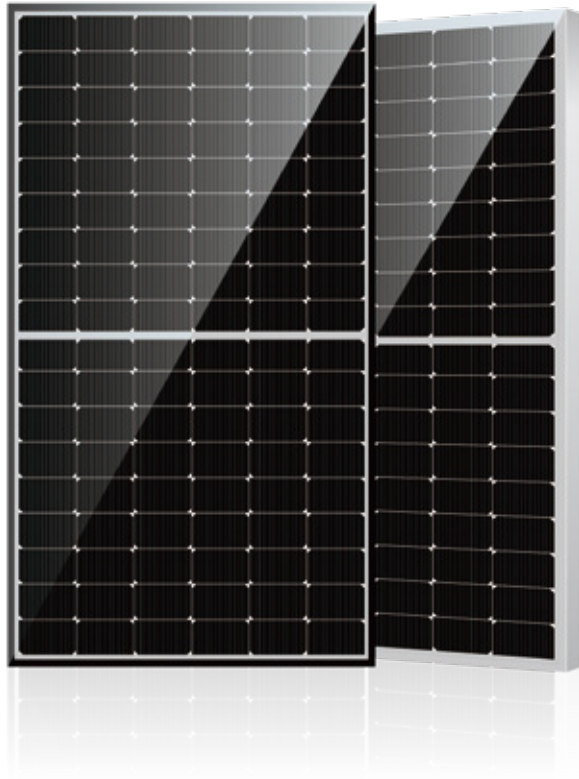


HEGATECH



HEGA-N-BG

TOPCon bifacial dual glass Mono-module

420-440W

22.5% MAX. MODULE EFFICIENCY **0~+5w** POSITIVE POWER TOLERANCE

Type: HGT-S108|M10N-xxx-BG

GRPU FRAME COLOUR



HIGH CUSTOMER VALUE

- Lower LCOE (Levelized Cost Of Energy), reduced BOS (Balance Of System) cost, shorter payback time
- More energy harvest with N-type TOPCon technology
- Designed for compatibility with existing system components



HIGH RELIABILITY

- 15 years materials warranty, 30 years power warranty.
- Mechanical performance up to 5400 Pa positive load and 2400 Pa negative load.



GRPU PV FRAME

- Use of GRPU module frames will greatly reduce carbon emissions, making PV modules highly corrosion-resistant and salt spray resistant.
- PID free better



HIGH POWER UP TO 440W

- Up to 22.5% module efficiency with high density interconnect technology. SMBB technology for better light trapping effect, lower series resistance and improved current collection



EXTENSIVE APPLICATION SCENES

- More extensive application scenes, such as BAPV, snow field, high salt mist, high humidity, strong wind and desert region

Materials and Workmanship Warranty

15
Years

1.00%

First Year Power Degradation

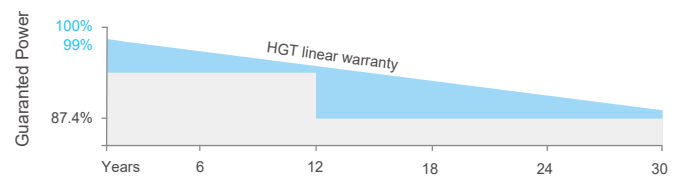
Linear Power Warranty

30
Years

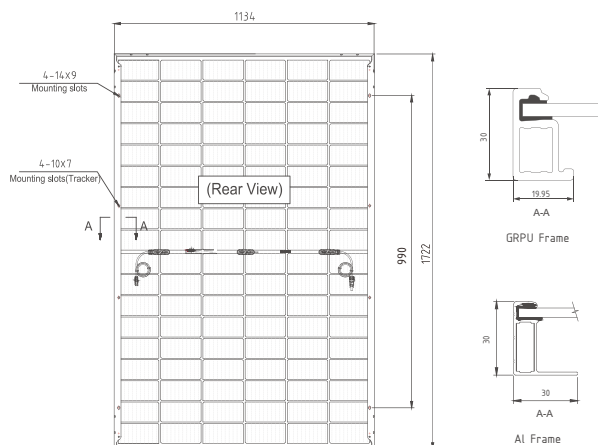
0.40%

Annual Degradation

PERFORMANCE WARRANTY



DIMENSIONS OF PV MODULE(mm)



MECHANICAL DATA

Solar Cells	N-type TOPCon
No. of cells	108 cells (6x18)
Module Dimensions	1722x 1134 x 30 mm
Weight	24.5kgs
Glass	1.6/1.8/2.0mm, High Transmission, AR Coated fully tempered Glass
Encapsulant Material	POE / EVA
Frame	Glass Fiber Reinforced Polyurethane (GRPU) / Aluminium Alloy
J-Box	IP 68 rated (3 bypass diodes)
Cables	4.0mm ² cable length +350mm/-350mm or customized length
Connector	MC4 Compatible

ELECTRICAL DATA (STC/NMOT)

Testing Condition	STC	NMOT	STC	NMOT	STC	NMOT	STC	NMOT	STC	NMOT
Maximum Power (Pmax)	420W	322	425W	326W	430W	329W	435W	333W	440W	337W
Power Tolerance-PMAX(W)	0 ~ +5W									
Maximum Power Voltage (Vmp)	32.10V	29.90V	32.30V	31.10V	32.50V	31.30V	32.70V	31.50V	32.9V	31.70V
Maximum Power Current (Imp)	13.09A	10.77A	13.16A	10.48A	13.24A	10.51A	13.31A	10.57A	13.38A	10.63A
Open Circuit Voltage (Voc)	38.70V	36.80V	38.90V	37.00V	39.10V	37.20V	39.30V	37.40V	39.50V	37.60V
Short Circuit Current (Isc)	13.81A	11.21A	13.91A	11.29A	14.01A	11.33A	14.10A	11.42A	14.18A	11.49A
Module Efficiency η_m (%)	21.5%		21.7%		22.0%		22.2%		22.5%	

STC: Irradiance 1000W/m², Cell Temperature 25 °C, Air Mass AM1.5. / NMOT: Irradiance at 800W/m², Ambient Temperature 20 °C, Air Mass AM1.5, Wind Speed 1m/s.

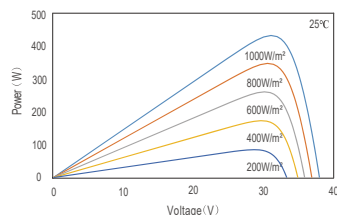
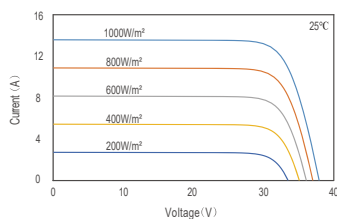
*Measuring tolerance: ±3%.

DIFFERENT BACKSIDE POWER GAIN (Reference to 440W Front)

Backside Power Gain (%)	5 %	15%	25%
Total Equivalent Power (Pmax)	462W	506W	550W
Maximum Power Voltage (Vmp)	32.90V	32.90V	32.90V
Maximum Power Current (Imp)	14.04A	15.38A	16.71A
Open Circuit Voltage (Voc)	39.50V	39.50V	39.50V
Short Circuit Current (Isc)	15.19A	16.64A	18.08A

Power Bifaciality: 75+5%.

Current-Voltage & Power-Voltage Curve (440W)



TEMPERATURE RATINGS

NOCT (Nominal Operating Cell Temperature)	42 ± 2 °C
Temperature Coefficient of P _{MAX}	-0.300%/°C
Temperature Coefficient of V _{OC}	-0.250%/°C
Temperature Coefficient of I _{SC}	0.045%/°C

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

MAXIMUM RATINGS

Operational Temperature	-40~+85°C
Maximum System Voltage	1500V/DC(IEC)
Max Series Fuse Rating	25A

WARRANTY

15 year Product Workmanship Warranty
30 year Power Warranty
1% first year degradation
0.40% Annual Power Attenuation

(Please refer to product warranty for details)

PACKAGING CONFIGURATION

Pieces per pallet	36
Pallets per container	22
Pieces per container 40'HC	936
Packaging box dimensions	1770x1120x1270mm
Packaging box weight	795kg

