PH1800 MPK Plus Series
On/Off Grid Hybrid Solar Inverter

Feature:
- Pure sine wave output
- On/off grid inverter with energy storage
- Multiple operations: On-Grid, Off-Grid, Grid-Tie with Battery Back-up also recognized as Grid-Interactive
- Built-in MPPT solar charge controller
- Selectable input voltage range for home appliances and personal computers
- Selectable charging current based on applications
- Configurable AC/Solar input priority via LCD setting
- Compatible to mains voltage or generator power
- Auto restart while AC is recovering
- Smart battery charger design to optimize battery performance
- Cold start function
- Parallel operation with up to 3 units (Available for MUST PH18-4K/5K MPK Plus)
- Optional Remote Control Panel available

Introduction:
This is a multi-function inverter/charger, combining functions of inverter, MPPT solar charger and battery charger to offer uninterrupted power support with portable size. Its comprehensive LCD display offers user-configurable and easy-accessible button operation such as battery charging current, AC/solar charger priority, and acceptable input voltage based on different applications.

NOTE:
For parallel model installation and operation, please check separate parallel installation guide for the details.

Back Panel

Approximate Back-up Time Table

<table>
<thead>
<tr>
<th>Model</th>
<th>Load VA</th>
<th>Backup Time 100Ah</th>
<th>Backup Time 200Ah</th>
</tr>
</thead>
<tbody>
<tr>
<td>1KVA</td>
<td>200</td>
<td>100</td>
<td>50</td>
</tr>
<tr>
<td>2KVA</td>
<td>300</td>
<td>150</td>
<td>75</td>
</tr>
<tr>
<td>3KVA</td>
<td>400</td>
<td>200</td>
<td>100</td>
</tr>
<tr>
<td>4KVA</td>
<td>500</td>
<td>250</td>
<td>125</td>
</tr>
<tr>
<td>5KVA</td>
<td>600</td>
<td>300</td>
<td>150</td>
</tr>
</tbody>
</table>

Solar System Connection

1. LCD display
2. Status indicator
3. Charging indicator
4. Fault indicator
5. Function buttons
6. Power on/off switch
7. AC input
8. AC output
9. PV input
10. Battery input
11. Circuit breaker
12. RS485 communication port
13. Parallel communication cable (only for parallel model)
14. Parallel switch
15. Dry contact
16. USB

400-900 parallel model
100-900 single model

Solar System

- PV panel
- Home Appliances
- Generator
- External Battery pack

400W-900W Parallel

Mechanical Specifications

- Dimension (W/H/D mm): 272*372*131
- Weight (kg): 7.4
- Power Consumption: 2W
- Ambient Temperature: -20°C to 50°C
- Humidity: 5% to 95% (Non-condensing)
- Input Voltage: 120VAC
- Output Voltage: 230VAC±5%
- Output Frequency: 50Hz/60Hz (Auto-sensing)
- AC input voltage range: 170~280VAC(FST); 90~280VAC(SLO); 184-253VAC(APL)
- DC input voltage range: 54VDC
- Solar input range: 1500W 3000W
- AC output range: 20A or 30A
- Battery input: 10A or 20A
- Maximum charge current: 60A
- Peak efficiency: 90%
- Transfer time: 10ms(FST); 20ms(SLO)
- THD (Linear loads): 5%
- AC output waveform: Pure sine wave

Specification

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</tr>
</thead>
<tbody>
<tr>
<td>1KVA</td>
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<td>2529</td>
<td>5058</td>
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<tr>
<td>2KVA</td>
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<td>5044</td>
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<tr>
<td>5KVA</td>
<td>500</td>
<td>3560</td>
<td>7122</td>
</tr>
</tbody>
</table>

Back Panel

- LCD display
- Status indicator
- Charging indicator
- Fault indicator
- Function buttons
- Power on/off switch
- AC input
- AC output
- PV input

NOTE: For parallel model installation and operation, please check separate parallel installation guide for the details.