



I-V Checker

Photovoltaic Module & Array Tester

- Measurement range up to 1000V
- Applicable for 10W PV modules to 10kW PV system arrays
- Failure diagnostic functions built in
- Solar irradiance sensor unit is detachable for remote measurements
- LCD display, built in keyboard, and diagnostic functions allow stand alone operation
- Extended analysis software package for operation with a PC included

MP-170 is a state-of-the-art instrument to measure I-V curve characteristics to evaluate the performance of PV modules and systems. Especially designed to measure 10W PV modules to 10kW PV systems, the MP-170 has a measurement range of up to 1000V making it well suited for larger voltage PV arrays.

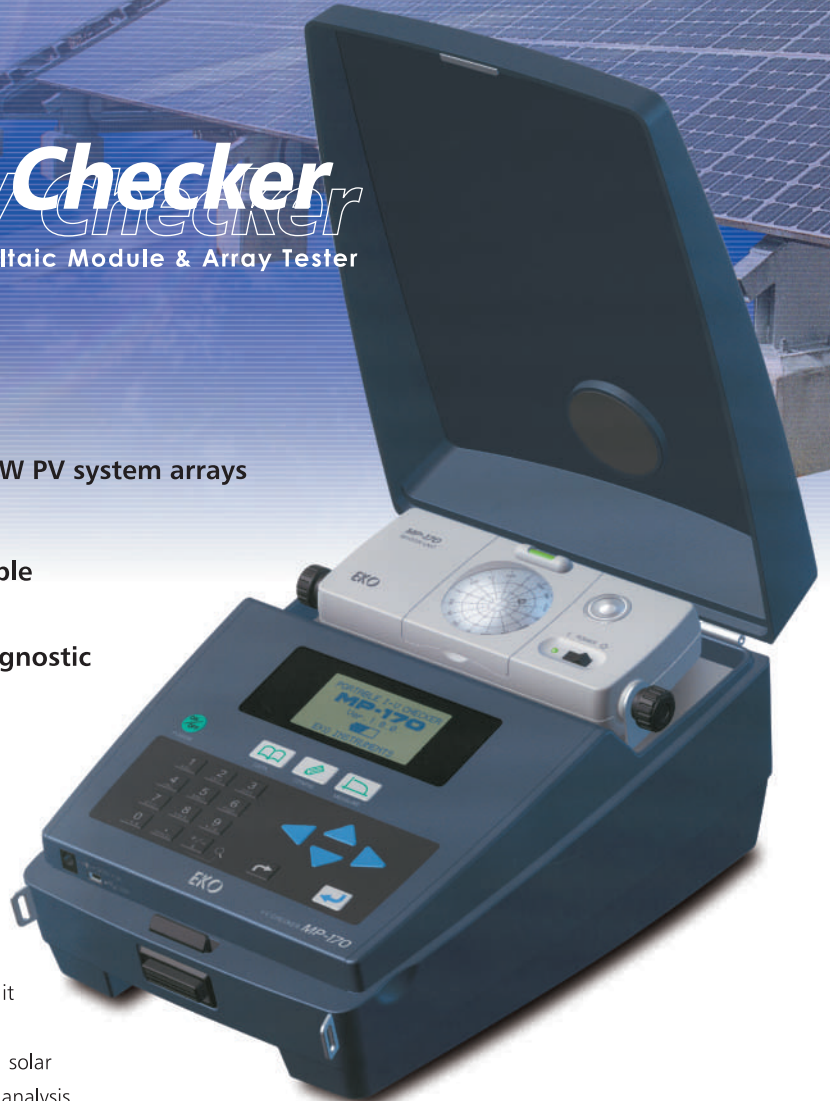
It is very cost effective, compact, portable and includes a solar irradiance sensor, two temperature sensors, and failure analysis functions.

The Sensor Unit is equipped with a pyranometer with a silicon detector and comes with a calibration certificate. Solar irradiance and temperatures can be measured remotely. Coupled with its internal capabilities to display the differential coefficient and magnification of the I-V curve, the MP-170 is very effective for failure diagnosis of the PV array.

With a built in keyboard, LCD, and functional diagnostics, the MP-170 can be operated without a PC.

I-V curves as well as various data such like Voc, Isc, Pm, STC conversion values, and data for failure diagnosis, displayed on the LCD, make it very convenient for on-site performance measurements. A maximum of 300 I-V curves with corresponding solar and temperature data can be stored in its internal memory.

The MP-170 can also be operated with a PC. The enhanced measurement and analysis software package for PC operation works with Windows 2000/XP and it has functions of text data saving, graphical representation, auto continuous measurement, as well as additional analysis capabilities.



Specifications

Measurement range	Voltage: 10V - 1000V
	Current: 1A - 20A
	Power: 10W - 10kW
Data points	400 points / I-V curve
Data storage	300 IV curves (Internal Memory)
Input	Tester: PV module/array x 1(2 cables to PV string)
	Sensor Unit: Pyranometer or reference cell, Thermocouple x 2
Interface	USB x 1(PC), RS-485 x 1(Sensor Unit)
Measurement parameters	I-V curve, Pm, Isc, Voc, FF, Ipm, Vpm
	Solar irradiance, Temperature x 2
	STC conversion, Differential coefficient of I-V curve
Dimensions	Tester:W:230mm x L:300mm x H:160mm
	Sensor Unit:W:210mm x L:85mm x H:55mm
Weight	Tester:3.0kg, Sensor Unit:0.48kg, Battery Box:0.75kg
Power supply	Tester: D size battery x 4 or AC adapter DC9V, 1.3A
	Sensor Unit: 006P type battery x 1 (9V)
PC Operating system	Windows 2000/XP