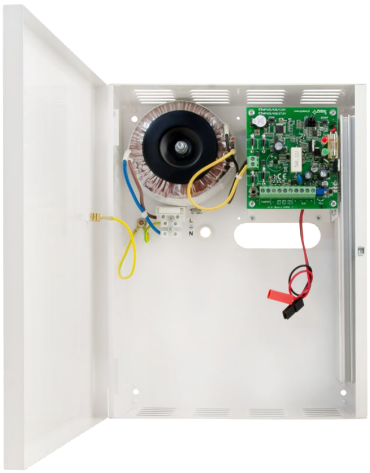
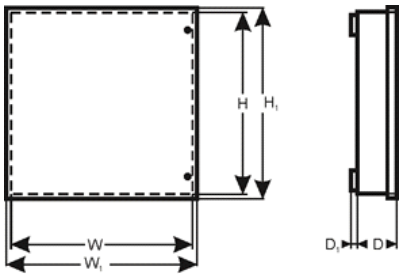
CODE: **AWZ 224** v.2.3/IX
TYPE: **AWZ 27,6V/2A/2x7Ah/LM Linear buffer power supply unit Grade 2.**

EN**





GREY POWER plus

CE

Features:

- EN50131-6 compliance, 1÷2 grades and II environmental class
- mains supply 230VAC
- 27,6V DC uninterrupted supply
- fitting battery: 2x7Ah/12V
- PSU current efficiency:
  - 0,58A – for grades 1, 2 *
  - 2A – for general use **

  (see: chapter 1.1)
- linear voltage regulator
- microprocessor-based automation system
- output voltage control
- dynamic battery test
- battery electrical continuity control
- battery voltage control
- battery fuse status control
- battery charge and maintenance control
- deep discharge battery protection (UVP)
- battery output protection against short-circuit and reverse polarity connection
- battery charging current 0,4A
- START function of manual switch to battery power
- STOP facility for manual disconnection during battery - assisted operation
- LED indication
- acoustic indication
- EPS technical output of 230V power failure - OC type
- PSU technical output indicating PSU and battery failure - OC type
- APS technical output indicating battery failure - OC type
- Optional installation of the MPSBS relay module changing technical outputs of the OC type to relay type
- adjustable times indicating AC power failure
- protections:
  - SCP short-circuit protection
  - OLP overload protection
  - over voltage protection
  - OHP overheat protection
  - surge protection
  - against sabotage
- warranty – 5 years from the production date

DESCRIPTION

The buffer power supply is designed in accordance with the requirements of the EN 50131-6 standard, grade 1÷2 and II environmental class. It is intended for an uninterrupted supply of alarm system devices requiring stabilized voltage of **24V DC** (+/-15%). A linear stabilizing system, which has been used in the unit, provides voltage with a lower level of noise and a quicker response to interference when compared to a switched-mode regulator.

Depending on a required protection level of the alarm system in the installation place, the PSU efficiency and the battery charging current should be set as follows:

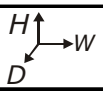
* Grade 1, 2 - standby time 12h

Output current 0,58A + battery charging current 0,4A

** General use – if the PSU is not mounted in an installation complaint with the EN-50131 standard, the acceptable current efficiency amounts to:

1. Output current 2A (without a battery)
2. Output current 1,6A + 0,4A battery charging current
Total current of the receivers + battery charging current is max. 2A.

In case of power decay, a battery back-up is activated immediately. The PSU is housed in a metal enclosure with battery space for a 2x7Ah/12V battery. It is fitted with micro switches indicating unwanted door opening (front panel).

SPECIFICATIONS	
PSU type	A (EPS - External Power Source), protection class 1÷2, II environmental class
Mains supply	230V/AC 50Hz (-15%/+10%)
Current consumption	0,4A @230V AC
PSU power	55W
Output voltage	22V÷ 27,6V DC – buffer operation 20V÷ 27,6V DC – battery-assisted operation
Output current	**- for grades 1, 2:** **Io = 0,58A + 0,4A battery charging current** **- for general use:** **Io = 2A (without a battery)** **Io = 1,6A + 0,4A battery charging current**
Output voltage adjustment range	22÷29V DC
Ripple voltage	20mVp-p
Battery charging current	0,4A
Short-circuit protection SCP	200% ÷ 250% of PSU power - current limitation and/or fuse F_{BAT} damage in the battery circuit (fuse-element replacement required) Automatic return
Overload protection OLP	110% ÷ 150% (@25ºC÷65ºC) of PSU power - limitation by the PTC resettable fuse, manual restart (disconnection of the DC output circuit)
Overvoltage protection OVP	U>33V disconnection of the output voltage (AUX+ disconnection), automatic return U> 29V fault indication
Battery circuit protection SCP and reverse polarity connection	F3,15A- current limitation, F_{BAT} fuse (in case of a failure, fuse-element replacement required)
Deep discharge battery protection UVP	U<20V (± 0,5V) – disconnection of battery terminal
Tamper protection: - TAMPER - indicates unwanted opening of the enclosure	- microswitch, NC contacts (enclosure closed), 0,5A@50V DC (max.)
Technical outputs: - EPS; output indicating AC power failure	- OC type: 50mA max. Normal operation: L state (0V), failure: hi-Z state, - delay time 0s÷1h (+/-20%) – jumper selectable **T_{AC}**
- PSU; output indicating no DC power/PSU failure	- OC type: 50mA max. Normal operation: L state (0V), failure: hi-Z state,
- APS; output indicating battery failure	- OC type, 50mA max. Normal operation: L state (0V), failure: hi-Z state
LED indication	LEDs: AC/DC power status, failure
Acoustic indication	piezoelectric indicator 75dB/0,3m, switchable via jumper
Operating conditions	II environmental class,-10 °C÷40 °C
Enclosure	Steel plate DC01, thickness: 0,7mm, colour: RAL 9003
Dimensions	W=230 H=300 D+D_1=92+8 mm [+/-2 mm] W_1=235, H_1=305 [+/-2 mm]
Net/gross weight	3,5kg / 3,8kg
Fitting battery	2x7Ah/12V (SLA) max. 180x165x85mm (WxHxD) max 
Closing:	Cheese head screw (at the front),
Declarations, warranty	CE, 5 year from the production date
Notes:	The enclosure does not adjoin the assembly surface so that cables can be led. Convectional cooling.