

# Miniature solid-state relay - OPT-24DC/ 24DC/ 2 - 2966595

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Plug-in miniature solid-state relay, power solid-state relay, input: 24 V DC, output: 3 - 33 V DC/3 A

The illustration shows the version OPT-24DC/48DC/100

## Product Features

- Vibration and shock resistant
- RT III wash tight (comparable with IP67)
- Wear-free and durable
- Switching power of up to 24 V DC/5 A
- Zero voltage switch at AC output
- Can be soldered on PCB

## Key commercial data

<b>package_quantity</b>	10
<b>GTIN</b>	4017918130947

## Technical data

### Dimensions

<b>Width</b>	5 mm
<b>Height</b>	28 mm
<b>Depth</b>	15 mm

### Ambient conditions

<b>Ambient temperature (operation)</b>	-25 °C ... 60 °C
<b>Ambient temperature (storage/transport)</b>	-25 °C ... 70 °C

### Input data

<b>Nominal input voltage <math>U_N</math></b>	24 V DC
<b>Input voltage range in reference to <math>U_N</math></b>	0.8 ... 1.2
<b>Switching threshold "0" signal, voltage</b>	$\leq 10$ V
<b>Switching threshold "1" signal voltage</b>	$\geq 16$ V
<b>Typical input current at <math>U_N</math></b>	7 mA
<b>Typical response time</b>	20 $\mu$ s (at $U_N$ )
<b>Typical turn-off time</b>	300 $\mu$ s (at $U_N$ )
<b>Transmission frequency</b>	300 Hz

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## Technical data

### Output data

<b>Output voltage range</b>	3 V DC ... 33 V DC
<b>Limiting continuous current</b>	3 A (see derating curve)
<b>Maximum inrush current</b>	15 A (10 ms)
<b>Voltage drop at max. limiting continuous current</b>	≤ 150 mV
<b>Output circuit</b>	2-wire, floating
<b>Type of protection</b>	Protection against polarity reversal
<b>Type of protection</b>	Surge protection

### General

<b>Test voltage input/output</b>	2.5 kV (50 Hz, 1 min.)
<b>Mounting position</b>	any
<b>Assembly instructions</b>	In rows with zero spacing
<b>Operating mode</b>	100% operating factor
<b>Designation</b>	Standards/regulations
<b>Standards/regulations</b>	IEC 60664
<b>Standards/regulations</b>	EN 50178
<b>Standards/regulations</b>	IEC 62103
<b>Rated surge voltage / insulation</b>	Basic insulation
<b>Pollution degree</b>	2
<b>Surge voltage category</b>	III

## classifications

### eCl@ss

<b>eCl@ss 4.0</b>	27371102
<b>eCl@ss 4.1</b>	27371102
<b>eCl@ss 5.0</b>	27371001
<b>eCl@ss 5.1</b>	27371001
<b>eCl@ss 6.0</b>	27371604
<b>eCl@ss 7.0</b>	27371604
<b>eCl@ss 8.0</b>	27371604

### ETIM

<b>ETIM 2.0</b>	EC001504
<b>ETIM 3.0</b>	EC001504
<b>ETIM 4.0</b>	EC001504
<b>ETIM 5.0</b>	EC001504

### UNSPSC

<b>UNSPSC 6.01</b>	30211916
<b>UNSPSC 7.0901</b>	39121542
<b>UNSPSC 11</b>	39121542
<b>UNSPSC 12.01</b>	39121542

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## classifications

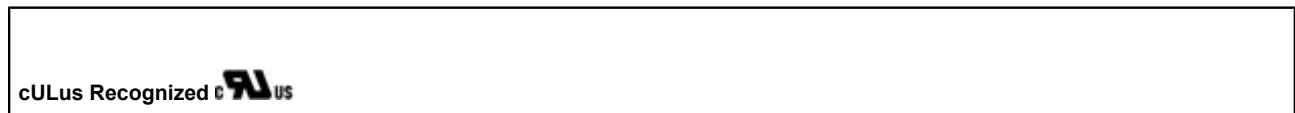
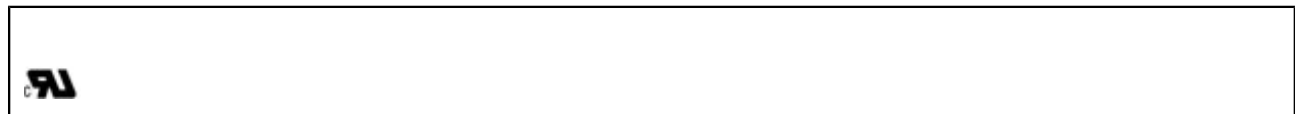
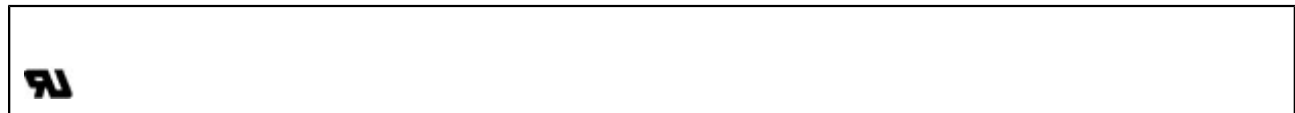
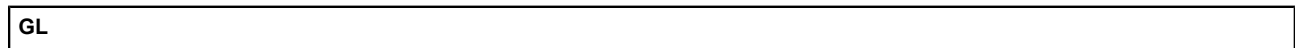
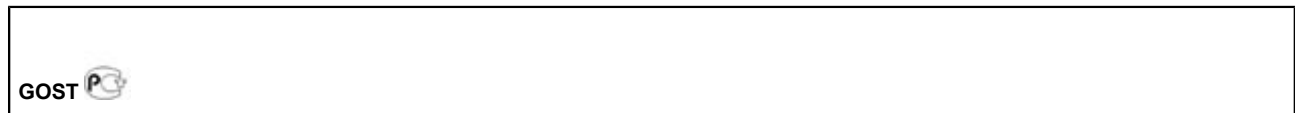
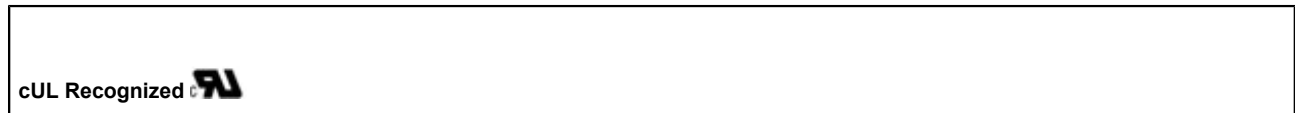
UNSPSC

UNSPSC 13.2	39121542
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## approvals

UL Recognized / cUL Recognized / GOST / GL / UL Recognized / cUL Recognized / cULus Recognized /

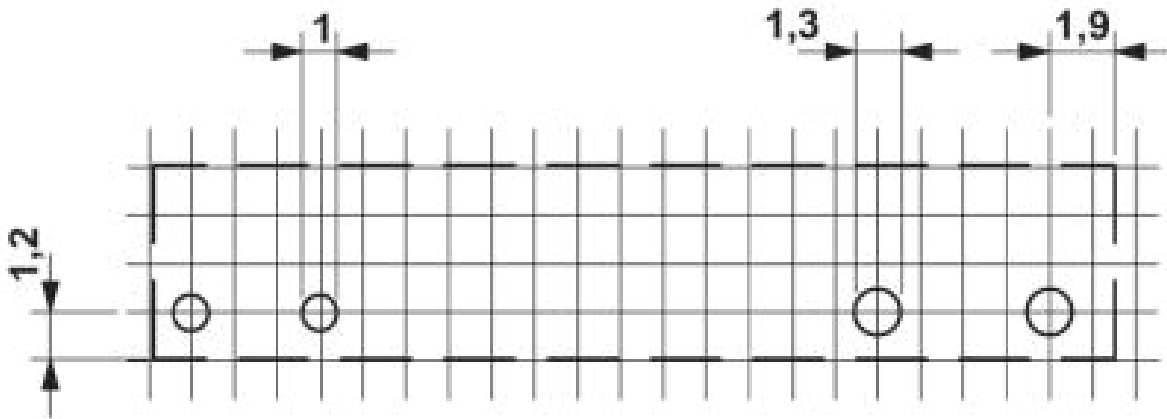
## Approval details



## Drawings

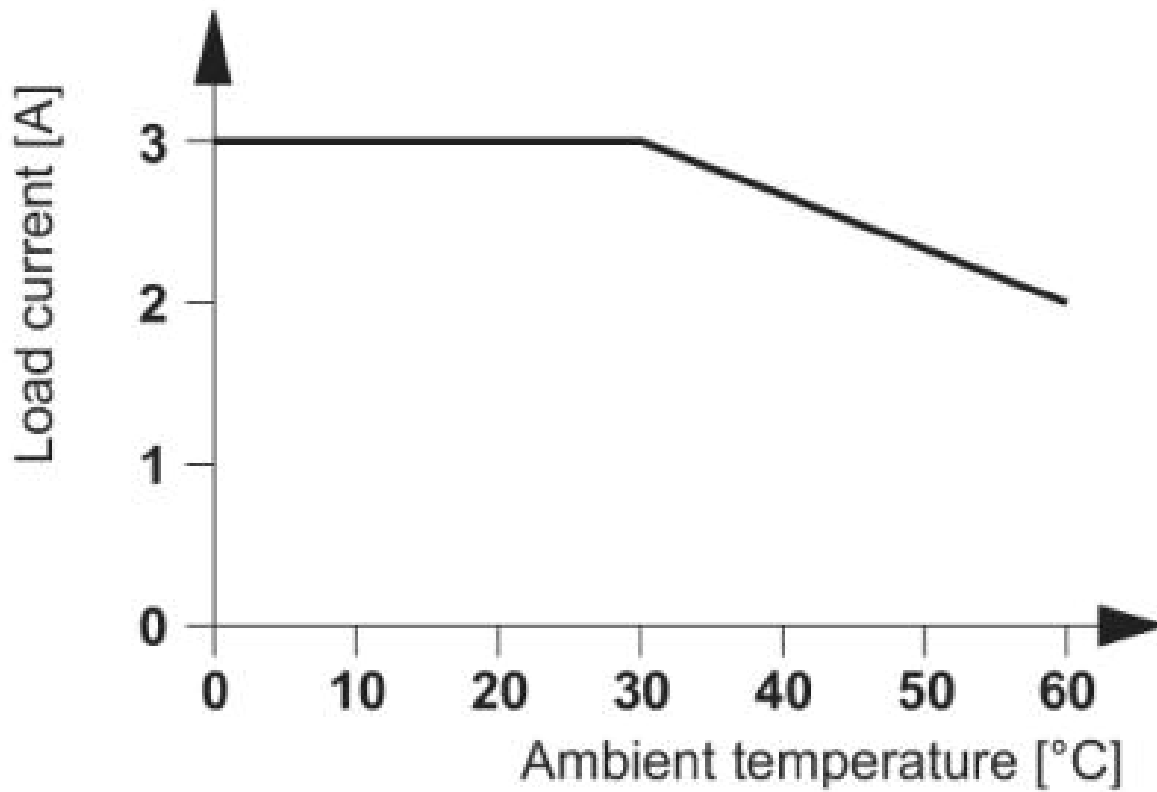
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Drilling diagram



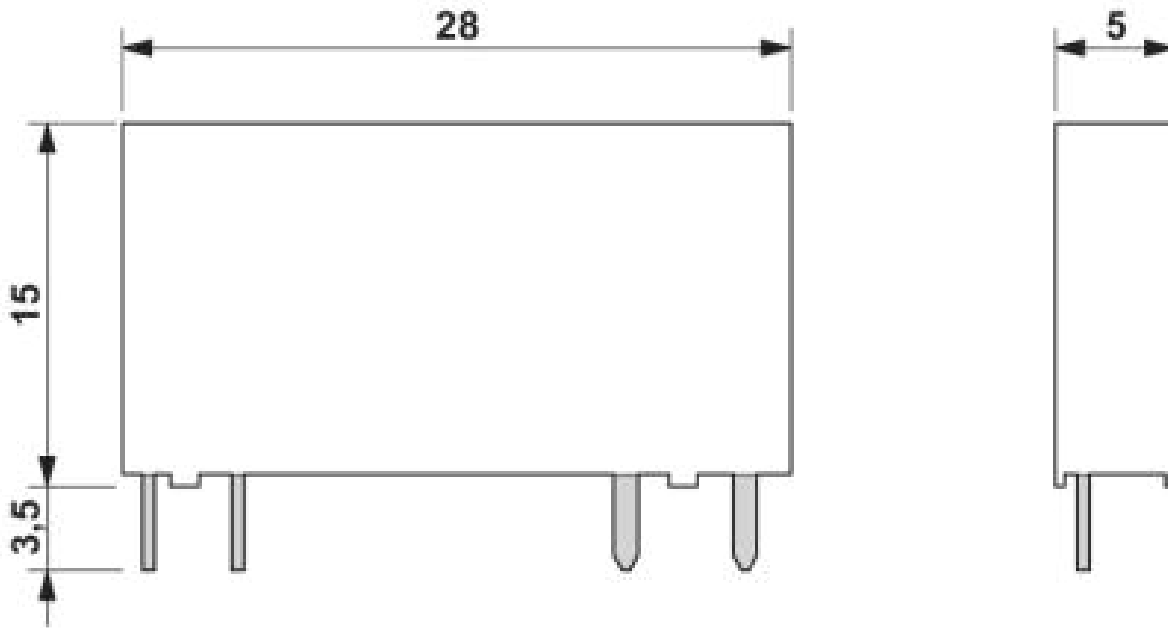
a = pitch division 1.25 mm and 1.27 mm

Diagram



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Dimensioned drawing



Circuit diagram

