

TAR 22 Telephone connecting relay



Telephone connecting relay as a telephone accessory for connecting visual and audible devices for call signalling

Overview

The TAR 22 telephone connecting relay is used for call signalling purposes and is designed for applications in rough and harsh environments in industrial areas.

This telephone connecting relay is designed for use when a normal alert signal is not sufficient. It provides potential-free switching contacts for connection of signalling devices. The relay can be connected with up to two external devices, e.g. a signalling horn and a strobe light, which are actuated via call signal. The ringing break bridging may be set individually.

The TAR 22 connecting relay comprises an uncoated housing made of electrostatically conductive glass fibre-reinforced polyester. The housing consists of a box-shaped bottom containing the electronics insert. The lid is fitted with a peripheral seal and pressed to the housing bottom with four screws forming a connection compartment of protection class IP 66.

Features

- Degree of protection IP 66 in accordance with EN 60529
- Ambient temperature -40 °C to +70 °C

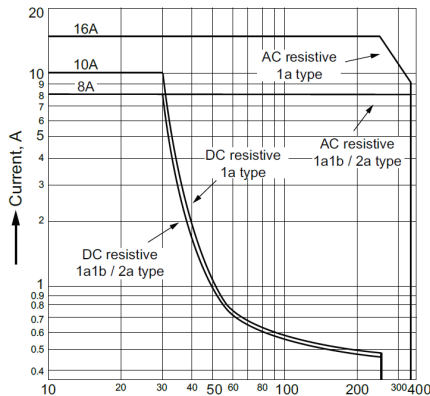
Technical data

Enclosure			
Material	Glass-fiber-reinforced polyester		
Dimensions (H/W/D)	75 x 190 x 75 mm		
Weight	approx. 1.1 kg		
Power			
Ringing AC voltage from the analog telephone network, TNV-3 electrical circuit U = AC 30 V to 100 V			
Cable entries			
2 x M20 x 1.5 1 dummy plug M20 x 1.5			
Ringing impedance			
≥ 8 kΩ (at 30 to 100 V / 20 to 68 Hz)			
Contact			
U _{max} = AC 250 V, I _{max} = 5 A (see operating instructions)			
Operating modes			
Relay contact function (terminals 4 and 6) can be set using the sliding switch: The contact always follows the ringing signal. After the ringing signal, i.e. during the subsequent break in ringing, the contact remains closed for the duration configured in the following setting (ringing break bypass)			
1 = ON => ringing break bypass approx. 1 sec. 2 = ON => ringing break bypass approx. 2 sec. 3 = ON => ringing break bypass approx. 3 sec. 1 to 3 = ON => ringing break bypass approx. 6 sec.			
The following combinations are possible:			
1	2	3	Break in ringing
ON	OFF	OFF	1 s
OFF	ON	OFF	2 s
OFF	OFF	ON	3 s
OFF	ON	ON	5 s
ON	ON	ON	6 s
OFF	OFF	OFF	9 s
Operating position			
Arbitrary			
Operating temperature			
-40 °C to +70 °C			
Degree of protection			
IP 66 in accordance with EN 60529			

Characteristic electrical data

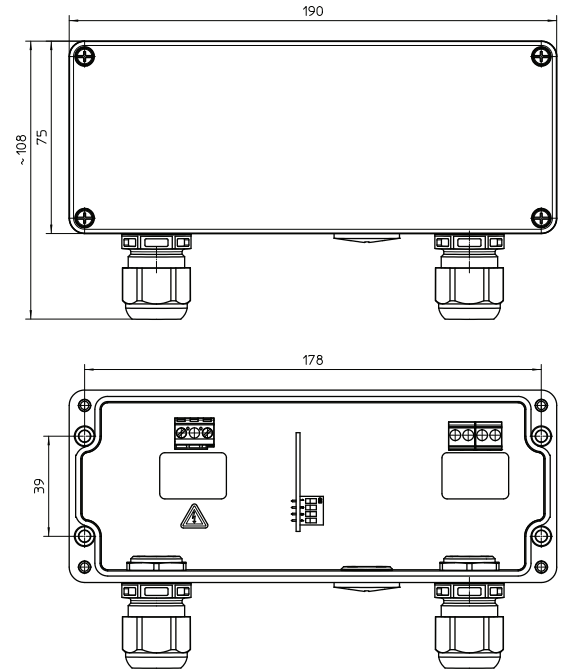
Telephone network	Terminals 7 and 8 in accordance with 9 and 10 Telephone network DC voltage max.: U _{DC_max} = 66 V Ringing AC voltage max.: U _{AC_max} = 100 V / 20 Hz to 68 Hz AC and DC voltage parts can be superimposed. Permissible conductor cross-sections are 0.2 to 4.0 mm ² rigid or 0.2 to 2.5 mm ² flexible
Potential-free relay contact	Terminals 4 and 6 Nominal switching capacity: 8 A at 250 V AC or 8 A at 30 V DC *) Minimum switching capacity: 100 mA or 5 V DC Maximum switching duty: 2000 VA or 240 W Maximum switching voltage: 250 V AC or 230 V DC *) Maximum switching current: 8 A *) From 30 V DC to 230 V DC, the permissible switching current decreases from 8 A to 0.45 A as shown in the following figure, curve "DC resistive 1a1b / 2a type"

1. Max. switching power

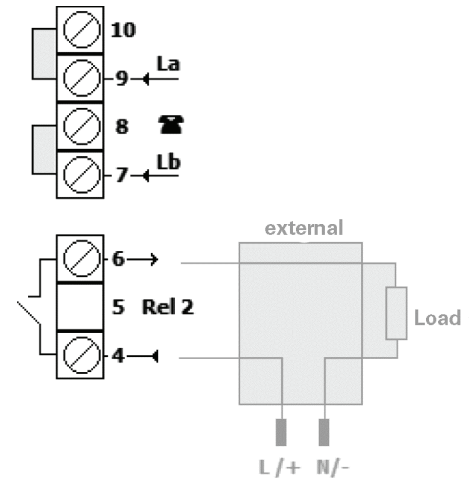


The telephone network is safely galvanically isolated from the potential-free relay contacts up to the maximum electrical parameters. The electrical parameters must not be exceeded as this may damage the device. This could hinder safe isolation between the telephone network and potential-free contacts. The contact circuit in the device is not protected against excess current.

General layout drawing
(all dimensions in mm)



Terminal diagram



Ordering data

Type	Designation	Article number
TAR 22	Telephone connecting relay	FHF 118 830 22