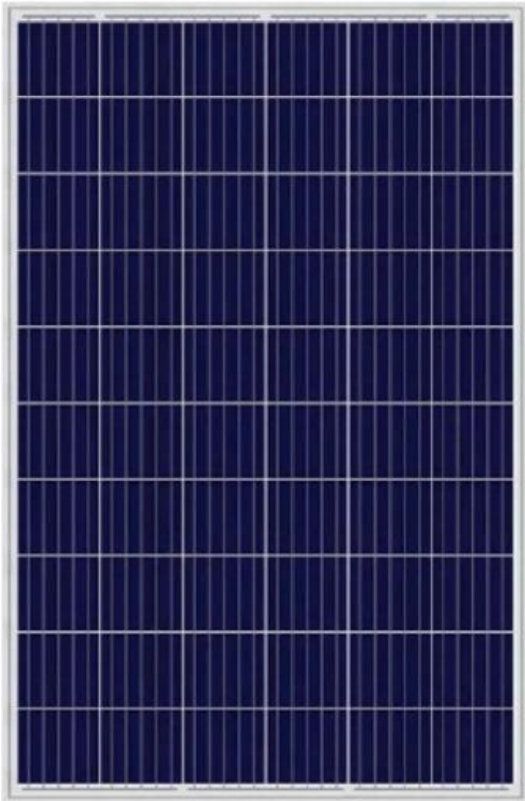


# BIGSOLAR

## Polycrystalline PV Panel 60 Cells 290W (SW 290P-60)



### Poly Solar Panel Features



Widely using of the most popular and mature type of modules for solar system



High power output and highest conversion efficiency of 18.10%



Anti-reflective and anti-soiling surface reduces power loss form dirt and dust



Outstanding Performance in low-light irradiance environments



Excellent mechanical load resistance: Certified to withstand high wind loads (2400Pa) and Snow loads (5400Pa)



Positive power tolerance: 0~+5W

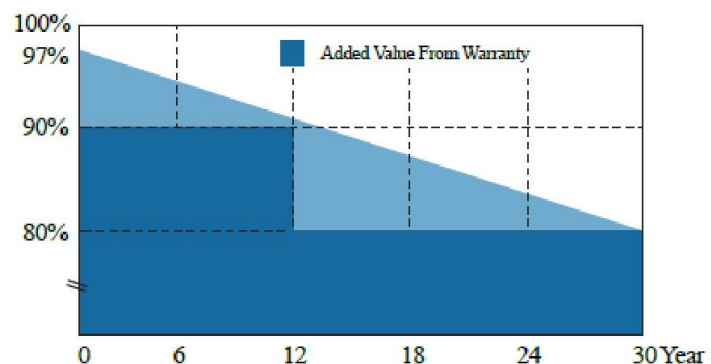


### Warranty

12 years for product defects in materials & workmanship  
12 years for 90% of warranted minimum power output  
30 years for 80% of warranted minimum power output  
30 years liner warranty

### Reliable Quality

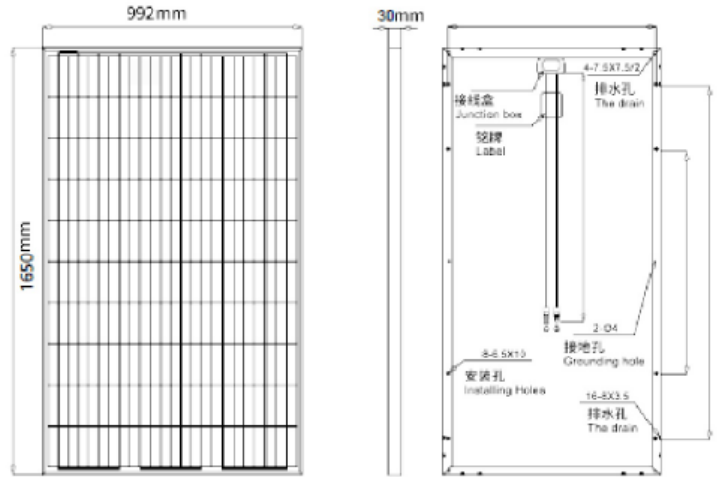
Positive power tolerance 0~+5W  
100% EL Double inspection ensures modules are defects free  
Modules Binned by Current to improve system performance  
Potential induced Degradation (PID) Resistant



## Technical Parameters

Cell (mm)	156.75*156.75
Weight (kg)	17.5
Glass Thickness	4/3.2mm
Dimensions (L*W*H) (mm)	1650*992*30mm
Cable Cross Section (mm <sup>2</sup> )	4
Cable Cross Section Length (mm)	900/1200
No. of Cells and Connections	60 (6*10)
Junction Bos	≥ IP67
Connector	MC4 Compatible

## Engineering Drawings



## Working Conditions

Maximum System Voltage	DC 1500V (IEC)
Operating Temperature	-40°C - +85°C
Maximum Series Fuse	15A
Maximum Static Load, Front (e.g. snow & wind)	5400 Pa (112 lb/ff <sup>2</sup> )
Maximum Static Load, Back (e.g. wind)	2400 Pa (50 lb/ff <sup>2</sup> )
NOCT	45±2°C
Positive power tolerance	0~+5W
Application Class	Class A

## Packaging Configuration

Modules Per Pallet	31 PCS
Modules Per 40HQ	952 PCS

## Electrical Parameters

Encapsulation	Class/Eva/Cell/Eva/Backsheet
Maximum Power P <sub>max</sub> (W)	290
Maximum Power Voltage (V <sub>mp</sub> /V)	31.90
Maximum Power Current (I <sub>mp</sub> /A)	9.19
Open Circuit Voltage (V <sub>oc</sub> /V)	39.50
Short Circuit Current (I <sub>sc</sub> /A)	9.65
Cell Efficiency (%)	19.86
Module Efficiency (%)	17.50
Power Tolerance (W)	0~+5W
Temperature Coefficient of I <sub>sc</sub> (α <sub>Isc</sub> )	+0.059%/C
Temperature Coefficient of V <sub>oc</sub> (β <sub>Voc</sub> )	-0.330%/C
Temperature Coefficient of P <sub>max</sub> (γ <sub>Pmp</sub> )	-0.410%/C
STC	Irradiance 1000W/m <sup>2</sup> , Cell Temperature 25°C, Air Mass 1.5

### Module SW290P-60

## I-V CURVE

