

NEOSTAR

2P+60 Dual-Glass Module

500W-520W

Technical Features:

-  Partial Shading Optimisation
-  Better Temperature Coefficient
-  High Temperature Restriction
-  Micro-crack Resistance
-  Higher Power
-  Lower BOS
-  More Aesthetic Values



red dot winner 2023



Product
Warranty



Performance
Warranty



Warranty partner

Munich RE



Made in China

520W

Output

23.5%

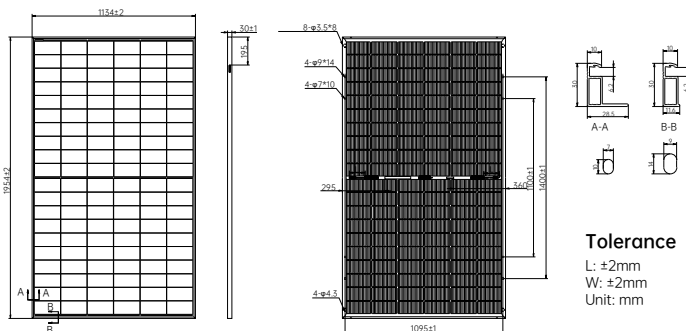
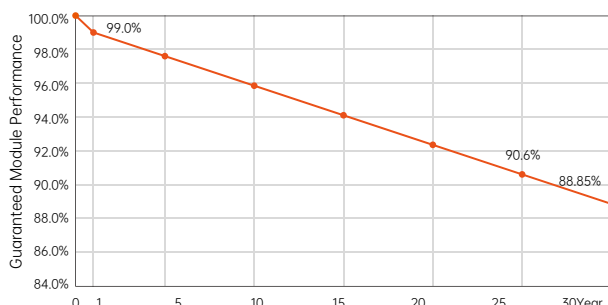
Efficiency

1%

First-year Degradation

0.35%

Annual Degradation from Year 2-30

30-year Linear Performance Warranty**Electrical Characteristics**(STC: AM1.5 1000W/m² 25°C BNPI: AM1.5, front 1000W/m², rear 135W/m², 25°C)
 $\phi V_{oc}=97\% \pm 5\%$ $\phi I_{sc}=42\% \pm 5\%$ $\phi P_{max}=39\% \pm 5\%$
 Power Binning Tolerance: 0~+3%

Module Type	AIKO-A500-MAH60Dw		AIKO-A505-MAH60Dw		AIKO-A510-MAH60Dw		AIKO-A515-MAH60Dw		AIKO-A520-MAH60Dw	
Test Conditions	STC	BNPI	STC	BNPI	STC	BNPI	STC	BNPI	STC	BNPI
P _{max} [W]	500	525	505	530	510	535	515	540	520	545
V _{oc} [V]	45.02	45.02	45.12	45.12	45.22	45.22	45.32	45.32	45.42	45.42
V _{mp} [V]	37.90	37.90	38.00	38.00	38.10	38.10	38.20	38.20	38.30	38.30
I _{sc} [A]	14.05	14.84	14.11	14.91	14.17	14.98	14.23	15.05	14.29	15.12
I _{mp} [A]	13.20	13.86	13.30	13.95	13.39	14.05	13.49	14.14	13.58	14.23
Module Efficiency	22.6%		22.8%		23.0%		23.2%		23.5%	

Electrical characteristics with different power bin

(reference to 5% & 10% backside power gain)

Backside Power Gain	5%	10%	5%	10%	5%	10%	5%	10%	5%	10%
P _{max} [W]	525	550	530	556	536	561	541	567	546	572
V _{oc} [V]	45.02	45.02	45.12	45.12	45.22	45.22	45.32	45.32	45.42	45.42
V _{mp} [V]	37.90	37.90	38.00	38.00	38.10	38.10	38.20	38.20	38.30	38.30
I _{sc} [A]	14.75	15.46	14.82	15.52	14.88	15.59	14.94	15.65	15.00	15.72
I _{mp} [A]	13.86	14.52	13.97	14.63	14.06	14.73	14.16	14.84	14.26	14.94

Product Specification

Cell Type	N-Type ABC
Glass	Dual glass, 2.0+2.0mm coated semi tempered glass
Frame	Black Anodized aluminum
Cable	4mm ² (IEC) 12AWG(UL) ±1200mm
No. of Cells	120(6*20)
Junction Box	IP68, 3 bypass diodes
Connector	PV-KST4-EVO 2A/6I/ PV-KBT4-EVO 2A/6I from Staubli ElectricalConnectors AG
Weight	26.5kg±3%
Dimension	1954*1134*30mm
Package Detail	37pcs per pallet / 185pcs per 20'GP / 888pcs per 40'HC

Temperature Ratings (STC)

Temperature Coefficient of I _{sc}	+ 0.05%/ °C
Temperature Coefficient of V _{oc}	- 0.22%/ °C
Temperature Coefficient of P _{max}	- 0.26%/ °C

Installation Guide

T ₉₈ max	70°C
Module Operation Temperature	-40°C - +85°C
Maximum Series Fuse Rating	25A
Protection Class	Class II
P _{max} and V _{oc} and I _{sc} Tolerance	±3%
Maximum System Voltage	DC1500V
Maximum Static Loading	Front 5400Pa Back 2400Pa
Hail Test	25 mm diameter hail at 23 m/s
Fire Rating	IEC Class A

