



# **FEATURES**

- Pure sine wave inverter & ECO friendly
- Configurable input voltage range for home appliances and personal computers.
- Configurable battery charging current based on applications via LCD setting.
- Configurable AC/Solar Charger priority.
- Compatible to mains voltage or Generator power.
- Auto restart while AC is recovering & Cold start function.
- Overload/ Over temperature & Short circuit protection.
- Smart battery charger design for optimized battery performace.
- ON / OFF Bypass Switch
- Minimum PV Voltage 150V, Must have battery connection.



#### **OFF-GRID HYBRID**

# SOLAR INVERTER 1500 / 2400 PF 1.0

#### **SPECIFICATIONS**

1500 **MODEL** 2400

**LINE MODE** 

Rated Output Power 1500VA / 1500W 2400VA / 2400W

Sinusoidal (utility or generator) Input Voltage Waveform

Nominal Input voltage 230Vac

Low Loss voltage 170Vac±7V (UPS); 90Vac±7V (Appliances) 180Vac±7V (UPS); 100Vac±7V (Appliances) Low Loss Return voltage

High Loss Voltage 280Vac±7V High Loss Return Voltage 270Vac±7V Max AC Input Voltage 300Vac

Nominal Input Frequency 50Hz / 60Hz (Auto detection)

Low Loss Frequency 40+1Hz Low Loss Return Frequency 42±1Hz High Loss Frequency 65±1Hz High Loss Return Frequency 63±1Hz **Output Short Circuit Protection** Circuit Breaker

Efficiency (Line Mode) >95% (Rated R load, battery full charged) **Transfer Time** 10ms typical (UPS) 20ms typical (Appliances)

**INVERTER MODE** 

Rated Output Power 1500W 2400W

Pure Sine Wave Output Voltage Waveform Output Voltage Regulation 230Vac±5% **Output Frequency** 50Hz Peak Efficiency 91%

Overload Protection 5s@ ≥150% load; 10s@ 110%-150% load

Surge Capacity 2\* rated power for 5 seconds

Nominal DC Input Voltage 12Vdc 24Vdc 15.5Vdc 23Vdc Cold Start Voltage

@load <50%: 11.0Vdc, @load <50%: 22.0Vdc, Low DC Warning Voltage @load ≥50%: 10.5Vdc @load ≥50%: 21.0Vdc @load <50%: 11.5Vdc, @load <50%: 22.5Vdc Low DC Warning Return Voltage @load ≥50%: 11.0Vdc @load ≥50%: 22.0Vdc Low DC Cut-Off Voltage @load <50%: 10.2Vdc, @load <50%: 20.5Vdc.

@load ≥50%: 9.6Vdc @load ≥50%: 20.0Vdc High DC Recovery Voltage 14Vdc 32Vdc

High DC Cut-off Voltage 16Vdc 33Vdc No Load Power Consumption <25W <30W

**CHARGE MODE - UTILITY CHARGING MODE** 

Charging Algorithm 3-Step AC Charging Current (Max) 60Amp 60Amp

**Bulk Charging Voltage** Flooded Battery: 14.6, Flooded Battery: 29.2, AGM / Gel Battery: 28.2 AGM / Gel Battery: 14.1

Floating Charging Voltage 13.5Vdc 27Vdc

**CHARGE MODE - MPPT SOLAR CHARGING MODE** 

2000W Max. PV Array Power 3000W

Nominal PV Voltage 240Vdc PV Array MMPT Voltage Range 90~430Vdc Max.PV Array Open Circuit Voltage 450Vdc Max Charging Current 80Amp

(AC charger plus solar charger) Dimension (D\*W\*H) / Net Weight 348X270X95 / 4 Kgs 348X270X95 / 5 Kgs

-15°C~ 60°C

Storage temperature

Safety Certification CE -10°C~ 50° C Operating Temperature Range

Humidity 5% to 95% Relative Humidity (Non-condensing)



## **OFF-GRID HYBRID**

# **SOLAR INVERTER 1500 / 2400** PF 1.0

## **Basic System Architecture**

The following illustration shows basic application of this Inverter/ Charger. It also includes following devices to have a complete running system:

- Generator or Utility
- PV Modules

Consult with your system integrator for other possible system architectures depending on your requirements.

The inverter can power all kind of appliances in home or office environment, including motor-type appliances such as Tube light, Fan, Refrigerator and Air Conditioner.



