

## General Information

<b>Extended Product Type:</b>	CM-ESS.2S
<b>Product ID:</b>	1SVR730831R1400
<b>EAN:</b>	4016779852210
<b>Catalog Description:</b>	CM-ESS.2S Voltage monitoring relay 2c/o, B-C=3-600VRMS, 220-240VAC
<b>Long Description:</b>	The CM-ESS.2S is a single-functional voltage monitoring relay from the CM single-phase monitors range. This monitoring relay operates with a rated control supply voltage of 220 - 240 V AC and has a 2 c/o (SPDT) output with contacts rated at 250 V / 4 A. It provides a RMS measuring principle for DC and AC voltages with 4 measuring ranges: 3-30 V, 6-60 V, 30-300 V and 60-600 V and works according to the open-circuit principle. The CM-ESS.2S is configurable for over- or undervoltage monitoring. The hysteresis is adjustable within a range of 3 to 30 % of the threshold value and 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 » Single Phase Monitors

## Ordering

<b>Minimum Order Quantity:</b>	1 piece
<b>Customs Tariff Number:</b>	85364900
<b>EAN:</b>	4016779852210

## Container Information

<b>Package Level 1 Width:</b>	97 mm
<b>Package Level 1 Height:</b>	109 mm
<b>Package Level 1 Length:</b>	30 mm
<b>Package Level 1 Gross Weight:</b>	0.204 kg
<b>Package Level 1 Units:</b>	1 piece

## Dimensions

<b>Product Net Depth:</b>	103.7 mm
<b>Product Net Height:</b>	85.6 mm
<b>Product Net Weight:</b>	0.181 kg
<b>Product Net Width:</b>	22.5 mm

## Technical

<b>Measuring Range:</b>	3 ... 30 V 6 ... 60 V 30 ... 300 V 60 ... 600 V
<b>Rated Control Supply Voltage (U<sub>S</sub>):</b>	220 ... 240 V AC
<b>Output:</b>	2 c/o (SPDT) contacts
<b>Time Range:</b>	0 s or 0.1-30 s tripping delay (ON)
<b>Terminal Type:</b>	Screw Terminals
<b>Rated Operational Current AC-12 (I<sub>e</sub>):</b>	(230 V) 4 A
<b>Rated Operational Current AC-15 (I<sub>e</sub>):</b>	(230 V) 3 A
<b>Rated Operational Current DC-12 (I<sub>e</sub>):</b>	(24 V) 4 A
<b>Rated Operational Current DC-13 (I<sub>e</sub>):</b>	(24 V) 2 A
<b>Minimum Switching Capacity:</b>	24 V 10 mA
<b>Rated Insulation Voltage (U<sub>i</sub>):</b>	Measuring Circuit / Output Circuit 600 V Output Circuit 1 / Output Circuit 2 250 V Supply Circuit / Measuring Circuit 600 V Supply Circuit / Output Circuit 250 V
<b>Rated Impulse Withstand Voltage (U<sub>imp</sub>):</b>	Measuring Circuit / Output Circuit 6 kV Output Circuit 1 / Output Circuit 2 4 kV Supply Circuit / Measuring Circuit 6 kV Supply Circuit / Output Circuit 4 kV

<b>Degree of Protection:</b>	Housing IP50 Terminals IP20
<b>Overvoltage Category:</b>	III
<b>Pollution Degree:</b>	3
<b>Short-Circuit Protective Devices:</b>	Output Circuit NC - F Type Fuses 10 A Output Circuit NO - F Type Fuses 10 A
<b>Electrical Durability:</b>	AC-12 100000 cycle
<b>Mechanical Durability:</b>	30000000 cycle
<b>Connecting Capacity:</b>	Flexible with Ferrule 1x 0.5 ... 2.5 mm <sup>2</sup> 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 ... 4 mm <sup>2</sup> Rigid 2x 0.5 ... 2.5 mm <sup>2</sup>
<b>Tightening Torque:</b>	0.6 ... 0.8 N·m
<b>Wire Stripping Length:</b>	8 mm
<b>Mounting Position:</b>	Any
<b>Mounting on DIN Rail:</b>	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
<b>Standards:</b>	EN 50178 IEC/EN 60255-27 IEC/EN 61000-6-2 IEC/EN 61000-6-3 UL 508 CAN/CSA C22.2 No. 14
<b>Function:</b>	Over- or undervoltage monitoring

## Environmental

<b>RoHS Status:</b>	Following EU Directive 2011/65/EC
<b>Ambient Air Temperature:</b>	Operation -20 ... +60 °C Storage -40 ... +85 °C

## Technical UL/CSA

<b>Contact Rating UL/CSA:</b>	B300
<b>Connecting Capacity UL/CSA:</b>	Flexible 1x 18-14 AWG Flexible 2x 18-16 AWG Rigid 1x 20-12 AWG Rigid 2x 20-14 AWG
<b>Tightening Torque UL/CSA:</b>	7.08 in·lb
<b>Maximum Operating Voltage UL/CSA:</b>	Output Circuit 300 V AC

## Certificates and Declarations (Document Number)

<b>Instructions and Manuals:</b>	1SVC730590M0000
<b>CB Certificate:</b>	CB_DK-28255-UL
<b>CCC Certificate:</b>	CCC_2007010303243843.pdf
<b>cULus Certificate:</b>	cULus508_20120203-E140448
<b>Data Sheet, Technical Information:</b>	2CDC112172D0201
<b>Declaration of Conformity - CE:</b>	1SVD981013-0000
<b>EAC Certificate:</b>	EAC_RU_C-DE.ME77.B.01012
<b>GL Certificate:</b>	GL_61765-14HH
<b>RMRS Certificate:</b>	RMRS_12.04009.250
<b>RoHS Information:</b>	1SVD981001-4400

## Classifications

<b>E-number:</b>	3860624
<b>ETIM 4:</b>	EC001438 - Voltage monitoring relay
<b>ETIM 5:</b>	EC001438 - Voltage monitoring relay
<b>ETIM 6:</b>	EC001438 - Voltage monitoring relay
<b>eClass:</b>	7.0 27371801
<b>Object Classification Code:</b>	B

