

Schedule B

Name of work : Providing Solar Rooftop System on New Govt. Girls Hostel at Khundh, Di. Navsari.

<u>Qnty</u>	<u>Unit</u>	<u>Sr.No.</u>	<u>Item Description</u>	<u>Rate After 1% LC</u>	<u>Amount</u>
1			<p>Supply, Installation, Testing & Commissioning of following size of Grid Tied Solar Power Plant with</p> <p>Solar Panels (ALMM approved): Frame Material : Anodized Aluminum alloy Frame With Twin Wall Profile, Front Cover : High Transmission Low-Iron Tempered Glass (AR Coated), High efficiency and positive power tolerance Pmax: 0/+5, Module Efficiency should be approx. 19.5%-22%, Normal operating temperature 45°C, Junction Box with Waterproof IP67 & MC4 Compatible and Enclosed with Bypass diodes, 100% Electroluminescence test to ensure error free Modules, Thep. temp. co-efficient of the PV module shall equal or better than -0.45%/degree C. Solar PV modules of minimum fill factor 75% to be used. Unit Production:- More than 4.5 Unit /kw /day (Actual)(1Year Avg) With 10 year Product warranty and 25 year Linear Power Warranty includes all mechanical and electrical parameters of the Solar panel. Modules must be complied to the DCR(Domestic content requirements). The Ration of AC to DC is 5:6 for the Installation capacity which are given in AC KW.</p> <p>Solar Inverter: MPPT Range: MPPT Range: 80-1000 V , Max efficiency: 97.5% - 98.9%, O/p Frequency: 50/60Hz, Operating Altitude (m) ≤4000, O/p Power Factor: ~1, O/P THDi: <3%, Operating Tempreture Range: -25~60°C, Integrated protection of Inverter are Anti-islanding Protection, Input Reverse Polarity Protection, Insulation Resistor Detection, Ground fault protection, Residual Current Monitoring Unit, Output Over Current Protection, Output Short Circuit Protection, Output Over Voltage Protection, PV array string fault Protection. Protection Degree: IP65, User Interface LCD & APP, Datalogger & Communication: GPRS / Wi-Fi.</p> <p>Integrated, Input Reverse Polarity Protection Integrated, Insulation Resistor Detection Integrated, Residual Current Monitoring Unit Integrated, Output Over Current Protection Integrated, Output Short Circuit Protection Integrated, Output Over Voltage Protection Integrated, Protection Degree: IP65, User Interface LCD & APP,Datalogger & Communication: GPRS / Wi-Fi, Module Mounting Structure: The mounting (Rectangular pipe / square pipe / circular pipe) with requisite cross bars, nuts and bolts, etc. shall be Hot deep galvanized with minimum 80micron coating. The Rectangular / square /circular hollow pipe section used for the structure should have a minimum thickness of 2.0 mm. other than above, the material thickness should be minimum 2.5 mm. A certificate of a structural engineer certifying the strength and stability of the mounting structure to withstand the weight and wind speed of 150 km/hour throughout the life span of 25 years of the system, shall be submitted by the vendors. Hot Dipped Galvanized steel coils. suitable arrangement for base plate for foundation , solar panel mounting, the structure should be suitable for carry the load of solar panel,wiring, sprinkler system etc. with necessary foundation work/wall mount, j bolt, anchor fastner etc. the nut bolt used for installtion of stucture should be (SS 304) quality.The ground clearance of the bottom most edge of solar panel shall not be less than 300 mm to 1200 mm or as per site's technical/feasibility requirement.</p> <p>a. Column –The minimum section (thickness) should be 60MM*40MM</p> <p>b. Rafter - The minimum section (thickness) should be 60MM*40MM</p> <p>c. Purlin - The minimum section (thickness) should be 40MM * 40MM</p> <p>Balane of System with necessary Swichgears (Suitabel size and protection of ACDB & DCDB), inter connecting wiring, earthing system as per the CEIG drawing approval, lightning arrester system as per the CEIG drawing approval, all liasoning work with various gov. dipartment like state nodal agency,DISCOM & CEIG is included in agency scope</p>		
22	Per KW		<p>(Excluding All charges namely GEDA Application fees, Solar connectivity Charges, Meter connectivity Charges, Meter testing Charges and system stability/strenthning charges.)</p> <p>(C) Grid Tied Solar Power System: 11 - 25 kW (3 - phase)</p>	42455.35	<p>Rupees Forty Two Thousand Four Hundred Fifty Five And Paise Thirty Five Only</p>
					934017.70

22	Per KW	2	Providing & erecting Automatic solar panel cleaning system for solar power projects which includes necessary plumbing work (UPVC pipes and accessories) from source of water to project site (upto 30 meters), Suitable size of sub mercible/ open well motor, necessary wiring for motor and sprinkler system with safety, timer circuit for automatically on/off the sprinkler system, necessary size oand number of nozzles/JET (minimum 1 Nozzle/Jet per module). (D) 21KW-50KW Cleaning System	3681.45	Rupees Three Thousand Six Hundred Eighty One And Paise Forty Five Only	80991.90
				Total Rs.		1015009.60

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