



**NEW!** 25-YEAR LINEAR  
PERFORMANCE AND  
PRODUCT WARRANTY  
EXTENDED TO 5 YEARS\*

Length	1675 mm
Width	1001 mm
Height	31 mm <sup>1)</sup>
Frame	Aluminum
Weight	21,2 kg

# Sunmodule<sup>+</sup>

## SW 225/230/235/240 mono

### German quality standards

Fully-automated production lines and seamless monitoring of the process and material ensure the quality that the company sets as its benchmark for its sites worldwide.

### Outstanding products

In Photon test laboratory's endurance test SolarWorld's modules occupied first place in 2008 and in 2009.

### SolarWorld Plus-sorting

Plus-sorting guarantees the highest system efficiency. Only modules that achieve the designated nominal performance or greater in performance tests are despatched.

### 25 years linear performance guarantee\*

SolarWorld guarantees a maximum depression in performance of 0.7% p.a. for more than 25 years – a clear additional benefit compared with the conventional two-stage industry guarantees. In addition, there is a product warranty that covers 5 years.

\*In accordance with the applicable SolarWorld service certificate at purchase  
[www.solarworld-global.com/service-certificate](http://www.solarworld-global.com/service-certificate)



**We turn sunlight into power.**

# Sunmodule<sup>+</sup>

## SW 225/230/235/240 mono

### PERFORMANCE UNDER STANDARD TEST CONDITIONS (STC)\*

		SW 225	SW 230	SW 235	SW 240
Maximum power	$P_{max}$	225 Wp	230 Wp	235 Wp	240 Wp
Open circuit voltage	$U_{oc}$	37,3 V	37,4 V	37,5 V	37,7 V
Maximum power point voltage	$U_{mpp}$	29,7 V	30,0 V	30,3 V	30,8 V
Short circuit current	$I_{sc}$	8,13 A	8,16 A	8,19 A	8,25 A
Maximum power point current	$I_{mpp}$	7,59 A	7,68 A	7,77 A	7,96 A

\*STC: 1000W/m<sup>2</sup>, 25°C, AM 1.5

### PERFORMANCE AT 800 W/m<sup>2</sup>, NOCT, AM 1.5

		SW 225	SW 230	SW 235	SW 240
Maximum power	$P_{max}$	162,9 Wp	166,9 Wp	170,9 Wp	179,1 Wp
Open circuit voltage	$U_{oc}$	33,7 V	33,9 V	34,0 V	34,4 V
Maximum power point voltage	$U_{mpp}$	26,8 V	27,2 V	27,5 V	28,1 V
Short circuit current	$I_{sc}$	6,56 A	6,58 A	6,60 A	6,65 A
Maximum power point current	$I_{mpp}$	6,07 A	6,14 A	6,22 A	6,37 A

Minor reduction in efficiency under partial load conditions at 25°C: at 200W/m<sup>2</sup>, 95% (+/-3%) of the STC efficiency (1000 W/m<sup>2</sup>) is achieved.

### COMPONENT MATERIALS

Cells per module	60
Cell type	Mono crystalline
Cell dimensions	156 mm x 156 mm
Front	tempered glass (EN12150)

### SYSTEM INTEGRATION PARAMETERS

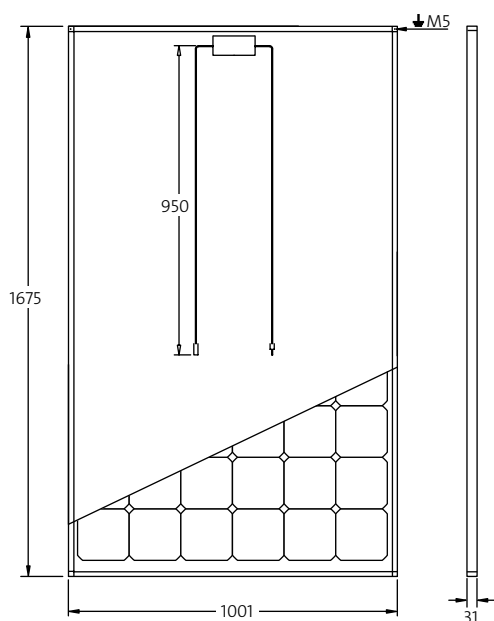
Maximum system voltage SC II	1000 V
Maximum reverse current	16 A
Increased snowload acc. to IEC 61215	5,4 kN/m <sup>2</sup>
Number of bypass diodes	3

### THERMAL CHARACTERISTICS

NOCT	47 °C
TC $I_{sc}$	0,042 %/K
TC $U_{oc}$	-0,33 %/K
TC $P_{mpp}$	-0,45 %/K

### ADDITIONAL DATA

Measuring tolerance	+/- 3 %
Junction box	IP65
Connector	MC4
SolarWorld Plus-Sorting <sup>2)</sup>	$P_{Flash} \geq P_{max}$



- Qualified, IEC 61215
- Safety tested, IEC 61730
- Periodic Inspection



- 1) Temporarily, also modules with a frame height of 34 mm can be supplied. Please inquire with your specialist dealer.
  - 2) The output identified by SolarWorld ( $P_{Flash}$ ) is always higher than the nominal output ( $P_{max}$ ) of the module.
  - 3) depending on the market
- SolarWorld AG reserves the right to make specification changes without notice. This data sheet complies with the requirements of EN 50380.