TOZ 120VUC 48VDC0,1A

Weidmüller Interface GmbH & Co. KG
Klingenbergstraße 26
D-32758 Detmold
Germany

www.weidmueller.com

Product image

Similar to illustration

- 1 NO contact (Bipolar transistor)
- 6.4 mm wide
- 0.1 A DC output current
- Unique multi-voltage input from 24 to 230 V UC
- Input voltages from 12 V DC to 230 V UC with coloured marking: AC: red, DC: blue, UC: white

General ordering data

Version	TERMSERIES, Solid-state relay, Rated control voltage: 120 V UC ±10 % , Rated switching voltage: 3... 48 V DC, Continuous current: 100 mA, Tension-clamp connection
Order No.	1127090000
Type	TOZ 120VUC 48VDC0,1A
GTIN (EAN)	4032248908561
Qty.	10 pc(s).

Creation date September 16, 2022 12:23:56 AM CEST

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Technical data

Dimensions and weights

Depth	87.8 mm	Depth (inches)	3.457 inch
Height	90.5 mm	Height (inches)	3.563 inch
Width	6.4 mm	Width (inches)	0.252 inch
Net weight	31 g		

Temperatures

Storage temperature	-40 °C...70 °C	Operating temperature	-20 °C...60 °C
Humidity	5-95% relative humidity, T_u = 40°C, without condensation		

Probability of failure

MTTF	1,200 Years

Environmental Product Compliance

REACH SVHC	Lead 7439-92-1	SCIP	9e2cbc49-76d9-4611-b8ec-5b4f549a0aa9

Rated data UL

Ambient temperature (operational), max.	60 °C	Connection cross-section AWG, min.	AWG 26
Connection cross-section AWG, max.	AWG 14	Type of conductor	rigid copper conductor, flexible copper conductor
Pollution severity level	2		

Control side

Rated control voltage	120 V UC ±10 %	Nominal control current	5 mA AC (±30 %), 3 mA DC (±30 %)
Power rating	0.48 VA	Pull-in/drop-out voltage, typ.	82 V / 65 V AC 86 V / 74 V DC
Status indicator	Green LED	Protective circuit	Rectifier
Coil voltage of the replacement relay deviating from the rated control voltage	Yes	Coil voltage of the replacement relay	60 V DC

Load side

Rated switching voltage	3... 48 V DC	Continuous current	100 mA
Rated switching current	100 mA	Switch-on delay	< 6.5 ms
Switch-off delay	< 10 ms	Voltage drop at max. load	≤ 1 V
Leakage current	< 10 µA	Min. switching current	500 µA
Short-circuit-proof	No	Protective circuit, load side	Free-wheeling diode
Contact type	1 NO contact (Bipolar transistor)	max. switching frequency (AC control voltage)	3 Hz
max. switching frequency (DC control voltage)	3 Hz		

General data

Rail	TS 35
Test button available	No
Colour	black

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UL94 flammability rating component	Component	Housing
	UL94 flammability rating	V-0
	Component	Retaining clip
	UL94 flammability rating	V-0

Insulation coordination

Rated voltage	300 V	Pollution severity	2
Surge voltage category	III	Clearance and creepage distances for control side - load side	≥ 5.5 mm
Dielectric strength for control side - load side	2.5 kV_{eff}	Dielectric strength to mounting rail	4 kV_{eff} / 1 Min.
Impulse withstand voltage	6 kV (1.2/50 µs)	Protection degree	IP20

Further details of approvals / standards

Certificate No. (DNVGL)	TAA00001E5	Certificate no. (cULus)	E141197

Connection data

Wire connection method	Tension-clamp connection	Stripping length, rated connection	8 mm
Clamping range, rated connection	1.5 mm²	Clamping range, min.	0.14 mm²
Clamping range, max.	2.5 mm²	Wire connection cross section AWG, min.	AWG 26
Wire connection cross section AWG, max.	AWG 14	Wire cross-section, solid, min.	0.14 mm²
Wire cross-section, solid, max.	2.5 mm²	Wire cross-section, solid, min. (AWG)	AWG 26
Wire cross-section, solid, max. (AWG)	AWG 14	Wire connection cross section, finely stranded, min.	0.14 mm²
Wire connection cross section, finely stranded, max.	2.5 mm²	Wire cross-section, finely stranded, min. (AWG)	AWG 26
Wire cross-section, finely stranded, max. (AWG)	AWG 14	Wire connection cross-section, finely stranded with wire-end ferrules DIN 46228/4, min.	0.14 mm²
Wire connection cross-section, finely stranded with wire-end ferrules DIN 46228/4, max.	1.5 mm²	Conductor cross-section, flexible, AEH (DIN 46228-1), min.	0.14 mm²
Conductor cross-section, flexible, AEH (DIN 46228-1), max.	1.5 mm²	Twin wire-end ferrules, min.	0.5 mm²
Twin wire-end ferrules, max.	1 mm²	Blade size	0.6 x 3.5 mm
Gauge to IEC 60947-1	A1, B1		

Classifications

ETIM 6.0	EC001504	ETIM 7.0	EC001504
ETIM 8.0	EC001504	ECLASS 9.0	27-37-16-04
ECLASS 9.1	27-37-16-04	ECLASS 10.0	27-37-16-04
ECLASS 11.0	27-37-16-04	ECLASS 12.0	27-37-16-04

Approvals

Approvals

ROHS	Conform
UL File Number Search	UL Website
Certificate no. (cULus)	E141197

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Technical data

Downloads

Approval/Certificate/Document of Conformity	EU Konformitätserklärung / EU Declaration of Conformity
Engineering Data	CAD data – STEP
Engineering Data	EPLAN, WSCAD
User Documentation	Beipackzettel / Package Insert – multilingual
Catalogues	Catalogues in PDF-format
Brochures	

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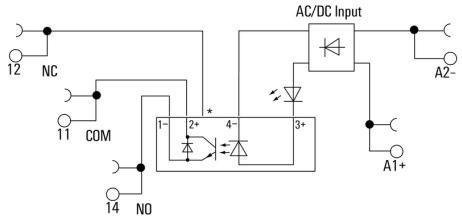
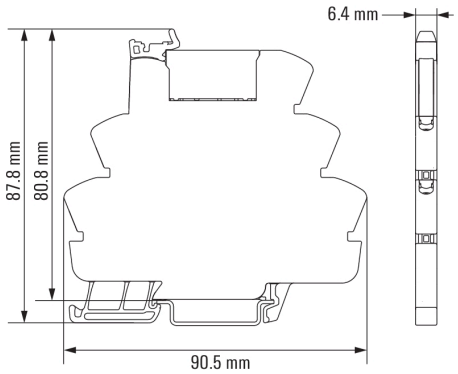
Drawings

Wiring diagram



*Contact is assembled in socket but not used with solid-state relays

Dimensional drawing



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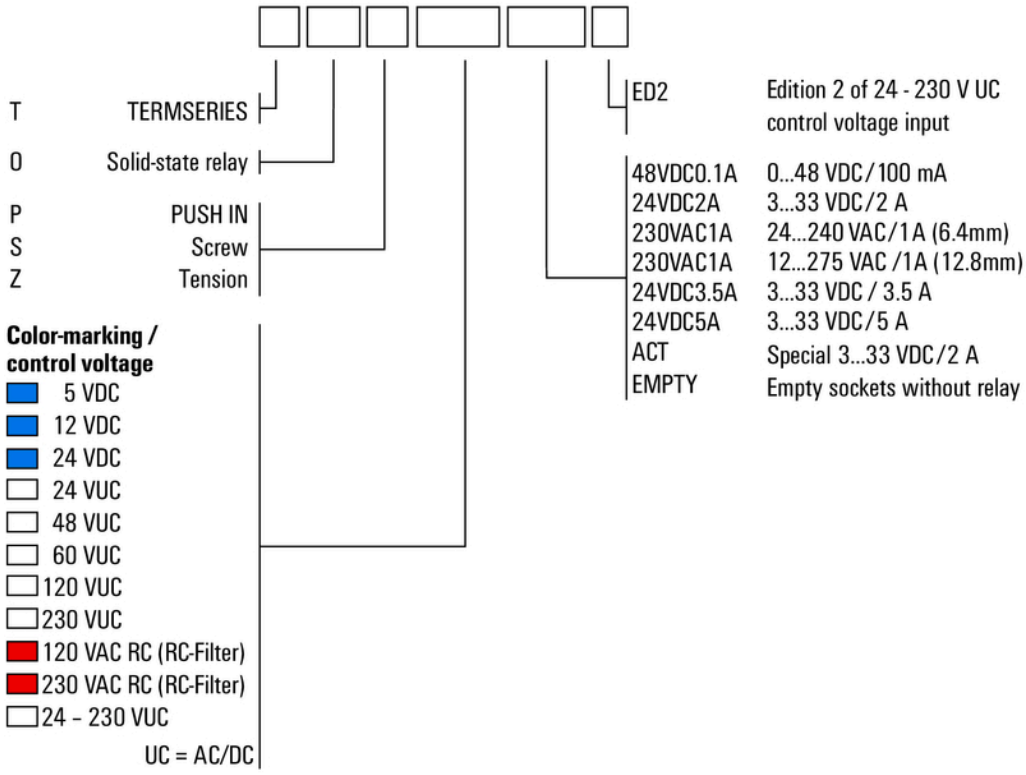
Drawings

Miscellaneous

Type code TERMSERIES solid-state relay versions



Type codes