366.22
	Total (GROSS)	4,370.57
	Inter State Transmission Losses	73.99
	PSEB/PSPCL Share excluding Common Pool Share (Net)	4,296.58
	Total Hydel Availability (MU)	8,913.22
D)	Less: Royalty to HP from Shannan (MU)	52.66
E)	Less: Share from RSD to HP (MU)	84.41
F)	Net Own Hydro Power (MU)	8,776.15

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR FY 2016-17  
ENERGY BALANCE  
FORMAT 5

Sr. No.	Particulars	FY 2015-16 Actual
<b>A)</b>	<b>ENERGY REQUIREMENT</b>	
1	Energy sales to metered category within the State	29,806.31
2	Energy sales to AP	11,523.34
3	Total sales within the State	<b>41,329.65</b>
4	T&D losses	
i)	%	14.71%
ii)	MU	7,129.48
	Sub-total	48,470.61
5	Sales to common pool consumers	294.51
6	Sales outside state	137.07
	Sale to outside states	
	Add: Royalty to HP from Shannan (MU)	52.66
	Add: Share from RSD to HP (MU)	84.41
	<b>Total Energy Requirement</b>	<b>48,890.71</b>
<b>B)</b>	<b>ENERGY AVAILABILITY</b>	
1	Net thermal generation	7,268.95
2	Hydel Generation (own+shared)	4,616.64
	Net power purchase	32,414.04
3	Open Access UI	
4	BBMB Share (Including Common Pool)	4,591.09
	Net BBMB Share	4,296.58
	Common Pool	294.51
5	<b>Total Energy Availability</b>	<b>48,890.71</b>

PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
ENTITLEMENT FROM CENTRAL GENERATING STATIONS  
FY 2015-16 (Actual)  
FORMAT 6-B

Station	Capacity	Firm Allocation to PSPCL		Energy sent out (Scheduled)	Firm Energy Entitlement of PSPCL	Actual Allocation to PSPCL (as per REA)	
	MW	%	MW	MU	MU	MU	%
2	3	4	5	6	7	8	9
NHPC							
Bairasiul	180	46.50%	83.70			330.66	46.50%
Salal	690	26.60%	181.54			910.89	26.60%
Tanakpur	94	17.93%	16.85			58.23	17.93%
Chamera-I	540	10.20%	55.08			260.80	10.20%
Chamera-II	300	10.00%	30.00			192.28	12.31%
Chamera-III	231	7.86%	18.15			105.29	9.78%
Uri	480	13.73%	66.00			438.73	13.75%
Uri-II	240	8.13%	19.52			111.17	9.53%
Dhauliganga	280	10.00%	28.00			131.53	11.92%
Dulhaati	390	9.28%	32.29			245.12	10.20%
Parbati-III	520	7.86%	40.87			68.83	9.78%
Rampur	412.02	5.62%	23.16			139.51	6.79%
SEWA-II	110	3.32%	10.00			57.92	10.25%
Total	4477.02		607.15			3052.95	
Nathpa Jhakri (S/VNL)	1500	10.13%	151.95			858.97	11.40%
Tehri (THDC)	1000	7.70%	77.00			279.55	8.97%
Koteshwar (THDC)	400	6.36%	25.44			99.63	7.63%
DVC - Durgapur	1000	20.00%	200.00			742.72	20.00%
NTPC							
Singrauli	2000	10.00%	200.00				
Rihand - I	1000	11.00%	110.00			1503.33	11.22%
Rihand - II	1000	10.20%	102.00			834.69	12.21%
Rihand - III	1000	8.27%	82.67			698.34	11.53%
Anta GPS	419	11.69%	48.88			508.72	9.72%
Auralya GPS	663	12.52%	82.01			105.18	13.62%
Dadri NCCPS	830	15.90%	131.97			133.54	13.85%
Unchahar-I	420	8.57%	35.99			312.29	16.80%
Unchahar-II	420	14.28%	59.98			131.62	9.03%
Unchahar-III	210	8.10%	17.01			270.64	15.74%
Jhajjar (IV)	1500	unallocated share				75.63	9.54%
DADRI-II TPS	980					15.78	0.97%
Goldam HEP	800	7.73%	0.00%			26.16	1.36%
Total						196.60	9.52%
NTPC (ER)						4532.73	
Farakka (ER)	1600	1.39%	22.24				
Kahai gaon - I (ER)	840	6.07%	50.99			109.91	1.39%
Kahai gaon - II (ER)	1500	8.02%	120.30			205.10	6.07%
Total						692.55	8.02%
NPC						1007.55	
NAPP	440	11.59%	31.00				
RAPP-B	440	22.73%	100.03			413.61	13.46%
RAPP-C	440	10.41%	45.80			752.16	24.81%
Total						436.56	13.20%
Central Sector Purchase (1.1+1.2+1.3+1.4+1.5+1.6+1.7+1.8)						1602.33	
						12172.44	
Purchase through Traders/ IPPs (LONG TERM)							
NVNL Bundled Power	Included in respective NTPC plants						
FTC Tale (Hydro)	1020	2.94%	0.00			294.61	0.00
Pragati-III (Bawana) (PPCL)	1371	10.00%	0.00			96.27	2.94%
MALANA-2 (PTC)	100	88.00%	0.00			150.82	10.00%
SASANI UMPP	3960	13.00%	0.00			291.98	88.00%
MUNDRA UMPP	4000	12.50%	0.00			4295.91	15.00%
Gomdwal Sahib TPP (GVK)	Inform Energy as COO in FY 2016-17					2720.10	12.50%
Talwandi Sabo TPP (TSPL)	660	100.00%	0.00			70.34	0.00%
RAJFURA TPP (NPL)	1400	100.00%	0.00			3046.42	100.00%
Total long term						7258.52	100.00%
						18224.98	

Note: % Actual Allocation to PSPCL is based on the Cumulative Weighted Avg. Entitlements upto SEPT 2015 from the Provisional REA for SEPT 2015.

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2026-27  
POWER PURCHASE COST  
FY 2013-18  
FORMAT 3-B

Sl. No.	Source	Direct Purchase (MUH)	External (Taxes (N))	Energy cost, by PPCL (MUH)	REC (Rs. Cr.)	PPCL (cumulative adjustment) to the REA of March 2018	VC (Rs. Cr.)	FC (Rs. Cr.)	VC (Rs. Cr.)	Other (Rs. Cr.)	Total (Rs. Cr.)
1	HTPC										
1	Anta (Q/F)	95.938	2.49	97.45			323.08	27.58	32.23	0.059	59.88
2	Anta (R/F)	5.244	2.49	5.11	202.65	13.52	600.37		3.15		3.15
3	Anta (L/F)	0.00	2.49	0.00					0.00		0.00
4	Auralya (Q/F)	128.18	2.49	124.98			384.18	33.68	49.15	0.09	82.92
5	Auralya (R/F)	5.35	2.49	5.22	243.13	13.85	748.94		4.01		4.01
6	Auralya (L/F)	0.00	2.49	0.00			1033.00		0.00		0.00
7	Dadri Gas (Q/F)	308.58	2.49	300.89			354.37	52.42	109.13	0.22	181.77
8	Dadri Gas (R/F)	3.69	2.49	3.60	312.07	16.80	911.83		3.37		3.37
9	Dadri Gas (L/F)	0.03	2.49	0.03			760.28		0.02		0.02
10	Singrauli	1503.53	2.49	1486.08	723.93	10.71	135.97	77.53	198.27	6.17	281.98
11	Rihand-I	814.89	2.49	809.38	527.84	11.71	176.30	81.80	108.00	0.37	170.17
12	Rihand-II	638.34	2.49	622.44	631.97	10.97	168.30	69.26	107.34	0.10	178.70
13	Rihand-III	308.72	2.49	496.05	1022.99	9.12	178.87	93.33	83.53	7.46	184.32
14	Unchahar-I	131.62	2.49	128.34	236.42	8.84	266.48	20.90	35.11	-0.04	55.97
15	Unchahar-II	270.64	2.49	263.90	248.00	15.13	266.19	37.53	71.91	0.13	109.57
16	Unchahar-III	73.64	2.49	73.75	192.55	8.94	265.24	17.21	19.88	0.20	37.27
17	Parakka (ER)	109.91	2.49	107.17	856.22	1.41	268.42	11.99	28.40	0.10	41.49
18	Kahalgagan-I (ER)	205.10	2.49	199.99	524.48	6.09	236.95	31.95	48.52	0.08	80.54
19	Kahalgagan-II (ER)	692.35	2.49	675.30	1198.21	8.05	222.63	98.43	154.40	-0.22	250.61
20	NGTSP-2C (DADRI II)	28.16	2.49	25.51	1070.50	0.79	353.83	8.46	9.25	0.01	17.71
21	IGSTPS Jhajjar (NTPC JV)	15.78	2.49	15.39	1784.61	0.97	400.21	17.10	8.38	0.02	23.42
22	Koldam-I (Hydro)	196.68	2.49	191.70	815.62	7.73	274.10	48.30	53.83	0.05	102.19
23	LPS & TDS	-	-	-	-	-	-	-	-	-	14.70
24	NHPC										
24	Bairath	330.68	2.49	322.42	126.23	46.50	109.62	34.51	38.02	0.23	70.75
25	Salal	910.89	2.49	888.20	282.76	26.60	164.80	50.48	48.00	101.93	200.41
26	Tanahpur	58.23	2.49	56.78	110.41	17.33	161.18	11.76	9.13	0.26	21.15
27	Chamera-I	260.80	2.49	254.31	301.46	10.20	99.48	18.85	25.87	0.08	44.60
28	Chamera-II	192.28	2.49	187.49	357.35	12.31	148.46	26.14	26.34	3.20	54.69
29	Uri	438.73	2.49	427.80	363.14	13.75	128.45	34.84	35.32	20.16	90.32
30	Dauli Ganga	133.63	2.49	130.20	292.31	11.92	172.94	18.48	19.78	3.32	41.57
31	Dulhasi	248.12	2.49	239.02	1020.99	10.20	318.81	62.99	66.30	11.84	141.13
32	Sewa-II	57.92	2.49	56.48	199.90	10.25	233.30	13.50	12.33	1.18	27.01
33	Chamera-III	105.29	2.49	102.67	404.52	8.78	212.75	24.87	22.35	0.05	47.07
34	Uri-II	111.17	2.49	108.40	438.53	8.53	307.70	23.32	24.56	9.65	63.53
35	Parbati-III	68.81	2.49	67.10	382.95	8.78	318.96	13.56	21.86	0.09	35.30
36	NPCIL										
36	NAPP	413.61	2.49	403.31	-	13.46	250.32	-	103.05	0.49	103.54
37	RAPP-3 & 4	752.16	2.49	733.42	-	24.61	289.27	-	208.66	1.15	210.80
38	RAPP-5 & 6	435.56	2.49	425.65	-	13.20	345.44	-	150.28	0.52	150.81
39	OTHER SOURCES (Central Sector)										
39	Nathpa Jhakri HEP (SJVN)	858.97	2.49	837.58	1898.84	11.51	140.03	125.22	120.08	0.20	245.50
40	Rampur HEP (SJVN)	139.51	2.49	134.04	521.71	8.46	182.43	24.88	22.26	0.40	47.54
41	Tehri HEP (THDC)	279.55	2.49	272.59	1458.24	7.70	283.89	79.37	79.25	0.11	158.73
42	Koteshwar HEP (THDC)	95.93	2.49	93.25	393.93	8.36	189.89	17.69	18.12	0.04	35.85
43	Durgapur TPS (DVC)	742.72	2.49	724.22	1258.98	20.00	236.71	195.00	175.56	0.24	370.81
44	Traders (Short Term Power)	1814.43	2.49	1789.23	-	-	342.53	-	621.49	-	821.49
45	Open Access Chgs. of Traders for short term power	-	-	-	-	-	-	-	-	57.43	57.43
46	Tata HEP (PTC)	96.27	2.49	93.97	-	2.94	202.00	-	19.45	-	19.45
47	Pragati-III Gas Plant Bawana (PPCL)	150.82	2.49	147.06	1083.03	10.00	385.74	82.25	42.50	0.19	125.34
48	Mundra UMP (CGPL)	2720.10	2.49	2652.35	-	12.50	142.25	202.54	286.72	0.23	589.49
49	Mallana-II HEP (PTC)	291.98	2.49	284.71	129.77	100.00	296.60	58.58	63.42	20.27	142.24
50	NVNL Bundled Power (NTPC Thermal Power + Solar power)	295.43	2.49	288.07	-	-	474.19	-	140.09	-	140.09
51	Sasan UMPP (RPL)	4295.91	2.49	4188.91	-	15.00	143.48	64.40	493.88	122.56	880.84
52	Tatwandi Babo TPS (Sterlite)	3047.34	-	3047.34	-	100.00	360.91	786.13	800.65	-5.58	1581.20
53	NPL Rajpura TPS (L & T)	7258.52	-	7258.52	-	100.00	219.89	1436.39	1591.14	4.92	3032.44
54	GVK	70.34	-	70.34	-	100.00	336.56	-	23.68	-	23.68
55	Long Term NRSE Power:										
55	Solar	325.64	-	325.64	-	-	856.68	-	278.96	-	278.96
56	Non Solar	783.41	-	783.41	-	-	531.25	-	405.56	-	405.56
57	Short Term NRSE Purchase within Punjab	0.00	-	0.00	-	-	-	-	0.00	-	0.00
58	Net Banking with HPSEB, UPCL, J & K & thro. Traders	-498.00	-	-528.62	-	-	378.37	-	-186.68	-	-186.68
59	Open Access Chgs. of Banking	-	-	0.00	-	-	-	-	-	-	0.00
60	UI	184.95	-	184.95	-	-	1272.02	-	235.26	-	235.26
61	Reactive Charges	-	-	-	-	-	-	-	14.33	-	14.33
62	Other Charges	-	-	-	-	-	-	-	-	-	-
63	PGCIL	-	-	-	-	-	-	864.34	-	-	864.34
64	Purchase of RECs for FY 2015-16	-	-	-	-	-	-	-	0.00	-	0.00
65	Mercedes	-	-	-	-	-	-	-	-	0.54	0.54
66	Total Power purchase	32991.00	-	32414.04	-	-	232.42	5080.94	7293.72	364.19	12748.66
67	Previous Payments made during 2015-16	-	-	-	-	-	-	-	-	-	293.61
68	Total Power purchase	32991.00	-	32414.04	-	-	232.42	5080.94	7293.72	364.19	13042.47

Net banking data for 2015-16

	Gross Energy (Mwh)	External losses (%)	Net Energy (Mwh)	Amount (Rs. Crs.)	Rate (Rs./Unit)
<b>Banking (Purchase)</b>					
Mital	357.81	2.48	348.90	127.86	367.34
manikaran	26.24	2.48	25.58	9.45	360.00
HPSEB	348.14	2.48	339.47	120.42	345.89
APPCPL	0.00	2.48	0.00	0.00	#DIV/0!
J.K.	34.55	2.48	33.89	11.98	346.24
MPPMCL	402.93	2.48	392.89	143.67	357.31
TATA	1.80	2.48	1.75	0.61	342.00
provestment	58.58	2.48	58.10	21.45	360.00
HPFC	0.00	2.48	0.00	0.00	#DIV/0!
PTC	57.45	2.48	56.02	20.88	360.00
GMR	60.98	2.48	59.46	20.87	342.22
<b>Total Banking Purchase</b>	<b>1349.48</b>		<b>1316.87</b>	<b>477.27</b>	<b>363.67</b>
<b>Banking (Sale)</b>					
Mital	503.88		503.88	181.40	360.00
manikaran	102.83		102.83	36.95	360.00
HPSEB	72.00		72.00	25.92	360.00
APPCPL	203.90		203.90	73.40	360.00
J.K.	0.00		0.00	0.00	#DIV/0!
HPMCL	883.70		883.70	310.57	360.00
TATA	0.00		0.00	0.00	#DIV/0!
provestment	63.56		62.56	22.53	360.00
HPFC	0.00		0.00	0.00	#DIV/0!
PTC	37.80		37.80	13.18	348.79
GMR	0.00		0.00	0.00	#DIV/0!
<b>Total Banking Sale</b>	<b>1846.49</b>		<b>1846.49</b>	<b>663.66</b>	<b>369.77</b>
<b>Banking (NET)</b>					
Mital	-145.08		-154.98	-53.54	366.51
manikaran	-76.48		-77.65	-27.60	360.00
HPSEB	278.14		267.47	94.80	342.21
APPCPL	-203.90		-203.90	-73.40	360.00
J.K.	34.55		33.89	11.98	346.24
MPPMCL	-489.77		-489.80	-168.60	362.36
TATA	1.80		1.75	0.61	342.00
provestment	-2.98		-4.46	-1.07	360.00
HPFC	0.00		0.00	0.00	#DIV/0!
PTC	18.68		18.22	7.50	381.87
GMR	60.98		59.46	20.87	342.22
<b>Net Banking Total</b>	<b>-496.00</b>	<b>0.00</b>	<b>-529.62</b>	<b>-185.68</b>	<b>376.36</b>

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
EMPLOYEE COST  
FORMAT 8

Sr. No.	Particulars	FY 2015-16
		Actual PSPCL
1	<b>Salaries &amp; Allowances</b>	
2	Basic Pay	1,103.48
3	Overtime	11.70
4	Dearness Allowance	1,081.75
5	Fixed medical Allowance	24.00
6	Conveyance Allowance	31.85
7	Other Allowances	156.21
8	Bonus/ Generation Incentive	16.64
9	Medical Expenses Reimbursement	18.18
10	<b>Total (1 to 9)</b>	<b>2,443.81</b>
11	<b>Terminal Benefits</b>	
12	Earned Leave Encashment	152.58
13	Gratuity (including arrear)	246.42
14	Commutation of Pension/ progressive funding for terminal benefit as per FRP	-
15	Workman's compensation	0.15
16	Arrear of Pay	-
17	Ex-gratia	-
18	Fringe Benefit Tax	-
19	Progressive Funding of Terminal Benefits as per FRP	-
20	<b>Total (8 to 14)</b>	<b>399.15</b>
21	<b>Pension Payments</b>	
22	Basic Pension	-
23	Dearness pension	1,309.81
24	Dearness Allowance	-
25	Any other expense	132.48
26	<b>Total</b>	<b>1,442.29</b>
27	<b>Total Expenses</b>	<b>4,285.25</b>
28	Less: Amount capitalised	121.48
29	<b>Net amount</b>	<b>4,163.77</b>
30	Prior Period*	-
31	Add: BBMB share	234.22
32	<b>Net Employee's Cost</b>	<b>4,397.99</b>

Note: -

Impact of 7th Pay Commission has not been considered and  
Impact of FRP progressive funding has also not considered

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-1  
TOTAL NUMBER OF PSPCL EMPLOYEES  
FORMAT 9

Sr. No.	Particulars	FY 2015-16 (Actual)
1	2	6
1	Number of employees with PSPCL as on 1st April	42,113
2	Number of employees posted with BBMB as on 1st April	402
3	PSPCL employees on deputation/ foreign service as on 1st April	15
4	<b>Total number of employees (1+2+3)</b>	<b>42,530</b>
5	Number of employees retired/retiring during the year	3,156
6	Number of employee added during the year	178
6	<b>Number of employees at the end of the year (4-5)</b>	<b>39,552</b>
7	Number/share of employees required to be posted with BBMB as per agreement	1,565

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
EMPLOYEES PRODUCTIVITY PARAMETER  
FORMAT 10

Sr. No.	Particulars	FY 2015-16 (Actual)
1	2	6
1	Number of Consumers in million	8.58
2	Connected Load in KW	3,27,08,905
3	Line Circuit in KM	3,81,149.00
4	Energy Sold in MU	41,823.71
5	No. of Employees	39,552.00
6	Employee per MU of energy sold	0.95
7	Employee per 1000 Consumers	4.61
8	Share of Employee in total cost	18.44%
9	Employee Cost in Rs/kWh of energy sold	1.05
10	Line Circuit KM per Employee	9.64

D

PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
VALUES OF ASSETS AND DEPRECIATION CHARGES

FORMAT 11

Sr. No.	Particulars	Asset values at the beginning of the year	Rate of Depreciation	Rs. In Crores	
				Depreciation Charges	Accumulated Depreciation
1	2	3	4	5	6
<b>A</b>	<b>Thermal</b>				
1	Land and Land Rights				
2	Buildings				
3	Hydraulic Works				
4	Other Civil Works				
5	Plant and Machinery				
6	Lines Cable and Network				
7	Vehicles				
8	Furniture and Fixtures				
9	Office Equipments				
	<b>Total</b>				
<b>B</b>	<b>Hydel</b>				
1	Land and Land Rights				
2	Buildings				
3	Hydraulic Works				
4	Other Civil Works				
5	Plant and Machinery				
6	Lines Cable and Network		NIL		
7	Vehicles				
8	Furniture and Fixtures				
9	Office Equipments				
	<b>Total</b>				
<b>C</b>	<b>Internal Combination</b>				
1	Land and Land Rights				
2	Buildings				
3	Hydraulic Works				
4	Other Civil Works				
5	Plant and Machinery				
6	Lines Cable and Network				
7	Vehicles				
8	Furniture and Fixtures				
9	Office Equipments				
	<b>Total</b>				
<b>D</b>	<b>Transmission</b>				
1	Land and Land Rights				
2	Buildings				
3	Hydraulic Works				
4	Other Civil Works				
5	Plant and Machinery				
6	Lines Cable and Network				
7	Vehicles				
8	Furniture and Fixtures				
9	Office Equipments				
	<b>Total</b>				
<b>E</b>	<b>Distribution</b>				
1	Land and Land Rights				
2	Buildings				
3	Hydraulic Works				
4	Other Civil Works				
5	Plant and Machinery				
6	Lines Cable and Network				
7	Vehicles				
8	Furniture and Fixtures				
9	Office Equipments				
	<b>Total</b>				
	<b>Grand Total (A+B+C+D+E)</b>				

These details are not available as the accounts are being maintained at different field offices and later compiled at the Head Office. PSPCL would like to seek waiver from compilation of this Format

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
DEPRECIATION CHARGES  
FORMAT 12

(Rs. In Crores)

Sr. No.	Item	Depreciation for FY 2015-16 (Prov.)	Assets as on April 1 of 2016
1	Thermal	214.53	13008.56
2	Hydel	228.18	10976.93
3	Internal Combustion	-	-
4	<b>Total Generation</b>	442.71	23985.49
6	Distribution	595.06	21,085.95
7	Others	24.42	1,340.52
8	<b>Total</b>	619.48	46,411.96
9	Less: Revalued amount of Land/Depreciation on Revalued amount	-	-
10	Total after revaluation	1,062.19	46,411.96
11	Add: Prior Period*	-	-
12	<b>Total</b>	1,062.19	46,411.96
13	Less: Capitalization	0.40	
14	<b>Net Total</b>	1,062.19	

\* Shall be considered seperately

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
REPAIRS AND MAINTENANCE EXPENSES  
FORMAT 13

Sr. No.	Particulars	FY 2015-16
		Actual
1	Plant & machinery	
2	Building	242.72
3	Hydraulic works & civil works	15.63
4	Line cable & network	10.52
5	Vehicles	70.78
6	Furniture & fixtures	1.79
7	Office equipments	0.04
8	Operating expenses	0.27
9	<b>Total</b>	<b>25.52</b>
10	Add: BBMB share	367.27
11	<b>Total Expenses</b>	<b>22.60</b>
12	Less: R&M Expenses Capitalized	389.87
13	<b>Net expenses</b>	<b>3.04</b>
14	Add prior period*	386.83
15	R & M for asset addition during year	-
16	Less: Royalty charges payable to GOP	-
17	<b>Total Expenses charged to Revenue</b>	<b>386.83</b>

Normative R&M expense calculation as per methodology adopted by the Commission in  
TO for FY 2014-15 while truing up of FY 2011-12

Sr. No.	Particulars	FY 2015-16
	WPI Index	-2.43%
	Base R&M Expenses for Escalation	566.52
1	<b>R&amp;M applying WPI index</b>	<b>552.75</b>
2	R&M Expenses on Assets addition during the year	12.52
	Opening GFA	44,442.09
	Asset Addition during the year	2,013.61
3	<b>Total R&amp;M Expenses</b>	<b>565.27</b>



PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
ADMINISTRATION AND GENERAL EXPENSES  
FORMAT 14

Sr. No.	Particulars	FY 2015-16
		Actual
1	Rent Rates & taxes	4.71
2	Insurance	0.54
3	Telephone, postage & Telegram	8.00
4	Consultancy Fee	0.38
5	Technical Fee	0.03
6	Other Professional Charges	13.20
7	Conveyance & Travelling	34.68
8	Electricity & Water	12.76
9	Other	102.96
10	Freight	10.25
11	Other Material related expenses	14.95
12	<b>Total Expenses</b>	<b>202.46</b>
13	Add: BBMB share	4.93
14	<b>Total Expenses</b>	<b>207.39</b>
15	Less: Capitalised	21.28
16	<b>Net Expenditure</b>	<b>186.11</b>
17	Add Prior Period*	
18	A&G for Asset Addition During the Year	
19	<b>Total</b>	<b>186.11</b>

Normative A&G expense calculation as per methodology adopted by the Commission in  
TO for FY 2014-15 while truing up of FY 2011-12

Sr. No.	Particulars	FY 2015-16
	WPI Index	-2.43%
	A&G Expenses approved by Commission	
	Base A&G Expenses for Escalation	152.11
1	A&G applying WPI index	148.42
2	A&G Expenses on Assets addition during the year	3.36
	Opening GFA	44,442.09
	Asset Addition during the year	2,013.61
3	Other Expenses	12.51
	Licence Fees	
	Fees for determination of tariff	12.51
4	<b>Total A&amp;G Expenses</b>	<b>164.29</b>

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17

DETAILS OF LOANS FOR THE YEAR 2015-16 (Actual)

FORMAT 15(B)

							(Rs. in Crore)
Sr. No.	Particulars	Opening Balance as on 01.04.2015	Rate of Interest	Additions from 01.04.2015 to 31.03.2016	Repayments from 01.04.2015 to 31.03.2016	Closing Balance as on 31.03.2016	Amount of Interest Paid/Payable
<b>A.</b>	<b>Long Term Loans</b>						
1	Non SLR Bonds	340.00	9.01%-10.15%	0.00	8.40	331.60	33.28
2	LIC	0.00	11.00%	0.00	0.00	0.00	0.00
3	REC Limited						
	T & D Scheme Loans	4551.97	8.00%-13.50%	654.35	603.02	4603.30	543.37
	R-APDRP	51.15	12.25%	226.17	0.00	277.32	46.69
	Generation Schemes	1002.81	7.00%-13.50%	74.57	307.44	769.94	111.61
4	Commercial Banks:						
	Long Term Loans	2165.15	8.45%-12.50%	750.00	295.11	2620.04	281.52
5	PFC Limited						
	Generation Schemes	115.32	7.16%-12.75%	0.00	17.73	97.59	12.39
	T&D Schemes	1.24	10.50% to 12.50%	0.00	0.06	1.18	0.16
6	CSS Loans:						
	APDRP	51.95	10.50%-12.50%	0.00	6.31	45.64	5.71
	R-APDRP	385.86	9.00%-11.50%	29.86	4.19	411.53	40.25
7	Govt. of Punjab Loans(UDAY BONDS)	0.00	8.21%-8.72%	9859.72	0.00	9859.72	3.65
8	RBI Bonds	16.24	8.50%	1.38	0.00	17.62	1.38
9	GPF Liability	2002.90	8.70%	0.00	230.02	1772.88	162.73
<b>A.</b>	<b>Total Long Term Loans (1 to 9)</b>	<b>10684.59</b>		<b>11596.25</b>	<b>1472.28</b>	<b>20808.56</b>	<b>1242.74</b>
<b>B.</b>	<b>Working Capital Loans</b>						
(i)	Normal Working capital loans	7736.60	11.10%-12.75%	5152.50	9464.10	3425.00	1049.82
(ii)	Bridge Loans						
	- Working Capital Loans raised due to loans recall by GOP	3074.91	11.10%-12.75%	0.00	0.28	3074.63	331.16
	- Working Capital Loans raised due to adjustment of Rbi Bonds from subsidy by GOP	1173.12	11.10%-12.75%	0.00	0.00	1173.12	126.34
	- Working Capital Loans raised due to excess interest paid to GOP	426.15	11.10%-12.75%	0.00	0.00	426.15	45.90
	- Working Capital Loans raised due to carrying cost gap for 2010-11 & 2011-12 as per Tariff Order not released by GOP	379.95	11.10%-12.75%	0.00	0.00	379.95	44.67
(iii)	Working Capital Loans raised due to payment towards additional levy for PANEM coal mine	390.00	11.10%-12.75%	0.00	0.00	390.00	45.85
(iv)	Working Capital Loans raised due to payment made to PTC Mallana as per orders of Hon'ble Supreme Court	40.00	11.10%-12.75%	0.00	0.00	40.00	4.70
<b>B.</b>	<b>Working Capital Loans (i+ii+iii+iv)</b>	<b>13220.73</b>	<b>11.10%-12.75%</b>	<b>5152.50</b>	<b>11942.21</b>	<b>6431.02</b>	<b>1648.44</b>
	<b>TOTAL (A+B)</b>	<b>23905.32</b>		<b>16748.75</b>	<b>13414.49</b>	<b>27239.58</b>	<b>2891.18</b>
	Interest On Consumer						192.06
	<b>Total Interest</b>						<b>3083.24</b>
	Less Capitalisation						-382.69
	<b>Net Interest</b>						<b>2700.55</b>
	Guarantee Fees						90.93
	Other Interest						89.13
	<b>Total Interest and Finance Charges</b>						<b>2880.61</b>



PUNJAB STATE POWER CORPORATION LIMITED  
PUNJAB STATE POWER CORPORATION LIMITE  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-:  
INTEREST AND FINANCE CHARGES  
FORMAT 16

Sr. No.	Particulars	FY 2015-16
		Actual
1	Non SLR Bonds	33.28
2	LIC	-
3	REC	701.67
4	Commercial Banks (Long Term)	281.52
5	PFC	12.55
6	Lease Rental	-
7	GPF	162.73
8	CSS/APDRP	45.96
9	Working Capital Loans	1,648.44
10	Interest to Consumers	192.06
11	Others Interest	89.13
12	<b>TOTAL</b>	<b>3,167.34</b>
13	State Govt Loans	5.03
14	<b>TOTAL(11+12)</b>	<b>3,172.37</b>
15	Less:Capitalistion	(382.69)
16	<b>Net Interest</b>	<b>2,789.68</b>
17	Add:prior period	-
18	<b>Total Interest</b>	<b>2,789.68</b>
19	Finance Charges	90.93
20	<b>Total Interest And Finance Charges</b>	<b>2,880.61</b>
21	Other loans	-
22	<b>Grand Total</b>	<b>2,880.61</b>

PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016  
INTEREST CAPITALIZED  
FORMAT 17

Sr. No.	Particulars	FY 2015-16
		Actual
1	WIP at the end of the year	1,656.25
2	GFA at the end of the year	46,455.75
3	WIP+GFA at the end of the year	48,112.00
4	Interest (excluding interest on WCL)	1,074.98
5	Interest Capitalised	382.69

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(Rs. in Crores)

[illegible]

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## (Rs.In Crores)



PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
NON TARIFF INCOME  
FORMAT 20

Sr. No.	Particulars	FY 2015-16
		Actual
1	Meter/service rent	90.49
2	Late payment surcharge	80.30
3	Theft & pilferage of energy	51.30
4	Misc. receipts	321.60
5	Misc. charges (except PLEC)	14.24
6	Wheeling charges	339.46
7	Interest on staff loans & advance	67.00
8	Income from trading	8.00
9	Income staff welfare activities	0.05
10	Excess on verification	-
11	Investments & bank balances	15.88
12	Gain on sale of asset	0.01
13	<b>Total income</b>	<b>988.33</b>
14	Add prior period income*	
15	BBMB Income	6.03
16	<b>Total non tariff income</b>	<b>994.36</b>
16	Less: Late Payment surcharge	80.30
17	Less: Rebate for timely payment for Powe	70.11
18	<b>Net Non-tariff Income</b>	<b>843.95</b>

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
INVESTMENT PLAN SCHEME WISE  
FORMAT 21

Sr. No.	Description of Scheme	FY 2015-16
		Actual
<b>A</b>	<b>GENERATION</b>	
1	Hydro Electric Projects	
1	R&M of BDMR Power house @ Bhakra Left Bank & Dehar Ji	12.23
2	R&M of HEPs of PSPCL	
3	Shahpur Kandi HEP	45.70
4	Mulerias HEP-II	7.64
	CE/HP	
	CE/CD & C	
II	Other Works	
1	1320 MW State Sector Thermal Project near Mulerias.	
2	Computerization of TFPs	
3	a) Institute of Power Management, Patiala.	
	b) Multistored Integrated Corporate office complex at Patiala	
	c) Renovation of VIP Guest House Anandpur Sahib	
	d) Multi-storied complex at badunger, patiala	
	e) Construction of bed for manufacturing 11M long poles	
	Odisha UMPP preparatory activities/ bidding payment of OIPL	
	Total : II (other works)	
III	Thermal Projects	
1	GHTP Stage-I, Lehra Mohattar	1.54
2	GHTP Stage-II, Lehra Mohattar	1.69
2a.	CE/OSM, GHTP (Cont. Wing)	
2b.	CE/Thermal Design	
3	Gas Based at Ropar	
4	R&M under Thermal	
	a. GNDTP Bathinda based on EIA study	
	b. GNDTP Bathinda other than EIA Study	
	c. Capital Works other than R&M works GNDTP, Bathinda	
	1) Dry Fly Ash Handling system GNDTP	
	2) Raising of Ash Dyke GNDTP	
	3) Aug. of Fire Protection System	
	4) Procurement & installation of 2 <sup>nd</sup> in motion weighing system at GNDTP	
	5) other works	
		10.02
5	R&M of GGSTP	
	1) GGSTP scheme (I & II) and proposed R&M	
	2) T&P issues of GGSTP Paper	
	3) Strengthening of micro Hydel Channel.	
	4) Cont. of 3 No. HTP & STP	
	5) Other works of GGSTP Ropar	
		26.85
	<b>R&amp;M of PSPCL Hydel PROJECTS</b>	
	Rangit Spot Dam	
	Shamas Power House, Jalandhar Nagar	
	WHIP Stage-I	
	ASHP Anandpur Sahib	
	USDC stage-I & II	
	Micro Hydel Project	
	<b>TOTAL GENERATION</b>	<b>82.38</b>
<b>B.</b>	<b>TRANSMISSION</b>	
1.	Transmission works	
	<b>TOTAL TRANSMISSION (66/33 KV)</b>	<b>241.41</b>
<b>C.</b>	<b>DISTRIBUTION</b>	
1	Normal development works including SI schemes	603.04
	Shifting of Meters out of consumer premises (Demand side management measures)	139.15
	Civil works of Grid substations (Control room building & surrounding areas) under CE/West Zone, PSPCL Substns	
2	Rural Electrification : Providing 11 KV manual Operative switch Gears	0.08
3	Release of Tulewell connections for general connections and semi-affected area	22.90
4	Comprehensive T&D losses reduction plan	12.86
5	Works relating to AFDIP-II Part-A	44.75
	Works relating to AFDIP-II Part B	327.84
	IT in Distribution offices	2.70
6	RGVY - Single Point connections to BPL families	0.08
7	MR Lab	
8	Miscellaneous activities like setting up of staff college, Renovation of TTI construction of IPMP a.e.c	
9	Integrated Power development scheme	9.07
	DDUCLV	
	Golden Temple Beautification Project	
	<b>TOTAL DISTRIBUTION</b>	<b>1,162.47</b>
<b>D.</b>	<b>MISC. WORK-SHIFTING OF STORE AT FZR</b>	
	<b>TOTAL CAP EXP -PSPCL</b>	<b>1,486.26</b>



PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
INVESTMENT PLAN (YEAR WISE)  
FORMAT 22

Sr. No.	Year	Originally proposed by the Board/PSPCL	Approved by the Commission	Revised by the Board/PSPCL	Revised approval by the Commission in review	Actual expenditure	Final approval by the Commission in true up
1	2	3	4	5	6	7	8
4	FY 2015-16 (Actual)	3,328.00	2,000.00	2,820.75			

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
CAPITAL BASE AND RETURN  
FORMAT 23

Sr. No.	Particulars	FY 2014-15	FY 2015-16
		Actual	Actual
1	2	5	6
1	Gross block at beginning of the year	42,561.08	44,442.11
2	Less accumulated depreciation	10,778.07	11,669.73
3	Net block at beginning of the year	31,783.01	32,772.38
4	Less accumulated consumer contribution	1,065.08	1,439.43
5	Net fixed assets at beginning of the year	30,717.93	31,332.95
6	Reasonable return @ 3% of NFA	921.54	939.99

Sr. No.	Particulars	WIP	Fixed Assets
3	As on 31st March of current year (FY 2013-14)	2056.53	42561.08
	Add capital expenditure during ensuing year (FY 2014-15)	1629.34	1881.01
	Total:	3685.87	44442.09
	Less transferred to fixed assets	1984.23	0.00
4	As on 31st March of previous year (FY 2014-15)	1701.64	44442.09
	Add capital expenditure during current year (FY 2015-16)	2267.84	1969.85
	Total:	3969.48	46411.94
	Less transferred to fixed assets	2313.23	0.00
5	As on 31st March of current year (FY 2015-16)	1656.25	46411.94
	Add capital expenditure during ensuing year (FY 2015-16)	3183.95	2918.20
	Total:	4772.06	49330.14
	Less transferred to fixed assets	2918.20	0.00
	As on 31st March of ensuing year (FY 2016-17)		

Sr. No.	Particulars	Amount
<b>Accumulated Depreciation</b>		
1	As on 31st March of the year (FY 2011-12)	9,139.52
2	Add: Depreciation for current year (FY 2012-13)	716.27
3	As on 31st March of the year (FY 2012-13)	9,855.79
4	Add: Depreciation for year (FY 2013-14)	922.28
5	As on 31st March of the year (FY 2013-14)	10,778.07
6	Add: Depreciation for current year (FY 2014-15)	891.66
7	As on 31st March of the year (FY 2014-15)	11,669.73
8	Add: Depreciation for current year (FY 2015-16)	1,134.43
9	As on 31st March of the year (FY 2015-16)	12,804.16
<b>Consumers Contribution</b>		
1	As on 31st March of the year (FY 2011-12)	377.06
2	Addition during the year (FY 2012-13)	366.42
3	As on 31st March of previous year (FY 2012-13)	743.48
4	Addition during previous year (FY 2013-14)	321.60
5	As on 31st March of previous year (FY 2013-14)	1,065.08
6	Addition during current year (FY 2014-15)	252.40
7	As on 31 <sup>st</sup> March of current year (FY 2014-15)	1,317.48
8	Addition during ensuing year (FY 2015-16)	121.94
9	As on 31 <sup>st</sup> March of current year (FY 2015-16)	1,439.42



PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR FY 2016-17  
CASH FLOW STATEMENT FOR FY 2016-17 (PROJ)  
FORMAT 24

		(Rs. In Crores)			
Sr. No.	Month	Sources of Receipt	Amount	Particulars of Payment	Amount
1	April				
2	May				
3	June				
4	July				
5	August		Nil		
6	September				
7	October				
8	November				
9	December				
10	January				
11	February				
12	March				
	Total				

The format prescribed by the Commission required monthwise cashflow which would require fairly detailed assessment of timing of revenue, cost, investments and borrowings. These details are not available. PSPCL would like to seek waiver from compliance of this Format

PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
ORIGINAL COST OF FIXED ASSET  
FORMAT 25

(Rs. in crores)

Sr. No.	Assets group	Closing balance at the end of FY 2014-15	Addition during FY 2015-16	Closing balance at the end of FY 2015-16
1	2	9	10	11
1	Thermal	12895.97	120.47	13016.44
2	Hydro	10923.72	53.23	10976.95
3	Internal combustion			0.00
4	Distribution	19285.30	1836.50	21121.80
6	Others	1337.12	3.41	1340.53
	<b>Total</b>	<b>44442.11</b>	<b>2013.61</b>	<b>46455.72</b>

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
WORK IN PROGRESS  
FORMAT 26

Sr. No.	Category of Consumer	FY 2015-16
		Actual
1	Opening balance	1,701.64
2	Add: New investment	2,267.84
3	<b>Total</b>	<b>3,969.48</b>
4	Less investment capitalized	2,313.23
5	Closing balance	1,656.25

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
REVENUE FROM EXISTING TARIFF FY 2015-16 (Actual)  
FORMAT 27-B

Sr. No.	Category of Consumers	Energy Sales (MU's)	Avg Billing Rate (P/Unit)	Revenue (Rs. in crores)
1	Domestic	12,108.24	531.87	6439.95
2	Commercial (NRS)	3,518.24	623.46	2193.47
3	Industrial	-		
a	Small Supply	951.61	593.17	564.47
b	Medium Supply	2,111.44	607.52	1282.75
c	Large Supply	10,087.13	653.19	6588.77
	Total	13,150.18	641.51	8435.99
4	Public Lighting	202.82	610.00	123.72
5	Bulk Supply	661.19	593.55	392.45
6	Railway Traction	165.64	692.89	114.77
7	Total Metered Sales (exc)	29,806.31	593.85	17,700.35
8	AP Consumption	11,523.34	402.43	4637.37
9	Total Sale Within State	41,329.65	540.48	22337.72
10	Sales to Outside State	137.07		29.55
11	Sales to Common Pool C	294.51	459.44	135.31
12	Total Sales (9+10+11)	41,761.23		22,502.58
13	Add MMC			398.15
14	PLEC			171.28
15	Surcharge			(275.16)
16	SOP Recognized by PSERC			276.82
17	Grand Total			23,073.67

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
ARR FOR FY 2015-16 (Actual)  
FORMAT 28-B

Particulars	Rs. In Crores
	(Actual)
Cost of fuel	2,782.84
Cost of power purchase	13,042.47
Employee cost	4,397.99
R&M expenses (Normative)	565.27
A&G expenses (Normative)	164.29
Depreciation	1,046.80
Interest charges (Net of Capitalization)	2,880.61
Return on Equity	942.62
Transmission Charges Payable to PSTCL	967.65
Maintenance Charges payable to Punjab Govt. on Power from RSD	
Prior period adjustment	35.47
Other debts	36.07
<b>Total Revenue Requirement</b>	<b>26,862.08</b>
Less Non-Tariff income	994.36
<b>Net Revenue Requirement</b>	<b>25,867.72</b>
Less Revenue from existing tariff	23,073.67
Tariff Compensation from GOP	
Less: On account of rebate to various consumer categories	-
Net Revenue from Existing Tariff	23,073.67
Less: Disallowances due to non-achievement of mile-stones	
<b>Gap (+)/surplus (-) for the year</b>	<b>2,794.05</b>
Add consolidated Gap (+)/surplus (-) upto previous year	-
Add Carrying Cost on Gap (+)/surplus (-) of Previous Year	192.53
Add carrying cost on Gap (+)/surplus (-) of current year	413.18
<b>Total Cumulative Gap (+)/surplus (-) for the year</b>	<b>3,399.76</b>

Note:- 1. Revenue from sale of power includes subsidy  
2. No previous year revenue gap is considered, same shall be addressed during the trued-up

PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
INFORMATION REGARDING WHOLESALE PRICE INDEX (ALL COMMODITIES)  
(To be supported with documentary evidence)  
FORMAT 29

Sr. No.	Period	WPI	Increase over previous year
1	2	3	4
1	As on April 1 of n-5 year (FY 2010-11)	143.32	
2	As on April 1 of n-4 year (FY 2011-12)	156.13	8.94%
3	As on April 1 of n-3 year (FY 2012-13)	167.62	7.33%
4	As on April 1 of n-2 year (FY 2013-14)	177.64	5.97%
5	As on April 1 of n-1 year (FY 2014-15)	181.19	2.03%
6	As on April 1 of n (ensuing) year (FY 2015-16)	176.78	-2.43%
7	As on April 1 of n+1 (ensuing) year (FY 2016-17)	181.83	2.86%



**PUNJAB STATE POWER CORPORATION LIMITED**  
**ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17**  
**INFORMATION REGARDING AMOUNT OF EQUITY AND LOAN**

**FORMAT 30**

Sr. No.	Period	(Rs. In Crores)		
		Amt. of Equity (Rs. in crores)	Amt. of Loan* (Rs. in crores)	Ratio of equity & loan
1	2	3	4	5
3	As on 31-03-2014 (Actual)	6,081.43	10,198.15	0.60
4	As on 31-03-2015 (Actual)	6,081.43	10,684.59	0.57
5	As on 31-03-2016 (Actual)	6,081.43	20,808.56	0.29

\* Loans are excluding working capital loans

Note :-

The decline in ratio of equity & loan is due to UDAY scheme as the loans have been converted from working capital loans to State Govt. loans & DISCOM bonds.

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
INFORMATION REGARDING REVENUE FROM OTHER BUSINESS  
**FORMAT 31**

Sr. No.	Particulars	FY 2015-16 (Actual)
1	Total Revenue from Other Business	NIL
2	Income from Other Business to be considered for Licensed Business as per Regulation	NIL

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
INFORMATION REGARDING BAD AND DOUBTFUL DEBTS  
FORMAT 32

Sr. No.	Particulars	FY 2014-15 (Actual)	FY 2015-16 (Actual)
1	Materials cost variance		
2	Bad & doubtful debts written off		
3	Provision for Bad & doubtful debts		
4	<b>Total</b>	-	-
5	Miscellaneous losses and write offs		
6	Sundry expenses- Intangible assets written off (Pre-incorporation expenses)		Nil
7	Extra Ordinary Debit		
8	<b>Total</b>	-	-
9	loss on sale of Assets-Plant & Machinery		
10	<b>Grand Total</b>	-	-

PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
INFORMATION REGARDING WORKING CAPITAL AS PER PSERC REGULATIONS  
**FORMAT 33**

		(Rs. in crores)
Sr. No.	Particulars	FY 2015-16 (Actual)
1	2	6
1	Two month Fuel Cost	463.81
2	One month Employee Cost	366.50
3	One month Repair and Maintenance Expenses	47.11
4	One month Administration and General Expenses	13.69
5	Two month Receivables	3,845.61
6	Maintenance spares @ 15% of O&M expenses	769.13
7	Less: Consumer Security Deposit	2,752.99
8	<b>Total requirement for working capital</b>	<b>2,752.86</b>
9	Interest Rate	14.60%
10	<b>Interest</b>	<b>401.92</b>

Note;- This information for compliance of format.



PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
INFORMATION REGARDING FOREIGN EXCHANGE RATE VARIATION (FERV)  
FORMAT 34

Sr. No	Particulars	FY 2015-16
		Actuals
1	Amount of Liability Provided	NIL
2	Amount Recovered	NIL
3	Amount Adjusted	NIL

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PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
STATEMENT SHOWING AMOUNT OF GOVERNMENT SUBSIDY DUE AND RECEIVED FOR FY 2015-16 (Actual)  
FORMAT 35-B

Particulars	No. of consumers	Consumption as per account (in Mus)	Revenue required			Revenue actually receivable from consumers	Total amount of subsidy due from GOP	Amount of subsidy received from GOP	Amount of subsidy received from GOP excess/short (+/-)
			Energy charges	Meter rentals and service charges etc.	Total				
1	2	3	4	5	6	7	8	9	10
(i) AP Consumers	12,43,699	11,513.87	5,311.28	9.00	5,320.28	-	5,320.28	-	-
(ii) Scheduled Castes DS Consumers	13,90,760	2,050.32	1,037.33	15.74	1,053.07	-	1,053.07	-	-
(iii) Non- SC BPL DS Consumers	96,971	136.75	69.03	1.25	70.28	-	70.28	-	-
Additional Subsidy on a/c of FCA for AP consumers					-				
Additional Subsidy on a/c of FCA for SC DS and non SC BPL consumers					-				
<b>Total</b>	<b>27,31,430</b>	<b>13,700.94</b>	<b>6,417.64</b>	<b>25.99</b>	<b>6,443.63</b>	<b>-</b>	<b>6,443.63</b>	<b>4,847.00</b>	<b>(1,596.63)</b>



PUNJAB STATE POWER CORPORATION LIMITED  
ANNUAL REVENUE REQUIREMENT UP TO THE YEAR 2016-17  
PRIOR PERIOD ADJUSTMENT  
FORMAT 36

Sr. No	Particulars	FY 2015-16
		Actuals
	Income relating to previous year.	
1	Sale of Power	6.52
2	Interest income for prior periods	0.15
3	Excess prov. For depreciation	3.34
4	Excess prov for Interest & finance Charges	1.17
5	Other excess provision	7.32
6	Other Income	1.23
7	Sub Total	19.73
8	Prior period expenses / losses	
9	Operating expenses	2.05
10	Employee costs	3.07
11	Depreciation unprovided in previous years	46.7
12	Interest & finance charges	1.12
13	Administrative Exps. Previous year	1.5
14	Freight & other purchase related expenses	0.76
15	Total	55.2
16	Net prior period (Credit) / Charges - PSPCL	35.47