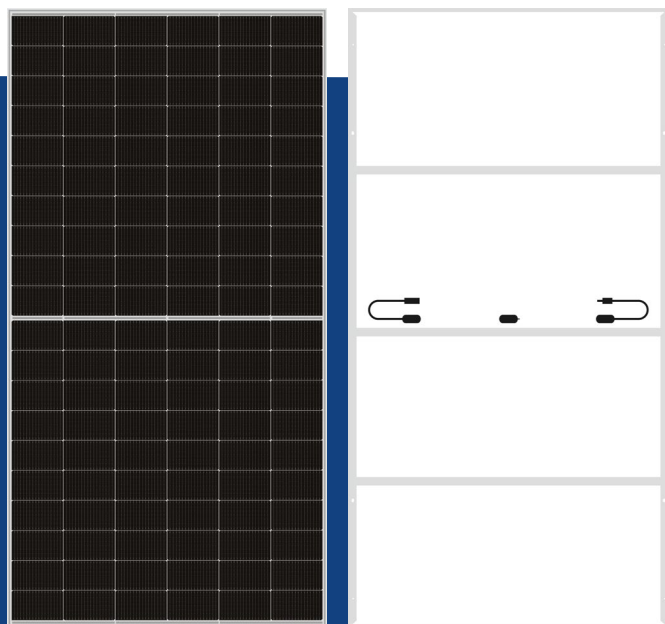




N Type



Lightweight Half-Cell Module ENE-LF120NE

495W~515W

515W
Maximum
Power Output

20.5%
Maximum
Module Efficiency

0~+5W
Power Output
Tolerance

Key Features



Lightweight

Optimized composite materials, 50% lighter at the same power



Low NMOT

As low as 43°C, improving the power generation efficiency



Customization

Customization for various scenarios, high additional value



Half Cell, SMBB Technology

Series-then-parallel cell connection design, more reliable soldering technology



Easy transportation and installation

Original design making it far less costly for transportation and installation



Superior Low Irradiance Performance

Excellent low irradiance performance, increase power generation in low-light conditions like mornings, evenings and cloudy days

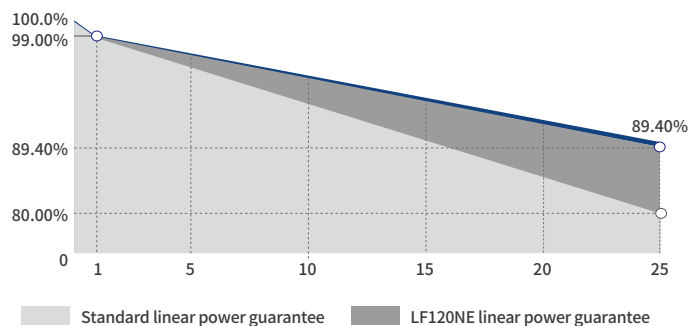
Product and Quality Certifications

IEC 61215, IEC 61730

ISO 9001: Quality Management System

ISO 14001: Environment Management System

ISO 45001: Occupational Health and Safety Management System



-1.00%

1st-year Degradation

-0.40%

Annual Degradation

12
Years

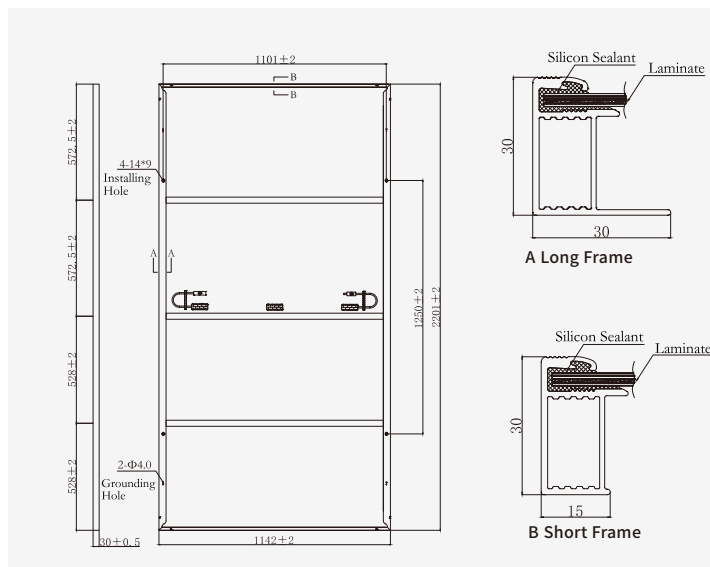
materials and
workmanship warranty

25
Years

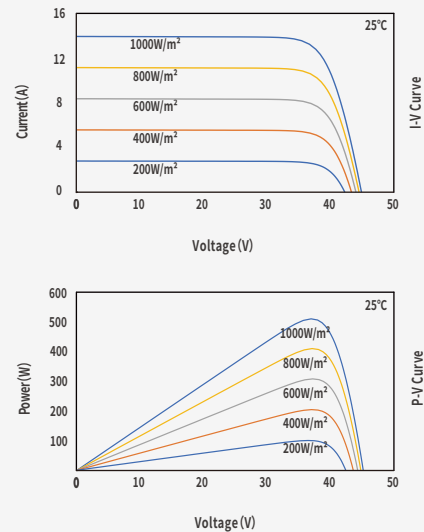
linear
power warranty

Leading product and power warranty

Engineering Drawing (mm)



Characteristic Curves(505W)



Electrical Parameters (STC *)

Nominal Max. Power(Pmax/W)	495	500	505	510	515
Open Circuit Voltage(Voc/V)	44.12	44.27	44.42	44.57	44.72
Short Circuit Current(Isc/A)	13.96	14.02	14.08	14.14	14.20
Operating Voltage(Vmp/V)	37.44	37.59	37.74	37.89	38.05
Operating Current(Imp/A)	13.22	13.30	13.38	13.46	13.54
Efficiency(%)	19.7	19.9	20.1	20.3	20.5

STC * : Irradiance = 1000 W/m², Cell Temperature = 25°C, AM = 1.5
Test condition is based on the front side

Mechanical Parameters

Cell Type	N Type
Module Size	2201×1142×30mm
Module Thickness	30mm
Module Weight	11.8Kg
Output Cable	4mm ² , cable length +300mm/-200mm (can be customized)
Connector	PV-DA02M2-XY
Junction Box	IP68, 3 bypass diodes
Frame	Anodized aluminium alloy

Electrical Parameters (NMOT *)

Nominal Max. Power(Pmax/W)	376	380	384	387	391
Open Circuit Voltage(Voc/V)	42.13	42.28	42.42	42.56	42.71
Short Circuit Current(Isc/A)	11.26	11.31	11.36	11.40	11.45
Operating Voltage(Vmp/V)	35.26	35.41	35.55	35.68	35.84
Operating Current(Imp/A)	10.66	10.73	10.79	10.86	10.92

NMOT *: Irradiance = 800 W/m², Ambient Temperature = 20°C, AM = 1.5,
Wind Speed = 1 m/s
Test condition is based on the front side

Operating Parameters

Max. System Voltage	DC1500V
Power Tolerance	0 ~ +5 W
Operating Temperature	-40°C ~ +85°C
Max. Fuse Rated Current	25A
Static Load	Snow load 2400Pa, Wind load 2400Pa

Temperature Coefficients

Short Circuit Current(Isc)	+0.045%/°C
Open Circuit Voltage(Voc)	-0.250%/°C
Nominal Max. Power(Pmax)	-0.280%/°C
NMOT	43 ± 2°C

Packing Data

Packing Type	20'GP	40'HQ
Piece/Pallet	36	36
Pallet/Container	5	20
Piece/Container	180	720



Version number :: ENE-MS-2025.04.29
All data contained in this datasheet is subject to change without notice.
The right of final interpretation belongs to ENE Solar.

