

APPLICATION FOR REGISTRATION OF THE SCHEME FOR RENEWABLE ENERGY SYSTEM

For any query call @39999956 or e-mail us on karishma.sharma@relianceada.com

To CEO BRPL,

I intend to register for the scheme for Renewable energy system, in compliance of Delhi Electricity Regulatory Commission (Net Metering for Renewable Energy) Regulations, 2014.

1	Name	
2	Address for Communication	
3	Consumer No.,	
4	Telephone No.,	
5	E-mail	
6	Renewable Energy Source	
7	Application No.	
8	Sanctioned load	
9	Capacity of Renewable Energy System to be connected(Capacity not to exceed as approved by the Discom)	
10	Technical specifications and other particulars of Renewable Panel, Grid Tied Inverter and Interlocking System etc. proposed to be installed(As per Annexure 3 of DERC guidelines) – whether attached (Yes/No) Note- Detailed technical specification is attached for your reference	
11	Drawings for installing the Renewable Energy System – whether attached (Yes/No)	
12	Proposed date of completion of the installation	

I(Name of Consumer) shall comply with the terms and condition of Model Connection Agreement .I agree to pay the Registration charges (details as provided below) as stipulated under Delhi Electricity Regulatory Commission (Net Metering for Renewable Energy) Regulations, 2014 once this application for registration is approved.

Sr . No.	Capacity (KW)	Charges(Rs)	Please tick any one as per your plant capacity
1	1 to ≤ 10	1000/-	
2	>10 to ≤ 50	3000/-	
3	> 50 to ≤ 100	6000/-	
4	>100 to ≤ 300	9000/-	
5	>300 to ≤ 500	12000/-	
6	>500	15000/-	

Also, I agree to pay the other applicable charges inclusive of meter cost, accessories etc. raised by the Discom in the Demand note at the time of grid connectivity with my Renewable energy system.

Place:

Date:

Signature of Consumer



Acknowledgement

Received the application for registration of the scheme for Renewable Energy System

Name

Date

Application Number.....

Consumer No.

Renewable Plant Capacity

Name of Officer
Seal

Designation of Officer
Signature

Annexure-III (DERC guidelines)

IMPORTANT CLAUSES RELATED TO THE TECHNICAL & INTERCONNECTION REQUIREMENTS:

Parameter	Reference	Requirement
Overall conditions of Service	State Distribution/Supply Code	Reference to State Distribution Code
Overall Grid Standards	Central Electricity Authority (Grid Standard) Regulations 2010	Reference to regulations
Equipment	BIS / IEC / IEEE	Reference to standards
Meters	Central Electricity authority (Installation & operation of meters) Regulation 2006	Reference to regulations and additional conditions issued by the Commission.
Safety and supply	Central Electricity Authority(measures of safety and electricity supply) Regulations,2010	Reference to regulations
Harmonic Current	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	Harmonic current injections from a generating station shall not exceed the limits specified in IEEE 519
Synchronization	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	Renewable Energy System 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 point of connection.
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 the nominal connected voltage. Beyond a clearing time of 2 second, the Renewable Energy system must isolate itself from the grid.
Flicker	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	Operation of Renewable Energy System should not cause voltage flicker in excess of the limits stated in IEC 61000 standards or other equivalent Indian standards, if any.

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 upper side and 47.5 Hz on lower side), There should be over and under frequency trip functions with a clearing time of 0.2 seconds.
DC injection	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	Renewable Energy System 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 distribution system under any operating conditions.
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.
Islanding and Disconnection	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	The Renewable Energy System in the event of fault, voltage or frequency variations must island/disconnect itself within IEC standard on stipulated period.
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.
Paralleling Device	IEEE 519 CEA (Technical Standards for Connectivity of the Distributed Generation Resources) Regulations 2013	Paralleling device of Renewable Energy System shall be capable of withstanding 220% of the normal voltage at the interconnection point.

(For reference only)

Detailed Technical Specifications of SRTPV system)

Item / System	Applicable IS Standards / IEC Standards / IEEE standards		
	Standard Description	Standard Number	
Solar PV modules	Modules		
	i	Crystalline Silicon Terrestrial PV modules Thin film Terrestrial PV modules	IEC 61215/IS14286 IEC 61646
	ii	Solar PV module safety qualification Requirements	IEC 61730 (P1 - P2)
	iii	PV modules to be used in a highly corrosive atmosphere (Coastal area etc,) must qualify Salt Mist corrosion Testing	IEC 61701/ IS 61701
	<p>Each PV module must use RFID tag which must contain the following information as per MNRE requirements:</p> <ul style="list-style-type: none"> i. Name of the manufacturer of PV Module ii. Name of the manufacturer of Solar Cells lii Date and year of manufacture (separately for solar cells and module) iv. Peak wattage, Im, Vm and FF for the module v. Unique Sl. No. and model no. of the module vi. Date and year of obtaining IEC PV module qualification certificate vii Name of the test lab issuing IEC certificate <p>WARRANTY: PV modules used in solar power system must be warranted for their output peak watt capacity, which should not be less than 90% at the end of 10years and 80% at the end of 25years</p>		
	i	Environmental Testing	IEC 60068-2 (1, 2,14,30) / Equivalent BIS Std.
	ii	Efficiency Measurements	IEC 61683
	iii	Product safety standard	IEC - 62109-1 (2010/4)

Grid tied inverters			IEC - 62109-2 (2011/6)
	iv	Grid Connectivity standard and test procedure for islanding prevention measures for utility/interconnected PV inverters	IEC 61727 IEEE 1547 IEEE 1547.1
	v	Electromagnetic compatibility & Electro Magnetic Interference	IEC 61000-6-3 > 16 Amps IEC 61000-6-4 < 16 Amps
	vi	Ingress protection	IP 65 (for outdoor)/ IP 21 (for indoor) As per IEC 529
<p>for testing i,ii,vi beyond 10KVA self- certification by manufacturers are acceptable</p> <ul style="list-style-type: none"> • In case if the Charge controller is not built in the inverter, IEC 62093 test is required separately for Charge controller. 			
Cables	i	General Test and Measuring Method PVC insulated cables for working voltage up to and including 1100 V and UV resistant for outdoor installation	IEC 60227 / IS 694 IEC 60502 / IS 1554 (Part. I & II)
Earthing	i	Grounding	IS 3043
Switches/ Circuit Breakers/ Connectors	i	General Requirements Connectors - safety A.C. /D.C.	IEC 60947 part I,II, III / IS 60947 Part I,II,III / EN 50521
Junction Boxes/ Enclosures for Charge Controllers/ Luminaries	i	General Requirements	IP 65 (for outdoor)/ IP 21 (for indoor) As per IEC 529