

## TELANGANA STATE ELECTRICITY REGULATORY COMMISSION NOTIFICATION

No.TSERC/\_\_/2022

09.03.2022

# DRAFT REGULATION

## Preamble:

Section 86 (1) (e) of the Electricity Act, 2003 provides for promotion of renewable sources of energy including cogeneration by providing suitable measures for connecting with the grid and sale of electricity to any person, as also specify the percentage of total consumption to be purchased in the area of distribution licensees.

In order to achieve this objective, the Commission had issued a Regulation setting forth the target and other requirements in compliance of the above provisions vide the Regulation being the Telangana State Electricity Regulatory Commission Renewable Power Purchase Obligation (Compliance by Purchase of Renewable Energy / Renewable Energy Certificates) Regulation, 2018 (Regulation No. 2 of 2018).

The above said Regulation was subsisting for the period of four (4) years which shall end on 31.03.2022. Therefore, framing of fresh Regulation is necessitated to take further steps in the matter of providing mechanism as required under section 86 (1) (e) of the Act, 2003.

In this regard, it may be relevant to notice the relevant provisions of the National Tariff Policy, 2016 as notified by the Government of India exercising powers under section 3 of the Act, 2003.

"(1) Pursuant to provisions of section 86(1)(e) of the Act, the Appropriate Commission shall fix a minimum percentage of the total consumption of electricity in the area of a distribution licensee for purchase of energy from renewable energy sources, taking into account availability of such resources and its impact on retail tariffs. Cost of purchase of renewable energy shall be taken into account while determining tariff by SERCs. Long term growth trajectory of Renewable Purchase Obligations (RPOs) will be prescribed by the Ministry of Power in consultation with MNRE.

Provided that cogeneration from sources other than renewable sources shall not be excluded from the applicability of RPOs.

(i) Within the percentage so made applicable, to start with, the SERCs shall also reserve a minimum percentage for purchase of solar energy from the date of notification of this policy which shall be such that it reaches 8% of total consumption of energy, excluding Hydro Power, by March 2022 or as notified by the Central Government from time to time.

(ii) Distribution Licensee(s) shall compulsorily procure 100% power produced from all the Waste-to-Energy plants in the State, in the ratio of their procurement of power from all sources including their own, at the tariff determined by the Appropriate Commission under Section 62 of the Act.

(iii) It is desirable that purchase of energy from renewable sources of energy takes place more or less in the same proportion in different States. To achieve this objective in the current scenario of large availability of such resources only in certain parts of the country, an appropriate mechanism such as Renewable Energy Certificate (REC) would need to be promoted. Through such a mechanism, the renewable energy based generation companies can sell the electricity to local distribution licensee at the rates for conventional power and can recover the balance cost by selling certificates to other distribution companies and obligated entities enabling the latter to meet their renewable power purchase obligations. The REC mechanism should also have a solar specific REC.

(iv) Appropriate Commission may also provide for a suitable regulatory framework for encouraging such other emerging renewable energy technologies by prescribing separate technology based REC multiplier (i.e. granting higher or lower number of RECs to such emerging technologies for the same level of generation). Similarly, considering the change in prices of renewable energy technologies with passage of time, the Appropriate Commission may prescribe vintage based REC multiplier (i.e. granting higher or lower number of RECs for the same level of generation based on year of commissioning of plant)."

Accordingly, the Commission has initiated the process of making Regulation for the purpose, and as such makes this Draft Telangana State Electricity Regulatory Commission Renewable Power Purchase Obligation (Compliance by Purchase of Renewable Energy / Renewable Energy Certificates) Regulation, 2022, before finalisation.

In exercise of powers conferred under Sections 61, 66, 86(1)(e) and 181 of the Electricity Act, 2003 and all other powers enabling it in this behalf, the Telangana State Electricity Regulatory Commission hereby makes the following Regulation for prescribing the obligation for purchase of Renewable Power and its compliance by purchase of Renewable Energy/Renewable Energy Certificates.

### 1. Short Title and Commencement.

- (1) This Regulation may be called the TSERC Renewable Power Purchase Obligation (Compliance by Purchase of Renewable Energy/Renewable Energy Certificates) Regulation, 2022.
- (2) This Regulation shall apply throughout the state of Telangana.
- (3) This Regulation shall come into force from the effective date i.e., on 1<sup>st</sup> April, 2022.

## 2. Definitions and interpretation

- (1) In this Regulation, unless the context otherwise requires -
  - (a) '**Act, 2003**' means the Electricity Act, 2003 (36 of 2003) and subsequent amendments thereof;
  - (b) 'Captive Generating Plant' means a power plant set up by any person to generate electricity primarily for his own use and includes a power plant set up by any co-operative society or association of persons for generating electricity primarily for use of members of such co-operative society or association as per Electricity Rules notified by Central Government
  - (c) 'Captive User' means the person or member within the meaning of section 2(8) of the Act, 2003 being the end user of the electricity generated in captive generating plant primarily for his own use and the term "captive

use" shall be construed accordingly.

- (d) 'Central Agency' means the agency as may be designated by the Central Commission from time to time under the CERC (Terms and Conditions for recognition and issuance of Renewable Energy Certificate for Renewable Generation) Regulations, 2010 as amended from time to time;
- (e) '**Central Commission**' means the Central Electricity Regulatory Commission referred to in sub-section (1) of section 76 of the Act, 2003;
- (f) 'Certificate' means the Renewable Energy Certificate (REC) issued by the Central Agency in accordance with the procedures prescribed by it and under the provisions specified in the Central Electricity Regulatory Commission (Terms and Conditions for recognition and Issue of Renewable Energy Certificate for Renewable Energy Generation) Regulations, 2010 as amended from time to time;
- (g) '**Cogeneration**' means a process which simultaneously produces two or more forms of useful energy (including electricity);
- (h) 'Commission' means the Telangana State Electricity Regulatory Commission as referred to in sub-section (1) of section 82 of the Act, 2003;
- (i) 'Conventional Generating Plant' means any power plant generating electricity by using sources other than Renewable Energy Sources mentioned in this Regulation;
- (j) 'Distribution Licensee' means a Licensee authorized to operate and maintain a distribution system for supplying electricity to the consumers in its area of supply;
- (k) 'Floor Price' means the minimum price as determined by the Central Commission in accordance with CERC (Terms and Conditions for recognition and issuance of Renewable Energy Certificate for Renewable Energy Generation) Regulations, 2010 as amended from time to time, at and above which the certificate can be dealt in Power Exchange;
- (I) 'Forbearance Price' means the ceiling price as determined by the Central Commission in accordance with the CERC (Terms and Conditions for recognition and issuance of Renewable Energy Certificate for Renewable Energy Generation) Regulations, 2010, as amended from time to time, within which only the Certificate can be dealt in Power Exchange;

- (m) 'Hybrid Source' means two or more Renewable Energy Sources used together to provide increased system efficiency as well as greater balance in energy supply;
- (n) '**MNRE**' means the Ministry of New and Renewable Energy;
- (o) 'Non-Solar Sources' means Renewable Energy Sources other than Solar Energy Sources and includes hydro of all installed capacities;
- (p) 'Obligated Entity' is an entity that is mandated to fulfil renewable purchase obligation under this Regulation subject to fulfilment of conditions outlined under clause 3 hereof and for the purposes of this Regulation shall be the following:

(i) Distribution Licensee;

(ii) Captive user-Any consumer who owns a grid connected Captive Generating Plant based on conventional fossil fuel with installed capacity of 1 MW and above, or such other capacity as may be stipulated by the Commission from time to time, and consumes electricity generated from such plant for his own use;

(iii) Open Access Consumer in the State – Any person having a contracted demand of 1 MW and above and consumes electricity procured from conventional fossil fuel based generation through open access including procurement from power exchanges;

Provided that an obligated entity consuming power in any year to the extent of total RPPO specified under clause 3 hereof from fossil fuel based cogeneration power plant shall be exempted from RPPO. In case the consumption of an obligated entity from such co-generation power plant is less than the total RPPO, such obligated entity shall be required to fulfil the RPPO to the extent of shortfall

- (q) 'Open Access Consumer' means a consumer availing open access under sub- section (2) of Section 42 of the Act, 2003;
- (r) 'Pooled Cost of Power Purchase' means the weighted average pooled price at which the distribution licensee has purchased electricity including the cost of self-generation, if any, in the previous Financial Year from all the energy suppliers on long-term and medium-term basis, but excluding the energy purchased from the renewable energy sources;
- (s) 'Power Exchange' means any exchange operating as the power

exchange for electricity in terms of the orders issued by the Central Commission or recognised by the Commission;

- (t) 'Renewable Energy with Storage Project' means a combination of renewable energy project with storage or a combination of renewable hybrid energy project with storage having a single point of injection or maximum two points of injection into the grid;
- (u) 'Renewable Hybrid Energy Project' means a renewable energy project that produces electricity from a combination of renewable energy sources having a single point of injection or maximum two points of injection into the grid;
- (v) 'Renewable Energy Sources (or RES)' means renewable sources of energy such as water, wind, sunlight, biomass, bagasse, municipal solid waste and other such sources as approved by the MNRE;
- (w) '**RPPO**' means Renewable Power Purchase Obligation prescribed under clause (3) of this Regulation;
- (x) '**RESCO**' means Rural Electricity Supply Co-operative Society;
- (y) 'State Agency' means the State Load Despatch Centre of the State of Telangana as defined under section 2(66) of the Act, 2003 or the agency so designated by the Commission under Clause 6.6 of this Regulation to act as the agency for accreditation and recommending the renewable energy projects for registration and to undertake functions under this Regulation;
- (z) '**Year**' means a Financial Year;
- (2) Words and expressions used and not defined in the Regulation but defined in the Act or any other Regulations of the Commission shall have the meanings assigned to them respectively in the Act or any other Regulation as the case may be.

# 3. Renewable Power Purchase Obligation (RPPO)

(1) Every Obligated Entity shall purchase from Renewable Energy Sources a minimum quantity (in kWh) of electricity expressed as a percentage of its total consumption of energy, during FY 2022-23 to FY 2026-27 as specified in this table below:

Year / RPPO	2022-23	2023-24	2024-25	2025-26	2026-27
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Year / RPPO	2022-23	2023-24	2024-25	2025-26	2026-27
Solar	7.50	8.00	9.00	10.00	11.00
Non-solar	1.00	1.25	1.50	1.75	2.00
TOTAL	8.50	9.25	10.50	11.75	13.00

Provided further that the obligation will be on total consumption of electricity by an Obligated Entity excluding consumption met from Renewable Energy Sources;

Provided that on achievement of Solar RPPO compliance to the extent of 85% and above, remaining shortfall if any, can be met by excess Non-Solar Energy purchased beyond specified Non-Solar RPPO for that particular year;

Provided further that on achievement of Non-Solar RPPO compliance to the extent of 85% and above, remaining shortfall if any, can be met by excess Solar Energy purchased beyond specified Non-Solar RPPO for that particular year;

- (2) Roof-top Solar PV System
  - (a) The quantum of electricity generated by the consumer from the Roof-top Solar PV System under the net metering arrangements shall, if such consumer is not an Obligated Entity, qualify towards meeting the Solar RPPO of the Distribution Licensee.
  - (b) The Distribution Licensee shall install, at its own cost and with the consent of the consumer, a solar generation meter conforming to the applicable CEA Regulations at an appropriate location to measure the energy generated from the Roof-top Solar PV System if it desires that such energy be counted towards meeting its RPPO. The solar generation meter shall be maintained by the Distribution Licensee at its cost.
  - (c) The purchases made from solar roof-top projects (gross metering), the unutilised banked energy deemed to have been purchased by the Distribution Licensees from renewable energy projects under open access regulations, purchases made at mutually agreed prices and all such other transactions for which the generator(s) does not claim RECs shall also be treated as fulfilment of the RPPO prescribed herein.
- (3) The Distribution Licensees shall purchase power from renewable energy sources at the tariff determined by the Commission u/s 62 of the Act or at

tariffs discovered through transparent process of bidding u/s 63 of the Act directly or through traders and adopted by the Commission.

- (4) The purchase of renewable power by the Distribution Licensee, from other Distribution Licensees in the State of Telangana shall also be taken into account for computing the fulfilment of RPPO by such a Licensee.
- (5) The purchase of REC issued under the CERC (Terms and Conditions for recognition and issuance of Renewable Energy Certificate for Renewable Generation) Regulations, 2010, as amended from time to time, shall also be treated as fulfilment of the RPPO prescribed herein.
- (6) In the event of the Obligated Entity fulfilling the RPPO through self-retention of REC as allowed by the CERC (Terms and Conditions for recognition and issuance of Renewable Energy Certificate for Renewable Generation) Regulations, 2010, as amended from time to time, the application for selfretention shall be towards fulfilment of RPPO of that financial year only; And the Obligated Entity shall make an application accordingly.
- (7) Distribution Licensees shall compulsorily procure 100% power produced from all the Waste-to-Energy plants in the State.
- (8) The renewable power procured by the Obligated Entity from renewable energy generating stations bundled with coal/lignite based thermal generation shall be considered as fulfilment of RPPO;
- (9) Distribution Licensee's RPPO shall include RESCO for the purpose of this Regulation.
- (10) The power from renewable energy sources being purchased by the obligated entity(s) under the existing power purchase agreements shall continue till the validity of the existing agreements, even if the total purchases under such agreements exceed the percentages specified hereinabove.
- (11) The Commission may, either on its own motion or on recommendation of the State Agency or on receipt of an application from the obligated entity(s)or eligible entity(ies), revise for any year the percentage targets given herein above or to carry forward to next year as appropriately deemed fit by the Commission.
- 4. Certificates under the Regulations of the Central Commission.

- (1) The procurement, by the obligated entity(ies) of RECs issued under the CERC (Terms and Conditions for recognition and issuance of Renewable Energy Certificate for Renewable Generation) Regulations, 2010, as amended from time to time, shall be subject to such directions as the Commission may issue from time to time.
- (2) The RECs purchased by the obligated entity from the Power Exchange, or the purchase certificate(s) issued by State Agency in case of self-retention of RECs, shall be deposited by the obligated entity with the State Agency.
- (3) Notwithstanding the above, the State Agency can also independently verify the RECs purchased by the obligated entity from Power Exchange, through Renewable Energy Certificate Registry of India website, and consider the same towards fulfilment of their RPPO.

### 5. Obligated Entity

- (1) Distribution Licensee.
  - (a) Every Distribution Licensee shall, on a yearly basis on or before 15<sup>th</sup> March, submit to the State Agency under intimation to the Commission, the details of the estimated quantum of purchase from renewable energy sources for the ensuing year. The estimated quantum of such purchase shall be in accordance with clause 3.
  - (b) The Distribution Licensee shall also submit a detailed statement to the State Agency under intimation to the Commission at the end of each year in respect of compliance of RPPO and also place it on the website of Distribution Licensee.
  - (c) Despite availability of power from renewable energy sources and certificates, if the Distribution Licensee fails to fulfil its commitment towards minimum purchase from renewable energy sources, it shall be liable to deposit amount into a separate fund as provided in clause 8.
- (2) Captive User and Open Access Consumer.
  - (a) Every captive user and open access consumer shall have to submit in advance necessary details regarding total estimated consumption of electricity and the quantum of power proposed to be purchased from renewable energy sources for fulfilling its RPPO. The details shall be

submitted to the State Agency on a yearly basis on or before 15<sup>th</sup> March under intimation to the Commission.

- (b) The captive user and open access consumer shall submit quarterly status to the State Agency in respect of compliance of RPPO.
- (c) The captive user and open access consumer shall submit under affidavit a detailed statement in respect of compliance of RPPO to the State Agency at the end of each year under intimation to the Commission.
- (d) Captive user and open access consumer shall purchase power from renewable energy sources in accordance with clause 3. They may also fulfil their RPPO through purchase of RECs. If the captive user or open access consumer is unable to fulfil the minimum purchase criteria, then it shall deposit into a separate fund the amount as per clause 8 of this Regulation.

### 6. State Agency

- (1) The State Agency shall function in accordance with the directions issued by the Commission and shall act in accordance with the procedures / rules laid down by Central Agency for discharge of its functions under the CERC (Terms and Conditions for recognition and issuance of Renewable Energy Certificate for Renewable Generation) Regulations, 2010, as amended from time to time.
- (2) The State Agency shall devise an appropriate protocol for collection of information from various sources such as renewable energy generating companies, obligated entity, etc., and compute the compliance of RPPO target by obligated entity.
- (3) The summary statement of RE procurement and RPPO compliance each obligated entity shall be published by the State Agency on a cumulative basis every month on its website.
- (4) The summary statement shall cover RE procurement by each obligated entity comprising renewable energy procurement under preferential tariff route or other modality approved by the State Commission with regard to RPPO as well as renewable energy procurement through REC mechanism.
- (5) The State Agency shall submit status to the Commission in respect of compliance of RPPO by the obligated entity(ies) on yearly basis and initiate

appropriate proceedings before the Commission for compliance verification of the RPPO by the obligated entity(ies).

(6) Remuneration and charges:

The Commission may from time to time based on the proposal in this regard from the State Agency fix the remuneration and charges payable to the State Agency for discharge of its functions under this Regulation. The fee and charges paid by the obligated entities and the renewable energy generating companies shall be collected by the State Agency and utilised for its operations in respect of furthering objects of this Regulation.

Explanation:- The words for its operation would include both technical and administrative action for carrying out the purpose of this Regulation.

- (7) If the Commission is satisfied that the State Agency is not able to discharge its functions satisfactorily, it may by general or special order, and by recording reasons in writing, designate any other agency to function as State Agency as it considers appropriate.
- (8) In the event of the State Agency functions have been withdrawn from the existing agency and notified the new agency, the entire subsisting apparatus both technical and administrative including finances held for this purpose by the earlier agency shall be transferred to the new agency and the decision in this regard of the Commission shall be final.

## 7. Eligibility and Registration for Certificates

- (1) The eligibility and registration of certificates shall be governed by the CERC (Terms and Conditions for recognition and issuance of Renewable Energy Certificate for Renewable Generation) Regulations, 2010 as amended from time to time.
- (2) For the purpose of this clause (7), determination of pooled cost of power purchase shall be as follows:
  - (a) DISCOMs shall submit a petition for computation of pooled cost of power purchase to the Commission by 30<sup>th</sup> April of that year. The Commission shall issue an order relating to pooled cost of power purchase for the particular year as expeditiously as possible after it has been listed for hearing atleast once.

- (b) Till the issue of such order the pooled cost of power purchase of the previous year shall continue to operate as provisional pooled cost of power purchase.
- (c) After the issue of order for the pooled cost of power purchase by the Commission, the difference between the provisional pooled cost of power purchase and the final pooled cost of power purchase shall be paid / recovered as the case may be in equal instalments in the subsequent bills for the next two months or as decided by the Commission in the order while determining the pooled cost of power purchase for that year.
- (d) Where there is a general PPA and such PPA involves or extends the situation of payment of pooled cost of power purchase, then the licensees shall endeavour to prepare a draft amendment to such agreement on a generic basis and submit the same for approval to the Commission.
- (e) After thorough examination and after following the due process under the Conduct of Business Regulation, 2015 as amended from time to time, the Commission may accord approval to the draft PPA or amendments to the subsisting PPA(s).
- (f) Each such PPA or amendment PPA shall have to be submitted to the Commission for consent even if there is no deviation from model PPA approved by the Commission.

## 8. Consequences of default.

(1) If the obligated entity does not fulfil the RPPO as provided in clause 3 of this Regulation during any year, the Commission may direct the obligated entity to deposit into a separate fund, to be created and maintained by the State Agency, such amount on the basis of the shortfall in units of the RPPO and the Forbearance Price decided by the Central Commission;

Provided that the fund so created shall be utilised in the manner as may be specified by the Commission either through general or special order.

(2) Where any obligated entity fails to comply with the obligation prescribed in clause 3 of this Regulation, it shall, in addition to the compliance of the directions under clause 8.1 above, be liable for penalty as may be decided by the Commission u/s 142 of the Act.

- (3) For this purpose, the Commission may initiate proceedings either suo moto or on a representation made by any of the affected parties including but not limited to the State Agency.
- (4) Such proceedings shall be in accordance with the Conduct of Business Regulation, 2015 of the Commission.

### 9. Information System.

- (1) The State Agency shall post the following documents/information on its website in a separate web-page titled "Accreditation of RE Projects":
  - (a) This Regulation;
  - (b) Procedure as mentioned in this Regulation;
  - (c) List of applications along with necessary details received by the State Agency for accreditation;
  - (d) List of accreditations granted, indicating
    - i. Name of RE generating company/station;
    - ii. Point of injection;
    - iii. Capacity (MW) for which accreditation has been granted.
  - (e) List of applications where approval for accreditation has not been granted along with reasons thereof;

#### 10. Power to Amend

(1) The Commission may, at any time add, vary, alter, modify or amend any provisions of this Regulation.

#### 11. Power to issue directions

(1) The Commission may, from time to time, issue orders and practice directions in regard to the implementation of the Regulation and procedures to be followed.

#### 12. Power to relax

(1) The Commission may by general or special order, for reasons to be recorded in writing and after giving an opportunity of hearing to the parties likely to be affected, may relax any of the provisions of this Regulation on its own motion or on an application made before it by an interested person.

#### 13. Power to remove difficulties

(1) If any difficulty arises in giving effect to the provisions of this Regulation, the Commission may, by general or special order, make such provisions not inconsistent with the provisions of the Act, as may appear to be necessary for removing the difficulty.

# 14. Saving

- (1) Anything done or any action taken or purported to have been done in pursuance of the provisions of the Regulation No. 2 of 2018 shall in so far as it is not inconsistent with the provisions of this Regulation, be deemed to have been done or taken under the corresponding provisions of this Regulation.
- (2) Any rights and liabilities arising out of the earlier Regulation shall be settled within the applicable provisions as may be appropriately relevant.

# 15. Inquiry, investigation and adjudication

(1) All inquiries, investigations and adjudications under this Regulation shall be done by the Commission through the proceedings in accordance with the provisions of the Conduct of Business Regulations as amended from time to time.

# (BY ORDER OF THE COMMISSION)

Hyderabad, 09.03.2022

Sd/-(UMAKANTA PANDA) COMMISSION SECRETARY<sub>[FAC]</sub> TSERC