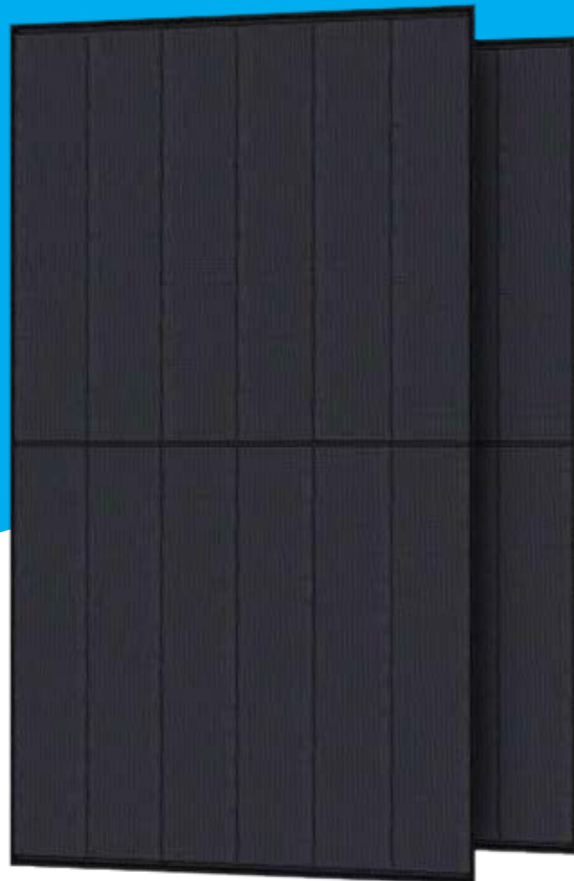




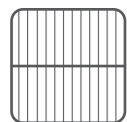
# PNGNH48-B8(182)

## 460-485 Watt (FB)

Mono-facial with Dual Glass



### Key Features



#### Multi Busbar Solar Cell

Stronger current collection ability, Special circuit design with much lower hot spot temperature;



#### PID Resistant

Excellent PID resistance at 96 hours (85°C/85%) test, and also can be improved to meet higher standards for the particularly harsh environment;



#### Anti-Crack

Excellent anti-microcracking performance with more balanced interior stress;



#### Module efficiency up to 24.27%

Half cell structure brings low resistance characteristic, higher lifetime generating capacity, simultaneously lower annual power attenuation;



#### Low-Light Performance

Excellent power generation performance under Low-Light condition due to multi busbar; better shading response benefit from half cell module;

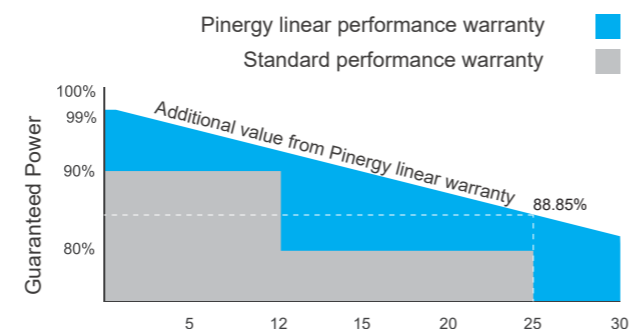


#### Strength and Durability

Certified for 5400Pa snow and 2400Pa Wind loads test;

### Linear Performance Warranty

12 Years Product Warranty · 30 Years Linear Power Warranty



### Certifications

- IEC 61215, IEC 61730, CE, CQC
- ISO9001: 2015: Quality management system
- ISO14001: 2015: Environmental management system
- ISO45001: 2018: Occupational health and safety management system



### Electrical Specifications

Module Type: PNGNH48-B8-xxx , (xxx=Pmax)

Module Type	460	465	470	475	480	485
Testing Condition	STC	STC	STC	STC	STC	STC
Max. Power (Pmax/W)	460	465	470	475	480	485
Voltage at Max. Power (Vmp/V)	30.63	30.80	30.97	31.13	31.32	31.50
Current at Max. Power (Imp/A)	15.02	15.10	15.18	15.26	15.33	15.40
Open circuit voltage (Voc/V)	35.69	35.94	36.19	36.44	36.69	36.94
Short circuit current (Isc/A)	15.70	15.75	15.80	15.85	15.89	15.94
Module efficiency (%)	23.02%	23.27%	23.52%	23.77%	24.02%	24.27%
Power Tolerance	0~+3%					

Standard Test Condition (STC): Irradiance 1000W/m<sup>2</sup>, Cell Temperature 25°C, AM1.5

Nominal Module Operating Temperature (NOCT): Irradiance 800W/m<sup>2</sup>, Ambient Temperature 20°C, AM1.5, Wind Speed 1m/s

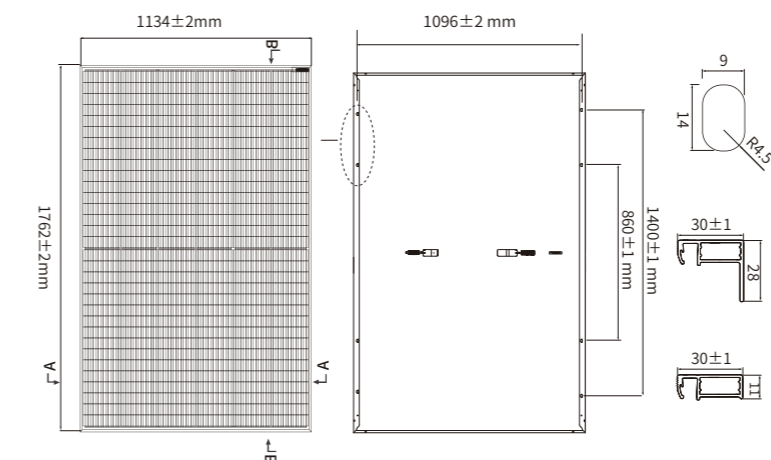
### Mechanical Specifications

Cell Type	N-Type Mono
No. of Cells	192 (4×48)
Dimension	1762x1134x30mm
Weight	24.4kg
Front/Back Glass	2.0mm, Anti-reflection Coating/Heat Strengthened Glass
Frame	Anodized Aluminium Alloy
Junction Box	IP68, 3 diodes
Output Cables	4mm <sup>2</sup> , Length 300mm or customized
Connector type	MC4 compatible

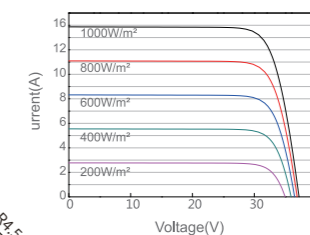
### Packaging Configurations

Per Pallet	37 pcs
Per 40' HQ Container	962 pcs

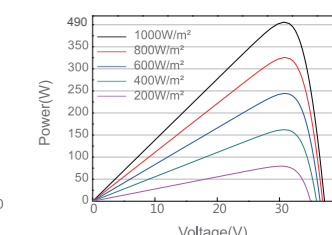
### Engineering Drawings



Current-Voltage Curve (460W)



Power-Voltage Curve (460W)



Current-Voltage Curve (460W)

