

Rates to filled up by the bidder and in next sheet details of the BOQ to be filled

Name of Work - Design, Engineering, Fabricating, Supplying, Installing, Testing and Commissioning of Grid connected Solar PV plant of size cummulative 800kWp at different premises in Loni.

Name of the Bidder

Sr. No	Description of item	Quantity (DC Side)	Unit	Rate/kW (Excl. GST)	Basic Amount (Excl. GST)	Rate in Words
1.1	Pravara Junior College & Ladies Hostel AC Side- 60kW GI Structure	80	kWp			
1.2	Pravara MBA - PIRENS, Pharmacy AC Side- 10kW x 3 no.s Structure Type- GI	30	kWp			
1.3	Pravara Engineering College AC Side- 100kW Structure Type- Short Rail	120	kWp			
1.4	Pravara Senior College AC Side- 60kW Structure Type- GI	80	kWp			
1.5	Pravara Kanya Vidya Mandir AC Side- 150kW Structure Type- GI	150	kWp			
1.6	Pravara Sainiki Campus AC Side- 60kW Structure Type- GI	80	kWp			
1.7	Pravara Agriculture Campus North AC Side- 60kW Structure Type- Short Rail	70	kWp			
1.8	Pravara Public School AC Side- 150kW Structure Type- GI	150	kWp			
1.9	Pravara Head Office AC Side- 40kW Structure Type- Car Port	40	kWp			
	Total	800	kWp			

Solar Project 800kW	
Basic Amount per kW (Rs.) Excl. GST	
Basic Amount (Rs.) Excl. GST	
GST Amount (Rs.)	
Total Amount (Rs.) Incl. GST (A)	

AMC of Solar Project	800
Tenure (Years)	5
Basic Amount per kW (Rs.) Excl. GST	
Basic Amount (Rs.) Excl. GST	
GST Amount (Rs.)	
Total Amount (Rs.) Incl. GST (B)	

Total Cost (Solar Project + 5 Years AMC)	
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		To be filled by the bidder		
	Particulars	Specifications	Make	Description
Structure		Type 1- GI MMS (Height above parapet i.e. 3ft to 4ft) with Cement Blocks 570kW- All Campuses except given below 80/120 microns Type 2- Short Rail Type (Aluminium) with Walkways 190kW (Engineering Campus & Agriculture Campus) Option3- Car Port (GI) Type 3- 40kW- Pravara Head Office		
Modules	PV Module	Mono Perc N-Type TOPCon Bi-facial Half Cut 144 Cells Above 540Wp ALMM Approved Warranty- above 10 years MNRE Approved		
Inverters	String Inverter capable of 50% DC overloading, but we don't have to overload above 35%	60kW Inverter for- Junior College, Senior College, Sainiki School, Agriculture College (Overloading DC Side up to 80kW)		
		100kW Inverter for- Engineering College (DC- 120kW), PKVM Campus, PPS Campus		
		Extra 50kW Inverter- PKVM Campus, PPS Campus		
Cables	DC Cable	Cu- 4 sqmm TUV Rated Class 1		
	AC Cable	3.5 core (Aluminum Armoured) APR		
	Earthing Cable	1 core 6 sqmm (Panel to panel looping) Above 35sq.mm Cu for LA GI- Patti		
Protective Devices	DCDB	DCDB with MCB & SPD		
	ACDB	ACDB (1 In- 1 Out) with MCB & SPD		
	MCCB	Near Net-meter		
	Lightning arrestor	ESE Type (55 metres radius)		
	Earthing	3 separate earthing for AC, DC & LA		
Other Electrical Mater	Miscellaneous Items	Cable Ties, Flexble Pipes, Cable Tray, Lugs, Ferrules, Plywood, Conduits, Glands, etc		
Meters	Net Meter	Secure Class - 0.2s, CTR- Dash/5A (2 Connections are HT) Remaining all are LT Connection With Modem		
	Generation Meter	Secure 100/5A Class - 0.5s		
	CT Net	Prasanna, Huphen or Reputed Make		
	CT Gen	Prasanna, Huphen or Reputed Make		
MSEB	Net-metering Process	Section, Subdivision, Division, Testing		
Labour & Transport		Panel installation, Electrical Installation, Transport, Other		

Plumbing	PVC Pipes & Motor	Should cover all the solar panels for cleaning purpose One STP for one Campus Must be able to maintain pressure of 4 bar Sprinklers not required		
Solar Unit Generation		1380 Units per kW per Annum with Annual Degradation of 1%		
Online Monitoring	RMS	WiFi or SIM Based RMS to monitor generation		
Customer Scope		Installation of New Transformer, Merging MSEDCL Meters into single, Load Extension		