

PSU-1202

Switch mode power supply with battery backup option and failure status outputs



OPERATION

Universal uninterruptible power supply for 12V systems up to 30W power requirement. The power supply compliance with EN50131-6 standard, it is protected against output short circuit and overload, and has outputs for status monitoring of battery failure, disconnection, and AC failure. Compact size and easy mounting on DIN-rail or flat surface.

The power supply dynamically tests for the presence of a battery and capacity. The battery is checked every minute 5 seconds at full load. If the the battery voltage drops below 11.5 V during the load, is indicated by a red LED on the panel and the BAT fault output changes from short circuit to open for 5 seconds, and it repeats every minute.

In the event of loss of AC power, an LED on the panel will indicate this and the AC fault output changes from short circuit to open until the mains voltage is restored.

In the event of an overload or short-circuit of the outputs, the power supply will switch off the voltage until the overload is removed.

Battery charging is regulated by CCCV method and maximum current is 0.5A.

Suggested battery capacity is 4-12Ah.

FEATURES

Input voltage: 100 ~ 240 VAC

Output voltage: 12 VDC

• Output current: 2A

 12V lead acid battery charging (current max. 0.5A)

 Deep discharge battery protection (disconnects battery under 10.5V)

• Failure indications (LED and OUTPUTS, NC type)

- battery missing

- battery low (under 11.5V)

- AC power loss

• Electrical protections:

- overvoltage

- overload

- short circuit

- battery reverse polarity

• EMC compatible (EN55032, EN61000-4)

• Compliance with EN50131-6 standard

Operating temperature: -30°C / +70°C

• Dimensions (LxWxH): 82x60x33 mm

• Net weight: 150g

Mounting: DIN rail or surface mountable

APPLICATION AREAS

• Alarm system communicators

Access control systems

• Electromagnetic locks

Uninterruptible power supply

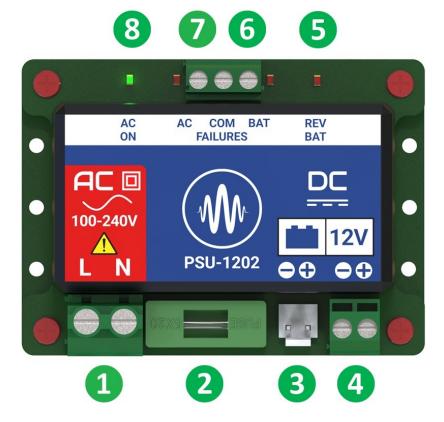
PACKAGE CONTENTS

- Power supply module
- Cable for battery
- Warranty

Available as an option:

Plastic DIN rail clips for fixing

OVERVIEW & WIRING



- AC input terminal | 230 VAC power input (100-240VAC)
- AC protection fuse | 5x20mm melting fuse, 250V / 0.2A slow blow
- Battery connector | 13.8VDC / 500mA | protected against short circuit and reverse polarity
- DC power supply terminal | 13-14 VDC in normal mode | 10-13 VDC in battery backup mode
- 2 3 4 5 6 **Reverse battery indicator** | RED indicator shows the battery reverse polarity
- Battery failure output and indicator | If the battery is missing or in poor condition, the BAT red LED will indicate and the solid state relay will switch from closing to opening for 5 seconds, repeating every minute. The switch signal is connected to COM with COM potential equal to the negative supply voltage.
- AC supply voltage failure output and indicator | In case of AC power failure, the AC red LED will indicate and the solid state relay will switch from closed to open until it is restored. The switch signal is connected to COM with COM potential equal to the negative supply voltage.
- **AC supply voltage indicator** | GREEN indicator shows the main AC is switched on

WARNING

- 1. The device should be mounted by a qualified installer, holding relevant permits and licenses (applicable and required for a given country) to connect (interfere) with ~230 V mains supply.
- 2. The power supply is double insulated so it does not require a protective earth wire.
- 3. Before installation, ensure that the power supply parameters meet the requirements of the consumer appliance and that the power supply is switched off.
- 4. Before switching on the power supply, check the quality and correctness of all connections made. Before connecting the consumer appliance to the power supply, check the output voltages. Avoid shorting output pins of the DC power supply.
- 5. During connecting batteries pay special attention to the correct polarity, type and required method of connection.