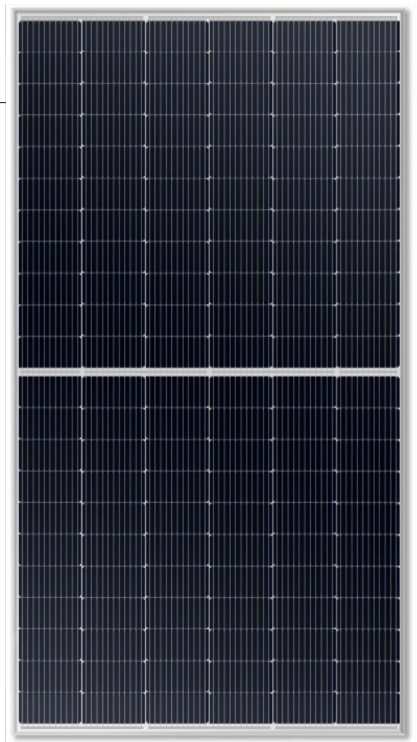


MOTECH

POWER UP NOW



HALF CUT 132 CELL

MONOCRYSTALLINE MODULE

490-515W

POWER OUTPUT RANGE

21.68%

MAXIMUM EFFICIENCY

0~+5W

BINNING TOLERANCE

10BB

MULTI BUSBAR

PERC CELL TECHNOLOGY

PRODUCTS

Tokyo Series

POWER RANGE

490-515W



High power Mono Perc

- Up to 515W front power and 21.68% module efficiency with half cut tech
- MBB (Multi Busbar) technology bringing more BOS savings
- Lower resistance and good reflection effect of MBB ensure high power



High reliability

- Ensured PID resistance through cell process and module material control
- Resistant to salt, acid and ammonia
- Proven to be reliable in high temperature and humidity areas
- Certified to fire class A
- Minimizes micro-crack and snail trails
- Mechanical performance: Up to 5400 Pa positive load and 2400 Pa negative



High energy generation

- Up to 25% additional power gain from back side depending on the design
- Excellent current and low light performance validated by 3rd party
- Perfect cell process and module material optimization
- Lower temp coefficient (-0.35%) and NMOT bring more energy
- Better anti-shading performance and lower operating temperature

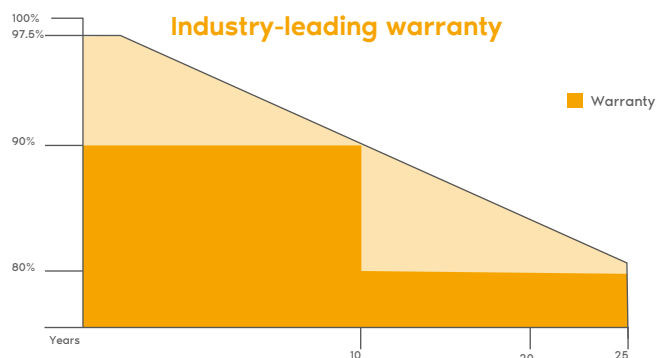


Easy to install

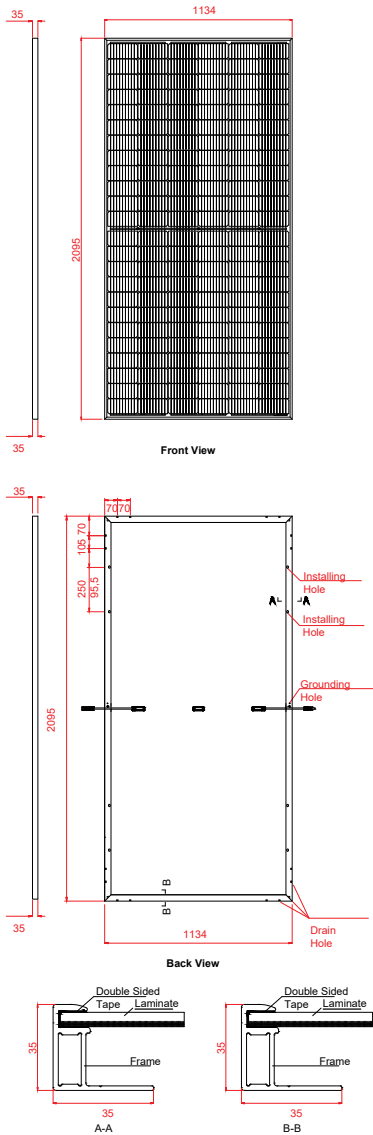
- Frame design makes module compatible with all racking and installation methods
- Easy to handle and install as normal framed module during transportation

SYSTEM CERTIFICATES

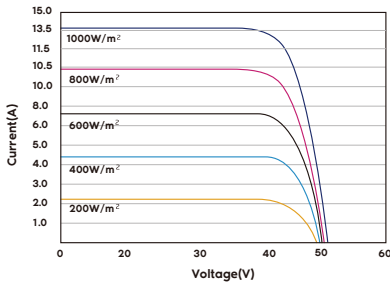
IEC61215/IEC61730/IEC61701/IEC62716
 ISO 9001: Quality Management System
 ISO 14001: Environmental Management
 ISO45001: Occupational Health and Safety



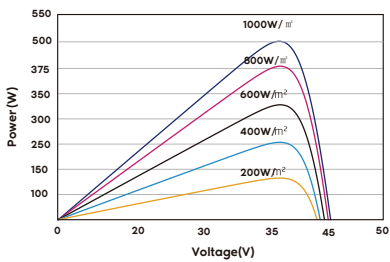
DIMENSIONS OF PV MODULE(mm)



I-V CURVES OF PV MODULE(500W)



P-V CURVES OF PV MODULE(500W)



ELECTRICAL DATA (STC)

Parameter	490	495	500	505	510	515
Peak Power Watts-PMAX (Wp)*	490	495	500	505	510	515
Power Tolerance Range-PMAX (W)	0 - +5					
Maximum Power Voltage-VMPP (V)	38,40	38,54	38,54	38,64	38,72	38,82
Maximum Power Current-IMPP (A)	12,76	12,87	12,97	13,07	13,17	13,27
Open Circuit Voltage-VOC (V)	46,08	46,15	46,25	46,37	46,46	46,58
Short Circuit Current-ISC (A)	13,46	13,58	13,69	13,79	13,89	13,99
Module Efficiency ° m (%)	20,63	20,84	21,05	21,26	21,47	21,68

STC: Irradiance 1000W/m², Cell Temperature 25°C, Air Mass AM1.5.
 *Measuring tolerance: ±3%.

ELECTRICAL DATA (NMOT)

Parameter	368	371	375	379	383	386
Maximum Power-PMAX (Wp)	368	371	375	379	383	386
Maximum Power Voltage-VMPP (V)	35,71	35,77	35,84	35,94	36,01	36,10
Maximum Power Current-IMPP (A)	10,29	10,38	10,46	10,54	10,62	10,70
Open Circuit Voltage-VOC (V)	43,32	43,38	43,47	43,59	43,68	43,79
Short Circuit Current-ISC (A)	11,02	11,11	11,20	11,29	11,37	11,46

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

MECHANICAL DATA

Solar Cells	Monocrystalline
Cell Orientation	132 cells (6 × 22)
Module Dimensions	2095×1134×35 mm (±1%)
Weight	25,8.KG
Front Glass	3,2 mm, High Transmission, AR Coated Heat Strengthened Glass
Encapsulant Material	POE/EVA
Back Glass	KPF Type
Frame	35mm Anodized Aluminium Alloy
J-Box	IP 68 rated and 30cm or (optional 120cm cable)
Cables	Photovoltaic Technology Cable 4.0mm2
Connector	MC4 EVO2 / TS4

TEMPERATURE RATINGS

NMOT(Nominal Module Operating Temperature)	45°C (±2°C)
Temperature Coefficient of PMAX	-0.35 °C%
Temperature Coefficient of VOC	-0.28 °C%
Temperature Coefficient of ISC	+0.048%/°C

MAXIMUM RATINGS

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

WARRANTY

10 year Product Workmanship Warranty
25 year Power Warranty
2% first year degradation
0.45% Annual Power Attenuation

(Please refer to product warranty for details)

PACKAGING CONFIGURATION

Modules per box	32 pcs
Modules per 40' Container	704 pcs

