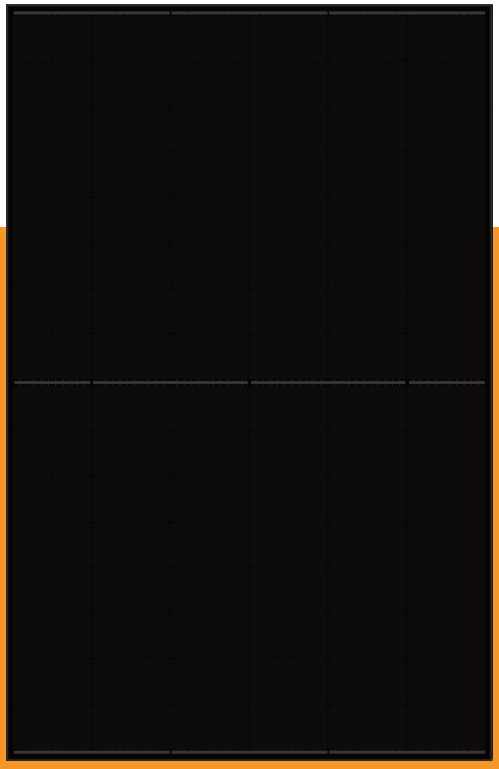
POWERBAY

N Type

Bifacial Double Glass DBC Module (Black Pro)

PB-DH96TE-460
PB-DH96TE-465
PB-DH96TE-470
PB-DH96TE-475



Maximum Power Output	Maximum Module Efficiency	Power Binning
475W	23.8%	0~+5W

Key Features

High Efficiency
Leading module efficiency in industry, up to 23.8%

Excellent Appearance and Performance
Front without busbars design, low risk of micro-crack

High Reliability
Passed 3*IEC standard test，25 years materials warranty, 30 years power warranty

High power generation
Higher power generation and lower BOS cost than conventional modules

Better temperature coefficient
Nominal Max. Power(Pmax) is as low as -0.260%/℃, improving the power generation efficiency of the modules

Superior Low Irradiance Performance
Excellent low irradiance performance, increase power generation in low-light conditions like mornings, evenings and cloudy days

Product and Quality Certifications

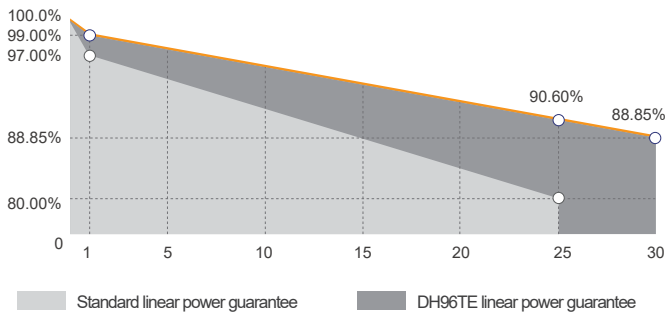
IEC 61215, IEC 61730

ISO 9001：Quality Management System

ISO 14001：Environment Management System

ISO 45001：Occupational Health and Safety Management System

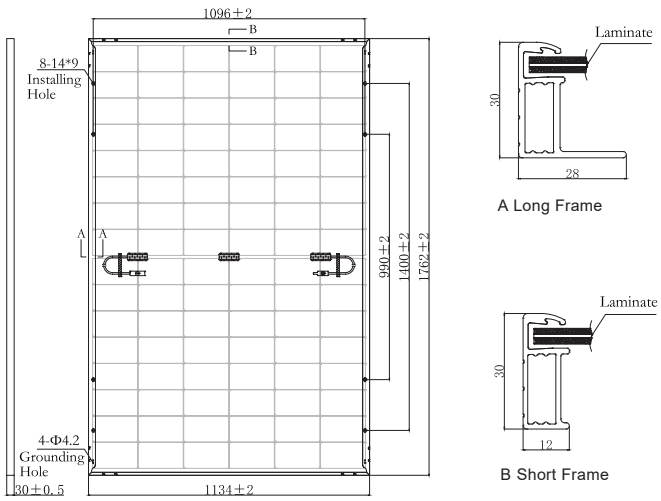
Safety Class: Class II Fire Safety: Class C



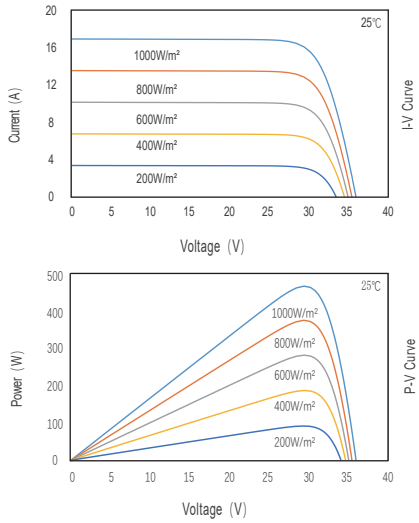
Leading product and power warranty

1.00% 1st-year Degradation 0.35% Annual Degradation 25 Years materials and workmanship warranty 30 Years linear power warranty

Engineering Drawing (mm)



Characteristic Curves(475W)



Electrical Parameters (BSI *)

Isc-BSI (±5%)	19.84	19.94	20.04	20.13

BSI: front irradiance=1000W/m²， rear irradiance=300W/m²

Electrical Parameters (STC *)

Nominal Max. Power(Pmax/W)±3%	460	465	470	475
Open Circuit Voltage(Voc/V)±3%	35.62	35.79	35.96	36.13
Short Circuit Current(Isc/A)±5%	16.40	16.48	16.56	16.64
Operating Voltage(Vmp/V)	29.80	29.97	30.14	30.30
Operating Current(Imp/A)	15.44	15.52	15.60	15.68
Efficiency(%)	23.0	23.3	23.5	23.8

STC * : Irradiance = 1000 W/m², Cell Temperature = 25°C, AM = 1.5
Test condition is based on the front side

Electrical Parameters (NMOT *)

Nominal Max. Power(Pmax/W)±3%	352	356	359	363
Open Circuit Voltage(Voc/V)±3%	34.29	34.45	34.62	34.78
Short Circuit Current(Isc/A)±5%	13.23	13.30	13.36	13.43
Operating Voltage(Vmp/V)	28.24	28.40	28.55	28.71
Operating Current(Imp/A)	12.46	12.52	12.59	12.65

NMOT *: Irradiance = 800 W/m², Ambient Temperature = 20°C, AM = 1.5，
Wind Speed = 1 m/s
Test condition is based on the front side

Electrical Parameters (BNPI*)

Nominal Max. Power(Pmax/W)±3%	500	505	510	515
Open Circuit Voltage(Voc/V)±3%	35.62	35.79	35.96	36.13
Short Circuit Current(Isc/A)±5%	17.95	18.04	18.12	18.21
Operating Voltage(Vmp/V)	29.80	29.97	30.14	30.30
Operating Current(Imp/A)	16.89	16.98	17.07	17.16

BNPI * : front irradiance=1000W/m²， rear irradiance=135W/m²,
Cell Temperature = 25°C, AM = 1.5
Pmax bifaciality coefficient 70±5%，Voc bifaciality coefficient 95±5%
Isc bifaciality coefficient 70±5%

Mechanical Parameters

Cell Type	N Type
Module Size	1762×1134×30mm
Glass Thickness	1.6mm + 1.6mm
Module Weight	21.6Kg
Output Cable	4mm², cable length 1200mm (can be customized)
Connector	See Note
Junction Box	IP68, 3 bypass diodes
Frame	Anodized aluminium alloy（Black）

Connector*:
1.PV-DA01M2-XY / PV-DA02M2-XY (DAS Solar)
2.PV-ZH202B (Zhejiang Zhonghuan)
3.PV-KST4-EVO2/xy_UR,PV-KBT4-EVO2/xy_UR (Staubli)
4.PV-KST4-EVO2A/xy,PV-KBT4-EVO2A/xy (Staubli)
5.PV-JK03M2/xy (Plug+Socket)(Jinko)

Temperature Coefficients

Short Circuit Current(Isc)	+0.050%/℃
Open Circuit Voltage(Voc)	-0.22%/℃
Nominal Max. Power(Pmax)	-0.260%/℃
NMOT	42±2℃

Operating Parameters

Max. System Voltage	DC1500V
Power Measurement Tolerance	±3%
Module[T98] max[°C]	70
Operating Temperatue	-40℃ ~ +85℃
Max. Fuse Rated Current	30A
Max.Test Load	Front 5400Pa, Back 2400Pa
Packing Data	37 pcs/Pallet ;222(20GP);962(40HQ)