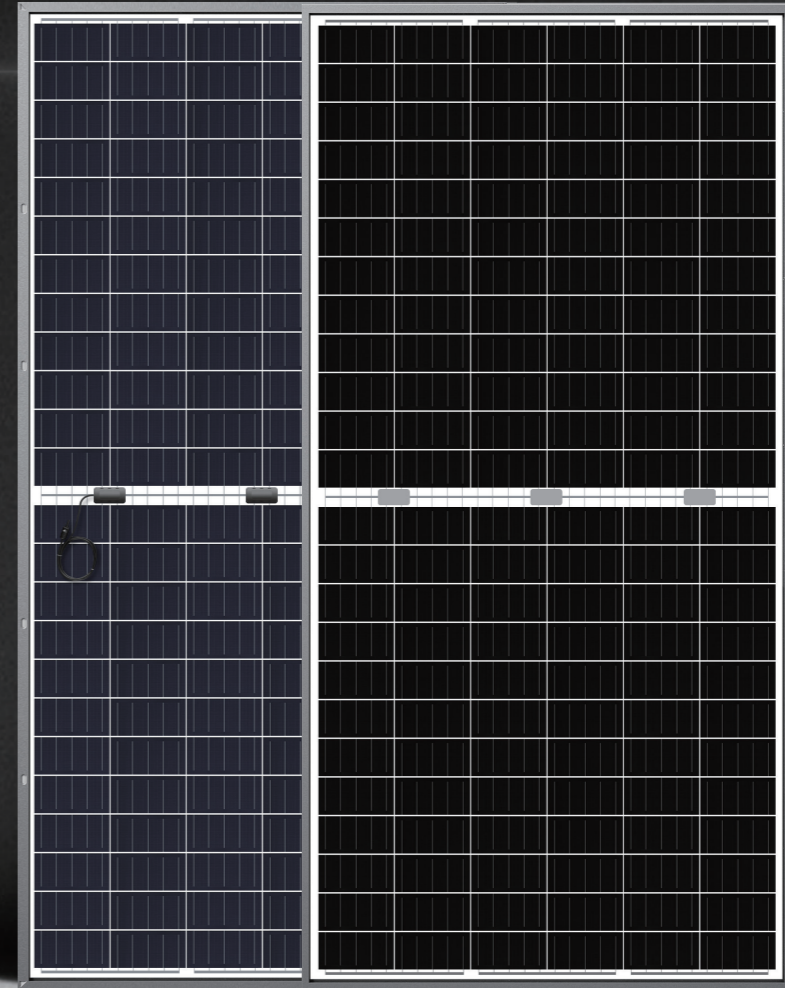




BLADE™ BIFACIAL

Pursue More, Achieve More

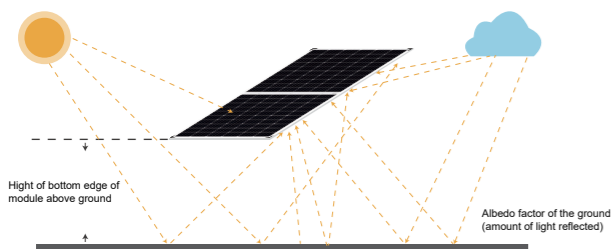


390W-405W

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.

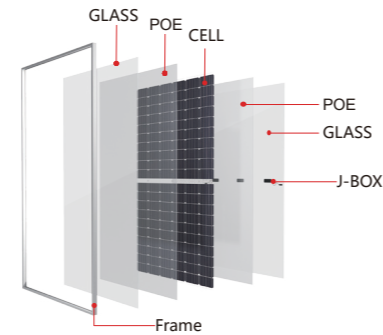
Maximum Power Output

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

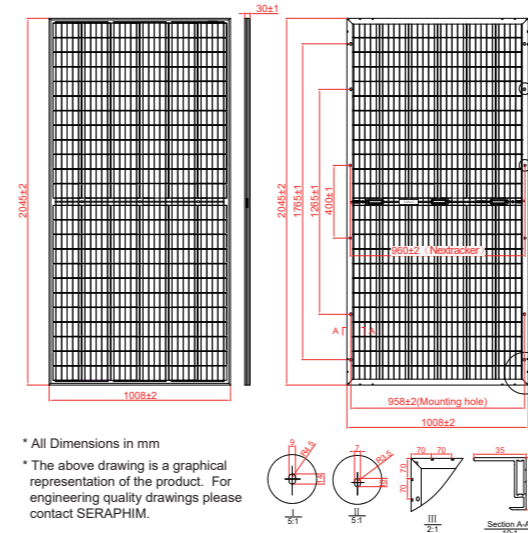


Upgraded Module Design

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.



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	2045 x 1008 x 30mm(80.51 x 39.69 x 1.18inch)
Weight	26.5 kg (58.5 lbs)
Solar Cells	PERC Mono crystalline 158.75 x 79.375 mm (144pcs)
Front / Back Glass	2.0mm AR coating semi-tempered glass, low iron
Frame	Anodized aluminium alloy
Junction Box	IP68, 3 diodes
Output Cables	12AWG,Portrait:100.39 inch(+)/139.76 inch(-); Landscape:472.44 inch
Connector	MC4 Compatible

Packing Configuration

Container	40'HQ
Pieces per Pallet	30
Pallets per Container	22
Pieces per Container	660

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
- Lower power degradation, more power yield, more returns
- Unique circuit design, better shading tolerance.

Perfect for Highly—reflective Project Sites

- WATER
- SANDY
- GRASSLAND
- WHITE PAINTED GROUND

Electrical Characteristics

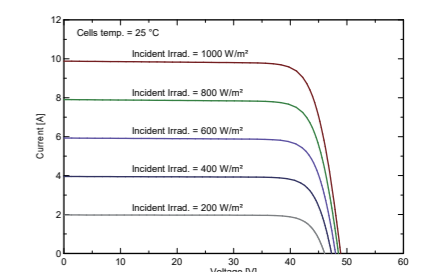
Module Type	SEG-390-BMA-BG		SEG-395-BMA-BG		SEG-400-BMA-BG		SEG-405-BMA-BG	
	Front	Back	Front	Back	Front	Back	Front	Back
STC								
Maximum Power -P _{mp} (W)	390	292	395	296	400	300	405	304
Open Circuit Voltage -V _{oc} (V)	49.1	48.7	49.3	48.9	49.5	49.1	49.7	49.3
Short Circuit Current -I _{sc} (A)	9.96	7.44	10.04	7.49	10.12	7.55	10.19	7.61
Maximum Power Voltage -V _{mp} (V)	41.3	41.4	41.5	41.6	41.7	41.8	41.9	42.0
Maximum Power Current -I _{mp} (A)	9.45	7.06	9.52	7.12	9.60	7.18	9.67	7.24
Module Efficiency STC-η _m (%)	18.92		19.16		19.40		19.65	
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/m² module temperature 25°C AM=1.5

Rear Side Power Gain(SEG-400-BMA-BG)

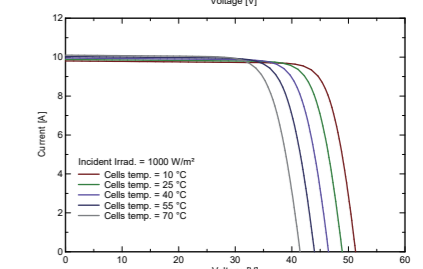
Power Gain	10%	15%	20%	25%	30%
Maximum Power -P _{mp} (W)	440	460	480	500	520
Open Circuit Voltage -V _{oc} (V)	49.5	49.5	49.5	49.5	49.5
Short Circuit Current -I _{sc} (A)	11.14	11.65	12.15	12.65	13.15
Maximum Power Voltage -V _{mp} (V)	41.7	41.7	41.7	41.7	41.7
Maximum Power Current -I _{mp} (A)	10.56	11.04	11.52	11.99	12.47

I-V Curve



Application Conditions

Maximum System Voltage	1500VDC
Maximum Series Fuse Rating	20A
Operating Temperature	-40~+85 °C
Nominal Operating Cell Temperature	70%±5%
Bifaciality	70%±5%
Mechanical Load	Front side 5400Pa/ Back side 2400Pa



Certifications



Warranty

