GUJARAT ELECTRICITY REGULATORY COMMISSION



Truing up for FY 2016-17 and Determination of Tariff for FY 2018-19

For

Torrent Power Limited - Generation Ahmadabad

CaseNo. 1695 of 2018 31st March, 2018

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GUJARAT ELECTRICITY REGULATORY COMMISSION (GERC)

GANDHINAGAR

Tariff Order

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ABBREVIATIONS

A&G	Administration and General Expenses
ARR	Aggregate Revenue Requirement
CAPEX	Capital Expenditure
CERC	Central Electricity Regulatory Commission
DISCOM	Distribution Company
EA	Electricity Act, 2003
FPPPA	Fuel and Power Purchase Price Adjustment
FY	Financial Year
GERC	Gujarat Electricity Regulatory Commission
GFA	Gross Fixed Assets
GoG	Government of Gujarat
HT	High Tension
kV	Kilo Volt
kVA	Kilo Volt Ampere
kVAh	Kilo Volt Ampere Hour
kWh	Kilo Watt Hour
LT	Low Tension
MTR	Mid-Term Review
MUs	Million Units (Million kWh)
MW	Mega Watt
MYT	Multi-Year Tariff
O&M	Operations and Maintenance
p.a.	Per Annum
PPA	Power Purchase Agreement
R&M	Repairs and Maintenance
SBI	State Bank of India
Second Control Period	FY 2011-12 to FY 2015-16
SLDC	State Load Despatch Centre
Third Control Period	FY 2016-17 to FY 2020-21



Before the Gujarat Electricity Regulatory Commission at Gandhinagar

Case No. 1695 of 2018

Date of the Order: 31/03/2018

CORAM

Shri Anand Kumar, Chairman Shri K. M. Shringarpure, Member Shri P.J. Thakkar, Member

ORDER

1 Background and Brief History

1.1 Background

Torrent Power Limited (hereinafter referred to as TPL or the Petitioner) has filed the present petition under Section 62 of the Electricity Act, 2003, read in conjunction with Gujarat Electricity Regulatory Commission (Multi-Year Tariff) Regulations, 2016, for the True-up of FY 2016-17 and for determination of tariff for its generation business at Ahmadabad for the FY 2018-19 on 30th December, 2017.

Gujarat Electricity Regulatory Commission notified the GERC (Multi-Year Tariff) Regulations, 2016 on 29th March, 2016 which shall be applicable for determination of tariff in all cases covered under the Regulations from 1st April, 2016 onwards. Regulations 17.2 (b) of the GERC (Multi-Year Tariff) Regulations, 2016 provides for



submission of detailed application comprising of truing up for FY 2016-17 to be carried out under Gujarat Electricity Regulatory Commission (Multi-Year Tariff) Regulations, 2016, revenue from the sale of power at existing tariffs and charges for the ensuing year (FY 2018-19) and revenue gap or revenue surplus for the third year of the Control Period calculated based on Aggregate Revenue Requirement approved in the MYT Order and truing up for the previous year and determination of tariff for FY 2018-19.

After technical validation of the petition, it was registered on 3rdJanuary, 2018 and as provided under Regulation 29.1 of GERC MYT Regulations, 2016, the Commission has proceeded with this tariff order.

1.2 Torrent Power Limited (TPL)

Torrent Power Limited (TPL), a company incorporated under the Companies Act, 1956 is carrying on the business of Generation and Distribution of Electricity in the cities of Ahmadabad, Gandhinagar and Surat. The present petition has been filed by TPL-Generation (Ahmadabad) for its generation business in Ahmadabad.

TPL had assumed the business, consequent upon the amalgamation of Torrent Power Ahmadabad Limited (TPAL), Torrent Power Surat Limited (TPSL) and Torrent Power Generation Limited (TPGL) with Torrent Power Limited. Besides, TPL is also engaged in other businesses, which do not come under the regulatory purview of the Commission.

TPL has existing generation facilities, with a total installed capacity of 422 MW, at Ahmadabad and has a Combined Cycle Power Plant (CCPP) of 1147.5 MW (SUGEN) capacity near Surat out of which a share of 835 MW is allocated for Gujarat (Ahmedabad, Gandhinagar and Surat). The generation facility at Ahmadabad consists of a 422 MW coal based Thermal Power Plant at Sabarmati.

1.3 Commission's orders for tariff of FY 2016-17

The Commission in its order dated 2nd December, 2015, in the Suo Motu Petition No. 1534 of 2015 decided that the approved ARR of FY 2015-16 of the licensees / generating companies concerned be considered as provisional ARR of the licensees / generating companies for FY 2016-17.

The Commission also decided that the licensees / generating companies shall file the ARR for FY 2016-17 based on the MYT Regulations for FY 2016-17 to FY 2020-21



and the true-up for the same shall also be governed as per the new MYT Regulations. It is also decided that the licensees / generating companies shall file the petition for determination of ARR and tariff for FY 2016-17 and true-up for FY 2014-15 within 3 weeks from the date of issuance of the order for Commission's consideration and decision.

Accordingly, the Petitioner filed a petition for Truing-up of FY 2014-15 and determination of tariff for FY 2016-17 on 23rd December, 2015. The petition was registered on 28th December, 2015. The Commission approved the provisional ARR vide order dated 31st March, 2016, and the tariff for FY 2016-17 was determined accordingly.

1.4 Commission's order for Approval of final ARR for FY 2016-17 and Approval of Multi-Year ARR for FY 2016-17 to FY 2020-21

The Petitioner filed its petition for Truing up of FY 2015-16, Approval of Final ARR for FY 2016-17, Approval of Multi-Year ARR for FY 2016-17 to FY 2020-21 and Determination of tariff for FY 2017-18 on 29th November, 2016. The petition was registered on 03rd December, 2016 (under Case No. 1626 of 2016). The Commission vide order dated 9th June, 2017 approved the Truing up for FY 2015-16, Final ARR for FY 2016-17, Multi-Year ARR for FY 2016-17 to FY 2020-21 and determined the tariff for FY 2017-18.

1.5 Background of the present petition

The Commission has notified the GERC (MYT) Regulations, 2016 for the control period of FY 2016-17 to FY 2020-21. Regulation 16.2 (iii) of the GERC (MYT) Regulations, 2016 provides for the truing up of previous year's expenses and revenue based on audited accounts vis-à-vis the approved forecast and categorization of variation in performance as those caused by factors within the control of the applicant (controllable factors) and those caused by factors beyond the control of the applicant (uncontrollable factors).

Regulation 16.2 (vi) of the GERC (MYT) Regulations, 2016 provides for annual determination of tariff for the Generating Company, Transmission Licensee, SLDC, Distribution Wire Business and Retail Supply Business, for each financial year, within



the Control Period, based on the approved forecast and results of the truing up exercise.

1.6 Registration of the Current Petition and the Public Hearing Process

The Petitioner submitted the current Petition for Truing-up of FY 2016-17 and determination of tariff for FY 2018-19 on 30th December, 2017. After technical validation of the petition, it was registered on 3rd January, 2018 (Case No. 1695 of 2018) and as provided under Regulation 29.1 of the GERC MYT Regulations, 2016, the Commission has proceeded with this tariff order.

In accordance with Section 64 of the Electricity Act, 2003, TPL(G) was directed to publish its application in the newspapers to ensure public participation.

The Public Notice, inviting objections / suggestions from the stakeholders on the Truing up and tariff determination petition filed by TPL, was published in the following newspapers:

Table 1.1: List of Newspapers

SI. No.	Name of Newspaper	Language	Date of Publication
1	The Indian Express	English	10/01/2018
2	NavGujarat Samay	Gujarati	10/01/2018
3	Gujarat Guardian	Gujarati	10/01/2018

The Petitioner also placed the public notice and the petition on its website (www.torrentpower.com) for inviting objections and suggestions on the petition. The interested parties/stakeholders were asked to file their objections / suggestions on the petition on or before 9th January, 2018.

The Commission also placed the petition and additional details received from the Petitioner on its website (www.gercin.org) for information and study for all the stakeholders.

The Commission received objections / suggestions from the consumers / consumer organizations as shown in Table below. The Commission examined the objections / suggestions received from the stakeholders and fixed the date for public hearing for the petition on 15th February, 2018 at the Commission's Office at Gandhinagar and subsequently a communication was sent to the objectors to take part in the public



hearing process for presenting their views in person before the Commission.

The Commission received request from some stakeholders to postpone the date of public hearing and considering the request, the Commission fixed second date of public hearing for the petition on 26th February, 2018. The public hearing was conducted in the Commission's Office at Gandhinagar as scheduled on the above dates.

The status of stakeholders who submitted their written suggestion / objections, those who remained present in public hearing, those who could not attend the public hearings and those who made oral submissions is given in the Table below:

Present Present Sr. Written Oral Name of Stakeholders on on No. **Submission** Submission 15.02.2018 26.02.2018 Laghu Udyog Bharati -1. Yes Yes Yes No Gujarat 2. Shri K.K. Bajaj Yes Yes Yes No Shree Gujarat Vijli 3. Yes Yes Yes No Contractor Mandal Gujarat Chamber of 4. Yes Yes No Yes Commerce & Industry Utility Users' Welfare 5. No Yes Yes No Association (UUWA) 6. Shri R.G. Tillan No Yes Yes No

Table 1.2: List of Stakeholders

A short note on the main issues raised by the objectors in the submission in respect of the petition, along with the response of TPL-G (APP) and the Commission's views on the response, are given in Chapter 3.

1.7 Contents of this Order

The Order is divided into six chapters as detailed under: -

- 1. The first chapter provides a brief background regarding the Petitioner, the petition on hand and details of the public hearing process and approach adopted in this Order.
- 2. The second chapter outlines the summary of TPL's Petition.
- 3. The third chapter deals with the objections raised by various stakeholders, TPL's response and Commission's views on the response.



- 4. The fourth chapter focuses on the details of truing up for FY 2016-17.
- 5. The fifth chapter deals with the determination of Tariff for FY 2018-19.
- 6. The sixth chapter deals with compliance of directives and issue of fresh directives.

1.8 Approach of this Order

The GERC (Multi-Year Tariff) Regulations, 2016 provide for "Truing up" of the previous year and determination of Tariff for the ensuing year. The Commission has approved ARR for Five years of the Control Period of FY 2016-17 to FY 2020-21 in the MYT Order dated 9th June 2017.

The Commission in its order dated 2nd December, 2015, in the Suo Motu Petition No. 1534/2015 decided that the approved ARR of FY 2015-16 of the licensees / generating companies concerned be considered as provisional ARR of the licensees / generating companies for FY 2016-17.

The Commission on 9th June, 2017 passed order for truing up of FY 2015-16, determination of final ARR for FY 2016-17, determination of ARR for the third Control Period i.e. FY 2016-17 to FY 2020-21 and determination of tariff for the FY 2017-18.

TPL has approached the Commission with the present Petition for "Truing up" of the FY 2016-17 and determination of Tariff for the FY 2018-19.

The Commission has undertaken the "Truing up" for FY 2016-17, based on the submissions of the Petitioner. The Commission has undertaken the computation of gains and losses for FY 2016-17, based on the annual accounts and final ARR for FY 2016-17 approved vide Order dated 9th June 2017.

While truing up of FY 2016-17, the Commission has been primarily guided by the following principles:

- Controllable parameters have been considered at the level approved under the MYT order, unless the Commission considers that there are valid reasons for revision of the same.
- Uncontrollable parameters have been revised based on the actual performance observed.



 The Truing up for the FY 2016-17 has been considered, based on the GERC (MYT) Regulations, 2016.

The Commission has not considered the difference between provisional and final approved ARR for FY 2016-17 as the revised ARR for FY 2016-17 as trued up by the Commission for TPL(G) is transferred in the actual power purchase cost of TPL Distribution for FY 2016-17.

Determination of Tariff for FY 2018-19 has been considered as per the GERC (Multi-Year Tariff) Regulations, 2016 and amendment thereof as the base.



2 A Summary of TPL's Petition

2.1 Actual for FY 2016-17 submitted by TPL-G (APP)

Torrent Power Limited (TPL) submitted the current petition seeking approval of Trueup for ARR of FY 2016-17. The details of expenses under various heads of ARR are given in Table below:

Table 2.1: Actual claimed by TPL for FY 2016-17

(Rs Crore)

		True-Up Year (2016-17)		
		MYT Order	Claimed in Petition	Deviation
Sr.				
No.	Particulars	(a)	(b)	(c) = (a) - (b)
1	Variable Cost	812.21	838.97	(26.76)
2	O & M Expenses	157.78	135.87	21.91
3	Water Charges	10.96	14.13	(3.17)
4	Depreciation	47.34	49.62	(2.28)
5	Interest on Loan	12.01	10.94	1.07
6	Interest on Working Capital	14.63	14.45	0.18
7	Return on Equity	60.84	60.21	0.63
8	Income Tax	15.34	7.61	7.73
9	Incentive	0.00	0.00	-
10	Total Expenditure	1131.11	1131.80	(0.69)
11	Less: Non-Tariff Income	17.43	16.89	0.54
12	Aggregate Revenue Requirement	1113.68	1114.91	(1.23)

2.2 ARR for FY 2018-19

TPL, in its petition, has also furnished the ARR for FY 2018-19 as depicted in the Table below;

Table 2.2: ARR for FY 2018-19

(Rs Crore)

Particulars	Amount
Variable Cost	786.90
O&M Expenses	169.95
Water Charges	12.25
Depreciation	45.03
Interest on Loan	3.44
Interest on Working Capital	14.35



Particulars	Amount
Return on Equity	58.96
Income Tax	15.34
Less: Non-tariff Income	17.43
Net ARR	1,088.78

2.3 TPL's request to the Commission

- a) Admit the petition for truing up of FY 2016-17 and determination of tariff for FY 2018-19.
- b) Approve the trued up ARR of FY 2016-17.
- c) Approve the sharing of gains/ losses as proposed by the Petitioner for FY 2016-
- d) Allow recovery of the costs as per the Judgments of the Hon'ble Tribunal in the Appeals filed by the Petitioner.
- e) Allow additions/ alterations/ changes/ modifications to the petition at a future date.
- f) Permit the Petitioner to file all necessary pleadings and documents in the proceeding and documents from time to time for effective consideration of the proceeding.
- g) Allow any other relief, order or direction which the Hon'ble Commission deems fit to be issued.
- h) Condone any inadvertent omissions/ errors/ rounding off difference/shortcomings.



3 Stakeholder's suggestions/objections, Petitioner's response and the Commission's view

In response to the public notice inviting objections / suggestions from stakeholders on the Petition filed by TPL-G for Truing up of FY 2016-17 and determination of ARR for FY 2018-19 under the GERC (MYT) Regulations, 2016, a number of Consumers / organizations filed their objections / suggestions in writing. Some of these objectors participated in the public hearing also. The objections / suggestions by the consumer / consumers organizations, the response from the Petitioner and the views of the Commission are given below:

3.1 Artificial Gap of Rs. 21.7 Crore

The Objector has stated that the ARR Gap of Rs. 21.7 Cr. is artificially created by comparing the actuals with the projections while calculating gains/ losses.

Response of TPL

The MYT Regulations provide for truing up exercise based on comparison of actual data with estimates and segregation of variation between controllable and uncontrollable factors. Accordingly, the trued up ARR is to be arrived at in accordance with the Regulations. Thus, the issue raised by the Objector is baseless.

Commission's View

Tariff Policy notified by the Ministry of Power provides for the mechanism for sharing the gains and losses with the consumers as part of the overall framework of MYT. Accordingly, the GERC MYT Regulations also provide for the truing up of projected and approved ARR and sharing of gains and losses.

3.2 No details of sellers and purchaser given

The Objector has submitted that no details of sellers, purchasers and tariff are given in the Petition.

Response of TPL

It files tariff petitions for its Generation Facilities at Ahmedabad before the Commission as per the Regulations notified by the Commission from time to time. TPL-G (APP) is the approved source for supply of electricity to TPL-D.



Accordingly, the ARR of TPL-G (APP) is reflected in the power procurement cost of TPL-D. The purchase of power from TPL-G (APP) is at the regulated tariff as determined by the Commission.

Commission's View

The petition for truing up of ARR for Sabarmati generation facility and power generated from Sabarmati generating station is considered as supply to TPL Distribution facility.

3.3 Figures submitted not matching with Accounting Statements

The Objector has submitted that the figures of income and expenditure submitted by the Petitioner are not matching with the income and expenditure of the Accounting Statements.

Response of TPL

The petition has been filed in line with the GERC (MYT) Regulations, 2016 under the provisions of the Electricity Act, 2003 whereas the Accounting Statements submitted by the Petitioner is prepared as per provisions of the Companies Act, and in accordance with Accounting Standards duly verified by Statutory Auditors' of the Company. Thus, both are prepared under different statute and are not directly comparable. It further submits that all the requisite information for the present proceedings is furnished in the petition in accordance with the GERC MYT Regulations.

Commission's View

Mismatching of claims and numbers shown in the Accounting Statements and the petition is discussed in analysis chapter of this Order and the Commission has considered appropriate adjustments in truing up exercise of ARR.

3.4 MAT not considered as part of the Fix Charges

The Objector has submitted that the Petitioner has not considered MAT as part of the Fixed Charges while GSECL has considered the same.

Response of TPL

It has claimed the Income Tax for FY 2016-17 by apportioning the actual amount of tax paid in respect of the PBT as per audited accounts. It has further clarified



that as it pays income tax at MAT rate at Company level, the effective income tax rate applicable to the Petitioner is also MAT rate.

Commission's View

Income tax paid by the Petitioner is considered as part of the Fixed Charges in accordance with the MYT Regulations.

3.5 Fuel Cost is more than approved

The Objector has submitted that the figure of fuel cost submitted by the Petitioner is not matching with the Profit & Loss Statement of the Accounting Statements and the difference of Rs. 6.63 Cr is not explained.

Response of TPL

The details of the non-consideration of Rs. 6.63 Cr. is submitted at para 3.29 of the Petition.

Commission's View

Reasons for difference in fuel cost shown in the Accounting Statements and claimed in the petition are submitted by the Petitioner. The Commission considered the lower fuel cost in truing up of ARR.

3.6 Retained earnings is transferred to H.O.

The Objector has suggested to deduct the amount of retained earnings transferred to HO from the ARR.

Response of TPL

It has arrived at the ARR in accordance with the provisions of the GERC (MYT) Regulations, 2016. The Petitioner has submitted that the Financial Statements are prepared in accordance with the provisions of the Companies Act, 2013.

Commission's View

The licensee is free to use its retained earnings/ return on equity.

3.7 Capital transferred not reflected in ARR

The Objector has submitted that the capital transferred of Rs. 33 Cr. as per the Note 24 and Note 27 of the Accounting Statement is not reflected in the ARR.



Response of TPL

The details of the capital transferred of Rs. 33 Crs are considered in the Form 3.2 & 3.3 of the Petition. It has provided all the required information for arriving at ARR in the petition in accordance with the GERC (MYT) Regulations; 2016. It has further submitted that the Statement of Accounts is prepared in accordance with the provisions of the Companies Act, 2013.

Commission's View

Rs. 20.36 Crore of Employee Expenses and Rs. 12.64 Crore of Administrative and General Expenses totalling to Rs. 33 Crore are considered as 'Expenses Capitalised' in the truing up exercise.

3.8 Retirement of 60 MW C-Station

The Petitioner's plant at C station is already kept in wet preservation mode since last two years. This plant is very old and the SHR is also higher. Therefore, the Commission should ensure that Petitioner retires the existing coal based generating station at C station.

Further, with reference to the environmental norms notified by the MoEF, the Objector requested the Commission to provide additional time to the state's coal based generating stations including the Petitioner's power plants to comply with the environmental norms as this will put additional burden on electricity consumers of Ahmedabad.

Response of TPL

It has envisaged the retirement of the C-Station from FY 2018-19 as approved by the Commission in the MYT Order.

Further, regarding the environmental norms, representations are being made before the Ministry of Environment & Forests (MoEF) to grant relief under these norms. Since the matter is yet to be decided by the MoEF, it has not considered any capex towards modifications required for complying with the MoEF notification in the present petition. In this regard, the Petitioner shall approach the Commission at appropriate stage.

Commission's View

In the MYT Order dated 9th June 2017, availability of C-Station is considered up to FY 2017-18 only.



3.9 Low installed capacity of coal based plants

The Petitioner has low installed capacity of coal based plants and large amount of generation is from gas based plants. Its coal based generation capacity has reduced from 422 MW to 362 MW. Therefore, the Petitioner should be directed to increase its capacity by installing new 500 MW coal based plant either at the existing location or near the mines which helps in reducing the cost.

Response of TPL

It has clarified that the existing environmental norms and the limitation of chimney height do not allow to install new generating unit of higher size at Sabarmati.

Commission's View

According to the Electricity Act 2003, electricity generation is a de-licensed activity. The Distribution Licensee are now required to explore the option of procurement of power on competitive bidding basis.

3.10 Performance of coal based plants at Ahmedabad

The objector has stated that it is surprizing that Petitioner has not claimed Incentive for excellent performance of D-E-F Stations whose Plant Load Factor remained over 85 % during 2016-17.

Response of TPL

As per the MYT Regulations, it can claim PLF incentive in case overall PLF of the Sabarmati Plant is higher than 85%. Therefore, the Petitioner has not claimed any incentive.

Commission's View

Overall PLF of Sabarmati Generating Station is less than 85% and hence the Petitioner is not entitled to get any incentive on this account.

3.11 Delayed filing of Tariff Petition

The Objector has submitted that it had requested the Commission to grant extension to enable him to study the tariff petitions filed by TPL. However, the Commission has not granted the request in spite of the fact that TPL as per Regulation-28.8 of the MYT Regulation, 2016, ought to have filed the petitions on or before 30th November. The word used in the Regulation is "SHALL" which leaves no space for relaxation on the part of the Commission. However,



Commission seems to have granted relaxation and extension to TPL on what ground is not mentioned either by TPL in its petitions not mentioned in the public notice for inviting suggestions and objections on delayed petitions.

The Objector has submitted that TPL is not vigilant and alert for its recovery and is lethargic in submission of tariff petitions on or before 30th November. Further, the Commission is anxious and eager to pass the tariff order on 31st March, 2018 by depriving of Consumers' right of participation in the tariff determination process, which is against the principle of Natural Justice.

The Objector has submitted that the Petitioner should be penalized for delay in filing the Petition.

Further, it is submitted that if the reasons for delay in submission of the petition is election and formation of State Government as to which political party comes into power, there is nothing to do with such political events to the tariff proceedings because GERC is an independent, Statutory body bound to act independently, impartially, in the interest of justice, within four corners of the provisions of the Act, and without any influence of any Government.

Response of TPL

It had sought the extension of time considering prevalent scenario in the State at that point of time and in turn, the Commission has granted time period till 31.12.2017 to file the Petition. The Petitioner filed the petition on 30.12.2017. The Commission is entitled under the Statutory Regulations to abridge or extend the time.

Commission's View

The Tariff Policy notified by the Ministry of Power provides that Commission should initiate tariff determination on a suo motu basis in case the licensee does not initiate filing in time. It is also provided that it is desirable that requisite tariff changes come into effect from the date of the commencement of each financial year.

Accordingly, in accordance with the MYT Regulations 2016, the Commission accepted delayed filing by the licensee and 30 days time period was provided to the stakeholders to file their suggestions /objections from the date of publication of advertisement in this regard in daily newspapers. Subsequently, on request from



some stakeholders, further time period (beyond 30 days) was also provided for filing suggestions and objections.

3.12 Admission of incomplete Tariff Petition by GERC

The Objector has submitted that Regulation-25.1 of the MYT Regulations, 2016 specifies that the proceedings to be held by the Commission for determination of tariff shall be in accordance with the GERC (Conduct of Business) Regulations, 2004 as amended from time to time. The Commission has not conducted the proceedings for admitting the tariff petitions as per the GERC (Conduct of Business) Regulations, 2004 and without verifying the petition whether it is complete or not, without directing TPL to comply with the discrepancy, without passing any admission order violated its own regulations which is bad in law.

It is submitted that TPL has filed incomplete petitions and till all the details and information on which Commission rely upon to pass a tariff order is made available to consumers and its organization, it is not just and fair to invite objections and suggestions in the subject matter.

Response of TPL

It has submitted that the present proceedings are a part of Tariff Proceedings. The GERC (Conduct of Business) Regulations, 2004 have been framed under Section 181 of the Electricity Act, 2003 read with Section 12 of the Gujarat Industry (Reorganisation and Regulation) Act, 2003. The State enactment (GIR&R Act, 2003) deals with the proceedings before the Commission.

The other Regulations namely, the GERC (MYT) Regulations, 2016 are framed under inter alia Section 181, 61, 62 of the Electricity Act, 2003 and Section 32 of the GIR&R Act, 2003. Section 32 of the State enactment specifically deals with tariff.

Therefore, it can be concluded that the Regulations contemplated in Section 64 (1) of the Act are the GERC (MYT) Regulations, 2016. The MYT Regulations are special Regulations and it is pertinent to note that Sub-section (zh) of Section 181 devolves power on the Commissions to frame Regulations in respect of issuance of tariff orders. The Special Regulations would therefore prevail over general Regulations.

It has further submitted that Regulation 34 of the GERC (Conduct of Business) Regulations, 2004 confers authority on the Secretary to deal with issues which are



in the nature of objections in filing i.e. the mode, manner and method of filing pleadings and not with the adjudication of pleadings. A perusal of Regulations 34 to 38 reveals that the said provisions relate to presentation of the Petitions. As an illustration it is pointed out that if a Petition is not accompanied by the Affidavit in Support, the Petition may be kept in objection. If the objections are not removed as directed by the Secretary, then under Regulation 34; the Petition stands dismissed. These objections invariably relate to the presentation and lodging of the Petition. The scrutiny contemplated, when the Petitions are presented, is in the nature of defects in the Petition which are required to be corrected by the Petitioner.

Admission of a proceeding is a stage in the procedural aspect concerning litigation. Stricto Sensu the admission of a proceeding is between the Petitioner and the adjudicating Authority.

It is in this light, that power has been conferred on the Commission to admit a Petition for hearing, without requiring the attendance of the party. This is specifically pointed out as the Objector is relying on the GERC (Conduct of Business) Regulations, 2004, to the exclusion of the special Regulations namely GERC (MYT) Regulations, 2016.

Commission's View

As provided in the GERC (MYT) Regulations 2016, Secretary of the Commission is authorised for registration of tariff application and intimating the petitioner for publication of notice in this regard. Further, as provided in Tariff Policy, Commission has to initiate tariff determination exercise even in the absence of filing by the licensee or incomplete filing.

3.13 Redetermination of ARR of FY 2016-17 and truing up of FY 2016-17 as per provisionally approved ARR and GERC (MYT) Regulations, 2011

The Objector has submitted that there is no provision in either E.A. 2003 or MYT or other Regulations to determine the ARR for the same financial year (FY 2016-17) because the sharing of gain/loss of controllable and uncontrollable factors of tariff is the comparison of approved value with the actual received in the truing up. The question is which ARR is to be considered valid which is approved in the tariff petitions No. 1551/1552/1553 of 2015 which is based on the MYT Regulations, 2011 or approved in the tariff petitions No. 1626/1627/1628 of 2016 which is



based on the MYT Regulations, 2016. Both the tariff orders for approval of ARR of FY 2016-17 are valid and legal.

ARR is approved in Petitions No. 1551, 1552 and 1553 of 2015 vide order dated 31.03.2016 is based on the MYT Regulations, 2011 and TPL has recovered the charges on the strength of the said order, how the truing up of the same ARR can be carried out under the MYT Regulations, 2016 and with the ARR approved in the Petitions No.1626, 1627 and 1628 of 2016 Order dated 09.06.2017. The ARR for FY 2016-17 under MYT Order is after completion of FY 2016-17 and no tariff increase or decrease was decided in the said order dated 09.06.2017. The Objector submitted that the truing up of FY 2016-17 should be compared with ARR determined vide Orders dated 31.03.2016 and not at all with ARR approved in Orders dated 09.06.2017.

Response of TPL

It has stated that the Petition for truing-up of FY 2014-15 and determination of tariff for FY 2016-17 was duly filed with the Commission as was directed in the order in Suo Motu Petition No. 1534/2015. Further, as stated in the said order it had also filed ARR for the third control period of FY 2016-17 to FY 2020-21 as per the GERC (MYT) Regulations, 2016. In turn, the Commission issued the order approving final ARR for FY 2016-17. The MYT Regulations, 2016 provide for truing up of FY 2016-17 as per the MYT Regulations, 2016. Thus, there is no irregularity or infirmity in the proceedings and the issue raised by the Objector does not survive. It has further submitted that the Objector had also participated in both the tariff proceedings. The Objector is now seeking to obliquely assail the order passed in Suo Motu proceedings viz. Petition No. 1534 of 2015 and the subsequent orders and the MYT Regulations notified by the Commission.

Commission's View

Tariff Policy provides that it is desirable that requisite tariff changes come into effect from the date of the commencement of each financial year. Accordingly, the Commission adopted ARR approved for FY 2015-16 as provisional ARR for determination of tariff for the FY 2016-17. In order to carry out truing up exercise for FY 2016-17, it is required to approve final ARR for FY 2016-17 with targeted/benchmarked controllable parameters. Accordingly, approval of ARR for FY 2016-17 was considered by the Commission in MYT Order. The deviation between the provisional ARR and final ARR is to be considered as uncontrollable.



3.14 Maintaining separate accounting statements as per MYT Regulations

The Objector has submitted that the Regulation 17.3 of the MYT Regulations specifies that TPL has to maintain separate entity wise, business wise and segment wise books of accounts. It should be audited and such audited accounting statement as mandated in the MYT Regulations should be submitted as part of tariff petitions. However, TPL has not complied with this mandatory requirement of the MYT regulations and has breached the mandatory requirement. Violating the Regulations is bad in law and petitions are required not to be admitted till the compliance is made by TPL in this regard.

Response of TPL

It has submitted that it prepares and maintains the accounts as per the Accounting Standards specified by the Institute of Chartered Accountants of India in accordance with the provisions of the Companies Act. It has furnished the separate Financial Statements, duly certified by the Statutory Auditors' of the Company for the FY 2016-17 in accordance with the statutory provisions.

Commission's View

Commission accepted the separate Accounting Statements duly certified by the statutory auditors of the petitioner. Further, the Commission also engaged third party experts for analysis of submission and carry out detailed prudence check during truing up of ARR exercise. Over and above, Commission also appointed Charted Accounting firm empanelled by CAG for exhaustive third party audit of accounts submitted/ prepared by the petitioner.

3.15 Non submission of various information and supporting documents

The Objector has submitted that the Petitioner has not submitted various information and supporting documents.

Response of TPL

It has submitted that it has furnished all the information as specified in the GERC (MYT) Regulations, 2016. The current proceedings are to be conducted as per the scope and ambit of Part VII of the Electricity Act, 2003.

Commission's View

After receiving the application for the determination of tariff from the licensee, the Commission carries out detailed analysis of the submission and if required, calls



for additional information and clarification/supporting documents from the petitioner. As suggested earlier by some of the stakeholders, the Commission has placed the additional information received from the petitioner on GERC website and accordingly, same is made available to all the stakeholders.

3.16 Allocation of SUGEN power purchase cost as per allocation percentage defined in the PPA

The objector has submitted that the sale of energy, number of consumers, nature of consumption, category of consumers in Ahmedabad and Surat supply area is quite different. Also separate tariff of electricity is being determined for Ahmedabad and Surat supply area. The power procurement sources approved and quantum of share of SUGEN power for Ahmedabad is 25% and 50% is of Surat area of 1147.5 MW installed capacity which is 286 MW for Ahmedabad and 573 MW for Surat. SUGEN power is costly power. The allocation of power purchase cost of Ahmedabad and Surat is not justified because it should be scheduled only as per the approved PPA for Ahmedabad and Surat. The Ahmedabad consumers should not bear the brunt of excess power purchase cost of Sugen when its share is only 25%. TPL has not submitted a certificate from SLDC for verification of power scheduled for Ahmedabad and for Surat from Sugen. The Commission is requested to call for the details to prevent Ahmedabad consumers from subsidizing Surat consumers for SUGEN power procurement cost.

Response of TPL

It has submitted that the apprehension of the Objector is misplaced. The Commission approves the total power purchase cost for Ahmedabad/ Gandhinagar and Surat Supply Areas collectively. The aforesaid power purchase cost is then allocated between both the areas based on their actual energy requirement for the year. Thus, the question of one area subsidising another does not arise. The collective power purchase helps to reduce the overall cost including reduction of risk due to diversification of sources. It does not result in any extra recovery to TPL-D.

Commission's View

For the MYT control period 2011-16, in order to get benefit of diversity of firm power and to optimise total cost of power purchase, Commission has considered



combined power procurement for Ahmedabad and Surat licensee area and the same practice is continued for the current MYT period 2016-21.

3.17 Non-approval of Final PPA for SUGEN

The Objector has submitted that the Power Purchase Agreement has been approved conditionally by the Commission vide Order dated 23.12.20015 in Petitions No. 813 and 814 of 2004. These PPAs were given provisional approval subject to submission of Fuel Supply Agreement and subject to adoption of tariff by the Commission to be determined by Central Electricity Regulatory Commission under Section 79 (1) (b) read with Section 62 (1) (a) of E.A.2003 SUGEN being Inter-State generating power plant. As stated at page No. 28 and 29 concluding para of the Order dated 23.12.2005, the Commission has not accorded the final approval of the PPAs in question.

Hence, the recovery of fixed cost under legal force of approval of these PPAs vide Order dated 23.12.2005 is totally null and void. The approval for power procurement from SUGEN power plant itself is contrary to the Commission's own order and the power procurement cost of SUGEN is required not to be permitted for truing up. The fixed cost recovered for SUGEN is required to be refunded with bank interest.

Response of TPL

It has submitted that that the Commission has approved the PPAs vide order dated 23.12.2005 in Petition No. 813 & 814 of 2004. While granting approval, the Commission had observed that the tariff of SUGEN, being an Inter-State Generating Station, was to be determined by the Central Electricity Regulatory Commission (CERC). Upon approval by the CERC, same was to be adopted by the Commission. Meanwhile, the Commission issued the Regulatory Framework for the first MYT Control Period (FY 2008-09 to FY 2010-11). In turn, TPL furnished all the details of SUGEN tariff as part of its MYT Petition and sought comments/ suggestions from all the Stakeholders. Based on the same, the Commission granted approval in its MYT Tariff order and allowed the recovery of cost of power purchase of SUGEN from the consumers upon commissioning of SUGEN. Thus, the contention of purchase of power from SUGEN without approval is baseless and incorrect.



Commission's View

Commission consistently considered the arrangement of supply of power from SUGEN to TPL distribution business since commissioning of SUGEN plant. In past, the Commission had on representation from some of the stakeholders, advised TPL to explore the possibilities of increasing the allocated capacity from SUGEN to its distribution business to take benefits of lower cost of generation.

3.18 Sharing of Gains/ (Losses) arising out of variations in price of fuel and power purchase

The Objector has submitted that the Regulation 10.2 of the MYT Regulations, 2007 and Regulation 24.3 of the MYT Regulations, 2011 does not permit TPL to share any gain or loss arising out of variations in the price of fuel and power purchase, which shall be dealt with as specified by the Commission from time to time. Therefore, all the tariff orders in which truing up is carried out to arrive at either revenue gap/surplus and are passed under the above MYT Regulations, 2007 and 2011 from FY 2008-09 to FY 2016-17, and in which the sharing of gain/loss is considered is totally invalid, unjust and against the GERC's own MYT Regulations, 2007 and 2011. The truing up of FY 2016-17 as proposed in the current petitions is required to be carried out under the MYT Regulations, 2011.

It is a fact that the variation in price of fuel and power purchase is immediately recovered by TPL under the FPPPA determined by the Commission in view of the direction of Hon'ble Appellate Tribunal for Electricity in Order OP 1 of 2011 dated 11.11.2011 that variation in the price of fuel and power purchase should be recovered immediately from the embedded contemporary consumers of the licensee so that future consumers who are added can be protected from paying past dues on account of the variation of price for fuel and power purchase. Here in this case, it is carried forward and those consumers who have not consumed that energy are forced to pay the unwarranted past charges. The motive of introduction, adoption and implementation of the Multi Year Tariff system is the sole base of this solution.

It has come to know after careful perusal of the tariff orders of various Government Utilities as well as private, in the truing up, the revenue gap/surplus on account of variation in price of fuel and power purchase is also allowed as pass through resulting into very heavy revenue gap which is not fair and valid in view of the facts that the same difference is allowed to be recovered under the FPPPA



formula approved by the Commission. Even Regulation 10.2 and Regulation 24.3 of the MYT Regulations, 2007 and 2011 respectively do not permit the Commission to allow the recovery of variation in price of fuel and power purchase. This tantamounts to double recovery of FPPPA amount which is illegal and not valid.

The objector has requested the Commission that before determining the ARR for FY 2018-19 and before approval of truing up of accounts of FY 2016-17, the revenue gap arrived in the truing of accounts of earlier years in which the variation in price of fuel and power purchase is carried forward is required to be reviewed by Suo Motu proceedings to arrive at the correct revenue gap/surplus as specified in the MYT Regulations, 2007 and 2011.

Response of TPL

It has submitted that the ARR and revenue gap has been arrived at as per the provisions of the GERC (MYT) Regulations, 2016. The sharing of Gains/(Losses) due to variation in Power purchase cost, O&M expenses etc. are calculated in accordance with the provisions of the GERC (MYT) Regulations, 2016. Regarding issue of suo motu, the Petitioner submitted that the Tariff orders pertaining to past control periods have attained finality. Hence, the issue is no longer res integra.

It has further submitted that the present tariff proceedings have been adopted in accordance with the Statutory Regulations. All the filings, details and information have been already undertaken in accordance with the Regulations.

Commission's View

Regulation 23.3 of the GERC (MYT) Regulations provide that- Nothing contained in Regulations related to mechanism for pass through of gains or losses on account of uncontrollable factors shall apply in respect of any gain or loss arising out of variations in the price of fuel and power purchase, which shall be dealt with as specified by the Commission from time to time.

The Commission has consistently considered the gain or loss arising out of variation in the fuel and price of power purchase and its recovery during truing up exercise only and treated the same as uncontrollable.



4 Truing up for FY 2016-17

4.1 Introduction

This Chapter deals with the truing up of FY 2016-17 for TPL-G Ahmadabad Power Plant (APP).

The Commission has studied and analysed each component of the ARR for the FY 2016-17 in the following paragraphs.

4.2 Generating Stations of TPL-G (APP)

TPL has existing power generation facilities with total installed capacity of 422 MW at Ahmadabad [TPL-G (APP)] that consist of 4 units viz. C-Station (60 MW), D-Station (120 MW), E-Station (121 MW) and F-Station (121 MW) - coal based thermal power plant at Sabarmati. TPL had also commissioned a combined cycle power plant (CCPP) of 1147.5 MW (SUGEN) at Akhakhol village near Surat in FY 2009-10. For its distribution business, TPL sources power from its own generation facilities in Ahmadabad, SUGEN (to the extent of 835 MW) and balance from other sources.

The Commission is required to determine the generation cost for the TPL-G (APP) stations only as SUGEN plant being inter-state generating station, falls within the jurisdiction of CERC. The generation costs of these stations are discussed as below:

The details of the stations existing as on 1stApril 2016 along with their capacities and dates of commission are given in the table below:

Table4.1: Capacity, COD and age of TPL-G (APP) Stations as on 1st April 2016

Name of Station	Capacity in MW	Year of COD	Age /Years			
Sabarmati Thermal Power Plant (Coal based)						
C Station	60(2*30MW)	1961/1997* *(Year of turbine retrofitting)	57			
D Station	120	1978/2004* *(Uprating capacity)	39			
E Station	121	1984	33			
F Station	121	1988	29			



4.2.1 Operational Performance Parameters

The fuel cost of a generation station depends on (i) the performance parameters, such as Plant Load Factor (PLF), Station Heat Rate (SHR), Auxiliary Consumption, Secondary Fuel Oil Consumption and Transit Loss and cost parameters such as Gross Calorific Value of fuel, type of fuel and price of fuel etc.

TPL has submitted the actual operational performance on Plant Availability Factor (PAF), Plant Load Factor (PLF), Station Heat Rate (SHR), Auxiliary Consumption and Specific Oil Consumption and coal transit loss for FY 2016-17 for individual stations. The Commission has taken up the truing up of the annual performance parameters for FY 2016-17, are discussed in the following sections.

4.2.2 Plant Availability Factor (PAF)

Petitioner's submission

TPL has submitted that the actual plant availability factor for its four stations for FY 2016-17 has been computed considering planned shutdown and the forced outages of the units during the year. The PAF approved in the MYT Order dated 9thJune, 2017 and the actual as furnished by TPL in the present petition for FY 2016-17 are given in the Table below:

Approved for FY 2016-17 in SI No. Station Actual for FY 2016-17 the MYT Order 1 C Station 97.26% 99.73% 2 D Station 91.84% 92.78% 3 E Station 95.28% 94.46% F Station 95.71% 95.75%

Table 4.2: Plant Availability Factor of TPL-G (APP) for FY 2016-17

TPL has submitted that at the time of filing the MYT petition, the estimated availability of the units was based on the annual planned maintenance schedule. The variation in plant availability at all the units is marginal.

The reason for variation in actual and approved availability for the C generating station is on account of lower planned outage which has resulted in higher availability. For D & E stations, variation in availability is due to the actual forced outages during FY 2016-17.

Commission's Analysis

It is found in the analysis that the PAF level is higher than the approved levels of the MYT



Order dated 9th June, 2017 for C, D and F stations. It may be mentioned that, according to Regulation 53.1 of GERC (MYT) Regulations, 2016, Normative Annual Plant Availability Factor for full recovery of annual fixed charges shall be 85% for all thermal generating stations. Since the actual PAF for all the stations of TPL, has been more than 85%, they are eligible for full recovery of fixed charges, as per the GERC (MYT) Regulations, 2016.

The Commission considers the Plant Availability Factor for various stations, as in the MYT Order dated 9th June, 2017, for FY 2016-17, for truing up purpose, since this is a controllable parameter.

Hence, for truing up for FY 2016-17, the PAF considered is as given in the Table below:

Table 4.3: Plant Availability Factor of TPL-G (APP) approved for truing up for FY 2016-17

SI No.	Station	Approved for FY 2016- 17 in the MYT Order	Actual for FY 2016-17	Considered for truing up for FY 2016-17
1	C Station	97.26%	99.73%	97.26%
2	D Station	91.84%	92.78%	91.84%
3	E Station	95.28%	94.46%	95.28%
4	F Station	95.71%	95.75%	95.71%

4.2.3 Plant Load Factor (PLF)

Petitioner's submission

TPL has submitted the actual plant load factor (PLF) of different stations for FY 2016-17. The PLF approved in the MYT Order dated 9thJune, 2017 and the actual as furnished by TPL in the present petition for FY 2016-17 are given in the Table below:

Table 4.4: Plant Load Factor of TPL-G (APP) for FY 2016-17

SI No.	Station	Approved for FY 2016-17 in the MYT Order	Actual for FY 2016-17
1	C Station		
2	D Station	82.58%	84.38%
3	E Station	86.44%	86.83%
4	F Station	87.76%	89.78%

TPL has submitted that the actual PLF is higher than the approved PLF due to variation in the demand. Further, C station was operated under reserved shutdown during the year. TPL has also submitted that PLF is dependent on actual system demand which in turn depends upon the drawl by the consumers of the licensee which is beyond the control of the Petitioner.



Commission's Analysis

It is found in the analysis that the PLF level is higher than the approved levels of the MYT Order dated 9th June, 2017 for all stations of TPL-G.

C Station of TPL was not operated during FY 2016-17 due to reserved shut down, therefore PLF of C Station has been zero % during FY 2016-17.

The Commission considers the Plant Load Factor for various stations at actual for FY 2016-17, for truing up purposes, as it is an uncontrollable parameter.

Table 4.5: Plant Load Factor of TPL-G (APP) approved for truing up for FY 2016-17

SI No.	Station	Station Approved for 2016-17 Actual for 20 in the MYT Order 17		Approved for truing up
1	C Station		1	
2	D Station	82.58%	84.38%	84.38%
3	E Station	86.44%	86.83%	86.83%
4	F Station	87.76%	89.78%	89.78%

4.2.4 Auxiliary consumption

Petitioner's submission

TPL has submitted the actual auxiliary consumption of different stations for FY 2016-17. The auxiliary consumption approved in the MYT Order dated 9thJune, 2017 and the actual as furnished in the present petition for FY 2016-17 are given in the Table below:

Table 4.6: Auxiliary consumption of TPL-G (APP) for FY 2016-17

SI No.	Station	Approved for 2016-17 in the MYT Order	Actual for 2016-17
1	C Station	0.00%	0.00%
2	D Station	9.00%	8.77%
3	E Station	9.00%	8.28%
4	F Station	9.00%	8.83%

TPL has submitted that it has made continuous efforts to maintain the auxiliary consumption at approved levels. In turn, the actual auxiliary consumption was lower than the approved value due to variation in demand.

TPL has also submitted that in the present petition for the purpose of quantification of gains/loss, the Petitioner has considered the entire variation in Auxiliary consumption as controllable parameter.



Commission's Analysis

It is noted that, for all stations of TPL (G), the actual Auxiliary Consumption is lower than what is approved in the MYT Order.

The Commission approves the auxiliary consumption for various stations, as approved in the MYT Order dated 9th June, 2017 for FY 2016-17, for truing up purpose, as it is a controllable parameter as given in the Table below:

Table 4.7: Auxiliary consumption of TPL-G (APP) approved for truing up for FY 2016-17

SI. No.	Station	Approved for FY 2016- 17 in the MYT Order	Actual for FY 2016-17	Approved for FY 2016-17 for truing up
1	C Station			
2	D Station	9.00%	8.77%	9.00%
3	E Station	9.00%	8.28%	9.00%
4	F Station	9.00%	8.83%	9.00%

4.2.5 Station Heat Rate (SHR)

Petitioner's submission

TPL has submitted the Station Heat Rate (SHR) of different stations for FY 2016-17. The SHR approved in the MYT Order dated 9thJune, 2017 and the actual as furnished in the present petition for FY 2016-17 are given in the Table below:

Table 4.8: Station Heat Rate of TPL-G (APP) claimed for FY 2016-17

(Kcal/kWh)

SI No.	Station	Approved for 2016-17 in the MYT Order	Actual for 2016-17
1	C Station	3136	
2	D Station	2450	2455
3	E Station	2455	2475
4	F Station	2455	2464

TPL submitted that it is making all efforts to improve and maintain the SHR at the approved level. The variation in SHR is a controllable parameter within the operating range of PLF and the variation in fuel consumption on account of this should be considered for sharing of gains/losses.

Commission's Analysis

The SHR achieved is beyond the approved levels for all stations.

For the purpose of True-up for FY 2016-17, the Commission approves the SHR as given in the



Table below:

Table 4.9: Station Heat Rate approved by Commission for TPL-G (APP) in FY 2016-17

(Kcal/kWh)

SI No.	Station	Approved for 2016-17 in the MYT Order	Actual for 2016- 17	Approved for 2016-17 for truing up
1	C Station	3136	-	
2	D Station	2450	2455	2450
3	E Station	2455	2475	2455
4	F Station	2455	2464	2455

4.2.6 Secondary Fuel Oil Consumption (SFC)

Petitioner's submission

TPL has submitted the Secondary Fuel Oil Consumption (SFC) of different stations for FY 2016-17. The SFC approved in the MYT Order dated 9thJune, 2017 and the actual as furnished in the present petition for FY 2016-17 are given in the Table below:

Table 4.10: Secondary Fuel Oil Consumption of TPL-G (APP) for FY 2016-17

(ml/kWh)

SI No.	Station	Approved for 2016-17 in the MYT Order	Actual for 2016-17
1	C Station	2.00	0.00
2	D Station	1.00	0.56
3	E Station	1.00	0.31
4	F Station	1.00	0.25

The Petitioner submitted that during FY 2016-17, TPL-G (APP) achieved the lower SFC due to lower forced outages for all the plants. TPL further submitted that for future years, the SFC may increase from the current levels due to the vintage of the plant & equipment and change in loading pattern of the plant.

Commission's Analysis

The actual Secondary Fuel Oil Consumption (SFC), for all the stations is within the approved values.

Since the SFC is a controllable performance parameter, the Commission approves, for truing up purpose, the SFC values, as mentioned in the MYT Order dated 9th June, 2017 for FY 2016-17.

Accordingly, the SFC approved for FY 2016-17, for truing up purpose, is given in the Table



below:

Table 4.11: Secondary Fuel Oil Consumption approved for truing up for FY 2016-17

(MI/kWh)

SI No.	Station	Approved for FY 2016- 17 in the MYT Order	Actual for FY 2016-17	Approved for FY 2016-17 for truing up
1	C Station	2.00	0.00	0.00
2	D Station	1.00	0.56	1.00
3	E Station	1.00	0.31	1.00
4	F Station	1.00	0.25	1.00

4.2.7 Transit Loss

Petitioner's submission

The Petitioner submitted that against the 0.80% transit loss approved by the Commission for FY 2016-17 it has achieved the actual transit loss of (-) 0.20%.

The Petitioner submitted that it has been making continuous efforts to contain the Transit Losses. However, there are various uncontrollable factors such as issue of accuracy of weighbridge at loading end, moisture loss, windage and slippage losses due to which transit loss exists. During FY 2016-17, accuracy of weighbridge at loading end at different coal sidings has resulted into a positive contribution due to which transit loss is (-) 0.20%.

The Petitioner submitted that it has considered the transit loss as controllable parameter in its calculation as per MYT Regulations.

Table 4.12: Transit Loss of TPL-G (APP) for FY 2016-17

Stations	Approved for FY 2016-17 in the MYT Order	Actual for FY 2016-17
All coal based stations	0.80%	(-) 0.20%

Commission's Analysis

The Commission has noted the submission of the Petitioner regarding the transit loss of (-)0.20%. The Commission has considered the normative transit losses for truing up for FY 2016-17 as per the GERC (MYT) Regulations, 2016, as given in the Table below:



Table 4.13: Transit loss approved for truing up for FY 2016-17

Stations	Approved for FY 2016-17 in the MYT Order	Actual for FY 2016- 17	Approved for FY 2016-17 for truing up
All coal based Stations	0.80%	(-) 0.20%	0.80%

4.2.8 Summary of performance parameters approved for truing up of FY 2016-17

Based on the analysis in the preceding paragraphs, the performance parameters approved for different power generation stations of TPL-G (APP) for FY 2016-17, for truing up purpose are listed in the Table below:

Table 4.14: Performance parameters for TPL-G (APP) stations approved for truing up for the FY 2016-17

SI No.	Station	PAF	PLF	Aux. Consumpt ion	Station Heat Rate Kcal/kWh (on GCV basis	Secondary fuel oil consumptio n (gm/kWh)	Transi t loss of coal
1	C Station	97.26%		-	-		
2	D Station	91.84%	84.38%	9.00%	2450	1.00	0.80%
3	E Station	95.28%	86.83%	9.00%	2455	1.00	0.80%
4	F Station	95.71%	89.78%	9.00%	2455	1.00	0.80%

4.3 Gross and Net generation

The gross and net generation of power in different stations, as per actuals submitted by TPL and as approved for truing up purpose for the FY 2016-17 are given in the Table below:

Table 4.15: The gross and net generation of power for truing up for FY 2016-17

		As per actuals submitted by TPL				nission			
SI No.	Stations	Gross generat ion (MU)	Aux consu mptio n (%)	Aux consum ption (MU)	Net generat ion (MU)	Gross generat ion (MU)	Aux consu mption (%)	Aux consu mption (MU)	Net generati on(MU)
1	C Station	-		0.73	(0.73)	-	-	0.73	(0.73)
2	D Station	886.99	8.77%	77.77	809.22	886.99	9.00%	79.83	807.16
3	E Station	920.41	8.28%	76.18	844.23	920.41	9.00%	82.84	837.57
4	F Station	951.68	8.83%	84.04	867.63	951.68	9.00%	85.65	866.03
	Total	2759.08		238.72	2520.35	2759.08		249.05	2510.03



4.4 Cost Parameters

The cost parameters include GCV of fuel, mix of fuel and price of fuel. The Sabarmati C, D, E & F Stations of TPL-G (APP) run on coal as the primary fuel. A mix of indigenous and imported coal is used in these stations.

TPL submitted the details of actual Wt. Av. GCV of mix of coal and Wt. Av price of fuel for different stations, as discussed below for FY 2016-17.

4.4.1 Mix of Coal

TPL has furnished the details of actual percentages of the mix of indigenous and imported coal in its coal based power stations during the FY 2016-17, as given in the Table below:

Table 4.16: The mix of different types of coal for FY 2016-17

SI No.	Stations	Indigenous coal (%)	Imported coal (%)
1	C Station		1
2	D Station	67%	33%
3	E Station	74%	26%
4	F Station	79%	21%

4.4.2 Wt. Av. Gross Calorific Value (GCV) of fuel

TPL has furnished the actual Wt. Av. Calorific Value of fuels for all the stations put together for FY 2016-17, as given in the Table below:

Table 4.17 : Actual Wt. Av. Gross Calorific value (GCV) of Different Fuels for Coal- based Stations for FY 2016-17

Particulars	Calorific Value
Wt. Av. GCV of Indigenous Coal (kcal / kg)	4,075
Wt. Av. GCV of Imported Coal (kcal / kg)	4,852
Wt. Av. GCV of Secondary Fuel Oil (kcal / L)	9,998

4.4.3 Wt. Av. Prices of Fuel

TPL has furnished the actual Wt. Av. Price per unit of different fuels for all the stations put together for FY 2016-17, as given in the Table below:



Table 4.18: Wt. Av. Price / unit of fuels for FY 2016-17 (Actual)

SI. No.	Station	Wt. Av. cost of Indigenous coal (Rs/MT)	Wt. Av. cost of Imported coal (Rs/MT)	Wt. Av. cost of Secondary Fuel Oil (Rs/KI)
1	All the coal stations	5,104.41	5,751.36	31,855.67

TPL has furnished the actual Wt. Av. cost / MT of different fuels for different stations for FY 2016-17, as given in the Table below:

Table 4.19: Av. Price / Unit of Fuels for FY 2016-17 (Actual) for Different Stations

SI. No.	Station	Av. Price of Indigenous coal (Rs./MT)	Av. Price of Imported coal (Rs./MT)	Av. Price of Secondary oil (Rs./kL)
1	C Station			
2	D Station	5079	5664	31657
3	E Station	5088	5719	32105
4	F Station	5074	5721	31977

Commission's Analysis

The Commission, after due validation, approves the Wt. Av. GCV of fuels, percentage mix of coal and prices of fuels (actual), as furnished by TPL for individual stations and considered for truing up purpose for FY 2016-17, as these are uncontrollable items.

4.5 Fuel Costs

Based on the performance and cost parameters, the normative fuel costs for each of the stations, along with actual furnished by TPL, are as given in the Table below:

Table 4.20: Fuel Cost of TPL-G (APP) for truing up for FY 2016-17

		As pe	r actual s	ubmitted	by TPL	As approved by the Commission			
SI N o.	Stations	Gross genera tion (MU)	Net Gen (MUs)	Fuel cost (Rs. Crore)	Fuel cost per unit net (Rs./kW h)	Gross genera tion (MU)	Net Gen (MUs)	Fuel cost (Rs. Crore	Fuel cost per unit net (Rs./k Wh)
1	C Station	0.00	(0.73)	0.00	0.00	0.00	(0.73)	0.00	0.00
2	D Station	886.99	809.22	267.98	3.31	886.99	807.16	269.89	3.34
3	E Station	920.41	844.23	281.48	3.33	920.41	837.57	282.54	3.37



		As per actual submitted by TPL			As approved by the Commission				
SI N o.	Stations	Gross genera tion (MU)	Net Gen (MUs)	Fuel cost (Rs. Crore)	Fuel cost per unit net (Rs./kW h)	Gross genera tion (MU)	Net Gen (MUs)	Fuel cost (Rs. Crore	Fuel cost per unit net (Rs./k Wh)
4	F Station	951.68	867.63	289.50	3.34	951.68	866.03	292.13	3.37
	Total	2759.08	2520.35	838.97		2759.08	2510.03	844.55	

Detailed computation of the fuel cost for each of the stations (Except C station) has been given in Annexure 1 to 3 at the end of this Chapter.

4.5.1 Variation between actual costs and approved costs

The Commission has computed the normative fuel cost for the purpose of computing the gains/losses, due to the controllable factors.

The actual fuel costs of all the stations of TPL are almost equal to the normative costs.

The Commission has verified the actual fuel cost submitted by TPL with the annual accounts and observed that the fuel cost as per annual accounts is Rs. 845.60 Crore, whereas the actual fuel cost as submitted by TPL in the Petition is Rs. 838.97 Crore. With regard to difference between the aforesaid figures the Petitioner submitted that the opening stock, as on 1st April, 2017; of Indigenous coal is updated by 11948 MT amounting to Rs. 6.15 Crore with respect to inventory written off based on differences between book and physically determined inventories. This write off of Rs. 6.15 Crore along with the provision of Rs. 0.48 Crore for FY 2016-17 is not considered in the fuel cost of Rs. 838.97 Crore. Accordingly, the petitioner has claimed the fuel of cost of Rs. 838.97 Crore in this true up petition for FY 2016-17.

The comparison between the fuel costs of all stations put together, as claimed in the petition for FY 2016-17 and the cost approved for truing up purpose is given in the Table below:

Table4.21: Fuel Cost Approved for truing up for FY 2016-17

(Rs. Crore)

Particulars	As per actual (Claimed)	Approved for 2016-17
Total Fuel Cost	838.97	844.55



4.5.2 Gains and losses in fuel costs due to controllable factors

TPL has arrived at the fuel expenses incurred for FY 2016-17, on the basis of the actual operational parameters, such as station heat rate (SHR), auxiliary consumption, specific fuel oil consumption (SFC) and transit loss of coal. The Commission has compared the fuel expenses, so derived by TPL with the fuel expenses, on the basis of the approved operational performance parameters for actual net generation for computation of gains / losses on account of variation in these parameters and approves the gains / losses station-wise, as given in the Table below:

Table 4.22: Approved Gains / (Losses) from Fuel Expenses (due to Controllable Factors) for FY 2016-17

(Rs. Crore)

SI. No.	Station	Fuel cost arrived at with approved parameters for actual net generation for 2016-17*	Actual fuel cost at actual parameters for 2016-17	Gains / (Losses) due to controllable factors
1	C Station	0.00	0.00	0.00
2	D Station	270.57	267.98	2.59
3	E Station	284.79	281.48	3.30
4	F Station	292.67	289.50	3.17
	Total	848.03	838.97	9.06

*Note: Detailed computation of the fuel cost for each of the stations, with approved parameters for actual net generation, has been given in Annexure 1 to 3 at the end of this Chapter.

4.5.3 Gains and losses in fuel costs due to uncontrollable factors

The Commission has computed the fuel expenses, so derived by considering the fuel costs as approved in the MYT Order dated 9th June, 2017 vis-à-vis the fuel costs as per actuals, on the basis of the approved operational performance parameters such as station heat rate (SHR), auxiliary consumption, specific fuel oil consumption (SFC) and transit loss of coal for actual net generation for computation of gains / losses on account of variation in the fuel costs and approves the gains / losses station-wise, which is uncontrollable, as given in the Table below:

Table 4.23: Approved Gains / (Losses) from Fuel Expenses (due to Uncontrollable Factors) for FY 2016-17

(Rs. Crore)

SI. No.	Station	Fuel cost approved in the MYT Order for 2016-17	Actual fuel cost approved with approved parameters for 2016-17	Gains / (Losses) due to uncontrollable factors
1	C Station			



SI. No.	Station	Fuel cost approved in the MYT Order for 2016-17	Actual fuel cost approved with approved parameters for 2016-17	Gains / (Losses) due to uncontrollable factors
2	D Station	259.38	270.57	(11.19)
3	E Station	274.33	284.79	(10.46)
4	F Station	278.50	292.67	(14.17)
	Total	812.21	848.03	(35.82)

4.6 Fixed Charges

4.6.1 Operation and Maintenance (O&M) expenses

TPL has claimed Rs. 135.87 Crore as O&M expenses as against Rs. 157.78 Crore of composite O&M expenses approved for FY 2016-17 in the MYT Order dated 9th June, 2017.

Table 4.24:O&M Expenses of TPL-G (APP) Claimed for FY 2016-17

(Rs Crore)

All figures in Rs. Crore	MYT Order	Actual	
Operations and Maintenance Expenses	157.78	135.87	

Petitioner's Submission

The Petitioner submitted that the O&M expenses of TPL- G (APP) are lower than the approved.

The Petitioner submitted that for O&M expenses, the variation should be considered as controllable except due to changes in law and the factors beyond the control. In the present petition, the Petitioner has considered the entire O&M expenses as controllable.

Commission's Analysis

TPL has submitted the actual O&M expenses at Rs. 135.87 Crore inclusive of Remeasurement of the defined benefit plan of Rs. 2.01 Crore in the truing up for FY 2016-17.

The actual O&M cost as per the annual accounts includes donations of Rs 2.24 Crore, water charges of Rs.14.13 Crore, insurance claim receipt of Rs 8.97 Crore which have been deducted to arrive at the O&M expense claimed in the petition.



The Commission has ensured Employee Cost and A&G Cost components which were allocated to capital works, repair and other relevant revenue accounts are deducted from the claimed O&M expense.

It is observed that the Petitioner has deducted the insurance claim receipt of Rs. 8.97 Crore as per past practices. However, insurance claim receipt being part of non-tariff income should not be deducted from O&M expenses and therefore the Commission has increased the O&M expenses to the extent of Rs. 8.97 Crore.

On a query from the Commission regarding the Remeasurement of Defined Benefit Plans of Rs. 2.01 Crore, TPL vide e-mail dated 3rd February, 2018 has submitted that Remeasurement of Defined Benefit Plans is a presentation of Salary cost/ terminal liability as per newly implemented Ind AS. TPL has further submitted that Remeasurement of Defined Benefit Plans of Rs. 2.01 Crore under employee expenses is a part of Gratuity liability which represents actuarial (gain)/ loss for the period as per Actuarial Valuation Report as on 31.03.2017. The increase in Gratuity liability including Remeasurement of Defined Benefit Plans is paid to Gratuity Fund with LIC and thus, expenses are actually incurred and paid.

Further, TPL vide email dated 3rd February, 2018 has submitted that depreciation on leasehold land of Rs. 0.17 Crore has been grouped with A&G expenses, whereas the same has also been claimed in Form 5 under depreciation head. Therefore, the Commission has deducted Rs. 0.17 Crore from the A&G Expenses.

A&G Expenses also include Rs. 0.24 Crore being the provision towards Lease Rent. Since the issue of Lease Rent is still under discussion with State Govt. and has not attained finality, the Commission has decided to exclude the same.

The Commission, accordingly, approves the O&M expenses at Rs. 144.66 Crore after addition of insurance claim receipt of Rs. 8.97 Crore and deduction of Rs. 0.17 Crore pertaining to depreciation on leasehold land of Rs. 0.17 Crore and Rs. 0.24 Crore towards provision of Lease Rent, as per the annual accounts for truing up of FY 2016-17.

Accordingly, Gain/(Losses) on account of O&M expenses in truing up of FY 2016-17 is approved by the Commission as given in the Table below:



Table 4.25: O&M Expenses and Gains / (Losses) Approved in truing up for FY 2016-17

(Rs. Crore)

Particulars	Approved for FY 2016-17 in MYT Order	Approved in truing up for FY 2016-17	Deviation +(-)	Gains / (Losses) due to Controllable factor	Gains / (Losses) due to uncontrollable factor
O & M Expenses	157.78	144.66	13.12	13.12	

4.7 Water Charges

TPL has claimed Rs. 14.13 Crore towards actual water charges in the truing up for FY 2016-17, as against Rs. 10.96 Crore approved in the MYT Order dated 9th June, 2017.

The existing Regulation provides that water charges are to be allowed as per actual. The details are given in the Table below:

Table 4.26: Water Charges Claimed in the truing up by TPL-G APP for FY 2016-17

(Rs. Crore)

SI .No.	Particulars Approved for FY 2016-17 in MYT Order		Actual claimed in truing up for FY 2016-17	
1	Water Charges	10.96	14.13	

Commission's Analysis

The Commission verified the water charges from the annual accounts and approves the water charges at Rs. 14.13 Crore in the truing up.

The deviation is considered as uncontrollable and the gains and losses are considered, as detailed below:

Table 4.27: Gains / (Losses) Approved for Water Charges in the truing up for FY 2016-17 (Rs. Crore)

SI. No.	Particulars	Approved for 2016- 17 in MYT Order	Approved for truing up for 2016-17	Deviation + (-)	Gains / (Losses) due to uncontrollable factor
1	Water Charges	10.96	14.13	(3.17)	(3.17)

4.8 Capital expenditure, Capitalisation and Sources of Funding

TPL has claimed Rs. 17.55 Crore towards actual capital expenditure in the truing up for FY



2016-17, as against Rs. 55.24 Crore approved in the MYT Order for FY 2016-17.

Table 4.28: Capital Expenditure Claimed by TPL-G (APP) For FY 2016-17

(Rs. Crore)

SI. No.	Particulars	Approved for 2016-17 in MYT Order	Actual
1	Refurbishment of D,E and F station	0.52	0.18
2	Shifting of services from C station	3.00	0.00
3	Boiler Works	14.85	2.65
4	Turbine Works	8.47	2.45
5	Electrical Works	9.00	3.91
6	C&I Works	4.54	2.12
7	CHP Works	2.13	0.64
8	Civil Works	6.31	1.53
9	Others	5.19	3.21
10	Misc.	1.22	0.85
	Total	55.24	17.55

Petitioner's Submission

The main reasons for variation in the capital expenditure against the approved items are described below:

- a) Refurbishment of D, E and F station For FY 2016-17, the expenditure towards refurbishment work of D, E & F station was estimated in MYT petition to the tune of Rs. 0.52 Crore. Actual expenditure incurred was Rs.0.18 Crore towards refurbishment work of Deaerator Structure along with refurbishment work at PRDS floors of D & E stations. Balance work will be carried out during FY 2017-18 based on availability of shutdown.
- **b)** Shifting of services from C station— Since C station is being operated in reserve shutdown mode, it was proposed to shift some of the critical services from C station. It is now proposed to carry out the shifting work during FY 2017-18.
- c) Normal Capital Expenditure TPL G (APP) incurred the expenditure of Rs. 16.52 Crore against approval of Rs. 50.49 Crore. The major variation is on account of the following:
 - Boiler Works- Deferment of projects pertaining to refurbishment of Dry and Wet ash handling system and repairing & replacement of boiler component of DEF station due to unavailability of shutdown.
 - Turbine Works Deferment of expenditure towards procurement of turbine generator critical spares from OEM due to higher lead time.



Carry forward of replacement work due to technological change of E station cooling tower internals.

- Electrical Works- Lower than anticipated expenditure incurred towards DM plant motor control cubicle, numeric relays & Variable Frequency Drive and battery work.
 Further, project for cable replacement was deferred due to higher lead time.
- C&I Works- Deferment of expenditure towards UPS system and replacement of float type level switches at D Station due to delay in receipt of material. Major expenditure has been incurred towards Upgradation of Alstom DCS software at D station.
- CHP Works -Expenditure incurred towards the critical CHP components and spares
 of equipment of coal handling plant.
- **Civil Works** -Deferment of expenditure towards ash silo work, work related to internal roads and development of diesel garage due to unavailability of shutdown.
- Others Major expenditure has been incurred towards new Bore well and network provision. Balance expenditure including that for new bore well / French well pump set to phase out old pump set is proposed to be incurred during FY 2017-18.
- **d) Misc. Capital Expenditure –** TPL G (APP) incurred the expenditure of Rs. 0.85 Crore against approval of Rs. 1.22 Crore. The majority of the expenditure has been incurred towards procurement of Road sweeping machine, Computerized Attendance cum Access System, Medical Equipment for OHU & Ambulance, and SAP.

Commission's Analysis

TPL has claimed a capital expenditure of Rs. 17.55 Crore and capitalisation of Rs. 18.01 Crore against the capital expenditure of Rs. 55.24 Crore approved in MYT Order for FY 2016-17.

TPL has submitted the quantum of debt and equity, as detailed in the Table below:

Table 4.29: Capitalisation and Sources of Funding Claimed in truing up for FY 2016-17

(Rs. Crore)

All figures in Rs. Crore		Actual submitted by Petitioner
Opening GFA	(a)	1,137.92
Addition to GFA	(b)	18.01
Deletion to GFA	(c)	6.73
Closing GFA	(d)=(a)+(b)-(c)	1,149.20
Capitalization considered for Debt and Equity	(e)=(b)-(c)	11.28
Normative Debt @ 70%	(f)=(e)*70%	7.90
Normative Equity @ 30%	(g)=(e)*30%	3.38



The Commission observed that the actual capital expenditure incurred was much lesser than the capital expenditure approved in the MYT Order for FY 2016-17. The capitalisation, as verified from the annual accounts is Rs. 18.01 Crore. TPL has decapitalised the asset to the extent of Rs. 6.73 Crore during FY 2016-17. Further, TPL has reduced the capitalisation during the year by the amount of deletion of fixed assets to work out net capitalisation for debt and equity component as provided in Regulation 33 of the GERC, (MYT) Regulation, 2016.

The Commission approves the capitalisation and sources of funding, as shown in the Table below in the truing up for FY 2016-17.

Table 4.30: Approved Capitalisation and Sources of Funding in truing up for FY 2016-17 (Rs. Crore)

All figures in Rs. Crore		Approved in Truing up for FY 2016-17
Opening GFA	(a)	1137.92
Addition to GFA	(b)	18.01
Deletion to GFA	(c)	6.73
Closing GFA	(d)=(a)+(b)-(c)	1149.20
Capitalization considered for Debt and Equity	(e)=(b)-(c)	11.28
Normative Debt @ 70%	(f)=(e)*70%	7.90
Normative Equity @ 30%	(g)=(e)*30%	3.38

4.8.1 Interest expenses

TPL has claimed a sum of Rs. 10.94 Crore towards actual interest expenses in the truing up for FY 2016-17, as against Rs. 12.01 Crore approved in the MYT Order for FY 2016-17, as detailed in the Table below:

Table 4.31: Total Interest Expenses Claimed in truing up for TPL-G (APP) for FY 2016-17

(Rs. Crore)

SI .No.	Particulars	Approved for FY 2016-17 in MYT Order	Actual claimed in truing up for FY 2016- 17
1	Interest Expenses	12.01	10.94

Petitioner's Submission

TPL has submitted that the GERC (MYT) Regulations, 2016 provide for the calculation of interest expenses on normative basis by considering the amount of depreciation of assets as



the amount of repayment.

The Petitioner has considered the interest expenses as per the GERC (MYT) Regulations, 2016on normative basis. The Petitioner has calculated the interest expenses by applying the Weighted Average Rate of interest of the actual loan portfolio during the year on the loan component while repayment has been considered equal to the depreciation for the year.

The Petitioner submitted that the variation in interest expenses compared to the approved expenses is to be treated as uncontrollable as it depends on the quantum of actual capitalization and variation in the interest rates.

The interest expense claimed for FY 2016-17 is shown in the table below.

Table 4.32: Interest Claimed in the truing up for FY 2016-17

(Rs. Crore)

Particulars	Actual
Capitalization During the Year	11.28
Normative Debt @ 70%	7.90
Opening Balance	115.51
New Borrowings	7.90
Repayments	49.62
Closing Balance	73.78
Rate of Interest	11.42%
Interest Expenses	10.81
Other Borrowings Cost	0.13
Total Interest Expenditure	10.94

Commission's Analysis

Commission has considered opening loan balance as on 01.04.2016 equal to closing loan balance of FY 2015-16 as approved in the tariff order dated 09th June, 2017. The additional loan considered by the Commission is 70% of the value of assets addition after deduction of the value of assets withdrawn.

As per first proviso of Regulation 38.5 of the GERC (MYT) Regulations, 2016, at the time of truing up, the weighted average rate of interest calculated on the basis of the actual loan portfolio during the year applicable to the Generating Company shall be considered as the rate of interest. As per aforesaid Regulation, the Commission has worked out interest rate of 11.26% based on information such as lender-wise loan portfolio with periodical variation in interest rate, principal repayment and tenure during FY 2016-17 as received from the Petitioner vide e-mail dated 20th March, 2018. The other borrowing cost is Rs. 0.13 Crore as



per the annual accounts and considered in this truing up for FY 2016-17.

Accordingly, based on the actual capitalisation achieved by TPL (G) during FY 2016-17 and the approved normative borrowings considering the interest rate of 11.26%, the Commission has computed the interest, as detailed in the Table below:

Table 4.33: Interest Approved by the Commission in the truing up for FY 2016-17

(Rs. Crore)

SI. No.	Particulars	Approved in truing up for 2016-17
1	Opening Loan	115.51
2	New Loan during the year	7.90
3	Repayment During the Year	49.62
4	Closing Loan	73.79
5	Average Loan	94.65
6	Rate of Interest	11.26%
7	Interest	10.66
8	Other Borrowing Costs	0.13
9	Total Interest and Finance Charges	10.79

The Commission, accordingly, approves the interest and finance charges of Rs. 10.79 Crore in the truing up for FY 2016-17.

With regard to the computation of gains / losses, Regulation 22.2 of the GERC (MYT) Regulations, 2016 considers variations in capitalization on account of time and/or cost overruns/ efficiencies in the implementation of a capital expenditure project not attributable to an approved change in scope of such project, change in statutory levies or force majeure events, as a controllable factor. If the gain is on account of lesser capital expenditure and capitalisation, it cannot be attributed to the efficiency of the utility to allow 2/3rd of the gain to the utility. Similarly, if the loss is on account of more capital expenditure and capitalisation due to bonafide reasons, the utility cannot be penalised by allowing only 1/3rd of the loss in the ARR. Accordingly, the Commission has decided to consider variation in capitalisation as uncontrollable. Hence, the components of ARR related to capitalisation, like interest and finance charges, depreciation and return on equity are also considered as uncontrollable.

The Commission, accordingly, approves the gains / losses on account of interest and finance charges as uncontrollable, in the truing up for FY 2016-17, as detailed in the Table below:



Table 4.34: Gains / (Losses) Approved in the truing up for FY 2016-17

(Rs. Crore)

Particulars	Approve d for 2016-17 in MYT Order	Actual claime d in truing up for 2016-17	Approve d in truing up for 2016- 17	Deviatio n +(-)	Gains / (Losses) due to uncontrollabl e factor
Interest and Finance Charges	12.01	10.94	10.79	1.22	1.22

4.8.2 Interest on Working Capital

The interest on working capital is arrived at by applying interest rate of 11.31% on the working capital requirement computed as per the GERC (MYT) Regulations, 2016.

Petitioner's Submission

TPL has claimed a sum of Rs. 14.45 Crore towards interest on working capital in the truing up of FY 2016-17, as against Rs. 14.63 Crore approved in the MYT Order dated 9th June, 2017 for FY 2016-17, as detailed in the Table below:

Table 4.35: Interest on Working Capital of TPL-G (APP) Claimed for FY 2016-17

(Rs. Crore)

SI. No.	Particulars	Approved for 2016-17 in MYT Order	Actual claimed in truing up for 2016- 17
1	Coal for 1.5 Month	99.08	104.47
2	Secondary Fuel for 2 months	1.43	0.54
3	Gas for 1 Month	-	-
4	O&M Expenses for 1 Month	13.15	11.32
5	1% of GFA for Maintenance Spares	11.38	11.38
6	Receivables for 1 Months	-	-
7	Normative Working Capital	125.04	127.71
8	Interest Rate	11.70%	11.31%
9	Interest on Working Capital	14.63	14.45

The Petitioner further submitted that the variation in working capital requirement is primarily on account of variation in actual fuel costs and O&M expenses. Further, there is a variation in interest rate applicable on working capital requirement.

Commission's Analysis

The Commission has examined the computation of normative working capital and interest thereon under the GERC (MYT) Regulations, 2016.



The working capital comprises of 1.5-month coal cost, 2 months' secondary fuel cost, 1-month O&M expenses, maintenance spares at 1% of historical cost and receivables equivalent to 1 month.

With regard to rate of interest on working capital, the Commission vide notification No. 7 of 2016 dated 2nd December, 2016 has amended its Regulation 40.1 (d) of the GERC (MYT) Regulations, 2016 as given under:

Interest on working capital shall be allowed at a rate equal to the State Bank Base Rate (SBBR) / 1 year State Bank of India (SBI) Marginal Cost of Funds Based Lending Rate (MCLR) / any replacement thereof by SBI for the time being in effect applicable for 1 year period, as may be applicable as on 1st April of the financial year in which the Petition is filed plus 250 basis points:

Provided that at the time of truing up for any year, interest on working capital shall be allowed at a rate equal to the weighted average State Bank Base Rate (SBBR) / 1 year State Bank of India (SBI) Marginal Cost of Funds Based Lending Rate(MCLR) / any replacement thereof by SBI for the time being in effect applicable for 1 year period, as may be applicable prevailing during the financial year plus 250 basis points.

In line with the above proviso to Regulation 40.1 (d), the Commission has considered the weighted average of 1 year State Bank of India (SBI) Marginal Cost of Funds Based Lending Rate (MCLR) of 8.81% prevailing during the financial year 2016-17 plus 250 basis points. Accordingly, the rate of interest on working capital has been worked out to be 11.31%.

Based on the O&M expenses and other expenses now approved in the Truing up, the working capital and interest thereon calculated at 11.31%, are detailed in the Table below:

Table 4.36: Interest on Working Capital Approved in the truing up for FY 2016-17
(Rs. Crore)

SI. No.	Particulars	Approved in truing up for 2016-17
1	Coal for 1.5 Month	103.84
2	Secondary Fuel for 2 months	1.47
3	Gas for 1 Month	-
4	O&M Expenses for 1 Month	12.06
5	1% of GFA for Maintenance Spares	11.38
6	Receivables for 1 Months	
7	Normative Working Capital	128.74
8	Interest Rate	11.31%
9	Interest on Working Capital	14.56



The Commission, accordingly, approves the interest on working capital at Rs. 14.56 Crore in the truing up for FY 2016-17.

As indicated above, the Commission has analysed various components – controllable and uncontrollable to arrive at the approved figure of working capital, based on which, the interest on working capital has been calculated. After working out the interest on working capital, the Commission has treated the interest as an uncontrollable cost, for the purpose of estimating Gains / (Losses).

The Commission, accordingly, approves the Gains / (Losses) on account of interest on working capital in the truing up for FY 2016-17, as detailed in the Table below:

Table 4.37: Gains / (Losses) in Interest on Working Capital Approved in the truing up for FY 2016-17

(Rs. Crore)

Particulars	Approved for 2016-17 in MYT Order	Approve d in truing up for 2016- 17	Deviatio n +(-)	Gains /(Losses) due to Controlla ble Factors	Gains /(Losses) due to Uncontrollabl e Factors
Interest on Working Capital	14.63	14.56	0.07		0.07

4.8.3 Depreciation

TPL has claimed a sum of Rs. 49.62 Crore towards depreciation in the truing up for FY 2016-17, as against Rs. 47.34 Crore approved in the MYT Order dated 9th June, 2017, as detailed in the Table below:

Table 4.38: Depreciation of TPL-G (APP) Claimed for FY 2016-17

(Rs. Crore)

Particulars	Approved for FY 2016-17 in MYT Order	Actual claimed in truing up for FY 2016-17
Depreciation	47.34	49.62

Petitioner's Submission

TPL has submitted that the depreciation rates, as per CERC (Terms and Conditions of Tariff) Regulations, 2004, are applied on the opening GFA of FY 2009-10 and for addition of assets from 1st April, 2009 onwards the depreciation has been computed at the rates specified in the



GERC Regulations.

Commission's Analysis

The details of opening balance of assets as on 1st April, 2016, and addition and deduction to the Gross Block during FY 2016-17 and the depreciation on the assets, classification wise, are given in Form 5 of the petition. The opening and closing balances of assets are as per the annual accounts for FY 2016-17 after adjustment of Ind. AS.

The Commission, accordingly, approves the depreciation at Rs. 49.62 Crore in the truing up for FY 2016-17.

The Commission, accordingly, approves the Gains / (Losses) on account of depreciation in the truing up for FY 2016-17, as detailed in the Table below:

Table 4.39: Gains / (Losses) due to Depreciation Approved in the truing up for FY 2016-

(Rs. Crore)

Particulars	Approved for 2016-17 in MYT Order	Approved in truing up for 2016-17	Deviation +(-)	Gains / (Losses) due to Uncontrollable Factors
Depreciation	47.34	49.62	(2.28)	(2.28)

4.8.4 Return on Equity

TPL has claimed a sum of Rs. 60.21 Crore towards return on equity in the truing up for FY 2016-17, as against Rs. 60.84 Crore approved in the MYT Order dated 9th June, 2017, as detailed in the Table below:

Table 4.40: Return on Equity of TPL-G (APP) Claimed for FY 2016-17

(Rs. Crore)

Particulars	Approved for 2016-17 in MYT Order	Actual claimed in truing up for 2016-17
Opening Equity	428.38	428.38
Equity Addition	12.39	5.40
Reduction in Equity	-	2.02
Closing Equity	440.77	431.76
Average Equity	434.58	430.07
Return on Equity	60.84	60.21



Petitioner's Submission

TPL has submitted that the return on equity has been computed at 14% on the average of the opening and closing balance of equity for FY 2016-17.

The closing balance of equity has been arrived at considering additional equity of 30% of the net capitalisation during the year.

Commission's Analysis

TPL has considered opening equity as on 01.04.2016 equal to closing equity of FY 2015-16 as approved in the truing up order dated 9th June, 2017. TPL has de-capitalised assets of Rs 6.73 Crore during the year and has accordingly reduced the value of capitalisation during the year by the value of such de-capitalisation. The additional equity considered by the Commission is 30% of the value of net asset addition.

The Commission, accordingly, approves the return on equity of Rs. 60.21 Crore in the truing up for FY 2016-17, as detailed in the Table below:

Table 4.41: Return on Equity approved in the truing up for FY 2016-17

(Rs. Crore)

Particulars	Actual Claimed in truing up for 2016-17	Approved in truing up for 2016-17
Opening Equity	428.38	428.38
Equity Addition	5.40	5.40
Reduction in Equity	2.02	2.02
Closing Equity	431.76	431.76
Average Equity	430.07	430.07
Return on Equity	60.21	60.21

The Commission, accordingly, approves the Gains / Losses on account of return on equity in the truing up for FY 2016-17, as detailed below:

Table 4.42: Return on Equity and Gains / (Losses) Approved in the truing up for FY 2016-17

(Rs. Crore)

Partic	ulars	Approved for 2016-17 in MYT Order	Approved in truing up for 2016-17	Deviation +(-)	Gains / (Losses) due to Uncontrollable Factors
Return o	n Equity	60.84	60.21	0.63	0.63



4.8.5 Income Tax

TPL has claimed a sum of Rs. 7.61 Crore towards income tax in the truing up for FY 2016-17, as against Rs. 15.34 Crore approved in the MYT Order dated 9th June, 2017 for FY 2016-17, as detailed in the Table below:

Table 4.43: Income Tax Claimed for TPL-G (APP) for FY 2016-17

(Rs. Crore)

Particulars	Approved for FY 2016-17 in MYT Order	Actual claimed in truing up for FY 2016-17
Income Tax	15.34	7.61

Petitioner's Submission

TPL has submitted that it has claimed the income tax of Rs. 7.61 Crore for FY 2016-17 considering the total tax paid for TPL as a whole and the ratio of PBT of TPL-(G) and PBT of the company as a whole as per the annual accounts.

Commission's Analysis

The Commission had asked TPL to furnish the details of segregation of income tax paid by TPL in respect of TPL Ahmedabad along with copies of challans of income tax paid. In its reply, TPL submitted that being a single corporate entity, income tax is paid for the company as a whole. TPL also submitted that it has computed the income tax, by applying the prevailing MAT rate on the PBT, as per the annual accounts and submitted the copies of challans of income tax paid.

The Commission verified the PBT figures from the annual accounts for FY 2016-17. The Petitioner has shown a PBT of Rs. 34.21 Crore net of Remeasurement of Defined Benefit Plans. The PBT as per standalone financial statement of TPL net of Remeasurement of Defined Benefit Plans is Rs. 574.21 Crore and the total current tax paid is Rs 128.30 Crore. It is observed that during FY 2016-17, the Petitioner has paid the MAT.

The Commission computed the income tax of Rs. 118.89 Crore by applying the MAT rate of 21.3416% on the PBT of TPL (G), TPL (A), TPL (S) and TPL(Dahej) (PBT of Rs. 557.06 Crore @ 21.3416%).

It is further observed that apart from MAT of Rs. 128.30 Crore, the standalone financial statement of the Petitioner also indicates a tax credit of Rs. 6.35 Crore. The aforesaid MAT of



Rs. 118.89 Crore computed on the PBT of TPL (G), TPL (A), TPL (S) and TPL(Dahej) has been further adjusted by the tax credit of Rs.6.16 Crore (proportionate amount). Accordingly, the Commission computed the MAT to be allowed to all the above four entities of the Petitioner at Rs. 112.73 Crore (Rs. 118.89 Crore Minus Rs. 6.16 Crore) with the condition that the MAT amount computed above does not exceed the actual tax paid for the Company as a whole of Rs. 121.95 Crore net of tax credit (Rs. 128.30 Crore Minus Rs. 6.35 Crore).

The share of income tax for TPL(G) in the total tax TPL (G), TPL (A), TPL (S) and TPL(Dahej) of Rs.112.73 Crore (net of tax credit) as computed above works out to Rs. 6.92 Crore considering PBT net of Remeasurement of Defined Benefit Plans and tax credit.

The Commission, accordingly, approves the income tax at Rs. 6.92 Crore in the truing up for FY 2016-17.

The Commission has treated the income tax as an uncontrollable expense. The Commission, accordingly, approves the gains / losses on account of income tax in the truing up for FY 2016-17, as detailed in the Table below:

Table 4.44: Income Tax and Gains / (Losses) due to Income Tax Approved in the truing up for FY 2016-17

(Rs. Crore)

Particulars	Approved for 2016-17 in MYT Order	Approved in truing up for 2016-17	Deviation +(-)	Gains /(Losses) due to Controllable Factors	Gains /(Losses) due to Uncontrollable Factors
Income Tax	15.34	6.92	8.42		8.42

4.8.6 Non-Tariff Income

Petitioner's submission

TPL has submitted that the actual Non-Tariff income was Rs. 16.89 Crore in the truing up for FY 2016-17, as against Rs. 17.43 Crore approved in the MYT Order dated 9th June, 2017 as shown in the Table below:

Table 4.45: Non-tariff income for TPL-G (APP) claimed for FY 2016-17

(Rs. Crore)

Particulars	Approved for 2016-17 in MYT Order	Actual claimed in truing up for 2016-17	
Non-Tariff Income	17.43	16.89	



Commission's Analysis

The non-tariff income of TPL (G) is Rs. 27.28 Crore as per the annual accounts but the Petitioner has excluded the Insurance Claim Receipt of Rs. 8.97 Crore and Income pertaining to Vatva of Rs. 1.42 Crore to arrive at claim figure of Rs. 16.89 Crore. As discussed in the O&M chapter that insurance claim receipt is part of non-tariff income, therefore the same is added back to the Non-tariff income for FY 2016-17 and the O&M expenses have been increased by the same amount.

The Commission, accordingly, approves the non-tariff income at Rs.25.86 Crore by excluding Rs. 1.42 Crore pertaining to Vatva in the truing up for FY 2016-17.

The deviation in non-tariff income is at Rs. 8.43 Crore, which is a loss considered as uncontrollable factor.

The Commission, accordingly, approves the gains / losses on account of non-tariff income in the truing up for FY 2016-17 as detailed below.

Table 4.46: Non-tariff income and gains / losses approved in the truing up for FY 2016-

(Rs. Crore)

Particulars	Approved for 2016-17 in MYT Order	Approved in truing up for 2016-17	Deviation +(-)	Gains /(Losses) due to Uncontrollable Factors
Non-Tariff Income	17.43	25.86	(8.43)	(8.43)

4.8.7 Incentive

As overall PLF of Ahmedabad generating station is lower than 85%, the Petitioner has not claimed incentive in the truing up for FY 2016-17.

Commission's Analysis

As the PLF of TPL(G) is lower than the normative PLF of 85%, the Commission has not allowed any incentive during FY 2016-17 truing up, as per Regulation 53.2 (a) of the GERC (MYT) Regulations, 2016.



4.8.8 Revised ARR for FY 2016-17

The Commission has reviewed the performance of TPL-G (APP) under Regulation 22 of the GERC (MYT) Regulations, 2016, with reference to the annual accounts for FY 2016-17.

Accordingly, the Commission has computed the sharing of gains and losses for FY 2016-17, based on the truing up for each of the components discussed in the above paragraphs. The ARR approved in the MYT Order dated 9thJune, 2017, as claimed by TPL and as approved in truing up for FY 2016-17, along with sharing of gains / losses computed in accordance with the GERC (MYT) Regulations, 2016, is given in the Table below:

Table 4.47: ARR Approved in truing up for FY 2016-17

(Rs Crore)

SI. N o.	Annual Revenue	Approved for 2016- 17 in MYT Order	Claimed in truing up for 2016-17	Approved in truing up for 2016-17	Deviati on +(-)	Gains /(Losses) due to controlla ble Factors	Gains /(Losses) due to Uncontroll able Factors
1	2	3	4	5	6=(3-5)	7	8
1	Variable Cost	812.21	838.97	838.97	(26.76)	9.06	(35.82)
2	O & M Expenses	157.78	135.87	144.66	13.12	13.12	
3	Water Charges	10.96	14.13	14.13	(3.17)		(3.17)
4	Depreciation	47.34	49.62	49.62	(2.28)		(2.28)
5	Interest on Loan	12.01	10.94	10.79	1.22		1.22
6	Interest on Working Capital	14.63	14.45	14.56	0.07		0.07
7	Return on Equity	60.84	60.21	60.21	0.63		0.63
8	Income Tax	15.34	7.61	6.92	8.42		8.42
9	Incentive	0.00	0.00	0.00	-		-
10	Total Expenditure	1131.11	1131.80	1139.86	(8.75)	22.18	(30.93)
11	Less: Non-Tariff Income	17.43	16.89	25.86	(8.43)		(8.43)
12	Aggregate Revenue Requirement	1113.68	1114.91	1114.01	(0.32)	22.18	(22.50)

4.8.9 Sharing of Gains / Losses for FY 2016-17

The Commission has analysed the gains / losses on account of controllable and uncontrollable factors.

The relevant Regulations are extracted below:



Regulation 23. Mechanism for pass-through of gains or losses, on account of uncontrollable factors

- "23.1 The approved aggregate gain or loss to the Generating Company or Transmission Licensee or SLDC or Distribution Licensee on account of uncontrollable factors shall be passed through as an adjustment in the tariff of the Generating Company or Transmission Licensee or SLDC or Distribution Licensee over such period as may be specified in the Order of the Commission passed under these Regulations.
- 23.2 The Generating Company or Transmission Licensee or SLDC or Distribution Licensee shall submit such details of the variation between expenses incurred and revenue earned and the figures approved by the Commission, in the prescribed format to the Commission, along with the detailed computations and supporting documents as may be required for verification by the Commission.
- 23.3 Nothing contained in this Regulation 23 shall apply in respect of any gain or loss arising out of variations in the price of fuel and power purchase, which shall be dealt with as specified by the Commission from time to time."

Regulation 24. Mechanism for sharing of gains or losses on account of controllable factors

- "24.1 The approved aggregate gain to the Generating Company or Transmission Licensee or SLDC or Distribution Licensee on account of controllable factors shall be dealt with in the following manner:
- (a) One-third of the amount of such gain shall be passed on as a rebate in tariffs over such period as may be stipulated in the Order of the Commission under Regulation 21.6;
- (b) The balance amount, which will amount to two-thirds of such gain, may be utilized at the discretion of the Generating Company or Transmission Licensee or SLDC or Distribution Licensee.
- 24.2 The approved aggregate loss to the Generating Company or Transmission Licensee or SLDC or Distribution Licensee on account of controllable factors shall be dealt with in the following manner:
- (a) One-third of the amount of such loss may be passed on as an additional charge in tariffs over such period as may be stipulated in the Order of the Commission under Regulation 21.6; and
- (b) The balance amount of loss, which will amount to two-thirds of such loss, shall be



absorbed by the Generating Company or Transmission Licensee or SLDC or Distribution Licensee."

The trued up ARR claimed by TPL-G (APP) for FY 2016-17 is given in the Table below:

Table 4.48: Revised ARR claimed by TPL-G (APP) for FY 2016-17

(Rs. Crore)

Particulars		2016-17
ARR as per MYT Order	(a)	1,113.68
Gains/(Losses) due to Uncontrollable Factors	(b)	(32.19)
Gains/(Losses) due to Controllable Factors	(c)	30.97
Pass through as tariff	d=(c/3+b)	21.87
ARR True-up	e=a + d	1,135.56

The ARR approved for TPL-G (APP) in the truing up for FY 2016-17 is given in the Table below:

Table 4.49:Revised ARR approved for TPL-G (APP) for 2016-17

(Rs. Crore)

Particulars	2016-17
ARR approved in the MYT for FY 2016-17	1,113.68
Less: Gain on account of controllable factor to be passed on to the	
consumers (1/3rd)	7.39
Add: Loss on account of uncontrollable factor to be passed on to	
consumers	(22.50)
Revised ARR approved for FY 2016-17 in the Truing up	1,128.79

The Commission approves the total ARR of Rs. 1128.79 Crore of TPL-G (APP) for FY 2016-17 and the same is considered as the actual cost of power purchased from TPL-G (APP) for FY 2016-17 in the ARR of TPL Distribution.



5 Compliance of Directives

5.1 Earlier Directives

5.1.1 Interest Cost Reduction

TPL-G (APP) should ensure sanction from all the consortium members for reduction in the rate of interest.

Compliance:

TPL(G) has successfully pursued the Banks/FIs for reduction of interest rate and accordingly, the interest rates have been revised leading to substantial saving to consumers.

Commission Comment:

The Commission noted the compliance.

5.2 Directives issued in the MYT Order dated 9th June, 2017

5.2.1 Calculation of Depreciation

Petitioner is directed to calculate depreciation for true up from FY 2017-18 as per Regulation 39 of GERC MYT Regulations, 2016.

Compliance:

TPL(G) shall do the needful in the interest of all stakeholders during truing up of FY 2017-18.

Commission Comment:

The Commission noted the submission.

5.2.2 Scheduling of TPL-G (APP) to SLDC

TPL is directed to schedule station wise generation through SLDC from FY 2017-18 in accordance with the ABT Order of the Commission and amendments thereof from time to time. TPL-G shall obtain certificate of annual PLF for each station from SLDC and submit the same to the Commission along with truing up Petition.



Compliance:

SLDC has reported that TPL(G) has started scheduling the Sabarmati generating station from April, 2017 onwards. Regarding the certificate of annual PLF, TPL(G) has submitted that it shall do the needful during truing up of FY 2017-18.

Commission Comment

The Commission noted the submission.

5.2.3 Reduction in fuel cost

TPL-G is directed to explore the possibility of reduction in fuel cost including possibilities of utilisation of washed coal.

Compliance:

TPL(G) has the Fuel Supply Agreement (FSA) with M/s SECL. Regarding the usage of washed coal, it has submitted that it has evaluated the pros and cons of using washed coal. Based on the inputs gathered, TPL(G) is of the considered view that washing may not yield any gain for sustained and commercially viable generation.

Commission Comment

TPL(G) is directed to submit the detailed analysis in this regard by 30th June, 2018.

5.2.4 Fuel Supply Arrangements

TPL-G is directed to initiate efforts for optimizing fuel supply arrangements and submit detailed report related to existing FSA with details related to take or pay liabilities, practice for procuring imported fuel, and present arrangement and action required for optimization of fuel supply arrangement by 31st August, 2017.

Compliance:

The Fuel Supply Arrangements exists with M/s SECL. Further, all efforts are being made to optimize the cost of indigenous coal by representing to M/s SECL regarding Grade Slippage and Coal quality.

Commission Comment

The Commission noted the submission.



5.2.5 Green Cess on Coal Cost

TPL-G is advised to take up the matter with appropriate authority to rationalize the Green Cess imposed on procurement of coal for charging the Green Cess in the ratio of RPO fulfilment by the state/entity.

It is also observed by the Commission that Green Cess is imposed by the Government of India uniformly across the coal quality. TPL-G is advised to take up the matter with appropriate authority to get the necessary amendment so as to reduce the overall cost of fuel.

Compliance:

TPL(G) has submitted that the Coal Consumers Association of India has already filed a letter before the Hon'ble Minister of Finance, Government of India. Subsequently, the Government of India has implemented the GST but it has continued the Green Cess as GST Compensation Cess.

Commission Comment

The Commission reiterate that TPL(G) shall approach the Central Government for levy of Green Cess on the basis of Renewable energy generation in the State.



Annexure 1: Approved fuel costs for FY 2016-17 for True up D- Station

Sr. No.	Items	Derivation	Unit	2016-17
1	Gross Generation	A	MUs	886.99
2	Auxiliary Consumption	С	%	9.00%
3	Auxiliary Consumption	В	MUs	79.83
4	Net Generation	Y=A-B	MUs	807.16
5	Station Heat Rate	D	Kcal/KWh	2450
6	Sp. Oil Consumption	E	ml/kWh	1.00
7	Gross Calorific Value of Coal	F	kcal/kg	4324
8	Calorific Value of Oil	G	kcal/l	9993
9	Overall Heat	H=A x D	G Cal	2173123.54
10	Heat from Oil	I=(A x E x G)/1000	G Cal	8863.86
11	Heat from Coal	J=H-I	G Cal	2164259.68
12	Transit losses	К	%	0.80%
13	Coal Blend			
14	A) Indigenous Coal	X1	%	67%
15	C) Imported Coal	X3	%	33%
16	Actual Oil Consumption	L=A x E	kl	886.99
17	Actual Coal Consumption	M=(J X 1000)/F	MT	500481.45
18	A) Indigenous Coal	Q1=M* x X1/(1-K)	MT	336609.79
19	C) Imported Coal	Q3=M* X X3	MT	166564.54
20	Price of Coal			
21	A) Indigenous Coal	P1	Rs/MT	5079.16
22	C) Imported Coal	P3	Rs/MT	5664.15
23	Price of Oil	P4	Rs/kI	31657.09
24	Coal cost			
25	A) Indigenous Coal	N1=Q1 X P1/10^5	Rs Lakh	17096.95
26	C) Imported Coal	N3=Q3 X P3/10^5	Rs Lakh	9434.46
27	Total Coal Cost	N4=N1+N2+N3	Rs Lakh	26531.41
28	Oil Cost	N5=P4 x L/10^5	Rs Lakh	280.79
29	Other Charges (please specify details)	N6	Rs Lakh	176.37
30	Total Fuel Cost	O=N4+N5+N6+N7	Rs Lakh	26988.58
31	Fuel Cost/Unit Gross	P=O/(A*10)	Rs/kWh	3.04
32	Fuel Cost/Unit Net	Q=O/(Y*10)	Rs/kWh	3.34
33	Cost of fuel/G. Cal	R=(O/H)*10^5	Rs/Gcal	1241.93
34	Actual Net Generation	S	MU	809.22
35	Normative fuel cost for actual net generation	T=Q*S	Rs Crore	270.57



Annexure 2: Approved fuel costs for FY 2016-17 for True up – E Station

Sr. No.	Items	Derivation	Unit	2016-17
1	Gross Generation	A	MUs	920.41
2	Auxiliary Consumption	C	%	9.00%
3	Auxiliary Consumption	В	MUs	82.84
4	Net Generation	Y=A-B	MUs	837.57
5	Station Heat Rate	D	Kcal/KWh	2455
6	Sp. Oil Consumption	E	ml/kWh	1.00
7	Gross Calorific Value of Coal	F	kcal/kg	4278.64
8	Calorific Value of Oil	G	kcal/l	10014.29
9	Overall Heat	H=A x D	G Cal	2259600.90
10	Heat from Oil	I=(A x E x G)/1000	G Cal	9217.23
11	Heat from Coal	J=H-I	G Cal	2250383.67
12	Transit losses	К	%	0.80%
13	Coal Blend			
14	A) Indigenous Coal	X1	%	74.44%
15	C) Imported Coal	X3	%	25.56%
16	Actual Oil Consumption	L=A x E	kl	920.41
17	Actual Coal Consumption	M=(J X 1000)/F	MT	525957.51
18	A) Indigenous Coal	Q1=M* x X1/(1-K)	MT	394690.57
19	C) Imported Coal	Q3=M* X X3	MT	134424.47
20	Price of Coal			
21	A) Indigenous Coal	P1	Rs/MT	5088.07
22	C) Imported Coal	P3	Rs/MT	5719.34
23	Price of Oil	P4	Rs/kl	32105.21
24	Coal cost			
25	A) Indigenous Coal	N1=Q1 X P1/10^5	Rs Lakh	20082.12
26	C) Imported Coal	N3=Q3 X P3/10^5	Rs Lakh	7688.20
27	Total Coal Cost	N4=N1+N2+N3	Rs Lakh	27770.32
28	Oil Cost	N5=P4 x L/10^5	Rs Lakh	295.50
29	Other Charges (please specify details)	N6	Rs Lakh	188.20
30	Total Fuel Cost	O=N4+N5+N6+N7	Rs Lakh	28254.02
31	Fuel Cost/Unit Gross	P=O/(A*10)	Rs/kWh	3.07
32	Fuel Cost/Unit Net	Q=O/(Y*10)	Rs/kWh	3.37
33	Cost of fuel/G. Cal	R=(O/H)*10^5	Rs/Gcal	1250.40
34	Actual Net Generation	S=A-B1	MU	844.23
35	Normative fuel cost for actual net generation	T=Q*S	Rs Crore	284.79



Annexure 3: Approved fuel costs for FY 2016-17 for True up – F Station

Sr. No.	Items	Derivation	Unit	2016-17
1	Gross Generation	А	MUs	951.68
2	Auxiliary Consumption	С	%	9.00%
3	Auxiliary Consumption	В	MUs	85.65
4	Net Generation	Y=A-B	MUs	866.03
5	Station Heat Rate	D	Kcal/KWh	2455
6	Sp. Oil Consumption	Е	ml/kWh	1.00
7	Gross Calorific Value of Coal	F	kcal/kg	4237.98
8	Calorific Value of Oil	G	kcal/l	9987.02
9	Overall Heat	H=A x D	G Cal	2336370.72
10	Heat from Oil	I=(A x E x G)/1000	G Cal	9504.43
11	Heat from Coal	J=H-I	G Cal	2326866.29
12	Transit losses	K	%	0.80%
13	Coal Blend			
14	A) Indigenous Coal	X1	%	79%
15	C) Imported Coal	X3	%	21%
16	Actual Oil Consumption	L=A x E	kl	951.68
17	Actual Coal Consumption	M=(J X 1000)/F	MT	549051.33
18	A) Indigenous Coal	Q1=M* x X1/(1-K)	MT	439822.19
19	C) Imported Coal	Q3=M* X X3	MT	112747.71
20	Price of Coal			
21	A) Indigenous Coal	P1	Rs/MT	5074.48
22	C) Imported Coal	P3	Rs/MT	5721.36
23	Price of Oil	P4	Rs/kl	31977.26
24	Coal cost			
25	A) Indigenous Coal	N1=Q1 X P1/10^5	Rs Lakh	22318.68
26	C) Imported Coal	N3=Q3 X P3/10^5	Rs Lakh	6450.71
27	Total Coal Cost	N4=N1+N2+N3	Rs Lakh	28769.39
28	Oil Cost	N5=P4 x L/10^5	Rs Lakh	304.32
29	Other Charges (please specify details)	N6	Rs Lakh	139.11
30	Total Fuel Cost	O=N4+N5+N6+N7	Rs Lakh	29212.81
31	Fuel Cost/Unit Gross	P=O/(A*10)	Rs/kWh	3.07
32	Fuel Cost/Unit Net	Q=O/(Y*10)	Rs/kWh	3.37
33	Cost of fuel/G. Cal	R=(O/H)*10^5	Rs/Gcal	1250.35
34	Actual Net Generation	S=A-B1	MU	867.63
35	Normative fuel cost for actual net generation	T=Q*S	Rs Crore	292.67



COMMISSION'S ORDER

The Commission approves the Aggregate Revenue Requirement for TPL-G (APP) for FY 2018-19, as shown in the Table below:

Approved ARR for TPL-G (APP) for FY 2018-19

(Rs. Crore)

Particulars	FY 2018-19
Variable Cost	786.90
O&M Expenses	169.95
Water Charges	12.25
Depreciation	45.03
Interest & Finance Charges	3.44
Interest on Working Capital	14.35
Return on Equity	58.96
Income Tax	15.34
Less: Non-tariff Income	17.43
Net ARR	1,088.78

This order shall come into force with effect from 1st April, 2018.

Sd/-	Sd/-	Sd/-
P. J. THAKKAR	K. M. SHRINGARPURE	ANAND KUMAR
Member	Member	Chairman

Place: Gandhinagar Date: 31/03/2018

