

- PRECISE** : Switching power supply offering a ripple <math><3\text{mV rms}</math>.
- UNIVERSAL** : 12 settings in 2 V steps with  $\pm 1$  V adjustment range.
- COMPLETE** : 12 or 24 V lead-acid battery charger function.
- PRACTICAL** : ON/OFF switch, charger position and status indicators.
- PROTECTED** : against short circuits and reverse polarity.
- RESISTANT TO SHOCK** : Polycarbonate case.



## 60 WATTS

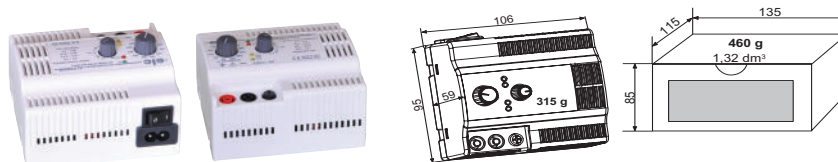
5 V to 29 V

2,5 A to 24 V

3,5 A to 12 V

4 A to 5 V

and lead-acid battery  
charger 12 V or 24 V



## Specifications

### Voltage

- Floating outputs on 4 mm safety sockets.
- Output voltage : adjustable from 5 to 29 V by 12-position switch, and fine adjustment  
switch positions : 6, 8, 10, 12, 14, 16, 18, 20, 22, 24, 26, 28 Volts  
fine adjustment range :  $\pm 1$  Volt, whatever the switch setting  
12 and 24 V lead-acid battery charger positions identified by two LED indicators
- Accuracy :  $\pm 1\%$
- Regulation : <math>< 50\text{ mV}</math> at 5 V @ 4 A and <math>< 10\text{ mV}</math> at 29 V @ 2,1 A for a load variation from 0 to 100%.  
<math>< 1\text{ mV}</math> at 29 V @ 2,1 A and <math>< 4\text{ mV}</math> at 5 V @ 4 A for a line change from -10 to +10%.
- Ripple : <math>< 3\text{ mV rms}</math> including:  
<math>< 3\text{ mV}</math> peak to peak of the 100 kHz signal  
<math>< 4\text{ mV}</math> peak to peak of the 100 kHz signal  
<math>< 10\text{ mV}</math> peak to peak of switching transients
- Internal resistance : <math>< 3\text{ m}\Omega</math>.
- Hold-up time : 25 ms at half load and 12 ms at full load. (190 V line input)
- Indicators : Green LED indicator: "power supply operating"  
Yellow LED indicator: "12 V and 24 V charger position"  
Red LED indicator: "Status, output fuse broken"

### Current

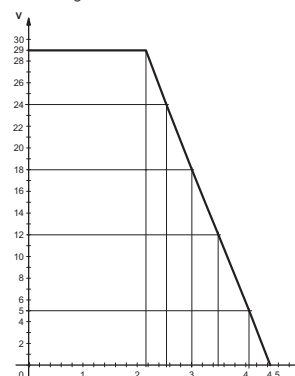
- Max I : 4,2 A in short circuit condition  
4 A to 5 V  
3,5 A to 12 V  
2,5 A to 24 V  
2,1 A to 29 V

### Charger of the batterie

- Rated capacity of the lead-acid batteries with elctrolyte free: 35 Ah for 12 V and 20 Ah for 24 V.
- Minimum capacity of the lead-acid batteries sealed: 10 Ah for 12 V and 7 Ah for the 24 V.  
(In all the cases, to refer to the note of the batteries manufacturer)

### Power

- A linear function of voltage from 60 W to 20 W (29 to 5 Volts).



### Protection

- Short circuit protection, by current limit.
- Against overcurrent on main input, by fuse.
- Battery reverse polarity protection by output fuse.

### Other specifications

- Safety : Classe II, double insulation, according to EN 61010-1 and EN 60335-2-29.
- EMC : Complies with EN 61326-1, performance criteria B, and EN 55011, ISM Group I, Class B.
- Protection level : IP 30.
- Input voltage : 190 to 264 Volts, 50/60 Hz.
- Mains input : C8 socket with CEI320 C7 removable cable (2 poles double insulation).
- Power consumption : 71 W max.
- ON/OFF control : toggle switch
- Dielectric strength : 3000 VAC between input and output.
- Presentation : Polycarbonate case.