

# Low Frequency Solar Inverter

## PV3600 TLV Series (8KW-12KW)



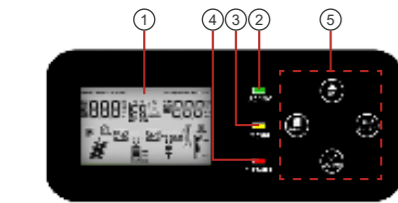
### Features

- Smart LCD setting(Working modes, Charge Current, Charge voltage, etc.)
- Built-in MPPT solar charge controller 100A/200A
- MPPT efficiency max 98%
- Powerful charge rate up to 80Amp
- DC start & Automatic Self-Diagnostic Function
- USB monitoring function
- Supporting AGS, BTS port
- Compatible to generator
- Built-in bms function
- Multi-brand lithium battery communication can be set up via the screen

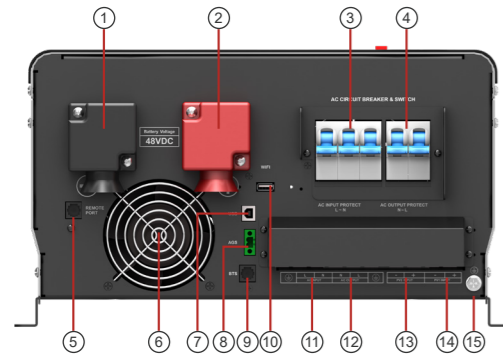
### Introduction

PV3600 TLV series is a multi-function inverter ,combining functions of inverter and MPPT solar charger controller, solar charger and battery charger to offer uninterruptible power support. The comprehensive LCD display offers user-configurable and easy-accessible button operation such as battery charging current, AC/solar charger priority, and selectable input voltage based on different applications.

### Back panel printing description

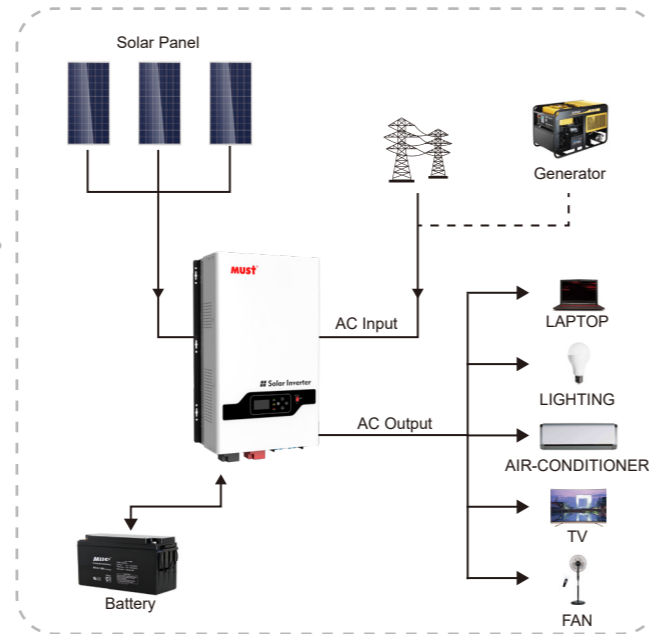


1. LCD Display
2. Status Indicator
3. Charging Indicator
4. Fault Indicator
5. Function Buttons



1. BAT-
2. BAT+
3. AC input breaker
4. AC output breaker
5. Remote control port
6. Fan
7. USB port
8. AGS port
9. BTS/BMS port
10. Wifi communication port
11. AC input
12. AC output
13. PV2 input
14. PV1 input
15. Ground

### Solar system connection



### Specification

| MODEL                          |                                       | PV36-8048 TLV  | PV36-10048 TLV | PV36-12048 TLV |
|--------------------------------|---------------------------------------|--|----------------|----------------|
| Nominal Battery System Voltage |                                       | 48VDC  | 48VDC          | 48VDC          |
| INVERTER OUTPUT                | Rated power                           | 8.0KW  | 10.0KW         | 12.0KW         |
|                                | Surge rating                          | 24000VA  | 30000VA        | 36000VA        |
|                                | Capable of starting electric motor    | 4HP  | 5HP            | 6HP            |
|                                | Waveform                              | Pure sine wave / same as input (bypass mode)                                     |                |                |
|                                | Nominal output voltage RMS            | 100V/110V/120V/200V/220V/240V  |                |                |
|                                | Output frequency                      | 50Hz / 60Hz ± 0.3Hz  |                |                |
|                                | Inverter efficiency(peak)             | >88%   |                |                |
|                                | Line mode efficiency                  | >95%   |                |                |
|                                | Power factor                          | 1.0  |                |                |
|                                | Typical transfer time                 | 20ms(max)  |                |                |
| AC INPUT                       | Voltage                               | 220V/230V/240V   |                |                |
|                                | Selectable voltage range              | 90-280 VAC (APL)   |                |                |
|                                | Frequency range                       | 50Hz / 60Hz  |                |                |
| BATTERY                        | Low battery voltage cutoff            | 40-48VDC for 48VDC mode  |                |                |
|                                | Low battery voltage recover           | 42-50VDC for 48VDC mode  |                |                |
|                                | High battery voltage cutoff           | 60VDC for 48VDC mode   |                |                |
|                                | High battery voltage recover          | 57VDC for 48VDC mode   |                |                |
|                                | Idle consumption-search mode          | < 60W when power saver on  |                |                |
| AC CHARGER                     | Output voltage                        | Depends on battery type  |                |                |
|                                | Charger AC input breaker rating       | 80A  | 80A            | 80A            |
|                                | Overcharge protection S.D.            | 31.4VDC for 24VDC mode (62.8VDC for 48VDC mode )                                 |                |                |
|                                | Maximum charge current                | 60A  | 70A            | 80A            |
| BTS                            | Continuous output power               | Yes Variances in charging voltage & S.D. voltage base on the battery temperature |                |                |
| BYPASS & PROTECTION            | Input voltage waveform                | Sine wave (grid or generator)  |                |                |
|                                | Nominal input frequency               | 50Hz or 60Hz   |                |                |
|                                | Overload protection (SMPS Load)       | Circuit breaker  |                |                |
|                                | Output short circuit protection       | Circuit breaker  |                |                |
|                                | Bypass breaker rating                 | 63A  | 63A            | 63A            |
| SOLAR CHARGER                  | Max bypass current                    | 80Amp  |                |                |
|                                | Maximum PV charge current             | 100A/200A  |                |                |
|                                | DC voltage                            | 48V  |                |                |
|                                | Maximim PV array power                | 5000W(10000W for 200A optional)  |                |                |
|                                | MPPT range @ operating voltage(VDC)   | 64~235VDC  |                |                |
|                                | Maximum PV array open circuit voltage | 250VDC   |                |                |
|                                | Maximum efficiency                    | >98%   |                |                |
| Standby power consumption      | <2W                                   |  |                |                |
| MECHANICAL SPECIFICATIONS      | Mounting                              | Wall mount   |                |                |
|                                | Dimensions (W*H*D)                    | 640.5*402.3*212.7mm  |                |                |
|                                | Package Dimensions (W*H*D)            | 818*577.5*415mm  |                |                |
| OTHER                          | Operation temperature range           | 0°C to 40°C  |                |                |
|                                | Storage temperature                   | -15°C to 60°C  |                |                |
|                                | Audible noise                         | 60dB MAX   |                |                |
|                                | Display                               | LED+LCD  |                |                |