

SINV Off Grid Inverter



Typical Applications

- Residential Power Backup: Provides reliable power for homes during outages, ensuring uninterrupted electricity for essential appliances and lighting.
- Remote Areas: Ideal for off-grid locations without access to the main power grid, such as rural or mountainous regions.
- Solar Power Systems: Perfect for solar energy setups, converting solar power into usable AC electricity for homes or businesses.
- Agricultural Use: Powers irrigation systems, water pumps, and other farming equipment in remote agricultural fields.
- Telecommunication Towers: Ensures continuous power supply for telecom infrastructure in areas with unreliable grid connections.
- Emergency Power: Used in disaster-prone areas to provide emergency power for hospitals, shelters, and relief operations.
- Small Businesses: Supports small-scale businesses like shops, workshops, and offices in areas with frequent power cuts.
- Recreational Vehicles (RVs): Provides power for RVs and caravans, enabling off-grid travel and camping.
- Construction Sites: Powers tools and equipment at remote construction sites where grid power is unavailable.
- Educational Institutions: Ensures uninterrupted power for schools and colleges in rural or off-grid locations.

Key Features

- Ensures clean and stable power for sensitive electronics like laptops, medical devices, and home appliances.
- High PV Input Voltage Range (60~500VDC): Suitable for large solar arrays, maximizing energy harvest in sunny regions.
- Built-in 120A MPPT Solar Charge: Optimizes solar energy conversion, ideal for areas with high solar irradiation.
- Anti-Dust Kit: Designed for harsh environments like deserts or industrial areas where dust and debris are common.
- Smart Battery Charge Design: Extends battery life, making it cost-effective for long-term off-grid applications.
- Inverter Can Run Without Battery: Useful in hybrid systems where grid or solar power is available intermittently.

Technical Data

Model	Rated Power	Input Voltage	Output Voltage	Output Frequency	MPPT Voltage Range (VDC)	Efficiency	Maximum PV Input Power	Maximum Solar Charging Current	Battery Voltage	Dimensions (mm)	Weight (kg)	Operating Temperature	Humidity
SINV 6.2KW	3.6KW	48V DC	220V AC ±5%	50Hz/60H (Auto Sensing)	120-450	≥98%	3600W	60A	48V	450x350x200	10	-10°C to 50°C	5% to 95% Relative Humidity (Non-condensing)
SINV 4.2KW	4.2KW	48V DC	220V AC ±5%	50Hz/60H (Auto Sensing)	120-450	≥98%	4200W	80A	48V	500x400x220	12	-10°C to 50°C	5% to 95% Relative Humidity (Non-condensing)
SINV 3.6KW	6.2KW	48V DC	220V AC ±5%	50Hz/60H (Auto Sensing)	120-450	≥98%	6200W	100A	48V	550x450x250	15	-10°C to 50°C	5% to 95% Relative Humidity (Non-condensing)