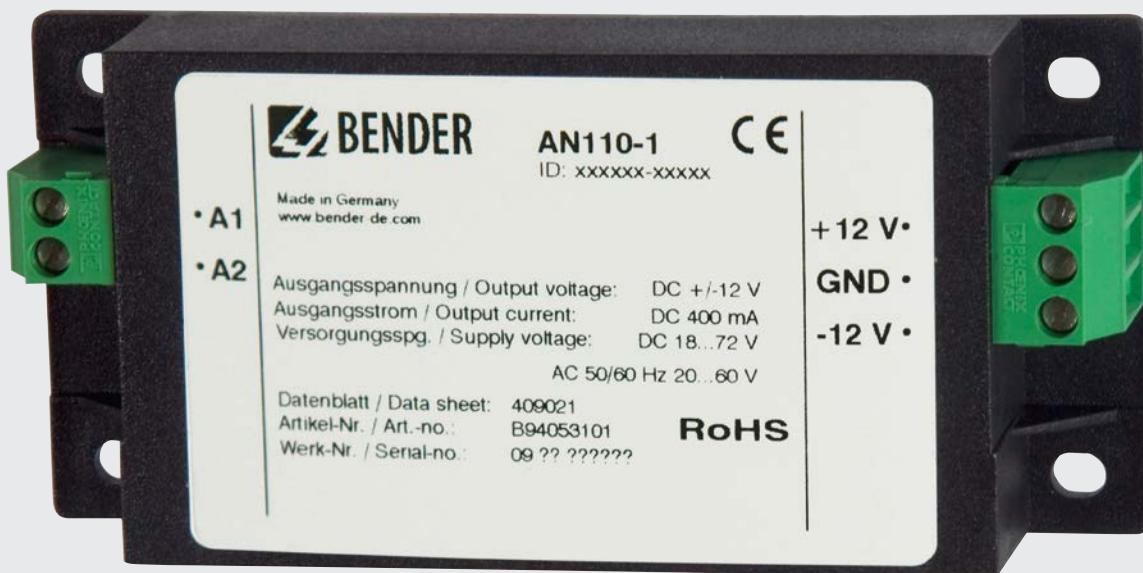


Power supply unit AN110

Power supply unit for measuring current transformers



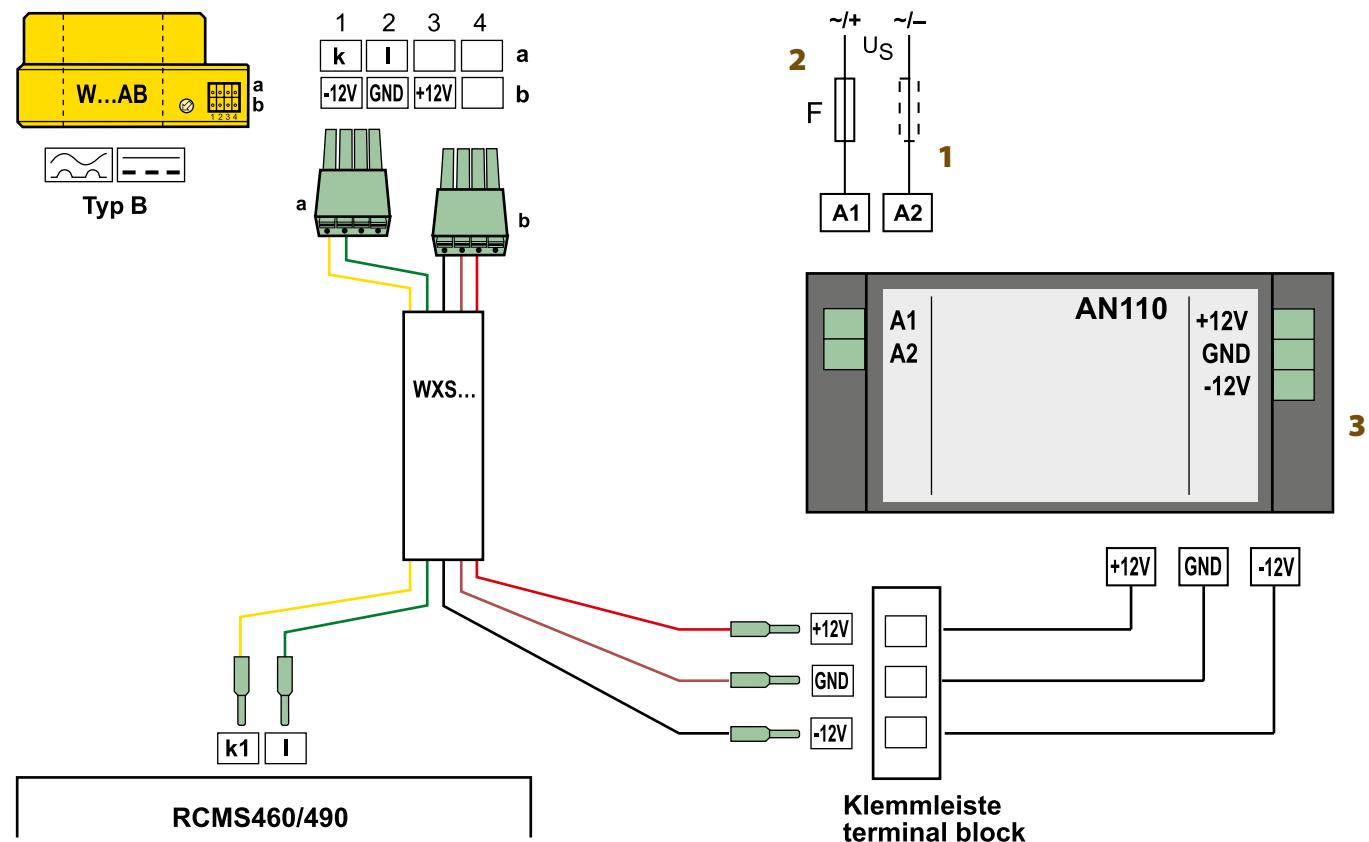


Power supply unit AN110

Product description

The power supply unit AN110 is used to supply W...AB series measuring current transformers. The CTs are to be supplied with a symmetrical supply voltage of DC ± 12 V using a pre-fabricated WXS... series connecting cable.

The power supply unit is capable of supplying up to six W...AB series measuring current transformers. When the supply voltage is smaller than 30 V, the output power is reduced, so that only five measuring current transformers can be connected.

Wiring diagram

1 - Supply voltage U_S

2 - Short-circuit protection of U_S :

AN110-1: 2A time-lag fuse recommended
AN110-2: 1A time-lag fuse recommended

3 - Symmetrical output voltage

Colour coding for the conductors of the WXS... connecting cable

k1 = yellow, I = green, -12 V = black,
GND = brown, +12 V = red

Technical data**Insulation coordination acc. to IEC 60664-1/IEC 60664-3****AN110-1:**

Rated insulation voltage	AC 100 V
Rated impulse voltage/pollution degree	2.5 kV/3
Protective separation (reinforced insulation) between	(A1, A2) - (+12 V, GND, -12 V)
Voltage test acc. to IEC 61010-1	3.3 kV

AN110-2:

Rated insulation voltage	AC 250 V
Rated impulse voltage/pollution degree	4 kV/3
Voltage test acc. to IEC 61010-1	3.3 kV

Supply voltage**AN110-1:**

Supply voltage U_S	AC 20...60 V; DC 18...72 V*
Frequency range U_S	DC, AC 50...60 Hz
Power consumption	$\leq 30 \text{ VA}$

AN110-2:

Supply voltage U_S	AC 90...264 V; DC 100...353 V
Frequency range U_S	DC, AC 50...60 Hz
Power consumption	$\leq 30 \text{ VA}$

Output power supply unit

Output voltage U_{out}	DC $\pm 12 \text{ V}$, short-circuit proof
Operating range	11.5...12.5 V
Rated output	12 W*

Cable length

Recommended cable WXS100...WXS1000 (see suitable system components)

Environment/EMC

EMC	DIN EN 61000-6-3 DIN EN 61000-6-2
Operating temperature AN110-1	-25...+65 °C
Derating 50 °C or higher AN110-1	5 %/K
Operating temperature AN110-2	-25...+65 °C
Climatic class acc. to IEC 60721:	
Stationary use (IEC 60721-3-3)	3K5 (except condensation and formation of ice)
Transport (IEC 60721-3-2)	2K3 (except condensation and formation of ice)
Long-time storage (IEC 60721-3-1)	1K4 (except condensation and formation of ice)
Classification of mechanical conditions acc. to IEC 60721:	
Stationary use (IEC 60721-3-3)	3M4
Transport (IEC 60721-3-2)	2M2
Long-term storage (IEC 60721-3-1)	1M3

Connection

Connection	screw-type terminals
Connection	
rigid/flexible/conductor sizes	0.2...4/0.2...2.5 mm ² (AWG 24...12)
Multi-conductor connection (2 conductors of the same cross section)	
rigid/flexible	0.2...1.5 mm ²
Stripping length	8...9 mm
Tightening torque	0.5...0.6 Nm

Other

Operating mode	continuous operation
Mounting	see dimension diagram
Degree of protection, internal components (DIN EN 60529)	IP65
Degree of protection, terminals (DIN EN 60529)	IP20
Enclosure material	Polybutylenterephthalat (PBT)
Screw mounting	4 x M4
DIN rail mounting acc. to	IEC 60715
Flammability class	UL94 V-0
Operating manual	TBP409021
Weight	$\leq 200 \text{ g}$

* When the supply voltage is smaller than 30 V, the output power is reduced, so that only five measuring current transformers can be connected.

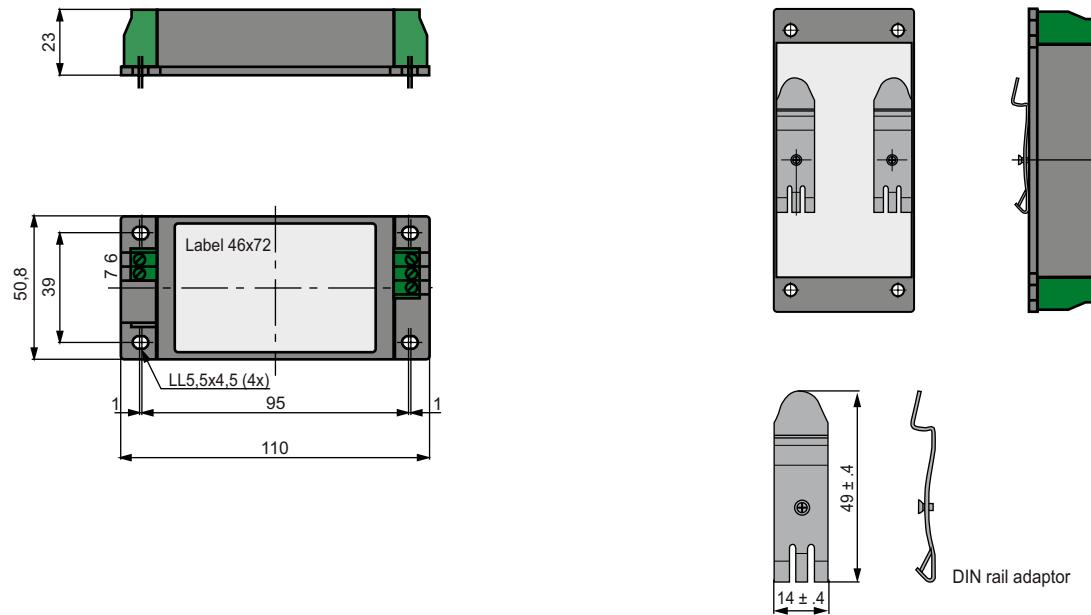
Ordering information

Output voltage	Supply voltage U_S		Type	Art. No.
	AC	DC		
$\pm 12 \text{ V}$	20...60 V	18...72 V	AN110-1	B94053101
	90...264 V	100...353 V	AN110-2	B94053102

Connecting cables for W...AB measuring current transformers

Length	Type	Art.-Nr.
1 m	WXS-100	B98080506
2.5 m	WXS-250	B98080507
5 m	WXS-500	B98080508
10 m	WXS-1000	B98080509

Dimension diagram



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