

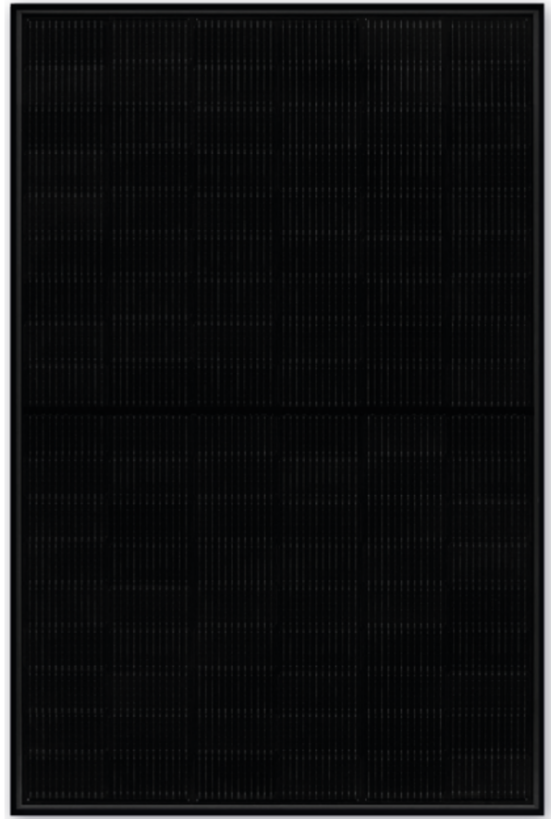
# BE SOLAIRE

Renewable Energy Technology

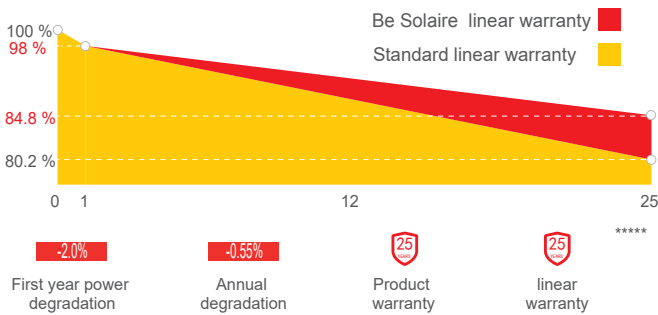
BES-108HC (Half Cell)

**400-430Watt**

MONOFACIAL MODULE



## Industry-leading Warranty based on nominal power



## Features



### High module conversion efficiency

Module efficiency up to 22.02% achieved through advanced cell technology and manufacturing process



### Extended wind and snow load tests

Module certified to withstand extreme wind (3800 Pascal) and snow loads (5400 Pascal) \*



### Excellent weak light performance

More power output in weak light condition, such as cloudy, morning and sunset



### Lower operating temperature

Lower operating temperature and temperature coefficient increases the power output



### BE SOLAIRE current sorting process

Up to 2% power loss caused by current mismatch could be diminished by current sorting technique to maximize system power output

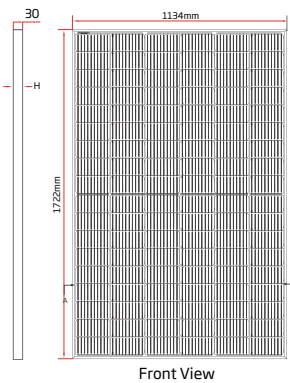


### Withstanding harsh environment

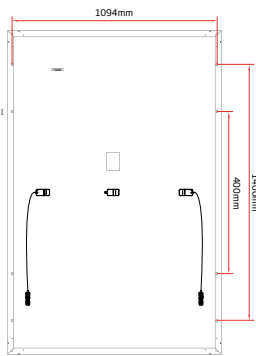
Reliable quality leads to a better sustainability even in harsh environment like desert, farm and coastline



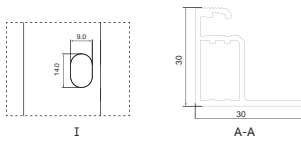
### DIMENSIONS OF PV MODULE(mm)



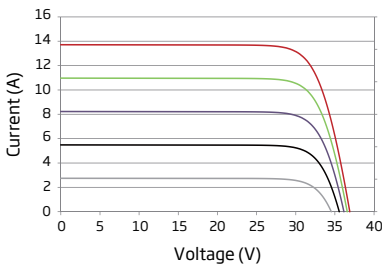
Front View



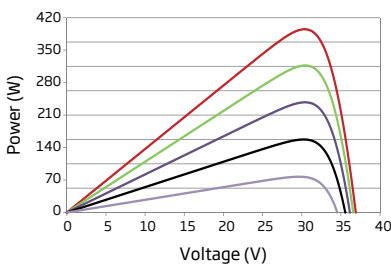
Back View



### I-V CURVES OF PV MODULE(410W)



### P-V CURVES OF PV MODULE(410W)



### ELECTRICAL DATA(STC)

Peak Power Watts- $P_{MAX}(Wp)^*$	400	405	410	415	420	425	430
Power Output Tolerance- $P_{MAX}(W)$				0~+5			
Maximum Power Voltage- $V_{MPP}(V)$	30.42	30.52	30.62	30.79	30.91	31.03	31.15
Maximum Power Current- $I_{MPP}(A)$	13.15	13.27	13.39	13.48	13.59	13.70	13.81
Open Circuit Voltage- $V_{oc}(V)$	36.98	37.06	37.14	37.31	37.43	37.51	37.59
Short Circuit Current- $I_{sc}(A)$	13.78	13.85	13.92	14.01	14.31	14.21	14.30
Module Efficiency (%)	20.48	20.74	21.00	21.25	21.51	21.76	22.02

STC: Irradiance 1000W/m<sup>2</sup>, Cell Temperature 25°C, Air Mass AM1.5  
\*Measuring tolerance: ±3%.

### ELECTRICAL PARAMETERS AT NOCT

Maximum Power- $P_{MAX}(Wp)$	298	301	305	309	312
Maximum Power Voltage- $V_{MPP}(V)$	10.47	10.55	10.62	10.69	10.76
Maximum Power Current- $I_{MPP}(A)$	28.42	28.56	28.72	28.88	29.01
Open Circuit Voltage- $V_{oc}(V)$	34.90	34.98	35.05	35.21	35.39
Short Circuit Current- $I_{sc}(A)$	11.13	11.19	11.24	11.32	11.38

NOCT: Irradiance 800 W/m<sup>2</sup>, Ambient Temperature 20°C, Wind Speed 1 m/s.

### MECHANICAL DATA

Solar Cells	Monocrystalline
Cell Orientation	108 cells (2x54)
Module Dimensions	1722 mm*1134 mm*30 mm
Weight	20.5 kg
Glass	3.2mm, High Transmission, AR Coated Heat Strengthened Glass
Backsheet	Black
Frame	30mm Anodized Aluminium Alloy
J-Box	IP68 rated, 3 diodes
Cables	Landscape: N 1400mm/P 1400mm (Opt)

\*Please refer to regional datasheet for specified connector.

### TEMPERATURE RATINGS

NOCT (Nominal operating cell temperature)	45±2 C
Temperature Coefficient of $P_{MAX}$	-0.350%/C
Temperature Coefficient of $V_{oc}$	-0.28%/C
Temperature Coefficient of $I_{sc}$	0.048%/C

(Do not connect Fuse in Combiner Box with two or more strings in parallel connection)

### MAXIMUM RATINGS

Operational Temperature	-40~+85 C
Maximum System Voltage	1000/1500VDC (IEC)
Max Series Fuse Rating	25A

### WARRANTY

- 25 year Product Warranty
- 25 year Performance Guarantee

(Please refer to product warranty for details)

### PACKAGING CONFIGURATION

- Modules per pallet: 36 pieces
- Modules per 40HQ container: 936pieces

