

# bio 200-220

POLY-CRISTALLINE

BIOENERGY Solar Photovoltaic Panels stand for quality, durability and most importantly, high-performance. Our experience, capacity of research, continuing development and improvement have turned us into a company recognized in the sector by the high value offered to our clients.

Highly transparent solar glass of 3.2 mm. and anodized aluminum frame for a perfect stability and a long duration. Sheeting at constant temperature provides a perfect cure of the module avoiding the formation of bubbles. The distance between the edge of the frame and the cell circuitry is optimized to ensure both waterproof sealing and maximum module size reduction.



## Electrical Characteristics

	200	205	210	215	220
Reference	P120200	P120205	P120210	P120215	P120220
Maximum power (Wp)	200	205	210	215	220
Max. power voltage (Vmax)	26.84	27	27.3	27.6	27.9
Max. power current (Imax)	7.45	7.6	7.7	7.8	7.9
Open circuit voltage (Voc)	32.7	33	33.3	33.8	34.2
Short circuit voltage (Isc)	8.16	8.28	8.4	8.5	8.6
Module Eff. (%)	13.6	14	14.28	14.6	14.96
Operating temperature	-40°C + 85°C				
Maximum system voltage	1000 V(IEC)				
Power tolerance (%)	0-3%				

## Mechanical Characteristics

Solar cells	Polycrystalline silicon
Dimensions	1482x992x40 mm
Weight	17 kg
No. Cells	54 pcs (156x 156 mm) Silicon(6x9mm)
Output cables length	1000 mm
Cable cross section	4 mm <sup>2</sup>
Construction	High transmission , low iron, tempered glass 3.2 mm
Junction box	3 bypasses
Connectors	MC4 compatible

## Temperature Coefficients

Nominal operating cell temperature (NOCT)	47 °C ± 2°C
Temperature coefficient of power (P <sub>MAX</sub> )	-0.40 W/°C
Temperature coefficient (VOC)	-0.30 V/°C
Temperature coefficient (ISC)	0.04 A/°C
Hail diameter 23 m/s	Up to 25mm
Continuous wind pressure	< 5400 Pa

The 10 years product warranty surpasses the warranty required by law.

The performance warranty is for 25 years: After 10 years, modules still produce a minimum 90% of their nominal performance. After 25 years modules still produce a minimum 80% or their nominal performance.

## Dimensions

