

Model number

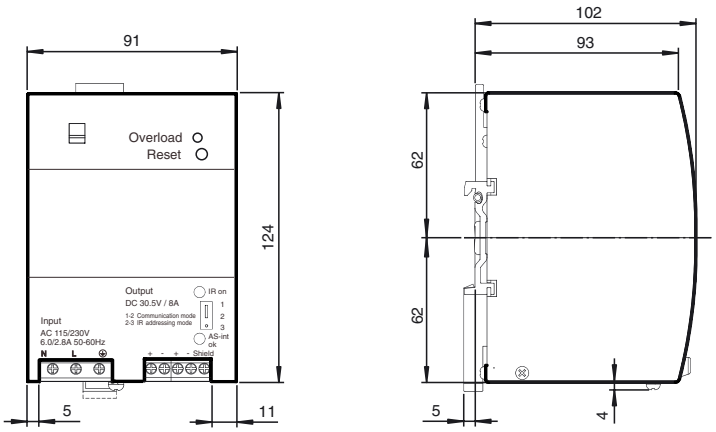
VAN-115/230AC-K16

AS-Interface power supply

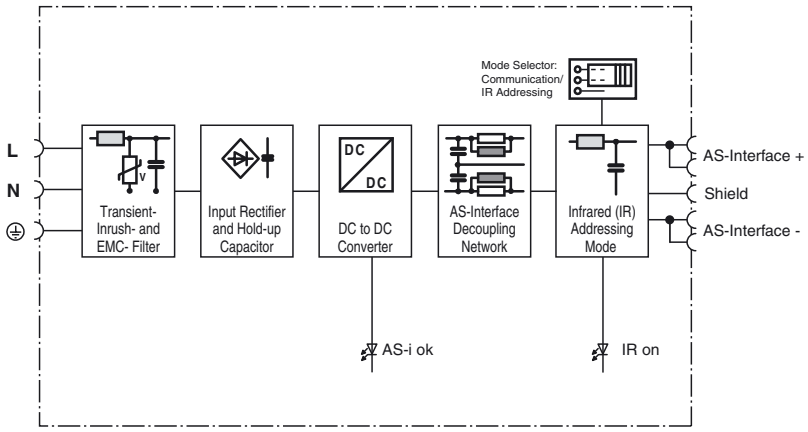
Features

- AS-Interface certificate
- PELV/SELV
- LED operating display
- 8 A output load
- 115 V AC / 230 V AC switchable
- AS-Interface data decoupling
- Overload protection using FUSE mode

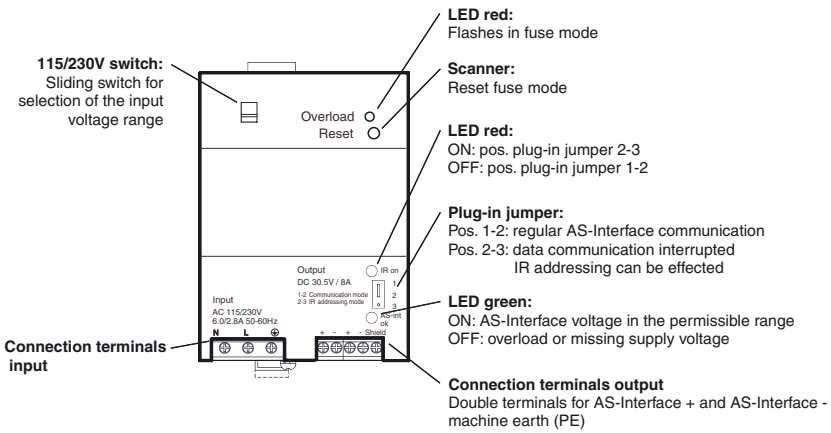
Dimensions



Electrical connection



Indicating / Operating means



Release date: 2011-07-13 10:45 Date of issue: 2011-07-13 129377_eng.xml

Technical data

General specifications		
UL File Number		E223176
Indicators/operating means		
Reset push-button switch		FUSE mode reset
Power selection switch		changeover switch for 115 V AC/230 V AC
LED Overload		red LED, flashes in the FUSE mode
LED IR on		red LED: ON: Plug-in jumper position 2-3 OFF: Plug-in jumper position 1-2
Plug-in jumper		Position 1-2: Communication Mode Position 2-3: IR addressing
LED AS-i ok		operating display; LED green
Electrical specifications		
Fusing		T8A/250 V AC HBC (not accessible)
Capacity factor		> 0.5
Rated operational voltage	U_e	nominal: 100 ... 120 V AC/220 ... 240 V AC (front end selectable) permissible: 85 ... 132 V AC/184 ... 264 V AC/230 ... 375 V DC
Rated operational current	I_e	6,0 A (Switch position 115 V) 2.8 A (Switch position 230 V)
Supply frequency		47 ... 63 Hz or DC
Efficiency		typ. 92 % (at 230 V AC/8 A)
Overvoltage protected		limited to max. 55 V
Output		
Short-circuit protection/overload		FUSE Mode (2 ... 5 s current, then trips)
Current limit		> 8.4 A
Current		8 A
Voltage		30.55 V DC ± 3 %
Electrical isolation		Overvoltage category III
Residual ripple		≤ 50 mV_{ss} (500 kHz bandwidth, 50-Ω-measurement with ohmic load)
Short-circuit current		12 ... 25 A (max. 5 s)
Standard conformity		
Electromagnetic compatibility		emitted interference in accordance with EN 50081-2 class B (EN 55011, EN 55022) noise immunity in accordance with EN 61000-6-2, EN 61000-4-2 to EN 61000-4-6, EN 61000-4-11
Ambient conditions		
Ambient temperature		-10 ... 70 °C (14 ... 158 °F) (Measured 25 mm below the device) from 60° C 6W/°C power recovery necessary
Storage temperature		-25 ... 85 °C (-13 ... 185 °F)
Pollution Degree		2
Mechanical specifications		
Protection degree		IP20 according to EN 60529
Protection class		1 (IEC 60536); Protective conductor connection necessary
Connection		Connection terminals, max. conductor cross-section flexible: 0.5 ... 4 mm^2 fixed: 0.5 ... 6 mm^2 stripped length 7 mm, connector sleeves are permissible
Material		
Housing		metal
Mass		approx. 890 g

Function

The primary pulsed DIN rail power pack is used for special power supply of AS-Interface networks via a two-wire line. It supplies a fully loaded AS-Interface system with an output current of 8 A.
The voltage input range of the device can be selected on the front side. This makes it possible to operate the device on all single-phase power supply voltages commonly used worldwide.
Certification of the device according to international and various national standards allows for worldwide usage.

Safe operation using FUSE mode:
To protect against overload and excess temperature, the device has a FUSE mode (electronically simulated fuse), for permanent shutoff of the output in the event of failure. This turns off the device in the event of overload, short circuit or excess temperature, thus protecting the AS-Interface cable and the attached components. A flashing LED indicates that the FUSE mode has been triggered. Turning the device on again requires deliberately pressing a Reset button on the front side of the unit. This prevents unwanted startup from occurring.

Operation without the AS-Interface string:
This AS-Interface power pack has an inductive output. For operation without the AS-Interface string (for example lab measurements) we recommend connecting a 470 µF/35 V capacitor between AS-Interface + and AS-Interface -. Standard commercial laboratory loads frequently tend to oscillate and together with the data decoupling form a resonance that exceeds the permitted modulation voltage.

Accessories

AS-Interface Power Calculator
AS-Interface Power supply and network checking utility

Release date: 2011-07-13 10:45 Date of issue: 2011-07-13 129377_eng.xml

Subject to modifications without notice
Copyright Pepperl+Fuchs
Pepperl+Fuchs Group www.pepperl-fuchs.com
USA: +1 330 486 0001 fa-info@us.pepperl-fuchs.com
Germany: +49 621 776-4411 fa-info@pepperl-fuchs.com
Singapore: +65 6779 9091 fa-info@sg.pepperl-fuchs.com
PEPPERL+FUCHS SENSING YOUR NEEDS