EPS - Datasheet

Series EPS/MP

The microprocessor-controlled power supplies of the »EPS/MP« series from EPS Electronic Power Supplies are particularly suitable for test systems and industrial controls due to their rather compact 19" plug-in housings with 1 and 2 height units.

High output currents with 0-160A at i.e. 0-15V DC and high output voltages with 0-1200V DC are available. The Power Supplies can operate in Constant Current, Voltage, Resistance and Power mode. This can also be used to run a UI, UIP, UIR mode, and thus, for example, a PV characteristic curve can be simulated (MPPT EN50530). Any output characteristics can be started via the script control of the memory card (SD card as an option). A data logger can also log the actual values. The combination of programmable controller and data logger creates a self-sufficient "stand-alone" test system.

Actual values, setpoints and status are clearly displayed on a graphical display...

For remote control via PC or PLC, the power supply has a rear RS232 interface as standard as well as a galvanically isolated analog interface.

Optionally, a USB, RS485, GPIB or Ethernet interface are available.

The devices also offer the option of parallel connection (Master/Slave) in share-bus operation for uniform current distribution as standard.

A soft interlock is also integrated, which enables controlled shutdown of the device.

Further options are »EPS/MP-ATE« without front control, an output characteristic according to specifications, a programmed 12V/24V starting curve »EPS/MP-KFZ12/24« and various input voltage ranges.

Energy efficiency: High efficiency, Stand-by switch, temperature controlled fans

Scope of delivery: Power Supply Unit Operation Manual Mains Cable (CEE) Software



EPS - Datasheet

Series EPS/MP

EPS/MP-112001 Laboratory Power Supply



EPSMP-1U

General data

| Operation modes CV. CC. CR. CP Mains 90-264 VAC Input frequency 47-63Hz Power factor Display LCD Voltage accuracy Voltage Stability Load Voltage Stability Mains Response time Voltage Current Accuracy Current Stability Load Output Current Limitation Overvoltage category Overheat protection CV. CC. CR. CP 90-264 VAC 17-63Hz 47-63Hz 40-1% 4-63Hz 40-1% 4-2mV 4-2mV 4-2mS 4-2mS 4-2mA 4-2mA 4-2mA 4-3mA 4-3mA | Technology | Switching |
|--|----------------------------|----------------|
| Input frequency 47-63Hz Power factor >0,98 Display LCD Voltage accuracy <=0,1% Voltage Stability Load <0,05% Voltage Stability Mains <=0,1% +2mV Response time Voltage <2ms Current Accuracy <=0,05% Current Stability Load ±0.1% +2mA Output Current Limitation Standard Overvoltage category 2 | Operation modes | CV. CC. CR. CP |
| Power factor >0,98 Display LCD Voltage accuracy <=0,1% Voltage Stability Load <0,05% Voltage Stability Mains <=0,1% +2mV Response time Voltage <2ms Current Accuracy <=0,05% Current Stability Load ±0.1% +2mA Output Current Limitation Standard Overvoltage category 2 | Mains | 90-264 VAC |
| Display Voltage accuracy Voltage Stability Load Voltage Stability Mains Response time Voltage Current Accuracy Current Stability Load Output Current Limitation Overvoltage category LCD Voltage <=0,1% <p>40,05% 2ms 2ms Current Stability Load ±0.1% +2mA Output Current Limitation Standard Overvoltage category 2</p> | Input frequency | 47-63Hz |
| Voltage accuracy<=0,1%Voltage Stability Load<0,05% | Power factor | >0,98 |
| Voltage Stability Load<0,05%Voltage Stability Mains<=0,1% +2mV | Display | LCD |
| Voltage Stability Mains<=0,1% +2mVResponse time Voltage<2ms | | <=0,1% |
| Response time Voltage <2ms Current Accuracy <=0,05% Current Stability Load ±0.1% +2mA Output Current Limitation Standard Overvoltage category 2 | | <0,05% |
| Current Accuracy <=0,05% Current Stability Load ±0.1% +2mA Output Current Limitation Standard Overvoltage category 2 | | <=0,1% +2mV |
| Current Stability Load ±0.1% +2mA Output Current Limitation Standard Overvoltage category 2 | | <2ms |
| Output Current Limitation Standard Overvoltage category 2 | | <=0,05% |
| Overvoltage category 2 | | ±0.1% +2mA |
| | | Standard |
| Overheat protection Standard | Overvoltage category | 2 |
| | Overheat protection | Standard |
| Isolation In-/Output 3000V DC | | 3000V DC |
| Isolation Output/Enclosure 2000V | Isolation Output/Enclosure | 2000V |
| Protection class 1 | Protection class | 1 |
| Parallel operation Standard | | Standard |
| Current sharing Standard | Current sharing | Standard |
| Cooling Fan | Cooling | Fan |
| Operation temperature 0-50°C | Operation temperature | 0-50°C |
| Storage temperature -2070°C | | -2070°C |
| Humidity <80% n.c | Humidity | <80% n.c |
| Attitude <2000m | Attitude | <2000m |



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Series **EPS/MP**

Design 19 inch

Standards EN 61000-6-4/2, EN61010-1, EN50530

Power fail Standard
Output Preset Standard
Memory 5 Profile

Interfaces

| Analog Isolation | Standard |
|--------------------|---------------------|
| Accuracy Interface | 0,05%+2mV |
| USB Interface | Option EPS/MP-USB |
| RS232 Interface | Standard |
| RS485 Interface | Option EPS/MP-RS485 |
| GBIP Interface | Option EPS/MP-IEEE |
| Ethernet Interface | Option EPS/MP-LAN |
| Software | Software |

Technical data

| Output Voltage | 0-1200 VDC |
|--------------------------|-----------------|
| Output Current | 0-1 A |
| Output Power | 0-1200 W |
| Efficiency | <92% |
| Ripple U | <0,05% rms typ. |
| | |
| Dimensions in mm (WxHxD) | 19" x 44 x 440 |
| Weight | 6,0 kg |
| Order code | 200132 |

Options

| Option 1 | Customer specific output curve EPS/MP-OPT |
|----------|--|
| Option 2 | Car starting curve 12V programmed EPS/MP-KFZ12 |
| Option 3 | SD Memory card slot EPS/MP-SD |
| Option 4 | Without frontpanel EPS/MP-ATE |
| Option 5 | Warranty extension 2/3/5 years EPS/G2A/G3A/G5A |
| Option 6 | Safety Covers for In-/Output EPS/MP-SC |



EPSMP-2U



EPS - Datasheet
Series EPS/MP

Subject to modification without notice, errors and omissions excepted

EPS Stromversorgung GmbH Electronic Power Supplies Alter Postweg 101, 86159 Augsburg/Germany

Tel.: +49 (0) 821 570451-0 E-mail: sales@eps-germany.de www.eps-germany.de