

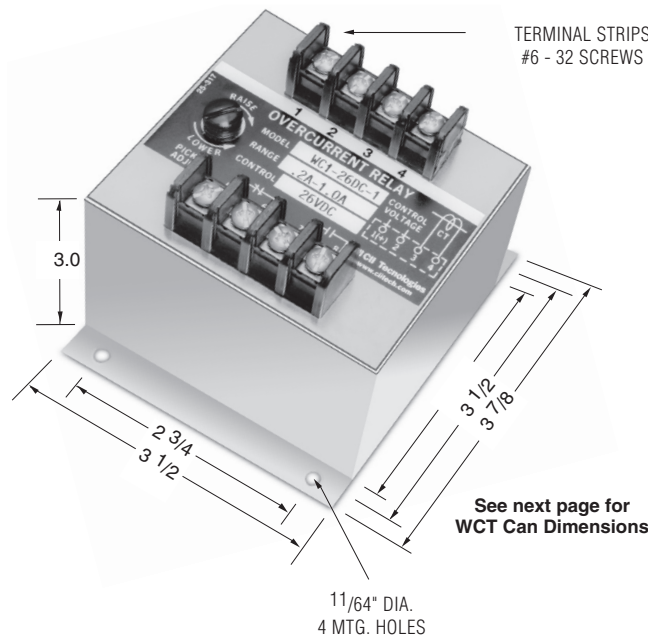
WC1 & WCT1 Series, Overcurrent

Product Facts

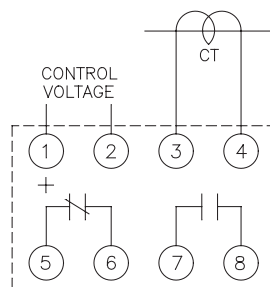
- Function 50/51
- ANSI/IEEE C37.90-1978
- UL File No. E58048
- CSA File No. LR61158



Current sensitive relays are available for single and three phase applications. Voltage controlled overcurrent relays protect generators against fault currents below the full rated value, when the fault produces a voltage drop as in the case of short circuits or grounds. Phase balance relays are available to sense and control unbalanced current flow in three phase systems. Current differential relays operate when the differential between two currents exceeds preset values. Over/under current phase-band relays are also available.



Note: Dimensions in inches. Multiply values by 25.4 for dimensions in mm.



Time Delay

Standard Time Delay (WC1 Series) — A fixed inverse time delay is incorporated in all overcurrent relays and is represented by the typical curves shown.

Adjustable Time Delay (WCT1 Series) — The time delay is field adjustable. The standard time delay can be increased by any value between 0.5 and 20 seconds.

Product Specifications

Line Current — Single Phase, AC current, 50-400 Hz Direct or from CT

Control Voltage — See Ordering Information

Trip Point — Screwdriver adjustable. Adjustment range in accordance with ordering information.

Pick-Up to Drop-Out Differential — Approximately 0.1 amp.

Overcurrent Allowance — Maximum of 500% for 0.25 seconds

Surge Withstand Capability — In compliance with C37.90B ANSI/IEEE

Operating Temperature — -40°C to +70°C

Temperature Drift — ± .05%

Burden — Current input — 1.2 VA, Control voltage — 2.5 VA

Contact Ratings — One set, N.O., One set N.C. 5 amp resistive at 120 VAC or 28 VDC

Notes:

1. Remove black screws for access to the current pick-up and the time delay adjustment.
2. Clockwise rotation of the pick-up adjustment will raise the current trip point.
3. Clockwise rotation of the time delay adjustment, (Type WCT1 only) will increase the time delay.

Ordering Information

Sample Part Number ▶ **WCT1 -48DC -5 -B**

Type: WC1 = Per Time Curves
WCT1 = Adjustable Time Delay

Control Voltage (± 15%)

- 26 DC
- 48 DC
- 125 AC
- 120 AC
- 230 AC
- 380 AC
- 460 AC

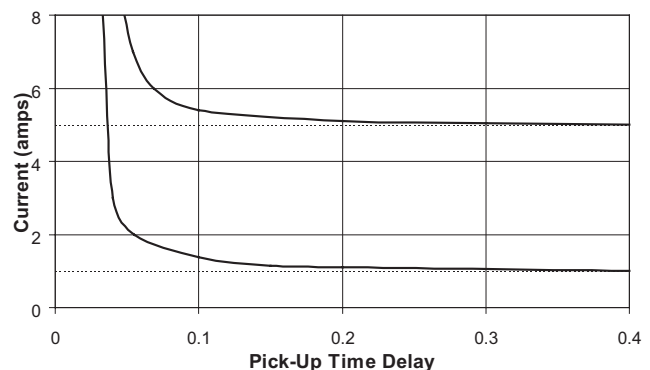
Trip Adjustment Range

- 1 = .2 amp - 1 amp
- 5 = 1 amp to 5 amp
- 10 = 2 amp to 10 amp

Other Options

- A = Two normally open contacts
- B = Two normally closed contacts

Typical Curves (WC1 Series)



See next page for 3-phase types and consult factory for additional models.