



# X-HALF CUT N-TYPE serie TOPCon

**420/440**<sub>Wp</sub>  
Power

**TOPCon**  
Technology Innovation

**Class1**  
Fire Reaction

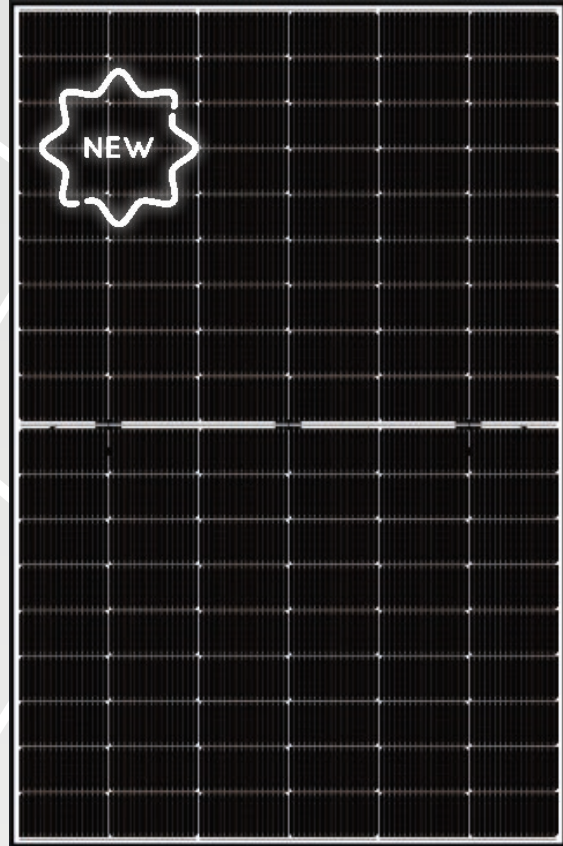
**Bifacial**  
Modules

**Double**  
Glass

**22.50%**  
Efficiency

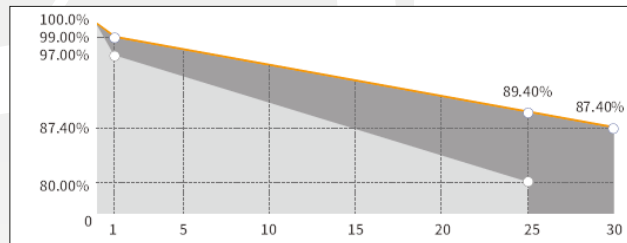
**-0.300%/°C**  
Temperatura coefficiente

**-0.40%**  
Annual degradation



X-HALF CUT N-Type serie TOPCON involves the introduction of a thin oxide layer between the metal contacts and the silicon wafer, which brings significant improvements in cell conversion efficiency and power generation performance.

### LINEAR WARRANTY



- look warranty terms -

**25** years  
Product warranty

**30** years  
Linear warranty

CORRESPOND TO

| UNI9177 | PV CYCLE | CE |

UNI EN ISO 9001:2008

| Quality management system

UNI EN ISO 14001:2004

| Standards for environmental management system

UNI EN BS OHSAS 18001:2007

| International standards for occupational health and safety

ELECTRICAL DATA (STC)		XMHC420BFDGKL- BW+H	XMHC425BFDGKL- BW+H	XMHC430BFDGKL- BW+H	XMHC435BFDGKL- BW+H	XMHC440BFDGKL- BW+H
Open circuit Voltage	(Voc)	38.48 V	38.54 V	38.60 V	38.72 V	39.10 V
Voltage a Pmax.	(Vmp)	32.02 V	32.35 V	32.68 V	33.01 V	33.34 V
Short-circuit current	(Isc)	13.78 A	13.79 A	13.80 A	13.89 A	13.98 A
Current at Pmax.	(Imp)	13.12 A	13.14 A	13.16 A	13.18 A	13.20 A
Nominal Peak Power (Pmax)		420 Wp	425 Wp	430 Wp	435 Wp	440 Wp
Module Efficiency		21.50%	21.80%	22.00%	22.30%	22.50%
Power output tolerance		0 ~ 3%				
Maximum voltage		1500 V				
Maximum series fuse rating		30 A				
Operating Temperature		- 40°C ~ 85°C				

\* STC (Standard test conditions)

Tolerance electric measurement ±3%

Irradiance 1000 w/m<sup>2</sup>, temperature 25°C, AM= 1.5

#### BACKSIDE POWER GAIN (FOR 430W)

Power Gain	3%	10%	15%	20%	25%	30%
Nominal Max. Power (Pmax/W)	442.9	473.0	494.5	516.0	537.5	559.0
Open Circuit Voltage (Voc/V)	38.60	38.60	38.60	38.70	38.70	38.70
Short Circuit Current( Isc/A)	14.60	15.18	15.87	16.56	17.25	17.94
Operating Voltage (Vmp/V)	32.68	32.68	32.68	32.78	32.78	32.78
Operating Current (Imp/A)	13.92	14.47	15.13	15.74	16.40	17.05

#### TEMPERATURE COEFFICIENT

NOCT	<b>42°C±2°C</b>
Pmax Temperature Coefficient	<b>-0.300%/ °C</b>
Voc Temperature Coefficient	<b>-0.250%/ °C</b>
Isc Temperature Coefficient	<b>0.045% / °C</b>

#### MECHANICAL CHARACTERISTIC

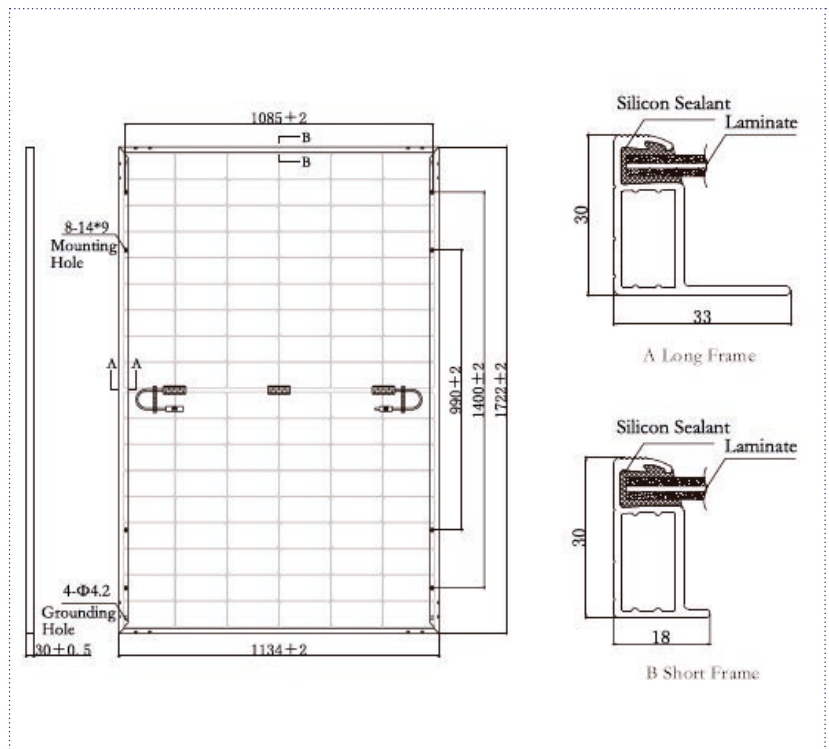
Maximum Load	<b>5400 Pa / 2400 Pa</b>
Dimensions (mm)	<b>1722 x 1134 x 30</b>
Weight (Kg)	<b>20.5</b>
Solar cells type	<b>N type Mono</b>
No. solar cells	<b>108</b>

#### PACKING CONFIGURATION

Module per Pallet	<b>36 pcs.</b>
Modules per container 40'HQ	<b>936 pcs.</b>

#### GENERAL INFORMATION

Glass	<b>1.6+1.6 mm high transmission, double glass</b>
Frame	<b>Anodized aluminum alloy</b>
Juntion Box	<b>IP68, 3 Bypass diodes</b>
Output Cable	<b>4.0mm<sup>2</sup> cable length 1200mm</b>



Sunerg Solar S.r.l. reserves the right to make changes to the technical data of the product without prior notice.

The technical details of the form, although included with the utmost care, may contain errors or inaccuracies not attributable to Sunerg Solar S.r.l.