

TECHNICAL DATA SHEET

VSM-160

Technical Data

Type	VSM-160
Type of Solar Cell	Mono-crystalline
Number of Cells	
Size of module	1320×680×35mm
Module Weight	10.77 kg
Connector	Junction Box
Cables Length (+/-)	Customizable
Front Cover Glass	Safety Glass
Front Cover Glass Thickness	3.2 mm
Frame	Anodized Aluminium

Electrical Data

Maximum Power	$P_{MPP\ STC}$	160W
Power Tolerance	Δ_{STC}	$\pm 3\%$
Maximum Power Voltage	$V_{MPP\ STC}$	17.5 V
Maximum Power Current	$I_{MPP\ STC}$	9.15 A
Open Circuit Voltage	$V_{OC\ STC}$	21.6V
Short Circuit Current	$I_{SC\ STC}$	9.51 A
Cell Efficiency	η_{STC}	18.6%
Maximum System Voltage	V_{DC}	1000 V

STC: Irradiance 1000 W/m²; Spectrum AM 1.5; Cell Temperature 25°C, Wind 0 m/s



Temperature Coefficients

Power Coefficient	$\alpha_k (P_{MPP})$	$-0.50 \pm 0.05\%/K$
Voltage Coefficient	$\beta_k (V_{oc})$	$-0.35 \pm 0.01\%/K$
Current Coefficient	$\Phi_k (I_{sc})$	$0.065 \pm 0.015\%/K$

Power Warranty

- 10 years performance warranty to 90 %
- 25 years performance warranty to 80 %
- 5 years warranty against production and material defects

Certifications

IEC 61215, IEC 61730 ,TUV, CE, ISO9001:2000

