

# Sunmodule

## SW 250 mono / Version 2.0 and 2.5 Frame

#### World-class quality

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.

#### SolarWorld Plus-Sorting

Plus-Sorting guarantees highest system efficiency. SolarWorld only delivers modules that have greater than or equal to the nameplate rated power.

### 25 years linear performance guarantee and extension of product warranty to 10 years

SolarWorld guarantees a maximum performance degression of 0.7% p.a. in the course of 25 years, a significant added value compared to the two-phase warranties common in the industry. In addition, SolarWorld is offering a product warranty, which has been extended to 10 years.\*

\*in accordance with the applicable SolarWorld Limited Warranty at purchase. www.solarworld.com/warranty



Qualified, IEC 61215
Safety tested,
IEC 61730
Periodic Inspection















We turn sunlight into power.



## SW 250 mono / Version 2.0 and 2.5 Frame

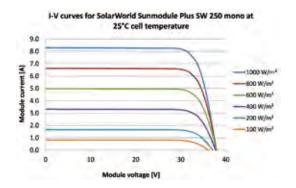
#### PERFORMANCE UNDER STANDARD TEST CONDITIONS (STC)\*

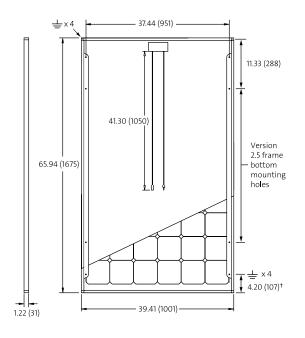
|                             |                  | SW 250 |
|-----------------------------|------------------|--------|
| Maximum power               | $P_{\text{max}}$ | 250 Wp |
| Open circuit voltage        | V <sub>oc</sub>  | 37.8 V |
| Maximum power point voltage | $V_{mpp}$        | 31.1 V |
| Short circuit current       | l <sub>sc</sub>  | 8.28 A |
| Maximum power point current | I <sub>mpp</sub> | 8.05 A |

<sup>\*</sup>STC: 1000W/m2, 25°C, AM 1.5

#### THERMAL CHARACTERISTICS

| NOCT                  | 46 °C         |
|-----------------------|---------------|
| TC I <sub>sc</sub>    | 0.004 %/K     |
| TC <sub>Voc</sub>     | -0.30 %/K     |
| TC P <sub>mpp</sub>   | -0.45 %/K     |
| Operating temperature | -40°C to 85°C |





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

|                             |                  | SW 250   |
|-----------------------------|------------------|----------|
| Maximum power               | P <sub>max</sub> | 183.3 Wp |
| Open circuit voltage        | $V_{oc}$         | 34.6 V   |
| Maximum power point voltage | $V_{mpp}$        | 28.5 V   |
| Short circuit current       | I <sub>sc</sub>  | 6.68 A   |
| Maximum power point current | Impp             | 6.44 A   |
|                             |                  |          |

Minor reduction in efficiency under partial load conditions at 25°C: at 200W/m², 95% (+/-3%) of the STC efficiency (1000 W/m²) is achieved.

#### COMPONENT MATERIALS

| Cells per module | 60                                  |
|------------------|-------------------------------------|
| Cell type        | Mono crystalline                    |
| Cell dimensions  | 6.14 in x 6.14 in (156 mm x 156 mm) |
| Front            | tempered glass (EN 12150)           |
| Frame            | Clear anodized aluminum             |
| Weight           | 46.7 lbs (21.2 kg)                  |

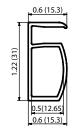
#### SYSTEM INTEGRATION PARAMETERS

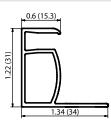
| Maximum system voltage SC II       | 1000 V                          |
|------------------------------------|---------------------------------|
| Max. system voltage USA NEC        | 600 V                           |
| Maximum reverse current            | 16 A                            |
| Number of bypass diodes            | 3                               |
| UL Design Loads* Two rail system   | 3 psf downward<br>64 psf upward |
| UL Design Loads* Three rail system | ) psf downward<br>64 psf upward |
| IEC Design Loads* Two rail system  | 3 psf downward<br>50 psf upward |

<sup>\*</sup>Please refer to the Sunmodule installation instructions for the details associated with

#### ADDITIONAL DATA

| Power tolerance <sup>2)</sup> | -0 Wp / +5 Wp |
|-------------------------------|---------------|
| J-Box                         | IP65          |
| Connector                     | MC4           |
| Module efficiency             | 14.91 %       |
| Fire rating (UL 790)          | Class C       |





#### **VERSION 2.0 FRAME**

- · Compatible with "Top-Down" mounting methods
- **L**Grounding Locations: 4 corners of the frame

### **VERSION 2.5 FRAME**

- Compatible with both "Top-Down" and "Bottom" mounting methods
- **L**Grounding Locations:
- 4 corners of the frame
- 4 locations along the length of the module in the extended flange†

<sup>1)</sup> Sunmodules dedicated for the United States and Canada are tested to UL 1703 Standard and listed by a third party laboratory. The laboratory may vary by product and region. Check with your SolarWorld representative to confirm which laboratory has a listing for the product. 2) Measuring tolerance traceable to TUV Rheinland: +/- 2% (TUV Power Controlled).

<sup>3)</sup> All units provided are imperial. SI units provided in parentheses.