

C-Series OTC25 Digital Temperature Controller

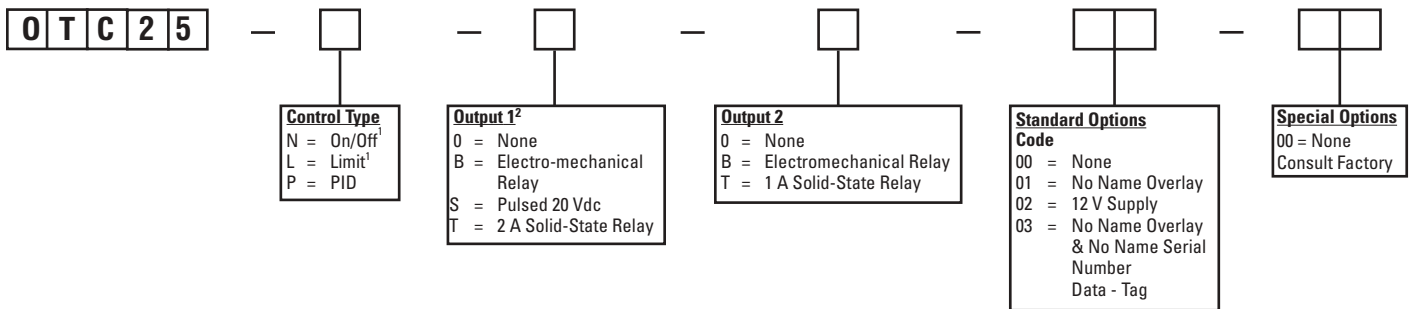


- ▲ Accepts Type J (OTC25-N & L) or Type J and K (OTC25-P) Thermocouple Input
- ▲ Adjustable Output Hysteresis to Prevent Rapid Cycling Around Setpoint Temperature
- ▲ Adjustable Deviation Alarm Flashes When Measured Temperature Exceeds or Falls Below Setpoint Temperature
- ▲ NEMA 4X (IP65) Front Bezel, Splash-Proof and Resistant to Dust
- ▲ Discrete Status Indicators Illuminate When Temperature Display, Setpoint Display, Limit Display, or Heat/Cool Output is Active
- ▲ RU, cRU, CE, and FM Approvals

The Athena OTC25 is a 1/4 DIN panel mounted, digital controller that can be used for precise control of a single loop with two independent outputs. The controller accepts thermocouple input, and a large easy-to-read digital LED display is selectable for either setpoint or process temperature.



Ordering Information



¹ On/Off and limit control versions (OTC25-N and OTC25-L) are only available with Type J thermocouple input.

² Limit control versions (OTC25-L) may only be ordered with electromechanical relay (Type "B") outputs in Output 1.

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Technical Specifications

Operating Limits

Ambient Temperature	32°F to 140°F (0°C to 60°C)
Relative Humidity Tolerance	90% R.H. maximum, non-condensing
Line Voltage	100 to 250 Vac 50/60 Hz
Power Consumption	Less than 6 VA (instrument)

Performance

Accuracy	±0.3% of FS, ± one digit
Temperature Stability	5 µV/°C maximum
TC Cold End Tracking	0.05°C/°C ambient
Noise Rejection	Common mode > 100 dB Series mode > 70 dB
Process Sampling	3.7 Hz (270 ms)

Control Characteristics

Setpoint Limits	0°F to 900°F (0°C to 482°C)
Control Hysteresis	2°F to 252°F (1°C to 140°C)
Display Offset	-126°F to +126°F (-70°C to 70°C)
Deviation Alarm	Off, 1°F to 252°F (Off, 1°C to 140°C)

Inputs

Thermocouple	OTC25-N	Type J
	OTC25-L	Type J
	OTC25-P	Type J or K
Maximum lead resistance, 100 ohms for rated accuracy		

Outputs

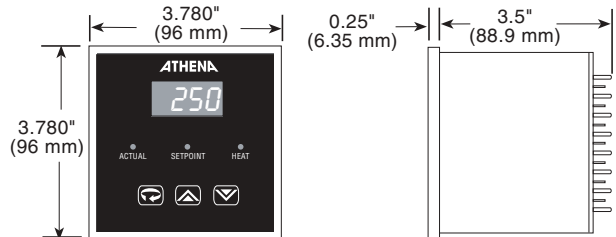
B	5 A @ 120 Vac, 3 A @ 240 Vac electromechanical relay
T	Solid-state relay, 2 A (Output 1), 1 A (Output 2)
S	Pulsed 20 Vdc

Mechanical Characteristics

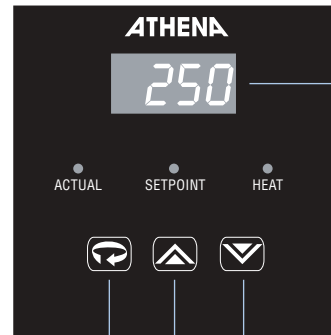
Display	3-digit, 0.56" (14.2 mm) Orange
Discrete Indicators	Setpoint: Amber Actual: Amber O1: Orange O2: Orange Limit: Orange
Front Panel Rating	NEMA 4X (IP65)
Connections	Fast-on style
Front Panel Cutout	3.622" x 3.622" (92 mm x 92 mm)

Specifications subject to change without notice.

Panel Cutout: 3.622" sq. (92 mm)



Front Panel Controls and Indicators



Three-Digit LED Display
Displays measured temperature, setpoint, or parameter labels and settings.

Lower Key Used to scroll down through available parameter settings, decrease values or change menu levels (Hold for fast-step progression)

Raise Key Used to scroll up through available parameter settings, increase values or change menu levels (Hold for fast-step progression)

Parameter Key/Access Key Used to index through parameters or to access Menu Levels