RHOMBERG

Multi-Function Timer 48x48

ON Delay, Interval (One Shot)

48T 101

ORDERING CODE

TYPE		SUPPLY VOLTAGE
48T101 - 08	–	230

Note: Panel mount bezel supplied with timer

CE

48 x 48 TIMERS

Application Examples

- Delayed energisation of loads on power-up.
- Energisation of loads for a set period of time.
- Sequential switching of loads.

Features

- Time settings from 0.1sec to 100 hrs, in 8 overlapping time ranges
- Extra Short Housing
- Test mode achieved by adjusting dial fully anticlockwise in any time range. This results in the unit performing the set function with a time base of (t) = 5 sec. This feature simplifies installation and commissioning.
- High repetitive & setting accuracy
- Automatic (ie. power up) start
- Power ON and Relay ON LED's
- Front dial can be used as screwdriver for adjusting settings
- Microprocessor technology based
- Flashing Power ON LED when unit is timing
- DPDT relay supplied as standard (5A per contact)

Technical Specification

POWER SUPPLY			
Supply Voltage	230(100-250VAC)	24 VAC/DC	12VDC
Power Consumption	3 VA	2 VA (AC) 1W (DC)	1.5W
Supply Tolerance	±10%	±10%	±10%
Power Reset	100 msec minimum		

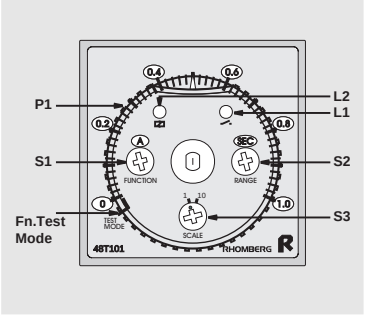
TIME SETTING	SCALE SETTING	
	1	10
Sec	0.1 sec to 1 sec	1 sec to 10 sec
Min	0.1 min to 1 min	1 min to 10 min
Hrs	0.1 hr to 1 hr	1 hr to 10 hrs
10 Hrs	1 hr to 10 hrs	10 hrs to 100 hrs

Note: Function Test Mode is achieved by adjusting the dial fully anti-clockwise. This will result in the unit performing the set function with a time base (t) = 5 sec.

TIME SPECIFICATION	
Setting Accuracy	Maximum of ±5% full scale ±50msec
Repeatability	Maximum of ±0.3% of full scale Maximum of ±0.3% of full scale ±10msec (in 1 sec time range)
Temperature Influence	Maximum of ±2% of full scale
Influence of Supply Voltage Variance	Maximum of ±0.5% of full scale Maximum of ±0.5% of full scale ±10msec (in 1 sec time range)
Power Reset Time	100msec minimum

GENERAL SPECIFICATIONS	
Relay Contacts	2 x 5A @ 250VAC
Standards	CE Rated
Enclosure Protection Rating	IP40
Weight	100gm (approximately)

Description of Controls



P1: The Time Setting is adjusted on P1.

S1: The Time Function is set on S1.
Position A: Delayed ON Operation
Position B: Interval(One Shot) Operation

S2: The Time Range is set on S2.
The 4 available time settings are Seconds, Minutes, Hours and 10 Hours.

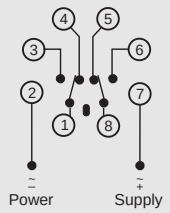
S3: Two dial scales are selectable on S3.
Position 1 adjusts the scale to have a range from 0 to 1.
Position 10 adjusts the scale to have a range from 0 to 10.

L1: The red "RELAY ON" LED illuminates when the relay is energised.

L2: The green "POWER ON" LED illuminates when power is supplied to the unit. This LED flashes when the unit is timing. The flash rates increase just before the relay switches.

Fn. Test Mode: When the dial P1 is adjusted fully anti-clockwise, the unit will perform the set function with a time base (t) = 5 sec.

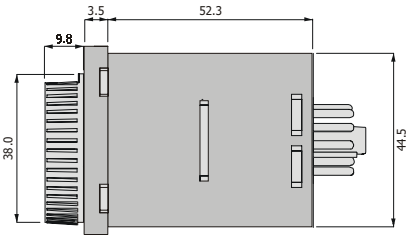
Wiring and Connection

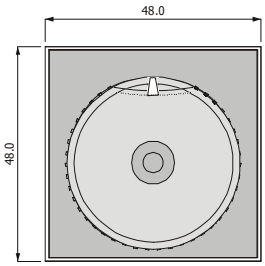


Note: The positions of the relay are shown in the de-energised state.

Wiring requires optional S2-B base.

Dimensions (mm)





Description of Operations

The 48T101 is a microprocessor based delayed on/ interval (one shot) timer, incorporating 6 overlapping time ranges within 0.1 second and 100 hours. The unit is automatically triggered at power up.

Before operation, the timer can be programmed to operate in any of the following modes:

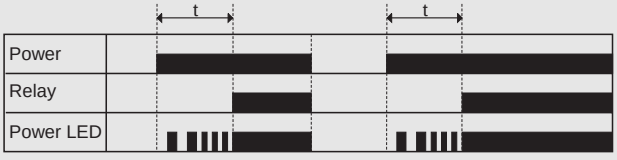
A: **Delayed ON Operation:** At power-up the relay is de-energised and timing commences. After the set time expires, the relay energises and remains energised until power is removed.

B: **Interval (One Shot) Operation:** At power-up the relay energises and timing commences. After the set time expires, the relay de-energises.

Note: Function Test Mode is achieved by adjusting the dial fully anti-clockwise. This will result in the unit performing the set function with a time base (t) = 5 sec.

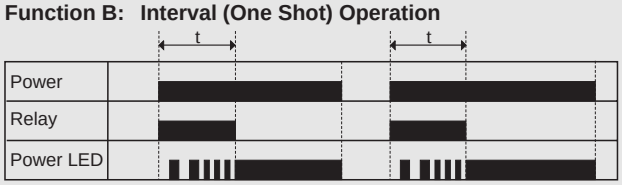
Operational Diagrams

Function A: Delayed ON Operation



t: Preset time

Function B: Interval (One Shot) Operation



t: Preset time