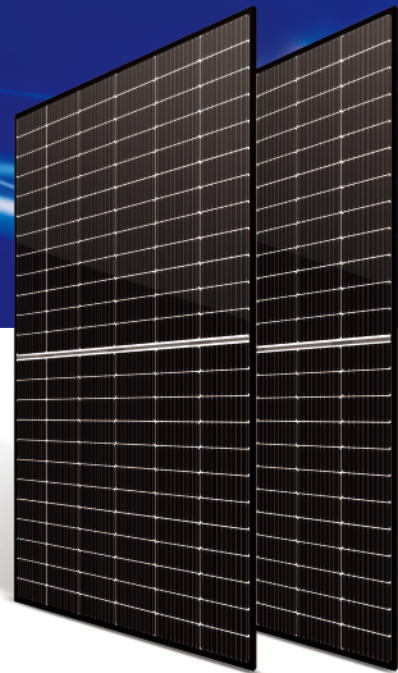


# SunPlus High-efficiency 182 PERC Module

## 530W-560W



Transparent  
Backsheet

### ◆ KEY FEATURES



#### High Efficiency

By utilizing MBB half-cell technology to increase energy density, the conversion efficiency can reach 21.86%.



#### High Reliability

3 times IEC's new standard testing, a 12-year material warranty and a 25-year power warranty to ensure high reliability.



#### Anti-PID

By utilizing advanced cell production technology and rigorous materials control, the attenuation caused by PID can be minimized.



#### Low Risk of Micro-cracks

Lower the risk of micro-cracking and broken busbar due to MBB cells.



#### Load Capacity

2400 Pa wind load and 5400 Pa snow load.



#### Excellent Low-light Performance

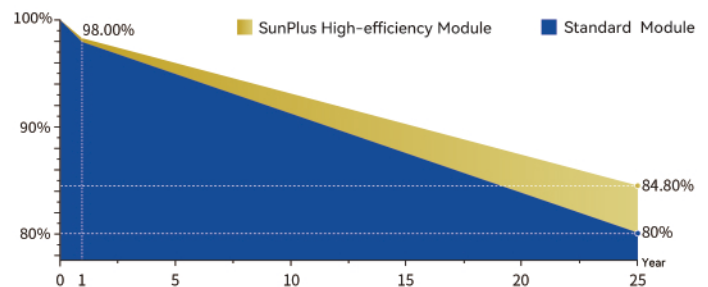
Higher power output under weak light conditions such as haze and cloudy weather.

### ◆ PRODUCT CERTIFICATION

- Through various long-term reliability tests
- EL testing before and after lamination to ensure the reliability.
- Adhering to strict international standard management systems ISO 9001, ISO 14001 and OHSAS 18001
- Passing various rigorous environmental tests (salt spray, ammonia, and dust-proof testing such as IEC 61701, IEC 62716, DIN EN 60068-2-68)



### ◆ WARRANTY



**12 YEARS** Guarantee on product material and workmanship

**25 YEARS** Linear power output warranty

**0.55%** Linear degradation per year within 25 years.

# SP-M10/144H530W-560W

## ELECTRICAL CHARACTERISTICS (STC)

Maximum Power (Pm)	W	530	535	540	545	550	555	560
Power Tolerance	W	0 ~ +5W						
Maximum Power Voltage (Vm)	V	40.50	40.59	40.70	40.80	40.90	40.99	41.09
Maximum Power Current (Im)	A	13.09	13.18	13.27	13.36	13.45	13.54	13.63
Open Circuit Voltage (Voc)	V	49.22	49.32	49.42	49.52	49.62	49.72	49.82
Short Circuit Current (Isc)	A	13.67	13.76	13.85	13.94	14.03	14.12	14.21
Module Efficiency (ηm)	%	20.50	20.70	20.90	21.10	21.29	21.48	21.68

STC:AM=1.5, irradiance=1000W/m<sup>2</sup>, module temperature=25°C

## ELECTRICAL CHARACTERISTICS (NOCT)

Maximum Power (Pm)	W	396	399	402	405	409	413	417
Maximum Power Voltage (Vm)	V	37.74	37.91	38.08	38.25	38.42	38.59	38.69
Maximum Power Current (Im)	A	10.45	10.50	10.55	10.60	10.65	10.70	10.77
Open Circuit Voltage (Voc)	V	46.47	46.56	46.65	46.74	46.84	46.93	47.02
Short Circuit Current (Isc)	A	11.05	11.12	11.19	11.26	11.33	11.40	11.48

NMOT: irradiance=800W/m<sup>2</sup>, environment temperature=20°C, wind speed=1m/s

## MECHANICAL SPECIFICATIONS

External Dimension (L×W×H)	2278mm×1134mm×35mm
Solar Cells	144-cell (6x24)/Mono/10BB(182mm)
Weight	28.0kg
Glass	3.2mm High-transparency anti-reflective coated tempered glass
Frame	Anodized aluminum alloy, silver color
Junction Box	IP68
Output Cables	300mm(+)/300mm(-), 4mm <sup>2</sup> or Customized Length
Connector	Compatible with MC4 or MC

## APPLICATION CONDITIONS

Maximum System Voltage	1000/1500VDC (IEC)
Maximum Series Fuse Rating	25A
Operating Temperature	-40°C ~ +85°C
Mechanical Load	5400Pa/2400Pa
Hail Impact Testing	Φ25mm Hail, impacting at a velocity of 23 m/s from a distance of 1m.
Application Rating	Class A

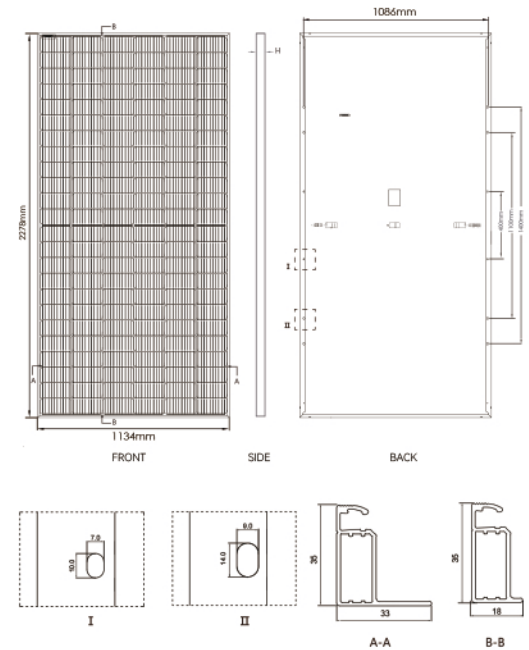
## TEMP CHARACTERISTICS

Nominal Module Operating Temperature	45±2°C
Temperature Coefficient of Power	-0.350%/°C
Temperature Coefficient of Voltage	-0.280%/°C
Temperature Coefficient of Current	+0.048%/°C

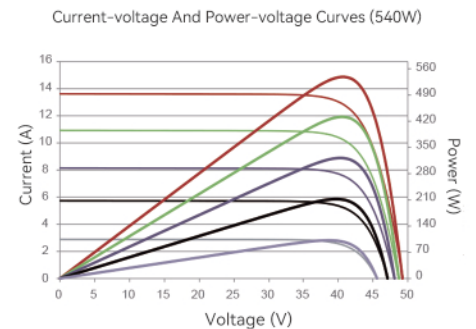
## PACKING CONFIGURATION

Pieces per Pallet	31
Pieces per 40'HC	620

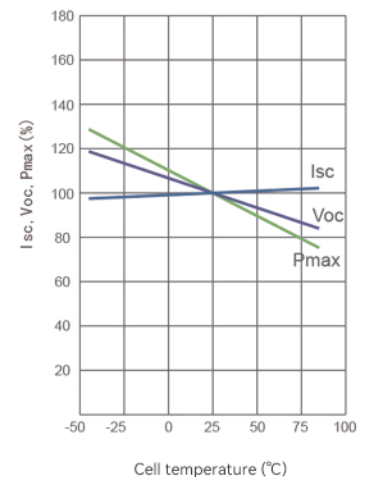
## TECHNICAL DRAWING



## I-V CURVE



## Temperature Curve



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 SolarPlus reserves the right of final interpretation.  
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