JOINT ELECTRICITY REGULATORY COMMISSION
FOR THE UT OF JAMMU & KASHMIR AND THE UT OF LADAKH.
To be published in Extra-Ordinary Part III Section 4
NOTIFICATION

Jammu, the _____, 2023

No. JERC-JKL/REG/2023/…… — Whereas, in the exercise of powers conferred under Section 61(h), and Section 86(1) (e) read with sub-section (I) and clause (zd) and (zi) of sub-section (2) of Section 181 of the Electricity Act, 2003 (No. 36 of 2003) and all powers enabling it in that behalf, the Joint Electricity Regulatory Commission for UT of Jammu & Kashmir and UT of Ladakh hereby makes the following Regulations, namely:

Joint Electricity Regulatory Commission for the UT of Jammu & Kashmir and the UT of Ladakh (Grid Interactive Renewable Energy system and its related matters) Regulations, 2023

1. Short Title, Commencement, and extent

1.1 These Regulations may be called the Joint Electricity Regulatory Commission for the UT of Jammu & Kashmir and UT of Ladakh (Grid Interactive Renewable Energy system and its related matters) Regulations, 2023.

1.2 These Regulations shall come into force from the date of publication in the official gazette.

1.3 These Regulations shall extend to the UT of Jammu & Kashmir and the UT of Ladakh.

2. Definitions, Abbreviations, and Interpretations

2.1. In these Regulations, unless the context otherwise requires:

(1) **"Act"** means the Electricity Act, 2003 (36 of 2003), and subsequent amendments thereof;

(2) **"Average Power Purchase Cost" (APPC)** means the weighted average price at which the Distribution Licensee has purchased or is expected to purchase electricity (excluding procurement from RE sources), including the cost of self-generation, if any, as approved by the Commission in the relevant Retail Supply Tariff Order or any other general or specific Order;

(3) **"Authority"** means the Central Electricity Authority referred to in sub-section (1) of Section 70 of the Act;

(4) **"Billing cycle"** means the period for which regular electricity bills as specified by the Commission,are prepared for different categories of consumers by the Licensee;

(5) **"COD"** or **"Commercial Operation Date"** or **"Date of commercial operation"** mean the date onwhich the Renewable Energy system is synchronized with the grid system;

(6) **"Check Meter"** means a meter, which shall be connected to the same core of the current transformer (CT) and voltage transformer (VT) to which the Renewable Energy Meter is connected and shall be used for accounting and billing of electricity in case of failure of the main meter or Renewable Energy Meter;

(7) "**Commission**" means the Joint Electricity Regulatory Commission for the UT of Jammu & Kashmir and UT of Ladakh constituted under the Act;

(8) "**Connection Agreement**" means the Gross metering or net-billing (net feed-in) or net-metering inter-connection Agreement entered into between the Distribution Licensee and the Consumer;

(9) "**Consumer"** means a consumer as defined in the Act;

(10) **"Consumer Grievances Redressal Forum (CGRF)"** means the forum for redressal of grievances of Consumers, established under section 42(5) of the Act;

(11) **"Contracted Load"** or **"Contract Demand"** means the maximum demand in kW, kVA, or HP, agreed to be supplied by the Distribution Licensee and as indicated in the Agreement executed between the Licensee and the Consumer;

(12) **"Distribution Licensee"** means a person granted a License under Section 14 (b) of the Act authorizing him to operate and maintain a distribution system and supply electricity to the consumersin his area of supply;

(13) **"Electricity Supply Code"** means the Electricity Supply code specified by the Commission under section 50 of the Act;

(14) **"Eligible Consumer"** means a consumer of electricity in the area of supply of the Distribution Licensee, who intends to use a renewable energy system in his premises to offset all or part or no part of the own 's electrical requirements, given that such systems can be self-owned or third party leasing such system to the consumer;

(15) **"Feed-in-Tariff"** means the Generic Tariff determined by the Commission for the generation of electricity from Renewable Energy projects for Gross Metering or net-billing in accordance with the Terms and Conditions for Tariff determination from Renewable Energy Sources Regulation framed by the Commission;

(16) "**Grid**" means the low voltage electrical network, the distribution, and transmission network, or the high voltage backbone system of inter-connected transmission lines, sub-stations, and generating plants, for the sale of energy or wheeling of energy as defined in these Regulations;

(17) "**Gross-metering**" means a mechanism whereby the total energy generated from the Grid Interactive Renewable Energy system of a Prosumer and the total energy consumed by the Prosumer is accounted separately through appropriate metering arrangements and for the billing purpose; whereas, the total energy consumed by the Prosumer is accounted at the applicable retail tariff and total renewable energy generated is accounted for at feed-in tariff determined by the Commission.

(18) **Group Net Metering"** means an arrangement whereby surplus energy is generated and injected from a Renewable Energy System through Net Meter and the exported energy is adjusted in more than one electricity service connection(s) of the same consumer either at the same or different premise located within the same Distribution Licensee's area of supply;

(19) "**Installed Capacity**" means the summation of the nameplate capacities expressed in kWp of all the units of the Renewable Energy system or the capacity of the Renewable Energy system reckoned at the output terminals, approved by the Commission;

(20) "**Interconnection Point for net billing / net metering arrangement**" means the interface of the Renewable Energy generating system with the outgoing terminal of the meter in the premises of the prosumer:

Provided that, in case the prosumer is connected at the High Tension (HT) level, the "Interconnection Point" shall mean the interface of the Renewable Energy Generating System with the outgoing terminal of the Distribution Licensees' metering equipment.

(21) "**Interconnection Point for Gross metering arrangement**" means the interface of the Renewable Energy Generating System with the incoming terminal of the meter in the premises of the prosumer:

Provided that, in case the prosumer is connected at the High Tension (HT) level, the "Interconnection Point" shall mean the interface of the Renewable Energy Generating System;

(22) **"Invoice"** means a periodical Bill/Supplementary Bill or an Invoice/ Supplementary Invoice by the Distribution Licensee to the Consumer;

(23) **"Islanding"** means an electrical system phenomenon in which distributed generators, powered through Renewable Energy System, continue to power a site or location in the absence of external grid power or grid outage situations.

(24) **"Month"** means English calendar month starting with 1st day/date of the month and ending with

the last day/date of the month. Part Month will be applicable for a number of days in proportion to the total number of days in the specific month;

(25) **"Net-billing or Net feed-in"** means a single bidirectional energy meter used for net-billing or net feed-in at the point of supply wherein the energy imported from the Grid and energy exported from Grid Interactive Renewable Energy system of a Prosumer is valued at two different tariffs, where-

(i) the monetary value of the imported energy is based on the applicable retail tariff;
(ii) the monetary value of the exported Renewable energy is based on a feed-in tariff determined by the Commission;
(iii) the monetary value of the exported energy is deducted from the monetary value of the imported energy to arrive at the net amount to be billed (or credited/carried over);

(26) **"Net metering"** means a mechanism whereby renewable energy exported to the grid from Grid Interactive Renewable Energy system of a Prosumer is deducted from energy imported from the Grid in units (kWh) to arrive at the net imported or exported energy and the net energy import or export is billed or credited or carried-over by the distribution licensee on the basis of the applicable retail tariff by using a single bidirectional energy meter for net-metering at the point of supply;

(27) **"Net Meter"** means an appropriate bi-directional energy meter capable of recording both imports from the grid and export of electricity generated at Renewable Energy system;

(28) **"Obligated Entity"** means the licensed Supplier of Power, Distribution Licensee(s), Captive user(s), and Open Access Consumer(s), identified under Procurement of Renewable Energy Regulations framed by the Commission; and mandated under clause (e) of subsection (1) of Section 86 of the Act to fulfill the Renewable Purchase Obligations as determined by the Commission from time to time;

(29) **"Ombudsman"** means the person appointed in accordance with Section 42 (6) read with Section 181of the Act;

(30) **"Open Access Consumer"** means a person permitted to use an Intra-State Transmission System and /or Distribution System to receive a supply of electricity from a person other than the Distribution Licensee of his area of supply, and the expression includes a Generating Company and a Licensee, who has availed of or intends to avail of Open Access;

(31) "**Project Developer**" means the developer of the RE Project, who shall develop such a project on his own premises or on premises taken on lease or rent;

(32) "**Prosumer**" means a person who consumes electricity from the grid and can also inject electricity into the grid for distribution licensee, using the same point of supply.

(33) **"Premises"** means and includes roof-tops or any areas on the land, building or infrastructure, or part or combination thereof in respect of which a separate meter or metering arrangement has been provided by the distribution licensee for the supply of electricity.

(34) **"Renewable Energy''** means the grid-connected and grid-quality electricity generated from Renewable Energy sources, including a combination of such sources;

(35) **"Renewable Energy Certificate (REC)"** means the certificate issued in accordance with the Regulations and the procedures approved by the Central Electricity Regulatory Commission;

(36) **"Renewable Energy Generating System"** means the Renewable Energy power system with or without energy storage installed on a Consumer's premises, and owned and/or operated by such Consumer or a third party, that uses Renewable Energy for conversion into electricity;

(37) **"Renewable Energy Meter"** means the meter used for measuring the gross Renewable energy units generated by the RE Project for the purpose of accounting and billing;

(38) **"Renewable Energy sources"** means the renewable sources or combination of such sources, such as Mini, Micro and Small Hydro, Wind, Solar, Biomass including bagasse, bio-fuel, urban or

Municipal Solid Waste as defined in the Terms and Conditions for Tariff Determination from Renewable Energy Sources regulation framed by the Commission and such other sources as are recognized or approved by the Ministry of New and Renewable Energy, Government of India;

(39) **"Renewable Purchase Obligations (RPO)"** means renewable power purchase obligations specified by the Commission;

(40) **"Sanctioned Load"** means the load in kW, kVA, or HP, which the Licensee has agreed to supply from time to time subject to the governing terms and conditions in the absence of an Agreement between the Distribution Licensee and the consumer;

(41) **"Settlement Period"** means the period beginning from the first day of April as per the English calendar year and ending with the thirty-first day of March of the next year;

(42) **"Solar Grid Inverter"** means equipment that converts the DC (direct current) power from Solar Power modules to Grid-compatible AC (alternating current) power;

(43) **"State Nodal Agency"** means the agency in the concerned State or Union Territory as may be designated by the Commission to act as the agency for accreditation and recommending the renewable energy projects for registration and to undertake such functions as may be specified under clause (e) of sub-section (1) of Section 86 of the Act;

(44) **"Tariff Order"** in respect of a Licensee means the applicable retail Tariff Order issued by the Commission for that Licensee indicating the tariff to be charged by the Licensee from various categories of Consumers for the supply of electrical energy and services;

(45) **"Third Party Owned"** means a Renewable Energy system Project owned by a Project Developer that is installed onthe roof or the Premises as defined in 1(29) above for which a commercial lease or revenue share agreement has been entered into by the Project Developer with the owner;

(46) **Virtual Net Metering"** means an arrangement whereby entire energy generated from a renewable energy generation project installed at Consumer premise or any other location is injected through Solar Energy Meter and the energy exported is adjusted in either one or more than one electricity service connection(s) of participating Consumer(s) located within the same Distribution Licensee's area of supply;

(47) **"Year"** or **"Financial Year"** means a period commencing on 1st April of an English calendar year and ending on 31st March of the subsequent calendar year.

2.2. **Abbreviations:** In these Regulations, the following shall be interpreted as:

i. **"EPC"** means Engineering Procurement & Construction Contractor authorized by the DistributionLicensee;

ii. **"kWp"** means kilo Watt peak, a term used as a rating of the Solar Plant;

iii. "**MNRE**" means the Ministry of New and Renewable Energy of the Government of India;

2.3. All other words and expressions used in these Regulations if not specifically defined herein above, but defined in the Act, shall have the meaning assigned to them in the Act. The other words and expressions used herein but not specifically defined in these Regulations or in the Act but defined under any other law passed by the Parliament applicable to the electricity industry in the State or Union Territory shall have the meaning assigned to them in such law.

3. Scope of Regulations and Extent of Application

3.1 These Regulations would apply to:

a. Gross Metering Arrangements
b. Net Billing (net feed-in) Arrangements
c. Net - Metering arrangements including Group Net Metering & Virtual Net Metering

Provided that the gross metering or net-billing or net-metering arrangement, as the case may be for the eligible consumers shall be allowed subject to technical feasibility.

Provided that the Group Net Metering Framework shall be applicable to all Consumers, whereas the Virtual Net Metering Framework shall be applicable to residential consumers, Group Housing Societies, and establishments of Government/Local Authorities.

3.2 These Regulations shall be applicable to all Grid Interactive Distributed Renewable Energy generating systems that are commissioned after notification of these Regulations.

4. Eligibility Criteria

4.1 The Eligible Consumer of all categories may set up the Renewable Energy Generating System under the Net Metering Arrangement up to 500 kW capacity.

Provided that the RE generating system of a rating higher than 500 kW can be considered by the Distribution Licensee if the distribution system remains stable with a higher rating RE Project gets connected to the grid.

4.2 The Eligible Consumer of all categories may set up the Renewable Energy Generating System under the Net-Billing Arrangement above 500 kW and a maximum up to 1 MW.

4.3 The Eligible Consumer of all categories may set up the Renewable Energy Generating System under the Gross Metering Arrangement maximum up to 1 MW.

Provided that the distribution utilities may allow Renewable Energy generating system of rating higher than **1MW under net-billing or gross metering** after conducting load flow studies and ascertaining that the installation of such higher capacity of Renewable Energy generating systems do not have any adverse impact on the grid.

4.4 Provided that the eligible consumer can opt for only one arrangement i.e., either net metering or net-billing or gross metering arrangement within the same premises, as specified in these Regulations.

4.5 The minimum size of the Renewable Energy Generating System that can be set up under Net Metering, Net-Billing, or Gross Metering Arrangement would be 1 kW.

4.6 The capacity of the RE generating system to be installed under Group Net Metering or Virtual Net Metering framework shall not be less than 5 kW and more than 500 kW.

4.7 The capacity of the Renewable Energy Generating System to be installed under Net Metering/ Group Net Metering/ Virtual Net Metering or Net-Billing or Gross Metering Arrangement at the Eligible Consumer's premises shall not exceed the Sanctioned load (in kW) or the Contract Demand (in kVA) of the Consumer, as applicable.

4.8 Consumers with pending arrears with the Distribution Licensee shall not be eligible for Net Metering or Net Billing or Gross Metering Arrangement under these Regulations.

4.9 Net-Metering including Group Net Metering and Virtual Net Metering or Net-Billing or Gross Metering arrangement, as the case may be, shall be permitted by the Distribution Licensee on a non-discriminatory and Distribution Transformer-wise 'first come, first serve' basis to the Eligible Consumers who have installed or intend to install a Renewable Energy Generating System connected to the Network of such Distribution Licensee;

Provided that the inter-connection of such System with the Network of the Distribution Licensee is undertaken in accordance with the standards and norms specified in the Central Electricity Authority (CEA) (Technical Standard for Connectivity of the Distributed Generation Resources) Regulations, 2013 or as may be specified in future.

5. Third-Party Owned Renewable Energy System

5.1 In the third party owned Renewable Energy system, the following conditions shall apply:

a. The Consumer may lease out / rent the Rooftop Space to a Project Developer on a mutual commercial arrangement for setting up a Renewable Energy system under Net Metering including

Group Net Metering and Virtual Net Metering or Net Billing or Gross Metering framework. The Consumer will pay the Project Developer for all the energy generated by the Renewable Energy system at a mutually agreed tariff. The commercial arrangement between the Project Developer and the Prosumer will be submitted to the Distribution Licensee for records and the Distribution Licensee will not have any role in a such commercial arrangement. All the provisions of the Net Metering or Net Billing or Gross Metering framework shall be applicable to the Renewable Energy system set up by a Project Developer.

b. The Distribution Licensee / Nodal Agency may explore other business models that may facilitate the proliferation of Grid-connected Renewable Energy systems. For any new business model not envisaged in these Regulations, the Commission will approve the framework for such a business model based on the specific Petition to be filed in this regard.

6. Capacity limits at the Distribution Transformer level.

6.1 The Distribution Licensee shall allow Gross Metering / Net Billing / Net Metering including Group Net Metering and Virtual Net Metering Arrangement as the case may be, to Eligible Consumers as specified in these Regulations.

6.2 The cumulative capacity of all Renewable Energy Generating Systems under Net Metering, Group Net Metering, Virtual Net Metering Arrangements, and/or Net Billing Arrangements connected to a particular Distribution Transformer/feeder of the Licensee shall be allowed up to 100% of its rated capacity.

6.3 The Distribution Licensee shall update on a yearly basis for each of the Distribution Transformers, the Distribution Transformer capacity available for connecting the Renewable Energy system and shall provide the information on its website, as well as to the Commission.

6.4 A Distribution Licensee must monitor the capacity limit of DT on a regular basis and shall refuse to connect the new RE system connection or arrangement once DT capacity reaches 100% of its rated capacity.

7. Metering Arrangement

7.1 The metering system shall be as per the Central Electricity Authority (Installation & Operation of Meters) Regulations, 2006, as amended from time to time.

7.2 All meters shall have Advanced Metering Infrastructure (AMI) facility with RS 485 (or higher) communication port or any other advanced communication facility.

7.3 Net Meter of the same accuracy class as the Consumer's meter existing before the commissioning of the Renewable Energy system, shall be installed in replacement of the existing meter:

Provided that, if the prosumer is within the ambit of the Time-of-Day ('ToD') Tariff, the Net Meter installed shall be capable of recording ToD consumption and generation:

Provided further that such Meters may be provided by the Distribution Licensee or the Consumer, subject to the same being from the approved list of the suppliers:

Provided also that if the Meter is installed by the Distribution Licensee, its cost shall be recovered from the Consumer before the COD of the Project.

7.4 The Renewable Energy Meter (a unidirectional meter) is to be installed as an integral part of the Net Metering or Net Billing or Gross Metering arrangement as the case may be, at the point at which the electricity is generated by the Renewable Energy system and delivered to the main panel. The Renewable Energy Meter shall have a facility for recording meter readings using Meter Reading Instrument (MRI) or wireless equipment.

7.5 Check Meters shall be mandatory for Renewable Energy systems having a capacity of more than 20 kW. For installations having a capacity less than or equal to 20 kW, the Check Meters would be optional:

Provided that the cost of the Check Meter shall be borne by the Consumer, and such meter shall be tested and installed by the Distribution Licensee.

7.6 The Distribution Licensee shall be responsible for the installation, testing, and maintenance of the metering

equipment/system and its adherence to the applicable standards and specifications.

7.7 The Meters installed, if arranged by the Consumer, shall be inspected, verified for accuracy, and sealed by the Distribution Licensee in the presence of the Consumer or its representative (if he chooses to be present at the time of testing).

7.8 The meters installed shall be jointly inspected and sealed on behalf of both the parties and shall be tested or checked only in the presence of the consumer and representatives of the Distribution licensee:

Provided that the prosumer shall follow the metering specifications, and provisions for placement of the meter as provided by the Distribution licensee from time to time.

7.9 The meter reading taken by the distribution licensee shall form the basis of commercial settlement.

8. Inter-connection with the Distribution Network, Standards, and Safety

8.1 The Distribution Licensee shall ensure that the inter-connection of the Renewable Energy system with its distribution network conforms to the specifications, standards, and other provisions specified in the CEA (Technical Standard for Connectivity of the Distributed Generation Resources) Regulations, 2013, CEA (Technical Standards for Connectivity to the Grid) Regulations, 2007 including amendments thereto, the CEA (Measures relating to Safety and Electric Supply), Regulations, 2010 including amendments thereto and the Electricity Supply Code Regulations and the state grid code regulations framed by the Commission.

8.2 Renewable Energy generation with Net metering including Group Net Metering and Virtual Net Metering or Net Billing or Gross Metering arrangement will be allowed for all the eligible Consumers of the Distribution Licensee under the jurisdiction of the Commission with/without battery backup support:

Provided that, if an Eligible Consumer opts for connectivity with a battery back-up, the inverter shall have a separate backup wiring to prevent the battery/ decentralized generation (DG) power from flowing into the grid in the absence of grid supply, and that an automatic as well as manual isolation switch shall also be provided.

Provided further that the Inverter shall comply with the Standards prescribed in **Annexure1.**

8.3 The prosumer shall be responsible for the safe operation, maintenance, and rectification of any defect in the Renewable Energy system up to the point of Net Meter, beyond which point such responsibility, including in respect of the Net Meter, shall be that of the Distribution Licensee:

Provided that the Renewable Energy Meter shall be maintained by the Distribution Licensee.

Provided that in case of replacement of defective Net Meter or Renewable Energy Meter, it shall be provided by the prosumer, as mentioned in the proviso to Regulation 7.3 above, and installed as per relevant regulations in force as mentioned in Regulation 7.1 above.

8.4 The prosumer shall provide appropriate protection for islanding of the Renewable Energy system from the network of the Distribution Licensee in the event of grid or supply failure.

8.5 The prosumer shall be solely responsible for any accident to human being/ animals whatsoever (fatal/non-fatal/departmental/non-departmental) that may occur due to back feeding from the Renewable Energy system when the grid supply is off:

Provided that the Distribution Licensee shall have the right to disconnect the Renewable Energy system from its distribution network at any time in the event of any threat of accident or damage from such Project to its distribution system, for maintenance of the distribution system so as to avoid any accident or damage to it:

Provided further that the prosumer may use his Renewable Energy system in islanding mode for his own consumption.

8.6 The Distribution Licensee and prosumer shall discharge their respective duties and responsibilities as specified in the relevant Regulations of the Central Electricity Authority.

8.7 HT Consumers opting for Net Metering shall not be required to provide separate connectivity for the Renewable Energy system at the HT voltage level for consumption at LT Level.

9. Communication Facilities

9.1 All grid interactive Renewable Energy systems shall have electricity meters with features to record energy for data storage for injection into the grid through Energy Meter as provided under these Regulations:

Provided that all projects shall have a communication port for exchanging real-time information with the Distribution Licensee:

Provided further that all Meters shall have Advanced Metering Infrastructure (AMI) facility.

10. Billing, Energy Accounting and Settlement

10.1 Net Metering Arrangement

a. The accounting of electricity exported from the Renewable Energy system and imported from the Grid by the prosumer shall become effective from the date of connectivity of the Renewable Energy system with the distribution network.

b. The Distribution Licensee shall undertake meter readings of both, the Renewable Energy Generation Meter and the Net Meter, for all prosumers, according to the regular billing cycle.

c. For each billing period, the Distribution Licensee shall show separately: -

i. Quantum of Renewable Energy generation recorded in the Renewable Energy Generation Meter in the billing period, including opening and closing balance
ii. Quantum of electricity Units exported by the prosumer, including opening and closing balance;
iii. Quantum of electricity Units imported by the prosumer, including opening and closing balance;
iv. Net quantum of electricity Units billed for payment by the prosumer; and
v. Net quantum of electricity Units carried over (if surplus) to the next billing period;
vi. Units from Renewable Energy generation used by the Distribution Licensee for RPO compliance.

d. The energy generated by the Renewable Energy Generating Station shall be offset against the energy consumption of the consumer from the Distribution Licensee in the following manner:

i. If the quantum of electricity exported exceeds the quantum imported during the billing period, the excess quantum shall be carried forward to the next billing period as credited Units of electricity;
ii. If the quantum of electricity Units imported by the prosumer during any billing period exceeds the quantum exported, the Distribution Licensee shall raise its bill for the net electricity consumption after adjusting the credited Units as per applicable Tariff Order.
iii. In case the prosumer is within the ambit of the Time of Day (ToD) tariff, the electricity consumption in any time block, i.e., peak hours, off-peak hours, etc., shall be first compensated with the quantum of electricity injected in the same time block:
Provided that any excess injection over and above the consumption in any other time block in a billing cycle shall be accounted as if the excess injection had occurred during off-peak hours.

e. The unadjusted net credited Units of electricity at the end of each financial year shall be considered as units purchased by the Distribution Licensee at the Average Power Purchase cost of the concerned Distribution Licensee or Feed-in-Tariff determined for that Year whichever is lower.

Provided that, at the beginning of each Settlement Period, the cumulative quantum of injected electricity carried forward will be re-set to zero.

f. The Distribution Licensee shall compute the amount payable to the prosumer, latest by April 30th of the following year for the unadjusted net credited Units purchased by it during the financial year as specified in Regulation 10.1(e), and shall pay the amount to the eligible consumer by May 31st of the following year.

g. The Distribution licensee in addition to consumer tariff shall be eligible to raise the bill for any other charges as allowed by the Commission and any tax/duty/cess imposed by the Government.

h. The consumer whose entitlement as a consumer of the licensees is ceased or he is not settling his dues to the licensee, shall not be entitled to receive the due amount of the adjustment/credit.

i. The prosumer shall have recourse, in case of any dispute with the Distribution Licensee regarding billing, to the mechanism specified by the Commission under Sections 42 (5) to (7) of the Act for the redressal of grievances.

10.2 **In the case of Group Net Metering, the billing and energy accounting shall be dealt with as under:**

a. Where the export of units during any billing period exceeds the import of units at the connection where the renewable energy generating Project is located, such surplus units injected into the grid shall be adjusted against the energy consumed in the monthly bill of service connection(s) in a sequence indicated in the priority list provided by the Consumer. The sequence of priority for adjustment shall be deemed to have begun with the service connection where the renewable energy generating Project is located;

b. The priority list for adjustment of the balance surplus energy against other electricity connection(s) may be revised by the Consumer once at the beginning of every financial year with an advance notice of two months;

c. The electricity consumption in any time block (e.g., peak hours, off-peak hours, etc.) shall be first compensated with the electricity generation in the similar time blocks in the same billing cycle of the Consumer where the renewable energy generating Project is located, and any surplus units injected shall be adjusted against the energy consumed in the monthly bill of service connection(s) in a sequence indicated in the priority list provided by the Consumer, as if the surplus generation/ Energy Credits occurred during the off-peak time block for Time of Day (ToD) Consumers and normal time block for Non-ToD Consumer;

d. Where during any billing period, the export of units either in Non-ToD Tariff or ToD Tariff exceeds the import of units by the electricity service connection(s), such surplus units injected by the Consumer shall be carried forward to the next billing period as energy credit and shown as energy exported by the Consumer for adjustment against the energy consumed in subsequent billing periods within the Settlement Period in the sequence indicated in the priority list;

e. For unadjusted net credited Units of electricity at the end of each financial year, the provisions of Clause 10.1 (e) will be applicable for the connection where the renewable energy generating Project is located.

10.3 **In case of Virtual Net Metering, the billing and energy accounting shall be dealt with as under:**

a. The energy generated from the renewable energy generating Project shall be credited in the monthly electricity bill of each participating consumer(s) as per the ratio of procurement from renewable energy generating Project indicated under the agreement/MoU entered on a stamp paper by the Consumer(s) and submitted to the Distribution Licensee;

b. The Consumer(s) shall have the option to change the share of credit of electricity from renewable energy generating Project by submitting a fresh Agreement/MoU on a stamp paper subject to the ratio of procurement from renewable energy generating Project indicated under the agreement/MoU entered by the Consumer(s) once at the beginning of the financial year with an advance notice of two months;

c. Where the service connection of any participating consumer(s) is disconnected due to any reason under any law for the time being in force, the unadjusted units/remaining credits of that consumer shall be paid by the Distribution Licensee at the end of the financial year;

d. The electricity consumption in any time block (e.g., peak hours, off-peak hours, etc.) shall be first compensated with the electricity generation in the similar time blocks in the same billing cycle of the participating consumer(s). Any surplus generation over consumption in any time block in a billing cycle shall be accounted as if the surplus generation/ Energy Credits occurred during the off-peak time block;

e. Where the units credited during any billing period of any participating Consumer exceeds the import of units by that consumer, such surplus credited units shall be carried forward in the next billing period as energy credits for adjustment against the energy consumed in subsequent billing periods within the settlement period of each participating Consumer(s);

f. For unadjusted net credited Units of electricity at the end of each financial year, the provisions of Clause 10.1 (e) will be applicable for each participating Consumer(s).

(g) Net Billing Arrangement

a. Net billing is the arrangement where the Renewable Energy Generating system is:

i. Connected on the consumer side of the net meter,

ii. Selling excess power after meeting own requirement (export of power) to a Distribution Licensee at feed–in tariff approved by the Commission:

iii. Import of power if any from the distribution licensee shall be charged as per applicable Tariff Order.

b. The Distribution Licensee shall undertake meter readings of both, the Renewable Energy Generation Meter and the Net Meter, as applicable, according to the regular billing cycle.

c. For each Billing Period, the Distribution Licensee shall make the following information available on its bill to the Eligible Consumer:

i. Quantum of Renewable Energy generation recorded in the Renewable Energy Generation Meter, including opening and closing balance;

ii. Quantum of electricity units exported to the grid by the prosumer in the billing period, including opening and closing balance;

iii. Quantum of electricity units imported from the grid by the prosumer in the billing period, including opening and closing balance;

iv. Amount of billing credit, if any, in the billing period, including opening and closing balance;

v. Units from Renewable Energy generation used by the Distribution Licensee for RPO compliance.

d. The Distribution Licensee shall raise the net bill as per the billing cycle after accounting for the units exported by the Renewable Power Developer at feed–in tariff approved by the Commission and after accounting for units imported from grid at applicable Tariff Order.

e. The Distribution Licensee shall raise bill on the prosumer in accordance with the following equation:

Energy Bill of consumer = Fixed Charges + other applicable charges and levies + (E_{DL}x T_{RST}) - (E_{RE} * T_{PPA}) – Billing Credit (Carried forward from last billing cycle);

Where:

i. Fixed Charges means the Fixed/Demand Charges as applicable to the consumer category as per the applicable retail supply Tariff Order;

ii. Other applicable charges and levies mean any other charges such as duty, cess, etc.;

iii. E_{DL} means the imported energy units from the Distribution Licensee as recorded by in the bidirectional meter for the billing period;

iv. T_{RST} means the applicable retail supply tariff of the concerned consumer category as per the applicable Tariff Order of the Commission;

v. E_{RE} means the export energy units recorded for the billing period by the bidirectional meter;

vi. T_{PPA} means the feed–in tariff approved by the Commission as per the Agreement entered between the Consumer and Distribution Licensee, in accordance with Regulation 16;

vii. **Billing Credit** is the amount by which the value of exported Renewable Energy generation in a particular month is more than the value of imported units from the distribution licensee including all other components of the consumer bill.

f. In case the consumer is subjected to time-of-day tariffs, the energy bill (E_{DL}x T_{RST}) shall be computed accordingly.

g. In case **(E_{RE} * T_{PPA})** is more than {Fixed charges + other applicable charges and levies + (E_{DL}x T_{RST})}, the utility shall give credit of an amount equal to the difference (Billing Credit), which shall be carried forward to the next billing cycle. No interest shall be payable by Distribution Licensee on such credit amount carried forward.

h. The net bill amount for a billing period, if payable by the prosumer, then the same shall be paid by the prosumer within the due date of the bill.

i. At the end of each Financial Year, any amount payable by Distribution Licensee remaining unadjusted during the financial year shall be paid to the prosumer latest by the end of May of the following Financial Year.

j. The consumer whose entitlement as a consumer of the licensees is ceased or he is not settling his dues with the licensee, shall not be entitled to receive the due amount of the adjustment/credit.

k. The prosumer shall have recourse, in case of any dispute with the Distribution Licensee regarding billing, to the mechanism specified by the Commission under Sections 42 (5) to (7) of the Act for the redressal of grievances.

10.4 **Gross Metering Arrangement**

a. The Distribution Licensee shall undertake meter readings of both, the Renewable Energy Generation Meter and the Consumer Meter for all prosumers, according to the regular billing cycle.

b. For each billing period, the distribution licensee shall make the following information available on its bill to the prosumer:

i. Quantum of Renewable Energy generation recorded in the Renewable Energy Generation Meter, including opening and closing balance;

ii. Quantum of electricity units consumed from the grid by the prosumer in the billing period, including opening and closing balance;

iii. Units from Renewable Energy generation used by the Distribution Licensee for RPO compliance

c. The energy accounting and settlement procedure for consumers installing and operating Renewable Energy systems under gross metering arrangement shall be as per the following procedure:

i. For each billing period, the Licensee shall show the quantum of electricity injected by the Renewable Energy System installed at the premises of the prosumer in the billing period.

ii. The Distribution Licensee shall reimburse the prosumer for the quantum of injected electricity by the Renewable Energy System during the billing period at the Feed-in-Tariff determined by the Commission for that year.

Provided further that, the above Tariff shall be applicable for the entire duration of the Agreement.

iii. For each billing period, the Licensee shall show the quantum of electricity consumed from the grid by the prosumer in the billing period.

iv. The Distribution Licensee shall prepare the bill for energy consumed from the grid as per the Tariff Order approved by the Commission including fixed Charges /Demand Charges and other applicable charges and levies as applicable to the consumer category as per the applicable Tariff Order;

v. The Distribution licensee shall prepare the net bill according to the amount payable by the licensee to the prosumer and amount payable by the prosumer to the licensee for the energy consumed from the grid.

vi. The net amount payable by the licensee or the prosumer, as the case may be, shall be paid within the due date mentioned in the bill.

d. The consumer whose entitlement as a consumer of the licensees is ceased or he is not settling his dues with the licensee, shall not be entitled to receive the due amount.

e. The prosumer shall have recourse, in case of any dispute with the Distribution Licensee regarding billing, to the mechanism specified by the Commission under Sections 42(5) to (7) of the Act for the redressal of grievances.

11. Penalty or Compensation – Failure of the Metering System

11.1 In case of failure of metering system, the provisions of penalty or compensation shall be as per the provisions of the Standards of Performance for Distribution Licensees Regulations regulation framed by the Commission for the Distribution Licensee.

11.2 In case of failure to meet the timelines prescribed under these Regulations, the distribution licensee shall be liable to pay compensation to the consumer as specified under Regulation 15.1 (l) below.

12. Late Payment Surcharge

In case the payment by the Distribution Licensee under Regulation 10.1 (e) and Regulation 10.2 (i) above, is delayed beyond 31st of May of that year, a Late Payment Surcharge at the rate of 1.25% per month from the delay beyond 31st May shall be levied on the Distribution Licensee.

13. Charges for Banking of RE Power

The Renewable Energy Projects, whether self-owned or third-party owned installed under these Regulations, shall be exempted from charges in respect of banking of electricity.

14. Renewable Purchase Obligation and Eligibility to Participate under REC Mechanism

14.1 The quantum of electricity consumed by the prosumer from the Renewable Energy Project under the Net Metering Arrangement shall qualify towards his compliance of RPO, if such prosumer is an Obligated Entity.

14.2 The quantum of electricity consumed by the prosumer from the Renewable Energy Project owned and installed under the Net Metering arrangement shall, if such prosumer is not an Obligated Entity, qualify towards meeting the RPO of the Distribution Licensee.

14.3 The unadjusted net credited Units of Renewable Energy purchased by the Distribution Licensee under the provisions of Regulation 10.1 (e) above, shall also qualify towards meeting its RPO.

14.4 In case of Net Billing or Gross Metering arrangement, the entire quantum of electricity recorded by the Generation Meter shall qualify towards meeting the RPO of the Distribution Licensee.

14.5 The Renewable Energy generated by any prosumer under these Regulations shall not be eligible for REC.

15. Procedure for Application and Registration

15.1. The distribution licensee shall facilitate the process for setting up of Renewable Energy generation system at consumers' premises. In this regard, the licensee shall:

a. Create an online portal for receiving applications from consumers for installation, interconnection, and metering of distributed Renewable Energy systems or devices, at their premises, and update the same on a regular basis.

b. Prominently display on its website and in all its offices, the following namely: -

(i) detailed standardized procedure in details for installation and commissioning of Renewable Energy system under gross metering / net billing/ net metering arrangement;
(ii) a single point of contact to facilitate the consumers in the installation of such Renewable Energy systems from submission of application form to commissioning;
(iii) address and telephone numbers of offices where filled-up application forms can be submitted;
(iv) complete list of documents required to be furnished along with such applications;
(v) applicable charges to be deposited by the applicant;
(vi) empanelled list of service providers for the benefit of consumers who want to install such Renewable Energy systems through service providers; and
(vii) financial incentives to the consumers, as applicable under various schemes and programmes of the Central and State Governments.

c. The Distribution licensee shall make the form available on its website and through a hard copy at its local offices.

d. The consumer of the premises shall submit the application to connect its Renewable Energy system to the distribution system of the licensee in the specified form as **Annexure-2** to the Regulation along with a processing fee of Rs. 500 (Rupees Five Hundred Only) at the local office of the concerned Distribution licensee or online through Web portal of Distribution Licensees.

e. In case, the application form is submitted in hard copy, it will be received, and acknowledgement with the registration number for that application shall be generated. The same shall be scanned and uploaded on the website as soon as it is received. In case, the application form is received online through web portal of the distribution licensee, the acknowledgement with the registration number shall be generated on submission of application. Application shall be deemed to be received on the date of generation of acknowledgement with registration number; and the application tracking mechanism based on the unique registration number shall be provided by the distribution licensee through a web-based application or any other mode to monitor the status of the processing of the application like receipt of the application, site inspection, meter installation, and commissioning, etc.

f. Within 20 days, the licensee shall complete the technical feasibility study and shall communicate to the applicant through email/SMS/post, the sanction /rejection of the application, as the case may be, along with the estimated amount to be deposited and the copy of the agreement to be executed by the consumer.

g. On receipt of full payment, the Distribution Licensee shall approve the application and intimate the same to the applicant by providing a Letter of Approval (LoA) via email/SMS/post, within thirty (30) days from the issuance of acknowledgement of the application.

h. During the time period from the feasibility study till the completion of installation, in case, there is any requirement of upgradation of distribution infrastructure like augmentation of the service line, distribution transformer capacity, etc., for installation of the required capacity of Renewable Energy system, the same shall be carried out by the distribution licensee or consumer, as the case may be.

i. After installation of the Renewable Energy system, the prosumer shall submit the installation certificate to the distribution licensee. The licensee shall complete the signing of the connection agreement, installation of the meter, and successful commissioning of the Renewable Energy system within thirty days from the date of submission of the installation certificate. Formats of connection agreement and installation certificate shall be placed on the web portal of the distribution licensee within thirty days of notification of these Regulations.

j. The Prosumer shall have the option of purchasing the requisite meter himself which shall be tested and installed by the distribution licensee.

k. The timelines as specified above in these Regulations shall be adhered to by the distribution licensee. In case of delay, the licensee may take approval from the Commission in specific cases along with justification for the same.

l. In case of any delay on the part of the distribution licensee without any just cause, the Licensee shall be liable to pay compensation to the consumer at a rate of Rs.100 (Rupees one hundred only) per day for each day of default.

m. The distribution licensee shall pass on the financial incentives to the prosumers, as may be provided under various schemes and programs of the Central and State Governments.

n. In case of any billing dispute, the prosumer may approach to the Electricity Consumer Grievance Redressal Forum of the concerned Distribution licensee.

Miscellaneous

16. Connection Agreement

The Distribution Licensee and Eligible Consumer shall enter into a Net Metering or Net Billing or Gross Metering Connection Agreement, as the case may be, after approval of connectivity of the Renewable Energy Generating System with the distribution Network but before the start of actual generation from the System. The model connection agreements for Net Metering, Net Billing, and Gross Metering Arrangement are provided in **Annexure 3**, **Annexure 4,** and **Annexure 5** respectively. The distribution licensee in consultation with JAKEDA shall develop a similar connection agreement for the consumers willing to avail of the Group Net metering or Virtual Net Metering facility as allowed under these Regulations and take prior approval of the Commission before entering into the same. The model regulations developed by the Ministry of New and Renewable Energy, GoI (F No 318/13/2022-GCRT) dated 04.08.2022 may be referred to in this regard.

17. Power to relax

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, relax any of the provisions of these Regulations on its ownmotion or on an application made before it by an interested person.

18. Power to amend

The Commission may at any time add, vary, alter, suspend, modify, amend or repeal any of the provisions of these Regulations.

19. Repeal and Savings

Same as otherwise provided in these Regulations, JERC for the state of Goa and UTs (Solar PV Grid Interactive System based on Net Metering) Regulations, 2019, together with amendments made from time to time, are hereby repealed:

Provided that for all purposes, including review matters pertaining to the period till notification of these Regulations, the issues relating to Net Metering shall be governed by the provisions of the JERC for state of Goa and UTs (Solar PV Grid Interactive System based on Net Metering) Regulations, 2019, including amendments thereto, as may be applicable.

20. Power to remove difficulties

In case of any difficulty arising while giving effect to the provisions of these Regulations, the Commission may either Suo-Moto or on a Petition, by an order, make such provisions not inconsistent with the provisions of the Act as may appear to be necessary.

By Order of the Commission

V.K.Dhar, (JKAS)
Secretary, JERC
J&K and Ladakh

Annexure 1

Voltage level Harmonics, Standards: Harmonics & Inverter

Harmonics shall be as per IEEE 519 Standards. The permissible individual harmonics level shall be less than 3% (for both voltage and current harmonics) and Total Harmonics Distortion (THD) for both voltage and current harmonics of the Grid system shall be less than 5%.

Inverter Standards

The Inverter should comply with IEC 61683/IS 61683 for efficiency and Measurements and should comply with IEC 60068-2 (1, 2, 14, 30) / Equivalent BIS Standard for environmental testing. Inverter should supervise the grid condition continuously and in the event of grid failure (or) under voltage (or) over voltage, Solar Plant should be disconnected by the circuit Breaker / Auto switch provided in the Inverter.

Various Other Standards			
Sl.	**Parameter**	**Reference**	**Requirements**
1.	**Overall conditions of Service**	State Distribution/Supply Code	State Distribution/Supply Code
2.	**Overall Grid Standards**	Central Electricity Authority (GridStandard) Regulations 2010	Central Electricity Authority (Grid Standard)Regulations 2010
3.	**Equipment**	BIS / IEC / IEEE	BIS / IEC / IEEE
4.	**Meters**	Central Electricity Authority (Installation & operation of meters) Regulation 2006 as amended from time to time	Central Electricity Authority (Installation & operation of meters) Regulation 2006 as amended from time to time
5.	**Safety and supply**	Central Electricity Authority (Measures relating to Safety and Electricity Supply) Regulations, 2010	Central Electricity Authority (Measures relating to Safety and Electricity Supply) Regulations, 2010
6.	**Harmonic Requirements Harmonic Current**	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013.	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013.
7.	**Synchronization**	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	Solar Plant must be equipped with a grid frequency synchronization device. Every time the generating station is synchronized to the electricity system. It shall not cause voltage fluctuation greater than +/- 5% at the point of connection.
8.	**Voltage**	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	The voltage-operating window should minimize nuisance tripping and should be under operating range of 80% to 110% of thenominal connected voltage. Beyond a clearing time of 2 second, the Solar Plant must isolate itself from the grid.

Various Other Standards			
Sl.	**Parameter**	**Reference**	**Requirements**
9.	**Flicker**	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	Operation of Solar Plant should not cause voltage flicker in excess of the limits statedin IEC 61000 standards or other equivalent Indian standards, if any.
10.	**Frequency**	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	When the Distribution system frequency deviates outside the specified conditions (50.5 Hz on the upper side and 47.5 Hz on the lowerside), There should be over and under frequency trip functions with a clearing time of 0.2 seconds.
11.	**DC injection**	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	Should not inject DC power more than 0.5% of full rated output at the interconnection point or 1% of rated inverter output current into the distribution system under any operating condition.
12.	**Power Factor**	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	While the output of the inverter is greater than 50%, a lagging power factor of greater than 0.9 should operate.
13.	**Islanding and Disconnection**	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	The Solar Project in the event of a fault, voltage, or frequency variations must island/disconnect itself within IEC standard on astipulated period.
14.	**Overload and Overheat**	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	The inverter should have the facility to automatically switch off in case of overload or overheating and should restart when normal conditions are restored.
15.	**Paralleling Device**	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	Paralleling device of Solar System shall be capable of withstanding 220% of the normal voltage at the interconnection point.
16.	**Note:** The standards/specifications shall be subject to amendments/revisions from time to time by the Distribution Licensee and the State Agency on respective websites.		

ANNEXURE-2

Model Application Form for installation of Renewable Energy System under Net Metering/Net Billing/Gross Metering arrangement

Name of Distribution Licensee [ ]
Name of Administrative Office [ ]

(To be filled by the Applicant in Block Letters)

1. Applicant's Full Name :
2. Address of the premises at which Renewable Energy System /Project is to be installed.:
3. Telephone/Mobile No. :
4. E-mail ID (if available) :
5. Alternate Address for communication (if any) :
6. Category of existing electricity connection :
7. Consumer No. :
8. Sanctioned Load / Contract Demand :(in kW /kVA/ HP).
9. Voltage at which existing supply has been given (in volts). :
10. Proposed AC capacity of Renewable Energy System to be installed (in kW):
11. Voltage at the output of Solar inverter :(in volts), if applicable.
12. Details of Registration Fee paid : (Rs. 500/-).

Date: _____ Signature of Applicant.

Application No. _____

Date of Receipt: _____

List of documents attached with Application Form

1. Copy of the latest paid electricity bill.
2. General Power of Attorney in favor of signatory in case of Partnership Firms; certified true copy of the Resolution, authorizing the signatory to deal with the concerned Distribution Licensee, passed by the Board of Directors in case of Companies (as applicable).
3. Technical details of PV modules, Inverter and other equipment of system proposed to be installed.
4. Proof of payment of Registration Fee.

...……...

ACKNOWLEDGEMENT

Received an Application from..... for connectivity/installation of Renewable Energy System of capacity of ..... kW as per details below: -

Date of Receipt	Applicant's Name	Application Number	Existing Consumer No.	Capacity of Renewable Energy System
(1)	(2)	(3)	(4)	(5)

Date: (Signature and Designation of Authorized Officer).

ANNEXURE – 3

Model Net Metering Connection Agreement

This Agreement is made and entered into at (location)_____on this (date)_____ day of (month)_____(year)_____ between the Eligible Consumer (Name)_____having premises at (address)_____and Consumer No. _____as the first Party,

AND

The Distribution Licensee _____ (hereinafter referred to as 'the Licensee') and having its Registered Office at (address)_____as second Party of this Agreement;

Whereas, the Eligible Consumer has applied to the Licensee for approval of a Net Metering Arrangement under the provisions of the Joint Electricity Regulatory Commission for the UT of Jammu & Kashmir and UT of Ladakh (Grid Interactive Renewable Energy system and its related matters) Regulations, 2023 (hereinafter referred to as 'the Net Metering Regulations') and sought its connectivity to the Licensee's Distribution Network;

And whereas, the Licensee has agreed to provide Network connectivity to the Eligible Consumer for injection of electricity generated from its Renewable Energy system of _____ kilowatt;

Both Parties hereby agree as follows: -

1. *Eligibility*

The Renewable Energy Project meets the applicable norms for being integrated into the Distribution Network, and the Eligible Consumer shall maintain the Project accordingly for the duration of this Agreement.

2. *Technical and Inter-connection Requirements*

2.1. The metering arrangement and the inter-connection of the Renewable Energy Project with the network of the Licensee shall be as per the provisions of the Net Metering and the technical standards and norms specified by the Central Electricity Authority for connectivity of distributed generation resources and for the installation and operation of meters.

2.2. The Eligible Consumer agrees, that he shall install, prior to connection of the Renewable Energy Project to the network of the Licensee, an isolation device (both automatic and in built within inverter and external manual relays); and the Licensee shall have access to it if required for the repair and maintenance of the Distribution Network.

2.3. The Licensee shall specify the interface/inter-connection point and metering point.

2.4. The Eligible Consumer shall furnish all relevant data, such as voltage, frequency, circuit breaker, isolator position in his System, as and when required by the Licensee.

3. *Safety*

3.1. The equipment connected to the Licensee's Distribution System shall be compliant with relevant International (IEEE/IEC) or Indian Standards (BIS), as the case may be, and the installation of electrical equipment shall comply with the requirements specified by the Central Electricity Authority regarding safety and electricity supply.

3.2. The design, installation, maintenance, and operation of the Renewable Energy Project shall be undertaken in a manner conducive to the safety of the Renewable Energy Project as well as the Licensee's Network.

3.3. If,- at any time, the Licensee determines that the Eligible Consumer's Renewable Energy Project is causing or may cause damage to and/or results in the Licensee's other Consumers or its assets, the Eligible Consumer shall disconnect the Renewable Energy Project from the distribution network upon direction from the Licensee, and shall undertake corrective measures at his own expense prior to re-connection.

3.4. The Licensee shall not be responsible for any accident resulting in injury to human beings or animals or damageto property that may occur due to back-feeding from the Renewable Energy Project when the grid supply is off. The Licensee may disconnect the installation at any time in the event of such exigencies to prevent such accident.

4. *Other Clearances and Approvals*

The Eligible Consumer shall obtain any statutory approvals and clearances that may be required, such as from the Electrical Inspector or the municipal or other authorities, before connecting the Renewable Energy Project to the distribution Network.

5. *Period of Agreement, and Termination*

This Agreement shall be for a period of 20 years, but may be terminated prematurely,

a) By mutual consent; or
b) By the Eligible Consumer, by giving 30 days' notice to the Licensee;
c) By the Licensee, by giving 30 days' notice, if the Eligible Consumer breaches any terms of this

Agreement orthe provisions of the Net Metering Regulations and does not remedy such breach within 30 days, or such otherreasonable period as may be provided, of receiving notice of such breach, or for any other valid reason communicated by the Licensee in writing.

6. Access and Disconnection

6.1. The Eligible Consumer shall provide access to the Licensee to the metering equipment and disconnecting devices of Renewable Energy Project, both automatic and manual, by the Eligible Consumer.

6.2. If, in an emergent or outage situation, the Licensee cannot access the disconnecting devices of the Renewable Energy Project, both automatic and manual, it may disconnect the power supply to the premises.

6.3. Upon termination of this Agreement under Clause 5, the Eligible Consumer shall disconnect the Renewable Energy Project forthwith from the Network of the Licensee.

7. Liabilities

7.1. The Parties shall indemnify each other for damages or adverse effects of either Party's negligence or misconductduring the installation of the Renewable Energy Project, connectivity with the distribution network, and operation of the System.

7.2. The Parties shall not be liable to each other for any loss of profits or revenues, business interruption losses, loss of contract or goodwill, or for indirect, consequential, incidental or special damages including, but not limited to, punitive or exemplary damages, whether any of these liabilities, losses or damages arise in contract, or otherwise.

8. Commercial Settlement

8.1. The commercial settlements under this Agreement shall be in accordance with the Net Metering Regulations.

8.2. The Licensee shall not be liable to compensate the Eligible Consumer if his Renewable Energy Project is unable to inject surplus power generated into the Licensee's Network on account of the failure of power supply in the grid/Network.

8.3. The existing metering System, if not in accordance with the Net Metering Regulations, shall be replaced by a bi-directional meter (whole current/CT operated), and a separate generation meter may be provided to measure Renewable Energygeneration. The bi-directional meter (whole current/CT operated) shall be installed at the inter-connection point to the Licensee's Network for recording the export and import of energy.

8.4. The uni-directional and bi-directional meters shall be fixed in separate meter boxes in the same proximity.

8.5. The Licensee shall issue monthly electricity bill for the net metered energy on the scheduled date of meter reading. If the exported energy exceeds the imported energy, the Licensee shall show the net energy exported as credited Units of electricity as specified in the Net Metering Regulations. If the exported energy is less than the imported energy, the Eligible Consumer shall pay the Distribution Licensee for the net energy imported at the prevailing tariff approved by the Commission for the Consumer category to which he belongs.

9. Connection Costs

The Eligible Consumer shall bear all costs related to the setting up of the Renewable Energy Project, excluding the Net MeteringArrangement cost beyond the Net Meter.

10. Dispute Resolution

10.1. Any dispute arising under this Agreement shall be resolved promptly, in good faith and in an equitable manner by both the Parties.

10.2. Disputes pertaining to billing / payments and metering shall be referred to the Consumer Grievances Redressal Forum (CGRF) and then to the Ombudsman appointed under sub-section 6 of Section 42 of the Act for settlement in casethe same is not resolved at CGRF.

In the witness, where of (Name) _____for and on behalf of Eligible Consumer and

(Name) _____ for and on behalf of (Licensee) agree to this agreement.

Annexure-4

Model Net Billing Connection Agreement

This Agreement is made and entered into at (location)_____ on this (date)_____day of (month)_____(year)_____between the Eligible Consumer (Name)_____having premises at (address) _____and Consumer No. _____ as the Party,

AND

the Distribution Licensee _____ (hereinafter referred to as 'the Licensee') and having its Registered Office at (address) _____ as the second Party of this Agreement.

Whereas the Eligible Consumer has applied to the Licensee for approval of a Net Billing Arrangement under the provisions of the Joint Electricity Regulatory Commission for the UT of Jammu & Kashmir and UT of Ladakh (Grid Interactive Renewable Energy system and its related matters) Regulations, 2023 and sought its connectivity to the Licensee's distribution Network;

And whereas the Licensee has agreed to provide Network connectivity to the Eligible Consumer for injection of electricity generated from its Renewable Energy Generating System of _____kilowatt;

Both Parties hereby agree as follows:

1 Eligibility

The Renewable Energy Generating System meets the applicable norms for being integratedinto the distribution network, and the Eligible Consumer shall maintain the System accordingly for the duration of this Agreement.

2 Technical and Inter-Connection Requirements

2.1 The metering arrangement and the inter-connection of the Renewable Energy Generating System with the Network of the Licensee shall be as per the provisions of the aforesaid Regulations and the technical standards and norms specified by theCentral Electricity Authority for connectivity of distributed generation resources and for the installation and operation of meters, the Eligible Consumer agrees, that he shall install, prior to connection of the Renewable Energy Generating System to the Network of the Licensee, an isolation device (both automatic and in-built within inverter and external manual relays); and the Licensee shallhave access to it if required for the repair and maintenance of the distribution Network.

2.2 The Licensee shall specify the interface/inter-connection point and metering point.

2.3 The Eligible Consumer shall furnish all relevant data, such as voltage, frequency, circuit breaker, isolator position in his System, as and when required by the Licensee.

3 Safety

3.1 The equipment connected to the Licensee's distribution System shall be compliant with relevant International (IEEE/IEC) or Indian standards (BIS), as the case may be, and the installation of electrical equipment shall comply with the requirements specified by the Central Electricity Authority regarding safety and electricity supply.

3.2 The design, installation, maintenance, and operation of the Renewable Energy Generating System shall be undertaken in a manner conducive to the safety of the Renewable EnergyGenerating System as well as the Licensee's Network.

3.3 If, at any time, the Licensee determines that the Eligible Consumer's Renewable Energy Generating System is causing or may cause damage to and/or results in the Licensee's other consumers or its assets, the Eligible Consumer shall disconnect the Renewable Energy Generating System from the distribution Network upon direction from the Licensee, and shall undertake corrective measures at his own expense prior to re- connection.

3.4 The Licensee shall not be responsible for any accident resulting in injury to human beingsor animals or damage to property that may occur due to back-feeding from the RenewableEnergy Generating System when the grid supply is off. The Licensee may disconnect the installation at any time in the event of such exigencies to prevent such accident.

4 Other Clearances and Approvals

The Eligible Consumer shall obtain any statutory approvals and clearances that may be required, such as from the Electrical Inspector or the municipal or other authorities, before connecting the Renewable Energy Generating System to the distribution Network.

5 Period of Agreement, and Termination

5.1 This Agreement shall be for a period for 20 years, but may be terminated prematurely

a) By mutual consent; or

b) By the Eligible Consumer, by giving 30 days' notice to the Licensee;

c) By the Licensee, by giving 30 days' notice, if the Eligible Consumer breaches any terms of this Agreement or the provisions of the Net Metering Regulations and does not remedy such breach within 30 days, or such other reasonable period as may be provided, of receiving notice of such breach, or for any other valid reason communicated by the Licensee in writing;

d) By the Licensee, by giving 30 days' notice, if the Eligible Consumer fails to pay his dues in a timely manner or indulges in any malpractices.

6 Access and Disconnection

6.1 The Eligible Consumer shall provide access to the Licensee to the metering equipment and disconnecting devices of Renewable Energy Generating System, both automatic and manual, by the Eligible Consumer.

6.2 If, in an emergent or outage situation, the Licensee cannot access the disconnecting devices of the Renewable Energy Generating System, both automatic and manual, it may disconnect the power supply to the premises.

6.3 Upon termination of this Agreement under Clause 5, the Eligible Consumer shall disconnect the Renewable Energy Generating System forthwith from the Network of the Licensee.

7 Liabilities

7.1 The Parties shall indemnify each other for damages or adverse effects of either Party's negligence or misconduct during the installation of the Renewable Energy Generating System, connectivity with the distribution Network and operation of the System.

7.2 The Parties shall not be liable to each other for any loss of profits or revenues, business interruption losses, loss of contract or goodwill, or for indirect, consequential, incidental or special damages including, but not limited to, punitive or exemplary damages, whether any of these liabilities, losses or damages arise in contract, or otherwise.

8 Commercial Settlement

8.1 The commercial settlements under this Agreement shall be in accordance with Net Metering Regulations in force.

8.2 The units exported by the Renewable Energy Generating Station in the billing period shall be purchased by the Distribution Licensee at Rs. _____ per kWh as per the feed-in tariff approved by the consumption, for the entire duration of the Agreement.

8.3 The Licensee shall not be liable to compensate the Eligible Consumer if his Renewable Energy Generating System is unable to inject surplus power generated into the Licensee'sNetwork on account of the failure of power supply in the grid/Network.

8.4 The Licensee shall issue a net bill as per the billing cycle after accounting for the units exported by the Renewable Power Developer at feed –in tariff approved by the Commission and after accounting for units imported from the grid at applicable Tariff Order.

9 Connection Costs

The Eligible Consumer shall bear all costs related to the setting up of the Renewable Energy Generating System, including the cost of the Renewable Energy Generation Meter.

10 Dispute Resolution

10.1 Any dispute arising under this Agreement shall be resolved promptly, in good faith and in an equitable manner by both the Parties.

10.2 The Eligible Consumer shall have recourse to the concerned Consumer Grievance Redressal Forum constituted under the relevant Regulations in respect of any grievance regarding billing, which has not been redressed by the Licensee.

In the witness, where of (Name) _____ for and on behalf of Eligible Consumer) and (Name) _____ for and on behalf of _____ (Licensee) agree to this agreement.

Annexure-5
Model Gross Metering Connection Arrangement

This Agreement is made and entered into at (location) …….on this (date) ……..day of (month) ……..year……..between the Eligible Consumer or third party owner, by the name of ……..……..……..……..……..……..…....owning or leasing or having commerce rights to the premises at (address) ……..……..……..……..……..……..as first party

AND

Distribution Licensee (herein after called as Licensee) and represented by ……..……..……..…….. (Designation of office) and having its registered office at (address) ……..……..……..…….. as the second party of the agreement

And whereas, the ……..……..……..…….. (Name of the Licensee) agrees to provide grid connectivity to the eligible consumer for injection of the electricity generated from his Renewable Energy plant of capacity ……. kWs into the power system of the Licensee and as per conditions of this agreement and Joint Electricity Regulatory Commission for the UT of Jammu & Kashmir and UT of Ladakh (Grid Interactive Renewable Energy system and its related matters) Regulations, 2023.

Both the parties hereby agree to as follows:

1. Eligibility

1.1 The Renewable Energy Generating System meets the applicable norms for being integrated into the distribution network, and that the Eligible Consumer shall maintain the System accordingly for the duration of this Agreement.

2. Technical and Interconnection Requirements

2.1 Renewable Energy generation plant under gross metering system will conform to the standards and requirements specified in Joint Electricity Regulatory Commission for the UT of Jammu & Kashmir and UT of Ladakh (Grid Interactive Renewable Energy Renewable Energy system and its related matters) Regulations, 2023 and in the following Regulations and codes as amended from time to time:

i. Central Electricity Authority (Technical Standards for connectivity of the Distributed Generating Resources) Regulations, 2013 and subsequent amendments thereof;
ii. Central Electricity Authority (Installation and Operation of Meters) Regulation 2006 and subsequent amendments thereof;
iii. Central Electricity Authority (Measures of Safety and Electricity Supply) Regulations, 2010 and subsequent amendments thereof;
iv. Grid Code Regulations framed by the Commission;
v. Supply Code Regulations framed by the Commission;
vi. Any other provisions applicable to the electricity consumer of the Distribution Licensee.

2.2 The Eligible Consumer agrees, that he shall install, prior to connection of the Renewable Energy Generating System to the Network of the Licensee, an isolation device (both automatic and in-built within inverter and external manual relays); and the Licensee shall have access to it if required for the repair and maintenance of the distribution Network.

2.3 The Eligible Consumer agrees that in case of a power outage Licensee's system, the photovoltaic system will disconnect/isolate automatically and his plant will not inject power into Licensee's distribution system.

2.4 All the equipment connected to the distribution system shall be compliant with relevant International (IEEE/IEC) or Indian standards (BIS) and installations of electrical equipment must comply with Central Electricity Authority (Measures of Safety and Electricity Supply) Regulations, 2010.

2.5 The Eligible Consumer agrees that Licensee will specify the interface/interconnection point and metering point.

2.6 The Eligible Consumer and Distribution Licensee agree to comply with the relevant CEA and JERC UT of Jammu & Kashmir and UT of Ladakh Regulations in respect of operation and maintenance of the plant, drawing and diagrams, site responsibility schedule, harmonics, synchronization, voltage, frequency, flicker etc.

2.7 Due to Licensee's obligation to maintain a safe and reliable distribution system, the Eligible Consumer agrees that if it is determined by the Licensee that the respective owner's photovoltaic system either causes damage to and/or produces adverse effects affecting other consumers or Licensee's assets, the Eligible consumer will have to disconnect photovoltaic system immediately from the distribution system upon direction from the Licensee and correct the problem at his own expense prior to a reconnection.

3. **Clearances and Approvals**

3.1 The Eligible Consumer agrees to obtain all the necessary approvals and clearances (environmental and grid connection related) before connecting the photovoltaic system to the distribution system.

4. **Access and Disconnection**

4.1 Licensee shall have access to metering equipment and disconnecting means of the Renewable Energy system, both automatic and manual, at all times.

4.2 In emergency or outage situation, where there is no access to the disconnecting means, both automatic and manual, such as a switch or breaker, Licensee may disconnect service to the premises of the eligible consumer.

5. **Liabilities**

5.1 Eligible consumer and Licensee will indemnify each other for damages or adverse effects from either party's negligence or intentional misconduct in the connection and operation of photovoltaic system or Licensee's distribution system.

5.2 Licensee and eligible consumer will not be liable to each other for any loss of profits or revenues, business interruption losses, loss of contract or loss of goodwill, or for indirect, consequential, incidental or special damages, including, but not limited to, punitive or exemplary damages, whether any of the said liability, loss or damages arise in contract, or otherwise.

5.3 Licensee shall not be liable for delivery or realization by eligible consumer for any fiscal or other incentive provided by the Central/State Government beyond the scope specified by the Commission in its relevant Order

5.4 The Licensee may consider the quantum of electricity generation from the Renewable Energy system towards meeting its RPO.

6. **Commercial Settlement**

6.1 All the commercial settlement under this agreement shall follow the aforesaid Regulations issued by the Commission.

7. **Connection Costs**

7.1 The Eligible Consumer shall bear all costs related to setting up of photovoltaic system including metering and interconnection costs. The First Party agrees to pay the actual cost of modifications and upgrades to the service line required to connect photovoltaic system to the grid in case it is required.

8. **Termination**

8.1 The Eligible Consumer can terminate agreement at any time by providing Licensee with 30 days' prior notice.

8.2 Licensee has the right to terminate Agreement on 30 days' prior written notice, if the Eligible consumer commits breach of any of the term of this Agreement and does not remedy the breach within 30 days of receiving written notice from Licensee of the breach.

8.3 The Eligible Consumer shall upon termination of this Agreement, disconnect the Renewable Energy System from License's distribution system in a timely manner and to Licensee's satisfaction.

In witness, whereof, Mr. …… for and on behalf of (Eligible consumer or third-party owner) and

Mr. …… for and on behalf of (Licensee) sign this agreement in two originals.

Eligible Consumer/ Third Party

Name:

Address:

Service Connection No.

Distribution Licensee

Name:

Designation:

Office Address.