



PIM-LI SERIES HIGH FREQUENCY LITHIUM BATTERY PORTABLE SOLAR GENERATOR

300W-3kW



Performance Characteristics

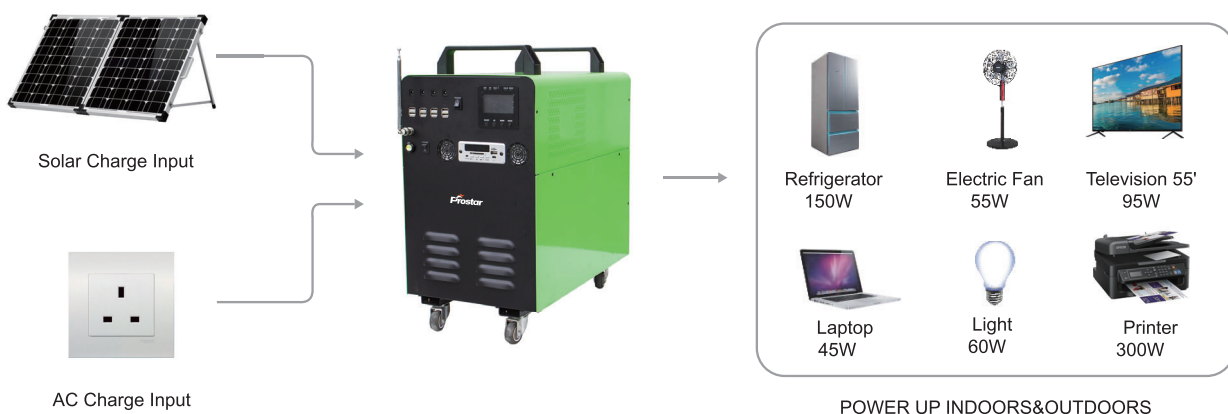
1. Pure sine wave output
2. Widely input voltage range
3. 4 working modes selection
4. 8 fast-charging USB ports
5. Well-designed for ease of portability
6. Convenient with more power output like AC, USB, and 12VDC/24VDC
7. FM Radio function, also can support MP3, USB flash disk and memory card
8. Easy to set up even during an emergency
9. LCD display to show charging and dispensing progress
10. Auto restart while AC is recovering
11. Overload and short circuit protection
12. Compatible to mains voltage or generator power
14. Smart multi-stage battery charger with optional equalization for optimized battery performance
13. Metal case to make the product difficult to deform to guarantee long lifetime usage

This unit is multi-function portable solar generator which uses energy from the sun to produce pure sine wave output. This unit integrates a battery pack (including LiFePO4 Battery or Lead Acid Battery), MPPT/PWM solar charge controller, and an inverter into a compact system to turn solar energy into an electrical current. Each component is designed to match the electricity rating of the device that is receiving power.

Its comprehensive LCD display offers user-configurable and easy-accessible button operation such as battery charging current, adjustable working modes. AC / Solar can charge battery bank at the same time or configurable AC / Solar input priority via LCD setting, and isolation transformer design provides robust power protection and galvanic isolation.

This unit is ideal for home appliances, portable electronics, and some industrial tools. Smartphones, tablets, and portable GPS technology can be charged several hundred times through solar energy. Besides, it's worry-free to start up motor-type loads such as refrigerators, motors, compressors and laser printers.

Application Diagram





Technical Specifications

Model	PIM300-Li	PIM500-Li	PIM1000-Li	PIM2000-Li	PIM3000-Li
PHASE	1-phase in/1-phase out				
RATED POWER	300W	500W	1000W	2000W	3000W
Dimension DxWxH (mm)	310x213x240/310x213x192		456x269x434	510x313x475	
Net Weight (kgs)	6.27/5.17	10.77/9.69	15.27/14.17	36.08/35.00	38.30/37.20
INPUT					
Voltage	110Vac/120Vac/127Vac / 220Vac/230Vac/240Vac(+25%,-35%)				
Frequency Range	50 Hz/60 Hz (Auto sensing)				
OUTPUT					
AC Voltage Regulation (Batt. Mode)	110Vac/120Vac/127Vac / 220Vac/230Vac/240Vac ± 5%				
Frequency	50Hz/60Hz ± 0.5Hz				
Surge Power	900W	1500W	3000W	6000W	9000W
Efficiency (Peak)	83%		86%		89%
Transfer Time	<=8 ms				
Crest Factor	3:1				
Waveform	Pure sine wave				
DC Voltage	12VDC		24VDC		
DC Current	2A * 4 Ports		2A * 4 Ports		
High-voltage Protection	16VDC		32VDC		
Low-voltage Protection	11VDC		22VDC		
USB Interface	5VDC 3A * 8 Ports				
LED LIGHTING					
Power	3W				
Input Voltage	12VDC		24VDC		
FM RADIO					
FM Frequency	87.5 MHz to 108 MHz				
BATTERY & AC CHARGER					
Battery Voltage	12VDC		24VDC		
Battery Type	LiFePO4 Battery				
Battery Capacity	12.8V 30AH	12.8V 50AH	25.6V50AH	25.6V100AH	25.6V150AH
Floating Charge Voltage	14.6VDC		29.2VDC		
Overcharge Protection	14.8VDC		29.6VDC		
SOLAR CHARGER & AC CHARGER					
Maximum PV Array Power	360W		720W	1440W	
PV Array Open Circuit Voltage Range	MPPT:18~130VDC / PWM:10~25VDC		MPPT:18~130VDC / PWM:20~25VDC		
Max. PV Array Open Circuit Voltage	MPPT:145VDC / PWM:25VDC		MPPT:145VDC / PWM:50VDC		
Max. Solar Charge Current	30A			60A	
MPPT Efficiency	99.5%				
Max. AC Charge Current	10A		5A	15A	
PROTECTION					
Overload Protection	Full load 100%, Inverter alarm. Overload 120%, Inverter shuts down output in 10s.Once the load back to normal, Inverter recovers output.				
Output Short Circuit	Shut down automatically.				
High AC Input Voltage	Turn off AC,transfers to inverter mode automatically.				
Low Battery Voltage	Shut down automatically. Once the AC input recovers, inverter turns on and charge automatically.				
Over Temperature	Shut down automatically.				
SYSTEM					
Display	LCD + LED				
Display Contents	Input/Output Voltage, Input/Output Current, Battery Voltage, Battery Capacity, Loading Power, Working Modes				
Working Modes	1 - Normal Working Mode, 2 - Solar Priority Mode, 3 - Battery - Inverter Mode, 4 - Energy Saving Mode				
OPERATING ENVIRONMENT					
Humidity	5% to 95% Relative Humidity(Non-condensing)				
Altitude	<3000m				
Operating Temperature	0°C to 55°C				