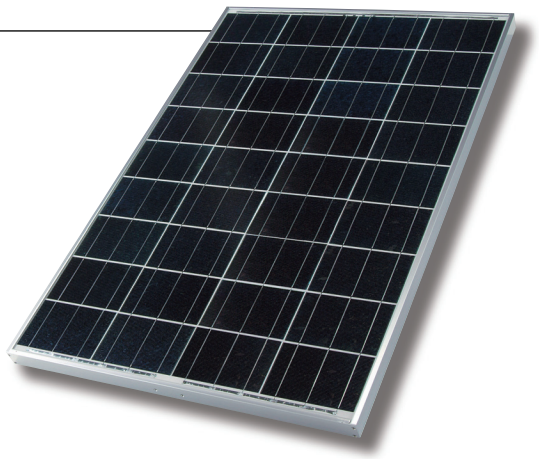
THE NEW VALUE FRONTIER

KYOCERA

KC85T

HIGH EFFICIENCY MULTICRYSTAL PHOTOVOLTAIC MODULE



MODEL
KC85T

HIGHLIGHTS OF KYOCERA PHOTOVOLTAIC MODULES

Kyocera's advanced cell processing technology and automated production facilities produce a highly efficient multicrystal photovoltaic module.
The conversion efficiency of the Kyocera solar cell is over 16%.
These cells are encapsulated between a tempered glass cover and a pottant with back sheet to provide efficient protection from the severest environmental conditions.
The entire laminate is installed in an anodized aluminum frame to provide structural strength and ease of installation.

APPLICATIONS

- Microwave / Radio repeater stations
- Electrification of villages in remote areas
- Medical facilities in rural areas
- Power source for summer vacation homes
- Emergency communication systems
- Water quality and environmental data monitoring systems
- Navigation lighthouses, and ocean buoys
- Pumping systems for irrigation, rural water supplies and livestock watering
- Aviation obstruction lights
- Cathodic protection systems
- Desalination systems
- Recreational vehicles
- Railroad signals
- Sailboat charging systems
- etc.

QUALIFICATIONS

- **MODULE** : UL1703 certified
  Hazardous Locations Class Ⅰ, Div 2, Groups A, B, C and D
- **FACTORY** : ISO9001 and ISO 14001

QUALITY ASSURANCE

Kyocera multicrystal photovoltaic modules have passed the following tests.

- Thermal cycling test
- Thermal shock test
- Thermal / Freezing and high humidity cycling test
- Electrical isolation test
- Hail impact test
- Mechanical, wind and twist loading test
- Salt mist test
- Light and water-exposure test
- Field exposure test

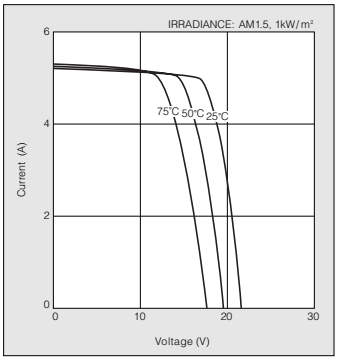
LIMITED WARRANTY

※1 year limited warranty on material and workmanship
※20 years limited warranty on power output: For detail, please refer to "category IV" in Warranty issued by Kyocera

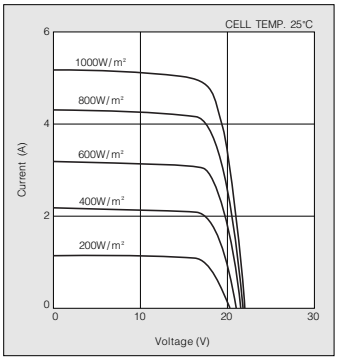
(Long term output warranty shall warrant if PV Module(s) exhibits power output of less than 90% of the original minimum rated power specified at the time of sale within 10 years and less than 80% within 20 years after the date of sale to the Customer. The power output values shall be those measured under Kyocera's standard measurement conditions. Regarding the warranty conditions in detail, please refer to Warranty issued by Kyocera)

ELECTRICAL CHARACTERISTICS

Current-Voltage characteristics of Photovoltaic Module KC85T at various cell temperatures

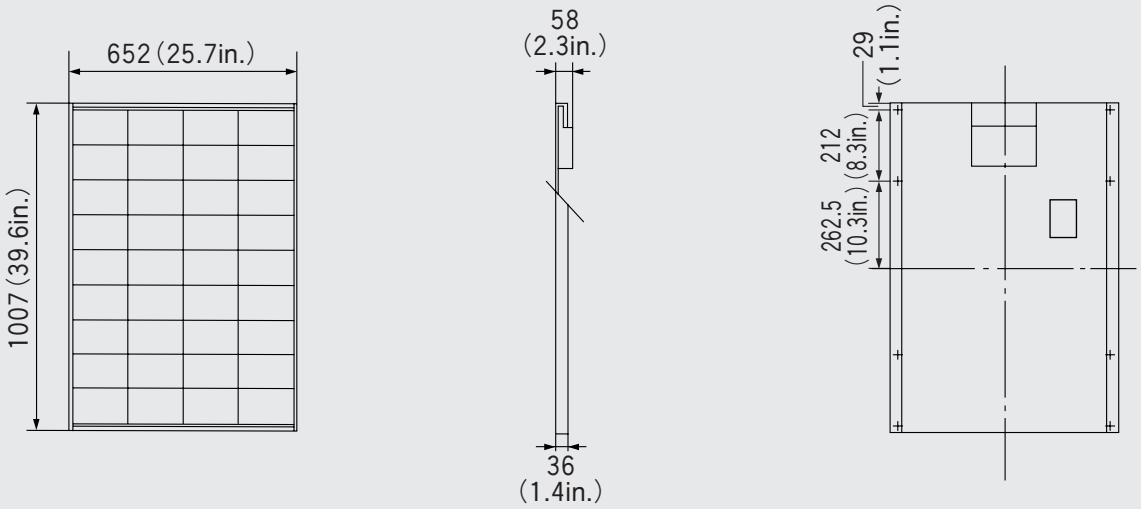


Current-Voltage characteristics of Photovoltaic Module KC85T at various irradiance levels



Physical Specifications

Unit : mm (in.)



Specifications

Electrical Performance under Standard Test Conditions (*STC)	
Maximum Power (Pmax)	87W (+10%/−5%)
Maximum Power Voltage (Vmpp)	17.4V
Maximum Power Current (Impp)	5.02A
Open Circuit Voltage (Voc)	21.7V
Short Circuit Current (Isc)	5.34A
Max System Voltage	600V
Temperature Coefficient of Voc	-8.21×10^{-2} V/℃
Temperature Coefficient of Isc	2.12×10^{-3} A/℃

*STC : Irradiance 1000W/m², AM1.5 spectrum, module temperture 25℃

Electrical Performance at 800W/m², NOCT, AM1.5	
Maximum Power (Pmax)	62W
Maximum Power Voltage (Vmpp)	15.3V
Maximum Power Current (Impp)	4.06A
Open Circuit Voltage (Voc)	19.7V
Short Circuit Current (Isc)	4.31A

NOCT (Nominal Operating Cell Temperature) : 47℃

Cells	
Number per Module	36

Module Characteristics	
Length × Width × Depth	1007mm(39.6in)×652mm(25.7in)×58mm(2.3in)
Weight	8.3kg(18.3lbs.)

Junction Box Characteristics	
Length × Width × Depth	170.6mm(6.7in)×191.6mm(7.5in)×51.5mm(2.0in)
IP Code	IP65

Reduction of Efficiency under Low Irradiance	
Reduction	6.1%

Reduction of efficiency from an irrandiance of 1000W/m² to 200W/m² (module temperature 25℃)

Please contact our office for further information

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