

T84 series

4 POLE, HIGH DIELECTRIC PC BOARD RELAY

File E29244

File LR35579

FEATURES

- Meets FCC Part 68 isolation.
- 4 Form C contact arrangement.
- Standard 0.1" x 0.3" grid spacing in a DIP configuration.
- Standard or sensitive DC coils through 48 volts.
- Well suited for audio communications circuits, logic and process control, vending machines and office automation applications.
- Immersion cleanable, plastic sealed case.

CONTACT DATA

Arrangements: Bifurcated cross bar in 4 Form C (4PDT).
Material: Silver-palladium alloy (stationary contacts have gold overlay).
Ratings: Max. Switching Voltage: 120V, AC or DC.
 Max. Switching Power (resistive load): 24W DC, 60VA AC.
 Max. Switching Current: 1A, DC or AC.
 Min. Switching Current: .01mA, 10mVDC.
 Max. Carrying Current: 2A, DC or AC.
Expected Mechanical Life: 20 million operations.
Expected Electrical Life: 500,000 ops. @ 1A, 24VDC, resistive.
 200,000 ops. @ 0.5A, 120VAC, resistive.
Initial Contact Resistance: 100 milliohms, max., @ 100mA, 6VDC.

INITIAL DIELECTRIC STRENGTH

Between Open Contacts: 1,000V rms, 60 Hz.
 1,500V FCC Part 68 surge test.
Between Contact Sets: 1,500V rms, 60 Hz.
 1,500V FCC Part 68 surge test.
Contact to Coil: 1,500V rms, 60 Hz.; 1,500V FCC Part 68 surge test.

INITIAL INSULATION RESISTANCE

Between Mutually Insulated Conductors : 10⁹ ohms @ 500VDC (except between dual coils).

COIL DATA @ 20 C

Voltage: 3 through 48VDC.
Maximum Continuous Coil Power: 800 milliwatts.
Temperature Rise: 77°C per watt, typ.

ORDERING INFORMATION

Typical Part Number > **T84 S 17 D 2 1 4 -24**

- BASIC SERIES:**
T84 = High dielectric, PC board relay.
- CONSTRUCTION:**
S = Sealed.
- CONTACT ARRANGEMENT:**
17 = 4 Form C (4PDT)
- COIL INPUT:**
D = DC Voltage.
- COIL SENSITIVITY:**
2 = Sensitive.
4 = Standard (not available on single coil latch).
- FUNCTIONAL TYPE:**
1 = Single coil non-latching. 3 = Dual coil latching.
2 = Single coil latching.
- CONTACT MATERIAL:**
4 = Silver-palladium alloy.
- COIL VOLTAGE:**
03 = 3VDC 05 = 5VDC 06 = 6VDC 12 = 12VDC 24 = 24VDC
48 = 48VDC

STOCK ITEMS - The following items are maintained in stock.

T84S17D214-05	T84S17D234-05	T84S17D414-48
T84S17D214-12	T84S17D234-12	T84S17D434-05
T84S17D214-24	T84S17D234-24	T84S17D434-12
T84S17D214-48	T84S17D414-05	
T84S17D224-05	T84S17D414-12	
T84S17D234-03	T84S17D414-24	

COIL DATA @ 20°C

	Resistance in Ohms ± 10%					
	Standard Coils			Sensitive Coils		
	Single Coil Non-Latching	Single Coil Latching	Dual Coil Latching (either coil)	Single Coil Non-Latching	Single Coil Latching	Dual Coil Latching (either coil)
Nom. Coil Power → Voltage ↓	400mW	N/A	360mW	200mW	90mW	180mW
3	22.5	N/A	25	45	100	50
5	62.5	N/A	69	125	278	139
6	90	N/A	100	180	400	200
12	360	N/A	400	720	1,600	800
24	1,440	N/A	1,600	2,880	6,400	3,200
48	5,760	N/A	6,400	11,520	25,600	12,800

OPERATE DATA @ 20 C

Must Operate Voltage: 70% of nominal voltage or less.
Must Release Voltage (non-latching): 10% of nominal voltage or more.
(Latching): Must operate voltage applied to reset coil (dual) or negative voltage (single).
Operate Time (Excluding Bounce)†: 6 ms, max.
Release Time (Excluding Bounce)†: 4 ms, max.
Reset Time (Latching)†: 6 ms, max.
Bounce Time†: 1 ms, approximately.
 † At or from Nominal Coil Voltage

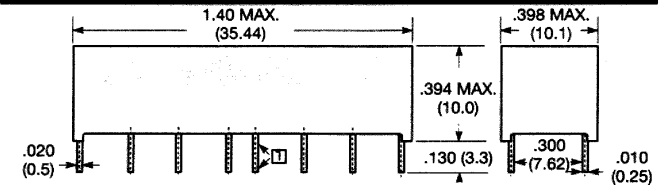
ENVIRONMENTAL DATA

Temperature Range: Standard Coil: -40°C to +70°C.
 Sensitive Coil: -40°C to +80°C.
Vibration: Operational and Non-destructive: 30 g from 10-500 Hz.
Shock: Operational: 50 g at 11 ms 1/2 sinusoidal impulse.
Non-destructive: 100 g at 11 ms 1/2 sinusoidal impulse.

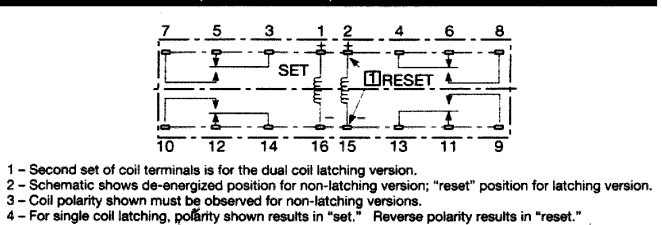
MECHANICAL DATA

Termination: Printed circuit terminals on 0.1" (2.54 mm) centers.
Enclosure: Sealed PBT plastic case.
Weight: 0.25 oz. (7 g) approximately.

OUTLINE DIMENSIONS



WIRING DIAGRAM (Bottom View)



PC BOARD LAYOUT (Bottom View)

