

King Series Anti-Dust

620W/625W/630W/635W/640W/645W/650W

SUN78MD-H8NS

KING SERIES TOPCON NO CLEANING BIFACIAL MODULE

COMPREHENSIVE CERTIFICATES

IEC61215 / IEC61730 / IEC61701 / IEC62716 / IEC62804

ISO9001: 2015 Quality management systems;

ISO14001: 2015 Environmental management systems;

ISO45001: 2018 Occupational health and safety management systems;



Anti water accumulation
More power
No cleaning
Anti dust

6~15%
More Power Output



Best Solution for small inclination angle

More suitable for industrial and commercial color steel tile roofs and small angle installation scenarios



Increase Power Generation by 6-15%

Unique frame design effectively reduces the impact of dust accumulation and improves power generation by 6-15% throughout the entire lifecycle



Strong ability to resist wind

The C side of the frame contains curved hook reinforcement, Passed load test of 5400pa(Front side) and 2400pa(Back side), ensure the mechanical life



Easy to install

Frame edge with water deflector, the panel can be installed horizontally and vertically



Reliable Sealing Ability

Excess silicone flows into the overflow tank, which can avoid water vapor entering the panels



Higher fire rating

Fire rating up to Class A, reduce fire hazards;

LINEAR PERFORMANCE WARRANTY

12 Years

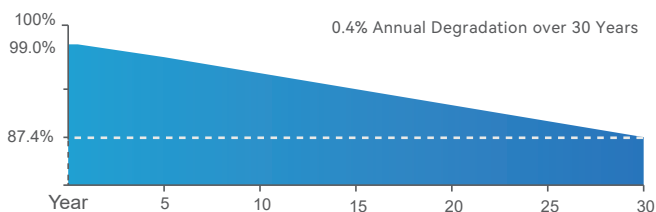
Manufacturing Warranty

30 Years

87.4% Power Output

12 Years

94.6% Power Output



King Series No-cleaning panels



Unique frame design effectively reduces the impact of dust accumulation and improves power generation by 6-15% throughout the entire lifecycle

More suitable for industrial and commercial color steel tile roofs and small angle installation scenarios

The C side of the frame contains curved hook reinforcement

Frame edge with water deflector, the panel can be installed horizontally and vertically

Frame edge with water deflector

No-cleaning panels

Seal protection with narrow or no A-side bezels is at risk of delamination failure

Increase power generation by 2-6%, lower generation gain

Weak blowdown capacity

Only vertical installation, and special rubber gasket is necessary

Narrow border or no A-side border reinforcement, weak load strength

Traditional panels

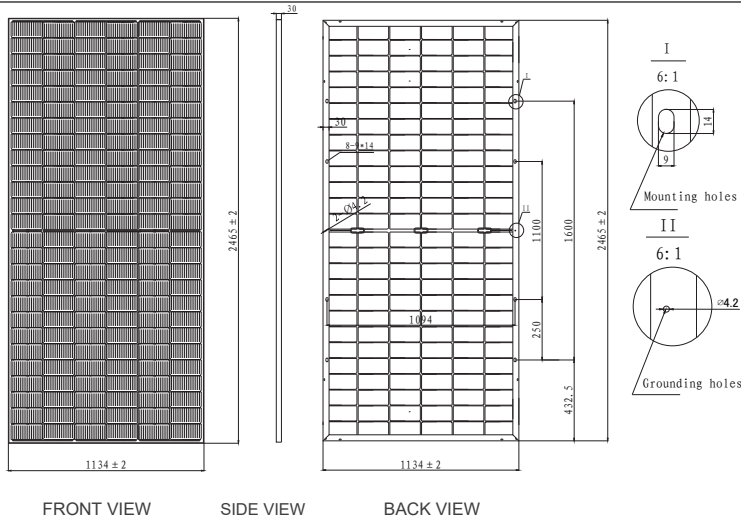
Mud belts on the surface of components will affect the power generation

Most industrial and commercial scenarios have component ash accumulation problems, resulting in significant power loss

Regular cleaning, high operation and maintenance costs

4mm height difference between the A-side frame and the glass, which affects the drainage capacity of the component

MECHANICAL DRAWINGS



MECHANICAL SPECIFICATION

Cell Type	N-Type Mono Crystalline 182x91mm
Number Of Cells	156 (6x26)
Dimensions(AxBxC)	2465x1134x30mm
Weights	34.0kg
Glass	2.0/2.0mm Tempered Low Iron Glass
Aluminium Frame	Anodised Aluminium
Junction Box	Split Junction Box (IP68 ,three diode)
Connector	Mc4 Compatible
Output Cables	4.0mm ² ,+300mm,-300mm
	Customized Length

ELECTRICAL CHARACTERISTICS

Module Type	620W		625W		630W		635W		640W		645W		650W	
	STC	NOCT	STC	NOCT	STC	NOCT	STC	NOCT	STC	NOCT	STC	NOCT	STC	NOCT
Maximum Power At STC(Pmax)	620W	468.0W	625W	471.8W	630W	475.5W	635W	479.3W	640W	483.1W	645W	486.9W	650W	490.6W
Short Circuit Current(Isc)	13.73A	11.08A	13.79A	11.13A	13.85A	11.18A	13.91A	11.23A	13.98A	11.28A	14.04A	11.33A	14.10A	11.38A
Open Circuit Voltage(Voc)	56.65V	53.66V	56.83V	53.83V	57.01V	54.00V	57.19V	54.17V	57.37V	54.34V	57.55V	54.51V	57.73V	54.68V
Maximum Power Current(Imp)	13.07A	10.48A	13.13A	10.52A	13.19A	10.57A	13.25A	10.61A	13.31A	10.67A	13.37A	10.71A	13.43A	10.76A
Maximum Power Voltage(Vmpp)	47.45V	44.68V	47.61V	44.84V	47.77V	45.00V	47.93V	45.16V	48.09V	45.29V	48.25V	45.45V	48.41V	45.61V
Module Efficiency	22.2%		22.4%		22.5%		22.7%		22.9%		23.1%		23.3%	
Power Tolerance	0~+5W		0~+5W		0~+5W		0~+5W		0~+5W		0~+5W		0~+5W	

STC: 1000W/m² irradiance, 25°C cell temperature, AM1.5. NOCT: Irradiance at 800W/m², Ambient Temperature 20°C, wind speed 1m/s.

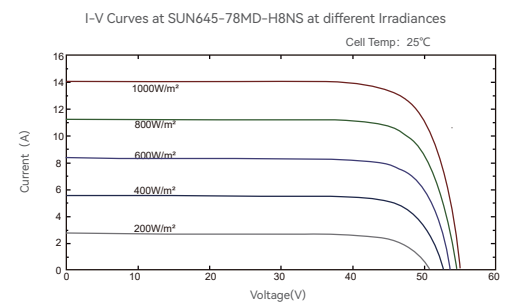
ELECTRICAL CHARACTERISTICS

I-V CURVES

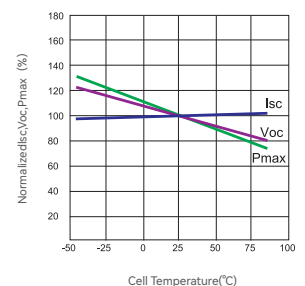
Maximum System Voltage	VDC 1500V
Maximum Series Fuse	30A
Increased Snowload Acc.to IEC 61215	5400Pa
Operating Temperature	-40~+85°C
Number Of Bypass Diodes	3
Normal Operating Cell Temperature(Noct)	45°C±2°C
Temperature Coefficient Of Pmax	-0.30%/°C
Temperature Coefficient Of Voc	-0.27%/°C
Temperature Coefficient Of Isc	0.046%/°C

ELECTRICAL CHARACTERISTICS WITH DIFFERENT REAR SIDE POWER GAIN (Reference to 585W Front)

	10%	15%	20%	25%
Backside Power Gain	10%	15%	20%	25%
Maximum Power At STC(Pmax)	687.5	718.8	750.0	781.3
Short Circuit Current(Isc)	15.17	15.85	16.53	17.21
Open Circuit Voltage(Voc)	56.84	56.94	57.04	57.14
Maximum Power Current(Imp)	14.43	15.08	15.73	16.37
Maximum Power Voltage(Vmpp)	47.63	47.66	47.69	47.72



Power voltage current curve at different temperature



PACKING CONFIGURATION

Container	40' HQ
Pieces Per Pallet	36
Pallets Per Container	16
Pieces Per Container	576

