

TERMSERIES
TOZ 24VDC 48VDC0,1A**Weidmüller Interface GmbH & Co. KG**

Klingenbergstraße 16

D-32758 Detmold

Germany

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www.weidmueller.com



TERMSERIES complete solid-state relay modules 3 to 48 V DC 0.1 A output versions consisting of a solid-state relay and a base with AC/DC/UC input; available in different designs:

- With tension-clamp connection
- In 6.4 mm width
- Optionally with multiple-voltage input: 24 to 230 V UC
- With various protective circuits in the input (free-wheel diode, RC element)
- Illuminated ejection lever

General ordering data

Type	TOZ 24VDC 48VDC0,1A
Order No.	1127050000
Version	TERMSERIES, solid-state relays, 1 NO contact (Bipolar transistor), Rated control voltage: 24 V DC $\pm 20\%$, Rated switching voltage: 0...48 V DC, Continuous current: 100 mA, Tension clamp connection
GTIN (EAN)	4032248908752
Qty.	10 pc(s).

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Technical data
Dimensions and weights

Width	6.4 mm	Width (inches)	0.252 inch
Height	90.5 mm	Height (inches)	3.563 inch
Depth	87.8 mm	Depth (inches)	3.457 inch
Net weight	29.3 g		

Temperatures

Humidity	5–95% rel. humidity, $T_u = 40^\circ\text{C}$, no condensation	Operating temperature, max.	60 °C
Operating temperature, min.	-20 °C	Storage temperature, max.	70 °C
Storage temperature, min.	-40 °C	Operating temperature	-20 °C...60 °C
Storage temperature	-40 °C...70 °C		

Probability of failure

MTTF	3,765 Years
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Control side

Rated control voltage	24 V DC $\pm 20\%$	Nominal control current	10 mA DC $\pm 20\%$
Power rating	280 mW	Cut-in / dropout voltage	14.5 V / 11.5 V DC
Cut-in / dropout current	4.8 mA / 3.2 mA DC	Status indicator	Green LED
Protective circuit	Free-wheel diode, Reverse polarity protection	Coil voltage of the replacement relay deviating from the rated control voltage	No
Coil voltage of the replacement relay	24 V DC		

Load side

Rated switching voltage	0...48 V DC	Continuous current	100 mA
Rated switching current	100 mA	Switch-on delay	< 50 μs
Switch-off delay	< 600 μs	Voltage drop at max. load	$\leq 1\text{ V}$
Leakage current	< 10 μA	Min. switching current	500 μA
Short-circuit-proof	No	Protective circuit, load side	Free-wheel diode
max. switching frequency (DC control voltage)	300 Hz		

Contact data

Contact type	1 NO contact (Bipolar transistor)
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General data

Mounting rail	TS 35	Colour	Black
UL 94 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	$\geq 5.5\text{ mm}$
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

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Technical data**Further details of approvals / standards**

Standards	DIN EN 50178	Certificate no. (cULus)	E141197
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Connection data

Wire connection method	Tension clamp connection	Stripping length, rated connection	8 mm
Clamping range, rated connection	1.5 mm ²	Clamping range, min.	0.14 mm ²
Clamping range, max.	2.5 mm ²	Wire connection cross section AWG, min.	AWG 26
Wire connection cross section AWG, max.	AWG 14	Wire cross-section, solid, min.	0.14 mm ²
Wire cross-section, solid, max.	2.5 mm ²	Wire connection cross-section, finely stranded, min.	0.14 mm ²
Wire connection cross section, finely stranded, max.	2.5 mm ²	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 mm ²
Wire connection cross-section, finely stranded with wire-end ferrules DIN 46228/4, max.	1.5 mm ²	Conductor cross-section, flexible, AEH (DIN 46228-1), min.	0.14 mm ²
Conductor cross-section, flexible, AEH (DIN 46228-1), max.	1.5 mm ²	Twin wire-end ferrules, min.	0.5 mm ²
Twin wire-end ferrules, max.	1 mm ²	Blade size	0.6 x 3.5 mm
Gauge to IEC 60947-1	A1, B1		

Rated data UL

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

Classifications

ETIM 4.0	EC001504	ETIM 5.0	EC001504
ETIM 6.0	EC001504	eClass 6.2	27-27-09-90
eClass 7.1	27-27-09-90	eClass 8.1	27-27-09-90
eClass 9.0	27-27-09-90	eClass 9.1	27-37-16-04

Product information

Descriptive text ordering data	Spare solid-state relay Type: SSS 24 V/24 V 0.1A DC Orderno.: 4061180000
Descriptive text technical data	Accessories and dimensional drawings: refer to the TERMSERIES Accessories page.

Approvals

Approvals



ROHS

Conform

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Technical data

Downloads

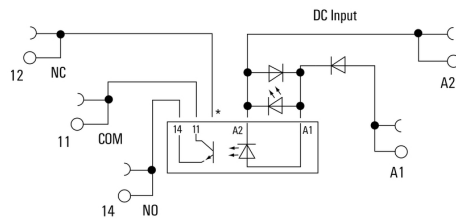
Approval/Certificate/Document of Conformity	DE_PA_5600_160229_002.pdf
Brochure/Catalogue	CAT 4.2 ELECTR 18/19 EN
Engineering Data	EPLAN, WSCAD
User Documentation	Operating Instructions

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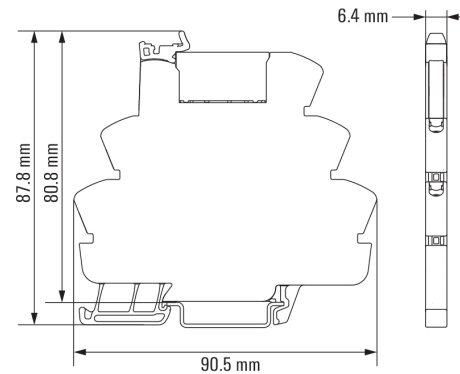
Drawings

Wiring diagram



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

Dimensional drawing

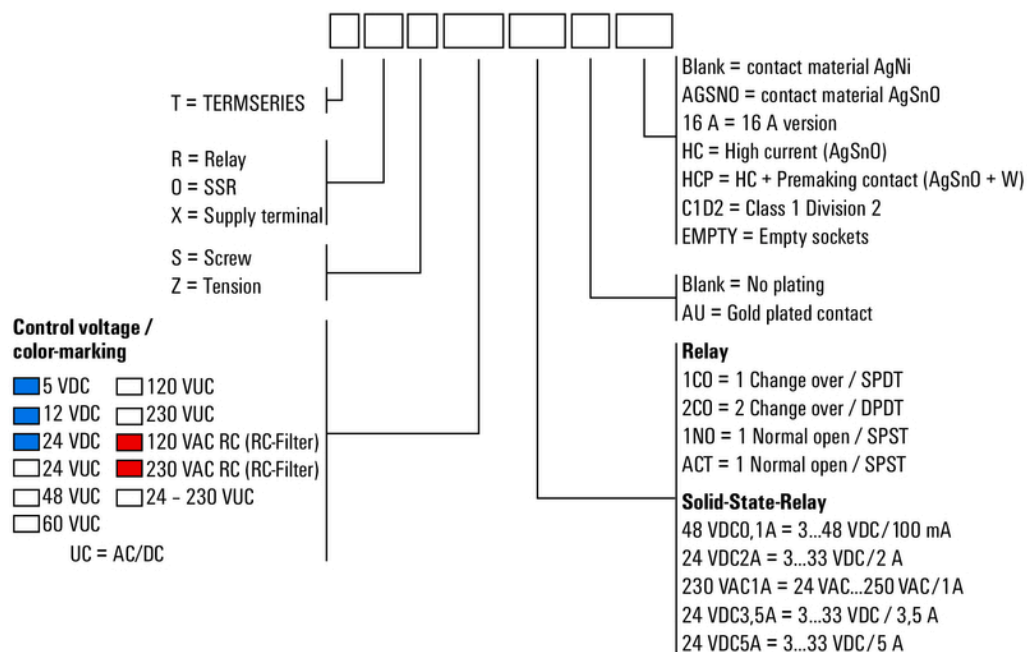


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Drawings

Miscellaneous



Type codes