ANNEXURE - I

CERC	Approach paper on Terms and Conditions of Tariff Regulations for Tariff Period 01.04.2024 to 31.03.2029				
Notification No. File No. L-1/268/2022/CERC				Date 26.05.2023	
Sl. No	**Ch. No.**	**Parameter**	**Existing**	**Proposals**	**PCKL remarks**
	3.	**Possible Approaches to Tariff Determination**			
1	3.1	Alternative Approach to Tariff Determination	Performance-based approach	1. Approach 1: Shift to a **normative tariff** wherein, once capital costs are approved on an actual basis after a prudence check, all other AFC components are determined on normative basis. AFC components : a) Depreciation b) Interest on Loan c) Return on Equity(RoE) d) Interest on Working Capital(IoWC) e) O&M expenses 2. Approach 2: Further simplification of the existing **Performance Based Hybrid Approach**, wherein on the basis of admitted capital cost, AFC components can be approved **based on actuals or norms as may be specified for the control period. Further, additional capitalization may be allowed on certain counts on a normative basis.**	Approach 1- Normative tariff shall be considered. Normative or Actuals whichever is lower.
	4	**Financial Aspects impacting tariff**			
3	4.2.2	***Capital Cost*** Procurement of Equipment and Services		In order to encourage transparency in project execution, suggestion on the following has been sought. 1. Need to mandatorily award work and services contracts for developing projects under regulated tariff mechanism **through transparent process of competitive bidding** using public procurement platforms duly complying with the policy/guidelines issued by Government of India as applicable from time to time.	

4	4.2.3	***Capital Cost*** Benchmark Cost V/s Investment Approval	Investment approval	Benchmark Cost may not be a true representation for all the plants that can form basis for disallowing cost due to following reasons. ❖ Thermal Generating Station - Cost is largely affected by site conditions, water handling, coal handling systems etc. ❖ Hydro Generating Station - Cost depends on several aspects such as choice of technology, design, reservoir based/Pondage/ROR, etc. ❖ Transmission System – Cost depends on factors such as tower design, terrain, soil type, wind zones etc., Therefore, **benchmarking** may serve limited purpose and may not be a better alternative to current project specific Investment Approvals. – Suggestions /Comments are invited on other efficient reference costs other than investment approval costs that can be considered for prudence check	Bench mark cost shall be made basis while approving the capital cost. As otherwise capital cost may be without a guiding factor.
6	4.4	Computation of Interest During Construction (IDC)		Comments and Suggestions are sought on the following issues : Illustration: Consider an asset that was supposed to be implemented in 36 months but suffers a delay of 12 months. Further, suppose IDC up to SCOD is Rs. X and IDC beyond SCOD till actual COD is Rs. Y, and the Commission has condoned a delay of 4 months. 1. Existing mechanism wherein the pro-rata computation is done on excess IDC pertaining to delay period beyond SCOD; Allowable IDC shall be Rs. X + [Y*(4/12)], i.e., only IDC pertaining to delay is pro-rated. or	Calculation made for the formula mentioned in approach paper . Copy of calculation for Option 1 and Option 2 is enclosed as annexure-I. Option 1&2 was worked out by considering minimum and maximum delay condoned and

				2. Pro-rata IDC may be allowed considering the total implementation period wherein the actual IDC is pro-rated considering the SCOD and period of delay condoned over total implementation period; Allowable IDC shall be Rs. (X+Y)*[(36+4)/48] wherein the total IDC is pro-rated based on the SCOD and delay condoned vis-à-vis the actual implementation period of 48 months. or 3. IDC approved in the original Investment Approval to be considered while allowing actual IDC in case of delay. 4. In case the actual IDC is below that approved in the Original Investment approval, the same may be allowed as lower IDC even in case a project is delayed may be due to prudent phasing of funds adopted by the utilities.	it is seen that , option 2 would give lesser IDC. Hence Pro-rata IDC may be allowed considering the total implementation period wherein the actual IDC is pro-rated considering the SCOD and period of delay condoned over total implementation period
7	*4.4.2*	***Treatment of Liquidated Damages***		APTEL has then specified the following method by which delay impacts need to be allowed. a) If the delay is entirely due to the Implementing Agency's fault, the LD amount collected by it should be allowed to be retained by the Implementing Agency. b) In case the entire delay is way beyond the control of the Implementing Agency then the entire LD if any shall be deducted before allowing the impact. c) Under the third scenario, where partial delay is on account of the Implementing Agency and the rest of the delay is due to uncontrollable factors, LD if any, should be shared equally between the consumers and the Implementing Agency. **It is proposed that the additional capitalization forms need to be tweaked so that such information is submitted along with the tariff petition.**	a) If the delay is entirely due to the Implementing Agency's fault, the LD amount payable by Implementing Agency shall be reduced from the Capital Cost.

				Comments and suggestions are sought from stakeholders on necessary changes in tariff forms and regulations, if any, to provide further clarity on the adjustment of LD.	
8	4.5	Price Variation		In case of Time overrun, if the impact of such delay is not being allowed for the delay not condoned, the same treatment may be extended to price variation, therefore comments sought on the following. For allowing price variation, the utilities may **be mandated to submit the statutory auditor certificate along with the petition duly certifying the price variation corresponding to delay and the same may be allowed on pro-rata basis corresponding to the delay condoned**. Further, a separate form may also be specified to submit the relevant information pertaining to price variation	In case of Time overrun on account of reasons attributable to the implementing agency no price variation shall be allowed .
9	4.6	Renovation and Modernization	The generating company or the transmission licensee, as the case may be, intending to undertake renovation and modernization (R&M) of the generating station or unit thereof or transmission system or element thereof for the purpose of extension of life beyond the originally recognized useful life for the purpose of tariff, shall file a petition before the Commission for approval.	In view of the inherent benefits of undertaking R&M as against going for fresh capital investment, the current provisions may be continued. Further, **utilities that opt for special allowance for the first year of the tariff period shall have to continue with the same for the rest of the tariff period**.	The special allowance allowed during control period shall be subject to truing up as per actual R&M expenses.

			The generating company making the applications for renovation and modernization (R&M) shall not be eligible for Special Allowance under Regulation 28 of these regulations		
12	4.9	Differential Norms - Servicing Impact of Delay		1. To encourage rigorous pursuit of such approvals from statutory authorities, even if delay beyond SCOD on account of clearances and approvals that are condoned, **some part of the cost impact (Say 20%) corresponding to the delay condoned may be disallowed.** 2. Alternatively, RoE corresponding to cost and time overruns allowed over and above project cost as per investment approval may be **allowed at the weighted average rate of interest on loans** instead of a fixed RoE. 3. The current mechanism of treating time overrun may be continued, considering that utilities are automatically disincentivised if the project gets delayed.	**2. Alternatively, RoE corresponding to cost and time overruns allowed over and above project cost as per investment approval may be allowed at the SBI MCLR for one year tenure instead of a fixed RoE.**
14	4.10.1	Additional Capitalization-**cut off date**	**'Cut-off Date'** means the last day of the calendar month after **thirty six months** from the date of commercial operation of the project;	It was observed that the majority of additional capitalization post COD is incurred within 5 years from COD and therefore it is **proposed to increase the cut off date from the present 3 years to 5 years**. A Separate study carried out found that around 84% total Capital cost is incurred as on COD and almost entire balance 16% is incurred in the first 5 years.	Cut-off Date as in existing regulations may be continued.
16	4.10.1	Intermittent additional capitalization		1. Thermal - Based on the analysis of actual additional capitalization in the past (15-20 years) and co-relating such expenses to different unit sizes such as 200/210 MW series, 500/660 MW Series and different vintage (5-10, 10-15, 15-20, 20-25 years post COD) a **special dispensation in the**	Special dispensation in the form of yearly allowance may be allowed on case to case basis, limited to actual cost incurred.

				form of yearly allowance may be allowed which shall not be subject to any true up and shall not be required to be capitalized. 2. Hydro - As each hydro generating station is unique owing to various factors, additional capitalization of such generating stations may not be benchmarked as can be done for thermal generating stations. Station Specific additional capitalization may be approved on normative basis. While determining such special compensation for a thermal or hydro generating station, costs incurred towards works presently covered under Regulation 26 to Regulation 29(force majeure, change in law, R&M , and Emission standards) , wherever applicable, may not be included as these expenses may be allowed separately. Discharge of liabilities of works already admitted by the Commission as on 31.03.2024 shall be allowed as and when such liability is discharged.	
17	4.12	O&M Expenses - Segregation of Normative O&M Expenses		In case of Employee Expenses one-time effect for pay revision impact is required to be approved. It is further anticipated that in the forthcoming tariff period wage/salary revision is expected and therefore O&M norms may be specified under following two categories. 1. Employee Expenses 2. Other O&M Expenses comprising of Repair and Maintenance and Administrative and General Expenses. Alternatively, 50% of the actual wage revision can be allowed on a normative basis to cater the impact of pay/wage revision.	Alternative proposal may be accepted.
21	4.12.5	O&M Expenses-		It is observed that **there are no provisions with regard to allowing additional expenses on account of any change in law resulting in an increase in O&M expenses**. However,	Additional O&M Expenses due to Impact on account of Change in Law and Taxes shall not be allowed.

		Impact on account of Change in Law and Taxes		including the same may lead to recurring impacts, and claims that may result in regulatory overburden. **whether to include any provisions with regard to allowing impact of a change in law on O&M expenses.**	
24	4.15	Return on Equity	Return on equity shall be computed at the base rate of 15.50% for thermal generating station, transmission system including communication system and run-ofriver hydro generating station, and at the base rate of 16.50% for the storage type hydro generating stations including pumped storage hydro generating stations and run-ofriver generating station with pondage:	1.Review of Rate of RoE to be allowed including that to be allowed on additional capitalization that are carried out on account of Change in Law and Force Majeure. 2. Whether revised rate of RoE to be made applicable to only new projects or to both existing and new projects? 3. Whether incentivizing timely completion of hydro generating station attract investments? 4. Merit behind approving different Rate of RoE to Thermal, Hydro Generation and Transmission Projects with further incentives to Dam/reservoir based projects including PSP. 5. Merit in allowing RoE by linking the rate of return with market interest rates such as G-SEC rates/MCLR/RBI Base Rate	1. RoE rate shall be revised considering the prevailing bank interest rate limited to 12%. 2. Revised rate of RoE to be made applicable to both existing and new projects as stated above. 3. Yes. Hydro projects may be incentivized for early completion before SCOD and dis-incentivized for delay in achieving SCOD .
25	4.16	Rate of Return on Equity – Old Gencos		Possible options to encourage higher availability and generation from old generating stations can be as follows. 1) Allowing **additional incentive in the form of paise/kWh** apart from those currently allowed may be allowed to such generating stations against **generation beyond the target PLF.**	As per the existing Tariff Regulations incentive at 50paise/unit is already allowed for generation beyond the target PAF. Hence additional incentive proposed in this clause may not be considered.
26	4.17	Tax Rate		A domestic company shall fall under one of the following brackets, and the maximum tax amount that shall be payable is limited by the tax rates notified for the relevant category.	

				Therefore, Base Rate of RoE may be grossed up as follows: 1. At MAT(Minimum Alternate Tax) Rates (If not opted for Section 115 BAA) 2. At Effective Tax Rate (if not opted for Section 115BAA) subject to ceiling of Corporate Tax Rate; or 3. At reduced tax rate under Section 115BAA of the Income Tax Act or any other relevant categories notified from time to time subject to ceiling of rate specified in the relevant Finance Act.. Further, tax shall be allowed only in cases where the company has actually paid taxes as under no circumstances tax can be allowed to be recovered if the company has not paid any tax for the year under consideration	Truing up shall be made on the actual tax paid, subject to limiting to tax on RoE.
	5	**Operational Parameters impacting Tariff**			
34	5.7	Compensation for Part-Load Operations		Compensation mechanism for part loads operations below normative level up to technical minimum was included as part of the Amendment to the Indian Electricity Grid Code, 2010 in the year 2017. Commission in IEGC has decided to make this part of Tariff Regulations. Accordingly, the appropriate provisions may be inserted to deal with part load operation compensation as a part of Tariff Regulations. Further actual operations is falling below 55% in some cases and may require redressal. Further, impact of part load may be allowed **on either on normative basis or actual basis.** Comments and Suggestions are sought on the existing norms	Compensating the generators where the actual PLF of plants is below 55% is not acceptable. The placement of compensation for the appropriate generators case to case should be through the tariff regulations.

				and any changes that may be required to compensate the generators to operate the plants in a flexible manner to support the Grid.	
36	6.1	Separate Norms for ROR/Storage Based Hydro Projects		Currently the Tariff Regulations for all the hydro stations are same except for higher RoE allowed for Storage based Hydro Generating Stations and PSP visà-vis Run-of-River projects. Further, NAPAF of storage based generating stations is generally higher than ROR based projects considering the ability of storage based generating stations to generate on demand. In view of the above, it is proposed that more enabling framework or incentive mechanism for dam/reservoir based generating stations to operate as peaking plants wherein these stations may be incentivized to operate as peaking plants. Comments and Suggestions are sought on whether the proposed approach can be adopted or any alternatives can be adopted.	Providing additional incentives for peaking power plants acts as burden to the Discom's either directly or indirectly.
39	6.8	Necessity to Review the need of Regulation 17 (2)	17. Special Provisions for Tariff for Thermal Generating Station which have Completed 25 Years of Operation from Date of Commercial Operation (2) **The beneficiary shall have the first right of refusal**	It is observed that generation is a delicensed activity and is purely guided by terms and conditions of PPA for a period of 25 years and that any extended operation should also be governed by PPA. Further, any interventions in PPA through tariff Regulations every five year including such exit clauses may not be desirable as it may violate contract sanctity. Further, any extended operations should also be governed by PPA as was the case in the initial PPA period. In view of the above, it is observed the continuing Regulation 17 (2) in its	The existing Regulation 17(2) shall be retained.

			and upon its refusal to enter into an arrangement as above, the generating company shall be free to sell the electricity Generated from such station in a manner as it deems fit.	present form would create complications and the same is proposed to be modified.	

-31/7/23

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Annexure- A

IDC Calculation:

							IDC Calculation	
X (IDC up to SCOD is Rs. X)	Y (IDC beyond SCOD till actual COD is Rs. Y)	Total duration of project *i.e SCOD*	Actual total duration of project *i.e COD*	Actual delay *(COD-SCOD) (d)-(c)*	Delay condoned months	Delay condoned/ Actual delay *(f)/(e)*	Option1 = *(a) +((b)*(g))*	Option 2= *(a+b)*((C+f)/e)*
(a)	(b)	(c)	(d)	(e)	(f)	(g)		
10	1	36	48	12	1	0.08	10.08	8.48
10	1	36	48	12	6	0.50	10.50	9.63
10	1	36	48	12	11	0.92	10.92	10.77
10	1	36	48	12	12	1.00	11.00	11.00

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