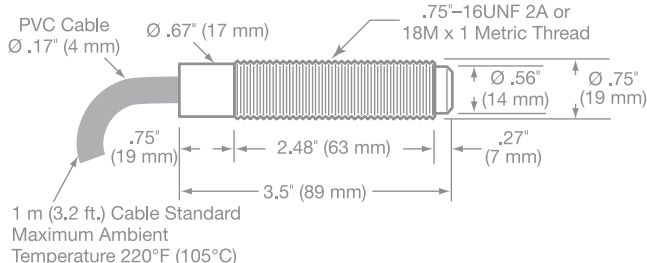


Non-contact Infrared Temperature Measurement System — NCIT-LLC Series



The NCIT - LLC model provides the advantages of infrared temperature measurement in a compact, low cost, integrated sensor. Designed for easy integration with a standard 4-wire system, the CI sensor can easily replace traditional contact probes with a type J or K thermocouple output, or with a 0-5 volt dc output if your application is susceptible to noise or requires a longer cable run.



Ordering Code:



Basic assembly includes: sensor with 3/4-16 UNF thread, preinstalled 3.3 ft./1 m cable and two mounting nuts.

Overall Range BOX 1

- 1 = 32° to 662°F (0° to 350°C)
- 2 = 86° to 932°F (30° to 500°C)

Output BOX 2

- J = Type J thermocouple
- K = Type K thermocouple
- V = 10mV/°C

Cable Length and Type BOX 3

- A = 3.3 ft./1m cable - 220°F/105°C
- B = 10 ft./3m cable - 220°F/105°C
- C = 50 ft./15m cable - 220°F/105°C
- Specify D, E or F if ordering coolable housing
- D = 3.3 ft./1m cable - 500°F/260°C
- E = 10 ft./3m cable - 500°F/260°C
- F = 50 ft./15m cable - 500°F/260°C

Options (Select 2) BOX 4 & 5

- C = Coolable housing with air purge
- M = 18M x 1 metric thread instead of 3/4-16 UNF
- N = None

Ordering Information

Create an ordering code by filling in the boxes per your requirements and a part number will be assigned.

Standard lead time is stock to 4 weeks.

Design Features

- * Type J or K thermocouple, or 0-5 VDC output
- * Two models cover temperature ranges from 32° to 932°F (0° to 932°C)
- * NEMA 4 (IP 65) stainless steel housing
- * 4:1 optics at 90% energy
- * 350 ms response time to 90% energy
- * Powered by 12-24 VDC at 20 mA
- * Accessories for cooling and air purging

Measurement Specifications

- Overall Temperature Range: 32° to 662°F (0° to 350°C)
- Accuracy: 32° - 240°F (0° - 115°C): ±6% (±1°C)
- 241° - 440°F (116° - 225°C): ±5%
- 441° - 662°F (116° - 225°C): ±5%
- Overall Temperature Range: 86° to 932°F (30° to 500°C)
- Accuracy: 86° - 211°F (30° - 99°C): ±10°F (±6°C)
- 212° - 932° (100° - 500°C): ±2% or ±6°F (3°C)
- Spectral Response: 7 to 14 microns
- Repeatability: 1% of reading at ±2°F (1°C)
- Temperature Resolution: 0.5°F (0.5°C)
- Response Time (95%): 350 ms
- Emissivity: Fixed at 0.95

Electrical Specifications

- Outputs: Select Type J or K thermocouple or 10 mV / °C
- Output Impedance: 50 ohms
- Min. Load Impedance: 50K ohms
- Power Supply: 12 - 24 Vdc @ 20 mA
- Standard Cable Length: 3.2 ft. (1 m)

Sensor Specifications

- Environmental Rating: NEMA 4 (IP65)
- Ambient Temperature Range: 32° to 160°F (0 to 70°C)
- With air cooling 32° to 200°F (0 to 90°C)
- With water cooling 32° to 500°F (0 to 260°C)
- Thread: 3/4-16 UNF, optional 18M x 1
- Storage Temperature: -22° to 185°F (-30 to 85°C)
- Relative Humidity: 10 to 90%, non-condensing

Accessories

Part Number	Description
REN25001	Fixed Mounting Bracket
REN25002	Adjustable Mounting Bracket
REN25003	Lens Air Purge Collar
REN25004	Right Angle Mirror

WARNING: Cancer and Reproductive Harm - www.P65Warnings.ca.gov.