GreenWatts Solar Panels

SUPERIOR PERFORMANCE & RELIABILITY

HS54-F-405-MN

HT54-18X(PD)-F-405

Solar Panel Monocrystalline Double Glass Perc Module

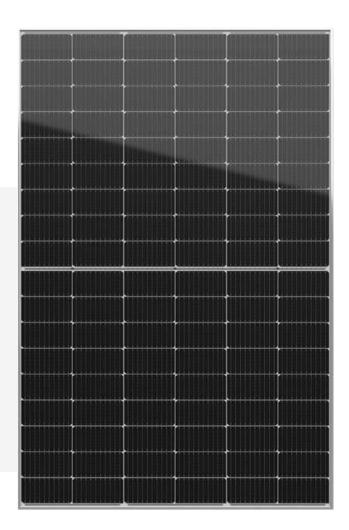
HIGHLIGHTS

- Maximum Power Output: 405W

- Maximum Efficiency: 20.7%

- Number of Cells: 108 (6x18)

- Bifaciality: 70 ±5 %





Optimized for High Voltage Systems

- Specifically designed to align with advanced high voltage system requirements.
- Maximum Efficiency up to 20.7%
- Cost effective solutions designed to offer a competitive balance of system cost suitable for utility-scale projects.



Durability in Extreme Conditions

- Engineered to endure harsh environmental conditions, such as extreme temperatures, high humidity, salt, mist, and sand.
- Supports up to 5400 Pa for snow loads and 2400 Pa for wind loads, reinforcing module reliability in diverse environmental conditions.



Enhanced Efficiency with Half Cut Cell Technology

- Minimizes resistive losses and reduces shading impact, boosting overall efficiency.
- Ensures long term performance against Potential-Induced Degradation.

High Reliability







Certification:













ISO 9001 ISO 14001 ISO 45001



IEC 61215 IEC 61730

MECHANICAL CHARACTERISTICS

Solar Cell	Monocrystalline 182 x 91mm		
Number of Cells	108 (6x18)		
Dimensions	1722 x 1134 x 30mm 67.80 x 44.65 x 1.18 inches		
Weight	24.0 kg 52,911	b	
Front Glass	High transmission coated tempered glass		
Back Glass	Heat strengthened glass		
Frame	Anodized aluminium alloy		
Junction Box	IP68 Rated		
Output Cables	4mm² 0,006200	01 in² (IEC)	
Connectors	MC4		
Maximum Power in STC (Pmax)		405 W	
Maximum Operating Voltage (Vmp) 31.31 V			
Maximum Operating Current (Imp)		12.95 A	
Open Circuit Voltage (Voc)		37.19 V	
Short Circuit Current (Isc)		13.91 A	
Module efficiency		20.7%	
Operating Temperature of the module		-40°C ~ +85°C	
Maximum System Voltage		1500V DC	
Power Tolerance		0 ~ +3%	
STC Irradiance 1000W/m², Cell Temperature 25°C, Air Mass 1.5			

TEMPERATURE CHARACTERISTICS

NMOT	43 ±2 °C 109.4 ±35.6 °F
Temperature Coefficient of PMAX	-0.33% /°C
Temperature Coefficient of VOC	-0.26% /°C
Temperature Coefficient of ISC	+0.042% /°C

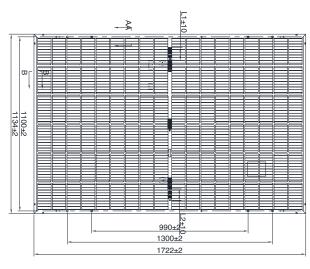
PACKING CONFIGURATION

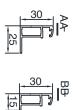
Module per Box	36 Pieces
Module per 40' Container	936 Pieces

ADDITIONAL INFORMATION

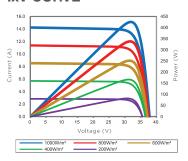
Snow and wind loads	Wind - 2400Pa Snow - 5400Pa
IEC Protection Class (I, II, III)	II
Max installation altitude	2000m
Allow roof pitch/angle	Minimum 10 degrees
Max Series Fuse Rating	25A
Fire Rating	Type 1
Front Cover (material / glass thickness)	AR 2.0mm
Back Cover (material / glass thickness)	Normal glass 2.0mm
Bifaciality	70 ±5 %

ENGINEERING DRAWING

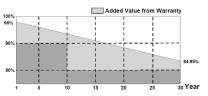




IxV CURVE



PERFORMANCE WARRANTY



*Specific information is referred to the product quality guarantee

