



RP - Sanjiv Goenka Group
Growing Legacies



CORP:SERV : 2290

31 July 2018

The Secretary
Central Electricity Regulatory Commission
3rd & 4th Floor
Chandralok Building
36, Janpath
New Delhi – 110 001

Dr Ravi

may 6/18

Dear Sir,

Comments on Terms and Conditions of Tariff for the tariff period commencing from 1 April 2019 – Consultation Paper thereof

With reference to your communication No. L-1/236/2018/CERC dated 24 May 2018 read with communication dated 13 July 2018, we furnish our submissions / suggestions on the above consultation paper for your kind consideration. It is our earnest hope and humble prayer that the Hon'ble Commission will recognise our concerns and make necessary modifications.

We also crave leave to submit at a future date further materials on the subject which may be available to us in the event we are of the opinion that the same would render meaningful assistance to the Hon'ble Commission in the matter.

Yours faithfully,

Lal Chij

Vice President

(Corporate Services & Regulatory Affairs)

Encl.

Sg/Secy 03/08/18

Chief (A?)

E.o/Secy

3/8/2018

DC/CRP/Fin 7/8/18

Comments on Consultation Paper on Terms and Conditions of Tariff Regulations by Central Electricity Regulatory Commission for Tariff Period 1.4.2019 to 31.3.2024, prepared by CERC Staff

(A) Recovery of Fixed Cost (Clause 7.2.4 – 7.2.6)

This approach of three-part tariff mechanism may not be beneficial for the generating companies since variable component of fixed charge is linked to difference between availability and dispatch and recovery for the same becomes uncertain depending on the actual drawal pattern of the beneficiaries.

Under the present mechanism of CERC Regulations, entire fixed cost recovery is ensured on achievement of normative plant availability factor by the generating stations. The proposed approach may result in lower recovery of the variable component of fixed cost in the present scenario of low dispatch by generating stations driven by reduced demand of distribution licensees / procurers and increasing penetration of renewable energy in the overall national grid. It is submitted that such uncertainty in recovery of part of fixed charges would be a deterrent for new investment in the power sector which is already stressed with idle assets. Proposal of splitting fixed charges is against the commercial principles as envisaged in Electricity Act 2003 and a violation of financial principles as well. Therefore, recovery of fixed cost should not be linked with dispatch as the same will penalise the generating companies for reasons beyond their control.

It needs to be appreciated that the very premise on which the investments in the existing generating stations were made, particularly those plants which have tied up their capacities with distribution licensees, is to satisfy the estimated demand of the licensees, *per se* of consumers. Therefore, it will be prejudicial against the investors of such generating stations to suddenly change the principles of cost recovery in the proposed fashion, which will certainly not allow full fixed cost recovery.

Demand pattern of various beneficiaries are not homogenous across the country. The Hon'ble Commission may specify peak and off-peak seasons and respective

target availabilities for fixed cost neutralisation. In such event, target availability for peak period of 4 months may not be kept above 90% considering, inter alia, need for maintenance, bargaining power of primary fuel supplier. Fixing an extremely stringent target availability beyond 90% for peak period may be unachievable and will jeopardise fixed cost recovery of generating stations.

Moreover, Tariff Policy (notified on 28 January 2016) as well as the draft amendments to such Policy notified on 30 May 2018 recommends about adoption of two part tariff structure comprising fixed charge and energy charge. No variable component is envisaged in the aforesaid fixed charge.

Therefore, proposed provisions should preferably be consistent with existing statutes and policy documents.

(B) Components of tariff (Clause 9.3)

The following aspects need to be considered for recovery of fixed charges for a generating station whose entire capacity is not tied up through PPA either u/s 62 or 63.

- Some units of the station have a PPA while others have not. Change in law or emergence of new technologies requires that additional capital expenses have to be incurred for the running of the units having PPA. In this case the entire expenses incurred (if justified as per prudence check) shall be considered unit wise for tariff determination and not for the generating station as a whole.
- Where the long term PPA is for the partial capacity of the unit and a capex has to be incurred for meeting the requirements of law (FGD etc.) the entire cost of such capex as required shall be considered for tariff recovery, as assessment of cost of FGD installation is not feasible. Such tariff shall be reviewed after any new PPA is entered into for the balance untied capacity.

(C) Optimum utilization of capacity (Clause 10.3)

Present regulatory framework of recovery of Annual Capacity Charge / Fixed Charges on the basis of total Contracted Capacity as specified in the PPA may be continued with. This will ensure recovery of the investment in the sector tied-up for beneficiaries.

The National Electricity Plan also projected additional generation of 6440 MW & 46420 MW by FY22 and FY27 to meet future peak demand. With the Tariff Policy emphasising need to attract investment and the financials of any project has been based on agreed risk allocation, it is feared proposal of modification of contractual agreement every year or the proposal to limit fixed cost recovery to scheduled capacity would be detrimental to the sustainability of the sector and would not ensure balancing of all stakeholders' interest.

The proposal of bidding out the aggregated unutilised contracted capacities is not tenable as this mechanism itself is not yet tested and by no means assures that the cost of generation can be recovered by this mechanism.

(D) Capital Cost (Clause 11.8)

The prevailing method of determination of provisional tariff based on projected capital expenditure needs to be continued as it helps to minimize the impact of retrospective revision of tariff after approval of final tariff of a project. Consequently, impact of carrying cost on the beneficiaries is also minimised. Time and again, CERC had emphasised on consideration of Benchmark Costs duly adjusted for case specific dispensations. Accordingly, actual project cost subject to prudence check would need to be considered for capital cost rather than benchmark cost ignoring many realities.

(E) Financial Parameters (Clause 13.1)

A balanced hybrid approach comprising normative and actual basis of allowance of expenses may be adopted in the larger interest of the sector as a whole. Further, the Hon'ble Commission should ensure reasonable return for the developers, incentives for adopting initiatives for benefit of customers and recovery of reasonable costs of capex schemes implemented near fag end of the Project life.

(F) Depreciation (Clause 14.6)

Options envisaged in the consultation paper are directed towards reducing the depreciation rate to fulfil the objective of reducing tariff for generation and transmission system. Reassessment of life of plant / asset at the commencement of every tariff period makes the useful life dynamic. This dynamicity of useful life will make the recovery of depreciation uncertain. As re-assessment of life of critical equipment would require expert technical examination, i.e., Residual Life Assessment ("RLA") study and cannot be done based on any accounting estimate, the utilities would have to incur additional costs for such technical assessment at the beginning of every tariff period which needs to be factored in the O&M Expenses. However, due consultation with various stakeholders needs to be undertaken before implementation of such an approach. Moreover, as the useful life is proposed to be extended, there would be requirement of additional O&M expenses for proper upkeep of such generation assets.

Viability of a project depends on periodic cash flows during the life of project. For assessment of project viability, cash flow estimates over a given life of the project were relied upon. Prolonging the recovery of capital cost by artificially reducing the depreciation rate will adversely affect the cash flow from the project and consequently the reasonable return that the investor of the project had envisaged from such investment. This approach also runs the risk of completely wiping off the return from such projects. Therefore, changes introduced during the project life will seriously affect the viability of the projects and will hurt further investments in the sector due to regulatory uncertainties. Encouraging investments and need for

investments in the power sector has been a consistent and important theme in policies framed for the sector.

Allowance of additional capital expenditure at the fag-end of the project will help in enhancement of operational usability of the older assets, but reassessment of useful life of the assets needs clarification. The mode of recovery of the additional expenditure by the generating companies and recovery of capital servicing costs needs elaboration.

It would be appropriate to continue with weighted average useful life for gradual commissioning of units, as envisaged in clause 14.6 (b), since this is a feasible and reasonable approach instead of computation of unit-wise useful life.

Existing policy for charging depreciation needs to be continued.

(G) Return (Clause 15.2, 18)

The Hon'ble Commission may continue with the Return on Equity ("RoE") approach for the ensuing control period, instead of RoCE. Though the consumers would be insulated from the effect of increasing interest rates in case of adoption of RoCE model, beneficiaries would be deprived of the gains achieved on account of re-financing of loan or in light of falling interest rates under the context of present unstable Indian market.

The proposed approach of calculating RoE based on reduced equity base on account of depreciated GFA, may result in lower return to the generating companies, which is not desirable in the interest of the sector on the whole. Observations made in section (F) above in relation to depreciation may again be considered for the discussions on return too, as those are equally relevant here. Adoption of modified GFA approach will severely affect the internal resource generation of power generating companies and further investment in the power sector will be impacted adversely along with debt service obligations. The investors have made investments based on GFA approach and changing the methodology will have detrimental effect on the returns on the investments. In view of various criticalities in the power sector

e.g. non-availability of fuel, cancellation of coal blocks, projects without fuel linkages, lack of adequate long-term PPAs by states, contract / tariff-related disputes, issues related to banks / financial institutions etc. NFA approach is not suitable for desired development of the sector.

It is submitted that the Hon'ble Commission may kindly determine RoE on the basis of CAPM model. However, as mentioned in clause 18 of the consultation paper, CAPM analysis in the ensuing control period, should be undertaken considering listed generating companies and indices movement of a standardised exchange. Such approach yields an RoE of around 18% as compared to existing norm of 15.5%. Accordingly, an upward revision of the norm for rate of return on equity is necessary in the interest of the stakeholders.

Viability of a project depends on periodic cash flows during the life of a project. For assessment of project viability, cash flows had been estimated on a certain basis by the generating companies. Changes introduced during the project life will affect the viability of the projects and will hurt further investments in the sector due to regulatory uncertainties. Encouraging investments and need for investments in the power sector has been a consistent and important theme in policies framed for the sector.

In view of the reduction of the demand-supply gap, the different rates of return for existing and new generation (as envisaged in clause 18.7 b)) would discourage fresh investments in the sector. It is therefore humbly requested to have uniform rate of RoE for both existing and new generation projects.

Different rates of return for different unit size may not be considered by the Hon'ble Commission as the developer does not always have the choice over size of the unit commissioned. It is generally guided by the system requirements.

Time overrun of a project is many a time beyond control of the developer on account of various factors such as delay in obtaining land clearances, RoW issues, environmental clearances and statutory / government clearances etc. Therefore, uncontrollable external factors need to be duly considered in detail before penalisation of RoE on account of delay in project commissioning by the Commission.

(H) Debt-Equity (Clause 16.4)

The proposal for modifying debt-equity ratio to 80:20 from the existing norm of 70:30 may not be sustainable as financial institutions / banks may not be willing to finance such high proportion of the capital cost of a project, particularly, in the wake of rising bad loans and NPA. In view of softening of interest rates in the country, the existing debt-equity framework may be continued with. In case of equity infusion in excess of normative level of 30%, additional incentive may be suitably provided to the developers.

(I) Cost of debt (Clause 19.5)

Determination of cost of debt based on weighted average rate of the actual loan portfolio may be continued with to recognise the actual interest payment/ finance cost obligation by the generating companies.

Linking the rate with the prevailing market rates may lead to reduction of recovery of the actual finance cost as there may be outstanding older loans availed at higher interest rates. Further, switching over to the normative cost of debt calculated on the basis of prevailing market rates may result in unpredictable gain or loss for the generators and may discourage the investors.

The Hon'ble Commission is kindly aware that any adverse impact on the generating companies will also affect the banking sector, which is reeling under severe pressure from bad debts / NPA. The generating companies will be seriously prejudiced if banks / lenders initiate insolvency proceeding due to problems with debt servicing.

(J) Interest on working capital (Clause 20.3)

The present methodology clearly sets out the item-wise capital allotment for sustaining daily operations. In our humble opinion, the existing methodology of determination of normative working capital is best suited for the generating stations

as it provides a clear projection of working capital to be provided for the tariff period. Hence, the present methodology may be continued.

It is proposed by CERC to consider a fresh benchmark of stock or actual stock of fuel in determination of working capital base for the future control period. Methodology of benchmarking is not elaborated in the consultation paper under consideration. It is therefore humbly submitted that prior consultation may be taken up with the generating companies for adoption of such principle. If actual fuel stock is considered, the same should not be provided on the basis of low fuel stock because of distribution policy constraints or bargaining power of single supplier, which is beyond the control of the generating companies. Maintaining an alarmingly low level of fuel at the generating stations is not a choice of the generating companies, but has resulted from scarcity /availability / transportation constraints of coal which are beyond the control of the generating companies. It will be extremely unfortunate and risky from grid stability point of view, if the Hon'ble Commission fixes the working capital base considering occasionally prevailing abnormally low level of fuel stock. The risk of maintaining low fuel stock for non-pit head stations in the near-distance range is much less than that for similar stations at higher-distance range. Fuel-stock in transit for latter category of stations also play an important role in mitigation of such risk. The norms prevailing generally reflect optimal operating cycle and should be continued.

While fixing the working capital base part of the maintenance spares should be included as the cost of maintenance spares included in the O&M Expenses reflects the cost incurred in consumption of such spares whereas the maintenance spares as working capital reflects the cost of carrying such spares in the inventory. It is pertinent to note here that the procurement of maintenance spares is done on the basis of consumption and the projected maintenance schedule. Such inventory is required to be replenished with the consumption of such spares.

In view of the changing operational regime, it has been proposed by the Hon'ble Commission that, the normative base of working capital may be linked to target PLF instead of target availability of the generating stations. Such change in approach will result in lowering of working capital base and consequent reduction in claim of interest on working capital, which clearly goes against the interest of the generating

companies in the form of lower cost allowance in spite of maintaining higher plant availability.

Any adverse impact on the generating companies will also affect the operational creditors, forcing them to initiate insolvency proceeding against the generating companies, which will not be in the best interest of the industry.

(K) Operation and Maintenance Expenses (Clause 21.7)

The Hon'ble Commission may determine the base O&M Expenses and the applicable annual escalation factor based on the methodology adopted during fixation of norms for FY 2014-19. However, there are some other expenditures like Ash Disposal Expenses, Water Charges, additional expenses due to vintage, unexpected expenses on account of any event under 'Change in Law' which should be allowed separately.

(L) Fuel – Quality, blending of imported coal, landed cost (Clause 22.8, 23.6, 24.5))

The Hon'ble Commission is kindly aware that “as fired” heat value captures the true heat input into the boiler. Heat losses occur at multiple storage points before actual firing point of the boiler. Therefore, heat value needs to be considered on “as fired” basis for determination of fuel cost.

We request the Hon'ble Commission not to specify any normative blending ratio as it is operationally impractical. It is better that the generating companies decide the blending requirement depending on factors such as quality of domestic, imported coal, boiler design etc.

Landed cost of fuel inclusive of basic price, cost of transportation and all other relevant taxes, duties, royalty, cess etc., inter alia, incurred by the generators with due consideration of transit loss should be a pass through in tariff.

(M) Operational norms – Station Heat Rate (Clause 26.3.1 to 26.3.6)

CERC has suggested review of the heat rate norms for new and existing generating stations giving due consideration to all the relevant factors including shortage of domestic coal in the country. The above considerations may have positive impact on the generating companies, if set at relaxed level. CERC also recommends about heat rate norm setting in light of the efficiency improvement targets achieved by the generating stations under the PAT scheme.

Setting progressively stringent norms based on better performance goes against the principle of encouragement of better performance. This is also enshrined in the Tariff Policy. It was upheld by the Appellate Tribunal for Electricity (ATE) in case of providing its judgment in Appeal no. 251 of 2006 dated 4 April 2006 in Reliance Energy Limited vs. Maharashtra Electricity Regulatory Commission (“MERC”) and others that, *“Black’s Law Dictionary defines norms as: An actual or set standard determined by the typical or most frequent behaviour of a group”*. It was also upheld by the Hon’ble ATE that, *We are not convinced that MERC can upgrade norms for individual generator even if it performed better year after year. If the entire industry operates at better operating parameters for sufficient number of years, then MERC may consider to revise the norms for all.”*

In light of increasing renewable energy penetration, relaxed norms may be set for the generating plants operating at a lower PLF.

(N) Operational norms – Specific secondary fuel oil consumption (Clause 26.3.7)

In view of such renewable energy penetration, relaxed norms may be set for the generating plants operating at a lower PLF.

(O) Operational norms – Auxiliary energy consumption (Clause 26.3.10)

As furnished under this clause, the methodology for calculation of normative availability after reduction of normative auxiliary and colony consumption needs more clarity. Relevant considerations may be taken into account by the Hon'ble Commission in respect of site-specific factors, additional requirement due to installation of various pollution control equipment like FGD under statutory mandate or requirement for disposal of fly ash etc. over and above the Normative Auxiliary energy Consumption on case to case basis.

(P) Normative Annual Plant Availability (Clause 26.3.11, 26.3.12, 26.3.15)

As proposed in the consultation paper, different norms for different stations may be beneficial to the generating companies, as norms for the older stations may be fixed at a realistic / relaxed level than that of the newer stations. If the Hon'ble Commission so desires, peak and off-peak availability may be specified as 90% for 4 months peak period and 82.5% for 8 months off-peak period.

Obtaining prior consent of the beneficiaries for coal blending, may create huge operational / co-ordination issues and any such requirement should not be introduced. It will be prudent to rely on the judgement of the Hon'ble Commission and / or the relevant regulation(s) of such Hon'ble Commission in this respect.

(Q) Normative Transit and Handling losses (Clause 26.3.16)

Transit Losses may kindly be allowed by the Hon'ble Commission considering the distance of travel from mine to site, usage of washed Coal and factors of loss during inland transportation in case of imported coal. Since these losses are beyond control of the generators, suitable relaxation may be provided on case specific basis.

(R) Incentive (Clause 27.5)

Incentive may be linked back to Plant Availability and Annual Fixed Charges to ensure proper upkeep of the generation assets and support to grid stability.

(S) Tariff Mechanism for Pollution Control System (Clause 33.4)

Prevailing normative debt: equity ratio of 70:30 may kindly be continued to ensure an optimum operating and financial leverage. Further, in case of implementing Pollution Control Systems like FGD Plant in a generating unit which has partial untied capacity, the Hon'ble Commission may devise suitable mechanism for recovery of the entire cost pertaining to such untied capacity.

Fixed Charges on account of capex incurred to satisfy environmental norms may be recovered along with the Annual Fixed Charges and not to be linked with availability since dispatch is governed by requisition of the procurer.

(T) Renewable generation by existing thermal generation stations (Clause 34.4)

The Hon'ble Commission may not choose to adopt bundling of tariff for renewable generation with conventional thermal power and allow the tariff to be decided separately as per the respective tariff regulations.

(U) Energy Storage System (Clause 36.7)

It may be more prudent to introduce such scheme in the next control period as deployment of grid storage is at a developmental stage and no policy or regulatory framework is present with respect to energy storage. However, its importance is well recognized in areas such as frequency regulation, renewable generation, generation shift etc.

(V) Alternate approach to tariff design (Clause 37)

This entire section on alternate approach to tariff design needs to be clarified with greater details for ease of understanding.

It appears that the project cost will be considered on a normative basis based on a benchmark capital cost. The Hon'ble Commission in the past has held that capital cost benchmark has limited role in determination of project cost for tariff determination under section 62 and case specific dispensations are necessary [CERC order in case no. L-1/103/CERC/2012 dated 4 June 2012]. Therefore, proper study needs to be conducted before adoption of such benchmarking approach.

A table has been provided (Table 13) which specifies the proposed flow process for determination of normative tariff for the generating companies. Here, AFC is proposed to be categorised into non-escalable / decreasing (segment-1) and escalable (segment-2) components where the former component would be decelerated at a rate determined by the Commission. This would lead to under-recovery of legitimate fixed costs of the generators considered under segment-1.

Depreciation is allocated throughout the useful life of the asset and thereby helps in principal repayment of loans. Reduction in depreciation amount would hamper the loan repayment structure due to shortage of fund and will adversely affect banks, which are already facing huge NPA issues.

Interest expenses are directly linked to the market conditions which may not necessarily reduce or even remain constant every year. Therefore, treatment of such expenses in the way proposed would be detrimental for the generating companies.

Similarly, gradual reduction in RoE would lead to poor financial health of the generating companies and commercial viability of the new projects.

Considering all the aforesaid aspects, the present method of tariff determination based on prudence check of each and every cost components of tariff may be continued.