

**Cost impact of the proposals mooted by the TNERC in the new “Consultative Paper for procurement of wind power and related issues”**

SL No	Existing (Order No:6 of 2018 dated 13-04-2018)	Proposed in the Concept Paper	Impact to WEGs
1	8.0 Wind Power Tariff 8.1 Wind power tariff is computed with reference to the determinants listed in Para 7.1 above. The tariff works out to Rs. 2.86 per unit without accelerated depreciation and Rs.2.80 per unit with Accelerated Depreciation (AD). The working sheet is enclosed as Annexure I.	3.4 Commission proposes procurement of wind power by the Distribution Licensee, for compliance of RPO requirement, through the competitive bidding route under section 63 of the Electricity Act 2003 following the bidding guidelines issued by the Central Government or procure power from the projects contracted through competitive bidding process by SECI, the nodal agency that floats tenders and conducts e-reverse auction for procurement of power from solar and wind power projects. Energy Purchase Agreement, billing and payment shall be as per the terms in the bidding.	The TNERC finally “draw the curtain” on setting wind power tariff under section 62 of the Act. Here after, the wind power tariff in Tamil Nadu will be discovered through competitive bidding process. <b>This may further reduce the realization of WEG since the tariff discovered through bidding process will generally be less than the FIT.</b>
	In view of the above, the Commission decides not to disturb the current position in this order and decides to continue with the present banking period of 12 months from the 1st of April to 31st of March of the succeeding year for the WEG machines commissioned on or before 31.3.2018 under captive wheeling in the case of normal and REC scheme (for REC as provided in Order	<p><b>(I) Category A - For the WEG machines commissioned upto 31.3.2018:-</b></p> <p>Two options are provided. Comments/suggestions are invited with reasons for the same.</p> <p>OPTION 1-</p> <p>The banking period shall commence from 1st April and end on 31st March of the following year. The energy generated each month shall be adjusted against consumption of the same month. Excess generation over and above the consumption of each month i.e the banked energy shall be credited at <b>75%</b></p>	<p>The Commission has proposed different banking options as depicted in the 3<sup>rd</sup> column of the table. All the options are aimed at withdrawing the banking.</p> <p>At the existing retail energy charges of Rs 6.35 per unit (for Industrial consumers) and at the existing open access charges as determined by the Commission in the last tariff order, the realization per unit for the WEGs with one year existing banking</p>

	<p>No.3 of 2016 and R.A No.6 of 2013) with increase in the banking charges from 12% to 14% as proposed in the consultative paper.</p>	<p>of the relevant tariff applicable to the WEGs as per the Commission's tariff orders on wind energy. The amount thus credited at the end of the month shall be adjusted with the current consumption charges or paid within 30 days as opted by the captive consumer. Any delay in payment beyond the stipulated period of 30 days will attract interest at the rates notified by the Commission for payment of interest on security deposit.</p>	<p>works out to be around Rs 4.94 per unit after accounting for all charges and T and D losses.</p> <p>If the Commission withdraw the banking, the WEGs can only realize Rs 2.18 per unit. The feed in tariff assumed in this case is Rs 2.90 per unit. This realization may vary depending upon the FIT of that particular WEG. The difference between Rs 4,94 and Rs 2.18 would be the loss to the generators.</p>
		<p>OPTION 2- The banking period shall commence from 1st April and end on 31st March of the following year. <u>Drawal of banked energy shall not be permitted during evening peak hours.</u> The energy generated during April shall be adjusted against consumption in April and the balance if any shall be reckoned as the banked energy after deduction of banking charges in kind. The generation in May shall be first adjusted against the consumption in May. If the consumption exceeds the generation during May, the energy available in the bank shall be drawn to the required extent. If the consumption during May is less than the generation during May, the balance shall be added to the banked energy after deduction of banking charges in kind. This procedure shall be repeated every month until the month of December. For the months of January to March of the following year, drawal of</p>	<p>In this option, drawal of banked energy shall not be permitted during evening peak hours. It means the WEG industrial users shall pay an energy charges of Rs.6.35 per unit plus Rs1.27 for peak hour charges totalling Rs 7.62 per unit to the TANGEDCO for drawing power during peak hours.</p> <p>Further, for the months of January to March, the WEG user has to pay a normal energy charges Rs.6.35 per unit to TANGEDCO for drawing power. During peak hour, Rs1.27 has to</p>

		<p><b>banked energy shall not be permitted.</b></p> <p>The unutilized energy as on 31st December may be encashed at the rate of 75% of the applicable wind energy tariff fixed by the Commission for existing normal wind energy captive users and at 75% of Pooled cost of power purchase as notified in the orders of the Commission from time to time for the captive generators under REC scheme. The energy generated during the months from January to March shall be adjusted against captive consumption and the excess over and above the adjusted generation shall be paid at 75% of applicable wind tariff/pooled cost of power purchase for the WEGs under normal category/REC category as may be applicable at the end of each month.</p>	<p>be paid to TANGEDCO in addition to Rs 6.35 per unit.</p>
		<p><b>(II) CATEGORY B - For the WEGs commissioned during the control period of Order No.6 of 2018 dt.13.4.2018</b></p> <p>Banking facility to the WEG machines commissioned during the control period of Order No.6 of 2018 dt.13.4.2018 will be as specified in the said order. i.e Banking facility for both under normal and REC category shall be for one month. No banking charges are applicable. Purchase of excess generation/ unutilized banked energy shall be at 75% of applicable wind energy tariff for the normal category machines. For captive generators under REC scheme, purchase of excess generation/unutilized banked energy shall be at 75% of Pooled cost of power purchase as notified in the orders of the Commission from time to time, at the</p>	<p><u>Similar to the existing wind power tariff order. No change.</u></p>

		end of the month.	
		<p><b>(III) CATEGORY C - For the WEGs commissioned from the date of the proposed order :-</b></p> <p>i) Banking facility for both under normal and REC category shall be for one month. No banking charges are applicable. Purchase of excess generation/ <b>unutilized banked energy shall be at 75% of lowest tariff discovered during the year through competitive bidding in this State or by SECI for normal wind energy captive users at the end of the month.</b> For captive generators under REC scheme, purchase of excess generation/unutilized banked energy shall be at 75% of Pooled cost of power purchase as notified in the orders of the Commission from time to time, at the end of the month.</p>	<p>The TNERC offers only 75% of lowest tariff <b>discovered during the year through competitive bidding in this State or by SECI for normal wind energy captive users instead of offering 75% of FIT of that category of WEG. This may further reduce the realization of WEG since the tariff discovered through bidding process will generally be less than the FIT.</b></p>
		<p><b>(III) CATEGORY C - For the WEGs commissioned from the date of the proposed order :-</b></p> <p>ii) Capping of wind generating capacity - In order to limit the capacities contracted for wheeling that are disproportionate to the contracted demand/annual average consumption, Commission proposes the following for the WEGs commissioned from the date of the proposed order: The wind capacity contracted by open access consumers including captive shall be such that there is no excess generation over the annual consumption. Any generation in excess of 10% of annual consumption from the WEGs in a financial year will not be considered for payment of unutilized banked energy.</p>	<p>This will impact only if the generation is in excess of 10% of user's annual consumption. In such cases, the WEG will not get any money for their injection of power. They will be losing even the Rs 2.17 per unit paid by TANGEDCO as per the existing order. (Assuming a FIT of Rs. 2.90 per unit.)</p>

		(IV) Withdrawal of banking in phases – No Banking in respect of WEGs that have completed 10 years of life: Banking of energy in kind is proposed to be withdrawn in phases for the old machines. As a first step, banking in kind is proposed to be withdrawn for the WEGs that complete/have completed a life of 10 years and banking in value as stated in OPTION 1 under category A in para 4.1.10(I) shall be permitted.	The WEGs that complete/have completed a life of 10 years, can only realize Rs 2.18 per unit assuming a FIT of Rs 2.90 per unit. This may vary depending upon the FIT of that particular WEG. Instead we have to buy power from TANGEDCO at their tariff at Rs 6.35 + peak hour surcharge. Present realisation of banked unit is around Rs 4.94 per unit after deducting all the charges and T and D losses at base tariff of Rs 6,35.
	<p><b>10.2 Open access charges - Transmission, wheeling charges &amp; scheduling and system operation charges and losses :</b></p> <p>10.2.7 Commission feels that it is time the concessions are withdrawn and relief granted to other users of the network gradually, and hence decides to fix each of the transmission, wheeling and scheduling and system operation charges at 50% of that applicable for conventional power as notified in the orders of the Commission from time to</p>	<p>4.2.4 Wind energy is in a position to compete with conventional power sources and thus can be treated in the manner related to conventional power. In view of the above reasons, Commission fixed the transmission, wheeling and scheduling and system operation charges in the order No.6 of 2018 at 50% of that applicable for conventional power as notified by the Commission from time to time. Commission proposes the transmission, wheeling and scheduling and system operation charges at 100% of that applicable for conventional power as notified by the Commission from time to time for the WEGs commissioned under the normal category and in respect of the WEGs availing Renewable Energy Certificates (REC).</p>	<p>At the existing OA charges determined by the TNERC in 2017, a WEG shall pay Rs 0.47 paise per unit. The Commission has now proposed a 100% raise in open access charges and shall pay Rs.94 paise per unit if the proposal is finally approved by the Commission. This will increase the charges by 47 paise per unit. The cost has been worked out assuming a generation of 15 lacs units per MW</p>

	time. In respect of the WEGs availing Renewable Energy Certificates (REC), 100% of the respective charges as specified in the relevant orders shall apply.		
	<p>Cross subsidy surcharge</p> <p>10.3.1 The Commission in its previous tariff orders related to different renewable power, had ordered to levy 50% of the cross subsidy surcharge for third party open access consumers. Wind energy being in a position to compete with conventional power sources, Commission decides to levy 60% of cross subsidy surcharge of that applicable to conventional power.</p>	<p>4.3 Cross subsidy surcharge</p> <p>4.3.1 The Commission in its tariff orders related to different renewable power, has ordered to levy 50% to 70% of the cross subsidy surcharge for third party open access consumers. In the last tariff order for wind power, 60% of cross subsidy surcharge was levied. <b>Wind energy being in a position to compete with conventional power sources, Commission proposes levy of 100% of cross subsidy surcharge of that applicable to conventional power.</b></p>	<p>The present cross subsidy surcharge for industrial consumer is Rs 1.67 per unit as per the last tariff order. For wind power, it is Rs 1.00 per unit at 40% concessions. As per the concept paper, the commission has proposed to raise it to Rs.1.67 per unit resulting in a loss of Rs 0.67 per unit to WEGs. <b>This is applicable for third party sales.</b></p>
		<p>4.6.3 The excess generation/unutilized energy subject to the cap fixed in para 4.1.10(III)(ii) may be sold at the rate of 75% of respective wind energy tariffs determined or discovered bid tariffs, as per applicable orders of the Commission, for normal wind energy captive users, and 75% of Pooled cost of power purchase as notified in the orders of the Commission from time to time for captive generators under REC scheme.</p>	<p>The TNERC offers only 75% of lowest tariff discovered during the year through competitive bidding instead of offering 75% of FIT of that category of WEG. This may further reduce the realization of WEG since the tariff discovered through bidding process will generally be less than the FIT.</p>

		<p>4.6.4 Priority of adjustment of power to a consumer who has captive wind power and purchases power from third party, will be first for the banked energy after adjusting the respective month's current generation followed by third party power i.e order of adjustment of monthly energy consumed will be (i) current month wind generation followed by (ii) energy available in the bank (energy banked after deduction of banking charges in kind) followed by (iii) third party power purchase. The intention of this clause is to curb practices of consumers purchasing cheaper power from power exchange inspite of adequate energy available in the bank thereby accumulating the banked energy till the end of the financial year.</p>	<p>If the proposal gets implemented as such, members cannot buy power from IEX without exhausting the banked energy in full.</p>
		<p><b>4.13 Parallel operation charges</b>  4.13.1 WEGs who opt for parallel operation with the grid shall pay 100% of applicable parallel operation charges to the distribution licensee as specified in relevant regulations/orders of the Commission.</p>	<p><b>The commission has proposed 100% of applicable parallel operation charges in the consultative paper. This is applicable to the captive generating plant connected to the grid but will not export power to the grid. This in our view cannot be implemented for WEGs. We will submit our comments accordingly.</b></p>