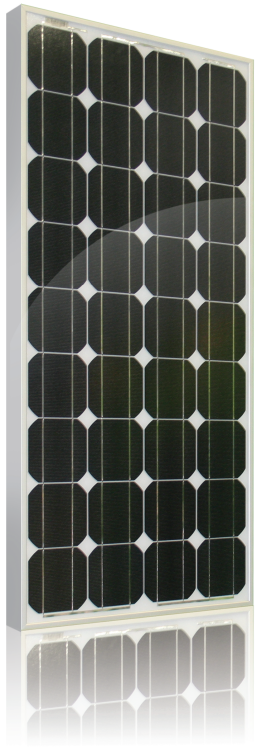


# TSM-36 80Watt-90Watt-95Watt-100Watt

## Technology & Quality

A complete photovoltaic industry chain  
 Beyondsun group have a complete photovoltaic industry chain including crystalline wafer, solar cells, solar modules and photovoltaic system applications.

Top quality  
 We guarantee our products above 90% power output in 10years and above 80% in 25years, working life over 25years.



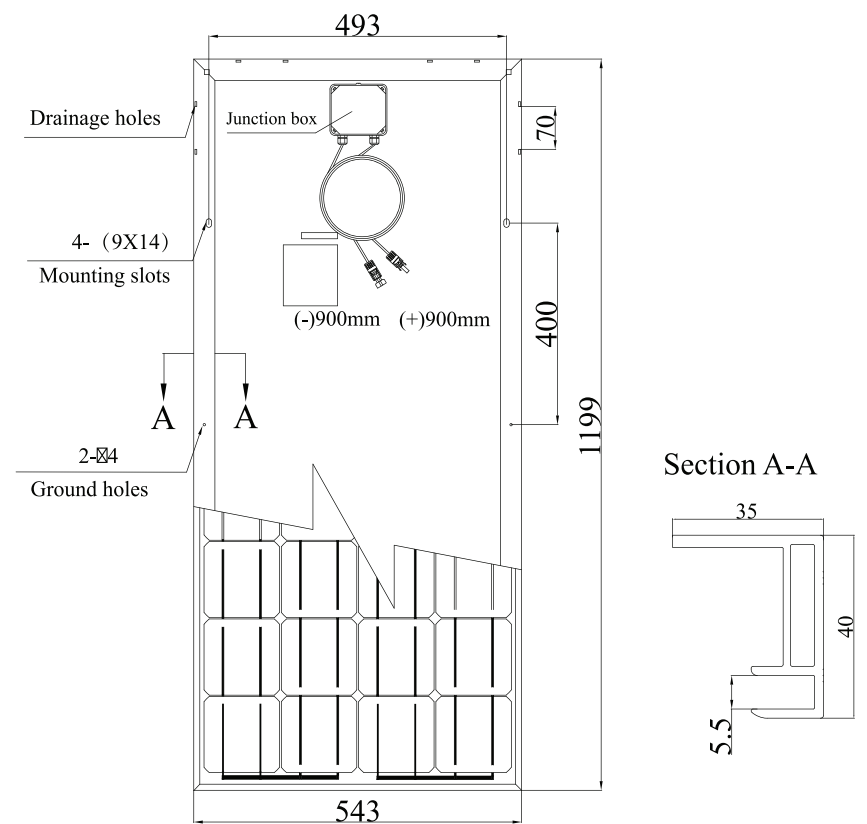
## Features

- High-efficiency solar cell ensures high performance of solar module and create more power in peak hours
- Anti-reflecting coating and high-transmission rate glass increase the power output and mechanical strength of solar module
- Torsion and corrosion-resistant anodized frame ensures dependable performance, even through harsh weather conditions
- Lightweight and pre-drilled mounting holes for easy installation
- Water-resistant junction box
- Designed specially to meet our customer demands for residential, commercial and industrial use



## Mechanical Characteristics

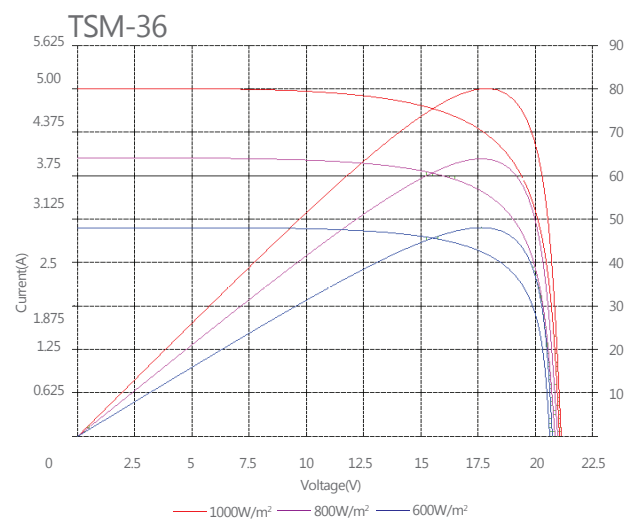
Type of Cell	Poly-Crystalline 125x125mm / 165mm Diagonal
Cells Array and Number	4 x 9 (36pcs)
Dimensions	1199 x 543 x 40mm
Weight	7.2kg
Front Glas	3.2mm Tempered Glass
Frame	Anodized Aluminium Alloy
Encapsulation	Glass/EVA/Cells/EVA/TPT
Relativ	0 to 100%
Resistance	227g steel ball fall down from 1m height and 60m/s Wind
Snow load parameters	2400Pa



## Temperature Coefficients

Nominal Operating Cell Temperature(NOCT)	45°C ± 5°C
Temperature Coefficient of Pmax	-(0.431±0.05)%/K
Temperature Coefficient of Voc	-(0.355±0.01)%/K
Temperature Coefficient of Isc	(0.024±0.01)%/K
Maximum Series Fuse/current rating	6A

## I-V Characteristics Curve



## Electrical Characteristics

Characteristics	TSM080	TSM090	TSM095	TSM100
Open-Circuit Voltage (Voc)	21.19V	21.41V	21.52V	22.61V
Optimum Operating Voltage (Vmp)	17.79V	17.87V	17.91V	18.11V
Short-Circuit Current(Isc)	5.00A	5.51A	5.81A	5.90A
Optimum Operating Current (Imp)	4.50A	5.04A	5.31A	5.53A
Maximum Power at STC (Pmax)	80W	90W	95W	100W
Module Efficiency	12.29%	13.82%	14.59%	15.36%
Operating Temperature	-40°C to +85°C			
Maximum System Voltage	1000V DC			
Power Tolerance	0 / +3%			
STC:Irradiance 1000W/m <sup>2</sup> , Module temperature 25°C, AM=1.5				