

Off-Grid Solar Inverter 0.5KW - 3KW

Characteristics

- Independent MPPT control microprocessor system
- Independent inverter control microprocessor system featured with high-speed online stabilization
- Advanced SPWM technology, high-speed power MOS
- MPPT control using PWM technology enable to bear the maximum PV open-circuit voltage
- Operating mode selectable: PV priority or utility power priority
- Charging current selectable according to configured battery
- AC input with effective online synchronous stabilization technology
- Auto-tracking mains phase to ensure that inverter output voltage has same phase with utility voltage, reducing transfer time and peak surge
- No-load auto shutdown function (optional)
- Automatic frequency selection
- Auto Power-On/Off function; real-time monitoring, test and intelligent startup / shutdown by RS232 or USB interface communicating with PC; remote monitoring by optional SNMP networks



MODEL		SOF11H30A	SOF11H40A	SOF11H30	SOF11H50	SOF11H60	SOF11H80
Rated power		3 kW	4 kW	3 kW	5 kW	6 kW	8 kW
Operating modes		PV priority / AC priority					
PV INPUT							
Max. input power		5760 W		7680 W		7680 W	
Max. input voltage		200 Vdc		400 Vdc			
Rated input voltage		130 Vdc		2000 W			
Start-up voltage		≥ Battery voltage					
Max. input current		60 A	40 A	60 A			
MPPT voltage range (Full load)		120 ~ 142 Vdc		240 ~ 284 Vdc			
Number of MPPTs		1					
AC INPUT							
Input voltage		165 ~ 275 Vac					
Input frequency		40 ~ 70 Hz (overclocking: auto transfer to DC power supply)					
OUTPUT							
Output voltage		220 Vac ± 5%					
Output frequency		50 / 60 Hz ± 1% (auto-sensing)					
Rated output current		13.6 A	18.2 A	13.6 A	22.7 A	27.3 A	36.4 A
Power factor		1					
Waveform		Sinusoidal					
THD		THDu ≤ 5% (Linear load)					
BATTERIES							
Battery type		Lead-acid battery					
Battery voltage		96 Vdc		192 Vdc			
Charging current	PV mode	10 / 20 / 30 / 60 A (optional)		2000 W		3000 W	
	AV mode	8 A		2000 W			
TRANSFER TIME							
PV ↔ AC		0 ms					
EFFICIENCY							
Max. efficiency		92%					
MPPT efficiency		≥ 98% (max.)					
OTHERS							
Protections		Over/under voltage, over/under-frequency, output overload, short-circuit, overtemperature, battery low voltage, overcharge, PV reverse polarity					
Communications		RS232 / USB / RS485 / dry contacts (standard), SNMP (optional)					
Display		LCD + LED					
Standards		EN61000-6-2, EN61000-6-4, EN61000-3-3, EN62040-1, EN62109-1, EN62109-2					
IP rating		IP 20					
Operating temperature		500 W					
Relative humidity		10% ~ 90% (non-condensing)					
Altitude		2000 m (derating 1% for each additional 100 m)					
Noise level at 1 m		≤ 50 dB					
Dimensions (W × D × H) (mm)		265 × 560 × 725					
Packaged dimensions (W × D × H) (mm)		360 × 662 × 905					
Net weight (kg)		76	80	60	67	69	85
Gross weight (kg)		85	89	69	76	78	94