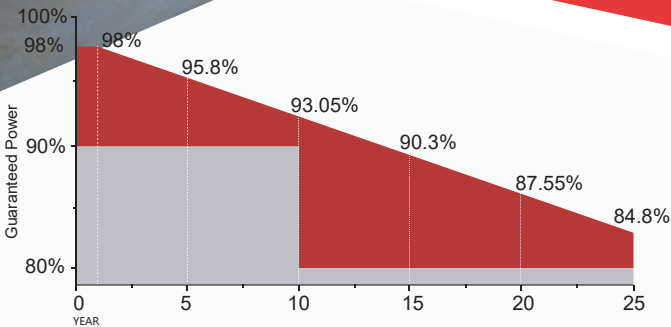
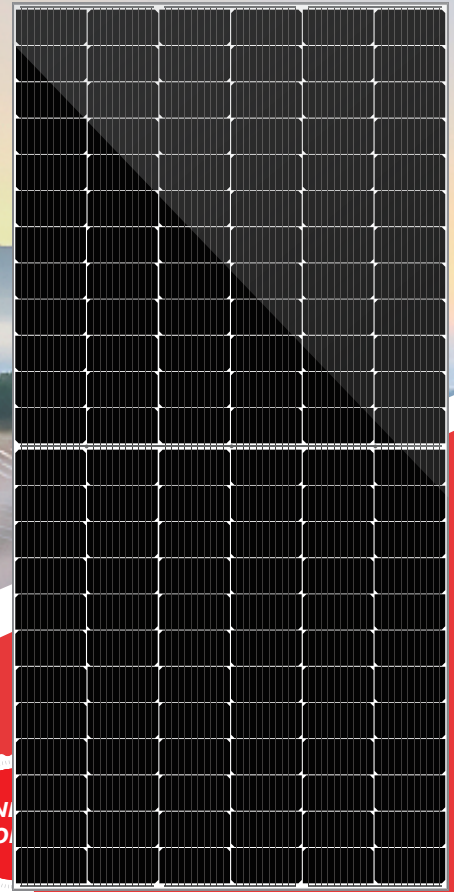


ASM 144HC

High Performance Mono Perc Module

440-465_w



12-year product warranty



30-year linear power output warranty

Key Features



Multi Busbar Technology

Better light trapping and current collection to improve module power output and reliability.



Reduced Hot Spot Loss

Optimized electrical design and lower operating current for reduced hot spot loss and better temperature coefficient.



Enhanced Mechanical Load

Certified to withstand: wind load (2400 Pascal) and snow load (5400 Pascal).



Anti PID

Ensured PID resistance through the quality control of cell manufacturing process and raw materials.



Durability Against Extreme Environmental Conditions

High salt mist and ammonia resistance.

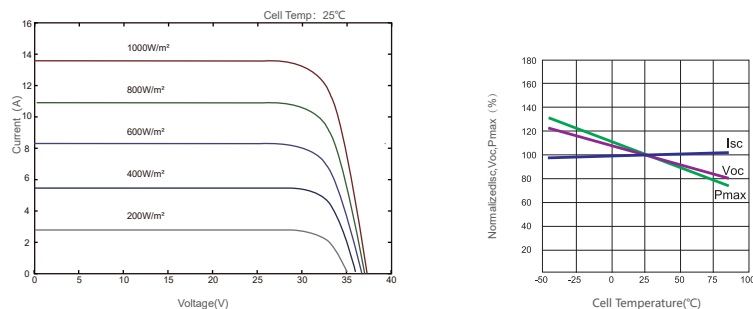


Electrical characteristics

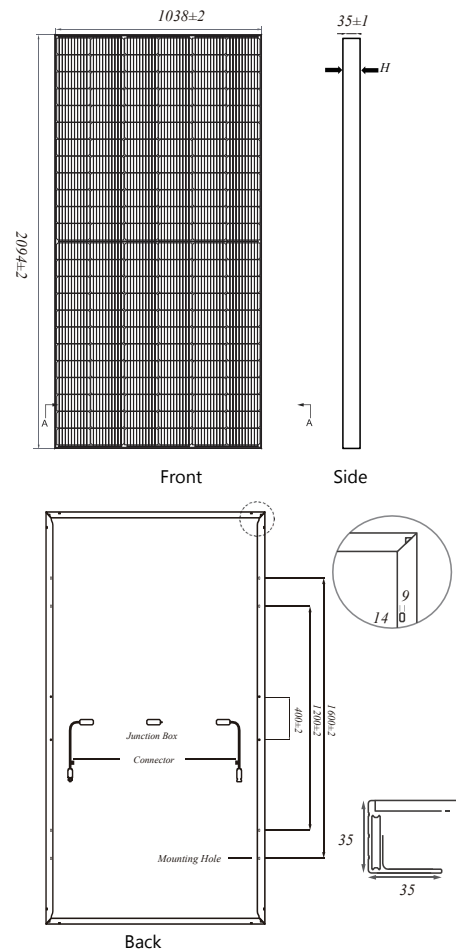
| Module Type | 440W | | 445W | | 450W | | 455W | | 460W | | 465W | |
|---|------------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| | STC | NOCT | STC | NOCT | STC | NOCT | STC | NOCT | STC | NOCT | STC | NOCT |
| Maximum Power At STC(Pmax) | 440W | 333W | 445W | 336W | 450W | 340W | 455W | 344W | 460W | 348W | 465W | 352W |
| Short Circuit Current(Isc) | 11.28A | 9.16A | 11.32A | 9.20A | 11.36A | 9.25A | 11.41A | 9.29A | 11.45A | 9.33A | 11.49A | 9.38A |
| Open Circuit Voltage(Voc) | 49.40V | 46.40V | 49.56V | 46.55V | 49.70V | 46.90V | 49.85V | 47.15V | 50.11V | 47.38V | 50.15V | 47.61V |
| Maximum Power Current(Imp) | 10.76 | 8.60A | 10.80A | 8.64A | 10.84A | 8.68A | 10.88A | 8.72A | 10.92A | 8.76A | 10.96A | 8.81A |
| Maximum Power Voltage(Vmpp) | 40.90 | 38.70V | 41.21V | 38.95V | 41.52V | 39.19V | 41.82V | 39.44V | 42.13 | 39.68V | 42.43V | 39.90V |
| Module Efficiency | 20.13% | | 20.36% | | 20.58% | | 20.81% | | 21.04% | | 21.27% | |
| Power Tolerance | 0~+5W | | 0~+5W | | 0~+5W | | 0~+5W | | 0~+5W | | 0~+5W | |
| Maximum System Voltage | VDC 1500V | | | | | | | | | | | |
| Maximum Series Fuse | 20A | | | | | | | | | | | |
| Increased Snowload Acc.to Iec 61215 | 5400Pa | | | | | | | | | | | |
| Operating Temperature | -40~+85°C | | | | | | | | | | | |
| Number Of Bypass Diodes | 3 | | | | | | | | | | | |
| Norminal Operating Cell Temperature(Noct) | 45°C±2°C | | | | | | | | | | | |
| Temperature Coefficient Of Pmax | -0.350%/°C | | | | | | | | | | | |
| Temperature Coefficient Of Voc | -0.272%/°C | | | | | | | | | | | |
| Temperature Coefficient Of Isc | 0.044%/°C | | | | | | | | | | | |

STC: 1000W/m² irradiance, 25°C cell temperature, AM1.5. NOCT: Irradiance at 800W/m², Ambient Temperature 20°C, wind speed 1m/s.

I-V Curve



Design



The structural characteristics

| | |
|-------------------|---|
| Cell Type | Mono 166x83mm |
| Number Of Cells | 144 (6x24) |
| Dimensions(AxBxC) | 2094x1038x35mm |
| Weights | 23.0kg |
| Glass | 3.2mm Tempered Low Iron Glass |
| Aluminium Frame | Anodised Aluminium |
| Junction Box | Split Junction Box (IP68, three diode) |
| Connector | Mc4 Compatible |
| Output Cables | 4.0mm ² , +300mm, -300mm Customized Length |

Operating Parameters

| | |
|-----------------------|--------|
| Container | 40' HQ |
| Pieces Per Pallet | 31 |
| Pallets Per Container | 17 |
| Pieces Per Container | 726 |