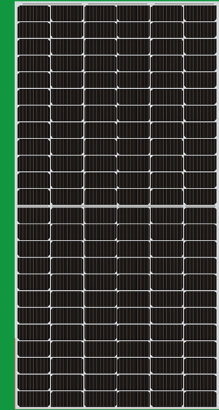
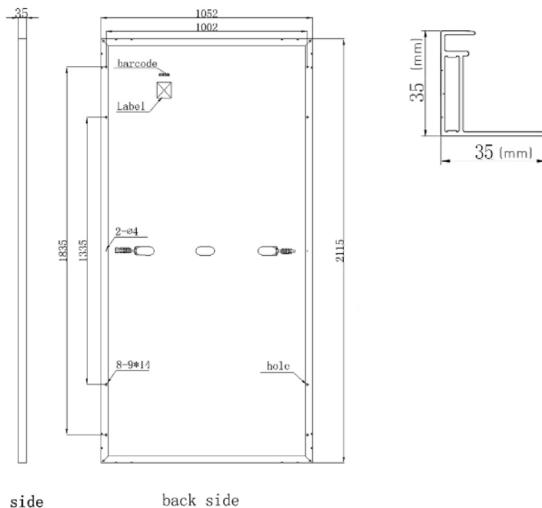


Electrical Characteristics	NCTS-SP450WM
Maximum power (Pmax)	450W
Voltage at Pmax (Vmp)	41.47V
Current at Pmax (Imp)	10.85A
Open-circuit voltage (Voc)	49.51V
Short-circuit current (Isc)	11.78A
Temperature coefficient of Voc	$-(0.40 \pm 0.05)\% / ^\circ\text{C}$
Temperature coefficient of Isc	$(0.065 \pm 0.01)\% / ^\circ\text{C}$
Temperature coefficient of power	$-(0.5 \pm 0.05)\% / ^\circ\text{C}$
NOCT (Air 20°C; Sun 0.8kW/m ² wind 1m/s)	47±2°C
Operating temperature	-40°C to 85°C
Maximum system voltage	1000V DC
Power tolerance	+ 3%
Cells	Monocrystalline solar cell
No. of cells and connections	144 (6*24)
Module Dimension	2115*1052*35mm
Weight	25kg

* STC: Irradiance 1000W/m², AM1.5 spectrum, module temperature 25°C

* Specifications are subject to change without notice at any time.

Module Diagram



Key Features:

- Using high efficiency solar cells
- High quality junction box and connector systems
- 100% inspection to guarantee the reliability of solar systems

Technology:

- Excellent performance in low-light environment
- High transmissivity, low-iron tempered glass

Product Advantage:

- 9 Busbar Solar Cell (166*83mm)
5&9 busbar solar cell adopts new technology to improve the efficiency of modules
- High Voltage
UL and IEC 1500V certified;
lowers BOS costs and yields better LCOE
- High Efficiency
Higher module conversion efficiency (up to 20.37%)
benefit from half cell structure (low resistance characteristic).
- Low-light Performance
Advanced glass and cell surface textured design ensure excellent performance in low-light environment.
- Durability Against Extreme Environmental Conditions
High salt mist and ammonia resistance certified by TÜV NORD.
- Severe Weather Resilience
Certified to withstand: wind load (2400 Pascal) and snow load (5400 Pascal).

