

# STANDARD SOLAR PANELS

GermanSolar's standard solar panels are high efficiency, convenient, and easy to use



# PREMIUMLINE PRO G1 60 MONO CELL SOLAR PANELS

GSM-305W 310W 315W 320W 325W

GermanSolar is a specialist in customization, introducing colored glass, frames, and back-sheet material and shapes to aesthetically match your ideas with the prospective application. With innovative technology and design, GermanSolar offers high quality modules with enhanced aesthetic appearance for building structures and facades. By providing outstanding customization options, GermanSolar supports your required project needs with colored and shaped panels of your choice, and consults with you in choosing the right size, thickness, shape, and color to complement the design of your application and your building.

# **FEATURES**



Best priceperformance ratio



Positive power of up to +5.00 Wp



EL tested and micro cracks inspected



Fully automated production line with German quality engineering and design standards



Better performance in diffused sunlight and high temperature



High ammonia & salt mist resistant certified, and PID-free



Withstands wind loads up to 2400Pa / heavy snow loads up to 5400Pa



12-year limited product warranty



25-year linear performance warranty







Class I Division II Groups A,B,C&D







STANDARD SOLAR PANELS



ELECTRICAL DATA					
Nominal Max. Power (Pmax)* (W)	305	310	315	320	325
Open Circuit Voltage (Voc) (V)	40.08	40.32	40.50	40.74	41.05
Short Circuit Current (Isc) (A)	9.84	9.92	9.98	10.05	10.10
Max. Power Voltage (Vmpp) (V)	34.14	34.38	34.56	34.80	35.13
Max. Power Current (Impp) (A)	8.94	9.02	9.12	9.20	9.25
Module Efficiency (%)	18.70	19.10	19.40	19.80	21.20
Power Tolerance (%)	±3				
Power Temperature Coeffcient y	-0.39 % / °C				
Current Temperature Coeffcient α	+0.06 % / °C				
Voltage Temperature Coeffcient β	-0.25 % / °C				

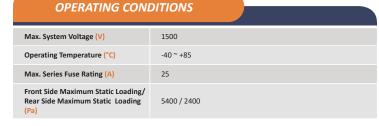
\*STC: Irradiance 1000 W /  $m^2$ , cell temperature 25 °C, AM = 1.5, Tolerance of Pmax is within + / - 3 %.

NOCT **					
Nominal Max. Power (Pmax)* (W)	231	234	238	242	246
Open Circuit Voltage (Voc) (V)	38.08	38.24	38.40	38.56	38.72
Short Circuit Current (Isc) (A)	7.63	7.71	7.78	7.85	7.93
Max. Power Voltage (Vmpp) (V)	32.14	32.35	32.56	32.77	32.98
Max. Power Current (Impp) (A)	7.17	7.24	7.31	7.38	7.45
NMOT (Nominal Module Operating Temperature) (°C)			41 ± 3		

\* NOCT: Irradiance at 800 W /  $\rm m^2$ , ambient temperature 20 °C, Wind Speed 1 m / s. AM = 1.5.

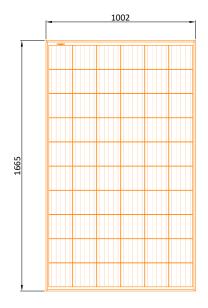
#### MECHANICAL DATA 1665 × 1002 × 35 Dimensions (mm) Weight (kg) 23 Solar Cells (mm) Mono 158.75 × 158.75 Front Glass 3.2 mm glass Backsheet White or black Frame Anodised aluminum alloy Junction Box IP68, 3 diodes Cables $4\ \text{mm}^2, 900\ \text{mm}$ in length, length can be customized / UV resistant Connectors MC4 original / MC4 compatible

PACKAGIN	G
Modules Per Pallet (pcs)	30
Module quantity per 40' container (pcs)	312
Module quantity per 40' container (pcs)	871

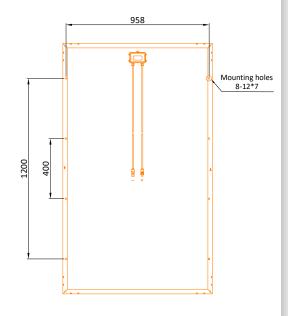


### Design (mm)

#### Front View



#### **Back View**



## LINEAR PERFORMANCE WARRANTY

12-Year Product Warranty | 25-Year Performance Warranty

