

Supply Monitoring Series SM 501

- Protects against Phase Loss, Phase Reversal and Phase-Phase Unbalance
- Suitable for 3 phase 3 wire systems
- Selectable Over/Under voltage trip level
- Adjustable time delay
- Model for selectable Phase Asymmetry
- LED indications for power and fault conditions

- Voltage sensing principle
- 2 C/O configuration



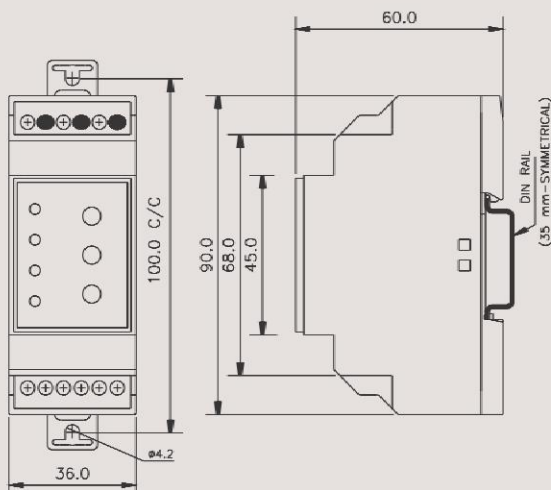
Cat. No.		MG53BH	MG53BF	MG53BI
Parameters				
Supply Voltage (⚡)		415 VAC		
Frequency		48 - 63 Hz		
Power Consumption (Max.)		10 VA		
Trip Settings :				
Under Voltage		55% - 95% (of⚡)		
Over Voltage		105% - 125% (of⚡)		
Phase Reverse Detect		Yes		
Hysteresis		7 V ± 2V of trip voltage		
Phase - Phase Unbalance		10%		94 V
Time Delays				
ON Delay		0.5 -15 s (adjustable)	5 s (fixed)	5 s (fixed)
OFF Delay		5 s (fixed)	0.5 - 15 s (adjustable)	5 s (fixed)
Setting Accuracy		± 10 % of full scale	± 10 % of full scale	± 10 % of full scale
Relay Output		2 C/O (DPDT)		
Contact Rating		5A (Resistive) @ 250 VAC / 28 VDC		
Electrical Life		1 x 10 ⁵		
Mechanical Life		3 x 10 ⁶		
Utilization Category	AC - 15	Rated Voltage (Ue): 120/240 V, Rated Current (Ie): 3/1.5 A		
	DC - 13	Rated Voltage (Ue): 24/125/250 V, Rated Current (Ie): 2.0/0.22/0.1 A		
Operating Temperature		- 10° C to +55° C		
Storage Temperature		- 25° C to +70° C		
LED Indications		Separate indications for Power ON: UV, OV, ON: Phase Reverse, BLINK: Phase Unbalance		
Enclosure		UL 94V0		
Dimension (W x H x D) (in mm)		36 X 90 X 60		
Weight (unpacked)		120 g		
Mounting		Base / DIN rail		
Degree of Protection		IP 20 for Terminals, IP 40 for Enclosure		
Certification		  Compliant		
EMI/ EMC				
Radio Interference Suppression		CISPR 14-1	Ed. 5.0 (2005-11) Class B	
ESD		IEC 61000-4-2	Ed. 1.2 (2001-04) Level II	
Electrical Fast Transients		IEC 61000-4-4	Ed. 2.0 (2004-07) Level IV	
Surges		IEC 61000-4-5	Ed. 2.0 (2005-11) Level IV	
Voltage Dips, Interruptions		IEC 61000-4-11	Ed. 2.0 (2004-03) All 7 Levels (AC), IEC 61000-4-29 Ed. 1.0 (2000-08) All 5 Levels (DC)	
Isolation		Test voltage between input & output - IEC 60255-5, 2kV		

Note: 1) In the event of Phase sequence or phase loss, OFF delay is 100 ms

ORDERING INFORMATION

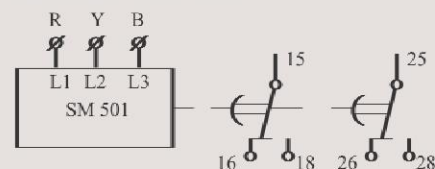
Cat. No.	Description
MG53BH	415 VAC, adjustable 0.5 - 15 s On & 5 s fixed Off Delay time, 2 C/O
MG53BF	415 VAC, adjustable 0.5 - 15 s Off & 5 s fixed On Delay time, 2 C/O
MG53BI	415 VAC, 94 volt fixed asymmetry, with 5 s fixed Off & On Delay time, 2 C/O
MG53BO	415 VAC, Under/Over Voltage, with fixed 3 m On / 5 s Off Delay time, 2 C/O
MG63BH	220 VAC, adjustable 0.5 - 15 s On & 5 s fixed Off Delay time, 2 C/O
MG63BF	220 VAC, adjustable 0.5 - 15 s Off & 5 s fixed On Delay time, 2 C/O

MOUNTING DIMENSION (mm)

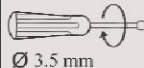
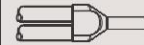


CONNECTION DIAGRAM

THREE PHASE APPLICATIONS



TERMINAL TORQUE & CAPACITY

 Ø 3.5 mm	Torque 0.54 N.m (5 Lb. in) Terminal Screw - M 2.5
 1 x 0.2 - 3.3 mm ² Solid Wire / single wire ferrule	
 2 x 0.2 - 1 mm ² Insulated with twin ferrule	
AWG	1 x 24 to 12