

OR10H595MNDB

OR Series – 595 W

144 cells

MONO M10 HALF | N-TYPE



Extra-EU module

Manufactured in **our production factory**



TOPCon bifacial technology



Anti-reflective double glass

Maximum efficiency and high performance



Compact and sturdy frame

Anchorable also on the short side ⁽⁵⁾



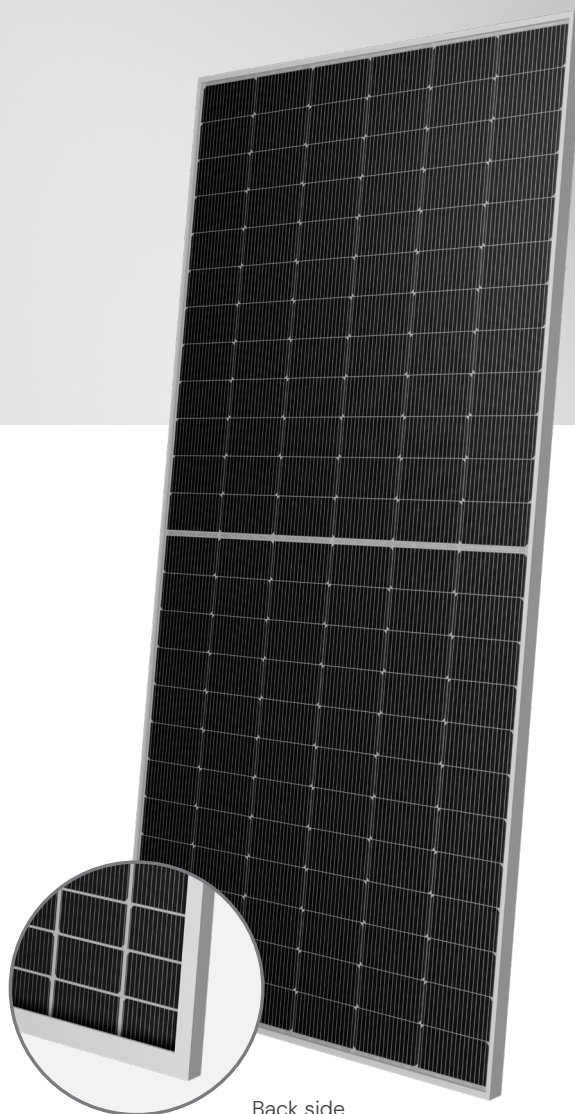
Class of reaction to fire

Class 1 (UNI 9177),
B-s1, d0 (EN 13501-1)
B_{ROOF}(t1) (EN 13501-5)



RoHS compliance

(Restriction of Hazardous Substances Directive 2011/65/UE)



Back side



30 years

Linear power warranty

25 years

Product warranty



QBE insurance

QBE Product Liability Insurance

QBE is a global leader in the insurance sector, offering comprehensive solutions for business risk management. With a worldwide network, it protects clients against a wide range of risks and provides flexible insurance solutions tailored to various industries, including the energy sector.

Electrical Characteristics (STC) ⁽¹⁾

Nominal Output (Pmax) ⁽²⁾	595 W
Sorting Tolerance	0/+5 W
Voltage at Pmax (Vmp)	44,48 V
Current at Pmax (Imp)	13,38 A
Open Circuit Voltage (Voc) ⁽²⁾	53,12 V
Short Circuit Current (Isc) ⁽²⁾	14,13 A
Maximum System Voltage	1500 V
Maximum Series Fuse Rating	30 A
Module Efficiency	23,03%
Protection class against electric shock	Class II

1. STC: (Standard Test Condition) Irradiance 1000 W/m²; Module Temperature 25 °C; Air Mass 1,5

2. Pmax, Voc, Isc measurement tolerance: ±3%

Electrical Characteristics with rear side power gain

Pmax gain	5%	10%	15%	20%	25%
Nominal Output (Pmax)	625 W	655 W	684 W	714 W	744 W
Voltage at Pmax (Vmp)	44,48 V	44,48 V	44,48 V	44,48 V	44,48 V
Current at Pmax (Imp)	14,05 A	14,72 A	15,39 A	16,06 A	16,73 A
Open Circuit Voltage (Voc)	53,12 V	53,12 V	53,12 V	53,12 V	53,12 V
Short Circuit Current (Isc)	14,84 A	15,54 A	16,25 A	16,96 A	17,66 A

Mechanical Characteristics

Solar Cells	144 M10 HALF monocrystalline N-TYPE
Solar Cells Size	182 x 91 mm / 7,16 x 3,58"
Front Cover	2.0 mm / 0.08" thick, low iron tempered glass
Back Cover	2.0 mm / 0.08" thick, low iron tempered glass
Encapsulant	EVA / POE
Frame	Anodized aluminium alloy, double wall
Frame finishing	Silver
Diodes	3 Bypass diodes
Junction Box	IP68 rated
Connector	MC4 or compatible connector
Cables Lenght	1400 mm / 55,12"
Cables Section	4,0 mm² / 0,006 in²
Dimensions	2278 x 1134 x 30 mm / 89,69 x 44,65 x 1,18"
Weight	30 kg / 66,14 lbs
Max Load (Test Load) - SF	5400 Pa - 1,5 ⁽⁵⁾

5. Consult the installation manual for the relative mounting configurations

Temperature Characteristics

NMOT ⁽³⁾	43±2 °C
Temperature Coefficient of Pmax	-0,29 %/°C
Temperature Coefficient of Voc	-0,25 %/°C
Temperature Coefficient of Isc	0,046 %/°C
Operating Temperature	-40 °C ~ +85 °C

3. NMOT: Nominal Module Operating Temperature: Irradiance 800 W/m²; Air 20 °C; Wind speed 1 m/s

Packaging ⁽⁴⁾

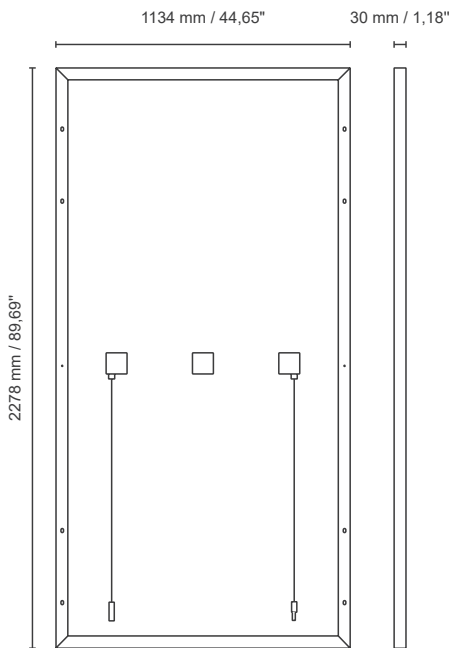
Pallet dimensions	Pieces per pallet - Weight
2300 x 1130 x 1265 mm / 90,6 x 44,5 x 49,8"	36 pcs - 1113 kg / 2453,75 lbs
2300 x 1130 x 1265 mm / 90,6 x 44,5 x 49,8"	37 pcs - 1144 kg / 2522,08 lbs

4. Pallets can be stacked up to two

Certifications

Reaction to fire	Class 1 (UNI 9177), B-s1, d0 (EN 13501-1), B _{ROOF} (t1) (EN 13501-5)
Product Certificate	IEC 61215-1, IEC 61215-1-1, IEC 61215-2, IEC 61730-1, IEC 61730-2
RoHS - Directive 2011/65/EU	EN 62321

Dimensions



Current/Voltage Characteristics

