



SINGLE PHASE INSTANTANEOUS EARTH FAULT RELAY TYPE SC14S

Relay SC14S is a self-powered, single-phase, non-directional, Earth fault relay with one measuring element. The relay can be used for differential protection of generators, REF applications of generators and transformers in all low voltage, medium voltage and high voltage sub-stations. The relay's solid-state design offers seven fields selectable pick up current settings. There are two time delay options in addition to instantaneous trip – 100 millisecond and 200 millisecond. The relay has a built in third harmonic filter to avoid spurious tripping in harmonic rich power systems.

64/87G

- Single Phase high impedance Earth Fault**
- Instantaneous time delay**
- Choice of 100 msec or 200 msec delay**
- Built in third harmonic filter**
- Micro-controller based design**
- Draw out facility**

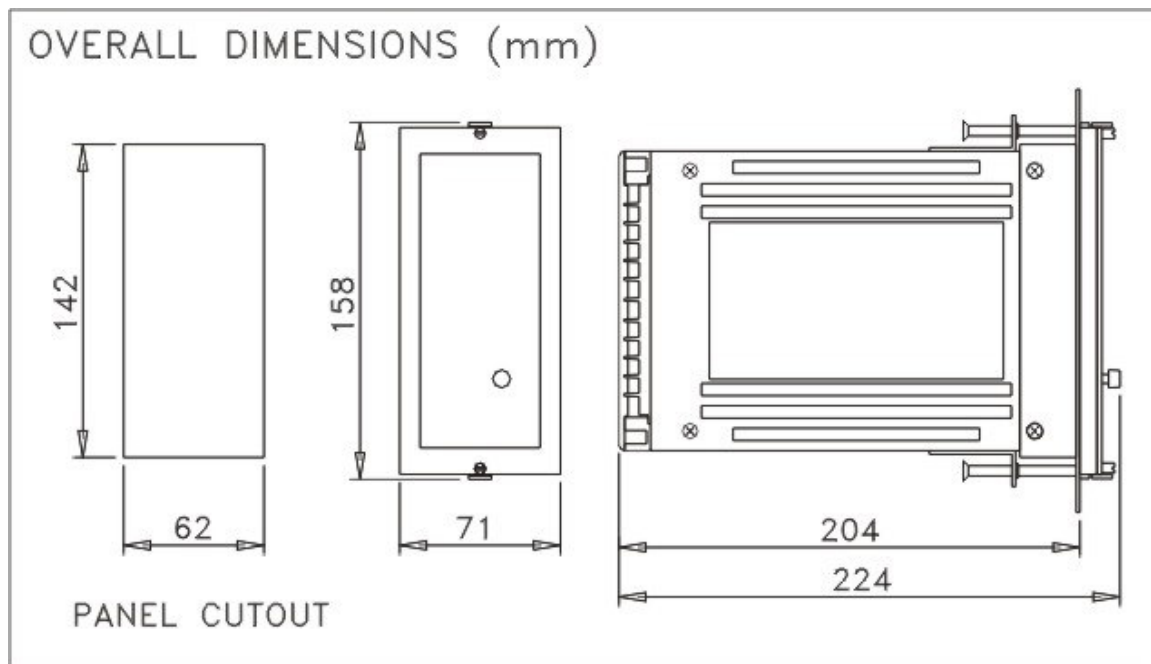


TECHNICAL SPECIFICATIONS

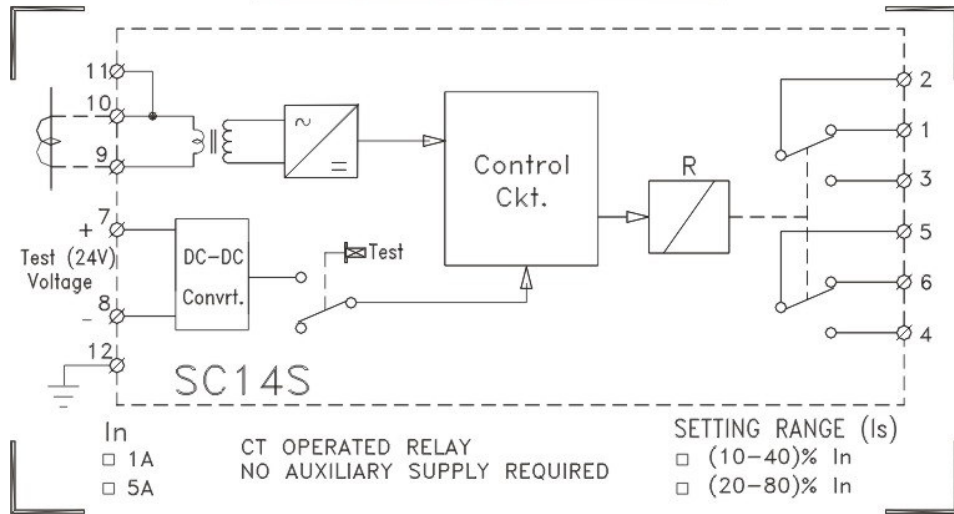
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| 1.0 Relay Ratings | Nominal Current (I_n) | 1A or 5A |
| | Frequency | 50Hz ± 2.5 Hz |
| 2.0 Auxiliary Power Supply | | Self powered |
| 3.0 Relay Settings: | Current (I_s) | One of the two ranges (factory set)
10% to 40% of I_n in steps of 5% or
20% to 80% of I_n in steps of 10 % |
| 4.0 CT Burden | | Less than 1.0 VA at I_s min
Less than 6 VA at I_s max |
| 5.0 Operating Characteristics | Pick up current | Same as set current I_s |
| | Operating time: | Field selectable
Instantaneous (Typical 25 ms @ 3 I_s) or
100 msec, 200 msec (at 3 I_s) |

6.0	Accuracy	As per Error class 5 of IS 3231: 1987
7.0	Over Load capacity	20 times set current I_s for 3 sec
8.0	Operation Indicators	LED indication Flag indication (manual reset)
9.0	Output Relay Contacts	2 C/O contacts for trip signal (self reset)
10.0	Output contact rating	
	Rated voltage	250 V AC / 30 V DC
	Rated current	5A
	Rated Breaking Capacity	2000VA / 240 W (Resistive)
11.0	Electrical performance Specifications	Please refer separate document “General Electrical Characteristics”
12.0	Case	Draw out case
	Front Bezel	158 x 71 mm
	Panel Cutout	142 x 62 mm
	Depth	224 mm

13.0 **Weight** 1.0 kg approx.



WIRING DIAGRAM - SC14S



SC14S relay is manufactured by Larsen & Toubro Limited, Mysore works.