

Thermocouple Connectors

Miniature
Air Service to 125°C



TYPE	PART #
C	A0381-4-CN
E	A0381-6-CN
J	A0381-5-CN
K	A0381-1-CN
N	A0381-7-CN

Crimp and Push Connectors

350°C Vacuum and Air Service



MATERIAL	L	QTY	PART #
Chromel	.275	Pack of 5	A1041-1-CN
Alumel	.275	Pack of 5	A1041-2-CN
Iron	.300	Pack of 5	A1041-3-CN
Constantan-J	.300	Pack of 5	A1041-4-CN
Constantan-E-T	.325	Pack of 5	A1041-5-CN
Nickel	.325	Pack of 5	A1041-6-CN

Screw & Nut Connectors

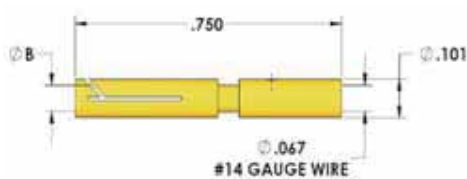
350°C Vacuum and Air Service



THREAD SIZE	QTY	PART #
3-48	Pack of 10	A1526-1-CN

Power — Crimp Type Contacts

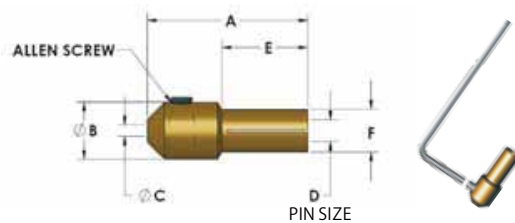
Operating Temperature -269°C to 200°C



MATERIAL	QTY	B	PART #
BeCu	Pack of 10	.050	A2965-1-CN
BeCu	Pack of 10	.056	A2965-3-CN
BeCu	Pack of 10	.062	A2965-2-CN

Power — Push-on Connectors

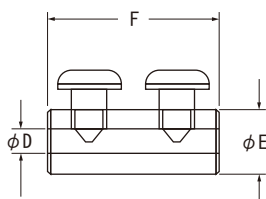
150°C Air / 200°C Vacuum



MATERIAL	A	B	C	D	E	F	QTY	PART #
BeCu	.69	.25	.050	.050	.38	.19	Pack of 10	A0721-2-CN
BeCu	.69	.25	.050	.060	.38	.19	Pack of 10	A0721-4-CN
BeCu	.69	.25	.050	.094	.38	.19	Pack of 10	A0721-1-CN
BeCu	.69	.25	.050	.040	.38	.19	Pack of 10	A0721-3-CN
BeCu	1.00	.50	.096	.250	.50	.45	Pack of 2	A1969-1-CN

Power — In-line Connectors

150°C Air / 400°C Vacuum



MATERIAL	D	E	F	QTY	PART #
BeCu	.059	.187	.500	Pack of 10	A0725-1-CN
BeCu	.067	.187	.500	Pack of 10	A0725-3-CN
BeCu	.120	.250	.560	Pack of 10	A0725-2-CN
BeCu	.134	.250	.630	Pack of 10	A0725-4-CN
BeCu	.161	.350	.560	Pack of 10	A0725-7-CN
BeCu	.260	.500	1.00	Pack of 10	A0725-6-CN

MS Circular Connectors

Voltage Rating 700 Volts Peak
Current Rating 10 Amps/pin
Accepts 0.056 or 0.062 Diameter Pins

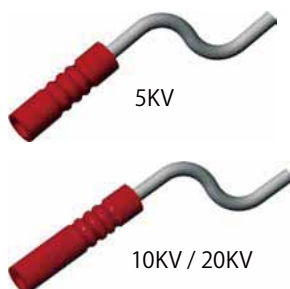


*all pins loaded

MAXIMUM CURRENT*	TEMPERATURE	PART #
4 Pin - 28 Amps	125° C	A0125-1-CN
6 Pin - 36 Amps	125° C	A0126-1-CN
10 Pin - 50 Amps	125° C	A0127-1-CN
20 Pin - 75 Amps	125° C	A0128-1-CN
35 Pin - 100 Amps	125° C	A0740-1-CN
4 Pin - 28 Amps	350° C	A1070-2-CN
6 Pin - 36 Amps	350° C	A1136-3-CN
10 Pin - 50 Amps	350° C	A1070-1-CN
20 Pin - 75 Amps	350° C	A1181-1-CN
35 Pin - 100 Amps	350° C	A1388-1-CN

Power — High Voltage Silicon Cable

Operating Temperature -55°C to 125°C



MATERIAL	COND. DIAM	AMPS	CABLE LENGTH	PART #
5KV	.094	25	96"	A2459-1-CN
10KV / 20KV	.094	25	96"	A2459-2-CN

Coaxial Connectors



COAXIAL TYPE	CABLE USED	PART #
BNC	RG58B/U	A0060-2-CN
MHV	RG59B/U	A0060-1CN
SHV-5	RG59B/U	A0154-1-CN
SHV-10	RG58, 58A, 58 C/U	A1498-1-CN
TYPE-N	RG214/U	A0675-1-CN
SMA	RG58B/U	A0667-1-CN
SHV-B	RG59B/U	A0843-1-CN
SHV-20	RG213/U	A0700-1-CN
MICRODOT CABLE (10ft)	RG178B/U	A1645-1-CN

Sub Type C & D Connectors & Contacts

Vacuum-side Connectors

Connectors do not include contacts

FEMALE PINS



PINS	PART #
9	A2375-1-CN
15	A1881-1-CN
25	A2378-1-CN
50	A2380-1-CN

MALE PINS



PINS	PART #
9	A2374-1-CN
15	A2376-1-CN
25	A2377-1-CN
50	A2379-1-CN

FEMALE PINS



PEEK®

PINS	PART #
9	A3030-1-CN

Air-side Connectors

Connectors do not include contacts

FEMALE PINS



PINS	PART #
9	A2711-4-CN
15	A2711-3-CN
25	A2711-2-CN
50	A2711-1-CN

FEMALE PINS



PINS	PART #
9	A3034-1-CN

Contacts



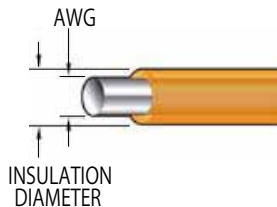
QTY	PART #
Pack of 10 (FEMALE)	A2386-1-CN
Pack of 10 (MALE)	A2385-1-CN

Kapton Insulated Wire

Features and Specifications

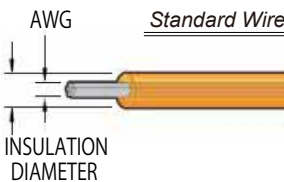
UHV / Ultrahigh Vacuum : 1×10^{-10} Torr, Temperature Range : -75° to 250° C, Dielectric Constant : 2.9, Dielectric Strength : 80kV/mm, Dissipation Factor / 1MHz : 0.002, Moisture Absorption : 0.4% @ 50% RH, Radiation Resistance : 109 Rads

Solid Wire



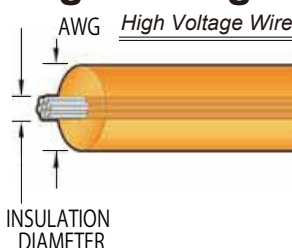
WIRE AWG	WIRE LENGTH	WIRE DIAMETER	INSULATION DIAMETER	VOLTAGE RATING	CURRENT RATING	MIN. BEND RADIUS	PART #
30	30'	0.010	0.020	600VAC / 2kVDC	1.50 A	0.30	A2236-1-WR
26	30'	0.016	0.025	600VAC / 2kVDC	3.00 A	0.31	A7300-2-WR
22	30'	0.024	0.034	600VAC / 2kVDC	5.50 A	0.32	A2236-2-WR

Stranded Wire



WIRE AWG	WIRE LENGTH	# OF STRANDS X DIAMETER	INSULATION DIAMETER	VOLTAGE RATING	CURRENT RATING	MIN. BEND RADIUS	PART #
28	30'	7 x 0.005	0.020	600VAC / 2kVDC	2 A	0.25	A7300-3-WR
26	30'	7 x 0.006	0.025	600VAC / 2kVDC	3 A	0.25	A7300-4-WR
24	30'	7 x 0.008	0.030	600VAC / 2kVDC	4 A	0.55	A7300-5-WR

High Voltage



26	15'	7 x 0.006	0.062	3kVAC / 10kVDC	3 A	1.10	A7325-1-WR
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Coaxial Wire

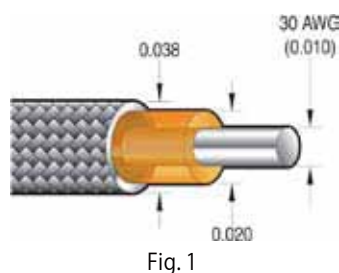


Fig. 1

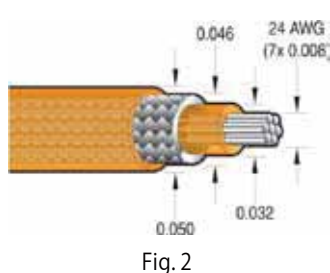


Fig. 2

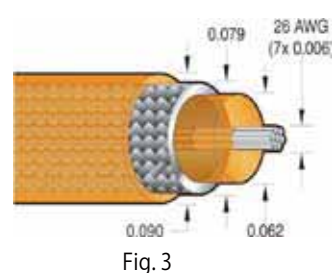
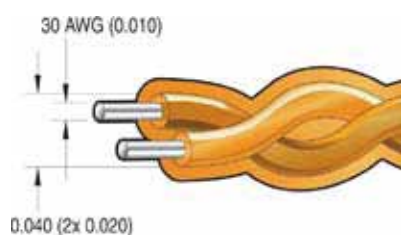


Fig. 3

FIG	CABLE LENGTH	WIRE DIAMETER	RESISTANCE	VOLTAGE RATING	CURRENT RATING	MIN. BEND RADIUS	PART #
<u>30 AWG COAXIAL CABLE, Solid Core</u>							
1	30'	0.010	377Ω/km at 20°C max	600VAC / 2kVDC	1.5 A	0.45	A2236-3-WR
<u>24 AWG COAXIAL CABLE, Multi-strand Core</u>							
2	15'	7 x 0.008	88.3Ω/km at 20°C max	600VAC / 2kVDC	4.5 A	1.00	A7326-1-WR
2	30'	7 x 0.008	88.3Ω/km at 20°C max	600VAC / 2kVDC	4.5 A	1.00	A2236-4-WR
<u>50 Ohm Coaxial Cable</u>							
<u>30 AWG COAXIAL CABLE, Multi-strand Core</u>							
3	15'	7 x 0.004	353Ω/km at 20°C max	600VAC / 2kVDC	1.5 A	0.45	A7326-2-WR
<u>26 AWG COAXIAL CABLE, Multi-strand Core</u>							
3	15'	7 x 0.006	159Ω/km at 20°C max	600VAC / 2kVDC	3.0 A	1.05	A2236-5-WR

Thermocouple Wire, Type-K



Thermocouple Wire pairs consist of non-welded positive Chromel® and negative Alumel® legs. Kapton® is applied with a resin process to eliminate air pockets normally associated with Kapton® tape insulated thermocouple wire from other suppliers.

UHV rated to 1×10^{-10}
Operating Temperature 250° C

TYPE	WIRE AWG	WIRE LENGTH	WIRE DIAMETER	INSULATION DIAMETER	MIN. BEND RADIUS	PART #
K	30	19"	2 x 0.010	0.020	0.55	A2331-1-WR
K	30	39"	2 x 0.010	0.020	0.55	A2332-1-WR
K	30	96"	2 x 0.010	0.020	0.55	A2333-1-WR

Sub C & D Type, UHV Connectors & Wires

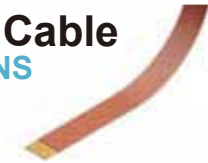
Please call for custom cable length and/or assembly.

Contact to Cable FEMALE PINS



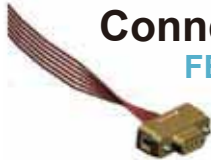
PINS	LENGTH	PART #
9	19"	A2356-1-WR
9	39"	A2357-1-WR
15	19"	A2360-1-WR
15	39"	A2361-1-WR
25	19"	A2364-1-WR
25	39"	A2365-1-WR
50	19"	A2368-1-WR
50	39"	A2369-1-WR

Contact to Cable MALE PINS



PINS	LENGTH	PART #
9	19"	A2354-1-WR
9	39"	A2355-1-WR
15	19"	A2358-1-WR
15	39"	A2359-1-WR
25	19"	A2362-1-WR
25	39"	A2363-1-WR
50	19"	A2366-1-WR
50	39"	A2367-1-WR

Connector to Cable FEMALE PINS



PINS	LENGTH	PART #
9	19"	A2340-1-CN
9	39"	A2341-1-CN
15	19"	A2344-1-CN
15	39"	A2345-1-CN
25	19"	A2348-1-CN
25	39"	A2349-1-CN
50	19"	A2352-1-CN
50	39"	A2353-1-CN

Ribbon Cable



PINS	LENGTH	PART #
9	19"	A2402-1-WR
9	39"	A2402-2-WR
9	96"	A2402-3-WR
15	19"	A2403-1-WR
15	39"	A2403-2-WR
15	96"	A2403-3-WR
25	19"	A2404-1-WR
25	39"	A2404-2-WR
25	96"	A2404-3-WR

Connector to Connector FEMALE PINS



PINS	LENGTH	PART #
9	19"	A2370-1-CN
15	19"	A2371-1-CN
25	19"	A2372-1-CN
50	19"	A2373-1-CN

Connector to Cable FEMALE PINS



PINS	LENGTH	PART #
9 - Male	19"	A2418-1-CN
9 - Male	39"	A2419-1-CN
9 - Female	19"	A2420-1-CN
9 - Female	39"	A2421-1-CN

Coaxial — BNC, UHV Cable Assemblies

The cables in the assemblies listed below consist of 26AWG, 50-Ohm coaxial cable.

These components are UHV compatible to 1×10^{-10} Torr.

See pg. 198 for cable details, part # A2236-5-WR.



CONNECTOR TYPE	FIG	LENGTH	PART #
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Connector to Cable

Connector to Cable UHV cable assemblies are fitted with stainless steel or BNC Male connectors at one end and a non-terminated, Kapton® insulated wire at the other.

Grounded	1	19"	A7301-1-CN
Grounded	1	39"	A7302-1-CN
Floating	2	19"	A7303-1-CN
Floating	2	39"	A7304-1-CN
BNC	---	19"	A7305-1-CN
BNC	---	39"	A7306-1-CN

Connector to Connector

Connector to Connector UHV cable assemblies are fitted with stainless steel BNC Male connectors at one end and a user-specified connector at the other: User-End Female, SMA Male, or BNC Male. These connectors mate directly to the vacuum side of corresponding single-ended feedthroughs.

User-End Female	3	-2
SMA Male	---	-5
BNC Male	---	-3

To add a connector, change the dash number at the end of the part number from -1 to the corresponding number of your desired connector.

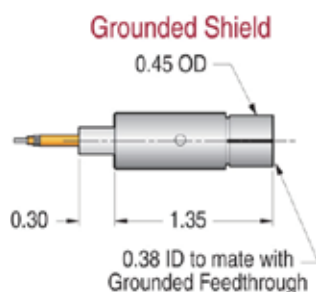


Fig. 1

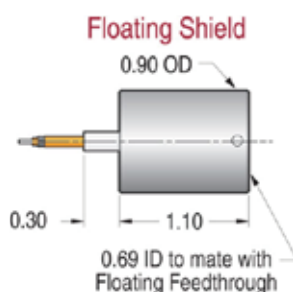


Fig. 2

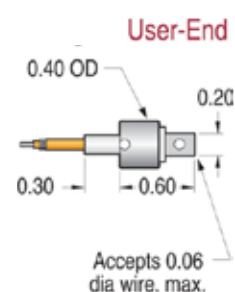
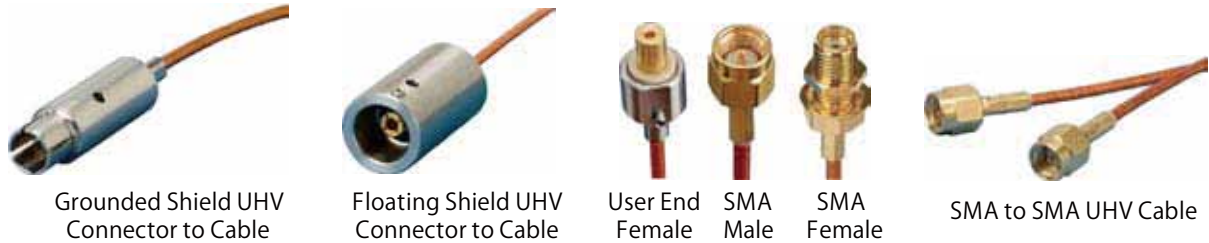


Fig. 3

Coaxial — SMA, UHV Cable Assemblies

The cables in the assemblies listed below consist of 26AWG, 50-Ohm coaxial cable. These components are UHV compatible to 1×10^{-10} Torr. See pg. 198 for cable details, part # A2236-5-WR.



CONNECTOR TYPE	FIG	LENGTH	PART #
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Connector to Cable

Connector to Cable UHV cable assemblies are fitted with stainless steel Female or SMA Male connectors at one end and a non-terminated, Kapton® insulated wire at the other.

Grounded	1	19"	A7307-1-CN
Grounded	1	39"	A7308-1-CN
Floating	2	19"	A7309-1-CN
Floating	2	39"	A7310-1-CN
SMA	---	19"	A7311-1-CN
SMA	---	39"	A7312-1-CN

Connector to Connector

Connector to Connector UHV cable assemblies are fitted with stainless steel Female or SMA Male connectors at one end and a user-specified connector at the other: User-End Female, SMA Male, or SMA Female. These connectors mate directly to the vacuum side of corresponding single-ended feedthroughs.

User-End Female	3	-2
SMA Male	---	-5
SMA Female	---	-6

To add a connector, change the dash number at the end of the part number from -1 to the corresponding number of your desired connector.

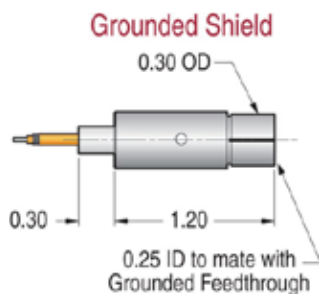


Fig. 1

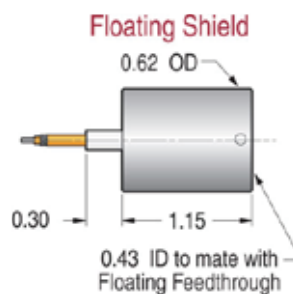


Fig. 2

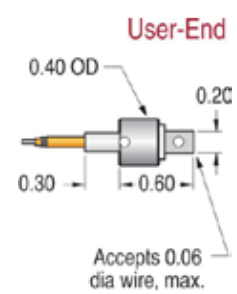


Fig. 3

Coaxial — MHV, UHV Cable Assemblies

The cables in the assemblies listed below consist of 26AWG, 50-Ohm coaxial cable. These components are UHV compatible to 1×10^{-10} Torr. See pg. 198 for cable details, part # A2236-5-WR.

CABLE IS RATED TO 2KVDC



MHV Grounded Shield UHV Connector



MHV Floating Shield UHV Connector



User End Female



MHV Male



MHV to MHV UHV Cable

CONNECTOR TYPE	FIG	LENGTH	PART #
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Connector to Cable

Connector to Cable UHV cable assemblies are fitted with either stainless steel Female or MHV Male connectors at one end and a non-terminated, Kapton® insulated wire at the other.

Grounded	1	19"	A7313-1-CN
Grounded	1	39"	A7314-1-CN
Floating	2	19"	A7315-1-CN
Floating	2	39"	A7316-1-CN
MHV	---	19"	A7317-1-CN
MHV	---	39"	A7318-1-CN

Connector to Connector

Connector to Connector UHV cable assemblies are fitted with either stainless steel Female or MHV Male connectors at one end and a user-specified connector at the other: User-End Female or MHV Male. These connectors mate directly to the vacuum side of corresponding single-ended feedthroughs.

User-End Female	---	-2
MHV Male	---	-4

To add a connector, change the dash number at the end of the part number from -1 to the corresponding number of your desired connector.

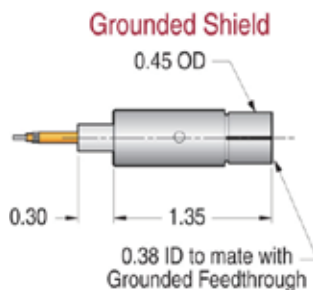


Fig. 1

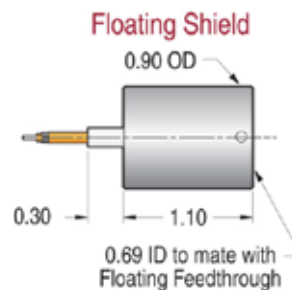


Fig. 2

Coaxial — SHV-5, UHV Cable Assemblies

The cables in the assemblies listed below consist of 26AWG, 50-Ohm coaxial cable.

These components are UHV compatible to 1×10^{-10} Torr.

See pg. 198 for cable details, part # A2236-5-WR.

CABLE IS RATED TO 2KVDC



SHV-5 Grounded Shield UHV Connector



SHV-5 Floating Shield UHV Connector



User End Female

CONNECTOR TYPE	FIG	LENGTH	PART #
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Connector to Cable

Connector to Cable UHV cable assemblies are fitted with stainless steel Female connectors at one end and a non-terminated, Kapton® insulated wire at the other.

Grounded	1	19"	A7319-1-CN
Grounded	1	39"	A7320-1-CN
Floating	2	19"	A7321-1-CN
Floating	2	39"	A7322-1-CN
SHV-5	---	19"	A7323-1-CN
SHV-5	---	39"	A7324-1-CN

Connector to Connector

Connector to Connector UHV cable assemblies are fitted with stainless steel Female connectors at one end and a user-specified connector at the other.

These connectors mate directly to the vacuum side of corresponding single-ended feedthroughs.

User-End Female	3	-2
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To add a connector, change the dash number at the end of the part number from -1 to the corresponding number of your desired connector.

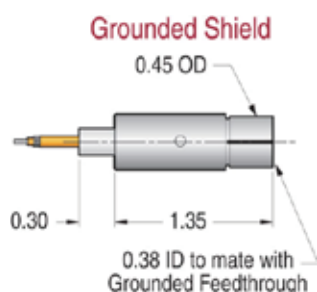


Fig. 1

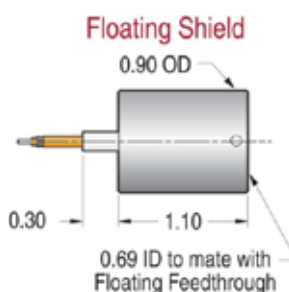


Fig. 2

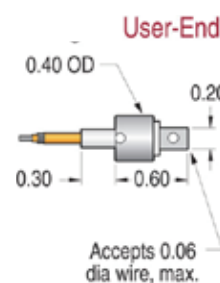


Fig. 3

Special order



専用の特注導入端子フランジにつきましてもご相談下さい。

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