



INVOLAR

Micro-Inverters

MAC250A-230-VDE



Longer Lifetime and Reliability (double lifetime)
No single-point failure with system availability of 99%

Maximised Energy Harvest (+25%)
Reduced power loss with Shade, Dust or Debris

Quick Design and Plug and Play Installation (-40% cost)
Improved safety no dangerous DC cabling
No indoor bulky and noisy inverter unit

Internet 24h smart monitoring for each PV module

The INVOLAR MAC250 Micro-Inverter offers the latest technology in power inverters, it enables improved solar energy harvest, has increased reliability, greatly simplified installation with up to 40% reduction on installation costs and smart online power management system.

Each INVOLAR Micro-Inverter is individually connected to one PV module in the solar panel array. In the event of single panel failure the remaining micro-inverters continue to produce power.

By performing Maximum Power Point Tracking (MPPT) at the PV module level, INVOLAR Micro-Inverter minimizes the effects of shading, debris, snow, slight panel orientation differences and mismatches or PV module aging, thus improving the system's energy harvest and customer income by up to 25% over the system lifetime.

Technical Specifications

Model		MAC250A-230-VDE
Input Data (DC)		
Maximum DC Power		250W
Maximum DC Voltage		50V
MPPT Voltage Range		24V~40V
Maximum DC Current		10.4A
Output Data (AC)		
Rated AC Power @ 25°C		235W
Rated AC Current		1.02A
AC voltage Range		230V/184V~265V (*See Appendix below)
AC frequency Range		50Hz/47.5Hz~50.2Hz (*See Appendix below)
Power Factor		>0.99
Current THD		<3%
DC/AC Power's Temperature Coefficient		-0.5%/°C
Maximum Units Per Branch		15
Efficiency		
Peak Inverter Efficiency		95.0%
CEC Weighted Efficiency		94.0%
Nighttime Power Consumption		<100mW
Mechanical Data		
Enclosure Environmental Rating		Outdoor - IP65
Operating Temperature Range		-40°C~+65 °C
Dimensions (WxHxD)		230mmX138mmX35mm
Weight		2.4kg
Features		
Communication		PLCC
Compliance		VDE126-1-1 CE
Warranty		15 Years
Appendix- *Adjustments to suit the following Countries.		
Austria		Greece
Belgium		Luxembourg
Bulgaria		Poland
Croatia		Portugal
Czech Republic		Netherlands
France		Romania
Germany		Switzerland

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