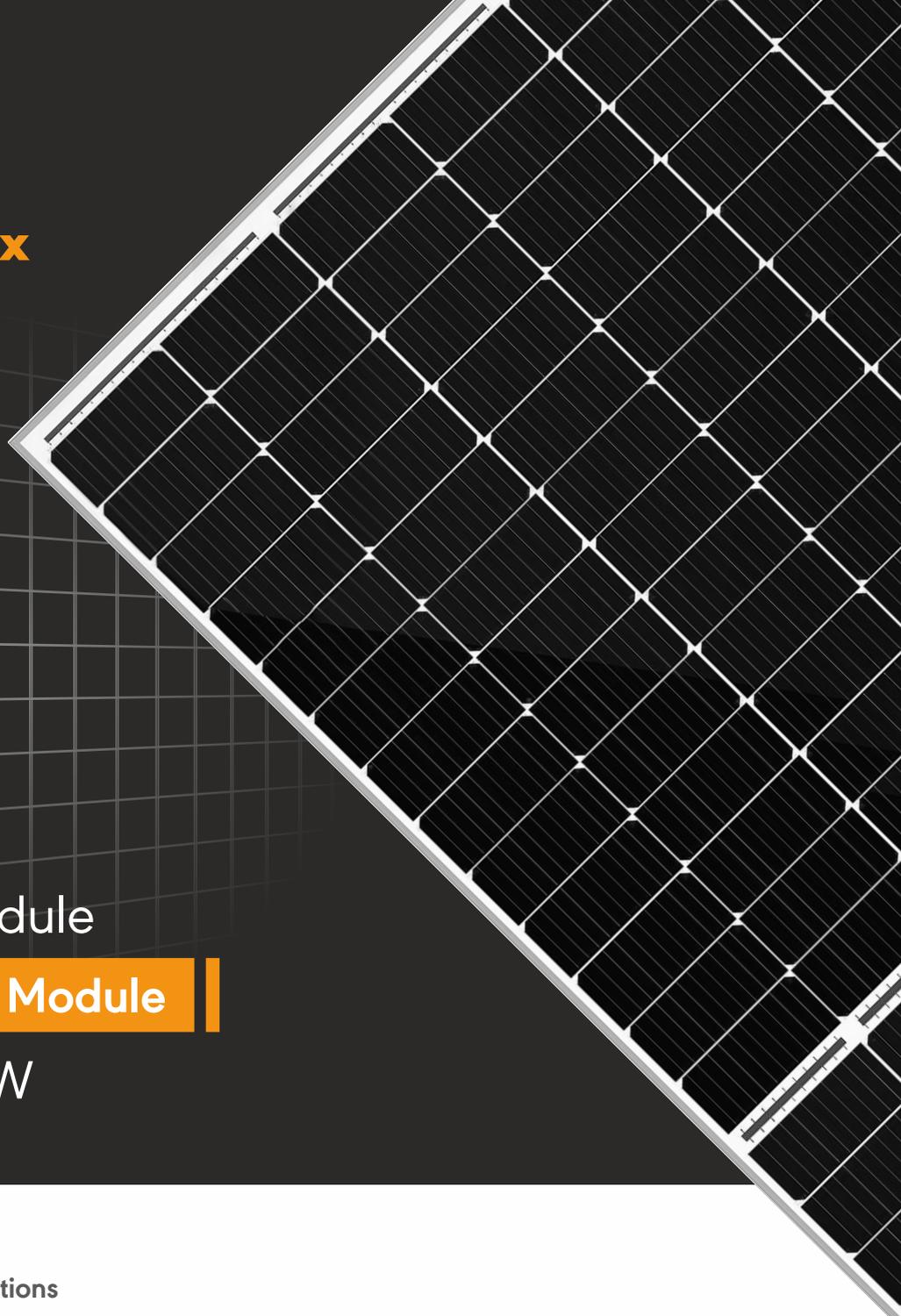


# navitas bonito<sub>max</sub>



120 Cell | 10 BB Module

**Mono PERC Half Cut Module**

NSM 435W to 455W



Ideal for large scale installations



High power



Better shading tolerance



Lower LCOE & system cost



Excellent temperature performance



Non-destructive cutting

ALMM  
Approved  
List by  
MNRE\*

Module  
Efficiency  
up to  
21.64%

Power  
Tolerance  
up to  
4.99W

25 Years  
Performance  
Warranty<sup>1</sup>

10 Years  
Product  
Warranty<sup>1</sup>

PID  
Resistant

#### Product Certifications

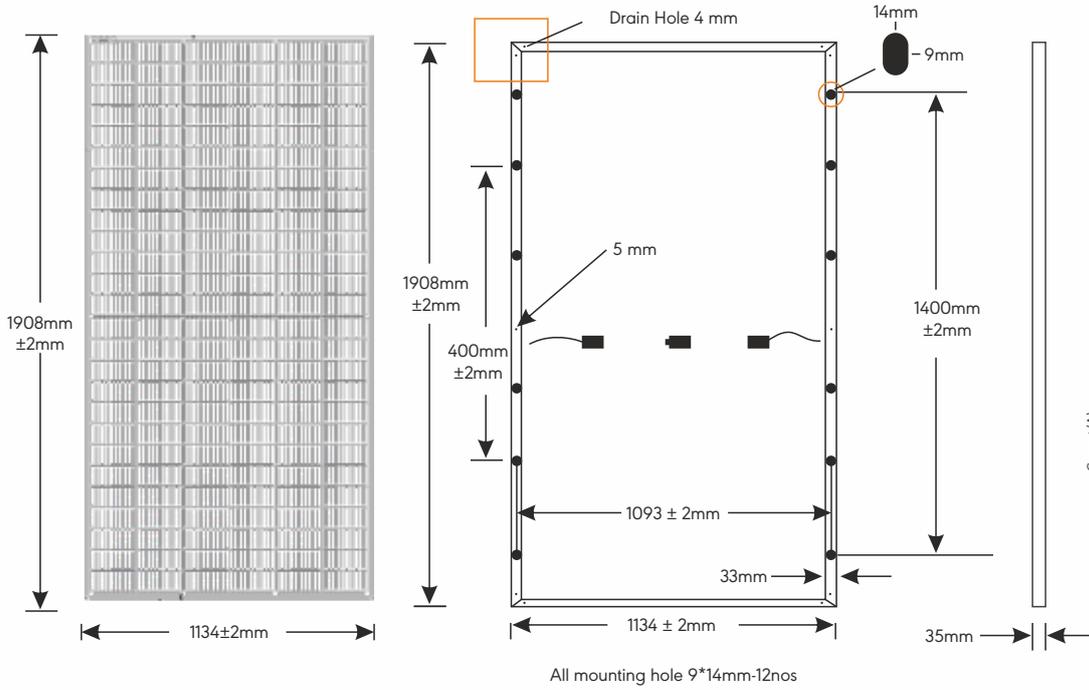
IS 14286\*, IS 61730-1 & 2\*, IS 62804\* IEC 61701\*,  
Fire Rating \*BIS\* ISO 9001, 14001, 45001

<sup>1</sup>In Process

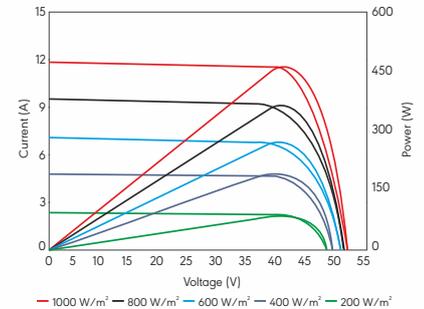
# Mechanical Dimensions



navitasolar  
conserve | sustain | flourish



I-V Curves of PV Module (for Ref)



# Electrical Data

Module Type	NSM435-120		NSM440-120		NSM445-120		NSM450-120		NSM455-120	
	STC	NOCT	STC	NOCT	STC	NOCT	STC	NOCT	STC	NOCT
Peak Power Watts (Pmax)	435	327.7	440	331.5	445	335.2	450	339	455	342.8
Maximum Power Voltage (Vmp)	34.6	32.11	34.8	32.3	34.98	32.41	35.16	32.53	35.3	32.65
Maximum Power Current (Imp)	12.61	10.21	12.69	10.26	12.73	10.34	12.78	10.42	12.88	10.5
Open-circuit voltage (Voc)	40.61	38.17	40.75	38.31	40.88	38.45	41.01	38.59	41.12	38.73
Short-circuit current (Isc) (A)	13.27	10.77	13.33	10.82	13.37	10.91	13.41	10.9	13.5	11.07
Module Efficiency STC (%)	20.1		20.33		20.56		20.79		21.02	
Operating Temperature (°C)	-40°C ~ +85°C									
Maximum System Voltage	1500 V DC (IEC)									
Maximum series fuse rating	15A									

- ▶ STC Irradiance 1000 W/m<sup>2</sup> Cell Temperature 25°C AM = 1.5
- ▶ NOCT Irradiance 800 W/m<sup>2</sup> Ambient Temperature 20°C AM = 1.5 Wind Speed = 1 m/s

# Mechanical Data

Specification	Data
Cell Type	Half cut Mono PERC
Cell Arrangement	72 Mono PERC - 120 Half cells
Dimensions	1908x1134x35 mm
Weight	24.3 Kg.
Front Cover	3.2 mm ARC Glass
Frame Material	Anodized Aluminium Alloy
Junction Box	IP68 Split JB
Cable	4 mm <sup>2</sup> (IEC) - Length 0.35 mtr (Portrait)/ 1.4 mtr (Landscape)
Connectors	MC4 Compatible
By-Pass Diodes	3 Pcs

# Temperature Characteristic

Specification	Data
Temperature Co-efficient (Pmax)	-0.36% /°C
Temperature Co-efficient (Voc)	-0.36% /°C
Temperature Co-efficient (Isc)	+0.06% /°C
Nominal Operating Cell Temperature	42 ± 2°C

# Navitas Bonito Performance Warranty

10 Years Product Warranty - 25 Years Linear Power Warranty



# Increased Shade Tolerance

## HALF-CELL MODULE

Functions like two parallel modules, enabling the **half-cell** string to work in partial shading



\*The above data is liable to change without prior notice  
 †Warranty applicable as per standard warranty terms as available on [www.navitassolar.com](http://www.navitassolar.com)