



TOPMAX SERIES

BIFACIAL · TOPCON · N-144 HC

565 – 585W_{MH}

22.65% Max. Efficiency

30 Years Product Warranty

~ 5Wp Max. Tolerance



Less Hot Spot Shading Effects



Anti-PID Low LID Performance



Half Cut Cell Technology



Lower BOS & LCOE

About GEP-Solar

GEP-Solar, legal name Jiangsu Green Energy Power Technology Co., Ltd is a subsidiary of Sun Group Corporation (Stock Code: 835967) specializing in the production of Photovoltaic Modules covering an annual capacity of 4.7GW spread over three production units in China and two in Vietnam.

Product Intro

Our **TOPcon** Modules Range offers 30 years Product Workmanship Warranty. 30 years Linear Power Output Warranty. The power degradation for the first year will be less than 1%. From the 2nd year and onwards, the annual degradation will be less than 0.4%. Guaranteed performance ratio of 87.4% after 30 years.



Higher Power Output

Higher module conversion efficiency benefit from bigger wafer and half-cell structure.

MBB technology enhances current collection with lower series resistance.



Excellent Temperature Coefficient

Lower operating temperature and temperature coefficient increases the power output



Long-Term Reliability

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

Excellent anti-PID performance to guarantee a better sustainability in harsh environment.

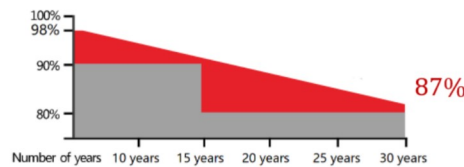


Lower Hot Spot and Crack Risk

Reduce hot-spot risk with optimized electrical design and lower operating current.

Reduce crack risk by MBB solar cell design.

Power Warranty



Standard Warranty



30 Years Workmanship



30 Years Linear Power Output

Insurance



Munich RE



太平洋保险 CPIC

Certificates



Electrical Characteristics

Module Type	TMax-565MH		TMax-570MH		TMax-575MH		TMax-580MH		TMax-585MH	
	STC	NMOT	STC	NMOT	STC	NMOT	STC	NMOT	STC	NMOT
Testing Condition	STC	NMOT	STC	NMOT	STC	NMOT	STC	NMOT	STC	NMOT
Maximum Power (Pmax)	565	428	570	432	575	436	580	440	585	445
Maximum Power Voltage (Vmp)	42.60	40.00	42.80	40.20	43.00	40.40	43.20	40.60	43.40	40.80
Maximum Power Current (Imp)	13.27	10.70	13.32	10.74	13.38	10.79	13.43	10.84	13.49	10.92
Open-circuit Voltage (Voc)	50.80	48.60	51.00	48.70	51.20	48.90	51.40	49.10	51.60	49.30
Short-circuit Current (Isc)	14.05	11.33	14.11	11.38	14.17	11.42	14.23	11.47	14.30	11.53
Module Efficiency(%)	21.87%		22.07%		22.26%		22.45%		22.65%	

STC: Irradiance 1000W/m², Cell Temperature 25°C, Air Mass AM1.5.

NMOT: Irradiance at 800W/m², Ambient Temperature 20°C, Wind Speed 1m/s.

*Measuring tolerance: 0 ~ +5W

Electrical Characteristics with 10% Solar Irradiation Ratio

Module Type	TMax-565MH	TMax-570MH	TMax-575MH	TMax-580MH	TMax-585MH
Maximum Power (Pmax)	620	626	631	637	642
Maximum Power Voltage (Vmp)	42.60	42.80	43.00	43.20	43.40
Maximum Power Current (Imp)	14.57	14.64	14.68	14.76	14.80
Open-circuit Voltage (Voc)	50.80	51.00	51.20	51.40	51.60
Short-circuit Current (Isc)	15.45	15.52	15.58	15.65	15.69

Mechanical Parameters

Solar Cells	Monocrystalline (182mm)
Module Dimensions	2278*1134*30mm
Glass	2mm~2mm
Frame	Anodized Aluminium Alloy
Output Cable	4.0mm ² , 300/300mm

No. of Cells	144 [2 x (12 x 6)]
Weight	32.5kg
Encapsulant Material	EVA/POE
J-Box	IP68
Connector	MC4 Compatible

Temperature Ratings

NMOT (Nominal operating cell temperature)	42°C(±2°C)
Temperature Coefficient of Pmax	-0.310%/°C
Temperature Coefficient of Voc	-0.260%/°C
Temperature Coefficient of Isc	+0.046%/°C

(Do not connect Fuse in Combiner Box with two or more strings in parallel connection)

Packaging

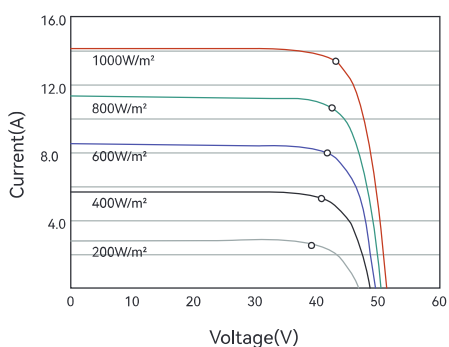
Pcs per Pallet: 36

Operating Parameters

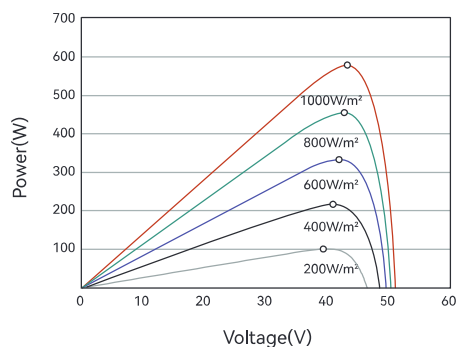
Operational Temperature	-40°C~+85°C
Maximum System Voltage	1500V DC (IEC)
Maximum Series Fuse Rating	30A
Bifacility	80%~85%

Pcs per 40' HC: 720

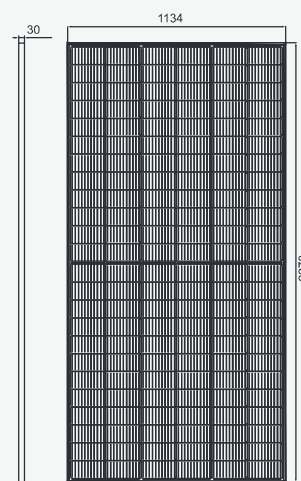
I-V Curves of PV Module (575W)



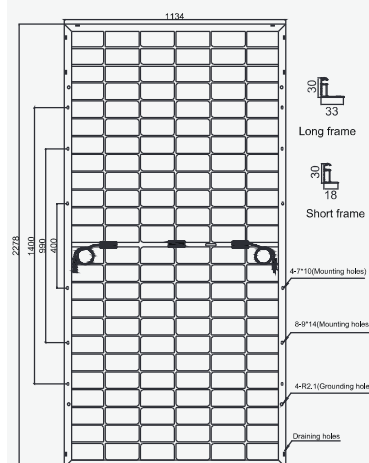
P-V Curves of PV Module (575W)



Dimensions (Unit: mm)



Front View



Back View

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