

SSU31

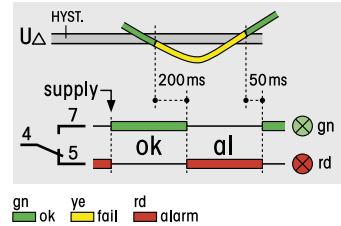
11 pin plug-in phase sequence monitoring relay according to IEC 67-I-18a



Type: SSU31/... V

1 change over alarm contact 6 A 250V

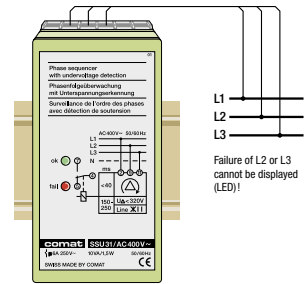
Monitoring function



The SSU31 serves as a phase-sequence, three-phase undervoltage and phase failure monitor.

The monitoring function helps to ensure the correct rotation direction of pumps, motors and conveyors in mobile devices with connection to different power outlets.

The defined undervoltage and phase failure protects against malfunction and damage caused by overheating.



Measuring circuit data

Nominal delta connection mains voltage	208 V	400 V
Under voltage threshold	$\leq 166 \text{ V} \pm 5 \%$	$\leq 320 \text{ V} \pm 5 \%$
Hysteresis	5 V	10 V
Phase sequence	L1-L2-L3	L1-L2-L3
Phase loss	One or several	One or several

Time data

Alarm delay for phase sequence	30 ms / +0 % ... -25 %
Alarm delay for phase loss	150 - 250 ms
Alarm delay for under voltage	150 - 250 ms
Reset time	50 ms

Contacts

Type / Material	1 CO, micro disconnection / AgNi
Rated operational current	6 A
Max. inrush current (10 ms)	30 A
Max. switching voltage	250 V
Max. AC load AC-1 (Fig.1)	1500 VA
Max. DC load DC-1, 30 V / 250 V (Fig.2)	180 W / 75 V
Recommended min. contact load	10 mA / 12 V

Power supply data

Nominal delta connection mains voltage	208 V	400 V
Operating voltage range	176 ... 235 V	340 ... 460 V
Power consumption	1.5 W	1.5 W
Input current	$\leq 25 \text{ mA}$	$\leq 25 \text{ mA}$
Frequency range	45 ... 65 Hz	45 ... 65 Hz

Insulation

Test voltage between contacts and supply	2 kVrms 1 minute (basic insulation)
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General specifications

Ambient temperature storage /operation	-40 ... +85 °C / -25 ... +60 °C
Mechanical life of contacts	30 x 10 ⁶ operations
Ingress protection degree	IP 40 when plugged in
Weight	300 g

Standard types

AC 208 50 / 60Hz	SSU31/AC208V
AC 400 50 / 60Hz	SSU31/AC400V

Accessories

Socket:	S-3B
Retention clip:	HF-24
Front panel mounting set:	FZ-23

Connection diagram

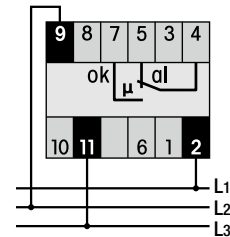


Fig.1 AC voltage endurance

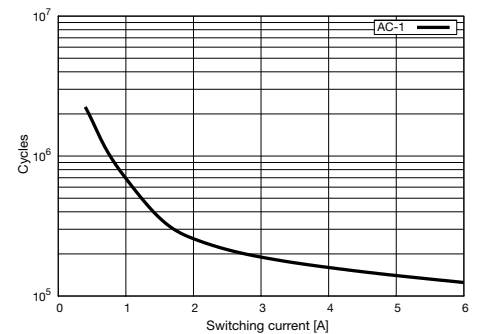
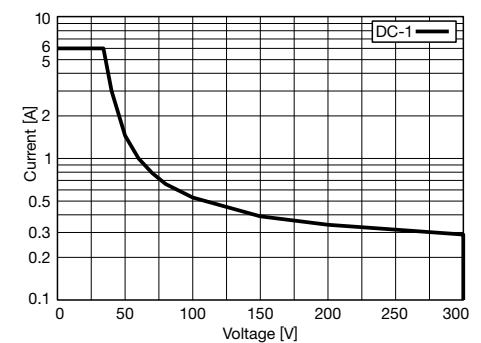
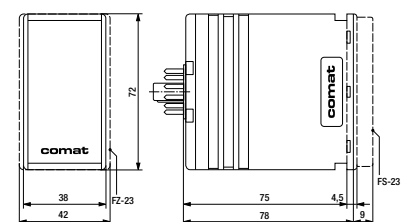


Fig. 2 DC load limit curve



Dimensions [mm]



Technical approvals, conformities

EN 60947

