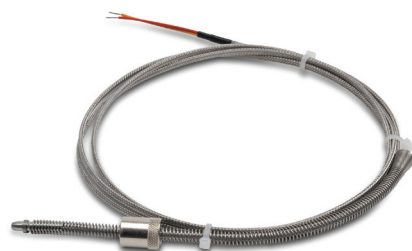# prosense® Thermocouple Adjustable Immersion Sensors
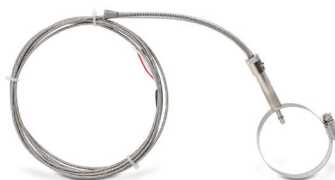
THMJ & K - D08LXX-01 & 02

THMJ & K - A01LXX-01 & 02

Spring Adjustable

Armor Adjustable

Shown with optional PCA pipe clamp adapter

Overview

- Ideal thermocouple sensors for the plastics processing industry
- Type J or K thermocouple elements to meet many temperature sensing applications
- Spring adjustable and armor adjustable styles allow for variable immersion depths
- Integral bayonet cap makes installation and removal quick and easy when used with a bayonet adaptor or pipe clamp adapter
- Made in the USA

Thermocouple Spring Adjustable Immersion Sensors - Types J and K

Part Number	Pcs/Pkg	Wt (lb)	Price	Type	Junction Type	Sensor Dimensions	Lead Wire Length (ft)	Temperature Sensing Range	Mounting
THMJ-D08L04-01	1	0.6	$;08ht:	J	Grounded	1/4" length x 3/16" O.D. sensing tip 8" length x 0.263" diameter spring.	4	0 to 482°C (32 to 900°F)	Bayonet fitting cap 7/16" inside diameter, single slot. Mount with ProSense bayonet fitting adapter or pipe clamp adapter (purchased separately - see accessories)
THMJ-D08L06-01			$08hu:	J			6		
THMJ-D08L10-01			$08hv:	J			10		
THMK-D08L04-01			$08h_:	K			4		
THMK-D08L06-01			$08h#:	K			6		
THMK-D08L10-01			$;08h!:	K			10		
THMJ-D08L10-02			$08hx:	J	Ungrounded		10		
THMK-D08L10-02			$08h?:	K			10		

Thermocouple Armor Adjustable Immersion Sensors - Types J and K

Part Number	Pcs/Pkg	Wt (lb)	Price	Type	Junction Type	Sensor Dimensions	Lead Wire Length (ft)	Temperature Sensing Range	Mounting
THMJ-A01L04-01	1	0.6	$08ho:	J	Grounded	1/4" length x 3/16" O.D. sensing tip 0.275" O.D. flexible armor	4	0 to 482°C (32 to 900°F)	Bayonet fitting cap 7/16" inside diameter, single slot. Mount with ProSense bayonet fitting adapter or pipe clamp adapter (purchased separately - see accessories)
THMJ-A01L06-01			$08hp:	J			6		
THMJ-A01L10-01			$08hq:	J			10		
THMK-A01L04-01			$08hy:	K			4		
THMK-A01L06-01			$08hz:	K			6		
THMK-A01L10-01			$;08h]:	K			10		
THMJ-A01L10-02			$08hs:	J	Ungrounded		10		
THMK-A01L10-02			$;08h[:	K			10		

Technical Specifications

ASTM E320 Standard Limits of Error	±2.2°C (±4.0°F) or 0.75%, whichever is greater
Probe	1/4" length x 3/16" O.D. sensing tip, 316 stainless steel sheath, single thermocouple element
Response Time	2.9 seconds, 63.2% of a 25-77°C step change per method ASTM E839
Wiring	Spring adjustable: Stranded 20 AWG wire leads with stripped ends, fiberglass insulation and stainless steel overbraid Armor adjustable: Stranded 20 AWG wire leads with stripped ends, fiberglass insulation and flexible armor This probe is not sealed and cannot be immersed in liquids

Note: Check the chemical compatibility of the sensor's wetted parts with the medium to be measured.

prosense® Thermocouple Adjustable Immersion Sensors
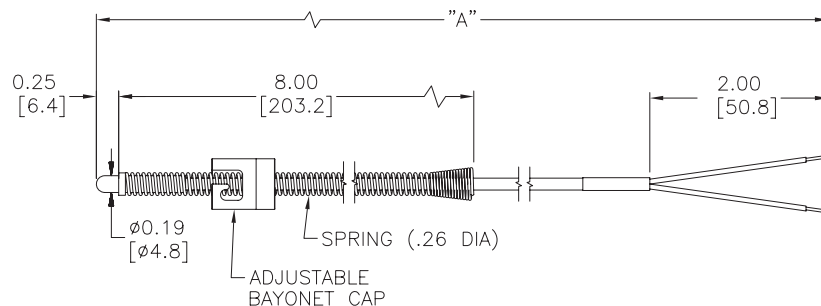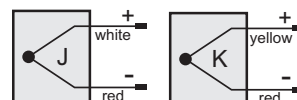
Dimensions
inches [mm]

THMJ & K - D08LXX-01 & 02

"A"

0.25 [6.4]

8.00 [203.2]

2.00 [50.8]

ø0.19 [ø4.8]

SPRING (.26 DIA)

ADJUSTABLE BAYONET CAP

TABLE A	
PART NUMBER	DIM "A"
THMJ−D08L04−01	48.00[1219.2]
THMJ−D08L06−01	72.00[1828.8]
THMJ−D08L10−01	120.00[3048.0]
THMK−D08L04−01	48.00[1219.2]
THMK−D08L06−01	72.00[1828.8]
THMK−D08L10−01	120.00[3048.0]
THMJ−D08L10−02	120.00[3048.0]
THMK−D08L10−02	120.00[3048.0]

Wiring Information

Type J: (+) white (-) red
Type K: (+) yellow (-) red

- Must use thermocouple extension lead wire
- Observe polarity when making connections
- Do not use standard wire nuts

J: + white − red

K: + yellow − red

Dimensions
inches [mm]

THMJ & K - A01LXX-01 & 02

DIM "A"

6.00 [152.4]

0.25 [6.4]

2.00 [50.7]

ø0.19 [ø4.8]

FLEXIBLE ARMOR (.28 DIA)

ADJUSTABLE BAYONET CAP
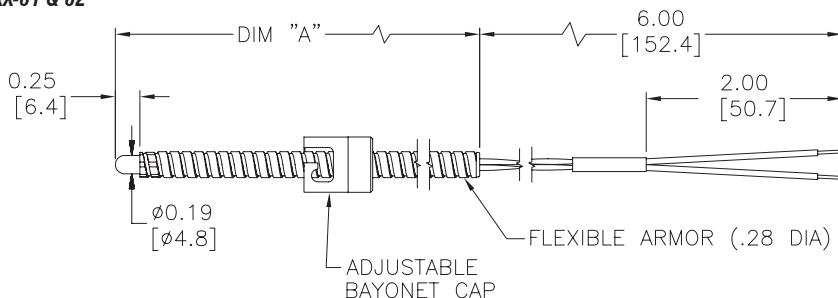
TABLE A	
PART NUMBER	DIM "A"
THMJ−A01L04−01	48.00[1219.2]
THMJ−A01L06−01	72.00[1828.8]
THMJ−A01L10−01	120.00[3048.0]
THMK−A01L04−01	48.00[1219.2]
THMK−A01L06−01	72.00[1828.8]
THMK−A01L10−01	120.00[3048.0]
THMJ−A01L10−02	120.00[3048.0]
THMK−A01L10−02	120.00[3048.0]

Wiring Information

Type J: (+) white (-) red
Type K: (+) yellow (-) red

- Must use thermocouple extension lead wire
- Observe polarity when making connections.
- Do not use standard wire nuts

J: + white − red

K: + yellow − red
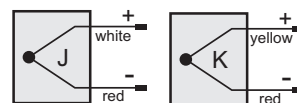
prosense® Thermocouple Adjustable Immersion Sensors - Accessories

Accessories

Part No.	Description	Pcs/Pkg	Price
BA-078	Bayonet adapter, 7/8 inch long, 7/16 inch outside diameter, 9/32 inch inside diameter, 1/8 inch MNPT	1	$4bb:
BA-100	Bayonet adapter, 1 inch long, 7/16 inch outside diameter, 9/32 inch inside diameter, 1/8 inch MNPT	1	$4bc:
BA-114	Bayonet adapter, 1-1/4 inch long, 7/16 inch outside diameter, 9/32 inch inside diameter, 1/8 inch MNPT	1	$4be:
BA-112	Bayonet adapter, 1-1/2 inch long, 7/16 inch outside diameter, 9/32 inch inside diameter,1/8 inch MNPT	1	$4bd:
BA-200	Bayonet adapter, 2 inch long, 7/16 inch outside diameter, 9/32 inch inside diameter, 1/8 inch MNPT	1	$;4bf:
BA-212	Bayonet adapter, 2-1/2 long, 7/16 inch outside diameter, 9/32 inch inside diameter, 1/8 inch MNPT	1	$4bg:
BA-300	Bayonet adapter, 3 inch long, 7/16 inch outside diameter, 9/32 inch inside diameter, 1/8 inch MNPT	1	$4bh:
BA-312	Bayonet adapter, 3-1/2 long, 7/16 inch outside diameter, 9/32 inch inside diameter, 1/8 inch MNPT	1	$-4bi:
PCA-125	Pipe clamp adapter, 11/16 to 1-1/4 inch adjustable diameter, 2-inch attached bayonet adapter with 7/16 inch outside diameter and 9/32 inch inside diameter. Use with Prosense adjustable immersion sensors	1	$-04bj:
PCA-200	Pipe clamp adapter with 1-1/16 to 2 inch adjustable diameter, 2-inch attached bayonet adapter with 7/16 inch outside diameter and 9/32 inch inside diameter. Use with Prosense adjustable immersion sensors	1	$04bk:
PCA-300	Pipe clamp adapter with 2-1/16 to 3 inch adjustable diameter, 2-inch attached bayonet adapter with 7/16 inch outside diameter and 9/32 inch inside diameter. Use with Prosense adjustable immersion sensors	1	$-04bl:
PCA-425	Pipe clamp adapter with 3-5/16 to 4-1/4 inch adjustable diameter, 2-inch attached bayonet adapter with 7/16 inch outside diameter and 9/32 inch inside diameter. Use with Prosense adjustable immersion sensors	1	$04bn:
PCA-500	Pipe clamp adapter with 4-1/8 to 7 inch adjustable diameter, 2-inch attached bayonet adapter with 7/16 inch outside diameter and 9/32 inch inside diameter. Use with Prosense adjustable immersion sensors	1	$04bo:
THMJ-SP	Thermocouple connector, Type J, standard round pin plug, maximum continuous temperature 400°F (200°C), glass filled thermoplastic black body, thermocouple material pins, 14 AWG maximum (2.0 mm) wire size	1	$-43i:
THMJ-SJ	Thermocouple connector, Type J, standard round pin jack, maximum continuous temperature 400°F (200°C), glass filled thermoplastic black body, thermocouple material pins, 14 AWG maximum (2.0 mm) wire size	1	$43h:
THMK-SP	Thermocouple connector, Type K, standard round pin plug, maximum continuous temperature 400°F (200°C), glass filled thermoplastic yellow body, thermocouple material pins, 14 AWG maximum (2.0 mm) wire size	1	$43s:
THMK-SJ	Thermocouple connector, Type K, standard round pin jack, maximum continuous temperature 400°F (200°C), glass filled thermoplastic yellow body, thermocouple material pins, 14 AWG maximum (2.0 mm) wire size	1	$43q:
THMJ-SPJ	Thermocouple connector, Type J, standard round pin panel jack, maximum continuous temperature 400°F (200°C), glass filled thermoplastic black body, thermocouple material pins, 14 AWG (2.0 mm) maximum wire size	1	$-043j:
THMK-SPJ	Thermocouple connector, Type K, standard round pin panel jack, maximum continuous temperature 400°F (200°C), glass filled thermoplastic yellow body, thermocouple material pins, 14 AWG (2.0 mm) maximum wire size	1	$;043t:
WCB-S	Wire / cable clamp bracket for use with standard thermocouple and RTD connectors.	4	$05hp:

Note: Thermocouple extension lead wire available at www.automationdirect.com
See end of section for full listing of accessories and dimension information.

BA-078

THMJ-SJ

PCA-XXX

BA-114

THMJ-SP

BA-300

THMJ-SPJ

Pipe Clamp Adapter

Bayonet Mounting Adapters

Thermocouple Connectors