

## Overview

IPower series is a pure sine wave inverter that can convert 12/24/48VDC to 220/230VAC (or 110/120VAC). Industrial design has a wide operating temperature, high reliability, and high efficiency compared with civil design. Simple appearance and lightweight make it easy to install and operate. The wide input voltage range is ideal for solar system applications. This inverter is especially suitable for civil applications, such as household emergency lighting systems, vehicle-mounted systems, small field power supplies, etc.

## Features

- Safe design with input and output electrical isolation
- Adoption of advanced SPWM technology, pure sine wave output
- Optional output voltage 220/230VAC(or 110/120VAC), chosen by the DIP switch
- LED indicators for fault status and working status
- Lower No-load consumption
- Max. efficiency up to 95%(IP2000-22, IP2000-42)①
- Input protection: Over voltage protection, low voltage protection
- Output protection: Overload protection, short circuit protection
- Over-temperature protection: Temperature-controlled Fan Ventilation; Inverter turns off automatically when overheating
- Operational USB output 5VDC/1A
- Operational RS485 communication port②

① The efficiency is tested at rated input voltage,220V output with resistive load, 25°C Ambient temperature,1500W, and higher version

② 1000W and higher version support RS485 communication port optional.



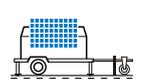
Solar Car



Solar Home



Solar Boat



Solar Power Generator

## Technical Specifications

Item	IP350-11	IP350-12	IP350-21	IP350-22	IP500-11	IP500-12	IP500-21	IP500-22
Rated Input Voltage	12VDC		24VDC		12VDC		24VDC	
Input Voltage Range	10.8 ~ 16VDC		21.6 ~ 32VDC		10.8 ~ 16VDC		21.6 ~ 32VDC	
Input surge voltage	< 32VDC		< 44VDC		< 32VDC		< 44VDC	
Output Voltage	110VAC(±5%) 120VAC (-10% ~ +5%)	220VAC(±5%) 230VAC (-7% ~ +5%)	110VAC(±5%) 120VAC (-10% ~ +5%)	220VAC(±5%) 230VAC (-7% ~ +5%)	110VAC(±5%) 120VAC (-10% ~ +5%)	220VAC(±5%) 230VAC (-10% ~ +5%)	110VAC(±5%) 120VAC (-10% ~ +5%)	220VAC(±5%) 230VAC (-10% ~ +5%)
Output Frequency	50/60±0.1Hz				50/60±0.1Hz			
Output Continuous Power	280W				400W			
Output Power 15 min.	350W				500W			
Surge power	750W				1000W			
Power factor	0.2-1(VA lower than output continuous power)				0.2-1(VA lower than output continuous power)			
Output Wave	Pure sine wave				Pure sine wave			
Distortion THD	THD≤5%①	THD≤3%①	THD≤5%①	THD≤3%①	THD≤5%①	THD≤3%①	THD≤5%①	THD≤3%①
Max. Efficiency	90%	91%	91%	92%	91%	92%	91%	92%
No-load current	< 0.7A		< 0.5A		< 0.9A		< 0.5A	
USB Output Port②	5VDC/Max.1A				5VDC/Max.1A			
Binding post	Φ6mm				Φ6mm			
Dimension	214×105.5×57.7mm				232.2×132×74.5mm			
Mounting size	185.5×76.7mm				205×102mm			
Mounting hole size	Φ4.2mm				Φ5.2mm			
Net weight	1.0kg				1.7kg			

① Test condition: Rated Input Voltage, Output Continuous Power, Resistive load.

② Conventional products don't have this port, the port is optional.

## Technical Specifications

Item	IP1000-11	IP1000-12	IP1000-21	IP1000-22	IP1500-11	IP1500-12	IP1500-21	IP1500-22
Rated Input Voltage	12VDC		24VDC		12VDC		24VDC	
Input Voltage Range	10.8 ~ 16VDC		21.6 ~ 32VDC		10.8 ~ 16VDC		21.6 ~ 32VDC	
Input surge voltage	< 20VDC		< 44VDC	< 40VDC	< 20VDC		< 40VDC	
Output Voltage	110VAC/120VAC (±3%)	220VAC/230VAC (±5%)	110VAC/120VAC (±3%)	220VAC/230VAC (±5%)	110VAC(±3%) 120VAC (-7% ~ +3%)	220VAC(±5%) 230VAC (-7% ~ +5%)	110VAC(±3%) 120VAC (-7% ~ +3%)	220VAC(±5%) 230VAC (-7% ~ +5%)
Output Frequency	50/60±0.1Hz				50/60±0.1Hz			
Output Continuous Power	800W				1200W			
Output Power 15 min.	1000W				1500W			
Surge power	1600W				2400W			
Power factor	0.2-1(VA lower than output continuous power)				0.2-1(VA lower than output continuous power)			
Output Wave	Pure sine wave				Pure sine wave			
Distortion THD	THD≤5%①	THD≤3%①	THD≤5%①	THD≤3%①	THD≤5%①	THD≤3%①	THD≤5%①	THD≤3%①
Max. Efficiency	92.5%	94.5%	92.5%	94.5%	93%		94%	
No-load current	< 0.8A		< 0.5A		< 1.0A		< 0.6A	
USB Output Port②	5VDC/Max.1A				5VDC/Max.1A			
Rs485 Com. Port②	5VDC/200mA				5VDC/200mA			
Binding post	Φ6mm				Φ6mm			
Dimension	298.3×231.5×98.5mm		284.7×231.5×98.5mm		326.12×231.5×98.5mm		284.7×231.5×98.5mm	
Mounting size	183×220mm		163×219.5mm		208×220mm		163×219.5mm	
Mounting hole size	Φ5.5mm				Φ5.5mm			
Net weight	3.9kg		3.6kg		4.6kg		3.9kg	

① Test condition: Rated Input Voltage, Output Continuous Power, Resistive load.

② Conventional products don't have this port, the port is optional.

## Technical Specifications

Item	IP2000-21	IP2000-22	IP2000-41	IP2000-42
Rated Input Voltage	24VDC		48VDC	
Input Voltage Range	21.6 ~ 32VDC		43.2 ~ 60VDC	
Input surge voltage	< 40VDC		< 80VDC	
Output Voltage	110VAC(±5%) 120VAC(-10% ~ +5%)	220VAC(±5%) 230VAC(-10% ~ +5%)	110VAC(±5%) 120VAC(-10% ~ +5%)	220VAC(±5%) 230VAC(-10% ~ +5%)
Output Frequency	50/60±0.1Hz			
Output Continuous Power	1600W			
Output Power 15 min.	2000W			
Surge power	3200W			
Power factor	0.2-1(VA lower than output continuous power)			
Output Wave	Pure sine wave			
Distortion THD	THD≤5%①	THD≤3%①	THD≤5%①	THD≤3%①
Max. Efficiency	94%	95%	94%	95%
No-load current	< 0.6A		< 0.4A	
USB Output Port②	5VDC/Max.1A			
RS485 z Com. Port②	5VDC/200mA			
Binding post	Φ6mm			
Dimension	326.12×231.5×98.5mm			
Mounting size	208×219.5mm			
Mounting hole size	Φ5.5mm			
Net weight	4.6kg			

① Test condition: Rated Input Voltage, Output Continuous Power, Resistive load.

② Conventional products don't have this port, the port is optional.

Environmental Parameters	
Working Temperature	-20°C~ +45°C
Storage Temperature	-35°C~ +70°C
Humidity	< 95% (N.C.)
Enclosure	IP20
Altitude	< 5000 m (If the altitude exceeds 1000 meters, the rated power will be reduced according to IEC62040.)

Others	
Dielectric Strength	Between DC input terminals and metal case: Test voltage AC500V, 1 minute Between AC output terminals and metal case: Test voltage AC1500V, 1 minute