

Premium Quality

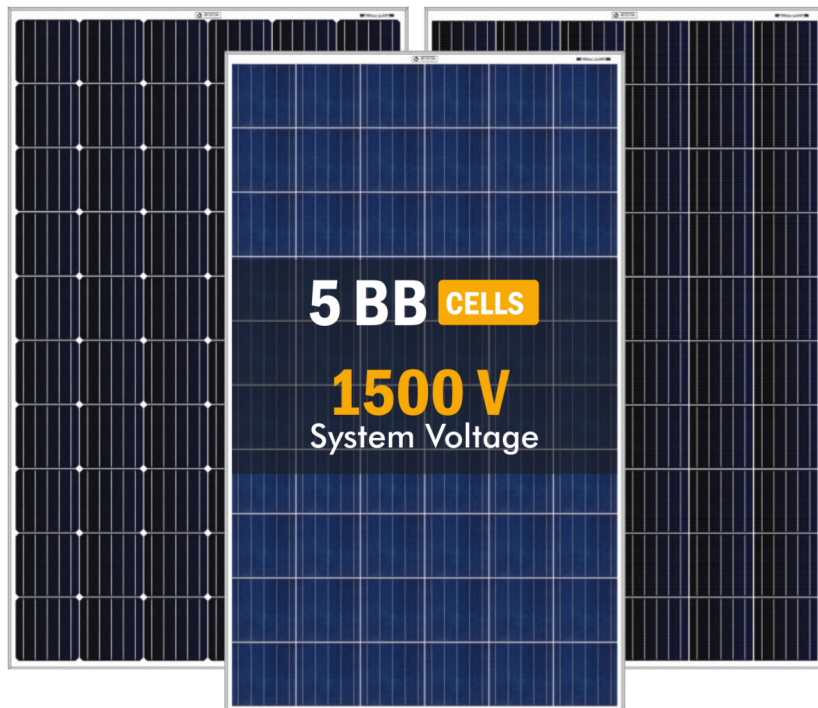
# Solar PV Modules

60  
Cells

Polycrystalline Solar PV Modules 250-280 W  
Mono PERC Solar PV Modules 315-335 W



bluebird SOLAR  
co-powering the future



Increased module power output.



Maximum system voltage of 1500 V DC.



Reduced BOS cost.



High area efficiency.



Easy installation & handling for various application.

## Why Bluebird ?

- ◆ Backed by a 40 year old reputed brand name.
- ◆ Use of Tier-1 raw material.
- ◆ Intensive R&D, and stringent QC.
- ◆ Highest standards of product performance.
- ◆ Robust supply chain & logistics.

### More Reliable Products

- | PID Resistant 5BB cells and encapsulants.
- | Salt mist & ammonia resistant.
- | AR Coated tempered PV grade glass.
- | Only positive power tolerance.
- | Excellent low light performance.
- | Certified to withstand harsh environmental conditions.
- | 100% EL Inspected to ensure micro crack free modules.



## Applications



On-grid Large scale utility projects



On-grid rooftop Industrial & commercial system



Off-grid rooftop systems for residential buildings



Solar water pumping systems



Off-grid systems for Filling Stations



Electric Vehicles charging station



Street lighting applications



Module Series	POLYCRYSTALLINE				MONOCRYSTALLINE-PERC		
	BBS24F250	BBS24F270	BBS24F275	BBS24F280	BBS24MF315	BBS24MF325	BBS24MF335
<b>Electrical Characteristics at STC:</b>							
Maximum Power Pmax (Wp)	250.00	270.00	275.00	280.00	315.00	325.00	335.00
Maximum Voltage Vmpp (V)	27.22	30.40	30.46	30.51	32.80	33.70	34.40
Maximum Current Imp (A)	9.19	8.88	9.03	9.18	9.60	9.65	9.75
Open Circuit Voltage Voc (V)	32.02	35.80	35.86	35.91	40.30	40.78	46.01
Short Circuit Current Isc (A)	9.74	9.41	9.57	9.73	10.04	10.18	9.44
Module Efficiency (%)	16.30	16.65	17.00	17.25	18.80	19.40	20.50

STC: 1000W/m<sup>2</sup> irradiance, 25°C cell temperature, AM1.5G spectrum according to EN 60904-3  
Average relative efficiency reduction of <5% for every 200W/m<sup>2</sup> reduction in Irradiance, according to EN 60904-1

<b>Electrical Characteristics at NOCT:</b>							
Maximum Power Pmax (Wp)	185.97	195.90	199.20	203.00	224.30	237.00	244.00
Maximum Voltage Vmpp (V)	27.72	28.51	28.71	29.00	33.88	31.32	31.96
Maximum Current Imp (A)	6.71	6.87	6.94	7.10	6.62	7.56	7.64
Open Circuit Voltage Voc (V)	35.08	35.17	35.48	35.71	41.65	38.56	39.16
Short Circuit Current Isc (A)	7.04	7.16	7.21	7.29	7.02	8.01	8.24

NOCT: 800W/m<sup>2</sup> irradiance, 20°C ambient temperature, Wind Speed 1m/sec

Temperature coefficient (Tc) and permissible operating conditions		
Tc of Open Circuit Voltage (β)	-0.310%/°K	-0.300%/°K
Tc of Short Circuit Current (α)	0.050%/°K	0.060%/°K
Tc of Power (γ)	-0.410%/°K	-0.370%/°K
NOCT	46 ± 2°C	46 ± 2°C
Maximum series fuse ratings	30A	30A
Temperature Range	-40°C to +85°C	-40°C to +85°C
Maximum System Voltage	1000/1500 V DC	1000/1500 V DC

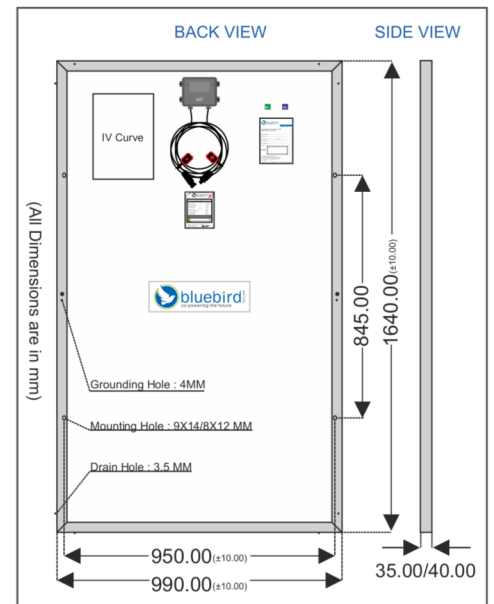
Mechanical Data	
Dimension (LxWxH)	1640mm x 990mm x 35/40mm (± 10mm)
Solar Cells	Poly 54(9x6) / 60(10x6) Polycrystalline Solar cells, 5BB, (157 x 157mm) Mono 60(10x6) Mono PERC Solar cells, 5BB, (157 x 157mm / 159x159mm)
Weight	18.5 Kg
Junction Box	IP 67 rated with 3 bypass diodes
Cables & Connectors	4 sq. m solar cable 1000mm, 2 Nos. black MC4 connectors
Superstrate	3.2 mm high transmission low iron tempered glass (AR coated/Non coated)
Cell Encapsulant	PID Free EVA (Ethylene Vinyl Acetate) - FC/UFC
Backsheet	Composite Film - White (Black & Transparent optional)**
Frame	Silver Anodized Aluminum frame with twin wall profile
Application Class	Class A (safety class II)
Mechanical Load Test	Sustain heavy static load (2400 Pa & 5400 Pa or 550 kg/m <sup>2</sup> )

\*\*Refer to Bluebird Solar's warranty documents for terms and conditions.

\*\*Black and transparent backsheet without ICE certification.

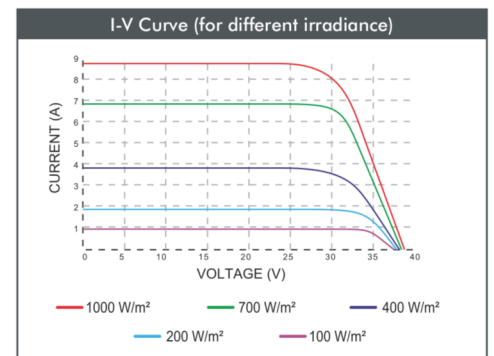
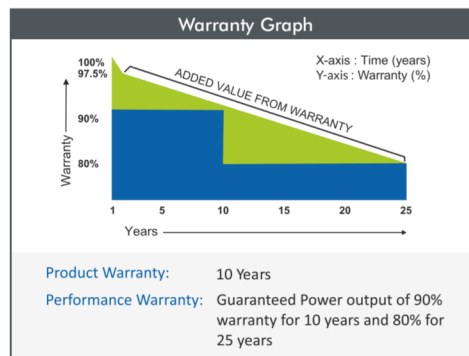
Specification and electrical data included in this datasheet are subject to change without notice. Please confirm your requirements with the company representative while placing your order.

Note: It is mandatory to make negative grounding of modules in all installation to avoid PID Issue.



Approvals and certifications	
Products:	IEC 61215 Ed 2, ROHS, IEC 61730 IEC 61701, CE, UL 1703, CEC, CE
Manufacturing:	ISO 9001:2015, ISO 14001: 2015 ISO 45001:2018

Packaging Information		
Container	20'GP	40'GP
Pallets/Container	10	24
Pieces/Container	360	840



## CORPORATE OFFICE

70, Rajasthani Udyog Nagar Industrial Area, G.T. Karnal Road,  
(Opposite Jahangirpuri Metro Station) Delhi-110033

## WORKS

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