

PS1000-121-RWD  
**Power Supply / Battery Charger**  
121.5V 8A Unit

**CAUTION: THIS UNIT PRODUCES A NON-SELV HIGH VOLTAGE SECONDARY. USE AND SERVICING MUST BE CARRIED OUT BY AUTHORISED AND QUALIFIED PERSONNEL ONLY.**



Features

- **121.5V Power Output and Battery Charging up to 8A**
- **Mains Input 180V – 264V**
- **Power Factor Corrected**
- **Fully Protected Against Overload and Short Circuit**
- **Fully Boxed**
- **Size: Width 273mm x Depth 255mm x Height 90mm**
- **Safety to EN60950- 1: 2006**
- **Harmonics to EN61000**
- **EMC EN55022**
- **Volt- Free Relay Contacts for Charge Fail Indication**
- **Alarm LED Drive Output**
- **Fan Cooled**

## Connection Details



**Mains input connections are marked on the connector protection board seen in the photographs above.**

### Power Output

**Warning: The DC Power Output is Non-SELV and is High Voltage**

**The main DC output to charge the batteries is taken from the two 4- way connectors marked +121V and 0V.**

**The connectors will accept up to 4mm wire in each of their four openings.**

**The power output can be used with or without batteries. When charging batteries the unit will supply just over 8A and then enter current limit.**

**The unit can charge batteries that are at a discharge level as low as 60V. No damage will occur to the unit by attempting to charge batteries that are deeper discharged. Caution must be exercised to ensure the battery stack is of a correct voltage to match the final charge voltage of 121.5V**

## Output signalling

**Output connections are marked on the connector protection board seen in the photographs above.**

### **Volt- Free Relay Contacts for Charge Fail Indication**

**The unit provides volt- free relay contacts that change state to indicate charger fail.**

**When the charger is healthy:**

**COM – N/C is Open Circuit**

**COM – N/O is Short Circuit**

**When the charger is switched off or failed:**

**COM – N/C is Short Circuit**

**COM – N/O is Open Circuit**

### **Alarm LED Drive Output**

**The unit provides + and – connections that can be connected directly to an LED to provide visual indication of charger status.**

**In normal operation with mains present and the charger working properly the LED will be OFF.**

**If the mains is switched off or the mains fails or the charger fails, the LED will turn ON. Note: Power to drive the LED will be provided by the external batteries.**

**Note that at switch- on and switch- off, depending on load, the LED and status indication relay may momentarily show fault, however both will reset almost immediately to the correct indicating condition.**

## Protection

### Output Fuse

**The unit has reverse diode protection built- in in case of misconnection. Should this happen, the output fuse that sits between the 121V and 0V connectors will blow.**

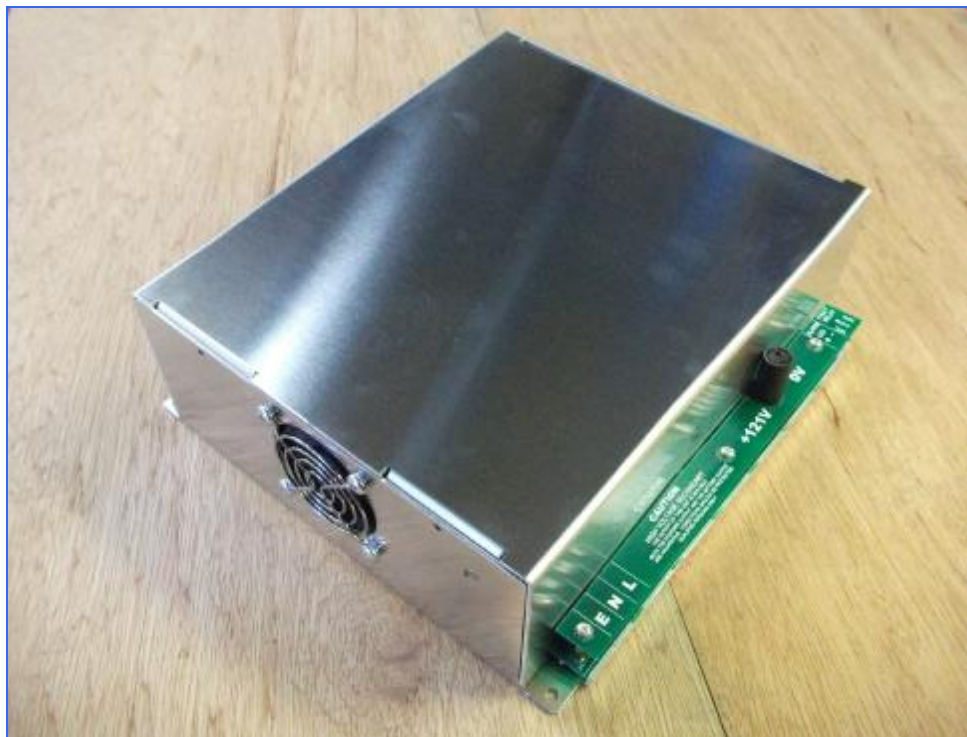
**Always replace with same type and rating of fuse,**

**Fuse type T15A 250V 1 1/4 inch**

## Fan

**The unit is fan cooled and draws air in through the fan and vents at the opposite corner.**

**The unit is highly efficient and will run without the fan however it is good working practice to ensure that both the air intake and air venting slots are not blocked during operation.**



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