



**ELNSM54M-HC-N Series**  
**DC:BS & DC:BS-E & DC:BS-E-J & DC:F-BS-E-J**

**MBB HC**  
**MONOCRYSTALLINE**  
**PV MODULE**  
**440 - 465 W**



**Sirius 182MM N-Type Series**  
 Sirius redefined the high-efficiency module series by integrating 182mm silicon wafers with multi-busbar and half-cut cell technologies. Sirius combined creative technology with 182mm\_N Type module. This caused effectively and extremely improved the module efficiency and power output .

**KEY FEATURES**



Less mismatch to get more power



Less power loss by minimizing the shading impact



Competitive low light performance



Ideal choice for rooftop and commercial scale projects by reduced BOS and improve ROI.



Outstanding reliability for stringent environment condition :

- Sand, acid, salt and hail stones,
- 5400pa snow load and Up to 5400pa wind load
- PID FREE

**QUALITY SYSTEM**

TS EN 61215, TS EN 61730  
 IEC 61215, IEC61730, IEC 62804 (PID Free)  
 UL 61730-1, UL 61730-2  
 ISO 9001:2015 / Quality Management System  
 ISO 14001:2015 / Environmental Management System  
 ISO 45001: 2018 / Occupational Health and Safety Management System  
 System ISO 50001:2018 / Energy Management System  
 ISO 27001:2013 / Information Security Management System  
 ISO 10002:2018 / Customer Satisfaction Management System  
 ISO 37001:2016 / Anti-Corruption Management System  
 ISO 26000:2021 / Social Responsibility Management System

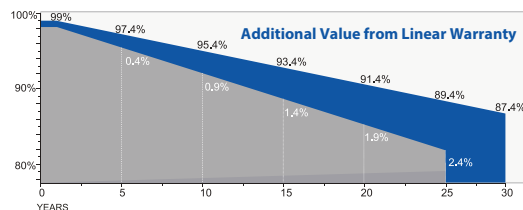
**PRODUCT CERTIFICATION**



**WARRANTY**

Up to **25 YEARS** Guarantee on Product

**30 YEARS** Linear Power Output Warranty





# SIRIUS



powered by **ELIN**

## ELNSM54M-HC-N Series

### ELECTRICAL SPECIFICATIONS

Module Type	ELNSM54M	ELNSM54M	ELNSM54M	ELNSM54M	ELNSM54M	ELNSM54M
	-HC-N-440	-HC-N-445	-HC-N-450	-HC-N-455	-HC-N-460	-HC-N-465
	STC	STC	STC	STC	STC	STC
Maximum Power (Pmax)	440	445	450	455	460	465
Maximum Power Voltage (Vmp)	33.10V	33.33V	33.52V	33.73V	33.94V	34.15V
Maximum Power Current (Imp)	13.30A	13.38A	13.44A	13.51A	13.58A	13.64A
Open Circuit Voltage (Voc)	38.99V	39.10V	39.21V	39.32V	39.42V	39.52V
Short Circuit Current (Isc)	13.69A	13.70A	13.71A	13.72A	13.73A	13.74A
Module Efficiency STC (%)	22.54%	22.83%	23.07%	23.34%	23.60%	23.85%
Power Tolerance(W)	(0, +4,99 W)					
Maximum System Voltage	1500V DC					
Maximum Series Fuse Rating	25 A					

*\* Measurement Tolerance +/- 3%  
STC: Irradiance 1000W/m2, module temperature 25°C, AM=1.5*

### TEMPERATURE CHARACTERISTICS

Pmax Temperature Coefficient	-0.29 %/°C
Voc Temperature Coefficient	-0.25 %/°C
Isc Temperature Coefficient	+0.046 %/°C
Operating Temperature	-40 ~ +85 °C
Fire Performance	Type 1

### MECHANICAL SPECIFICATIONS

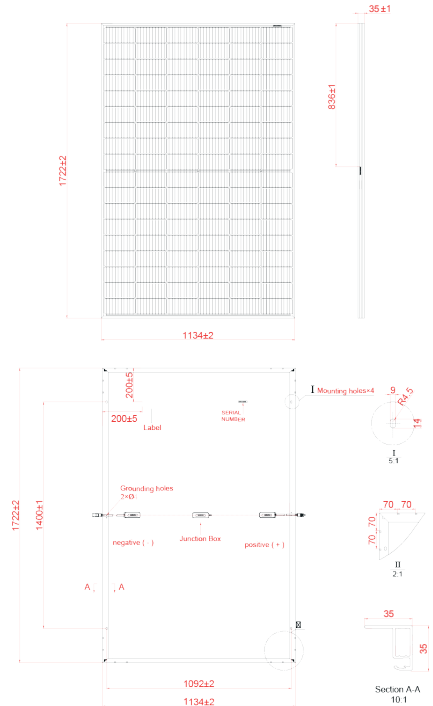
External Dimensions	1722 x 1134 x 35 mm (67.80" x 44.65" x 1.38")
Weight	21.5 kg ± 0.5 kg (47.39 lbs ± 1.10 lbs)
Solar Cells	N-Type cells (108 pcs)
Glass	3.2 mm AR coating tempered glass
Frame	Anodized aluminium alloy
Junction Box	IP68,3 diodes
Output Cables*	4.0 mm <sup>2</sup> , 1350mm(+)/1350mm(-) or customized length
Mechanical Load	Up to Front side 5400Pa / Rear side 5400Pa

\* Output cable lengths should be specified at the time of order.

### PACKING CONFIGURATION

Trucks	53ft Truck
Pieces per Pallet	31
Pallets per Trucks	29
Pieces per Trucks	899

ELIN reserves the right to change the technical specifications and design data in the catalog without prior notice.



### I-V CURVE

#### I-V Curve

