Strap Units and Remote Probe Units

Rev. 07/08/20

Temperature Sensors

- Clamp-On, Spring-Loaded or Remote Probes

These units are designed to monitor water temperature in retrofit or filled pipe applications. The strap units fit around the outside of a pipe, while the remote probes are strapped directly onto the pipe. All three units measure the water temperature by sensing the surface temperature of the pipe.

Strap Units and Remote Probes come standard with a Junction Box enclosure but are also available with a BAPI-Box Crossover enclosure.

Clamp-On Strap - This unit has a bendable copper sensing plate which forms to the curvature of the pipe. An adjustable hose clamp holds the unit in place around the pipes from 2 to 4.5" (5 to 11.4 cm) in diameter.

Spring-Loaded Strap – Instead of removing the pipe insulation, the spring loaded sensing pad is held against the pipe through a hole cut in the insulation. It can be used with 5 to 14.5" (13 to 37 cm) dia. pipes with up to 2" of insulation.

Remote Probes - These units have a 1.75" long stainless steel probe with either Plenum-Rated Cable or FEP-Jacketed Cable with a lead length of 18" (Other lengths are available by calling BAPI). Remote Probes are ideal for strap-on applications on any size pipe, or hard-to-access areas.

(See pg A48 for more Remote Probe Options.)





The BAPI-Box Crossover enclosure features a hinged cover with thumb latch for easy termination. A pierceable knockout plug is available for the open port. See the Accessories section for more info.

(Shown with knockout plug sold separately.)

Specifications

Enclosure Material:

Junction Box: Galvanized Steel **BAPI-Box Crossover:** UV-resistant polycarb., UL94, V-0

Environmental Operation Range:

Temperature Sensor: Clamp On: -40 to 85 °C, Spring Loaded: -40 to 85 °C

Remote Probe w/ Plen. Cable: -40 to 105°C Remote Probe w/ FEP Cable: -20 to 75°C Temperature Transmitter: -20 to 70 °C

Humidity: 0 to 95%, non-condensing

Enclosure Rating:

Junction Box: IP20, NEMA 1 BAPI-Box Crossover (BBX): IP10, NEMA 1

IP44 with knockout plug in open port

Sensing Element:

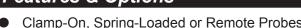
Thermistor or RTD (See Sensors Section for Specs.)

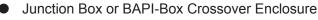
Encl. Dimensions: HxWxD

BAPI-Box Crossover:.. 3.1 x 2.2 x 1.9" (79 x 56 x 49mm)

(For encl. dimension drawings, turn to the end of the section.)

















Strap Units and Remote Probe Units

Temperature Sensors

Use the Option Selection Guide below to create your custom part number. Replace the number and parenthesis with the designator for each selection. Skip the designator and dashes for optional selections that are not required in your configuration.

Strap Sensor Option Selection Guide

BA/(#1)-(#2)-(#3)-(#4)

#1: Temperature Sensor (required)

1.8K 1.8K Thermistor 3K 3K Thermistor 10K-2 10K-2 Thermistor 10K-3...... 10K-3 Thermistor 10K-3[11K]...... 10K-3[11K] Thermistor 20K 20K Thermistor

1K[375] 1K Platinum RTD (375 curve)

1K[NI]......1K Ω Nickel RTD

Transmitters below require a BAPI-Box Crossover Enclosure

T1K[32 TO 212F]..... 1K Plat. RTD Transmitter, 4 to 20 mA Output, 32 to 212°F Range T1K[20 TO 120F]..... 1K Plat. RTD Transmitter, 4 to 20 mA Output, 20 to 120°F Range T1K[0 TO 100F]...... 1K Plat. RTD Transmitter, 4 to 20 mA Output, 0 to 100°F Range T1K[0 TO 100C] 1K Plat. RTD Transmitter, 4 to 20 mA Output, 0 to 100°C Range T1K[-7 TO 49C] 1K Plat. RTD Transmitter, 4 to 20 mA Output, -7 to 49°C Range T1K[-18 TO 38C] 1K Plat. RTD Transmitter, 4 to 20 mA Output, -18 to 38°C Range

Matched Transmitters are also available. Contact your BAPI representative for ordering.

#2: Strap Configuration or Lead Length (required)

STP......Spring Loaded Strap - fits 5 to 14.5" (13 to 37 cm) diameter pipes RPPRemote Probe with 18" of Plenum Rate Cable RPPFEP-18"..... Remote Probe with 18" of FEP-Jacketed Cable RPPFEP2-18"........... Remote Probe w/ 18" of FEP-Jacketed Cable (suitable for submersion)

#3: Enclosure (optional, comes standard with Junction Box)

BBXBAPI-Box Crossover (IP10, NEMA 1)

#4: Test & Balance or Terminal Strip (optional, requires a BAPI-Box Crossover Enclosure)

TB......Test & Balance Switch TS......Terminal Strip Connection

Additional options are available for these units but not shown in this Selection Guide. Contact your BAPI representative for the complete list of options.

Example Number: BA/ (**10K-2**) - (**S**) - (**BBX**) - (

Actual Number (with parenthesis removed): BA/10K-2-S-BBX

Description: 10K-2 Thermistor, Clamp-On Strap, BAPI-Box Crossover Enclosure, No Terminal Strip.

Your Number: BA/

