DOUBLE-SIDED, SPRING-LOADED PROCESS MOUNTING WITH TERMINAL HEAD OPTIONS

How to build a part number:

To order an Applied Sensor Technologies temperature sensor, select the requirements for the categories listed below and fill in the corresponding boxes with your selection. Don't see exactly what you need? Give us a call!

SENSOR TYPE	ASSEMBLY STYLE	SHEATH DIAMETER	SHEATH MATERIAL	CALIBRATION	HOT JUNCTION	SHEATH LENGTH	LEADWIRE LENGTH	OPTION

SENSOR TYPE
MI – Mineral insulated thermocouple

ASSEMBLY STYLE
75 – **Sheath with double-sided, spring-loaded fitting**; Teflon® insulated conductors; 1/2" NPT stainless steel connection. (Note: a variety of terminal heads may be added to this style – see page 1-5b)

SHEATH DIAMETER (in inches)
4 – 1/8 (0.125)
6 – 3/16 (0.188)
7 – 1/4 (0.250)
9 – 3/8 (0.375)

SHEATH MATERIAL
3 – 316 stainless steel
5 – Inconel® 600

CALIBRATION Standard limits
J – Single J **JJ** – Dual J
K – Single K **KK** – Dual K
T – Single T **TT** – Dual T
E – Single E **EE** – Dual E
Special limits are available – consult AST

HOT JUNCTION
G – Grounded junction
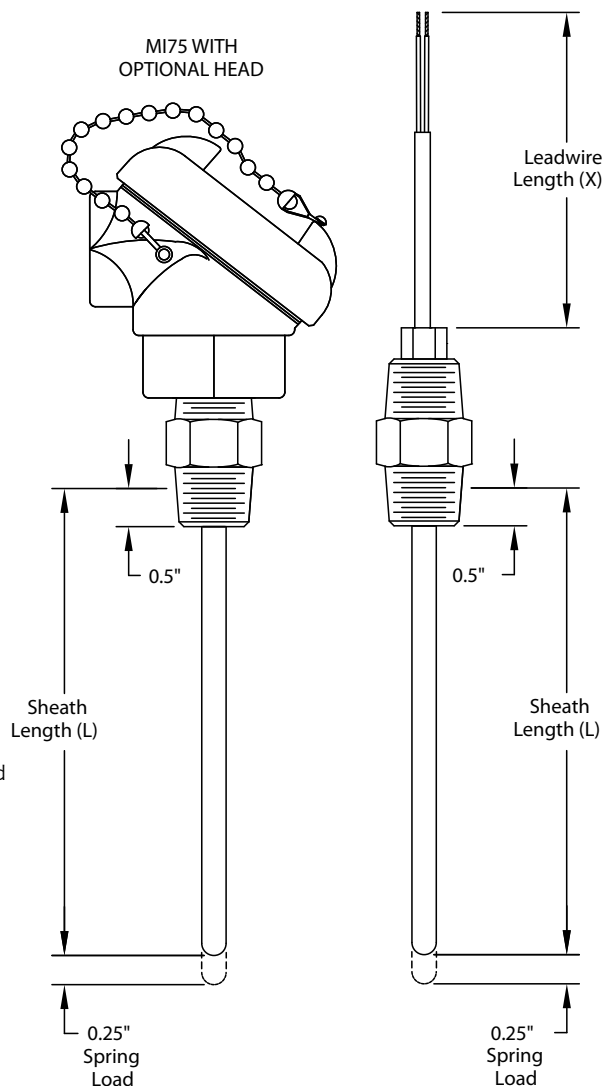**U** – Ungrounded junction

SHEATH LENGTH (Note: lengths over L84 will be shipped coiled unless otherwise specified at time of order)
L# – (e.g., L6 = 6 inch sheath, L12.5 = 12-1/2" length)

LEADWIRE LENGTH
X# - (e.g., X3 = 3 inch length; X3 is standard if specifying a terminal head)

OPTIONS – see back page

MI75 WITH
OPTIONAL HEAD

Leadwire Length (X)

0.5"

0.5"

Sheath Length (L)

Sheath Length (L)

0.25"
Spring Load

0.25"
Spring Load

AVAILABLE OPTIONS and MODIFICATIONS

ASSEMBLY OPTIONS	
Option Code	Description
TAG1	Stainless steel tag and wire
CAL1	NIST traceable calibration [specify point(s)]
CRT1	Certificate of conformance
RB10	Replace terminal block with customer supplied part
RB11	Supply assembly with no terminal block inside head
WC20	Wiring cable gland for 0.187 - 0.312 diameter cables, for terminal heads with 1/2" NPT conduit connections
WC21	Wiring cable gland for 0.125 - 0.187 diameter cables, for terminal heads with 1/2" NPT conduit connections
WIRING CONNECTION OPTIONS	
Option Code	Description
WC76	#6 spade terminals, plated copper
WC70	#10 spade terminals, plated copper
WC84	1/4" push-on insulated terminals, plated copper
WC90	#10 ring terminals
WC98	#8 ring terminals
TRANSMITTERS – For complete specs, see Transmitters section	
TR11	4-20 mA, 2-wire; single input; isolated output; specify range, units of measure (e.g., 0-200°C) and terminal head with *.
TR12	4-20 mA, 2-wire transmitter, single input, non-isolated output; specify range and units of measure (e.g., 0-200°C) and terminal head with *.
TR13	HART®/ 4-20 mA, 2-wire transmitter, single input, isolated output; specify range and units of measure (e.g., 0-200°C) and terminal head with *.

THERMOWELLS & PROTECTION TUBES

For a complete offering of metal, ceramic and composite material thermowells and protection tubes, please see the Thermowell and Protection Tube sections.

NEMA 4 OR 4X TERMINAL HEAD OPTIONS			
Head without ground screw	Head with internal ground screw	Process Connection	Conduit Connection
Cast aluminum, screw cover with chain, NEMA 4			
HD10*	HD11*	1/2"	1/2"
HD12*	HD13*	1/2"	3/4"
Epoxy-coated aluminum, screw cover with chain, NEMA 4X			
HD50*	HD51*	1/2"	1/2"
HD52*	HD53*	1/2"	3/4"
Cast iron, screw cover with chain, NEMA 4			
HD20*	HD21*	1/2"	1/2"
HD22*	HD23*	1/2"	3/4"
316 stainless steel, screw cover with chain, NEMA 4X			
HD40*	HD41*	1/2"	3/4"
White polypropylene, screw cover with chain, NEMA 4			
HD30	N/A	1/2"	3/4"
Black polypropylene, screw cover with chain, NEMA 4			
HD31	N/A	1/2"	3/4"
Nylon, screw cover			
HD32	N/A	1/2"	1/2"

EXPLOSION-PROOF TERMINAL HEAD OPTIONS **		
Option Code	Process Connection	Conduit Connection
Cast aluminum, screw cover with chain; o-ring gasket rated to 100°C; ceramic terminal block; FM/CSA approved for Class I Div. 1, Groups B, C, D; Class II, Groups E, F, G; internal ground screw		
HD70*	1/2"	1/2"
HD71*	1/2"	3/4"
Stainless steel (same spec as HD70/71)		
HD74*	1/2"	1/2"
HD75*	1/2"	3/4"
Epoxy-coated (same spec as HD70/71)		
HD80*	1/2"	1/2"
HD81*	1/2"	3/4"
Cast aluminum; ATEX approved for EEx d llC; screw cover with chain; silicone rubber o-ring gasket; ceramic terminal block; rated for NEMA 4X, IP66 to IP68; internal and external ground screws		
HD72*	1/2"	1/2"
HD73*	1/2"	3/4"
Cast aluminum (Formerly Style 60); screw cover; plastic terminal block; UL/CSA approved for Class I Div. 1, Groups C and D; Class II Groups E, F and G.		
HD60	1/2"	1/2"
HD61	1/2"	3/4"
*can be used with transmitters		

**Note –assemblies using XP heads are not 3rd-party certified. Approval applies to head only.
Note: Many non-standard options, including additional sheath diameters and materials, may also be available − consult AST for specific requirements. HART® is a registered trademark of the HART Communication Foundation.