



**NEW AND RENEWABLE ENERGY DEVELOPMENT CORPORATION OF ANDHRA
PRADESH LIMITED (NREDCAP)
(A State Government Company)**

Regd.Office:# 12-464/5/1, River Oaks Apartment, CSR KalyanaMandapam Road,
Tadepalli, Guntur District, Pin : 522 501.Email: info@nredcap.in, bg@nredcap.in

Ref: NREDCAP/SE/Off-Grid/RC Rates/01/2023-24

Date: 12.07.2023

EXPRESSION OF INTEREST

Expression of Interest (EOI) from empaneled Solar Off-Grid Suppliers of NREDCAP for the year 2022-23 is invited for finalization of rate contract prices for supply & installation of the following Solar Off-Grid Systems under Solar Off-Grid Programme in the State of Andhra Pradesh.

- A. 0.5KWp to 10KWp Solar Off Grid Systems
- B. 2W LED based Solar Lantern
- C. 18W LED based Solar Street Lighting System
- D. 36W LED (2 Nos X 18W) based Solar Street Lighting System
- E. 20W LED based Solar Street Lighting System with Display Board
- F. 40W LED (2 Nos X 20W) based Solar Street Lighting System with Display Board
- G. 60WLED based Solar Street Lighting System
- H. 120W LED (2 Nos X 60W) based Solar Street Lighting System
- I. 160W LED (4 Nos X 40W) based Solar High Mast Lighting System
- J. 9W LED based Solar Pathway Lighting System
- K. 15W LED based Solar Blinker
- L. Sim based Solar 360° PTZ Camera

The components involved in the above Solar Gadgets such as SPV Module, W-LED Luminaires, Lithium Ferro Phosphate (LiFePO₄) Battery Banks shall have IEC/BIS test certification from MNRE / MNRE authorized test centers. The other technical parameters shall be as per MNRE specifications. The systems shall be supplied and installed on Turnkey basis with five years warranty anywhere in Andhra Pradesh State.

ELIGIBILITY CONDITION:

Minimum Turnover	Minimum Experience
Minimum cumulative turnover of Rs.1.00 crore during the last three years period (2020-21 to 2022-23). Enclose copy of the certificate issued by Chartered Accountant	At least minimum 10KWp cumulative capacity Solar Off-Grid systems (Solar Rooftop/Solar Street Lights/Solar Pump sets) installed in the last 3 years. Enclose Copies of the work completion reports.

The suppliers shall not be blacklisted at any time by NREDCAP as well as any of the Govt. Nodal Agencies in the country. The District Managers of NREDCAP will generate demand with the help of Empanelled suppliers / manufacturers and submit indents to Head Office by recommending the supplier for allotment of the works.

The interested applicants fulfilling the eligibility criteria shall submit their sealed financial quotations in the formats enclosed **on or before 21.07.2023** along with an **Earnest Money Deposit of Rs. 75,000/- (Rupees Seventy Five Thousand Only)** in the form of Demand Draft issued by any Nationalized Bank drawn in favour of NREDCAP, which is refundable after finalization of the rate contract system.

Sd/-
VC & Managing Director

INFORMATION ON SUBMISSION OF EOI

1. The Supplier shall submit the sealed offer indicating the financial and technical details along with EMD in the form of DD in original, on or before the Deadline, to the address mentioned below:

The VC & Managing Director, New & Renewable Energy Development Corporation of AP Ltd., 12-464/5/1,/ River Oaks Apartments, CSR Kalyana Mandapam Road, Tadepalli, Guntur District, Andhra Pradesh– 522 501.

2. The Supplier shall furnish documentary evidence in support of meeting Qualification Requirements set forth in this document to the satisfaction of the Authorized Representative.
3. The supplier shall quote lump sum price for the Solar Off-Grid Systems for each category including Taxes and Duties.
4. The Technical & Financial offers shall be submitted separately in sealed cover duly subscribing “Technical Qualification” and “Financial Offer” as applicable and are put in another sealed cover duly subscribing “**Expression of Interest (EoI) from empanelled suppliers of 2022-23 for finalization Rate Contract Price for Supply, Installation and Commissioning of Solar Off-Grid Systems.**”
5. On receipt of offers, NREDCAP will verify the technical qualification of the suppliers. The financial offers of technically qualified suppliers will be opened.
6. The lowest quoted price in each category will be arrived for rate contract prices.
7. NREDCAP may accept or reject any or all offers without assigning any reason.
8. The Scope of work covers Design, Supply, Installation & Commissioning of Solar Off-Grid Systems as per the technical specifications and standards notified by MNRE.
9. The Mounting Structure for installation of SPV Modules shall be Hot Dipped Galvanized to withstand wind speed up to 150 Kmph and all the fasteners shall be stainless steel only.
10. The supplier shall install the systems within due date i.e 45 days from the date of issue of work order and submit the relevant documents to NREDCAP for release of cost of the system as per work order.
11. If the operation or use of the system proves to be unsatisfactory during the warranty period, the installer shall replace the faulty ones or carry out necessary repairs as per the warranty terms and conditions within five (5) working days from the date of complaint.

Date:

Signature of the Supplier with Stamp

12. WARRANTY

1. (a) The SPV panel shall carry a warranty of minimum 25 years.

(b) The SPV panel must be warranted or their output peak watt capacity which shall not be less than 90% at the end of 10 years and 80% at the end of 25 years.

(c) The System shall carry a warranty of minimum 5 years.
2. The complete Solar Off-Grid Systems installed and commissioned shall be under a warranty against any manufacturing or usage defect for a minimum period of 5 years from the date of Commissioning.
3. The warranty will be against breakages, malfunctions, non-fulfilment of guaranteed performance and breakdowns due to manufacturing defects or defects that may arise due to improper operation of electrical /electronic components of the system but do not include physical damages by the end users.
4. The warranty will cover all the materials and goods involved in the installation and commissioning of Solar Off-Grid systems by the Supplier.

Date:

Signature of the Supplier with Stamp

PARTICULARS OF SUPPLIER

SL.	PARTICULARS	TO BE FUNISHED BY THE SUPPLIER
1	Name of Supplier/Firm	
2	Postal Address	
3	E-mail address for communication	
4	Telephone/Fax No.	
5	Name, designation, address, contact number and Email of the representative of the Supplier to whom all references shall be made.	
6	Nature of the firm (Individual/Partnership/Consortium/Pvt. Ltd./Public Ltd. Co./Public Sector, etc.) Attach attested copy of Registration & Partnership deed/Memorandum of Association	
7	PAN NO (Copy of certificate to be enclosed)	
8	GST No. (copies of certificates to be attached)	
9	Amount and particulars of the Earnest Money Deposited.	
10	Annual Turnover for last three years i.e 2020-2023 (Attach CA certificate)	
11	Experience in the last 3 years in KWp (Solar Rooftop off-grid/solar street lights/solar pump sets) (Attach details with proof)	
12	Has the Supplier/firm ever been debarred by Any institution for undertaking any work?	
13	Any other information attached by the Supplier	

Date:

Signature of the Supplier with Stamp

FINANCIAL OFFER FOR SOLAR OFF-GRID SYSTEMS

(4 hours back up)

Financial offer for Supply, installation and commissioning of various capacities of Solar Off-Grid Systems (4 hours back up) including Mono Crystalline Solar Modules, Inverter with inbuilt MPPT Charge controller, Batteries, cables with ACDB, MMS and battery stand complete set etc., as per MNRE technical specifications in Andhra Pradesh State

Description/Capacity of solar off-grid system	Basic Price (Rs.)	GST@12% on 70% of the price (Rs)	GST@ 18% on 30% of the price (Rs)	Total Cost (Rs)
500Wp Solar Off-Grid System 500Wp Solar Module, 850VA Inverter with inbuilt 20-60V DC@15Amps MPPT Charge controller, 12V, 180 Ah LMLA C10 Tubular Battery				
1.0 KWp Solar Off-Grid System 1000Wp Solar Module, 1500VA Solar Inverter with inbuilt 20-60V DC@30Amps MPPT Charge controller, 24V, 180 Ah LMLA C10 Tubular Battery				
2.0 KWp Solar Off-Grid System 2000Wp Solar Module, 2500VA Solar Inverter with inbuilt 40-100V DC@30Amps MPPT Charge controller, 48V, 180 Ah LMLA C10 Tubular Battery				
3.0 KWp Solar Off-Grid System 3000Wp Solar Module, 4000VA Solar Inverter with inbuilt 40-100V DC@40Amps MPPT Charge controller, 48V, 300 Ah LMLA C10 Tubular Battery				
4.0 KWp Solar Off-Grid System 4000Wp Solar Module, 4000VA Solar Inverter with inbuilt 60-120V DC@50Amps MPPT Charge controller, 96V, 180 Ah LMLA C10 Tubular Battery				

<p>5.0 KWp Solar Off-Grid System 5000Wp Solar Module, 6000VA Solar Inverter with inbuilt 60-120V DC@62Amps MPPT Charge controller, 96V, 220 Ah LMLA C10 Tubular Battery</p>				
<p>6.0 KWp Solar Off-Grid System 6000Wp Solar Module, 7.5KVA Solar Inverter with inbuilt 60-120V DC@75Amps MPPT Charge controller, 96V, 250 Ah LMLA C10 Tubular Battery</p>				
<p>7.0 KWp Solar Off-Grid System 7000Wp Solar Module, 7.5KVA Solar Inverter with inbuilt 60-120V DC@75Amps MPPT Charge controller, 96V, 300 Ah LMLA C10 Tubular Battery</p>				
<p>8.0 KWp Solar Off-Grid System 8000Wp Solar Module, 10KVA Solar Inverter with inbuilt 80-140V DC@80Amps MPPT Charge controller, 120V, 300 Ah LMLA C10 Tubular Battery</p>				
<p>9.0 KWp Solar Off-Grid System 9000Wp Solar Module, 10KVA Solar Inverter with inbuilt 80-140V DC@80Amps MPPT Charge controller, 120V, 300 Ah LMLA C10 Tubular Battery</p>				
<p>10.0 KWp Solar Off-Grid System 10000Wp Solar Module, 10KVA Solar Inverter with inbuilt 80-140V DC@100Amps MPPT Charge controller, 120V, 360 Ah LMLA C10 Tubular Battery</p>				

Date:

Signature of the Supplier with Stamp

FINANCIAL OFFER FOR SUPPLY OF 2W LED BASED SOLAR LANTERN

S.No	Name of item	Unit Rate (Rs)
1	<p>Supply of 2W LED based Solar Lantern with the following components as per following specifications including Transportation charges on FOR destination basis in the State of Andhra Pradesh.</p> <ol style="list-style-type: none"> 1. SPV Module - 5.0 Wp under STC poly crystalline silicon module with IEC/BIS / MNRE approval. 2. Battery Bank - 3X3.2V, 1450mAh Capacity Rechargeable Lithium-Ferro Phosphate (LiFePO4) Battery with IEC/BIS test certification from MNRE / MNRE authorized test centers. 3. LED Luminaire - 2 Watt W-LED luminaire, dispersed beam, soothing to eyes with the use of proper optics and diffuser. 4. Light output - The lamp should have two levels of light (operation at 100% power and 60% power) to take care of the different lighting needs, as per the user requirements. 5. Accessories - Suitable AC charger 6. Cable - 20 feet length 7. Duty Cycle - 4 hours a day (at full brightness level), under average daily insolation of 5.5 KWh/Sq.m on a horizontal surface. 8. Autonomy - 3 days or 6 operating hours per permissible discharge. 9. Electronics - Overall total efficiency of the Electronics should be minimum 85% 10. Warranty: <ol style="list-style-type: none"> i) The Solar Lantern (including the battery) will be warranted for a period of five years from the date of supply. ii) The PV Module(s) will be warranted for a minimum period of 25 years from the date of supply. 	
2	GST@12%	
3	Total (Rs.)	

Date:

Signature of the Supplier / Manufacturer with seal

FINANCIAL OFFER FOR SUPPLY & INSTALLATION OF 18 W LED BASED SOLAR STREET LIGHTING SYSTEM ON TURNKEY BASIS

S.No	Name of Item	Unit Rate (Rs)	
		Non-Remote Areas	Remote Areas
1	<p>Design, Supply, Installation, Testing and Commissioning of 18W LED based Solar Street Lighting System with the following components & specifications including installation and transportation charges on Turnkey basis</p> <p>1.SPV Module - 12V, 100Wp capacity poly crystalline module with IEC/BIS test certification from MNRE / MNRE authorized test centers along with suitable Solar PV module support Structure.</p> <p>2. Battery Bank - 12.8V, 30Ah capacity Lithium Ferro Phosphate (LiFePO4) Battery with IEC/BIS test certification from MNRE / MNRE authorized test centers.</p> <p>3. LED Luminaire - 18W capacity LED based Solar luminary with inbuilt MPPT charge controller to operate dusk to dawn.</p> <p>The Luminaire must use high efficacy W-LED with minimum 135 lumens per watt and UV free.</p> <p>4. Light output - Multiple light levels</p> <p>The lamp should have two levels of light to take care of different lighting needs during the night.</p> <p>5. Mounting of light - Pole mounted, minimum 5.0 meters above the ground level</p> <p>6. GI Pole - 3 inch dia, 6 meters length and 3 mm thick GI Pole</p> <p>7. Civil Foundation - The foundation size is 0.45 m X 0.45 m X 0.90 m. The Foundation shall be RCC pile foundation in CC(1:2:4).</p> <p>8. Duty Cycle - Dusk to Dawn</p> <p>4 hours full light, rest of the time at lower level, with motion sensor.</p> <p>i) In case any movement is there, it senses it and glows to full level.</p> <p>ii) Then it comes back to lower level after sometime, automatically.</p> <p>9. Electronics - Overall total efficiency of the Electronics should be minimum 85%</p> <p>10. Warranty</p> <p>i) The Street Lighting System (including the battery) will be warranted for a period of five years from the date of installation.</p> <p>ii) The PV Module(s) will be warranted for a minimum period of 25 years from the date of installation.</p>		
2	GST @12% on 70% of item no: 01		
3	GST @18% on 30% of item no: 01		
4	Total (Rs.)		

Date:

Signature of the Supplier / Manufacturer with seal

FINANCIAL OFFER FOR SUPPLY & INSTALLATION OF 36 W (2 Nos x 18W) LED BASED SOLAR STREET LIGHTING SYSTEM ON TURNKEY BASIS

S.No	Name of Item	Unit Rate (Rs)	
		Non-Remote Areas	Remote Areas
1	<p>Design, Supply, Installation, Testing and Commissioning of 36W (2 Nos X 18W) LED based Solar Street Lighting System with the following components & specifications including installation and transportation charges on Turnkey basis</p> <p>1. SPV Module - 2 Nos X 12V, 100Wp capacity poly crystalline module with IEC/BIS test certification from MNRE / MNRE authorized test centers along with suitable Solar PV module support Structure.</p> <p>2. Battery Bank - 2 Nos X 12.8V, 30Ah capacity Lithium Ferro Phosphate (LiFePO4) Battery with IEC/BIS test certification from MNRE / MNRE authorized test centers.</p> <p>3. LED Luminaire - 2 Nos X 18W capacity LED based Solar luminary with inbuilt MPPT charge controller to operate dusk to dawn.The Luminaire must use high efficacy W-LED with minimum 135 lumens per watt and UV free.</p> <p>4. Light output - Multiple light levels</p> <p>The lamp should have two levels of light to take care of different lighting needs during the night.</p> <p>5. Mounting of light - Pole mounted, minimum 5.0 meters above the ground level.</p> <p>6. GI Pole - 3 inch dia, 6 meters length and 3 mm thick GI Pole</p> <p>7. Civil Foundation -The foundation size is 0.45 m X 0.45 m X 0.90 m. The Foundation shall be RCC pile foundation in CC(1:2:4).</p> <p>8. Duty Cycle - Dusk to Dawn 4 hours full light, rest of the time at lower level, with motion sensor.</p> <p>i) In case any movement is there, it senses it and glows to full level. ii) Then it comes back to lower level after sometime, automatically.</p> <p>9. Electronics - Overall total efficiency of the Electronics should be minimum 85%</p> <p>10. Warranty: i) The Street Lighting System (including the battery) will be warranted for a period of five years from the date of installation. ii) The PV Module(s) will be warranted for a minimum period of 25 years from the date of installation.</p>		
2	GST @12% on 70% of item no: 01		
3	GST @18% on 30% of item no: 01		
4	Total (Rs.)		

Date :

Signature of the Supplier / Manufacturer with seal

FINANCIAL OFFER FOR SUPPLY & INSTALLATION OF 20W LED BASED SOLAR STREET LIGHTING SYSTEM ALONG WITH DISPLAY BOARD ON TURNKEY BASIS

S.No	Name of Item	Unit Rate (Rs)	
		Non-Remote Areas	Remote Areas
1	<p>Design, Supply, Installation, Testing and Commissioning of 20W LED based Solar Street Lighting System along with display board with the following components & specifications including installation and transportation charges on Turnkey basis</p> <ol style="list-style-type: none"> 1. SPV Module - 12V, 100Wp capacity poly crystalline module with IEC/BIS test certification from MNRE / MNRE authorized test centers along with suitable Solar PV module support Structure. 2. Battery Bank - 12.8V, 30Ah capacity Lithium Ferro Phosphate (LiFePO4) Battery with IEC/BIS test certification from MNRE / MNRE authorized test centers. 3. LED Luminaire - 20W capacity LED based Solar luminary with inbuilt MPPT charge controller to operate dusk to dawn. The Luminaire must use high efficacy W-LED with minimum 135 lumens per watt and UV free. 4. Light output - Multiple light levels The lamp should have two levels of light to take care of different lighting needs during the night. 5. Mounting of light - Pole mounted, minimum 5.0 meters above the ground level 6. GI Pole - 3 inch dia, 6 meters length and 3 mm thick GI Pole 7. Civil Foundation - The foundation size is 0.45 m X 0.45 m X 0.90 m. The Foundation shall be RCC pile foundation in CC(1:2:4). 8. Duty Cycle - Dusk to Dawn: 4 hours full light, rest of the time at lower level, with motion sensor. i) In case any movement is there, it senses it and glows to full level. ii) Then it comes back to lower level after sometime, automatically. 9. Electronics - Overall total efficiency of the Electronics should be minimum 85% 10. Display Board - Size of 450 MM (18 inch) x 600 MM (24 inch) along with SS Nuts& Bolts, Clamp set to fix for round pole of 75 mm (3 inch) Dia at a height of 8 ft from ground level. Frame and Support arms made with 25 mm (1 inch) HDG square tube with 3 mm thick. Fixing Plate made with 5 mm thick Flat 50 mm wide and 50 mm height, with 12 mm Dia Hole as per the design attached. 11. Warranty: i) The Street Lighting System (including the battery) will be warranted for a period of five years from the date of installation. ii) The PV Module(s) will be warranted for a minimum period of 25 years from the date of installation. 		
2	GST @12% on 70% of item no: 01		
3	GST @18% on 30% of item no: 01		
4	Total (Rs.)		

Date :

Signature of the Supplier / Manufacturer with seal

FINANCIAL OFFER FOR SUPPLY & INSTALLATION OF 40W (2 Nos x 20W) LED BASED SOLAR STREET LIGHTING SYSTEM ALONG WITH DISPLAY BOARD ON TURNKEY BASIS

S.No	Name of Item	Unit Rate (Rs)	
		Non-Remote Areas	Remote Areas
1	<p>Design, Supply, Installation, Testing and Commissioning of 40W (2 Nos x 20W) LED based Solar Street Lighting System along with display board with the following components & specifications including installation and transportation charges on Turnkey basis</p> <ol style="list-style-type: none"> 1. SPV Module - 2 Nos X 12V, 100Wp capacity poly crystalline module with IEC/BIS test certification from MNRE / MNRE authorized test centers along with suitable Solar PV module support Structure. 2. Battery Bank - 2 Nos X 12.8V, 30Ah capacity Lithium Ferro Phosphate (LiFePO4) Battery with IEC/BIS test certification from MNRE / MNRE authorized test centers. 3. LED Luminaire - 2 Nos X 20W capacity LED based Solar luminary with inbuilt MPPT charge controller to operate dusk to dawn. The Luminaire must use high efficacy W-LED with minimum 135 lumens per watt and UV free. 4. Light output - Multiple light levels The lamp should have two levels of light to take care of different lighting needs during the night. 5. Mounting of light - Pole mounted, minimum 5.0 meters above the ground level. 6. GI Pole - 3 inch dia, 6 meters length and 3 mm thick GI Pole 7. Civil Foundation - The foundation size is 0.45 m X 0.45 m X 0.90 m. The Foundation shall be RCC pile foundation in CC (1:2:4). 8. Duty Cycle – Dusk to Dawn: 4 hours full light, rest of the time at lower level, with motion sensor. i) In case any movement is there, it senses it and glows to full level. ii) Then it comes back to lower level after sometime, automatically. 9. Electronics - Overall total efficiency of the Electronics should be minimum 85% 10. Display Board - Size of 450 MM (18 inch) x 600 MM (24 inch) along with SS Nuts & Bolts, Clamp set to fix for round pole of 75 mm (3 inch) Dia at a height of 8 ft from ground level. Frame and Support arms made with 25 mm (1 inch) HDG square tube with 3 mm thick. Fixing Plate made with 5 mm thick Flat 50 mm wide and 50 mm height, with 12 mm Dia Hole as per the design attached. 11. Warranty : i) The Street Lighting System (including the battery) will be warranted for a period of five years from the date of installation. ii) The PV Module(s) will be warranted for a minimum period of 25 years from the date of installation. 		
2	GST @12% on 70% of item no: 01		
3	GST @18% on 30% of item no: 01		
4	Total (Rs.)		

Date :

Signature of the Supplier / Manufacturer with seal

FINANCIAL OFFER FOR SUPPLY & INSTALLATION OF 60 W LED BASED SOLAR STREET LIGHTING SYSTEM ON TURNKEY BASIS

S.No	Name of Item	Unit Rate (Rs)
1	<p>Design, Supply, Installation, Testing and Commissioning of 60W LED based Solar Street Lighting System with the following components & specifications including installation and transportation charges on Turnkey basis</p> <ol style="list-style-type: none"> 1. SPV Module - 2 Nos X 12V, 100Wp capacity 'A' Grade Mono crystalline module with IEC/BIS test certification from MNRE / MNRE authorized test centers along with suitable Solar PV module support Structure (Powder coated). 2. Battery Bank - 12.8V, 60 Ah capacity Lithium Ferro Phosphate (LiFePO4) Battery with IEC/BIS test certification from MNRE / MNRE authorized test centers separately mounted in battery box. (Series and parallel combination of 48 Nos of 3.2V, 5000 mAh (or) 40 Nos of 3.2V, 6000 mAh rechargeable cells). 3. Battery Box - 250X250X200 mm of 2 mm thick battery box (powder coated) with reinforcement as required to house the above battery along with fixing arrangement to GI Pole. 4. LED Luminaire - 60W capacity LED based Solar luminary with inbuilt MPPT charge controller to operate dusk to dawn and with 2 core, 2.5 Sq mm copper cable of required length. The Luminaire must use high efficacy W-LED with minimum 135 lumens per watt and UV free. 5. Light output - Multiple light levels The lamp should have two levels of light to take care of different lighting needs during the night. 6. Mounting of light - Pole mounted, 9 meters above the ground level 7. GI Octagonal Pole - 9 meters of length, 3 mm thick (111mm dia x 3 mtrs + 90 mm dia x 3 mtrs + 76 mm dia x 3 mtrs with minimum Galvanizing of 85 microns on hot dip Galvanizing process) along with suitable Luminary arm to fix luminary. 8. J Bolts & Base Plate - 25 mm dia X 600 mm length GI J bolts along with base plate for making foundation to the GI Octagonal pole. 9. Accessories : <ol style="list-style-type: none"> i) Hard ware such as GI Nut & Bolts and SS Nut & Bolts for fixing Solar PV module and Battery box and Luminary arms as required. ii) 2.5 Sq sq.mm copper lugs (Ring type). 10. Civil Foundation - The Foundation shall be RCC pile foundation in CC(1:2:4). The soil stratum at work location is mostly hard rock covered with ordinary gravel and mixture of soft rock at varying depths. The foundation shall be cast by drilling 300 mm dia bore hole of minimum depth of 1.5 m below the OGL, laying of RCC (1:2:4) with 6 No's 10 mm dia main reinforcement and 8 mm dia stirrups at 250 mm c/c after inserting the G.I J bolts in position with the help of base plate. 11. Duty Cycle - Dusk to Dawn 4 hours full light, rest of the time at lower level, with motion sensor. <ol style="list-style-type: none"> i) In case any movement is there, it senses it and glows to full level. ii) Then it comes back to lower level after sometime, automatically. 	

	<p>12. Electronics - Overall total efficiency of the Electronics should be minimum 85%</p> <p>13. Warranty :</p> <p>i) The Street Lighting System (including the battery) will be warranted for a period of five years from the date of installation.</p> <p>ii) The PV Module(s) will be warranted for a minimum period of 25 years from the date of installation.</p>	
2	GST @12% on 70% of item no: 01	
3	GST @18% on 30% of item no: 01	
4	Total (Rs.)	

Date:

Signature of the Supplier / Manufacturer with seal

FINANCIAL OFFER FOR SUPPLY & INSTALLATION OF 120 W (2 Nos X 60W) LED BASED SOLAR STREET LIGHTING SYSTEM ON TURNKEY BASIS

S.No	Name of Item	Unit Rate (Rs)
1	<p>Design, Supply, Installation, Testing and Commissioning of 120W (2 Nos X 60W) LED based Solar Street Lighting System with the following components & specifications including installation and transportation charges on Turnkey basis</p> <ol style="list-style-type: none"> 1. SPV Module - 4Nos X 12V, 100Wp capacity 'A' Grade Monocrystalline module with IEC/BIS test certification from MNRE / MNRE authorized test centers along with suitable Solar PV module support Structure (Powder coated). 2. Battery Bank - 2 Nos X 12.8V, 60 Ah capacity Lithium Ferro Phosphate (LiFePO4) Battery with IEC/BIS test certification from MNRE / MNRE authorized test centers separately mounted in battery box.(Series and parallel combination of 48 Nos of 3.2V, 5000 mAh (or) 40 Nos of 3.2V, 6000 mAh rechargeable cells for each bank). 3. Battery Box - 2 Nos X 250X250X200 mm of 2 mm thick battery box (powder coated) with reinforcement as required to house the above battery along with fixing arrangement to GI Pole. 4. LED Luminaire - 2 Nos X 60W capacity LED based Solar luminary with inbuilt MPPT charge controller to operate dusk to dawn and with 2 core, 2.5 Sq mm copper cable of required length. The Luminaire must use high efficacy W-LED with minimum 135 lumens per watt and UV free. 5. Light output - Multiple light levels The lamp should have two levels of light to take care of different lighting needs during the night. 6. Mounting of light - Pole mounted, 9 meters above the ground level 7. GI Octagonal Pole - 9 meters of length, 3 mm thick (111mm dia x 3 mtrs + 90 mm dia x 3 mtrs + 76 mm dia x 3 mtrs with minimum Galvanizing of 85 microns on hot dip Galvanizing process) along with suitable Luminary arm to fix luminary. 8. J Bolts & Base Plate - 25 mm dia X 600 mm length GI J bolts along with base plate for making foundation to the GI Octagonal pole. 9. Accessories: <ol style="list-style-type: none"> i) Hard ware such as GI Nut & Bolts and SS Nut & Bolts for fixing Solar PV module and Battery box and Luminary arms as required. ii) 2.5 Sq sq.mm copper lugs (Ring type). 10. Civil Foundation - The Foundation shall be RCC pile foundation in CC(1:2:4). The soil stratum at work location is mostly hard rock covered with ordinary gravel and mixture of soft rock at varying depths. The foundation shall be cast by drilling 300 mm dia bore hole of minimum depth of 1.5 m below the OGL, laying of RCC (1:2:4) with 6 No's 10 mm dia main reinforcement and 8 mm dia stirrups at 250 mm c/c after inserting the G.I J bolts in position with the help of base plate. 11. Duty Cycle - Dusk to Dawn 4 hours full light, rest of the time at lower level, with motion sensor. 	

	<p>i) In case any movement is there, it senses it and glows to full level. ii) Then it comes back to lower level after sometime, automatically.</p> <p>12.Electronics - Overall total efficiency of the Electronics should be minimum 85%</p> <p>13.Warranty - i) The Street Lighting System (including the battery) will be warranted for a period of five years from the date of installation. ii) The PV Module(s) will be warranted for a minimum period of 25 years from the date of installation.</p>	
2	GST @12% on 70% of item no: 01	
3	GST @18% on 30% of item no: 01	
4	Total (Rs.)	

Date:

Signature of the Supplier / Manufacturer with seal

FINANCIAL OFFER FOR SUPPLY& INSTALLATION OF 160W (4 Nos X 40W) CAPACITY LED BASED SOLAR HIGH MAST LIGHTING SYSTEM ON TURNKEY BASIS

S.No	Name of Item	Unit Rate (Rs)
1	<p>Design, Supply, Installation, Testing and Commissioning of 160W (4 Nos X 40W) LED based Solar High Mast Lighting System with the following components & specifications including installation and transportation charges on Turnkey basis</p> <ol style="list-style-type: none"> 1. SPV Module - 4 Nos X 12V, 150Wp capacity mono crystalline module with IEC/BIS test certification from MNRE / MNRE authorized test centers along with suitable Solar PV module support Structure. 2. Battery Bank - 4 Nos X 12.8V, 75Ah capacity Lithium Ferro Phosphate (LiFePO4) Battery with IEC/BIS test certification from MNRE / MNRE authorized test centers. 3. LED Luminaire - 4 Nos X 40W capacity LED based Solar luminary with inbuilt MPPT charge controller to operate dusk to dawn.The Luminaire must use high efficacy W-LED with minimum 135 lumens per watt and UV free. 4. Light output - Multiple light levels The lamp should have two levels of light to take care of different lighting needs during the night. 5. Mounting of light - Pole mounted, 9 meters above the ground level 6. GI Octagonal Pole - 9 meters of length, 3 mm thick (111mm dia x 3 mtrs + 90 mm dia x 3 mtrs + 76 mm dia x 3 mtrs with minimum Galvanizing of 85 microns on hot dip Galvanizing process) along with suitable Luminary arm to fix luminary. 7. J Bolts & Base Plate - 25 mm dia X 600 mm length GI J bolts along with base plate for making foundation to the GI Octagonal pole. 8. Accessories : i) Hard ware such as GI Nut & Bolts and SS Nut & Bolts for fixing Solar PV module and Battery box and Luminary arms as required. ii) 2.5 Sq sq.mm copper lugs (Ring type). 9. Civil Foundation - The Foundation shall be RCC pile foundation in CC(1:2:4). The soil stratum at work location is mostly hard rock covered with ordinary gravel and mixture of soft rock at varying depths. The foundation shall be cast by drilling 300 mm dia bore hole of minimum depth of 1.5 m below the OGL, laying of RCC (1:2:4) with 6 No's 10 mm dia main reinforcement and 8 mm dia stirrups at 250 mm c/c after inserting the G.I.J bolts in position with the help of base plate. 10. Duty Cycle - Dusk to Dawn 6 hours full light, rest of the time at lower level 50% / customer requirement, automatically. 11. Electronics - Overall total efficiency of the Electronics should be minimum 85% 12. Warranty - i) The Solar High Mast Lighting System (including the battery) will be warranted for a period of five years from the date of installation. ii) The PV Module(s) will be warranted for a minimum period of 25 years from the date of installation. 	
2	GST @12% on 70% of item no: 01	
3	GST @18% on 30% of item no: 01	
4	Total (Rs.)	

Date:

Signature of the Supplier / Manufacturer with seal

FINANCIAL OFFER FOR SUPPLY& INSTALLATION OF 9W (3X3W) CAPACITY LED BASED SOLAR PATHWAY LIGHTING SYSTEM ON TURNKEY BASIS

S.No	Name of Item	Unit Rate (Rs)
1	<p>Design, Supply, Installation, Testing and Commissioning of 9W (3X3W) LED based Solar Pathway Lighting System with the following components & specifications including installation and transportation charges on Turnkey basis</p> <ol style="list-style-type: none"> 1. SPV Module - 12V, 30Wp capacity poly crystalline module with IEC/BIS test certification from MNRE / MNRE authorized test centers along with suitable Solar PV module support Structure. 2. Battery Bank - 12.8V, 15Ah capacity Lithium Ferro Phosphate (LiFePO4) Battery with IEC/BIS test certification from MNRE / MNRE authorized test centers. 3. LED Luminaire - 3X3W capacity LED based Solar luminaires with inbuilt MPPT charge controller fitted in Hexagonal shaped pole of 1.0 to 2.0 mtrs height. The Luminaire must use high efficacy W-LED with minimum 135 lumens per watt and UV free. 4. Civil Foundation -The foundation size is 0.2 m X 0.2 m X 0.4 m. The Foundation shall be RCC pile foundation in CC(1:2:4). 5. Duty Cycle - Dusk to Dawn 6. Electronics - Overall total efficiency of the Electronics should be minimum 85% 7. Warranty <ol style="list-style-type: none"> i) The Solar Pathway Lighting System (including the battery) will be warranted for a period of five years from the date of installation. ii) The PV Module(s) will be warranted for a minimum period of 25 years from the date of installation. 	
2	GST @12% on 70% of item no: 01	
3	GST @18% on 30% of item no: 01	
4	Total (Rs.)	

Date:

Signature of the Supplier / Manufacturer with seal

FINANCIAL OFFER FOR SUPPLY & INSTALLATION OF 15W CAPACITY LED BASED SOLAR BLINKER ON TURNKEY BASIS

S.No	Name of Item	Unit Rate (Rs)
1	<p>Design, Supply, Installation, Testing and Commissioning of 15W LED based Solar Blinker with the following components & specifications including installation and transportation charges on Turnkey basis.</p> <ol style="list-style-type: none"> 1. SPV Module - 12V, 80Wp capacity poly crystalline module with IEC/BIS test certification from MNRE / MNRE authorized test centers along with suitable Solar PV module support Structure. 2. Battery Bank - 12.8V, 24Ah capacity Lithium Ferro Phosphate (LiFePO4) Battery with IEC/BIS test certification from MNRE / MNRE authorized test centers. 3. LED Blinker : <ul style="list-style-type: none"> 15W capacity LED based Blinker Size – 300 mm (12 inch) & 200 mm (8inch) Body- Molded Polycarbonate, suitable for extreme weather conditions LENS-UV Stabilized, Transparent Polycarbonate GASKET-Rubber Gasket for sealing between Lens & Signal unit COLOUR – Red/Amber/Green PCB-1.5mm thick, Glass Epoxy for power supply/LED display LED used-Ultra bright, Water clear Viewing Angle – 24 degree for LED's No. of LED's – 176 LED (300mm) 140 LED (300mm) (Power Saver mode) 96 LED (200 mm) Charge Control – Built in Type helps to protect battery UNIT(CCU) – from deep charging as well as overcharging. Also protect panel from Reverse voltage. 4. GI Pole - 3 mm thick, 3 inch dia and 6 meters length 5. Civil Foundation - The foundation size is 0.45 m X 0.45 m X 0.90 m. The Foundation shall be RCC pile foundation in CC(1:2:4). 6. Electronics - Overall total efficiency of the Electronics should be minimum 85% 7. Warranty <ul style="list-style-type: none"> i) The Solar Blinker (including the battery) will be warranted for a period of five years from the date of installation. ii) The PV Module(s) will be warranted for a minimum period of 25 years from the date of installation. 	
2	GST @12% on 70% of item no: 01	
3	GST @18% on 30% of item no: 01	
4	Total (Rs.)	

Date:

Signature of the Supplier / Manufacturer with seal

FINANCIAL OFFER FOR SUPPLY & INSTALLATION OF SIM BASED SOLAR 360° PTZ CAMERA ON TURNKEY BASIS

S.No	Name of Item	Unit Rate (Rs)
1	<p>Design, Supply, Installation, Testing and Commissioning of Sim Based Solar 360° PTZ Camera with the following components & specifications including installation and transportation charges on Turnkey basis.</p> <p>1. SPV Module - 12V, 80Wp capacity mono crystalline module with IEC/BIS test certification from MNRE / MNRE authorized test centers along with suitable Solar PV module support Structure.</p> <p>2. Battery Bank - 12.8V, 24Ah capacity Lithium Ferro Phosphate (LiFePO4) Battery with IEC/BIS test certification from MNRE / MNRE authorized test centers.</p> <p>3. Camera: Sim Based 360° PTZ Camera Sensor:1/2.8 " Progressive Scan CMOS Image Sensor Compression format:H.265 High Profile Pixel:1920 * 1080P, 2MP Lens:3.6mm Rotation Angle: Horizontal 0-320° / Vertical 0-90° Number of White Lights: 4 nos, Number of Infrared Lights: 4 nos, SD Storage: Support 128GB Memory Card Support Email Notification and FTP Rotation Speed: Horizontal: 40°/s, Vertical: 40°/s Night Vision: Infrared Night Vision, Full Color Night Vision Waterproof Rating: IP65 Water Resistance APP: CAM HI</p> <p>4. GI Pole - 3 mm thick, 3 inch dia and 6 meters length</p> <p>5. Civil Foundation - The foundation size is 0.45 m X 0.45 m X 0.90 m. The Foundation shall be RCC pile foundation in CC(1:2:4).</p> <p>6. Electronics - Overall total efficiency of the Electronics should be minimum 85%</p> <p>7. Warranty: i) Camera : 1 year warranty ii) Battery: 5 years warranty iii) PV Module: 25 years</p>	
2	GST @12% on 70% of item no: 01	
3	GST @18% on 30% of item no: 01	
4	Total (Rs.)	

Date:

Signature of the Supplier / Manufacturer with seal