



HALF-CELL BIFACIAL MODULE

TYPE: STPXXXS - C72/Pmh+

535-555W 21.5%

**POWER OUTPUT** 

**MAX EFFICIENCY** 



# Compatible with mainstream trackers

The module design is highly compatible with power plant tracking systems, which offers a cost-effective solution for large power plants



#### Anti-PID guarantee

Through the optimization of cell technology and material, the decay caused by PID phenomenon is reduced



### Double-sided power generation

The gain of double-sided power generation increases up to max. 25% with the light on the back side, and significantly reduce LCOE



#### Extended wind and snow load tests

Module certified to withstand extreme wind (2400 Pascal) and snow loads (5400 Pascal)\*

















ISO 14001 **Environment Management System** Occupational Health and Safety ISO 45001 ISO 9001 Quality Management System SA 8000 Social Responsibility Standards IEC TS 62941Guideline for Module Design

IEC 61701 Salt-mist certification IEC 62716 ammonia certification IEC 60068-2-68 Dust and Sand IEC 61730-2 (UL790) fire class C











**30** years of linear warranty

**15** years of product warranty

 <sup>☐</sup> Conventional ■ Suntech Module 10 15 20 25 0 1 First year power degradation 2% Annual degradation 0.45%

<sup>\*</sup> Please refer to Suntech Standard Module Installation Manual for details.

<sup>\*\*\*</sup> WEEE only for EU market.

<sup>\*\*</sup> Please refer to Suntech Limited Warranty for details.

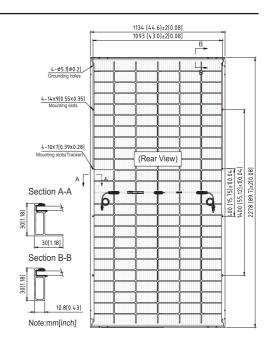
<sup>\*\*\*\*</sup> Suntech reserves the right to the final.





#### **Mechanical Characteristics**

Solar Cell	Monocrystalline silicon 182 mm			
No. of Cells	144 (6 × 24)			
Dimensions	2278 × 1134 × 30 mm (89.7 × 44.6 × 1.2 inches)			
Weight	32.0 kgs (70.5 lbs.)			
Front \ Back Glass	2.0+2.0 mm (0.079+ 0.079inches) semi-tempered glass			
Output Cables	4.0 mm², (-) 350 mm and (+) 160 mm in length or customized length			
Junction Box	IP68 rated (3 bypass diodes)			
Operating Module Temperature	-40 °C to +85 °C			
Maximum System Voltage	1500 V DC (IEC)			
Connectors	STP-XC4			
Maximum Series Fuse Rating	25 A			
Power Tolerance	0/+5 W			
Refer. Bifaciality Factor	(70 ± 5)%			
Frame	Anodized aluminum alloy frame			
Packing Configuration	36 Pieces per pallet 720 Pieces per container /40'HC 2310×1120×1255 1202kg			



For tracker installation, please turn to Suntech for mechanical load information.

#### **Electrical Characteristics**

Module Type	STP555S-	C72/Pmh+	STP550S-	C72/Pmh+	STP545S-0	C72/Pmh+	STP540S-	C72/Pmh+	STP535S-	C72/Pmh+
Testing Condition	STC	NMOT	STC	NMOT	STC	NMOT	STC	NMOT	STC	NMOT
Maximum Power (Pmax/W)	555	421.4	550	417.7	545	414.2	540	410.5	535	406.6
Optimum Operating Voltage (Vmp/V)	42.24	39.0	42.05	38.9	41.87	38.7	41.75	38.5	41.57	38.4
Optimum Operating Current (Imp/A)	13.14	10.80	13.08	10.75	13.02	10.71	12.94	10.65	12.87	10.60
Open Circuit Voltage (Voc/V)	50.07	47.2	49.88	47.0	49.69	46.9	49.54	46.7	49.39	46.6
Short Circuit Current (Isc/A)	14.07	11.35	14.01	11.30	13.96	11.26	13.89	11.21	13.83	11.16
Module Efficiency (%)	2	1.5	2	1.3	21	1.1	20	).9	20	0.7

STC: lrradiance 1000 W/m², module temperature 25 °C, AM=1.5; NMOT: Irradiance 800 W/m², ambient temperature 20 °C, AM=1.5, wind speed 1 m/s; Tolerance of Pmax is within +/- 3%,

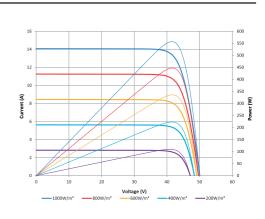
## Different Rearside Power Gain Reference to 545W Front

Rearside Power Gain	5%	15%	25%
Maximum Power at STC (Pmax)	572.3	626.8	681.3
Optimum Operating Voltage (Vmp/V)	41.9	41.9	42.0
Optimum Operating Current (Imp/A)	13.67	14.97	16.28
Open Circuit Voltage (Voc/V)	49.7	49.7	49.8
Short Circuit Current (Isc/A)	14.66	16.05	17.45
Module Efficiency (%)	22.2%	24.3%	26.4%

# **Temperature Characteristics**

Nominal Module Operating Temperature (NMOT)	42 ± 2 ℃
Temperature Coefficient of Pmax	-0.34%/°C
Temperature Coefficient of Voc	-0.26%/°C
Temperature Coefficient of Isc	+0.050%/°C

#### Graphs Current-Voltage & Power-Voltage (555W)



Information on how to install and operate this product is available in the installation instruction. All values indicated in this data sheet are subject to change without prior announcement. The specifications may vary slightly. All specifications are in accordance with standard EN 50380. Color differences of the modules relative to the figures as well as discolorations of/in the modules which do not impair their proper functioning are possible and do not constitute a deviation from the specification.