



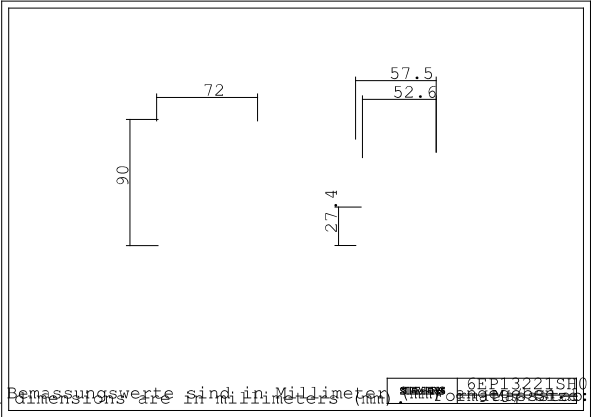
LOGO!POWER 12 V STABILIZED POWER SUPPLY INPUT:
100-240 V AC (110-300 V DC) OUTPUT: 12 V/4.5 A DC

Technical specifications

Product	LOGO!Power
Power supply, type	12 V/4.5 A
Input	
Input	1-phase AC or DC
Rated voltage value V_{in} rated	100 ... 240 V
Voltage range	85 ... 264 V
Input voltage / at DC	110 ... 300 V
Wide-range input	Yes
Overvoltage resistance	$2.3 \times V_{in}$ rated, 1.3 ms
Mains buffering at I_{out} rated, min.	40 ms
Mains buffering	at $V_{in} = 187$ V
Rated line frequency	50 / 60 Hz
Rated line range	47 ... 63 Hz
Input current / at nominal level of the input voltage 120 V	1.13 A
Input current / at nominal level of the input voltage 230 V	0.61 A
Switch-on current limiting (+25 °C), max.	55 A
I^2t , max.	3 A ² ·s
Built-in incoming fuse	internal
Protection in the mains power input (IEC 898)	Recommended miniature circuit breaker: from 16 A, characteristic B or from 10 A, characteristic C

Output	
Output	Controlled, isolated DC voltage
Rated voltage Vout DC	12 V
Total tolerance, static $\pm$	3 %
Static mains compensation, approx.	0.1 %
Static load balancing, approx.	1.5 %
Residual ripple peak-peak, max.	200 mV
Residual ripple peak-peak, typ.	10 mV
Spikes peak-peak, max. (bandwidth: 20 MHz)	300 mV
Spikes peak-peak, typ. (bandwidth: 20 MHz)	70 mV
Adjustment range	10.5 ... 16.1 V
Product feature / output voltage adjustable	Yes
Output voltage setting	via potentiometer
Status display	Green LED for output voltage OK
On/off behavior	No overshoot of Vout (soft start)
Startup delay, max.	0.5 s
Voltage rise, typ.	10 ms
Rated current value Iout rated	4.5 A
Current range	0 ... 4.5 A
• Note	4.5 A up to +55 °C, 3.1 A up to +70 °C
delivered active power / typ.	50 W
Parallel switching for enhanced performance	Yes
Numbers of parallel switchable units for enhanced performance	2
Efficiency	
Efficiency at Vout rated, Iout rated, approx.	85 %
Power loss at Vout rated, Iout rated, approx.	10 W
Closed-loop control	
Dynamic mains compensation (Vin rated ± 15 %), max.	0.2 %
Dynamic load smoothing (Iout: 10/90/10 %), Uout $\pm$ typ.	4 %
Load step setting time 10 to 90%, typ.	1 ms
Load step setting time 90 to 10%, typ.	1 ms
Protection and monitoring	
Output overvoltage protection	Yes, according to EN 60950
Current limitation, typ.	5.8 A
Characteristic feature of the output / short-circuit protected	Yes
Short-circuit protection	Constant current characteristic
Enduring short circuit current / Effective level / maximum	7 A
Overload/short-circuit indicator	-
Safety	

Primary/secondary isolation	Yes
Potential separation	Safety extra-low output voltage U _{out} acc. to EN 60950-1 and EN 50178
Protection class	Class II (without protective conductor)
CE mark	Yes
UL/CSA approval	Yes
UL/cUL (CSA) approval	cULus-listed (UL 508, CSA C22.2 No. 107.1), File E197259; cURus-recognized (UL 60950, CSA C22.2 No. 60950), File E151273
Explosion protection	ATEX (EX) II 3G Ex nA IIC T3; cCSAus (CSA E60079, UL 60079), Class I, Div. 2, Group ABCD, T4
FM approval	Class I, Div. 2, Group ABCD, T4
CB approval	Yes
Marine approval	GL, ABS
Degree of protection (EN 60529)	IP20
EMC	
Emitted interference	EN 55022 Class B
Supply harmonics limitation	not applicable
Noise immunity	EN 61000-6-2
Operating data	
Ambient temperature / in operation	-20 ... +70 °C
• Note	with natural convection
Ambient temperature / on transport	-40 ... +85 °C
Ambient temperature / in storage	-40 ... +85 °C
Humidity class according to EN 60721	Climate class 3K3, no condensation
Mechanics	
Connection technology	screw-type terminals
Connections / Supply input	L, N: 1 screw terminal each for 0.5 ... 2.5 mm ² single-core/finely stranded
Connections / Output	+, -: 2 screw terminals each for 0.5 ... 2.5 mm ²
Connections / Auxiliary	-
Width / of the housing	72 mm
Height / of the housing	90 mm
Depth / of the housing	55 mm
Installation width	72 mm
Mounting height	130 mm
Weight, approx.	0.25 kg
Product feature / of the housing / housing for side-by-side mounting	Yes
Type of mounting / wall mounting	No
Type of fixing / cap rail mounting	Yes
Type of mounting / S7-300 rail mounting	No

Installation	Snap onto DIN rail EN 60715 35x7.5/15
Other information	Specifications at rated input voltage and ambient temperature +25 °C (unless otherwise specified)
	

letzte Änderung: Jul 25, 2012