

ASTRO 5 Semi

Create Sustainable and Efficient Green Energy



ASTRONERGY
A CHINT COMPANY

530W~550W

Monocrystalline PV Module
CHSM72M-HC Series (182)



KEY FEATURES

+5W
OUTPUT POSITIVE TOLERANCE
Guaranteed 0~+5W positive tolerance to ensure power output.

NON-DESTRUCTIVE CUTTING
Higher bending strength of cells and mechanical properties of modules.

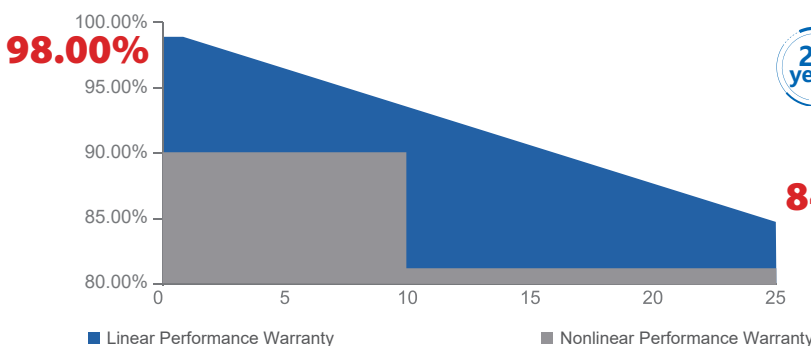
HIGH CUSTOMER VALUE
Lower BOS cost and LCOE.

INNOVATIONAL HALF-CUT&MULTI-BUSBAR TECHNOLOGY
Lower risk of microcrack, better shading tolerance, higher reliability.

SUPER PERC+ CELL TECHNOLOGY
Higher module power and module efficiency, lower power degradation.

Anti PID
PID RESISTANCE
Excellent PID resistance.

WARRANTY



12 years Warranty for Materials and Processing

25 years Warranty for Extra Linear Power Output
(1st year ≤ 2.0%, 2nd~25th years ≤ 0.55% / year)

Preliminary
For Global Market



The first solar company which passed the TUV Nord IEC/TS 62941 certification audit.

ELECTRICAL SPECIFICATIONS

STC rated output (P_{mpp})	530 Wp	535 Wp	540 Wp	545 Wp	550 Wp
Rated voltage (V_{mpp}) at STC	41.43 V	41.60 V	41.76 V	41.93 V	42.10 V
Rated current (I_{mpp}) at STC	12.79 A	12.86 A	12.93 A	13.00 A	13.06 A
Open circuit voltage (V_{oc}) at STC	49.30 V	49.50 V	49.70 V	49.90 V	50.10 V
Short circuit current (I_{sc}) at STC	13.52 A	13.61 A	13.72 A	13.81 A	13.90 A
Module efficiency	20.7%	20.9%	21.1%	21.3%	21.5%
Rated output (P_{mpp}) at NMOT	396.1 Wp	399.8 Wp	403.5 Wp	407.3 Wp	411.0 Wp
Rated voltage (V_{mpp}) at NMOT	38.61 V	38.77 V	38.92 V	39.08 V	39.24 V
Rated current (I_{mpp}) at NMOT	10.26 A	10.31 A	10.37 A	10.42 A	10.48 A
Open circuit voltage (V_{oc}) at NMOT	46.59 V	46.78 V	46.97 V	47.16 V	47.34 V
Short circuit current (I_{sc}) at NMOT	10.97 A	11.04 A	11.13 A	11.20 A	11.27 A
Temperature coefficient (P_{mpp})	- 0.35%/°C				
Temperature coefficient (I_{sc})	+ 0.045%/°C				
Temperature coefficient (V_{oc})	- 0.27%/°C				
Nominal module operating temperature (NMOT)	41±2°C				
Maximum system voltage (IEC/UL)	1500V _{DC}				
Number of diodes	3				
Junction box IP rating	IP 68				
Maximum series fuse rating	25 A				

STC: Irradiance 1000W/m², Cell Temperature 25°C, AM=1.5

NMOT: Irradiance 800W/m², Ambient Temperature 20°C, AM=1.5, Wind Speed 1m/s

MECHANICAL SPECIFICATIONS

Outer dimensions (L x W x H)	2256 x 1133 x 35 mm
Frame technology	Aluminum, silver anodized
Front glass thickness	3.2 mm
Cable length (IEC/UL)	Portrait: 300 mm Landscape: 1400 mm
Cable diameter (IEC/UL)	4 mm ² / 12 AWG
① Maximum mechanical test load	5400 Pa (front) / 2400 Pa (back)
Fire performance (IEC/UL)	Class C (IEC) or Type 4 (UL)
Connector type (IEC/UL)	HCB40 / MC4-EVO2 (optional)

① Refer to Astronergy crystalline installation manual or contact technical department.

Maximum Mechanical Test Load=1.5×Maximum Mechanical Design Load.

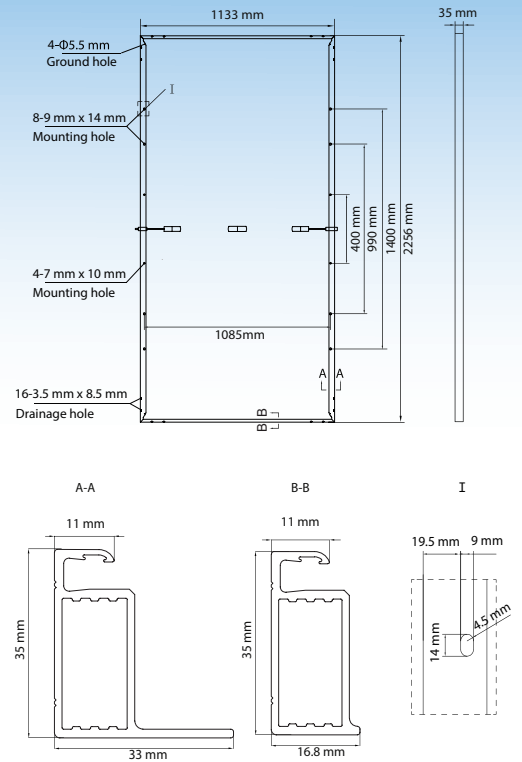
PACKING SPECIFICATIONS

① Module Weight	26.7 kg
② Packing unit	31 pcs / box
Weight of packing unit (for 40'HQ container)	867 kg
Number of modules per 40'HQ container	620 pcs

① Tolerance +/- 1.0kg

② Subject to sales contract

MODULE DIMENSION DETAILS



CURVE

