SERAPHIM®

*SHIFTING* · THE FUTURE

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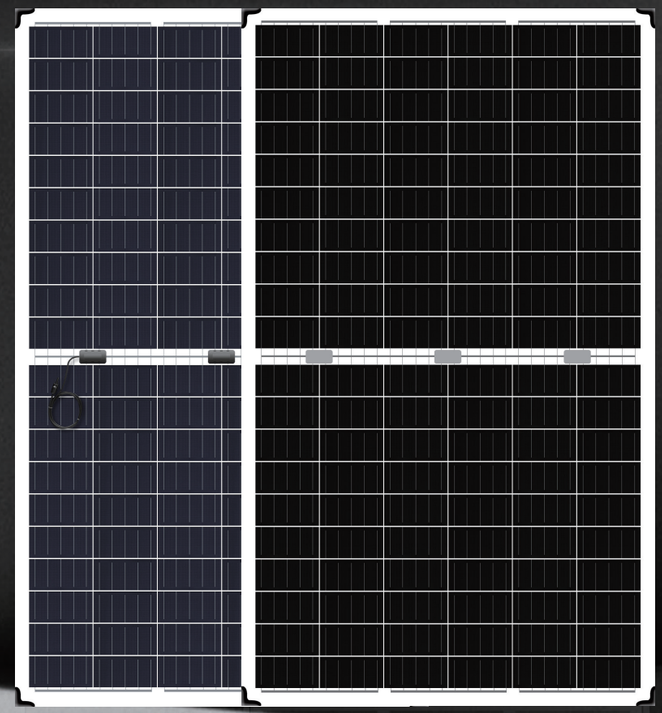
SERAPHIM®

# BLADE™ BIFACIAL

## Pursue More, Achieve More



## 320W-335W

Seraphim's new half-cell bifacial module combines high-efficiency bifacial technology with proven half-cell technology, using incidental light from both the front and rear side of each cell. Yields up to 30% more energy from back side power generation, depending on the albedo/reflectivity of each individual project site.

BLADE™ BIFACIAL | 320W-335W
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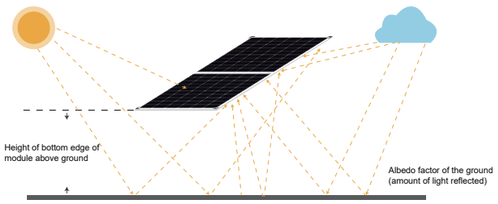
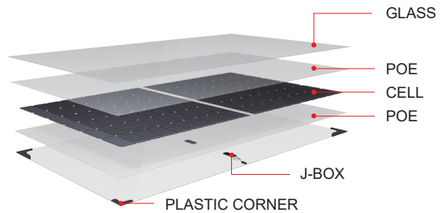
## Maximum Power Output

Uses reflected and scattered light to increase energy generation by an additional 10-30%.




## Upgraded Module Design

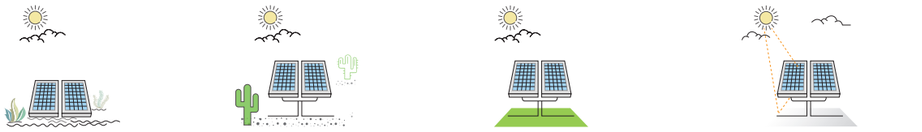
A lighter, 2.0mm tempered AR-coated glass was selected to maintain the same snow and wind load as standard modules, while reducing transportation costs and installation difficulty.




## More Benefits

- Higher Durability and Reliability
- Enhanced safety by excellent fire resistance
- Dual-glass structure minimizes micro-cracks, snail trails, and UV aging
- Lower internal current, lower mismatch loss
- Frameless design solving the problematic issue of PID
- Unique circuit design, better shading tolerance.

## Perfect for Highly—reflective Project Sites



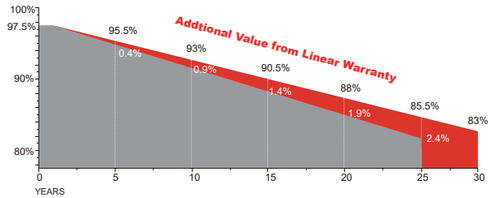

## Certifications

TÜV SÜD · PV CYCLE · CE

## Insurances

PICC

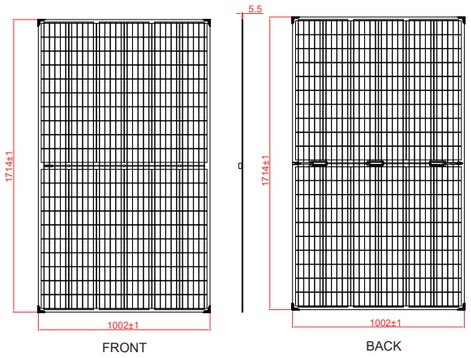
## Warranty




15 YEARS Guarantee on product material and workmanship

30 YEARS linear power output warranty

## Technical drawing




* All Dimensions in mm
* The above drawing is a graphical representation of the product. For engineering quality drawings please contact SERAPHIM.

## Mechanical Specifications

| | |
|---|---|
| External Dimension | 1714 x 1002 x 5.5mm |
| Weight | 20.0kg |
| Solar Cells | PERC Mono crystalline 158.75 x 79.375 mm (120pcs) |
| Front / Back Glass | 2.0mm AR coating semi-tempered glass, low iron |
| Frame | Frameless |
| Junction Box | IP68, 3 diodes |
| Output Cables | 4.0 $mm^2$, Portrait:255mm(+)/355mm(-);Landscape:1200mm |
| Connector | MC4 Compatible |

## Packing Configuration

| | |
|---|---|
| Container | 40'HQ |
| Pieces per Pallet | 36 |
| Pallets per Container | 24 |
| Pieces per Container | 864 |

## Electrical Characteristics

| Module Type | SRP-320-BMB-BG | | SRP-325-BMB-BG | | SRP-330-BMB-BG | | SRP-335-BMB-BG | |
|---|---|---|---|---|---|---|---|---|
| STC | Front | Back | Front | Back | Front | Back | Front | Back |
| Maximum Power -$P_{mp}$ (W) | 320 | 239 | 325 | 243 | 330 | 247 | 335 | 251 |
| Open Circuit Voltage -$V_{oc}$ (V) | 40.7 | 40.4 | 40.9 | 40.6 | 41.1 | 40.8 | 41.3 | 41.0 |
| Short Circuit Current -$I_{sc}$ (A) | 9.84 | 7.36 | 9.93 | 7.44 | 10.02 | 7.51 | 10.10 | 7.59 |
| Maximum Power Voltage -$V_{mp}$ (V) | 34.3 | 34.4 | 34.5 | 34.6 | 34.7 | 34.8 | 34.9 | 35.0 |
| Maximum Power Current -$I_{mp}$ (A) | 9.33 | 6.95 | 9.43 | 7.03 | 9.52 | 7.10 | 9.60 | 7.18 |
| Module Efficiency STC-$\eta_m$ (%) | 18.63 | | 18.92 | | 19.21 | | 19.51 | |
| Power Tolerance （W） | （0，+4.99） | | | | | | | |
| Pmax Temperature Coefficient | -0.36 %/°C | | | | | | | |
| Voc Temperature Coefficient | -0.28 %/°C | | | | | | | |
| Isc Temperature Coefficient | +0.05 %/°C | | | | | | | |

STC: Irradiance 1000 W/$m^2$ module temperature 25°C AM=1.5

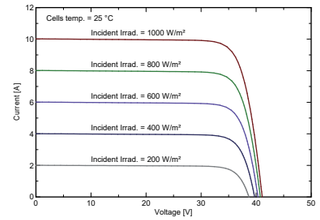
## Rear Side Power Gain(SRP-320-BMB-BG)

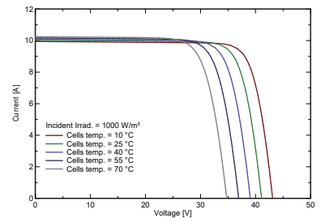
| Power Gain | 10% | 15% | 20% | 25% | 30% |
|---|---|---|---|---|---|
| Maximum Power -$P_{mp}$ (W) | 352 | 368 | 384 | 400 | 416 |
| Open Circuit Voltage -$V_{oc}$ (V) | 40.7 | 40.7 | 40.7 | 40.7 | 40.7 |
| Short Circuit Current -$I_{sc}$ (A) | 10.83 | 11.32 | 11.81 | 12.31 | 12.79 |
| Maximum Power Voltage -$V_{mp}$ (V) | 34.3 | 34.3 | 34.3 | 34.3 | 34.3 |
| Maximum Power Current -$I_{mp}$ (A) | 10.27 | 10.73 | 11.20 | 11.67 | 12.13 |

## Application Conditions

| | |
|---|---|
| Maximum System Voltage | 1500VDC |
| Maximum Series Fuse Rating | 20A |
| Operating Temperature | -40~+85 °C |
| Nominal Operating Cell Temperature | 45±2 °C |
| Bifaciality | 70%±5% |
| Mechanical Load | Front side 2400Pa/ Back side 2400Pa |

## I-V Curve

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