



## EPS - Datasheet

### Series E/PS 10000 2U

EPS's Electronic Power Supplies »E/PS 10000-2U« series programmable power supplies are especially suitable for test systems and industrial controls, but also for laboratories and repair shops, due to their compact construction in a 19" enclosure with 2 height units (2U). DC output voltages between 0-60V (SELV) and 0-1500V, output currents between 0-6A and 0-120A and output power ratings of 0-1500W/3000W are available.

All models are controlled by microprocessors for fast and exact measurement and display of actual values. Setpoints and actual values, status displays and messages are clearly displayed on an intuitive 5" TFT touch panel. The devices feature a manually callable, An HMI operated visual depiction of the temporal run of the actual values of voltage, current and power, called the GRAPH, is possible.

For remote control the devices are provided as standard with Ethernet, USB port on the back as well as a galvanically isolated analog interface. Via optional plug-in interface modules, other digital interfaces such as Profibus, ProfiNet, Modbus TCP, CAN, CANopen, EtherCAT or RS232 can be added. These enable the devices to be connected to standard industrial buses simply by replacing or adding a small module. The configuration, if necessary at all, is simple. Thus the power supplies may, for example, be operated with other power supplies or even other types of equipment or controlled by a PC or PLC, all using the digital interfaces.

The data recording can be done on USB stick (logging). All interfaces are isolated to the unit with 1000V DC (up to 360V output) and with 1500V DC (more than 500V output).

In addition, the devices offer as standard the possibility for parallel connection in Share bus operation for constant current sharing plus a genuine master-slave connection with totaling of the slave units is also provided as standard. Using this operating mode, up to 64 devices can be connected to form a system that offers an increased total output of up to 192 kW.

The devices are CE, UL as well as CSA certified.

Further options are the calibration with protocol, warranty extension and 19" racks.

Energy efficiency: Auto-ranging, high efficiency, temperature-controlled fans

Scope of delivery:

Power Supply Unit

Test report

Mains cord Euro,UK, US and/or Swiss plug (depending on destination)

Share-bus plug

2x Plug for Remote Sense

Set DC terminal cover

Terminal cover sense

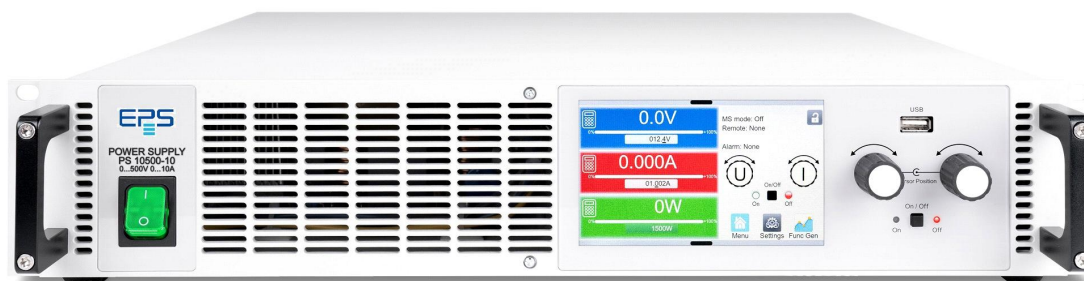
Cable tie for strain relief

USB cable 1,8m

USB-Stick with documentation and Software

## E/PS 10500-20 2U Laboratory Power Supply

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E/PS 10000 2U

### General data

Behavior	Unidirectional
Technology	Switching
Operation modes	CV. CC. CP
Mains	208/220V/230V/240V AC +-10% 1ph., 110V/120V derati
Input frequency	45-65Hz
Power factor	>0,99
Display	TFT Touch Panel 5"
Voltage resolution	0,1 V
Voltage accuracy	<=0,05% fs
Voltage Stability Load	<0,05% (0-100%)
Voltage Stability Mains	<0,01% (+-10%)
Response time Voltage	<1,5ms (10-100%)
Rise time Voltage	max 20ms (10-90%)
Current Resolution	0,001 A
Current Accuracy	<=0,1% fs
Current Stability Load	<0,1% (0-100%)
Current Stability Mains	<0,01% (+-10%)
Rise time Current	max.10ms (10-90%)
Output Current Limitation	Standard
Power Accuracy	<1%
Overvoltage category	2
Overheat protection	Standard
Isolation In-/Output	3750V DC
Isolation Output/Enclosure	neg.+1500VDC, Pos.+2000VDC max.
Protection class	1

Series E/PS 10000 2U

Parallel operation	Master-Slave
Current sharing	Standard
Cooling	Fan
Operation temperature	0-50°C
Storage temperature	-20...70°C
Humidity	<80% n.c
Attitude	<2000m
Design	19 inch
Standards	EN/UL/CSA-C22.2 61010-1,EN55011 cl.B,EN61326-1
Power fail	Standard
Output Preset	Standard
Memory	5 Presets
Capacity	240µF

**Interfaces**

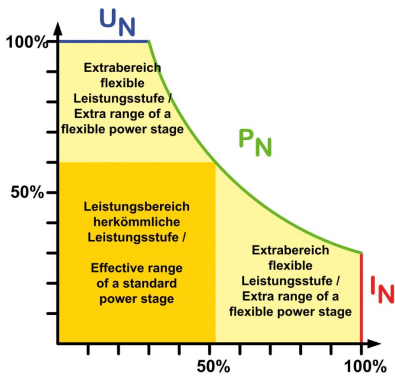
Analog Isolation	Standard
Accuracy Interface	0-10V <=0,2%, 0-5V <=0,4%
USB Interface	Standard
RS232 Interface	Option EPS/IF-AB R
CAN Interface	Opt.EPS/IF-AB-CAN/O
Profibus	Option EPS/IF-AB PB
Ethernet Interface	Standard, Opt.IF-ETH1P/2P
Ethercat Interface	Option EPS/IF-AB-ECT
Software	Standard EPS/PC, Option EPS/MC

**Technical data**

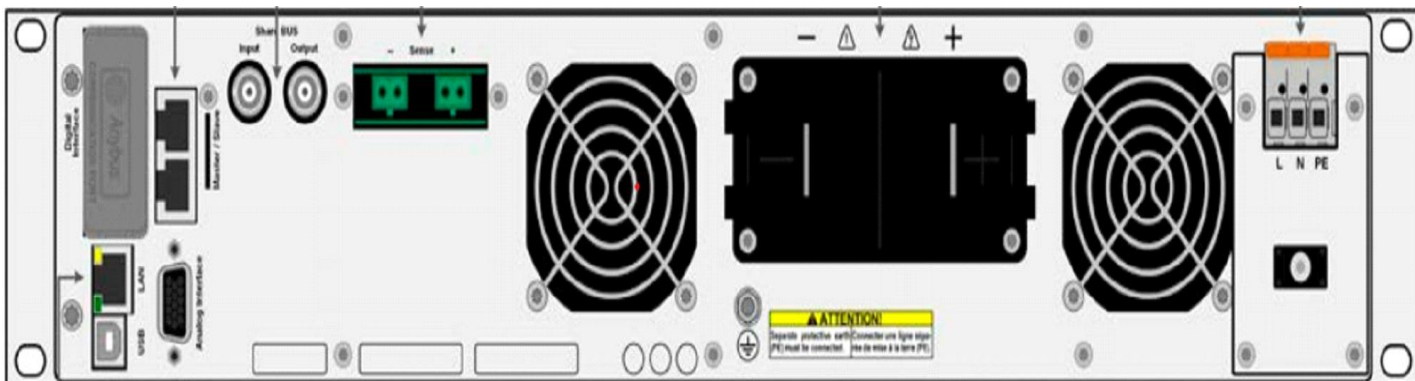
Output Voltage	0-500 VDC
Output Current	0-20 A
Output Power	3000W/1500W derating
Input Current	16A
Efficiency	95%
Ripple U	500 mVpp(20Mhz)/40 mVrms(300k)
Ripple I	1,5mArms
Resistance Adjustment Range 1	1-1500 Ohm
Remote Sensing	Standard
Dimensions in mm (WxHxD)	19" x 89 x 462
Weight	12,7 kg
Order code	200043

**Options**

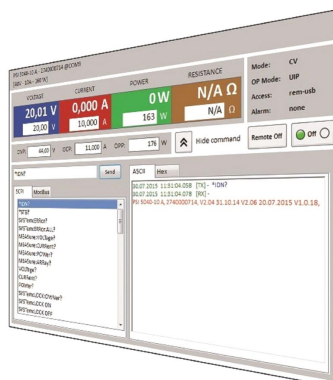
Option 1	Calibration with protocoll EPS/I10000 CAL
Option 2	Extended Warranty 2 / 3 / 5 years EPS/Gx
Option 3	Modbus Interface 1/2 Port EPS/IF-AB MB1P/2P
Option 5	EPS/BNC Cable Share-Bus connection cable
Option 6	EPS/SL 4x 2x AWG Master-Slave patch cable



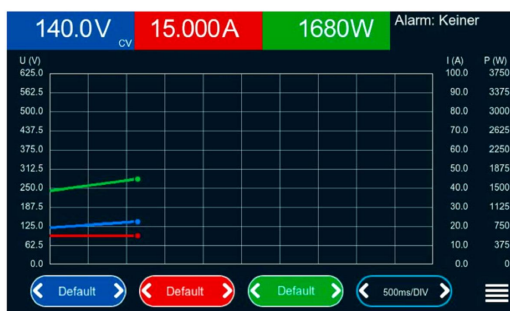
Autoranging



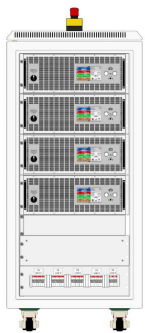
E/PS 10000-2U rear



EPS/PC\_Software



EPS 10000 Graph (HMI)



E\_PS 1200\_Cabinet front 120kW

Subject to modification without notice, errors and omissions excepted

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