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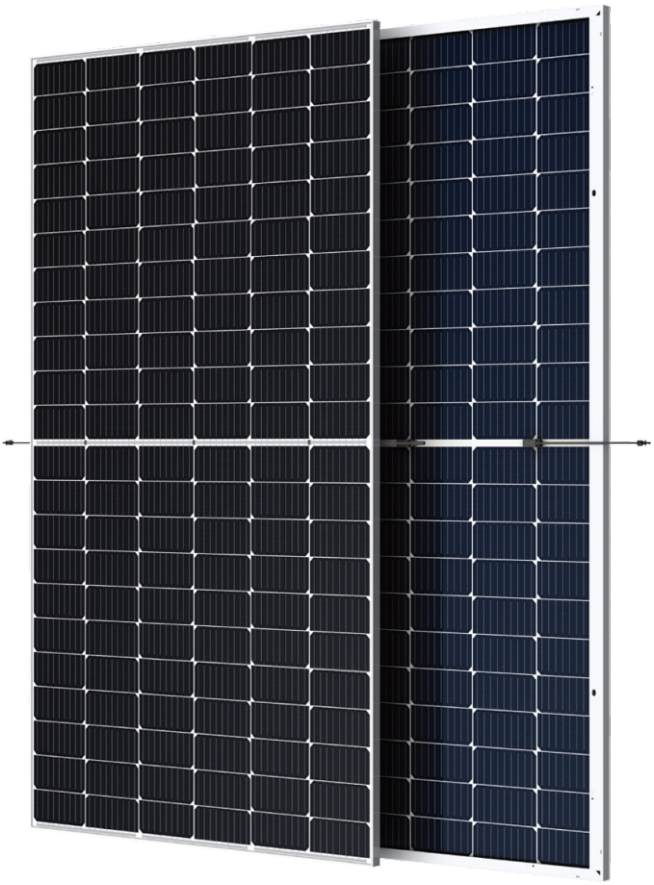
# SF-M18/G132
# 530-545W

## 182±1.5×91±1.5mm
## Cells 132



**Bifacial Double Glass**

N-TYPE Half-Cell Module

Max Power Out: 545W
Max Efficiency: 22.95%
Power Tolerance: 0~+5W

### SMBB Technology

Better light trapping and current collection to improve module power output and reliability

### Reduced Hot Spot Loss

Optimized electrical design and lower operating current for reduced hot spot loss and better temperature coefficient.

### PID Resistance

Excellent Anti-PID performance guarantee via optimized mass-production process and materials control.

### Enhanced Mechanical Load

Certified to withstand: wind load (2400 Pascal) and snow load (5400 Pascal).

### Durability Against Extreme Environmental Conditions

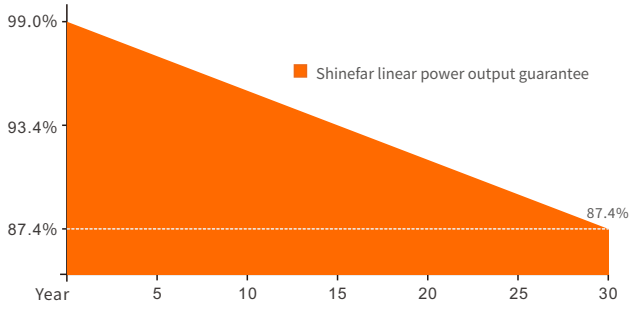
High salt mist and ammonia resistance.

### High Energy Generation, Low LCOE

Low Pmax temp coefficient increases energy production

## Superior Warranty

- 15-year material & technology warranty
- 30-year linear power output warranty




## Comprehensive Products and System Certificates

- IEC/EN61215-1:2021 & IEC/EN61215-2:2021
- IEC/EN61730-1:2016 & IEC/EN61730-2:2016
- UL61730-1:2017 & UL61730-2:2017
- UL61215-1:2017 & UL61215-2:2017
- IEC 61701:2020-Saltmist
- IEC 62716:2013-Ammonia
- IEC 62804:2020-PID
- IECEE Certificate Body (CB)
- UKCA:EN61730-2018
- ISO9001 & ISO14001 & ISO45001

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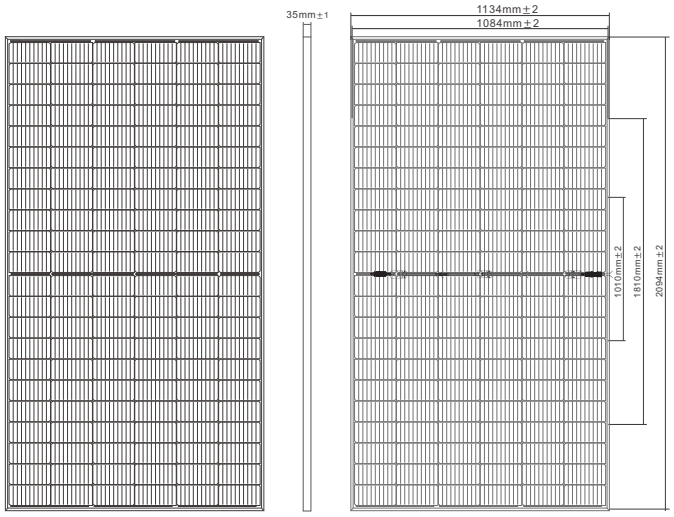
## Engineering Drawings




Front Side Back

## Structural Parameter

| | |
|---|---|
| Dimensions of Module | 2094×1134×35mm |
| Weight | 30.9kg |
| Packing | 31PCS/Pallet, 682PCS/40hq |
| Front Glass | High Transparency Solar Glass 2.0mm |
| Back Glass | Heat Strengthened Glass 2.0mm |
| Frame | Anodized Aluminum Alloy & Custom Color Accepted |
| J-Box | IP68 Rated |
| Cable | 4.0mm², 300mm |
| Bypass Diodes | 3PCS |
| Wind/ Snow Load | 2400Pa/5400Pa |
| Connector | MC4 Compatible |

## Electrical Specification

(STC: Irradiance 1000W/m², Cell temperature 25°C, AM1.5G — NOCT: Irradiance 800W/m2, Ambient temperature 20°C, Wind speed 1m/s)

| Module Type | SF-M18/G132530 | | SF-M18/G132535 | | SF-M18/G132540 | | SF-M18/G132545 | |
|---|---|---|---|---|---|---|---|---|
| Testing Condition | STC | NOCT | STC | NOCT | STC | NOCT | STC | NOCT |
| Maximum Power (Pmax) [W] | 530 | 396.97 | 535 | 400.72 | 540 | 404.46 | 545 | 408.21 |
| Maximum Power Voltage (Vmp) [V] | 39.03 | 36.49 | 39.18 | 36.63 | 39.33 | 36.77 | 39.48 | 36.91 |
| Maximum Power Current (Imp) [A] | 13.58 | 10.88 | 13.65 | 10.94 | 13.73 | 11.00 | 13.80 | 11.06 |
| Open Circuit Voltage (Voc) [V] | 46.56 | 43.53 | 46.71 | 43.67 | 46.86 | 43.81 | 47.01 | 43.95 |
| Short Circuit Current (Isc) [A] | 14.29 | 11.24 | 14.35 | 11.27 | 14.41 | 11.29 | 14.46 | 11.32 |
| Module Efficiency [%] | 22.32 | | 22.53 | | 22.74 | | 22.95 | |
| Cell Type [mm] | Mono 182±1.5×91±1.5, 132 Cells | | | | | | | |
| Operational Temperature [°C] | -40~+85°C | | | | | | | |
| Maximum System Voltage | 1500V DC | | | | | | | |
| Max Series Fuse Rating | 25A | | | | | | | |

## Electrical Characteristics With Different Power Bin (Reference to 10% Irradiance Ratio)

| Total Equivalent Power (Pmax) [Wp] | 583 | 589 | 594 | 600 |
|---|---|---|---|---|
| Maximum Power Voltage (Vmp) [V] | 39.03 | 39.18 | 39.33 | 39.48 |
| Maximum Power Current (Imp) [A] | 14.94 | 15.02 | 15.10 | 15.18 |
| Open Circuit Voltage (Voc) [V] | 46.56 | 46.71 | 46.86 | 47.01 |
| Short Circuit Current (Isc) [A] | 15.72 | 15.78 | 15.85 | 15.91 |
| Irradiance Ratio (Rear/Front) | 10% | | | |

## Temperature Ratings

| | |
|---|---|
| Nominal Operating Cell Temperature | 45±2°C |
| Temperature Coefficient of Isc | +0.05%/°C |
| Temperature Coefficient of Voc | -0.23%/°C |
| Temperature Coefficient of Pmax | -0.30%/°C |

## Curve Diagram