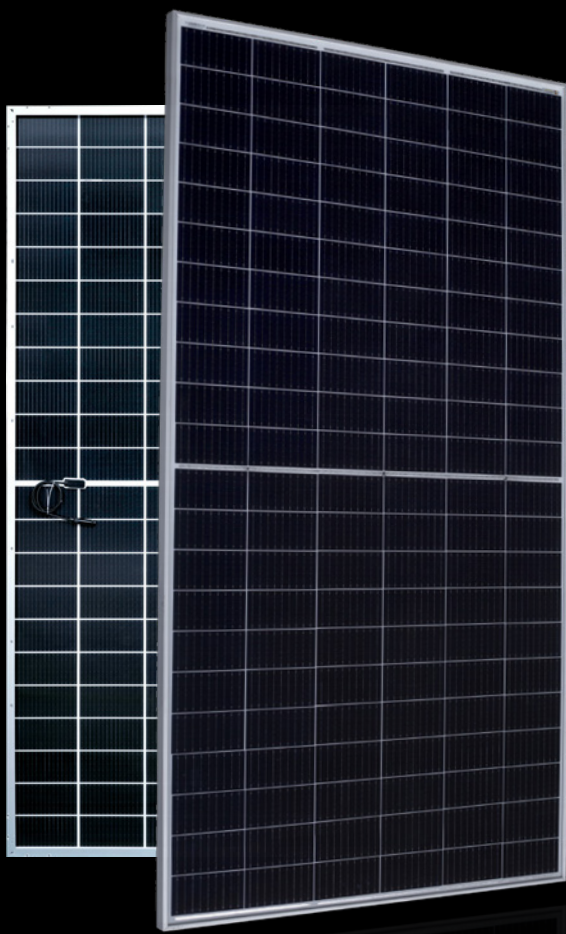


AESOLAR

since 2003



COMET

enrich your energy yield

30
years
Performance
Guarantee

15
years
Product
Guarantee

680W-700W

AE TME-132BDS Series

SILICON HETEROJUNCTION PV MODULES
HALF-CUT CELLS • BIFACIAL • DOUBLE-GLASS

www.ae-solar.com

132

HALF
CELLS

**210
mm**

CELL
SIZE



LID
RESISTANT



PID
RESISTANT



SALT CORROSION
RESISTANT



SAND
RESISTANT



AMMONIA
RESISTANT

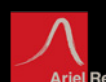


HIGHLY STABLE
AND TOUGH



IEC 61215
IEC 61730
Regular Production Surveillance
Type Tested and Monitored

IEC 62716 (Ammonia corrosion)
IEC 61701 (Salt mist corrosion)
IEC 60068 (Sand and dust)
IEC 62804 (PID resistance)



AE TME-132BDS Series 680W-700W



SILICON HETEROJUNCTION PV MODULES
 HALF-CUT CELLS • BIFACIAL • DOUBLE-GLASS

Mechanical and design specification

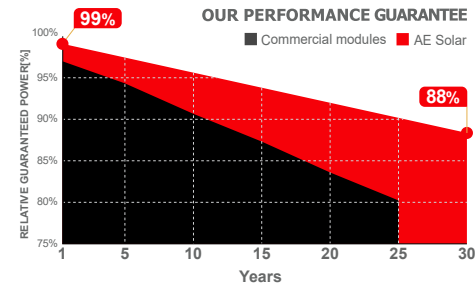
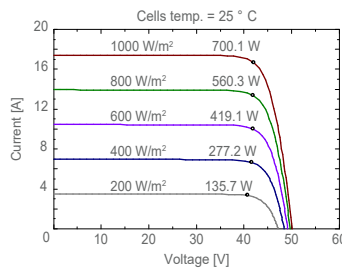
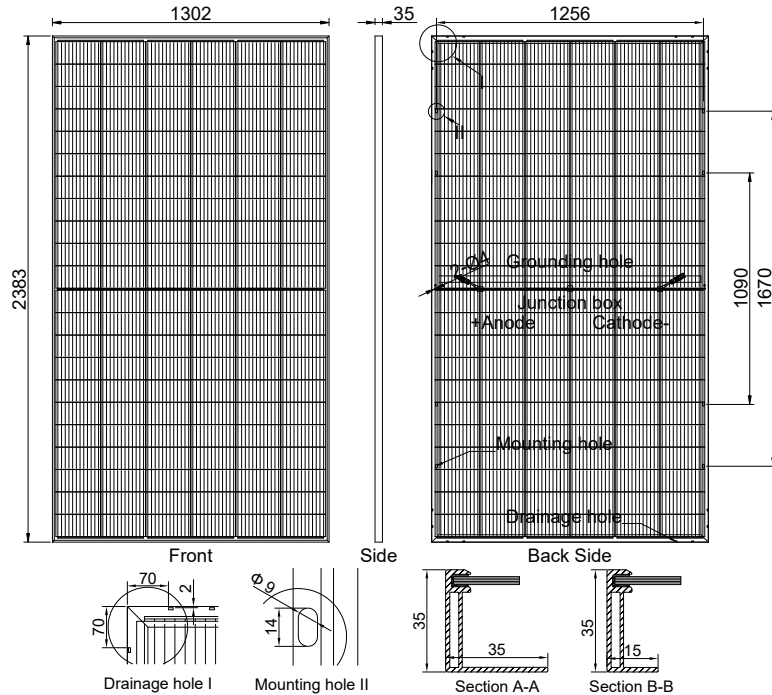
| | |
|-----------------|---|
| Cell type | Silicon Heterojunction Technology, Half-cut cells, 210 mm |
| No. of cells | 132 |
| Bifaciality | 80±5% |
| Glass | 2.0 mm, high transmission, AR coated, tempered |
| Encapsulation | POE |
| Back cover | 2.0 mm white glazed glass, tempered |
| Junction box | IP68 rated, 3 Bypass Diodes |
| Frame | 35 mm anodized Aluminium alloy |
| Cable | 1 x 4 mm ² , 200 mm length or customized |
| Connectors | MC 4 / MC 4 compatible |
| Dimension | 2383 mm x 1302 mm x 35 mm |
| Weight | 38.5 kg |
| Hail resistance | Max. Ø 25 mm at 23 m/s |
| Wind load | 2400 Pa/ 244 kg/ m ² |
| Mechanical load | 5400 Pa/ 550 kg/ m ² |

Packaging information

| | |
|-------------------------|---------------------------------------|
| Packaging configuration | 31 pcs / pallet |
| Loading capacity | 558 pcs / 40 HQ |
| Size / Pallet | 1350 mm x 1145 mm x 2500 mm (upright) |
| Weight | 1332 kg / pallet |

Temperature ratings

| | |
|---|------------|
| Operating temperature (°C) | -40 to +85 |
| Temp.coefficient of P _{max} (%/°C) | -0.26 |
| Temp.coefficient of V _{oc} (%/°C) | -0.24 |
| Temp.coefficient of I _{sc} (%/°C) | 0.04 |
| Nom. operating temp. NOCT (°C) | 44 ± 2 |



Electrical specifications (STC*): AE680TME-132BDS AE685TME-132BDS AE690TME-132BDS AE695TME-132BDS AE700TME-132BDS

| | AE680TME-132BDS | AE685TME-132BDS | AE690TME-132BDS | AE695TME-132BDS | AE700TME-132BDS | |
|----------------------------|-----------------------|-----------------|-----------------|-----------------|-----------------|-------|
| Nominal Max. Power | P _{max} (Wp) | 680 | 685 | 690 | 695 | 700 |
| Maximum operating voltage | V _{MPP} (V) | 41.49 | 41.65 | 41.80 | 41.95 | 42.10 |
| Maximum operating current | I _{MPP} (A) | 16.39 | 16.45 | 16.51 | 16.57 | 16.63 |
| Open-circuit voltage | V _{oc} (V) | 49.50 | 49.66 | 49.82 | 49.98 | 50.13 |
| Short-circuit current | I _{sc} (A) | 17.19 | 17.25 | 17.31 | 17.37 | 17.43 |
| Module efficiency | η (%) | 21.92 | 22.08 | 22.24 | 22.40 | 22.56 |
| Power tolerance | (W) | | | 0~+5 | | |
| Maximum system Voltage | (V) | | | 1500 | | |
| Maximum series fuse rating | (A) | | | 35 | | |

*STC: Standard test conditions (Irradiance 1000 W/m², Cell temperature 25°C and air mass of AM1.5)

Electrical specifications (NMOT*): AE680TME-132BDS AE685TME-132BDS AE690TME-132BDS AE695TME-132BDS AE700TME-132BDS

| | AE680TME-132BDS | AE685TME-132BDS | AE690TME-132BDS | AE695TME-132BDS | AE700TME-132BDS | |
|---------------------------|-----------------------|-----------------|-----------------|-----------------|-----------------|-------|
| Nominal Max. Power | P _{max} (Wp) | 510 | 513 | 517 | 521 | 525 |
| Maximum operating voltage | V _{MPP} (V) | 38.90 | 39.04 | 39.18 | 39.32 | 39.46 |
| Maximum operating current | I _{MPP} (A) | 13.11 | 13.16 | 13.21 | 13.26 | 13.30 |
| Open-circuit voltage | V _{oc} (V) | 46.36 | 46.54 | 46.71 | 46.89 | 47.06 |
| Short-circuit current | I _{sc} (A) | 13.75 | 13.80 | 13.85 | 13.90 | 13.94 |

*NMOT: Normal Module Operating Temperature (Irradiance 800 W/m², Ambient temperature 20°C, air mass of AM1.5 and wind speed of 1 m/s)

The specifications and characteristics contained in this datasheet may deviate slightly from our actual products due to the product developments and uncertainty of measurement devices. The specifications included in the datasheet are subject to change without prior notice.

