

SI-ECO Series (1000 W)

Pure Sine Wave Inverters



- True sine wave output (THD<2%)
- Power ON-OFF remote control
- Fully isolated input & output
- Load controlled cooling fan
- Advanced microprocessor
- 50/60 Hz switch selectable output frequency
- Input reverse polarity/under voltage/over voltage protections
- Output short-circuit/overload/over temperature protections
- Tri-color indicators display output load level & failure status
- Type of protection: IP20
- Automatic re-start in case of overload: Every 60 s approx.

This inverter converts DC energy from solar modules into clean, stable AC power that is ideal for power demanding appliances. Phocos inverters are designed for high efficiency: Integrated advanced microprocessor technology combined with pure sine wave output makes them the perfect choice for use with high-end electronics and electrical equipment. Thanks to their low weight and long

lifespan, the SI-ECO series inverters are also ideal for mobile and outdoor applications (e.g. RVs, cars and also industrial applications). As a special, high performance benefit the THD (total harmonic distortion) of Phocos' true sine wave inverters is below 2%, thus providing superior efficiency. Overload, short-circuit, DC over/under voltage and overheating protection are standard on all models.

SI-ECO Series (1000 W)

Pure Sine Wave Inverters

Type	SI-ECO-1000					
	-112	-124	-148	-212	-224	-248
AC voltage	100/110/120 VAC			220/230/240 VAC		
Rated power	1000 W					
Surge power	2000 W					
Waveform	True sine wave (THD <2%)					
Frequency	50/60 Hz \pm 0.5 Hz selectable by DIP switch					
AC regulation	\pm 5%					
Standard receptacles	Optional (H for Brazil)					
USB output port	5 V, 1 A					
LED indicator	A: Output load level: <20%-off, between 20% and 50% -green, <90%-orange, >90%-red; B: Green for power on, red for protection/failure					
Sleeping mode setting (DIP switch)	S4-frequency 50/60Hz, S3-15% output load, S2-10% output load, S1-5% load setting					
No load current draw	< 0.6 A	< 0.5 A	< 0.25 A	< 0.9 A	< 0.6 A	< 0.25 A
DC voltage	12 V	24 V	48 V	12 V	24 V	48 V
Voltage range (VDC)	10.5~15.0	21.0~30.0	42.0~60.0	10.5~15.0	21.0~30.0	42.0~60.0
Efficiency (typ.)	\geq 89.0%	\geq 90.0%	\geq 90.0%	\geq 89.0%	\geq 85.0%	\geq 90.0%
Fuse	30 A*4	15 A*4	7.5 A*4	30 A*4	15 A*4	7.5 A*4
Remote control	RC60 (optional)					
Battery low voltage alarm (VDC)	11.0 \pm 0.25	22.0 \pm 0.5	44.0 \pm 1.0	11.0 \pm 0.25	22.0 \pm 0.5	44.0 \pm 1.0
Battery low shut down (VDC)	10.5 \pm 0.25	21.0 \pm 0.5	42.0 \pm 1.0	10.5 \pm 0.25	21.0 \pm 0.5	42.0 \pm 1.0
Overload	980 W - 1150 W (DC 12.6 V) Shutdown					
Over voltage (VDC)	15.5 \pm 0.5	31.0 \pm 1.0	62.0 \pm 2.0	15.5 \pm 0.5	31.0 \pm 1.0	62.0 \pm 2.0
Overtemperature	When shell temp. is above 55-60°C /Shut-off output voltage, recovers automatically after temperature goes down					
Short-circuit	Shut off output voltage, restart to recover					
Battery reverse polarity	By fuse open					
Earth leakage	Yes					
Reset voltage after LVS (VDC)	11.8~12.8	23.6~25.6	47.2~51.2	11.8~12.8	24.8~25.6	47.2~51.2
Operating temperature	-10° C to + 40° C					
Max. humidity	20-90% RH, non-condensing					
Storage temperature & humidity	-30° C to + 70° C, 10-95%					
Dimensions	ca. 255 x 186 x 90 mm					
Cooling fan	Controlled by load					
Weight	3.2 kg, 4 pcs/13.8 kg/Ctn (42.5 x 38 x 27 cm)					