

# MRI05T and MRI01T

## Monitoring current relay

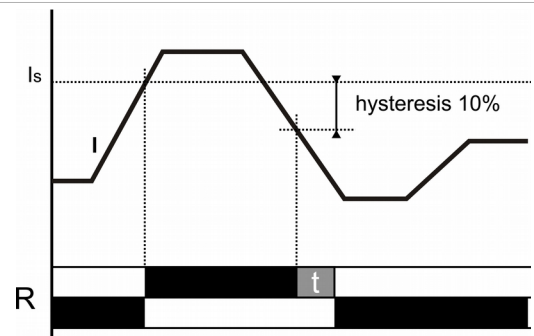
### 1. Device description

MRI05T and MRI01T relays controls DC or AC current signal connected to the terminals k(-) and l(+). Device can be set for current range from 0.5 A to 5 A (MRI05T) and 0.1 A to 1 A (MRI01T). Measuring part is galvanic isolated from the current connection terminal. Relay is equipped by timer for delay output reaction. MRI05T and MRI01T have one double-throw output contact 16 A.

Terminal description:	Terminal placement:	Connection diagram:
<ol style="list-style-type: none"> <li>1 Supply voltage</li> <li>2 Terminals k(-), l(+)</li> <li>3 Supply voltage indication</li> <li>4 Output indication</li> <li>5 Control current <math>I_s</math> setting</li> <li>6 Time set</li> <li>7 Outputs</li> </ol>		

### 2. Function

If the set current level is exceeded, output relay will make connection. If the measured current level goes under the set level minus fix hysteresis 10%, output relay will disconnect. Hysteresis reduces relay bouncing at threshold limit of current values. Position OFF disables current measurement, output is closed and yellow LED is off. Contact no. 16 – 15 is closed.



### 3. Signalization

U – On		Presence of power supply
U – Off		Supply voltage not present
R – On		Current > $I_s$ – contact: 15 – 18 closed
R – Off		Current < $I_s$ – contact: 15 – 16 closed

#### 4. Technical features

Parameter	Value
Supply voltage	89 ... 264 V <sub>AC</sub> (+10%, -15%)
Supply terminals	A1, A2
Current measuring terminals	k (-), l (+)
Current measuring range	0.5 ... 5 A (MRI05T) / 0.1 ... 1 A (MRI01T)
Time setting	0 ... 15 min
Maximum load capability of current terminal	7 A (MRI05T) / 2 A (MRI01T)
Power consumption	max. 1.5 VA
Number of functions	1
Supply voltage indication	green LED
Output indication	yellow LED
<b>Output parameters</b>	
Number and type of contacts	1x changeover contact
Nominal current	16 A
Switching power	max. AC 4000 VA
Trigger current	30 A
Nominal voltage / max. switched voltage	250 V <sub>AC</sub> / 440 V <sub>AC</sub>
Mechanical lifetime	3 x 10 <sup>7</sup> cycles
Electrical lifetime	1 x 10 <sup>5</sup> cycles (250 V <sub>AC</sub> , 16 A)
<b>Others</b>	
Working temperature	-20 ... +55 °C
Storage temperature	-40 ... +70 °C
Working position	any
Mounting	IEC 60715 (DIN 35)
Protection degree	IP 40 on panel / IP 20 terminals
Electrical strength	4 kV
Electrical strength of measuring/supply terminal	4 kV
Conductor rigid and flexible	0.2 ... 2.5 mm <sup>2</sup>
Weight	75 g
Dimensions	90 x 18 x 65 mm
Standards	IEC 60255, IEC 61010, IEC 61000



#### Warning

*If measured current of MRI05T is over 7 A (MRI01T over 2A) it can damage device!*