

# TT205 Thermocouple Transmitter

## Miniature economy industrial transmitter



TT205  
Thermocouple Transmitter

### Overview

Model TT205 offers superior performance in an economical and small package.

- 4-20 mA current signal
- Thermocouple input

### Specifications

**Output:** 4 to 20 mA over specified range.

**Accuracy:**  $\pm 0.2\%$  of span.

**Linearity:** Voltage linear.

**Adjustments:** Zero and span,  $\pm 5\%$  of span. Factory set.

**Warmup drift:**  $\pm 0.2\%$  of span max., with

$V_{supply} = 24$  VDC and  $R_{loop} = 250 \Omega$ .

Stable within 15 minutes.

**Supply voltage:** 8.5 to 35 VDC. Voltage effect  $\pm 0.001\%$  of span per volt. Reverse polarity protected.

**Maximum load resistance:** The maximum allowable resistance of the signal carrying loop is:

$$R_{loop\ max} = \frac{V_{supply} - 8.5}{0.020\ \text{amps}}$$

Example: With supply voltage 24 VDC, maximum loop resistance is 700  $\Omega$ .

**Minimum output current:** 1.5 mA.

**Maximum output current:** 28 mA.

**Burnout:** Downscale burnout standard; upscale optional.

**Hazardous atmospheres:** This model may be used with Minco explosionproof connection heads.

**Connections:** Terminal block for wires AWG 22 to AWG 14.

**Physical:** Polycarbonate case, epoxy potted for moisture resistance.

**Weight:** 1.8 oz. (52 g).

**Ambient temperature:**

Operating:  $-10$  to  $60^\circ\text{C}$  ( $14$  to  $140^\circ\text{F}$ ).

Storage:  $-55$  to  $100^\circ\text{C}$  ( $-67$  to  $212^\circ\text{F}$ ).

**Ambient temperature effects:**  $\pm 0.036\%$  of span per  $^\circ\text{C}$ .

**Cold junction compensation drift:**  $\pm 0.05^\circ\text{C}$  per  $^\circ\text{C}$ .

**Minimum span:**  $150^\circ\text{C}$  ( $270^\circ\text{F}$ ).

### Hazardous area requirements

Contact Minco at 763.571.3121 for information on how to classify a hazardous area, methods of protection, and the various standards and agencies (including FM, CSA, CENELEC and ATEX).

