



Kamalgauri Hiru Patil Shikshan Sanstha's

BALASAHEB THACKERAY LAW COLLEGE

Affiliated to University of Mumbai & Approved by BCOI

College Code: 150 / Website: <https://btlawcollege.com> / Contact: 8452082911

Add: Plot No. 73, Sector 17, Talaja Phase-2, Tal. Panvel, Dist. Raigad, Navi Mumbai-410208



CRITERION - 7

INSTITUTIONAL VALUES & BEST PRACTICES

7.1

INSTITUTIONAL VALUES AND SOCIAL RESPONSIBILITIES

Criteria 7:1:2

**The Institution has facilities for
alternate sources of energy and
energy conservation measures.**




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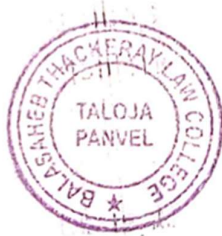
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Criteria 7:1:2

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Index

7.1.2

Sr. No	Description	Particulars
1	Solar Energy	<ul style="list-style-type: none">• Solar Panel Geotag Photograph.• Solar Energy System Bill
2	Wheeling to Grid	<ul style="list-style-type: none">• Solar Energy Details
3	Sensor Based Energy Conservation	<ul style="list-style-type: none">• Sensor based Bulbs
4	Use of LED bulbs/power efficient equipment's	<ul style="list-style-type: none">• LED bulbs in college• Power efficient equipment's in college




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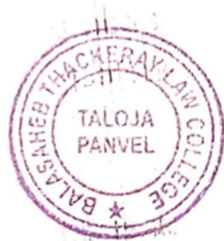
7.1.2 The Institution has facilities for alternate sources of energy and energy conservation measures –

- 1. Solar Energy**
- 2. Wheeling to Grid**
- 3. Biogas Plant**
- 4. Sensor based energy conservation**
- 5. Use of LED / Power Saving equipment's**
- 6. Wind Mill/ any other clean Green Energy**

Options

- A. Any 4 or More of the above**
- B. Any 3 of the above**
- C. Any 2 of the above**
- D. Any 1 of the above**
- E. None of the above**

Answer: A. Any 4 of the above.




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- **Solar Energy Geotag Photo**




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- **Solar Energy System**



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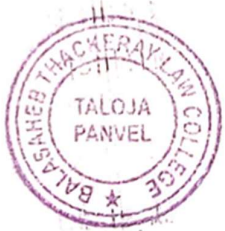
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Wheeling to Grid

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- Wheeling to Grid:
- Solar Energy Details Documents

INVOICE				
TOUCH SOLAR			TS002/24-25	
Shop No 4, Shop No 4, Mita Arcade CHS, Sec 21, Kharghar			Invoice Date:	05-Apr-24
Navi Mumbai, PIN - 410210, Mob - 8433704800 / 9800			PAN NO - ANUPK3020D	
touchsolar@yahoo.com				
Customer Details				
KAI KAMALGAURI H P SHIKSHAN PRASARAK MANDAL				
Plot No 73, Sector 17, Talaja Phase II, Near Pedhar Metro				
Talaja Panchanand, Panvel Taluka, Dist - Raigad -410208				
SI No	Item Description	Units / KW	Unit Price (Rs)	Total Price (Rs)
1	Solar Modules - KW (Make - Renewsys)	25	31,500.00	787,500.00
2	Solar Inverter (Make - Sungrow)	1	143,750.00	143,750.00
3	Structural items - Rails, clamps, Accessories	1 set	138,500.00	138,500.00
4	Electrical Items - DC & AC Cables, Earthing components, Distribution boxes & switches, Accessories	1 set	121,500.00	121,500.00
5	Panel Cleaning system with pump & sprinklers	1 set	43,750.00	43,750.00
7	Net Meter, Generation Meter Meter & liasioning expenses alongwith MSEB fees	1 set	31,250.00	31,250.00
8	Solar plant installation, testing & commissioning expenses	1 set	115,000.00	115,000.00
Grand Total				1,381,250.00
In Words - Thirteen Lacs Eighty One Thousand Two Hundred & Fifty Rupees				
Comments				
Bank Account Details			For TOUCH SOLAR	
Bank Name - AXIS BANK LIMITED			 Proprietor	
Account Type - Current				
Account Number - 921020032221831				
IFSC Code - UTIB0003526				
Branch & City - Kharghar, Navi Mumbai				
			Seal & Signature	



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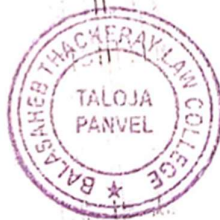


SOLAR GRID -TIE STRING INVERTER

TECHNICAL SPECIFICATIONS

MODEL	P3IS SERIES (10)						P3IT SERIES (30)								
	P3IS-1K	P3IS-1.5K	P3IS-2K	P3IS-3K	P3IS-4K	P3IS-5K	P3IT-6K	P3IT-10K	P3IT-15K	P3IT-20K	P3IT-25K	P3IT-30K	P3IT-40K		
Rating	1 kW	1.5 kW	2 kW	3 kW	4 kW	5 kW	6 kW	10 kW	15 kW	20 kW	25 kW	30 kW	40 kW		
INPUT SIDE (DC)															
Maximum Input Power (kW)	1.2	1.8	2.4	3.6	4.8	6	7.2	12	18	24	30	36	48		
Maximum Input Voltage (V)	450		500		600		1600								
Startup Input Voltage (V)	90						120			330			280		
Maximum Input DC Voltage Range (V)	50-900		100-900		150-900		200-900			250-900			300-900		
Maximum Input Current (A)	10		15+15		20+15		25+15		30+15		35+15+15		45+15+15		
MPP1 Number/No. of Strings per MPP1	1,1		2,1		2,1		2,1		2,2		4,2		4,2		
OUTPUT SIDE (AC)															
Rated Output Power (kW)	1	1.5	2	3	4	5	6	10	15	20	25	30	36	48	
Rated AC Grid Voltage (V)	220/230/240						400			480		480		480	
AC Grid Voltage Range (V)	180-270 (Adjustable)						270-420 (Adjustable)			330-480 (Adjustable)		380-470 (Adjustable)		380-470 (Adjustable)	
Operating Phases	Single Phase						Three Phase			Three Phase		Three Phase		Three Phase	
Rated AC Output Current (A)	4.3	6.5	8.7	13	17.4	21.7	8.7	14.5	21.2	28.7	36.1	43.3	43.3	48.1	
Maximum AC Output Current (A)	6.1	9.2	12.2	15.7	21	25.8	10	19.7	25	33.3	41.7	47.6	47.6	52.8	
Output Power Factor	>0.99						0.8 (min) - 0.8 (typical)								
Grid Current THD	< 3%						< 3%								
DC Injection Current (mA)	< 20						< 20		< 50						
Rated Grid Frequency (Hz)	50						50								
Operating Temperature Range (°C)	-27 - 57						-27 - 57								
EFFICIENCY															
Max Efficiency	94.7%		97.0%		97.8%		98.2%		98.0%		98.5%		98.5%		
Euro Efficiency	94.3%		96.0%		97%		97.5%		97.0%		97.5%		98.0%		
MPP1 Efficiency	>99.0%						>99.0%								
PROTECTIONS															
Built-in Protections	DC Reverse Polarity, Start/Overload, Output Over Voltage, Output Over Current, Insulation Resistance Monitoring, Residual Current Detection, Surge Protection, Grid Monitoring, Mismatch Protection, Temperature Protection														
GENERAL DATA															
Dimensions (mm)	270W X 433H X 115D			339W X 505H X 122.5D			430W X 613H X 128D			530W X 730H X 130.5D			582		
Weight (kg)	5.2		5.6		12.8		15.8		29		30		57.2		
Topology	Transformerless						Transformerless								
Self-Consumption (Watt) (Night)	< 1						< 1								
Ingress Protection	IP 65						IP 65								
Noise emission (dB)	< 30 (Typical)						< 30 (Typical)								
Coating	Industrial Coating						Neutral Coating								
Maximum Operational Altitude (Meters)	4000						4000								
Designed Life (Years)	> 25						> 25								
Operating Ambient Temperature Range	-25° to 60°C						-25° to 60°C								
Operating Humidity Humidity	0 - 100%						0 - 100%								
FEATURES															
DC Connection	MC4 Connector						MC4 Connector								
AC Connection	IP67 Rated Plug						IP67 Rated Plug			Terminal Connectors					
Display	LCD 2.8" TFT						LCD 2.8" TFT			7" LCD Color Screen					
Interface	RS 485, RS 485/RS 422 (Optional)						RS 485, RS 485/RS 422 (Optional)								
CERTIFICATE															
Grid Connection	IEC 61727						IEC 61727								
Anti-Islanding Protection	IEC 62118						IEC 62118								
Environmental Testing	IEC 60068-2 (1-2-14-30)						IEC 60068-2 (1-2-14-30)								
Safety	IEC 62108-1/2						IEC 62108-1/2								
Efficiency Measurement	IEC 61683						IEC 61683								
EMC	IEC 1000, EN 1000-4-1:2007, EN 1000-6-3:2007														

Note: Specifications are subject to change



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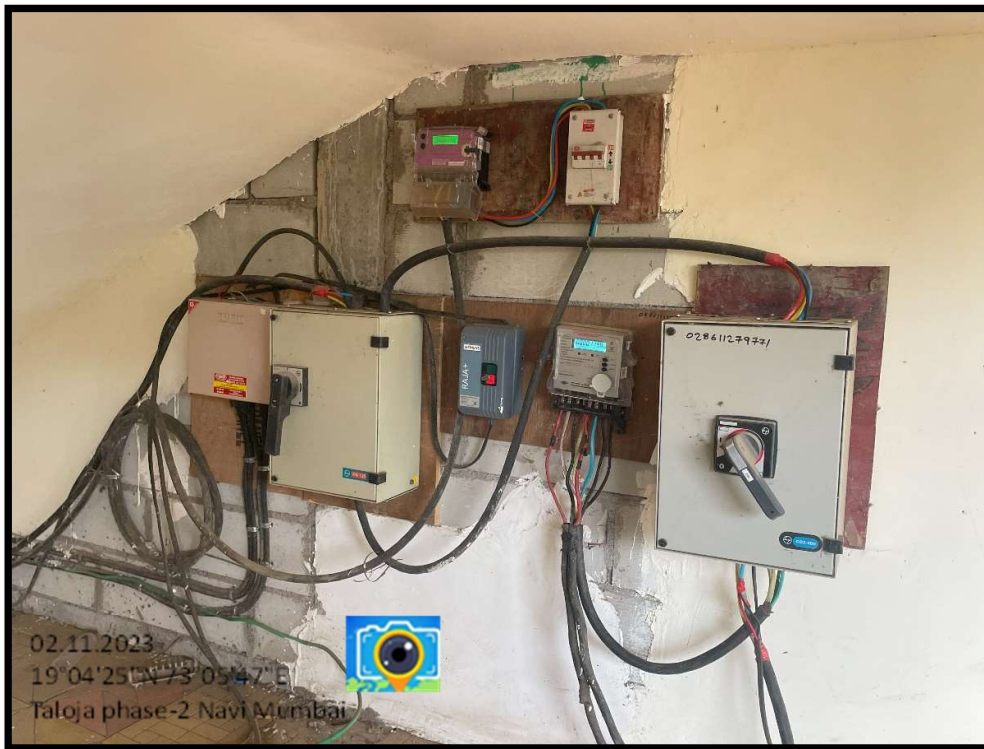
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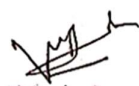
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- **Solar Energy System Photographs**




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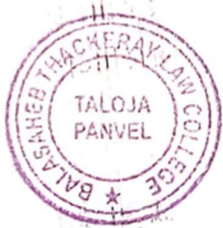
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Sensor Based Energy Conservation

7.1.2



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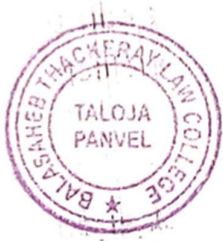
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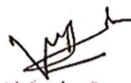
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- **Sensor Based Energy Conservation**

1. Sensor Based led bulbs in class rooms




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2. Sensor Based led bulbs in corridor



3. Sensor Based led bulbs in library


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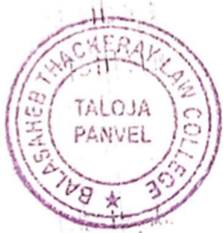
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Use of LED/Power savings Equipment's 7.1.2



- Use of


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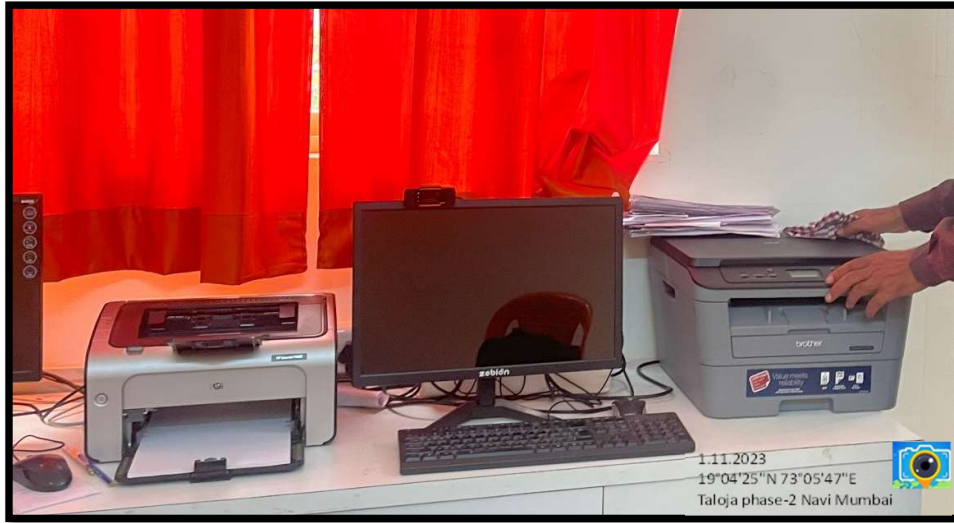



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LED/Power savings Equipment's

1.Power Saving branded Printer




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2. Power saving LED bulb in Moot Court:




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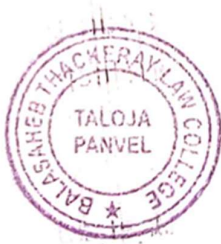
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3. Power savings computers



-----Save Energy Save Earth-----



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