

# Solar Modules MONOCRYSTALLINE



DOUBLE-GLASS MODULE

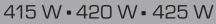
BIFACIAL HALFCUT **TECHNOLOGY** 





# Mono 54 Innovation Powerline N





- Half cell modules High efficiency, high safety, high reliability
- Highly transparent self-cleaning glass
- Bifacial cells up to 30% higher energy yield due to transparent reverse side
- N-Type cell technology
- Resistant to environmental influences: Passed salt mist & ammonia test
- Multibusbar-technology
- German warranty



EUPD RESEARCH **TOP BRAND PV** 

> MODULES GERMANY 2023

# Mono 54 - Innovation Powerline N

## Electrical data under STC (Standard Test Conditions: 1000 W/m², 25 °C, AM 1.5)

Rated power	P <sub>max</sub>	415W	420 W	425 W
Sorting limits of performance		0/+3 %	0/+3 %	0/+3 %
Voltage	U <sub>MPP</sub>	31,68 V	32,02 V	32,35 V
Open circuit voltage	U <sub>oc</sub>	38,45 V	38,48 V	38,54 V
Current	I <sub>MPP</sub>	13,10 A	13,12 A	13,14 A
Short-circuit current	I <sub>sc</sub>	13,77 A	13,78 A	13,79 A
Efficiency		21,30 %	21,50 %	21,80 %

### Temperature data

Operating temperature  Nominal operating cell temperature		- 40° C ~ + 85° C
		42° C ± 2°
Power temperature coefficient	$T_{K}(P_{MPP})$	-0.300 %/°C
Voltage temperature coefficient	$T_{\kappa}(U_{oc})$	-0.250 %/°C
Current temperature coefficient	T <sub>K</sub> (I <sub>SC</sub> )	0.045 %/°C

### Further information

Number of cells	108 N-Type bifacial monocrystalline half cells (6 x 18)	
Module dimensions	1722 x 1134 x 30 mm	
Type of Frame	Anodized aluminium alloy	
Max. system voltage	1500 V	
Reverse current loading capability	30 A	
Glass thickness	Frontside/Backside: 2.0 mm/2.0 mm	
Weight	approx. 23.7 kg	
Module connection	nnection MC4 or similar, 4.0 mm², cable length: (+) ≥ 1200 mm, (−) ≥ 1200 mm	
Junction box rating	IP68	
Allowable Hail Load	25 mm iceball with velocity of 23 m/s	
Snow load	5400 Pa - 550 kg/m <sup>2</sup>	

30-year product warranty, 30-year linear performance warranty according to our additional warranty conditions for solar power modules of the "Mono S4" product series, which we will gladly send you.

Due to the tolerance of the anti-reflective coating, colour differences in the solar modules may occur.

 $Subject\ to\ technical\ modifications\ with\ corresponding\ follow-up\ certifications.\ Errors\ excepted.\ Illustration\ similar.$ 

# Mono 54 HC V XXX BF-DG (half cell module) 1134mm Junction Box (Backside) Note: Ensure correct polarity!

### Packaging Specifications

Truck				
Dimension pallet (L/W/H)	176/114/127.5 cm			
Weight pallet	approx. 883 kg			
Modules per pallet	36			
Modules per truck	1008			

Shipment				
Dimension pallet (L/W/H)	176/114/127.5 cm			
Weight pallet	approx.883 kg			
Modules per pallet	36			
Modules per container [40' HC]	936			





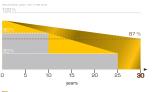








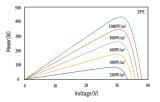




Linear performance warranty for FIRST CLASS Quality Solar Module

Linear performance warranty

Standard tiered warranty



Your specialist dealer:

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