



Product designation

Product type designation

Voltage
monitoring relays
PMV20

General characteristics

Description

Phase loss and
incorrect phase
sequence relay

Type of system

Three-phase
without neutral

Power supply

Auxiliary supply voltage U_s		Self powered
Operating voltage range		0.85...1.1 U_e
Rated frequency	Hz	50/60 $\pm 5\%$
Power consumption Max	VA	28
Power dissipation Max	W	2.5

Control circuit

Rated voltage to control (U_e)

min	VAC	100
Max	VAC	240

Tripping delay	s	0.06
Resetting time	s	0.5
Resetting hysteresis	%	5
Instantaneous tripping for U_e		Voltage $< 70\% U_e$
Type of reset		Automatic
Repeat accuracy	%	$< \pm 1$
Tripping time for phase loss	ms	60

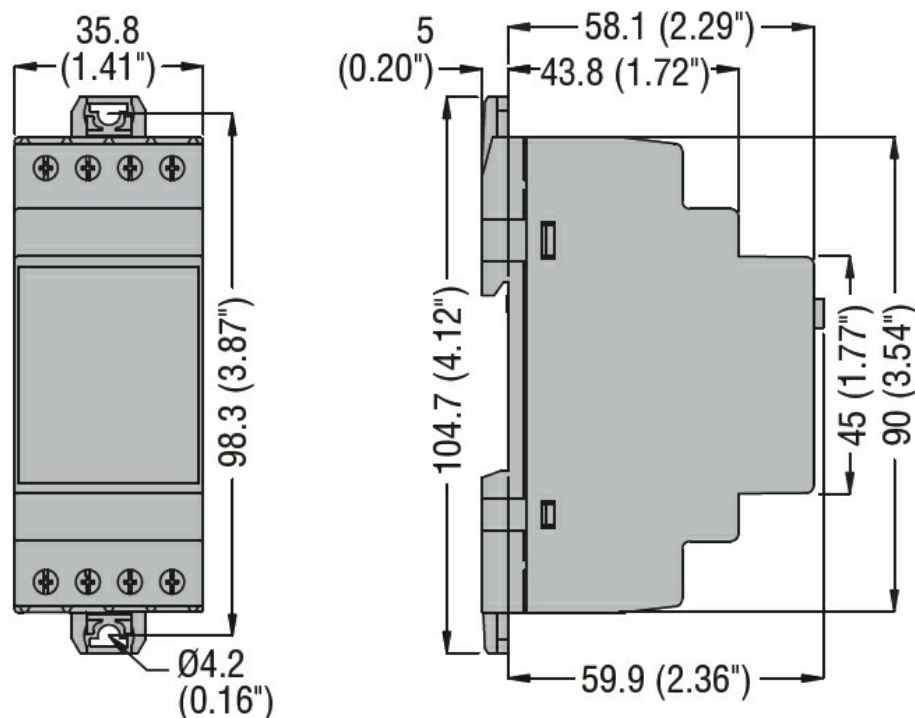
Relay outputs

Number of relays	Nr.	1
Relay state		Normally energised De- energises at tripping
Contact arrangement		1 changeover SPDT
Rated operational voltage AC (IEC)	VAC	250
Maximum switching voltage	VAC	400
IEC Conventional free air thermal current I_{th}	A	8
UL/CSA and IEC/EN 60947-5-1 designation		B300
Electrical life (with rated load)	cycles	100000
Mechanical life	cycles	3000000

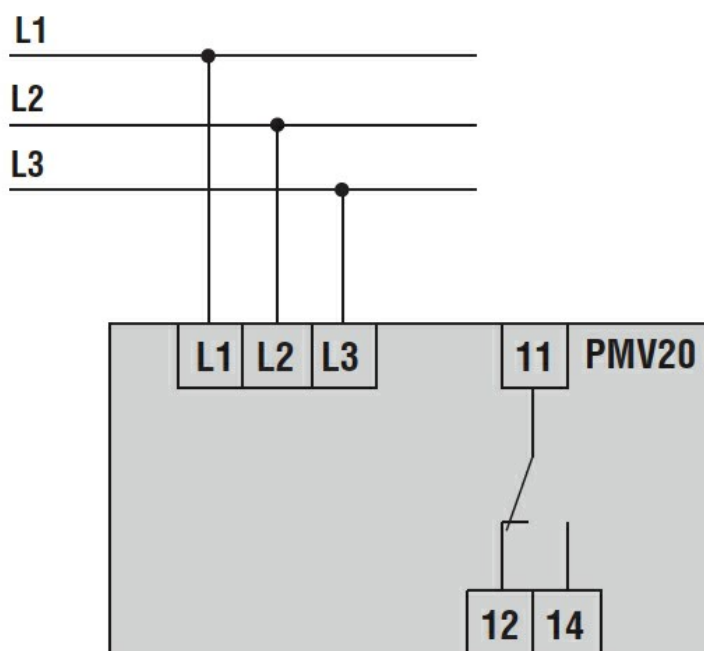
Functions

Modular version	2U
Minimum AC voltage	No
Maximum AC voltage	No
Phase loss	Yes
Incorrect phase sequence	Yes

Asymmetry			No		
Indications					
Indication			1 green LED for power on and tripping		
Connections					
Terminals type			Screw		
Tightening torque for terminals			max	Nm	0.8
			max	lbin	7
Conductor cross section					
AWG/Kcmil			min	AWG	24
			Max	AWG	12
IEC			min	mm²	0.2
			Max	mm²	4
Insulations					
Rated insulation voltage Ui			V	600	
Rated impulse withstand voltage Uimp			kV	6	
Operating frequency withstand voltage			kV	4	
Ambient conditions					
Temperature					
Operating temperature			min	°C	-20
			max	°C	+60
Storage temperature			min	°C	-30
			max	°C	+80
Housing					
Execution (n° of modules)			2		
Material			Self-extinguishing polyamide		
Mounting			35mm DIN rail (IEC/EN 60715)		
IEC degree of protection			IP40 on front; IP20 at terminals		
Dimensions (W x H x D)			mm	35.8 x 104.7 x 64.9	
Weight			g	120	
Dimensions					



Wiring diagrams



Certifications and compliance

Compliance

CSA C22.2 n° 14

IEC/EN 60255-5

IEC/EN 61000-6-2

IEC/EN 61000-6-3

UL 508

Certificates

cULus

EAC

ETIM classification

ETIM 8.0

EC001438 -
Voltage
monitoring relay