I N F O S E N S E ™

INFOSENSE[™] Sensor Technology Saves Costs by Reducing Variation in Your Process



Watlow's INFOSENSE™ sensor technology instantly improves the accuracy of thermocouple and RTD sensors by a minimum of 50 percent by using Watlow's NIST-traceable calibration information. For example, thermocouples manufactured by Watlow are calibrated to determine whether they are standard or special limits accuracy. The sensor error is then described throughout its full temperature range with a polynomial curve. INFOSENSE technology takes four points from that calibration curve using four three-digit numbers and a bar code on a tag attached to each sensor. The user then enters each value into a compatible controller's memory through the controller's standard menu or bar code data port. INFOSENSE-compatible electronics use these four data points to reconstruct a simple three-line segment error connection. Entering these codes immediately improves accuracy across the entire temperature range by approximately 50 percent or more. Improved accuracy reduces uncertainty in the application, improving product quality and yield. Easier communication of sensor information saves money by reducing installation time. The INFOSENSE calibration feature is a cost-effective option on most Watlow RTDs and thermocouples.

Applications

- · Analytical, labs, scientific
- Chemical processing
- Environmental chambers
- Foodservice equipment
- Life sciences
- Packaging
- Plastics
- Power generation
- Semiconductor

Features and Benefits

Utilization of calibration information improves sensor performance

- Doubles the original sensor accuracy
- Improved accuracy reduces process variation
- · Less process variation improves product quality

Four simple calibration codes

- Reduces installation costs
- Cost effective
- Barcode provides for automatic data input

Available Options

- Standard mineral insulated and tube and wire (general industrial) thermocouples
- DIN Class A RTDs, minimum 4.5 in. (114 mm) sheath length
- Custom calibrations available



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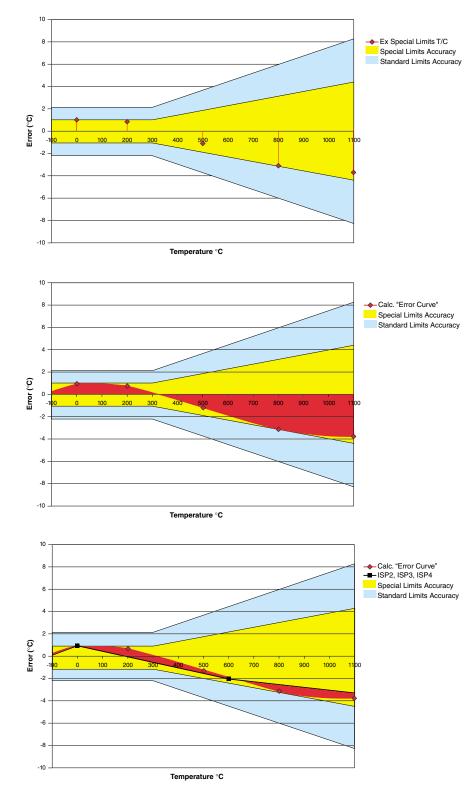






INFOSENSE Graphs

In example number one each thermocouple manufactured by Watlow is calibrated to determine whether it is standard or special limits accuracy.



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This sensor accuracy is then described throughout its full temperature range with a polynomial curve.

INFOSENSE technology takes four points from that calibration curve using four three-digit numbers and a bar code on a tag attached to each sensor. The user then enters each value into a compatible controller's memory through the controller's standard menu or barcode data port. INFOSENSE-compatible electronics use these four data points to reconstruct a simple three-line segment error correction. Entering these codes immediately improves accuracy across the entire temperature range.