

Monocrystalline 120 cells

# MARS



Guaranteed positive output tolerance of 0 ~ +5 Wp by single measuring



3.2 mm anti-reflective glass



BLACK | WHITE

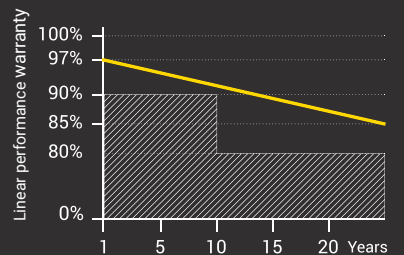


Maximum stability trough aluminium soft grip frame



Maximum 5400Pa snow load

✓ 15 years manufacturer's warranty  
25 years linear performance guarantee



## OUTPUT: 320 - 350 WATT

MARS monocrystalline 120 halfcut cell series is one of the top efficiency series. Dimensionally close to the conventional 60 cell modules, halfcut cells are split in two halves to improve the performance and they are arranged in two parallel strings for a better management of shading. Featuring a 35 mm black anodized aluminium frame, MARS series can combine visual attractiveness to conversion efficiency over 20 %.



power for a better world

STC	A-HCM320/120 [5BB]	A-HCM330/120 [5BB]	A-HCM340/120 [5BB]	A-HCM345/120 [9BB]	A-HCM350/120 [9BB]
Maximum Power (Pmax) (W)	320	330	340	345	350
Open Circuit Voltage (Voc) (V)	40.45	41.07	41.67	41.90	42.29
Short Circuit Current (Isc) (A)	10.17	10.32	10.47	10.64	10.69
Voltage at Maximum Power (Vmpp) (V)	33.54	34.06	34.55	34.78	34.90
Current at Maximum Power (Impp) (A)	9.54	9.69	9.84	9.95	10.03
Modul Efficiency (%)	18.90	19.48	20.08	20.37	20.67

STC (Standard Testing Condition): Irradiance 1000 W/m<sup>2</sup>, Cell Temperature 25 °C, Spectra at AM 1.5

Test uncertainty for Pmax: ±3 %  
Voc and Isc Tolerance: ±3 %

Electrical Parameters at NOCT	A-HCM320/120 [5BB]	A-HCM330/120 [5BB]	A-HCM340/120 [5BB]	A-HCM345/120 [9BB]	A-HCM350/120 [9BB]
Maximum Power (Pmax) (W)	237	244	252	257	259
Open Circuit Voltage (Voc) (V)	37.15	37.65	38.18	38.80	38.87
Short Circuit Current (Isc) (A)	8.14	8.25	8.36	8.97	9.00
Voltage at Maximum Power (Vmpp) (V)	33.31	33.82	34.38	34.52	34.50
Current at Maximum Power (Impp) (A)	7.11	7.22	7.32	7.49	7.51

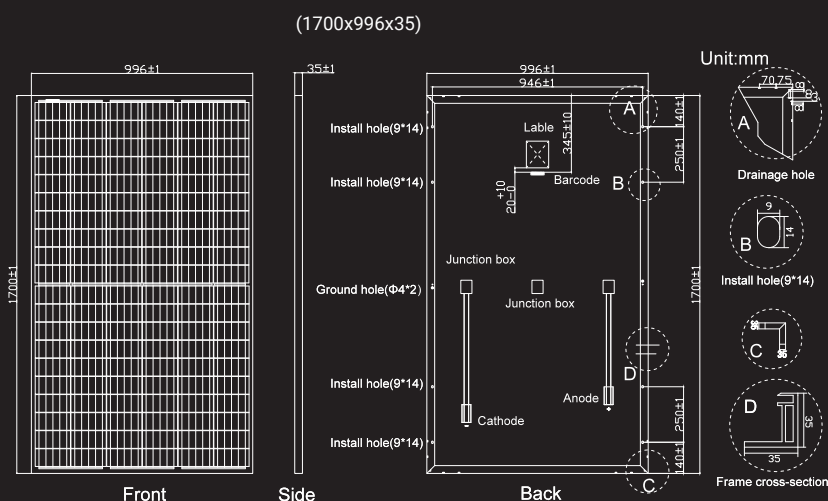
NOCT (Nominal Operating Cell Temperature): Irradiance 800 W/m<sup>2</sup>, Ambient Temperature 20 °C, Spectra at AM 1.5, Wind at 1 m/s

Temperature Characteristics	
Pmax Temperature Coefficients (W / °C)	-0.35 % / °C
Voc Temperature Coefficients (V / °C)	-0.28 % / °C
Isc Temperature Coefficients (A / °C)	+0.05 % / °C
Noct Nominal Operating Cell Temperature (°C)	45 ±2 °C

Operating Conditions	
Operating Module Temperature:	-40 °C ~ +85 °C
Maximum System Voltage:	1500 V
Maximum Series Fuse Rating:	20 A
Power Tolerance:	0 ~ +5 W
Maximum Static Load Front	5400 Pa tested 8000 Pa
Maximum Static Load Back	2400 Pa
Application Class	Class A

Specifications	
Cell Type	Mono G1 158.75 5BB   9BB
Weight	19 kg ±3 %
Dimensions	5 BB: 1700x996x35 mm (±2 mm) 9 BB: 1690x1002x35 mm (±2 mm)
Cable Cross Section Size	4 mm <sup>2</sup> , cable approx 110 cm, QC4 compatible
No. of cells	120 (6x20)
Junction Box	IP67, 3 diodes
Frame	Black anodized aluminium
Front glass	3.2 mm high transmission, low iron, tempered glass

Packing Details	5 BB	9 BB
Container Type	40'HC	40'HC
No. of Pallets	16   10	26
Pieces per Pallet	30   36	30
Total quantity of modules	840 (480 + 360)	780



I-V Curve: (A-HCM340)

