BOAMAX

Single Glass Monocrystalline Module

Single glass series

182T-108HW

Efficient bifacial Topcon monocrystalline silicon half-piece solar module



435 W

Maximum power output of module



Maximum module efficiency



Power tolerance



Boamax's long-term stable quality is trustworthy

- Automatic production line and leading photovoltaic technology
- EL testing is performed before and after lamination, effectively ensuring the reliability of the components.
- Passed various long-term reliability tests
- Strict international standard management systems are adopted, including ISO 9001, ISO 14001, and ISO 45001.



MBB welding strip design optimizes optical and electrical properties of modules



Additional safety brought by fire rating A



Optimized packaging materials and strict process scheme ensure the PID resistance of modules



The adoption of dual glass POE packaging enables effective resistance to various harsh outdoor environments

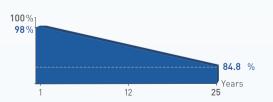


The battery slicing technology greatly reduces the series current and the internal damage of the modules, thus effectively reducing BOS and LCOE



Advanced non-destructive slicing technology, with small battery damage and low impact of cracking

Industry leading linear warranty



12-year warranty on 25-year linear warranty materials and process

Excellent warranty, with a commitment to a 25-year power warranty and a linear power attenuation of 0.55%







Electrical performance parameters STC

Power output	Pmax(W)	415	420	425	430	435
Operating voltage of maximum power point	Vmp(V)	31.69	31.83	31.97	32.11	32.25
Operating current of maximum power point	Imp(A)	13.09	13.19	13.29	13.39	13.49
Open-circuit voltage	Voc(V)	38.08	38.22	38.35	38.49	38.63
Short-circuit current	Isc(A)	13.87	13.95	14.03	14.11	14.19
Module efficiency	[%]	21.25	21.51	21.76	22.02	22.28
Power tolerance	(W)	***************************************		0~+5		

^{*}STC testing conditions: atmospheric quality AM1.5, irradiance 1000 W/m², cell temperature 25 °C

Electrical performance parameters NMOT

Power output	Pmax(W)	315	318	320	323	325
Operating voltage of maximum power point	Vmp(V)	29.73	29.76	29.78	29.82	29.94
Operating current of maximum power point	Imp(A)	10.59	10.67	10.69	10.75	10.82
Open-circuit voltage	Voc(V)	36.17	36.30	36.43	36.56	36.69
Short-circuit current	Isc(A)	11.31	11.36	11.41	11.46	11.51

^{*}NMOT testing conditions: irradiance 800 W/m² ambient temperature 20 °C, wind speed 1 m/s

Electrical performance parameters

Cell arrangement	108 pieces (6*18)	
Module dimension	1724*1134*35mm	
Weight	23.2kg	
Front glass	3.2mm, high transparency coated glass	
Back plate	White	
Frame	Aluminum alloy with anode oxide film	
Junction box	Protection level IP68	
Cable	4mm², with a positive wire length of 300mm and a negative wire length of 300mm	
Number of diodes	3	
Wind pressure/snow pressure	2400Pa/5400Pa	
Connector	PV-H4	

Temperature characteristic

Nominal operating temperature of cell	45+2°C
Temperature coefficient (Isc)	+0.05%/C
Temperature coefficient (Voc)	-0.28%/C
Temperature coefficient (Pmax)	-0.34%/C

Limit parameters

Operating temperature	-40~+85°C	
Maximum system voltage	1500V DC	
Maximum rated current of fuse	25A	

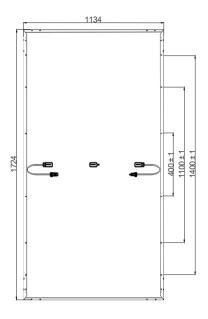
Packing method

Pieces per box	31 pieces
Loading capacity of 17.5 m flatbed trailer	1116 pieces

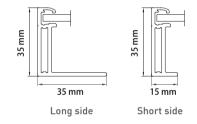
Optional configuration

Connector	Original PV	

Module dimension

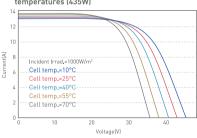


Rear view



Curve chart

Current and voltage curves at different temperatures (435W)



Current and voltage curves/power voltage curves at different irradiance (435W)

