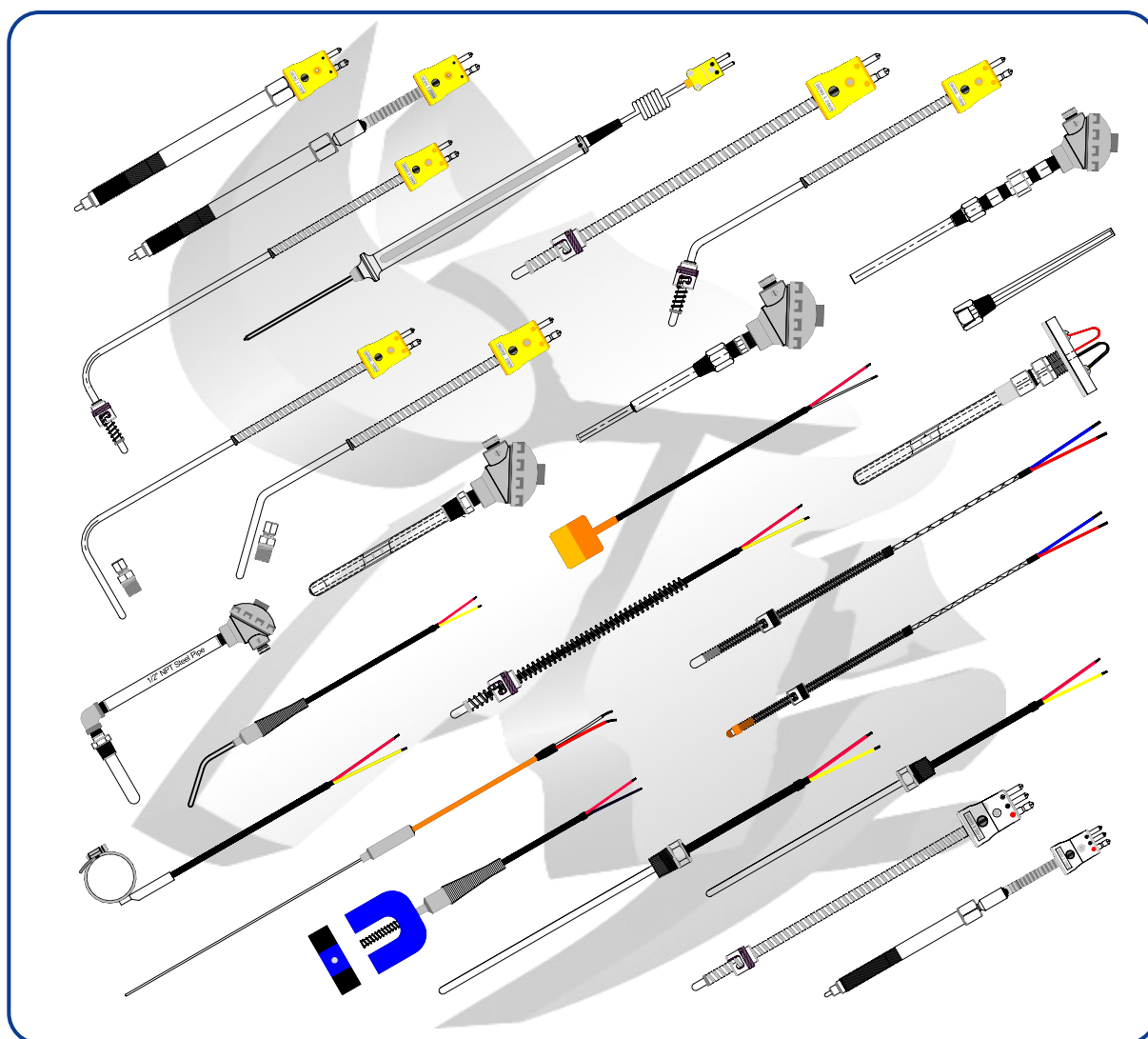




Mineral Insulated (MgO) Thermocouples for Industrial Applications



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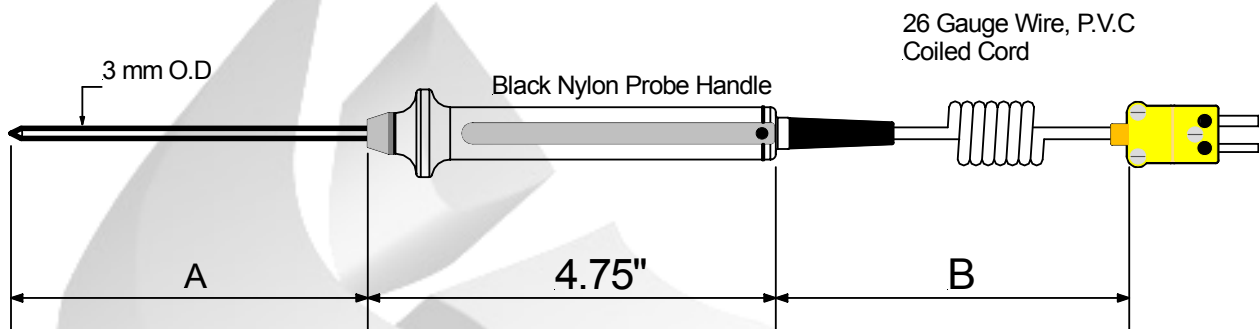
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Process Industry Thermocouples

Mineral Insulated Thermocouple With Plastic Handle



Maximum operating temperature 900 F or 500 C.

Steps To Follow:

Model:

L1

1.	2.	3.	4.	5.	6.

1.	Probe Tip Option
R	Radius Tip Style
D	Drill Tip Style

2.	Termination Type
1	3" Split Leads & 1/2" Bare Ends.
2	Mini Male Plug

3.	"A" Dimension
"A" = <u>0 4</u> " Length In Inches	

4.

Coiled Cord "B" Dimension		
	Retracted Length	Extended Length
A	12"	48" to 60"
B	24"	120"
C	32"	180"
D	60"	30 ft
E	96"	45 ft

5.	Calibration
1	J (+) Iron Vs. (-) Constantan
2	K (+) Ni.-Chromium Vs. (-) Ni.-Aluminum
3	T (+) CU. Copper Vs. (-) Cu.-Ni. Nickel

For all other calibrations contact factory for availability.

6.	Junction
G	Grounded
U	Ungrounded

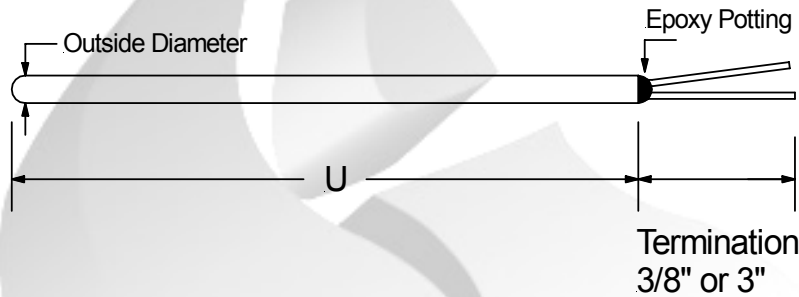
Nordic Sensors Ind. Inc. Tel: 1-888-667-3421 & Fax: 1-888-867-9986.

Mineral Insulated Thermocouple

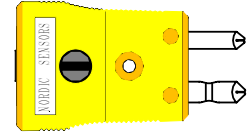
Straight Thermocouple Elements

Operating Temperature:
-200 C to +1000 C Max.

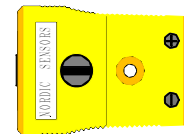
Model Code: **M1**



Optional Male Connector



Optional Female Connector



Model:

A

B

C

D

E

F

G

M1

A	Outside Diameter
1	0.020"
2	0.040"
3	0.063"
4	0.125"
5	0.188"
6	0.250"
7	0.315"
8	0.375"

B	Sheath Material
A	304 Stainless
B	316 Stainless
C	310 Stainless
D	Inconel 600

C	"U" Dimension
Specify "U" Length In Inches <u>0</u> <u>0</u> <u>6</u>	

Example "U" is 6" = 006

D	"U" Fractional Dimension
A	0.125"
B	0.188"
C	0.250"
D	0.315"
E	0.375"
F	0.500"
G	0.625"
H	0.750"
I	0.875"
J	None

E	Calibration
Standard Limits of Error	Special Limits of Error
1	J
2	K
3	T
4	E
5	N
6	J
7	K
8	T
9	E
10	N

F	Junction Styles				
Element Description	Grounded	Ungrounded		Exposed	
	Common	Common	Isolated	Common	Isolated
Single	G		U		E
Duplex	D	F	H	I	M
Triplex	T	Q	R	S	V

G	Termination
1	3/8" Split bare leads.
2	3" Split & Color Coded leads.
3	Standard Male Plug (425 F)
4	Standard Female Jack (425 F)
5	Mini Male Plug (425 F)
6	Mini Female Jack (425 F)
7	Hi Temp. Male Plug (800 F)
8	Hi Temp. Female Jack (800 F)

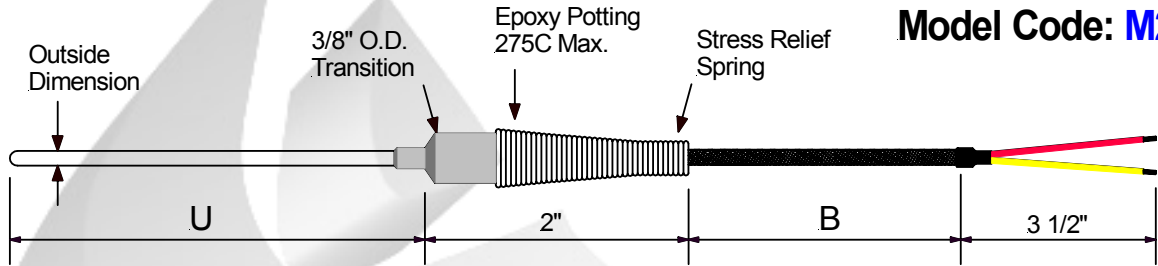
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Mineral Insulated Thermocouple

General Purpose Thermocouple

Operating Temperature:
-200 C to +1000 C Max.

Model Code: **M2**



Compression fittings are sold separately. See accessory section.

Model:

M2

A	Outside Diameter
1	0.020"
2	0.040"
3	0.063"
4	0.125"
5	0.188"
6	0.250"
7	0.315"
8	0.375"

B	Sheath Material
A	304 Stainless
B	316 Stainless
C	310 Stainless
D	Inconel 600

C	"U" Dimension
Specify "U" Length In Inches <u>0 0 6</u>	

Example "U" is 6" = 006

D	"U" Fractional Dimension
A	0.125"
B	0.188"
C	0.250"
D	0.315"
E	0.375"
F	0.500"
G	0.625"
H	0.750"
I	0.875"
N	None

E	Calibration
Standard Limits of Error	
1	J
2	K
3	T
4	E
5	N
Special Limits of Error	
6	J
7	K
8	T
9	E
10	N

F	Junction Styles				
Element Description	Grounded	Ungrounded		Exposed	
	Common	Common	Isolated	Common	Isolated
Single	G		U		E
Duplex	D	F	H	J	M

G	"B" Dimension
Specify "B" Length In Inches <u>0 4 8</u>	

Example "B" is 48" = 048

H	Cable Insulation Description
A	20 Gage, Stranded, Metal Braid
B	20 Gage, Stranded, Fiberglass
C	.281" O.D. Flexible Armor Cable
D	20 Gage, Stranded, Teflon
E	20 Gage, Stranded, PVC
F	.210" O.D. Flexible Armor Cable

I	Termination
1	3" Split Leads & 1/2" bare ends.
2	3" Split Leads & Spade Lugs.
3	Standard Male Plug (425 F)
4	Standard Female Jack (425 F)
5	Mini Male Plug (425 F)
6	Mini Female Jack (425 F)
7	Hi Temp. Male Plug (800 F)
8	Hi Temp. Female Jack (800 F)

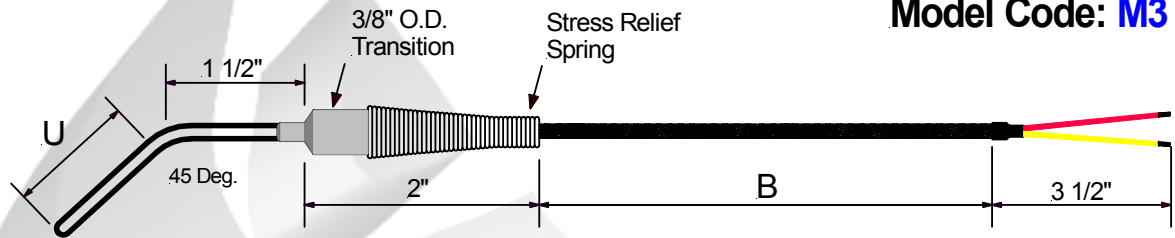
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Mineral Insulated Thermocouple

General Purpose Thermocouple: 45 Deg. Bend

Operating Temperature:
-200 C to +1000 C Max.

Model Code: **M3**



Compression fittings are sold separately. See accessory section.

Model: A B C D E F — G H I

M3

A	Outside Diameter
1	0.020"
2	0.040"
3	0.063"
4	0.125"
5	0.188"
6	0.250"
7	0.315"
8	0.375"

B	Sheath Material
A	304 Stainless
B	316 Stainless
C	310 Stainless
D	Inconel 600

C	"U" Dimension
Specify "U" Length In Inches <u>0 0 6</u>	

Example "U" is 6" = 006

D	"U" Fractional Dimension
A	0.125"
B	0.188"
C	0.250"
D	0.315"
E	0.375"
F	0.500"
G	0.625"
H	0.750"
I	0.875"
N	None

E	Calibration
Standard Limits of Error	
1	J
2	K
3	T
4	E
5	N
Special Limits of Error	
6	J
7	K
8	T
9	E
10	N

F	Junction Styles				
Element Description	Grounded	Ungrounded		Exposed	
	Common	Common	Isolated	Common	Isolated
Single	G		U		E
Duplex	D	F	H	I	M

G	"B" Dimension
Specify "B" Length In Inches <u>0 4 8</u>	

Example "B" is 48" = 048

H	Cable Insulation Description
A	20 Gage, Stranded, Metal Braid
B	20 Gage, Stranded, Fiberglass
C	.281" O.D. Flexible Armor Cable
D	20 Gage, Stranded, Teflon
E	20 Gage, Stranded, PVC
F	.210" O.D. Flexible Armor Cable

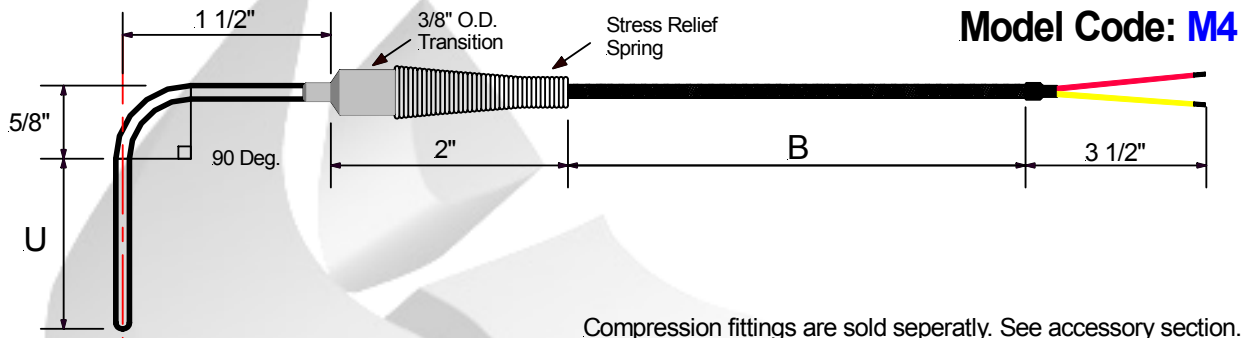
I	Termination
1	3" Split Leads & 1/2" bare ends.
2	3" Split Leads & Spade Lugs.
3	Standard Male Plug (425 F)
4	Standard Female Jack (425 F)
5	Mini Male Plug (425 F)
6	Mini Female Jack (425 F)
7	Hi Temp. Male Plug (800 F)
8	Hi Temp. Female Jack (800 F)

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Mineral Insulated Thermocouple

General Purpose Thermocouple: 90 Deg. Bend

Operating Temperature:
-200 C to +1000 C Max.



Model:

M4

A	Outside Diameter
1	0.020"
2	0.040"
3	0.063"
4	0.125"
5	0.188"
6	0.250"
7	0.315"
8	0.375"

B	Sheath Material
A	304 Stainless
B	316 Stainless
C	310 Stainless
D	Inconel 600

C	"U" Dimension
Specify "U" Length In Inches <u>0 0 6</u>	

Example "U" is 6" = 006

D	"U" Fractional Dimension
A	0.125"
B	0.188"
C	0.250"
D	0.315"
E	0.375"
F	0.500"
G	0.625"
H	0.750"
I	0.875"
N	None

E	Calibration
Standard Limits of Error	
1	J
2	K
3	T
4	E
5	N
Special Limits of Error	
6	J
7	K
8	T
9	E
10	N

F	Junction Styles				
Element Description	Grounded	Ungrounded		Exposed	
	Common	Common	Isolated	Common	Isolated
Single	G		U		E
Duplex	D	F	H	I	M

G	"B" Dimension
Specify "B" Length In Inches <u>0 4 8</u>	

Example "B" is 48" = 048

H	Cable Insulation Description
A	20 Gage, Stranded, Metal Braid
B	20 Gage, Stranded, Fiberglass
C	.281" O.D. Flexible Armor Cable
D	20 Gage, Stranded, Teflon
E	20 Gage, Stranded, PVC
F	.210" O.D. Flexible Armor Cable

I	Termination
1	3" Split Leads & 1/2" bare ends.
2	3" Split Leads & Spade Lugs.
3	Standard Male Plug (425 F)
4	Standard Female Jack (425 F)
5	Mini Male Plug (425 F)
6	Mini Female Jack (425 F)
7	Hi Temp. Male Plug (800 F)
8	Hi Temp. Female Jack (800 F)

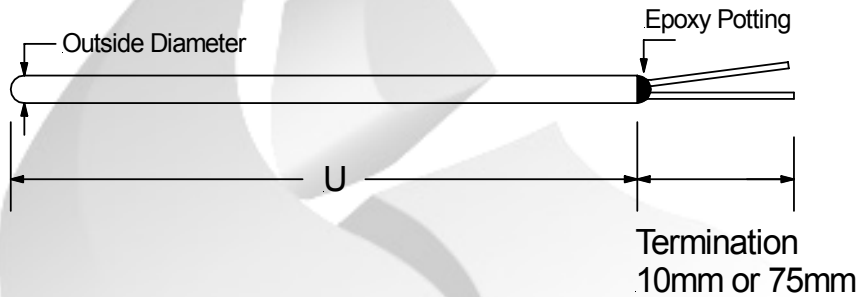
Nordic Sensors Ind. Inc. Tel: 1-888-667-3421 & Fax: 1-888-867-9986.

Mineral Insulated Thermocouple

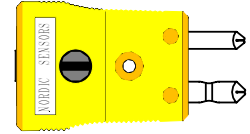
Metric Straight Thermocouple Elements

Operating Temperature:
-200 C to +1000 C Max.

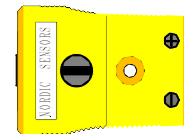
Model Code: **M5**



Optional Male Connector



Optional Female Connector



Model:

A

B

C

D

E

F

M5

A	Outside Diameter
1	0.5mm
2	1mm
3	1.5mm
4	2mm
5	3mm
6	4mm
7	5mm
8	6mm
9	8mm

B	Sheath Material
A	304 Stainless
B	316 Stainless
C	310 Stainless
D	Inconel 600

C	"U" Dimension
	Specify "U" Length In MM
	<u>1 5 0</u>

Example "U" is 150mm= 150

D		Calibration	
Standard Limits of Error		Special Limits of Error	
1	J	6	J
2	K	7	K
3	T	8	T
4	E	9	E
5	N	10	N

E	Junction Styles				
Element Description	Grounded	Ungrounded		Exposed	
	Common	Common	Isolated	Common	Isolated
Single	G		U		E
Duplex	D	F	H	I	M

F	Termination
1	10mm Split bare leads.
2	75mm Split & Color Coded leads.
3	Standard Male Plug (425 F)
4	Standard Female Jack (425 F)
5	Mini Male Plug (425 F)
6	Mini Female Jack (425 F)
7	Hi Temp. Male Plug (800 F)
8	Hi Temp. Female Jack (800 F)

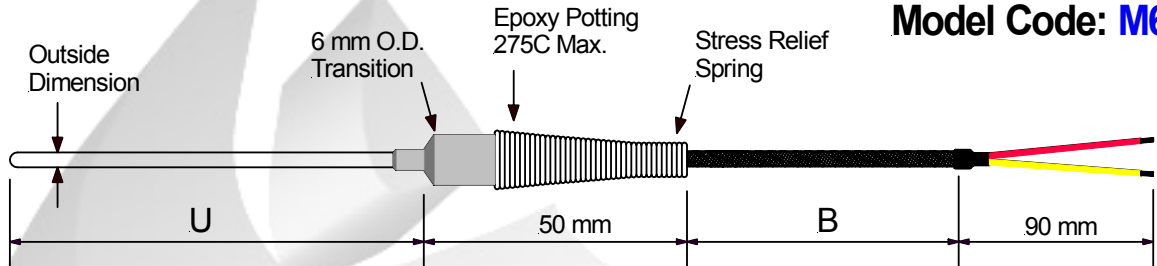
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Mineral Insulated Thermocouple

Metric General Purpose Thermocouple

Operating Temperature:
-200 C to +1000 C Max.

Model Code: **M6**



Compression fittings are sold separately. See accessory section.

Model:

M6

A	Outside Diameter
1	0.5 mm
2	1 mm
3	1.5 mm
4	2 mm
5	3 mm
6	4 mm
7	6 mm
8	8 mm

B	Sheath Material
A	304 Stainless
B	316 Stainless
C	310 Stainless
D	Inconel 600

C	"U" Dimension
Specify "U" Length In mm	
	<u>1 0 0</u>

Example "U" is 100 mm = 100

D	Calibration
Standard Limits of Error	
1	J
2	K
3	T
4	E
5	N
Special Limits of Error	
6	J
7	K
8	T
9	E
10	N

E	Junction Styles				
Element Description	Grounded	Ungrounded		Exposed	
	Common	Common	Isolated	Common	Isolated
Single	G		U		E
Duplex	D	F	H	I	M

F	"B" Dimension
Specify "B" Length In Meters	
	<u>0 2</u>

Example "B" is 2 Meters = 02

G	Cable Insulation Description
A	20 Gage, Stranded, Metal Braid
B	20 Gage, Stranded, Fiberglass
C	.281" O.D. Flexible Armor Cable
D	20 Gage, Stranded, Teflon
E	20 Gage, Stranded, PVC
F	.210" O.D. Flexible Armor Cable

H	Termination
1	75 mm Split Leads & 15 mm bare ends.
2	75 mm Split Leads & Spade Lugs.
3	Standard Male Plug (425 F)
4	Standard Female Jack (425 F)
5	Mini Male Plug (425 F)
6	Mini Female Jack (425 F)
7	Hi Temp. Male Plug (800 F)
8	Hi Temp. Female Jack (800 F)

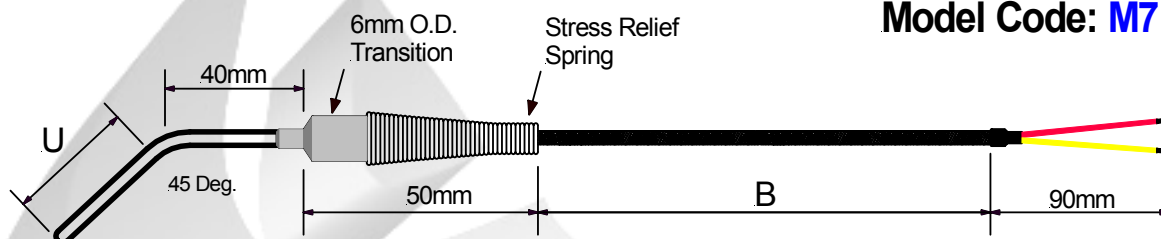
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Mineral Insulated Thermocouple

Metric General Purpose Thermocouple: 45 Deg. Bend

Operating Temperature:
-200 C to +1000 C Max.

Model Code: **M7**



Compression fittings are sold separately. See accessory section.

Model:

A

B

C

D

E

F

G

H

M7

A	Outside Diameter
1	0.5 mm
2	1 mm
3	1.5 mm
4	2 mm
5	3 mm
6	4 mm
7	6 mm
8	8 mm

B	Sheath Material
A	304 Stainless
B	316 Stainless
C	310 Stainless
D	Inconel 600

C	"U" Dimension
	Specify "U" Length In mm <u>1 0 0</u>

Example "U" is 100 mm = 100

D		Calibration	
Standard Limits of Error		Special Limits of Error	
1	J	6	J
2	K	7	K
3	T	8	T
4	E	9	E
5	N	10	N

E		Junction Styles			
Element Description	Grounded	Ungrounded		Exposed	
	Common	Common	Isolated	Common	Isolated
Single	G		U		E
Duplex	D	F	H	I	M

F	"B" Dimension
	Specify "B" Length In Meters <u>0 2</u>

Example "B" is 2 Meters = 02

G	Cable Insulation Description
A	20 Gage, Stranded, Metal Braid
B	20 Gage, Stranded, Fiberglass
C	.281" O.D. Flexible Armor Cable
D	20 Gage, Stranded, Teflon
E	20 Gage, Stranded, PVC
F	.210" O.D. Flexible Armor Cable

H	Termination
1	75 mm Split Leads & 15 mm bare ends.
2	75 mm Split Leads & Spade Lugs.
3	Standard Male Plug (425 F)
4	Standard Female Jack (425 F)
5	Mini Male Plug (425 F)
6	Mini Female Jack (425 F)
7	Hi Temp. Male Plug (800 F)
8	Hi Temp. Female Jack (800 F)

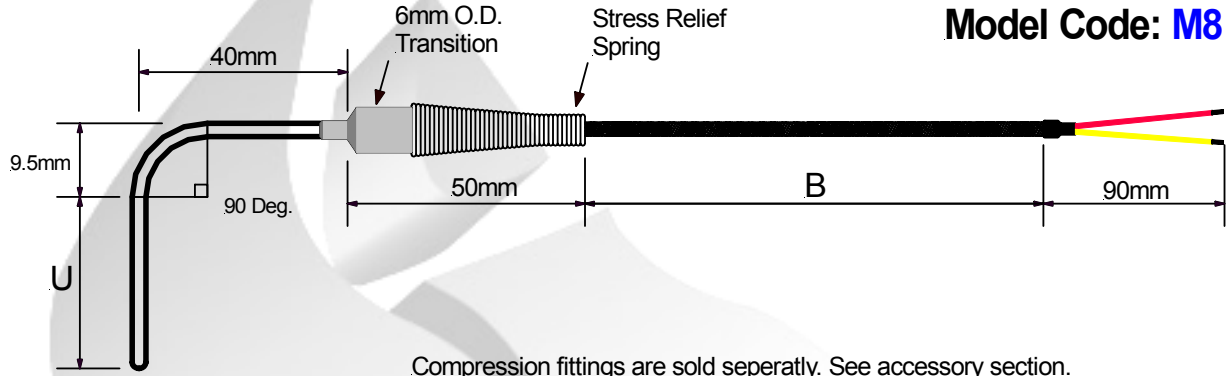
Nordic Sensors Ind. Inc. Tel: 1-888-667-3421 & Fax: 1-888-867-9986.

Mineral Insulated Thermocouple

Metric General Purpose Thermocouple: 90 Deg. Bend

Operating Temperature:
-200 C to +1000 C Max.

Model Code: **M8**



Model:

A

B

C

D

E

F

G

H

M8

A	Outside Diameter
1	0.5 mm
2	1 mm
3	1.5 mm
4	2 mm
5	3 mm
6	4 mm
7	6 mm
8	8 mm

B	Sheath Material
A	304 Stainless
B	316 Stainless
C	310 Stainless
D	Inconel 600

C	"U" Dimension
Specify "U" Length In mm	
	1 0 0

Example "U" is 100 mm = 100

D		Calibration	
Standard Limits of Error		Special Limits of Error	
1	J	6	J
2	K	7	K
3	T	8	T
4	E	9	E
5	N	10	N

E		Junction Styles			
Element Description	Grounded	Ungrounded		Exposed	
	Common	Common	Isolated	Common	Isolated
Single	G		U		E
Duplex	D	F	H	I	M

F	"B" Dimension
Specify "B" Length In Meters	
	0 2

Example "B" is 2 Meters = 02

G	Cable Insulation Description
A	20 Gage, Stranded, Metal Braid
B	20 Gage, Stranded, Fiberglass
C	.281" O.D. Flexible Armor Cable
D	20 Gage, Stranded, Teflon
E	20 Gage, Stranded, PVC
F	.210" O.D. Flexible Armor Cable

H	Termination
1	75 mm Split Leads & 15 mm bare ends.
2	75 mm Split Leads & Spade Lugs.
3	Standard Male Plug (425 F)
4	Standard Female Jack (425 F)
5	Mini Male Plug (425 F)
6	Mini Female Jack (425 F)
7	Hi Temp. Male Plug (800 F)
8	Hi Temp. Female Jack (800 F)

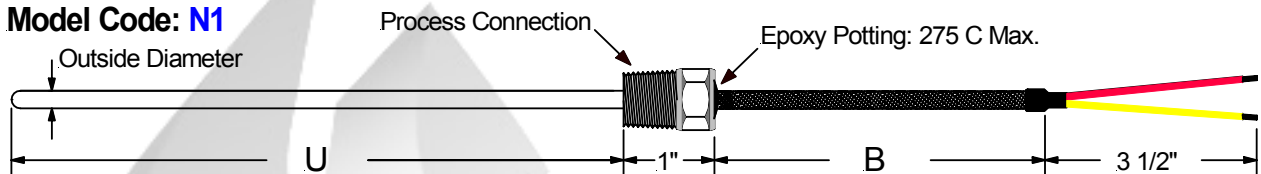
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Mineral Insulated Thermocouple

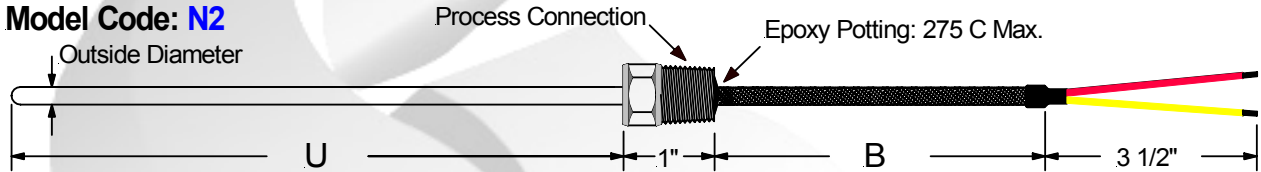
Hex Bushing Style Thermocouple

Operating Temperature:
-200 C to +1000 C Max.

Model Code: **N1**



Model Code: **N2**



Model:

N1

N2

A	Outside Diameter
1	0.063"
2	0.125"
3	0.188"
4	0.250"
5	0.315"
6	0.375"
7	0.500"

B	Sheath Material
A	304 Stainless
B	316 Stainless
C	310 Stainless
D	Inconel 600

C	"U" Dimension
	Specify "U" Length In Inches <u>0 0 6</u>
	Example "U" is 6" = 006

D	"U" Fractional Dimension
A	0.125"
B	0.250"
C	0.375"
D	0.500"
E	0.750"
F	None

E	Process Connection
1	1/4" NPT
2	1/2" NPT
3	3/4" NPT

F	Calibration
	Standard Limits of Error
1	J
2	K
3	T
4	E
5	N
	Special Limits of Error
6	J
7	K
8	T
9	E
10	N

G	Junction Styles					
	Grounded		Ungrounded		Exposed	
	Common	Common	Isolated	Common	Isolated	
Single	G		U		E	
Duplex	D	F	H	I	M	
Triplex	T	Q	R	S	V	

H	"B" Dimension
	Specify "B" Length In Inches <u>0 4 8</u>
	Example "B" is 48" = 048

I	Cable Insulation Description
A	20 Gage, Stranded, Metal Braid
B	20 Gage, Stranded, Fiberglass
C	.281" O.D. Flexible Armor Cable
D	20 Gage, Stranded, Teflon
E	20 Gage, Stranded, PVC
F	.210" O.D. Flexible Armor Cable

J	Termination
1	3" Split Leads & 1/2" bare ends.
2	3" Split Leads & Spade Lugs.
3	Standard Male Plug (425 F)
4	Standard Female Jack (425 F)
5	Mini Male Plug (425 F)
6	Mini Female Jack (425 F)
7	Hi Temp. Male Plug (800 F)
8	Hi Temp. Female Jack (800 F)

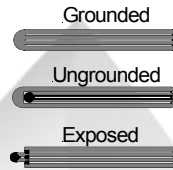
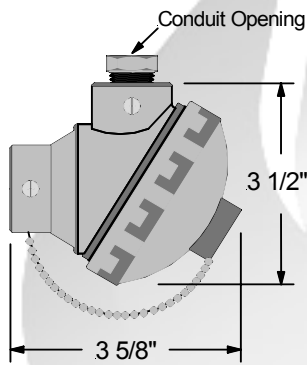
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Mineral Insulated Thermocouple

Compression Fitting Mounting Style

Operating Temperature:
-200 C to +1000 C Max.

Connection Head



Outside Diameter

Compression Fitting

*(Optional)

U

*See Accessories section for compression fitting information.

Model Code: N3

Head Connection

20 Gage Fiberglass Leads

Epoxy Potting
275 C Max.

Model:

A

B

C

D

E

F

G

H

I

J

N3

A	Outside Diameter
1	0.063"
2	0.125"
3	0.188"
4	0.250"
5	0.315"
6	0.375"
7	0.500"

B	Sheath Material
A	304 Stainless
B	316 Stainless
C	310 Stainless
D	Inconel 600

C	"U" Dimension
Specify "U" Length In Inches <u>0 0 6</u>	
Example "U" is 6" = 006	

D	"U" Fractional Dimension
A	0.125"
B	0.188"
C	0.250"
D	0.315"
E	0.375"
F	0.500"
G	0.625"
H	0.750"
I	0.875"
J	None

E	Calibration
Standard limits of error	Special limits of error
1	J
2	K
3	T
4	E
5	N

F	Junction Styles				
Element Description	Grounded	Ungrounded		Exposed	
	Common	Common	Isolated	Common	Isolated
Single	G		U		E
Duplex	D	F	H	J	M
Triplex	T	Q	R	S	V

G	Head Connection
1	1/4" NPT
2	1/2" NPT
3	3/4" NPT

H	Connection Head Model
A	None, 3" Split Leads
B	Cast Aluminum: Standard
C	Cast Aluminum: Mini
D	Polypropylene: FDA Appr.
E	Cast Iron: Standard
F	316 Stainless Steel
G	Explosion Proof

I	Conduit Opening
1	None
2	1/2" NPT
3	3/4" NPT

J	Connection Head Options
N	None
T	4-20mA Transmitter
X	No Terminal Block

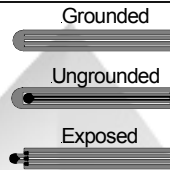
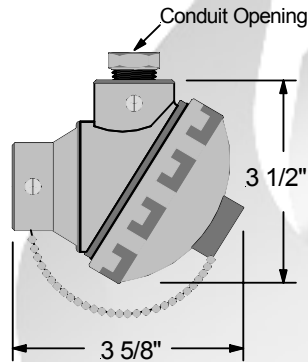
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Mineral Insulated Thermocouple

Hex Nipple Style

Operating Temperature:
-200 C to +1000 C Max.

Connection Head



Model Code: N4

Outside Diameter

Process Connection

20 Gage
Fiberglass Leads

Epoxy Potting
275 C Max

1 3/4"

3"

U

Model:

N4

A	B	C	D	E	F	G	H	I	J

A Outside Diameter	
1	0.063"
2	0.125"
3	0.188"
4	0.250"
5	0.315"
6	0.375"
7	0.500"

B Sheath Material	
A	304 Stainless
B	316 Stainless
C	310 Stainless
D	Inconel 600

C "U" Dimension	
Specify "U" Length In Inches <u>006</u>	
Example "U" is 6" = 006	

D "U" Fractional Dimension	
A	0.125"
B	0.188"
C	0.250"
D	0.315"
E	0.375"
F	0.500"
G	0.625"
H	0.750"
I	0.875"
J	None

E Calibration			
Standard limits of error		Special limits of error	
1	J	6	J
2	K	7	K
3	T	8	T
4	E	9	E
5	N	10	N

F Junction Styles				
Element Description	Grounded		Ungrounded	
	Common	Isolated	Common	Isolated
Single	G		U	E
Duplex	D	F	H	J
Triplex	T	Q	R	S

G Process Connection	
1	1/4" NPT
2	1/2" NPT
3	3/4" NPT

H Connection Head Model	
A	None, 3" Split Leads
B	Cast Aluminum: Standard
C	Cast Aluminum: Mini
D	Polypropylene: FDA Appr.
E	Cast Iron: Standard
F	316 Stainless Steel
G	Explosion Proof

I Conduit Opening	
1	None
2	1/2" NPT
3	3/4" NPT

J Connection Head Options	
N	None
B	No Terminal Block
S	Spring Loaded
T	4-20mA Transmitter
R	Options S & T
Q	Options S & B

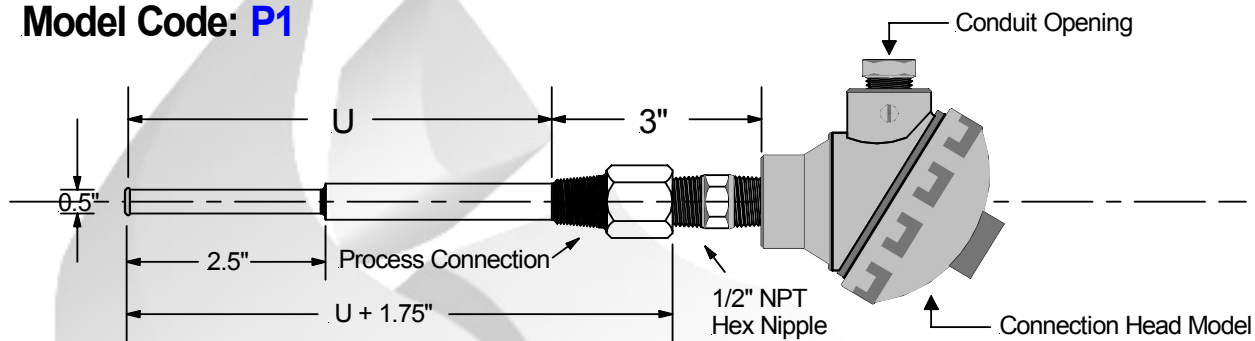
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Mineral Insulated Thermocouple & Thermowell Assembly

Standard Stepped Threaded Thermowell

Operating Temperature:
-200 C to +1000 C Max.

Model Code: **P1**



All Thermowell Assemblies Are Spring Loaded.

Model:

P1

A	"U" Fractional Dimension
A	1 5/8"
B	2 1/2"
C	4 1/2"
D	7 1/2"
E	10 1/2"
F	13 1/2"
G	16 1/2"
H	22 1/2"

For all other U lengths
contact factory
for availability.

B	Sheath Material
1	304 Stainless
2	316 Stainless
3	Inconel 600
4	Carbon Steel
5	Solid Teflon

For all other materials
contact factory
for availability.

C	Calibration
Standard Limits of Error	Special Limits of Error
1 J	6 J
2 K	7 K
3 T	8 T
4 E	9 E
5 N	10 N

D		Junction Styles		
Element Description	Grounded		Ungrounded	
	Common		Common	Isolated
Single	G			U
Duplex	D		F	H
Triplex	T		Q	R

E	Process Connection
1	1/2" NPT
2	3/4" NPT
3	1" NPT

F	Connection Head Model
A	None, 3" Split Leads
B	Cast Aluminum: Standard
C	Cast Aluminum: Mini
D	Polypropylene: FDA Appr.
E	Cast Iron: Standard
F	316 Stainless Steel
G	Explosion Proof

G	Conduit Opening
1	None
2	1/2" NPT
3	3/4" NPT

H	Connection Head Options
N	None
B	No Terminal Block
T	4-20mA Transmitter

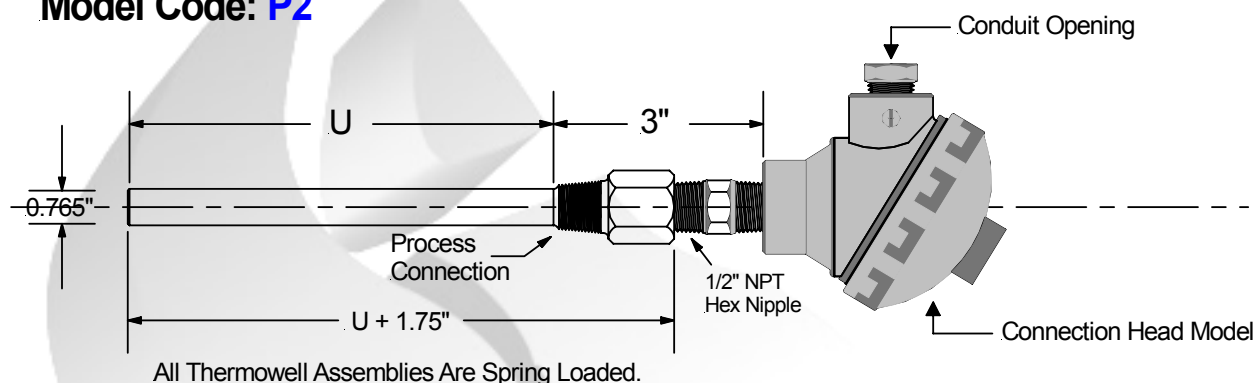
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Mineral Insulated Thermocouple & Thermowell Assembly

Standard Straight Threaded Thermowell

Operating Temperature:
-200 C to +1000 C Max.

Model Code: **P2**



Model:

P2

A

B

C

D

E

F

G

H

A	"U" Fractional Dimension
A	1 5/8"
B	2 1/2"
C	4 1/2"
D	7 1/2"
E	10 1/2"
F	13 1/2"
G	16 1/2"
H	22 1/2"

For all other U lengths contact factory for availability.

C	Calibration
	Standard Limits of Error
	Special Limits of Error
1	J
2	K
3	T
4	E
5	N

E	Process Connection
1	1/2" NPT
2	3/4" NPT
3	1" NPT

F	Connection Head Model
A	None, 3" Split Leads
B	Cast Aluminum: Standard
C	Cast Aluminum: Mini
D	Polypropylene: FDA Appr.
E	Cast Iron: Standard
F	316 Stainless Steel
G	Explosion Proof

B	Sheath Material
1	304 Stainless
2	316 Stainless
3	Inconel 600
4	Carbon Steel
5	Solid Teflon

For all other materials contact factory for availability.

D	Junction Styles
	Grounded
	Ungrounded
	Common
	Common
	Isolated
Single	G
Duplex	D
Triplex	T

G	Conduit Opening
1	None
2	1/2" NPT
3	3/4" NPT

H	Connection Head Options
N	None
B	No Terminal Block
T	4-20mA Transmitter

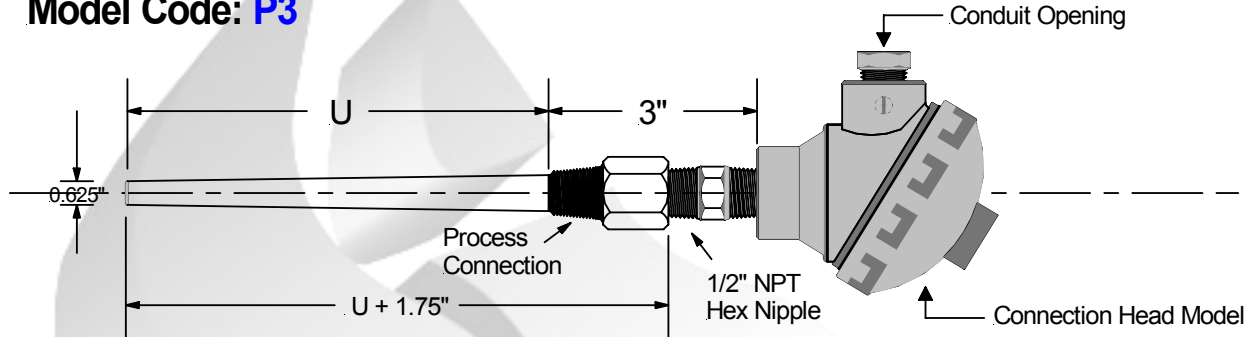
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Mineral Insulated Thermocouple & Thermowell Assembly

Standard Tapered Threaded Thermowell

Operating Temperature:
-200 C to +1000 C Max.

Model Code: **P3**



All Thermowell Assemblies Are Spring Loaded.

Model:

P3

A	"U" Fractional Dimension
A	1 5/8"
B	2 1/2"
C	4 1/2"
D	7 1/2"
E	10 1/2"
F	13 1/2"
G	16 1/2"
H	22 1/2"

For all other U lengths contact factory for availability.

B	Sheath Material
1	304 Stainless
2	316 Stainless
3	Inconel 600
4	Carbon Steel
5	Solid Teflon

For all other materials contact factory for availability.

C	Calibration
Standard Limits of Error	Special Limits of Error
1 J	6 J
2 K	7 K
3 T	8 T
4 E	9 E
5 N	10 N

D	Junction Styles		
Element Description	Grounded	Ungrounded	
	Common	Common	Isolated
Single	G		U
Duplex	D	F	H
Triplex	T	Q	R

E	Process Connection
1	1/2" NPT
2	3/4" NPT
3	1" NPT

F	Connection Head Model
A	None, 3" Split Leads
B	Cast Aluminum: Standard
C	Cast Aluminum: Mini
D	Polypropylene: FDA Appr.
E	Cast Iron: Standard
F	316 Stainless Steel
G	Explosion Proof

G	Conduit Opening
1	None
2	1/2" NPT
3	3/4" NPT

H	Connection Head Options
N	None
B	No Terminal Block
T	4-20mA Transmitter

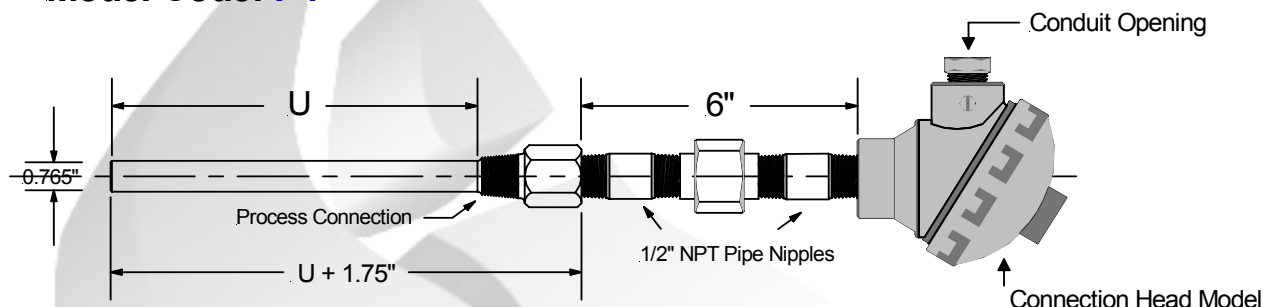
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Mineral Insulated Thermocouple & Thermowell Assembly

Nipple-Union-Nipple-Thermowell Style

Operating Temperature:
-200 C to +1000 C Max.

Model Code: **P4**



All Thermowell Assemblies Are Spring Loaded.

Model:	A	B	C	D	E	F	G	H	I
P4									
A Thermowell Type									
1	Stepped								
2	Straight								
3	Tapered								
B "U" Fractional Dimension									
A	1 5/8"								
B	2 1/2"								
C	4 1/2"								
D	7 1/2"								
E	10 1/2"								
F	13 1/2"								
G	16 1/2"								
H	22 1/2"								
For all other U lengths contact factory for availability.									
C Sheath Material									
1	304 Stainless								
2	316 Stainless								
3	Inconel 600								
4	Carbon Steel								
5	Solid Teflon								
For all other materials contact factory for availability.									
D Calibration									
Standard Limits of Error		Special Limits of Error							
1	J	6	J						
2	K	7	K						
3	T	8	T						
4	E	9	E						
5	N	10	N						
E Junction Styles									
Element Description	Grounded		Ungrounded						
	Common	Common	Common	Isolated					
Single	G			U					
Duplex	D		F	H					
Triplex	T		Q	R					
F Process Connection									
1	1/2" NPT								
2	3/4" NPT								
3	1" NPT								
G Connection Head Model									
A	None, 3" Split Leads								
B	Cast Aluminum: Standard								
C	Cast Aluminum: Mini								
D	Polypropylene: FDA Appr.								
E	Cast Iron: Standard								
F	316 Stainless Steel								
G	Explosion Proof								
H Conduit Opening									
1	None								
2	1/2" NPT								
3	3/4" NPT								
I Connection Head Options									
N	None								
B	No Terminal Block								
T	4-20mA Transmitter								

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