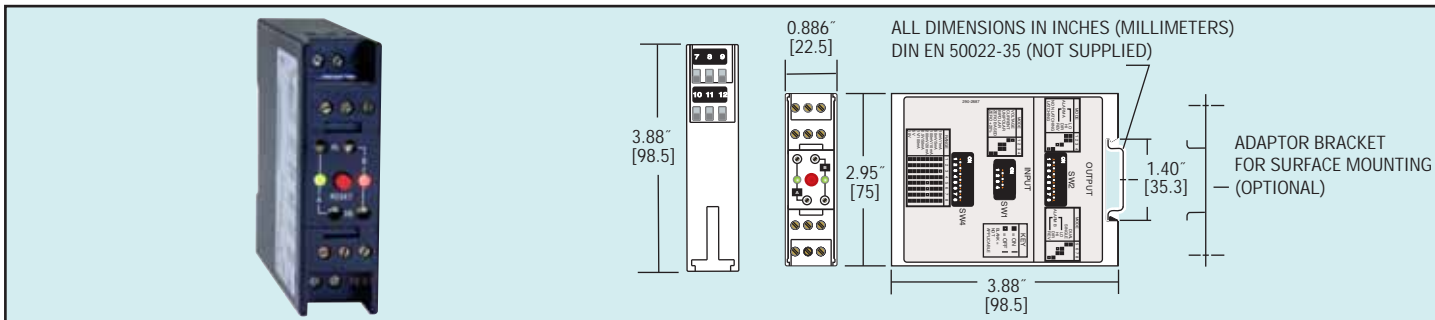




Series  
SC1290  
SC1490

# Thermocouple & RTD Limit/Alarm Switch Module

## Two Form C (SPDT) Switches, Small Size, Mounts Easily on 35 mm DIN Rail



The Series SC1290 & SC1490 Thermocouple Limit/Alarm Switch Modules are on-off or limit switches with selectable, thermocouple, or RTD inputs. Input type, scale range, output action, and output type are all selectable by the user in the field. All selections are made through easily accessible switches without the need to open the product. Each unit has two form C (SPDT) relays which can operate independently, or be logically connected to operate as a DPDT output. A two color LED indicator indicates the status of each output relay.

These units mount easily on a standard 35mm DIN rail. Low Voltage (SCL XXXX) units are also available.

Model	Description
SC1290	T/C Input
SC1490	RTD Input
SCL1290*	T/C Input
SCL1490*	RTD Input

\* Low Voltage Supply

### SPECIFICATIONS

**Input:** SC1290: Thermocouple Type J, K, R, S, T, E; SC1490: RTD Pt1000, Ni100, Ni120, Cu10, Ni-Fe1000, Ni-Fe2000.

**Power Supply:** (SC units) 85 to 265 VDC/VAC 50 to 400 Hz (12-24 VDC, VAC 50-400 Hz for Low Voltage Option, SCL units).

**Isolation:** 1500 V rms between outputs, input, and power.

**Set Points:** Adjustable 0 to 100% of span.

**Deadband:** Adjustable 0.25% to 100% of span.

**Drift:**  $\pm 0.02\%/^{\circ}\text{C}$  typical  $\pm 0.05\%/^{\circ}\text{C}$  maximum.

**Temperature Limits:** Ambient: (operating) 32 to 131°F (0 to 55°C). (storage) -40 to +176°F (-40 to +80°C).

**Excitation Current:** (SC1490) Cu10Ω = 5mA; Pt1 100Ω, Ni 100Ω, Ni 120Ω = 500μA; Pt1 500Ω, NiFe 1000Ω = 100 μA; Pt1 1000Ω = 50 μA.

**Lead Compensation Error:** (SC1490)  $\approx 0.02\%/^{\circ}\text{C}$ .

**Open Lead Protection:** (SC 1490) Upscale only.

**Input Impedance:** (1290) 3 megohms.

**Sensor Burnout Protection:** Selectable, upscale or downscale on 1290.

**Relay Output:** Form C, SPDT, one per set point, 5A @ 250 VAC, resistive.

**Latch Circuit Reset:** Automatic at power up. Manual with reset switch on front of module.

**Indicators:** one dual color LED per set point. Red = relay on, green = relay off.

**Wiring Terminals:** Screw driven compression type.