# CM-MPN.72S



#### **General Information**

CM-MPN.72S **Extended Product Type:** Product ID: 1SV/R750489R8300 EAN: 4016779851930

**Catalog Description:** CM-MPN.72S Three-phase monitoring relay 2c/o, 0,0.1-30s, L1-L2-L3=3x530-820VAC

Long Description: The CM-MPN.72S is a multifunctional relay from the CM three-phase monitors range. It

operates with a rated control supply voltage / three-phase measuring voltage of 530-820 V AC 50/60 Hz and has a 2 c/o (SPDT) output with contacts rated at 250 V / 4 A. This relay monitors all phase parameters such as over/undervoltage, phase unbalance and phase failure. The corresponding threshold values are adjustable. The CM-MPN.72S also offers selection of phase sequence monitoring, automatic phase sequence correction as well as an ON or OFF tripping delay. The output contacts can be configured as 1x2 c/o (SPDT) contacts (common signal) or 2x1 c/o (SPDT) contact (separate signal for over- and undervoltage thresholds) operation. The tripping delay is adjustable over a range of instantaneous to 30 s (0, 0.1-30 s). A sealable transparent cover for protection against unauthorized changes is available as accessory. The device offers screw connection technology with double-chamber cage connection terminals.

# Categories

Products » Low Voltage Products and Systems » Control Products » Electronic Relays and Controls » Three Phase **Monitors** 

## Ordering

**Minimum Order Quantity:** 1 piece **Customs Tariff Number:** 85364900 EAN: 4016779851930

### **Container Information**

Package Level 1 Width: 97 mm 109 mm Package Level 1 Height: Package Level 1 Length: 52.5 mm Package Level 1 Gross Weight: 0.249 kg Package Level 1 Units: 1 piece

# **Dimensions**

**Product Net Depth:** 104.8 mm **Product Net Height:** 85.6 mm **Product Net Weight:** 0.224 kg **Product Net Width:** 45 mm

# **Technical**

Measuring Range:

Standards: EN 50178 IEC/EN 61000-6-2

> IEC/EN 61000-6-3 (L-L) 530 ... 820 V AC

Rated Control Supply Voltage (U<sub>s</sub>): (L-L) 530 ... 820 V AC Rated Frequency (f): Supply Circuit 50/60 Hz

**Output:** 2 x 1 c/o or 1 x 2 c/o contacts, configurable

Time Range: 200 ms start-up delay

0 s or 0.1-30 s tripping delay (ON or OFF)

**Terminal Type:** Screw Terminals (230 V) 4 A

Rated Operational Current AC-12

(l<sub>e</sub>):

**Rated Operational Current AC-15** 

(l<sub>e</sub>):

(230 V) 3 A

**Rated Operational Current DC-12** 

(l<sub>e</sub>):

(24 V) 4 A

**Rated Operational Current DC-13** 

(l<sub>e</sub>):

(24 V) 2 A

**Minimum Switching Capacity:** 

24 V 10 mA

Rated Insulation Voltage (Ui):

Input Circuit / Output Circuit 1000 V Output Circuit 1 / Output Circuit 2 300 V

Rated Impulse Withstand Voltage

(U<sub>imp</sub>):

Input Circuit 8 kV Output Circuit 4 kV Degree of Protection: Housing IP50

Terminals IP20

Overvoltage Category:

**Pollution Degree:** 

**Short-Circuit Protective Devices:** Output Circuit NC - F Type Fuses 6 A

Output Circuit NO - F Type Fuses 10 A

**Electrical Durability:** AC-12 100000 cycle 30000000 cycle **Mechanical Durability:** 

Flexible with Ferrule 1x 0.5 ... 2.5 mm<sup>2</sup> **Connecting Capacity:** 

Flexible with Ferrule 2x 0.5 ... 1.5 mm<sup>2</sup> Flexible with Insulated Ferrule 1x 0.5 ... 2.5 mm<sup>2</sup> Flexible with Insulated Ferrule 2x 0.5 ... 1.5 mm<sup>2</sup>

Flexible 1x 0.5 ... 2.5 mm<sup>2</sup> Flexible 2x 0.5 ... 1.5 mm<sup>2</sup> Rigid 1x  $0.5 \dots 4 \, \text{mm}^2$ Rigid 2x 0.5 ... 2.5 mm<sup>2</sup>

**Tightening Torque:** 0.6 ... 0.8 N·m

Wire Stripping Length: 8 mm **Mounting Position:** Any

Mounting on DIN Rail: TH35-15 (35 x 15 mm Mounting Rail) acc. to IEC 60715

TH35-7.5 (35 x 7.5 mm Mounting Rail) acc. to IEC 60715

Function: Phase failure detection

Phase sequence monitoring Automatic phase sequence correction Over- and undervoltage monitoring Phase unbalance detection

### **Environmental**

**RoHS Status:** Following EU Directive 2011/65/EC

Operation -25 ... +60 °C **Ambient Air Temperature:** 

Storage -40 ... +85 °C

# **Technical UL/CSA**

Contact Rating UL/CSA: B300

Connecting Capacity UL/CSA: Flexible 1x 18-14 AWG

Flexible 2x 18-16 AWG Rigid 1x 20-12 AWG Rigid 2x 20-14 AWG

Tightening Torque UL/CSA: 7.08 in·lb

**Maximum Operating Voltage** 

UL/CSA:

Output Circuit 300 V AC

### Certificates and Declarations (Document Number)

Instructions and Manuals: 1SVC730530M0000 **CB Certificate:** CB\_DK-27946-UL **CCC Certificate:** CCC 2009010303326655 Data Sheet, Technical Information: 2CDC112177D0201 **Declaration of Conformity - CE:** 1SVD981014-0000

**EAC Certificate:** EAC RU C-DE.ME77.B.01012

**GL Certificate:** GL 37695-12HH **RMRS Certificate:** RMRS\_12.04009.250 **RoHS Information:** 1SVD981001-4400

### Classifications

E-nummer:	3860594
ETIM 4:	EC001441 - Phase monitoring relay
ETIM 5:	EC001441 - Phase monitoring relay
ETIM 6:	EC001441 - Phase monitoring relay
eClass:	7.0 27371803
Object Classification Code:	В

