

Coaxial Feedthroughs

Introduction

LewVac offer a wide range of different coaxial feedthroughs in various configurations and types.



Subminiature-D Coaxial

Miniature coaxial feedthroughs mounted within standard subminiature D-type housings. Ideal for high pin density applications.

Voltage	Current	Max Bakeout Temperature	Conductor Material	Impedance
Grounded shield - 500VDC	5A	CF flange - 250°C KF flange - 150°C Connector - 250°C	Gold plated Ni-Fe alloy	Non-constant



BNC

These are general purpose connectors used mostly for 50Ω or 75Ω low power instrumentation applications. BNC feedthroughs are not rated for constant impedance due to the feedthrough geometry.

Voltage	Current	Max Bakeout Temperature	Conductor Material	Impedance
Grounded shield - 500VDC Floating shield - 2.5kVDC	3A	CF flange - 450°C KF flange - 150°C Weldable - 450°C Connector - 165°C	304 St.St.	Non-constant



MHV - Miniature High Voltage

Similar to BNC feedthroughs for use in medium power instrumentation applications. MHV will not mate with BNC.

Voltage	Current	Max Bakeout Temperature	Conductor Material	Impedance
Grounded shield - 5kVDC Floating shield - 2.5kVDC	3A	CF flange - 450°C KF flange - 150°C Weldable - 450°C Connector - 165°C	304 St.St.	Non-constant



SHV-5 - Safe High Voltage
Rated up to 5,000 Volts. The female pin within the connector is recessed which improves safety when the cable is disconnected.

Voltage	Current	Max Bakeout Temperature	Conductor Material	Impedance
Grounded shield - 5kVDC	5A	CF flange - 450°C KF flange 150°C Weldable - 450°C Connector - 165°C	Nickel	Non-constant



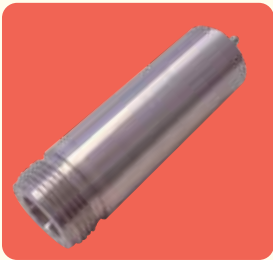
SHV-10 - Safe High Voltage
Rated up to 10,000 Volts. The female pin within the connector is recessed which improves safety when the cable is disconnected. Ideally suited for high voltage pulsed DC applications.

Voltage	Current	Max Bakeout Temperature	Conductor Material	Impedance
Grounded shield - 10kVDC	5A	CF flange - 450°C KF flange 150°C Weldable - 450°C Connector - 165°C	Nickel	Non-constant



SHV-20 - Safe High Voltage
Rated up to 20,000 Volts. The female pin within the connector is recessed which improves safety when the cable is disconnected. Ideally suited for high voltage pulsed DC applications.

Voltage	Current	Max Bakeout Temperature	Conductor Material	Impedance
Grounded shield - 20kVDC	15A	CF flange - 450°C KF flange 150°C Weldable - 450°C Connector - 165°C	Nickel	Non-constant



Type-N
Impedance rated at 50Ω and suitable for use at 1GHz. Suitable for cryogenic applications.

Voltage	Current	Max Bakeout Temperature	Conductor Material	Impedance
Grounded shield - 500VDC	3A	CF flange - 450°C KF flange 150°C Weldable - 450°C Connector - 165°C	Nickel	Non-constant (50Ω)



SMA - Subminiature Type-A
Suited for use in medium and high frequency applications. Impedance rated at 50Ω and rated to 1GHz.

Voltage	Current	Max Bakeout Temperature	Conductor Material	Impedance
Grounded shield - 700VDC Floating shield - 2.5kV	1A	CF flange - 450°C KF flange - 150°C Weldable - 450°C Connector - 165°C	304 St.St.	50Ω



High Frequency SMA
Similar to the standard SMA, but with increased frequency rating up to 8GHz.

Voltage	Current	Max Bakeout Temperature	Conductor Material	Impedance
Grounded shield - 700VDC	5A	CF flange - 450°C KF flange - 150°C Weldable - 450°C Connector - 165°C	304 St.St.	50Ω



Microdot®
The smallest coaxial feedthrough with threaded connector, widely used in thin film instrumentation applications.

Voltage	Current	Max Bakeout Temperature	Conductor Material	Impedance
Grounded shield - 500VDC	2A	CF flange - 450°C KF flange - 150°C Weldable - 450°C Connector - 165°C	Molybdenum	Non-constant



Between Series
As the name suggests, these feedthroughs adapt from one type of connector at one end to an alternative connector type at the other.

Subminiature D



Coaxial hermetic subminiature D feedthroughs with coaxial pin and shield are available in 1, 3 and 5 pin configurations mounted on standard D9, D15 and D25 shell sizes, respectively. The coaxial shield floats with respect to ground providing a secondary electrical path. The single pin coaxial feedthrough also includes four non-shielded instrumentation pins for added connection capability. Gold plated pins and shields are in a straight through pin-to-pin design and are hermetically sealed and electrically insulated in a stainless steel shell using the latest in glass-ceramic bonding technology. Ultrahigh vacuum cable assemblies with PEEK connectors and Kapton® insulated 50 Ohm coaxial cables are available to meet the demands of UHV environments. The connection accessories must be purchased separately. Vacuum side cable assemblies, individual connectors and other accessories are detailed overleaf. Custom subminiature D coaxial feedthrough products are available upon request.

Features:

- 1, 3 & 5 pin configurations.
- Floating shield design.
- High temperature rated to 250°C.
- In-vacuum connectors & cables available.
- Air side connectors available.
- Custom versions available on request

Specifications:

Voltage¹ 500VDC max

Current¹ 5A max @ 20°C

Impedance Non-constant

Material

Flange 304 St.St.

Shell 304 St.St.

Pin Gold plated Ni-Fe alloy

Shield Gold plated Ni-Fe alloy

Insulation Glass ceramic

Connector, vacuum³

Subminiature D PEEK

BNC Nickel plated brass & PEEK

SMA Gold plated brass & PEEK

User endSt.St., Gold plated BeCu & PEEK

Temperature Range²

CF flanged feedthrough -200°C to 250°C

KF/LF flanged feedthrough -20°C to 150°C

Vacuum side connector -200°C to 250°C

Air side connector -20°C to 80°C

Max Thermal Gradient 25°C / minute

¹ - Please see section introduction for safety information. Stated electrical ratings are maximum test values. Feedthroughs are intended for instrumentation applications carrying low level signal voltages and currents. For proper heat dissipation, a maximum of 20% of the pins on a feedthrough may carry the maximum pin current at any one time.
² - Assembly rating is reduced to that of the lowest rated component.
³ - PEEK is a polyetheretherketone thermoplastic.

CF Flange Mounted



Fig.	No. Coax Pins	No. Instr Pins	A	Flange	Part Code	Price £	Price €
1	1	4	16.0	DN40CF	D9-CX14I-40CF	£269	€310
1	3	-	19.3	DN63CF	D15-CX3-63CF	£342	€394
1	5	-	19.3	DN63CF	D25-CX5-63CF	£360	€414
1	6	-	19.3	DN63CF	D15-2-CX3-63CF	£647	€745
1	10	-	19.3	DN63CF	D25-2-CX5-63CF	£665	€765

KF & LF Flange Mounted



Fig.	No. Coax Pins	No. Instr Pins	A	Flange	Part Code	Price £	Price €
2	1	4	15.0	DN40KF	D9-CX14I-40KF	£269	€310
2	3	-	15.0	DN50KF	D15-CX3-50KF	£342	€394
2	5	-	15.0	DN63LF	D25-CX5-63LF	£360	€414
2	10	-	15.0	DN100LF	D25-2-CX5-100LF	£665	€765

Fig. 1.

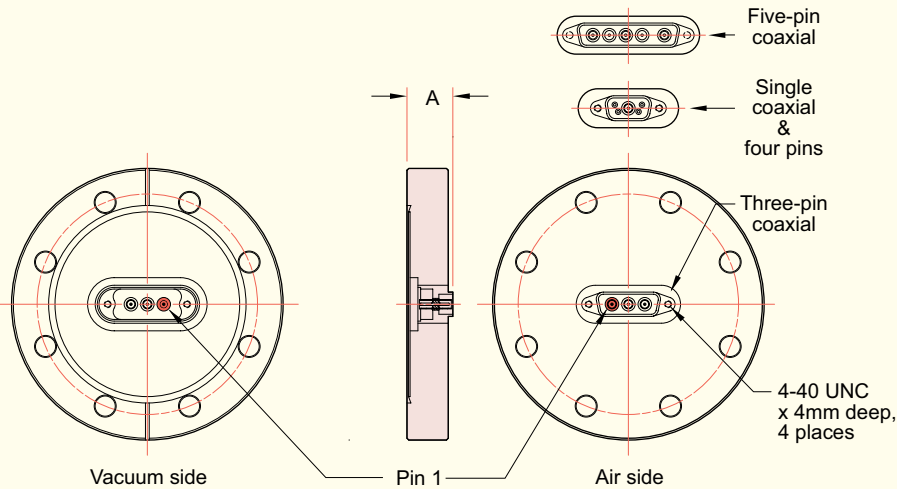
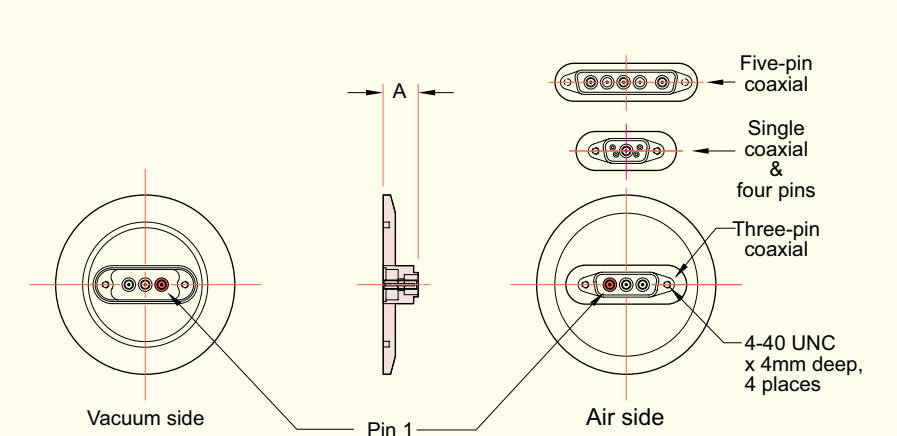


Fig. 2.



All dimensions are nominal in millimetres unless otherwise specified

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Subminiature D Coaxial In-Vacuum Cables & Connectors

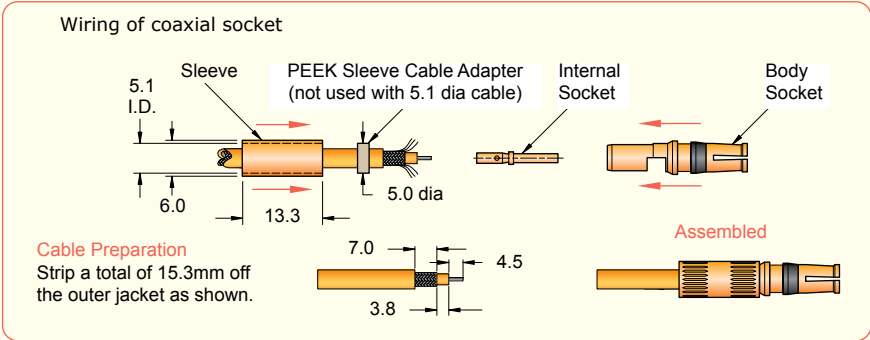


UHV Cable Assemblies

Connector to cable assemblies are constructed with UHV compatible PEEK subminiature D connector and Kapton® insulated 50 Ohm coaxial cables. The single coaxial connector assembly also includes four Kapton® insulated non-terminated instrumentation wires of either 500mm or 1m length. These wires are 28AWG silver plated copper wire, stranded 7 x 0.127mm. Conector to user specified end cable assemblies are fitted with PEEK connectors at one end and a user specified connector at the other. We offer SMA male, BNC male or user end female terminations. Contact to cable leads are single instrumentation or 50 Ohm coaxial, Kapton® insulated wires terminated one end with gold plated female sockets that mate with feedthroughs shown on the previous page. Opposite ends have no termination. These leads are ideally suited for applications where subminiature D connectors are not required.

Features:

- Kapton® insulated wires.
- PEEK connectors one end, user defined connector other end.
- UHV compatible.
- Custom lengths available.



UHV Connectors, Contacts & Tools

UHV subminiature D connectors are made of PEEK and do not include contacts, which must be ordered separately. Symmetric female socket connectors mate directly onto the vacuum or air side of subminiature D feedthroughs shown on the previous page. The five contact connector is asymmetric and will mate only on the vacuum side of the flange.

Specifications:

Voltage¹ 500VDC max

Current¹ 5A

Material

Conductors Silver plated copper

Insulation Type F Kapton® film

In-vacuum connector³ PEEK

Temperature Range² -75°C to 250°C

Kapton® Properties

Dielectric constant 2.9

Dielectric strength 80kV/mm

Dissipation factor, 1MHz 0.002

Initial tear 13.4kg/mm

Elongation 150%

Moisture absorbtion 0.4% @ 50% RH

Radiation resistance 10⁹ Rads

¹ - Please see section introduction for safety information. Stated electrical ratings are maximum test values. Feedthroughs are intended for instrumentation applications carrying low level signal voltages and currents.

For proper heat dissipation, a maximum of 20% of the pins on a feedthrough may carry the maximum pin current at any one time.

² - Assembly rating is reduced to that of the lowest rated component.

³ - PEEK is a polyetheretherketone thermoplastic.

In-Vacuum Subminiature Coaxial Cables



Connections	Length	Connection	Connector size	Part Code	Price £	Price €
1 Coax / 4 Instr	500	Female	33.0 x 12.7 x 19.1	D9-CX14I-F500	£197	€227
1 Coax / 4 Instr	1000	Female	33.0 x 12.7 x 19.1	D9-CX14I-F1000	£211	€243
1 Coax / 4 Instr	500	Male	33.0 x 12.7 x 19.1	D9-CX14I-M500	£197	€227
1 Coax / 4 Instr	1000	Male	33.0 x 12.7 x 19.1	D9-CX14I-M1000	£211	€243
3 Coax	500	Female	43.2 x 12.7 x 19.1	D15-CX3-F500	£335	€386
3 Coax	1000	Female	43.2 x 12.7 x 19.1	D15-CX3-F1000	£388	€447
5 Coax	500	Female	55.9 x 12.7 x 19.1	D25-CX5-F500	£335	€386
5 Coax	1000	Female	55.9 x 12.7 x 19.1	D25-CX5-F1000	£388	€447
3 Coax	500	Male	43.2 x 12.7 x 19.1	D15-CX3-M500	£498	€573
3 Coax	1000	Male	43.2 x 12.7 x 19.1	D15-CX3-M1000	£580	€667
5 Coax	500	Male	55.9 x 12.7 x 19.1	D25-CX5-M500	£498	€573
5 Coax	1000	Male	55.9 x 12.7 x 19.1	D25-CX5-M1000	£580	€667

In-Vacuum Subminiature Coaxial Leads (Female /Male Socket Fitted)



Connections	Length	Connection	Part Code	Price £	Price €
Instr	500	Female	DL-INSTR-F500	£10	€12
Instr	1000	Female	DL-INSTR-F1000	£12	€14
Coax	500	Female	DL-COAX-F500	£91	€105
Coax	1000	Female	DL-COAX-F1000	£104	€120
Coax	500	Male	DL-COAX-M500	£91	€105
Coax	1000	Mae	DL-COAX-M1000	£104	€120

In-Vacuum Coaxial Leads User Defined Terminations



These are sold as additions to the above cable assemblies and leads and are added at the factory only. Prices are per termination. For example, for 3 Coaxial cable add 3 x price for termination to receive cable with all three leads terminated.

Termination	Part Code	Price £	Price €
User End Female	Add - UEF	£163	€188
SMA male	Add - SMAM	£87	€101
BNC Male	Add - BNCM	£87	€101

In-Vacuum Subminiature Coaxial Connectors, Contacts & Tools



Connections	Connector size	Part Code	Price £	Price €
1 Coax / 4 Instr	33.0 x 12.7 x 19.1	D9-PCONF-1C-4I	£120	€138
3 Coax	43.2 x 12.7 x 19.1	D15-PCONF-3C	£129	€149
5 Coax	55.9 x 12.7 x 19.1	D25-PCONF-5C	£139	€160
1 Coax / 4 Instr	33.0 x 12.7 x 19.1	D9-PCONM-1C-4I	£120	€138
3Coax	43.2 x 12.7 x 19.1	D15-PCONM-3C	£129	€149
5 Coax	55.9 x 12.7 x 19.1	D25-PCONM-5C	£139	€160
D15 connector 3 coaxial pin female MACOR		D15-CONF-3C-MAC	POA	POA
UHV/Air coax female skt for use in connector shells 1/PK		DCX-1-SKT	£44	€51
UHV/Air coax male pin 1/PK		DCX-1-PIN	£44	€51
UHV/Air coax female skt (for 30AWG) for use in connector shells 1/PK		DCX-1-SKT-30AWG	£38	€44
UHV/Air coax male pin (for 30AWG)1/PK		DCX-1-PIN-30AWG	£38	€44
UHV/air female skt for use in C9 connector shells 10/PK (20-24AWG)		CPINF-10	£12	€14
UHV/air female skts for use in C9 connector shells10/PK (26-30AWG)		CPINF-10-S	£7	€9
UHV/air male pin for use in C9 connector shells 10/PK (20-24AWG)		CPINM-10	£21	€25
UHV/air male pin for use in C9 connector shells10/PK (26-30AWG)		CPINM-10-S	£21	€25
Crimp tool for D / C pins		DCT1	£760	€874
Crimp tool for coax sockets outer shell		DCT4	£829	€954
Extraction tool for coax & power pins		CX-EXT	£116	€134

All dimensions are nominal in millimetres unless otherwise specified

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Subminiature D Coaxial Air Side Cables & Connectors



Features:

- PVC insulated wires.
- Composite connectors one end, user defined connector other end.
- Custom lengths available.

Specifications:

Voltage ¹	500VDC max
Current ¹	5A
Material	
Conductors	Silver plated copper.
Insulation	PVC
Connector	Composite
Temperature Range ²	To 80°C

Air Service Cable Assemblies

Subminiature D coaxial connector to cable assemblies are pre-wired with 2.5m long RG174/U coaxial cables and are non terminated at one end. The single coaxial D connector to cable assemblies also include a 2.5m long, conductor data cable with 4.6mm diameter PVC cable jacket and aluminium-mylar foil shielding with a 24AWG tinned copper drain wire. The individual conductors are PVC insulated 24AWG, 7 x 0.2mm stranded, tinned copper wires.

Air Service Cable Assemblies; Coaxial D to Male BNC or Male SMA

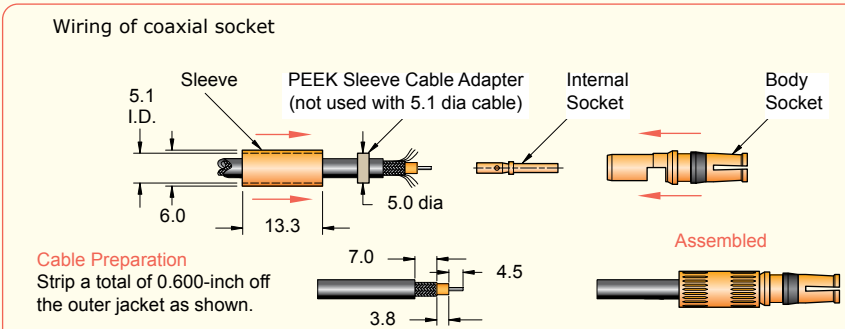
Subminiature D coaxial connector to BNC or SMA connector assemblies are pre-wired with 150mm long RG174/U coaxial cables and terminated with male BNC or SMA connectors. The single coaxial connector to BNC or SMA connector assemblies also include a 2.5m long, conductor data cable with 4.6mm diameter PVC cable jacket and aluminium-mylar foil shielding with a 24AWG tinned copper drain wire. The individual conductors are PVC insulated 24AWG, 7 x 0.2mm stranded, tinned copper wires.

¹ - Please see section introduction for safety information. Stated electrical ratings are maximum test values. Feedthroughs are intended for instrumentation applications carrying low level signal voltages and currents. For proper heat dissipation, a maximum of 20% of the pins on a feedthrough may carry the maximum pin current at any one time.

² - Assembly rating is reduced to that of the lowest rated component.

Air Service Connectors, Contacts & Tools

Components in this section are sold as the most basic components. Connectors do not include contacts which must be purchased separately. Connectors are made of a composite material.



All dimensions are nominal in millimetres unless otherwise specified

Air Side Subminiature Coaxial Cables - To Bare Wire Ends



Connections	Length	Connector size	Part Code	Price £	Price €
1 Coax / 4 Instr	2500	35.6 x 19.1 x 53.3	D9-CX14I-A2500	£105	€121
3 Coax	2500	43.2 x 19.1 x 53.4	D15-CX3-A2500	£195	€225
5 Coax	2500	58.4 x 19.1 x 55.9	D25-CX5-A2500	£325	€374

Air Side Subminiature Coaxial Cables - To BNC Male



Connections	Length	Connector size	Part Code	Price £	Price €
1 Coax / 4 Instr	150	35.6 x 19.1 x 53.3	D9-CX14I-BNC	£105	€121
3 Coax	150	43.2 x 19.1 x 53.4	D15-CX3-BNC	£205	€236
5 Coax	150	58.4 x 19.1 x 55.9	D25-CX5-BNC	£319	€367

Air Side Subminiature Coaxial Cables - To SMA Male



Connections	Length	Connector size	Part Code	Price £	Price €
1 Coax / 4 Instr	150	35.6 x 19.1 x 53.3	D9-CX14I-SMA	£114	€132
3 Coax	150	43.2 x 19.1 x 53.4	D15-CX3-SMA	£224	€258
5 Coax	150	58.4 x 19.1 x 55.9	D25-CX5-SMA	£357	€411

Air Side Subminiature Coaxial Connectors, Contacts & Tools

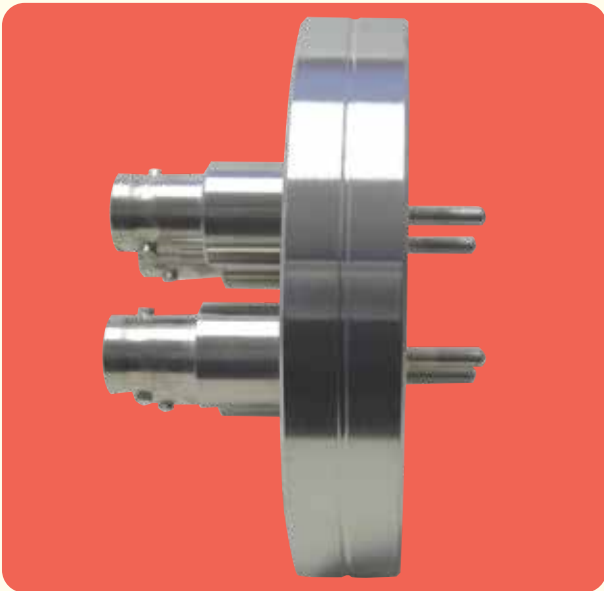


Connections	Connector size	Part Code	Price £	Price €
1 Coax / 4 Instr	35.6 x 19.1 x 53.3	D9-CX14I-ACONF	£37	€43
3 Coax	43.2 x 19.1 x 53.4	D15-CX3-ACONF	£38	€44
5 Coax	58.4 x 19.1 x 55.9	D25-CX5-ACONF	£43	€50
UHV/air coax female skt for use in connector shells 1/PK		DCX-1-SKT	£44	€51
UHV/Air coax female skt (for 30AWG) for use in connector shells 1/PK		DCX-1-SKT-30AWG	£44	€51
HV/air female skts for use in connector shells 10/PK (20-24 AWG)		DPINHVF-10	£27	€32
HV/air female skts for use in connector shells 10/PK (26-30 AWG)		DPINHVF-10-S	£27	€32
Crimp tool for D pins - HV & coax inner pin		DCT1	£760	€874
Crimp tool for coax sockets outer shell		DCT4	£829	€954
Extraction tool for coax & power pins		CX-EXT	£116	€134
Pin insert/extraction tool for HV pins		DPIE-HV	£44	€51

Connector details are included in Section 9 of this catalogue.

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500 Volts, 3 Amps, BNC Grounded Shield Single Ended



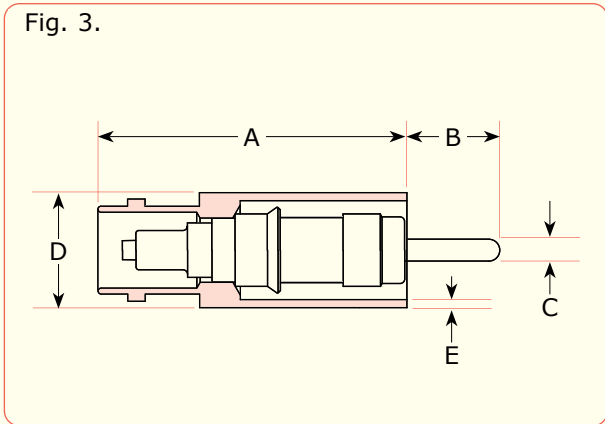
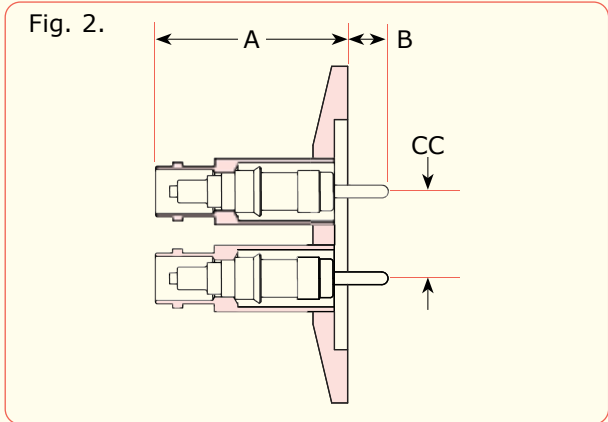
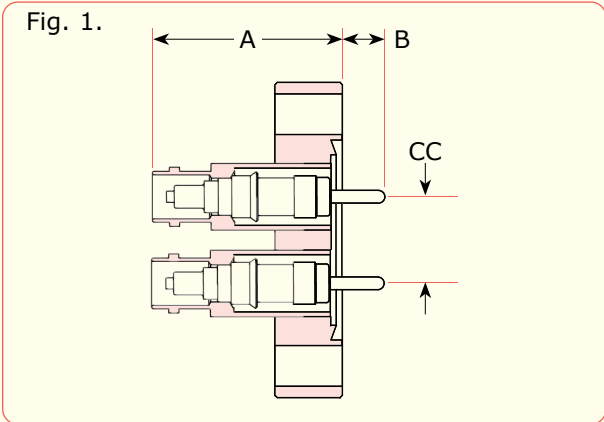
Features:

- Shielded conductor.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors & cables available.
- Custom versions available on request.

Specifications:

Voltage ¹	500VDC max
Current ¹	3A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	304 St.St.
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.



CF Flange Mounted



Fig.	No. Pins	Flange	A	B	CC	Part Code	Price £	Price €
1	1	DN16CF	35.1	8.9	-	FH-BNC-16CF	£72	€83
1	1	DN40CF	35.1	8.9	-	FH-BNC-40CF	£92	€106
1	2	DN40CF	35.1	8.9	19.1	FH-BNC2-40CF	£137	€158
1	3	DN40CF	35.1	8.9	24.1	FH-BNC3-40CF	£183	€211
1	4	DN40CF	35.1	8.9	24.1	FH-BNC4-40CF	£229	€264

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	CC	Part Code	Price £	Price €
2	1	DN16KF	36.3	7.6	-	FH-BNC-16KF	£72	€83
2	1	DN40KF	33.8	10.2	-	FH-BNC-40KF	£92	€106
2	2	DN40KF	33.8	10.2	19.1	FH-BNC2-40KF	£128	€148
2	3	DN40KF	33.8	10.2	24.1	FH-BNC3-40KF	POA	POA
2	4	DN40KF	33.8	10.2	24.1	FH-BNC4-40KF	£229	€264
2	3	DN50KF	33.8	10.2	24.1	FH-BNC3-50KF	£183	€211
2	4	DN50KF	33.8	10.2	24.1	FH-BNC4-50KF	£229	€264

Weldable

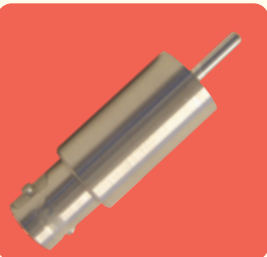


Fig.	No. Pins	A	B	C	D	E	Part Code	Price £	Price €
3	1	33.8	10.2	2.4	12.6	0.9	FH-BNC-W	£33	€38

Accessories



Description	Part Code	Price £	Price €
50 Ohm Kapton® gnd shd coax UHV cable AF500- N/C L=500mm	CC-50GS-AF500-500	£169	€195
50 Ohm Kapton® gnd shd coax UHV cable AF500 - N/C L=1000mm	CC-50GS-AF500-1000	£178	€205
User end female	Add -UEF	£163	€188
SMA male	Add -SMA	£87	€101
BNC male	Add -BNC	£87	€101
Power push-on connector BeCu 2.4mm 150°C air 200°C vacuum 10/PK	FHP-BECU-2.4-CON	£61	€71
Power in-line connector BeCu 3.1mm 150°C air 400°C vacuum 10/PK	FHP-BECU-3IL-CON	£44	€51

Connector details are included in Section 9 of this catalogue.



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500 Volts, 3 Amps, BNC Grounded Shield Double Ended



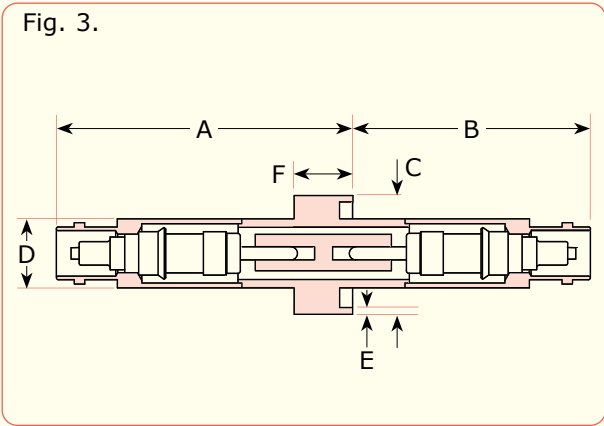
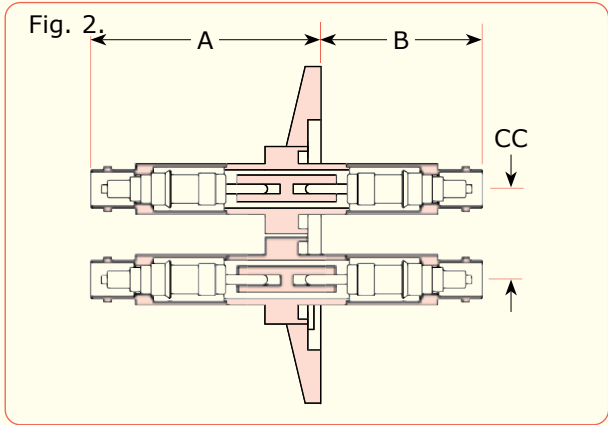
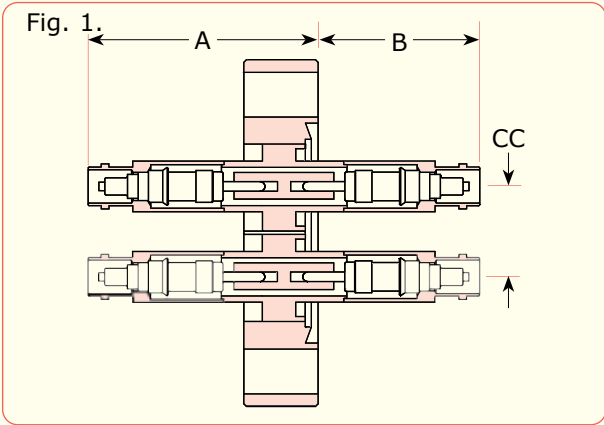
Features:

- Shielded conductor.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors & cables available.
- Custom versions available on request.
- 4GHz, 50Ω version available, please call sales office for details.

Specifications:

Voltage ¹	500VDC max
Current ¹	3A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	304 St.St.
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.



All dimensions are nominal in millimetres unless otherwise specified

CF Flange Mounted



Fig.	No. Pins	Flange	A	B	CC	Part Code	Price £	Price €
1	1	DN16CF	64.3	29.0	-	FH-BNC-D-16CF	£223	€257
1	1	DN40CF	52.8	40.1	-	FH-BNC-D-40CF	£234	€270
1	2	DN40CF	52.8	40.1	19.1	FH-BNC2-D-40CF	£406	€467
1	3	DN40CF	52.8	40.1	24.1	FH-BNC3-D-40CF	£588	€677
1	4	DN63CF	52.8	40.1	24.1	FH-BNC4-D-63CF	£750	€863

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	CC	Part Code	Price £	Price €
2	1	DN16KF	64.3	28.7	-	FH-BNC-D-16KF	£229	€264
2	1	DN25KF	64.3	28.7	-	FH-BNC-D-25KF	£223	€257
2	1	DN40KF	51.6	41.4	-	FH-BNC-D-40KF	£234	€270
2	2	DN40KF	51.6	41.4	19.1	FH-BNC2-D-40KF	£406	€467
2	2	DN50KF	51.6	41.4	19.1	FH-BNC2-D-50KF	£406	€467
2	3	DN50KF	51.6	41.4	24.1	FH-BNC3-D-50KF	£588	€677
2	4	DN50KF	51.6	41.4	24.1	FH-BNC4-D-50KF	£750	€863

Weldable



Fig.	No. Pins	A	B	C	D	E	F	Part Code	Price £	Price €
3	1	51.6	41.4	18.9	12.6	0.9	10.0	FH-BNC-D-W	£168	€194

Accessories



Description	Part Code	Price £	Price €
50 Ohm Kapton® coax UHV cable BNC - N/C L=500mm	CC-50-BNC-500	£91	€105
50 Ohm Kapton® coax UHV cable BNC - N/C L=1000mm	CC-50-BNC-1000	£101	€117
User end female	Add -UEF	£163	€188
SMA male	Add -SMA	£87	€101
BNC male	Add -BNC	£87	€101

Connector details are included in Section 9 of this catalogue.

All dimensions are nominal in millimetres unless otherwise specified

500 Volts, 3 Amps, BNC Floating Shield Single Ended



Specifications:

Voltage¹ 500VDC max
(Floating shield - ground : 2,500VDC max)

Current¹ 3A max

Impedance Non constant

Material

Flange 304 St.St.
Shell 304 St.St.
Pin 304 St.St.
Insulation Alumina ceramic

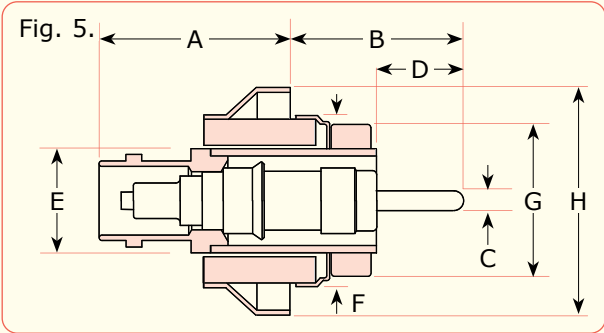
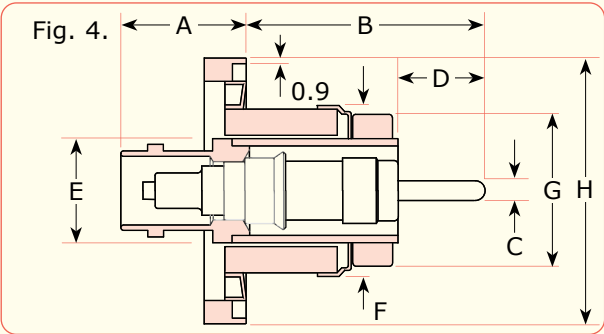
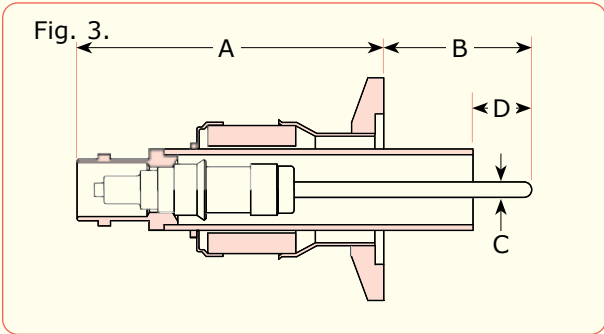
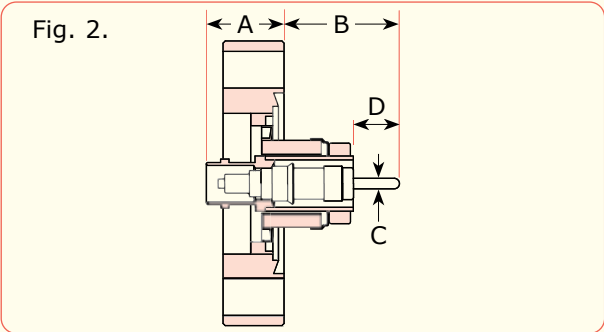
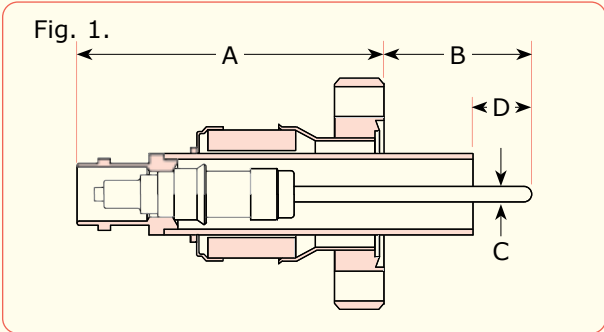
Temperature Range²

CF flanged feedthrough -200°C to 450°C
KF flanged feedthrough -20°C to 150°C
Weldable feedthrough -200°C to 450°C
Air side connector -65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.

Features:

- Shielded conductor.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors & cables available.
- Custom versions available on request.



All dimensions are nominal in millimetres unless otherwise specified

CF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	D	Part Code	Price £	Price €
1	1	DN16CF	50.8	31.8	2.4	9.4	FH-BNC-FS-16CF*	£163	€188
2	1	DN40CF	17.8	24.9	2.4	8.9	FH-BNC-FS-40CF	£163	€188

KF Flange Mounted

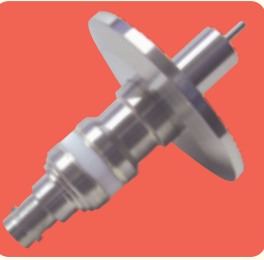


Fig.	No. Pins	Flange	A	B	C	D	Part Code	Price £	Price €
3	1	DN16KF	65.8	17.0	2.4	9.4	FH-BNC-FS-16KF*	£163	€188
3	1	DN40KF	53.1	29.7	2.4	9.4	FH-BNC-FS-40KF*	£163	€188

Weldable



Fig.	No. Pins	A	B	C	D	E	F	G	H	Part Code	Price £	Price €
4	1	16.5	27.4	2.4	10.2	12.7	19.8	17.1	32.6	FH-BNC-FS-W	£117	€135
5	1	22.6	21.3	2.4	10.2	12.7	19.8	17.1	24.6	FH-BNC-FS-WS	£117	€135

Accessories



Description	Part Code	Price £	Price €
50 Ohm Kapton® gnd shd coax UHV cable AF500 - N/C L=500mm	CC-50GS-AF500-500	£169	€195
50 Ohm Kapton® gnd shd coax UHV cable AF500 - N/C L=1000mm	CC-50GS-AF500-1000	£178	€205
50 Ohm Kapton® float shd coax UHV cable A875 - N/C L=500mm	CC-50FS-AF875-500	£169	€195
50 Ohm Kapton® float shd coax UHV cable AF875 - N/C L=1000mm	CC-50FS-AF875-1000	£178	€205
User end female	Add -UEF	£163	€188
SMA male	Add -SMA	£77	€89
BNC male	Add -BNC	£87	€101
Power push-on connector BeCu 2.4mm 150°C air 200°C vacuum 10/PK	FHP-BECU-2.4-CON	£61	€71
Power in-line connector BeCu 3.1mm 150°C air 400°C vacuum 10/PK	FHP-BECU-3.1L-CON	£44	€51

* - Use grounded shield cable assemblies with these feedthroughs. Connector details are included in Section 9 of this catalogue.



All dimensions are nominal in millimetres unless otherwise specified

500 Volts, 3 Amps, BNC Floating Shield Double Ended



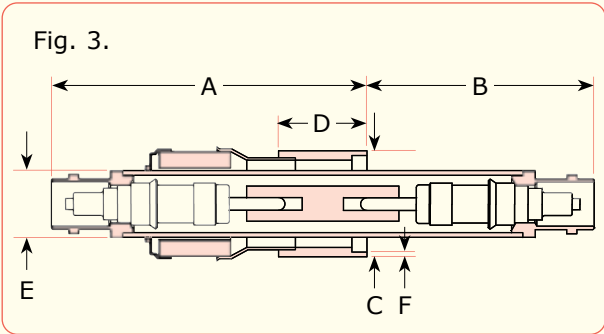
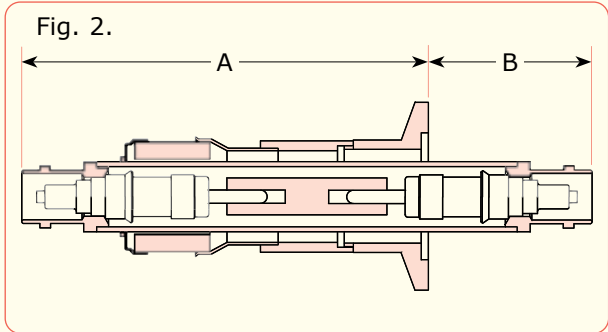
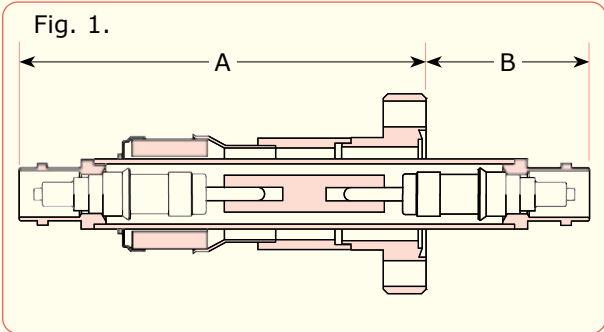
Features:

- Shielded conductor.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors & cables available.
- Custom versions available on request.

Specifications:

Voltage ¹	500VDC max (Floating shield - ground : 2,500VDC max)
Current ¹	3A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	304 St.St.
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.



CF Flange Mounted



Fig.	No. Pins	Flange	A	B	Part Code	Price £	Price €
1	1	DN16CF	75.2	30.7	FH-BNC-FSD-16CF	£325	€374
1	1	DN40CF	63.8	42.2	FH-BNC-FSD-40CF	£330	€380

KF Flange Mounted



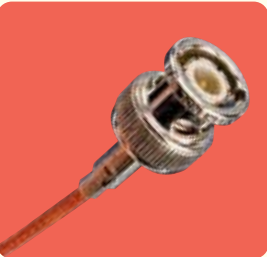
Fig.	No. Pins	Flange	A	B	Part Code	Price £	Price €
2	1	DN16KF	75.2	30.7	FH-BNC-FSD-16KF	£325	€374
2	1	DN40KF	62.5	43.4	FH-BNC-FSD-40KF	£330	€380

Weldable



Fig.	No. Pins	A	B	C	D	E	F	Part Code	Price £	Price €
3	1	62.5	43.4	19.0	19.1	12.7	0.9	FH-BNC-FSD-W	£274	€316

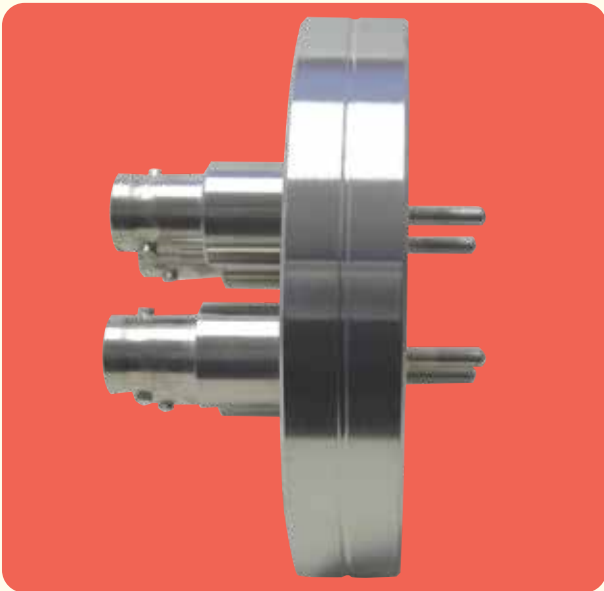
Accessories



Description	Part Code	Price £	Price €
50 Ohm Kapton® coax UHV cable BNC - N/C L=500mm	CC-50-BNC-500	£91	€105
50 Ohm Kapton® coax UHV cable BNC - N/C L=1000mm	CC-50-BNC-1000	£101	€117
User end female	Add -UEF	£163	€188
SMA male	Add -SMA	£87	€101
BNC male	Add -BNC	£87	€101

Connector details are included in Section 9 of this catalogue.

5,000 Volts, 3 Amps, MHV Grounded Shield Single Ended



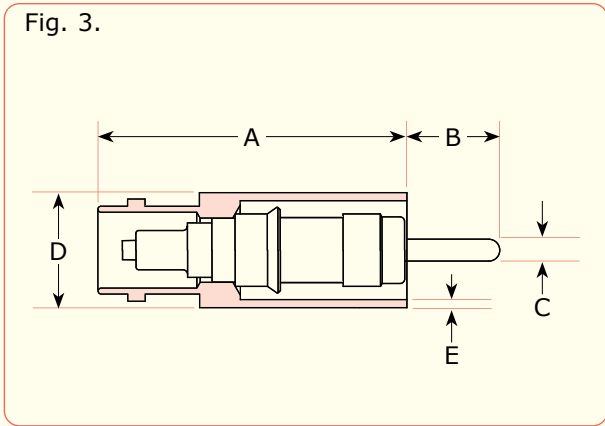
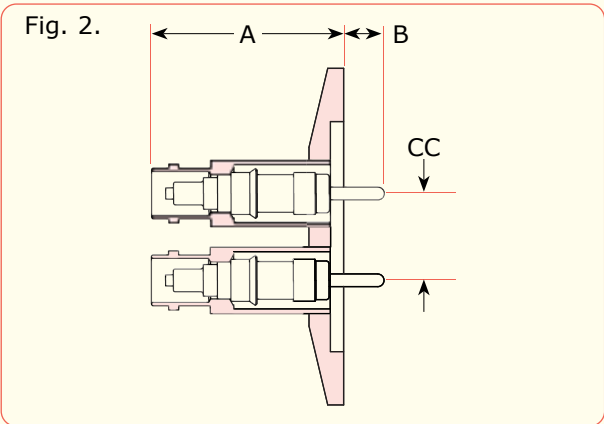
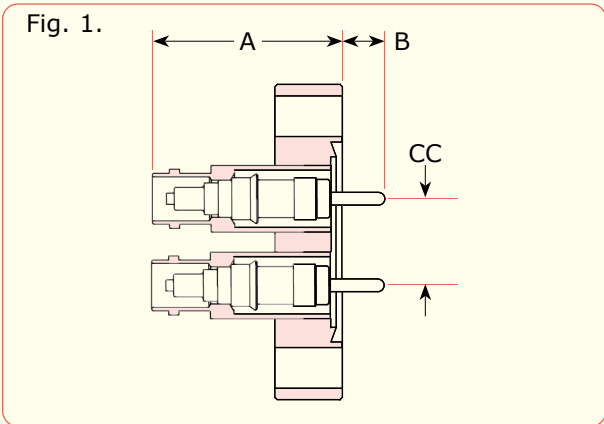
Specifications:

Voltage ¹	5,000VDC max
Current ¹	3A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	304 St.St.
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.

Features:

- Shielded conductor.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors & cables available.
- Custom versions available on request.



All dimensions are nominal in millimetres unless otherwise specified

CF Flange Mounted



Fig.	No. Pins	Flange	A	B	CC	Part Code	Price £	Price €
1	1	DN16CF	35.1	7.6	-	FH5-MHV-16CF	£82	€95
1	1	DN40CF	35.1	7.6	-	FH5-MHV-40CF	£92	€106
1	2	DN40CF	35.1	7.6	19.1	FH5-MHV2-40CF	£137	€158
1	3	DN40CF	35.1	7.6	24.1	FH5-MHV3-40CF	£193	€222
1	4	DN40CF	35.1	7.6	24.1	FH5-MHV4-40CF	£249	€287

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	CC	Part Code	Price £	Price €
2	1	DN16KF	36.3	6.4	-	FH5-MHV-16KF	£87	€101
2	1	DN40KF	33.8	8.9	-	FH5-MHV-40KF	£92	€106
2	2	DN40KF	33.8	8.9	19.1	FH5-MHV2-40KF	£137	€158
2	3	DN50KF	33.8	8.9	24.1	FH5-MHV3-50KF	£193	€222
2	4	DN40KF	33.8	8.9	19.1	FH5-MHV4-40KF	£249	€287
2	4	DN50KF	33.8	8.9	24.1	FH5-MHV4-50KF	£249	€287

Weldable

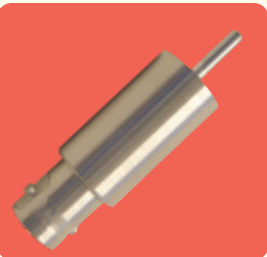


Fig.	No. Pins	A	B	C	D	E	Part Code	Price £	Price €
3	1	33.8	8.9	2.4	12.6	0.9	FH5-MHV-W	£37	€43

Accessories



Description	Part Code	Price £	Price €
50 Ohm Kapton® gnd shd coax UHV cable AF500- N/C L=500mm	CC-50GS-AF500-500	£169	€195
50 Ohm Kapton® gnd shd coax UHV cable AF500 - N/C L=1000mm	CC-50GS-AF500-1000	£178	€205
User end female	Add -UEF	£163	€188
SMA male	Add -SMA	£87	€101
MHV male	Add -MHV	£91	€105
Power push-on connector BeCu 2.4mm 150°C air 200°C vacuum 10/PK	FHP-BECU-2.4-CON	£41	€48
Power in-line connector BeCu 3.1mm 150°C air 400°C vacuum 10/PK	FHP-BECU-3IL-CON	£44	€51



Connector details are included in Section 9 of this catalogue.

All dimensions are nominal in millimetres unless otherwise specified

5,000 Volts, 3 Amps, MHV Grounded Shield Double Ended



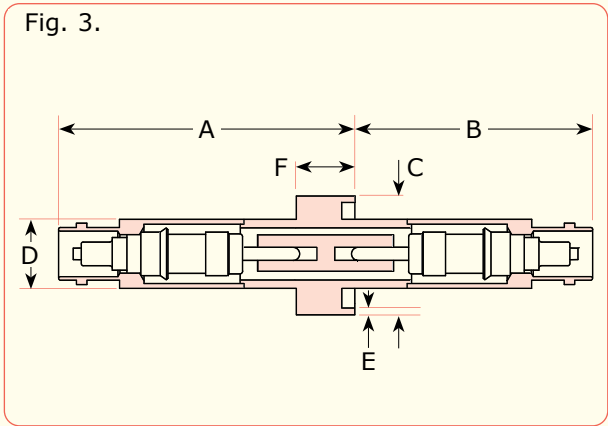
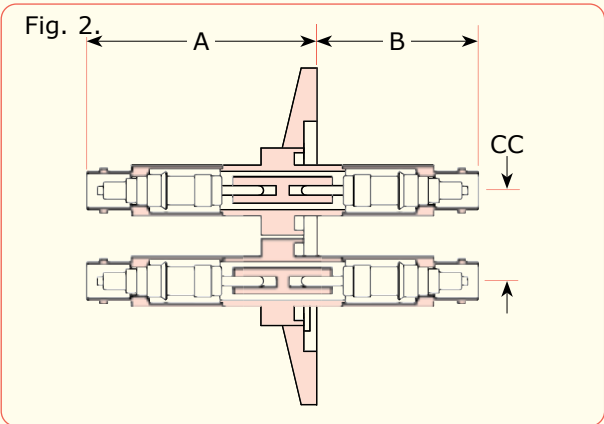
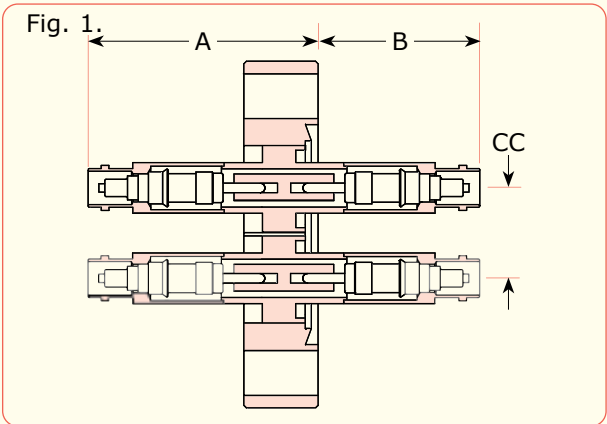
Specifications:

Voltage ¹	5,000VDC max
Current ¹	3A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	304 St.St.
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.

Features:

- Shielded conductor.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors & cables available.
- Custom versions available on request.



CF Flange Mounted



Fig.	No. Pins	Flange	A	B	CC	Part Code	Price £	Price €
1	1	DN16CF	64.3	28.7	-	FH5-MHV-D-16CF	£229	€264
1	1	DN40CF	52.8	40.1	-	FH5-MHV-D-40CF	£239	€275
1	2	DN40CF	52.8	40.1	19.1	FH5-MHV2-D-40CF	£432	€497
1	3	DN40CF	52.8	40.1	24.1	FH5-MHV3-D-40CF	£624	€718

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	CC	Part Code	Price £	Price €
2	1	DN16KF	50.8	40.6	-	FH5-MHV-D-16KF	£229	€264
2	1	DN25KF	50.8	40.6	-	FH5-MHV-D-25KF	£234	€270
2	1	DN40KF	50.8	40.6	-	FH5-MHV-D-40KF	£239	€275
2	2	DN40KF	50.8	40.6	19.1	FH5-MHV2-D-40KF	£239	€275
2	1	DN50KF	50.8	40.6	-	FH5-MHV-D-50KF	£432	€497
2	2	DN50KF	50.8	40.6	19.1	FH5-MHV2-D-50KF	£426	€490
2	3	DN50KF	51.6	41.4	24.1	FH5-MHV3-D-50KF	£624	€718

Weldable



Fig.	No. Pins	A	B	C	D	E	F	Part Code	Price £	Price €
3	1	51.6	41.4	18.9	12.7	0.9	10.0	FH5-MHV-D-W	£173	€199

Accessories



Description	Part Code	Price £	Price €
50 Ohm Kapton® coax UHV cable MHV - N/C L=500mm	CC-50-MHV-500	£101	€117
50 Ohm Kapton® coax UHV cable MHV - N/C L=1000mm	CC-50-MHV-1000	£111	€128
User end female	Add -UEF	£163	€188
SMA male	Add -SMA	£87	€101
MHV male	Add-MHV	£91	€105

Connector details are included in Section 9 of this catalogue.

5,000 Volts, 3 Amps, MHV Floating Shield Single Ended



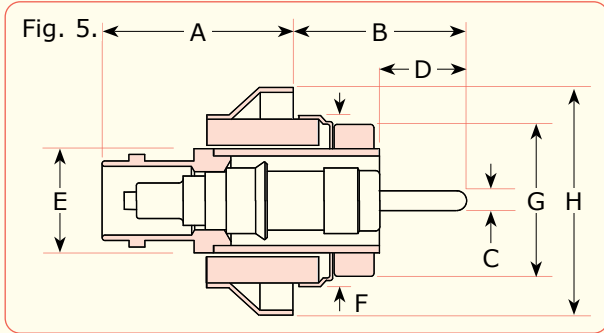
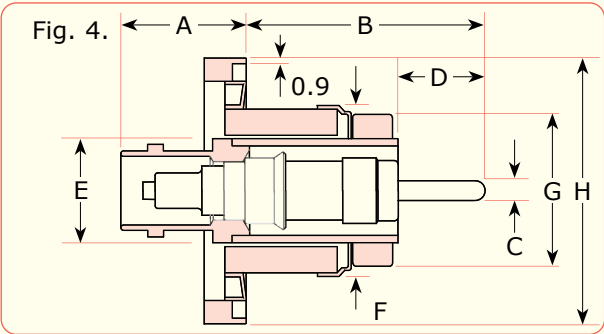
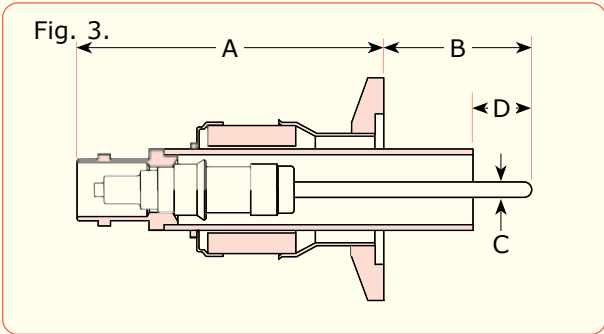
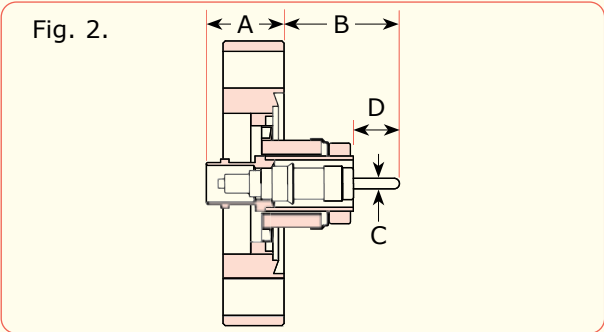
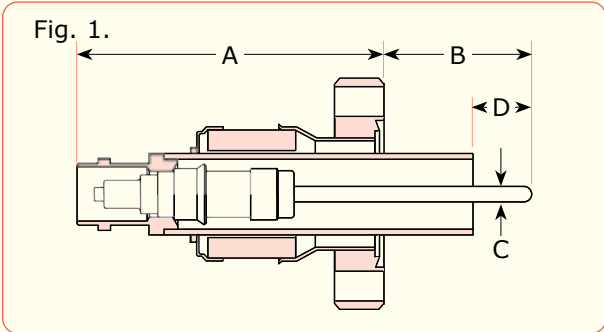
Specifications:

Voltage ¹	5,000VDC max (Floating shield - ground : 2,500VDC max)
Current ¹	3A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	304 St.St.
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.

Features:

- Shielded conductor.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors & cables available.
- Custom versions available on request.



All dimensions are nominal in millimetres unless otherwise specified

CF Flange Mounted*



Fig.	No. Pins	Flange	A	B	C	D	Part Code	Price £	Price €
1	1	DN16CF	50.8	31.8	2.4	9.4	FH5-MHV-FS-16CF*	£178	€205
2	1	DN40CF	17.8	24.9	2.4	8.9	FH5-MHV-FS-40CF	£178	€205

KF Flange Mounted*



Fig.	No. Pins	Flange	A	B	C	D	Part Code	Price £	Price €
3	1	DN16KF	65.8	17.0	2.4	9.4	FH5-MHV-FS-16KF*	£178	€205
3	1	DN40KF	53.1	29.7	2.4	9.4	FH5-MHV-FS-40KF*	£178	€205

Weldable



Fig.	No. Pins	A	B	C	D	E	F	G	H	Part Code	Price £	Price €
4	1	16.5	27.4	2.4	10.2	12.7	19.8	17.1	32.6	FH5-MHV-FS-W	£122	€141
5	1	22.6	20.0	2.4	10.2	12.7	19.8	17.1	24.6	FH5-MHV-FS-WS	£122	€141

Accessories



Description	Part Code	Price £	Price €
50 Ohm Kapton® gnd shd coax UHV cable AF500 - N/C L=500mm	CC-50GS-AF500-500	£169	€195
50 Ohm Kapton® gnd shd coax UHV cable AF500 - N/C L=1000mm	CC-50GS-AF500-1000	£178	€205
50 Ohm Kapton® float shd coax UHV cable A875 - N/C L=500mm	CC-50FS-AF875-500	£169	€195
50 Ohm Kapton® float shd coax UHV cable AF875 - N/C L=1000mm	CC-50FS-AF875-1000	£178	€205
User end female	Add -UEF	£163	€188
SMA male	Add -SMA	£87	€101
MHV male	Add-MHV	£91	€105
Power push-on connector BeCu 2.4mm 150°C air 200°C vacuum 10/PK	FHP-BECU-2.4-CON	£41	€48
Power in-line connector BeCu 3.1mm 150°C air 400°C vacuum 10/PK	FHP-BECU-3IL-CON	£44	€51

* - Use grounded shield cable assemblies with these feedthroughs
Connector details are included in Section 9 of this catalogue.



All dimensions are nominal in millimetres unless otherwise specified

5,000 Volts, 3 Amps, MHV Floating Shield Double Ended



Features:

- Shielded conductor.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors & cables available.
- Custom versions available on request.

Specifications:

Voltage¹ 5,000VDC max
(Floating shield - ground : 2,500VDC max)

Current¹ 3A max

Impedance Non constant

Material

Flange 304 St.St.

Shell 304 St.St.

Pin 304 St.St.

Insulation Alumina ceramic

Temperature Range²

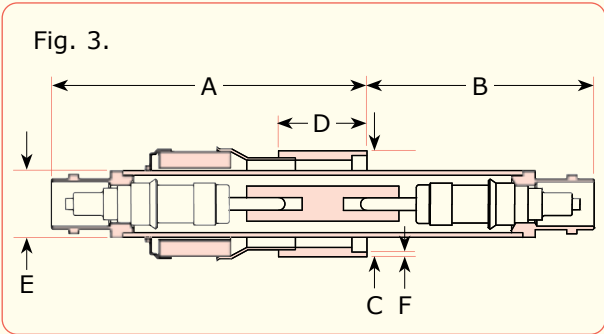
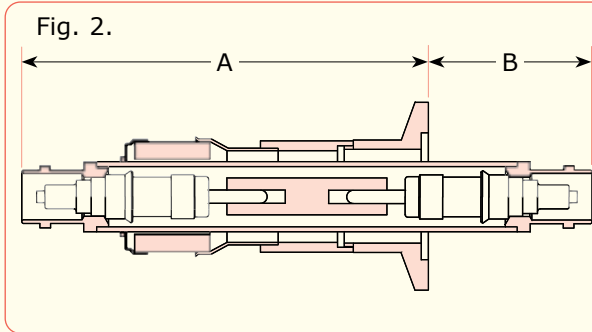
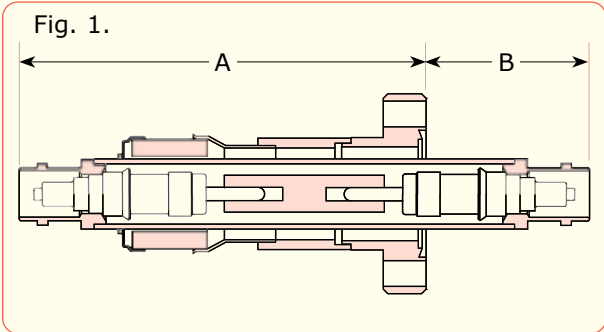
CF flanged feedthrough -200°C to 450°C

KF flanged feedthrough -20°C to 150°C

Weldable feedthrough -200°C to 450°C

Air side connector -65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.



CF Flange Mounted



Fig.	No. Pins	Flange	A	B	Part Code	Price £	Price €
1	1	DN16CF	75.2	30.7	FH5-MHV-FSD-16CF	£340	€391
1	1	DN40CF	63.8	42.2	FH5-MHV-FSD-40CF	£365	€420

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	Part Code	Price £	Price €
2	1	DN16KF	75.2	30.7	FH5-MHV-FSD-16KF	£340	€391
2	1	DN40KF	62.5	43.4	FH5-MHV-FSD-40KF	£351	€404

Weldable



Fig.	No. Pins	A	B	C	D	E	F	Part Code	Price £	Price €
3	1	62.5	43.4	19.0	19.1	12.7	0.9	FH5-MHV-FSD-W	£284	€327

Accessories



Description	Part Code	Price £	Price €
50 Ohm Kapton® coax UHV cable MHV - N/C L=500mm	CC-50-MHV-500	£1010	€1162
50 Ohm Kapton® coax UHV cable MHV - N/C L=1000mm	CC-50-MHV-1000	£111	€128
User end female	Add -UEF	£163	€188
SMA male	Add -SMA	£87	€101
MHV male	Add-MHV	£91	€105

Connector details are included in Section 9 of this catalogue.

5,000 Volts, 5 Amps, SHV Grounded Shield Exposed Pin



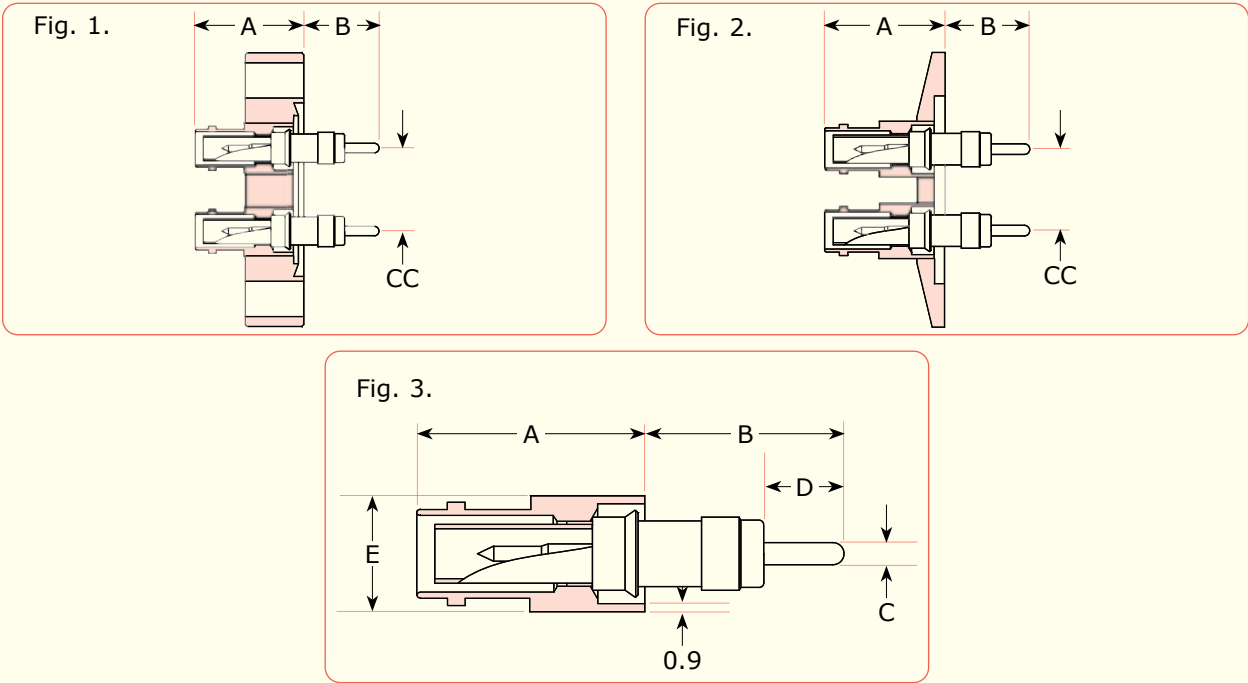
Features:

- Shielded conductor.
- Recessed air side pin for increased safety.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors available.
- Custom versions available on request.

Specifications:

Voltage ¹	5,000VDC max
Current ¹	5A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	Nickel
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.



CF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	CC	Part Code	Price £	Price €
1	1	DN16CF	27.4	21.8	2.4	-	FH5-SHV-E-16CF	£128	€148
1	1	DN40CF	27.4	21.8	2.4	-	FH5-SHV-E-40CF	£148	€171
1	2	DN40CF	27.4	21.8	2.4	19.1	FH5-SHV2-E-40CF	£234	€270
1	3	DN40CF	27.4	21.8	2.4	24.1	FH5-SHV3-E-40CF	£340	€391
1	4	DN40CF	27.4	21.8	2.4	24.1	FH5-SHV4-E-40CF	£436	€502

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	CC	Part Code	Price £	Price €
2	1	DN16KF	28.7	20.6	2.4	-	FH5-SHV-E-16KF	£128	€148
2	1	DN40KF	26.2	23.1	2.4	-	FH5-SHV-E-40KF	£148	€171
2	2	DN40KF	26.2	23.1	2.4	19.1	FH5-SHV2-E-40KF	£234	€270
2	3	DN50KF	26.2	23.1	2.4	24.1	FH5-SHV3-E-50KF	£340	€391
2	4	DN50KF	26.2	23.1	2.4	24.1	FH5-SHV4-E-50KF	£436	€502

Weldable



Fig.	No. Pins	A	B	C	D	E	Part Code	Price £	Price €
3	1	26.2	24.1	2.4	9.7	12.6	FH5-SHV-E-W	£77	€89

Accessories



Description	Part Code	Price £	Price €
Power push-on connector BeCu 2.4mm 150°C air 200°C vacuum 10/PK	FHP-BECU-2.4-CON	£41	€48
Power in-line connector BeCu 3.1mm 150°C air 400°C vacuum 10/PK	FHP-BECU-3.1L-CON	£44	€51

Connector details are included in Section 9 of this catalogue.

5,000 Volts, 5 Amps, SHV Grounded Shield Recessed Pin



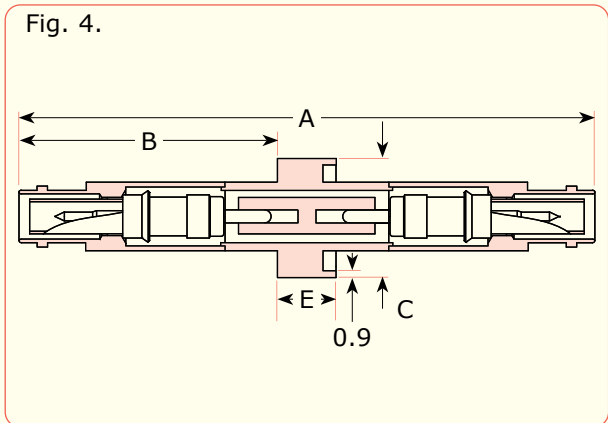
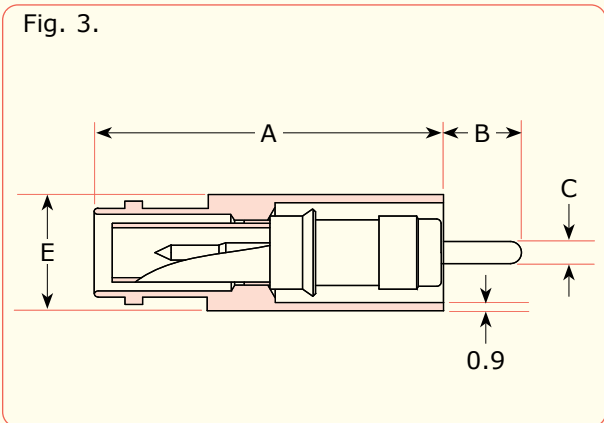
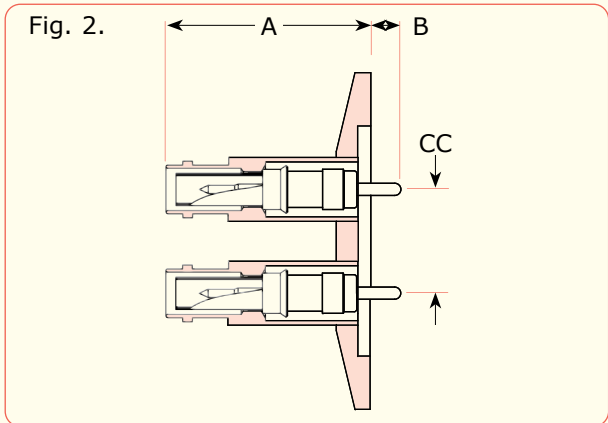
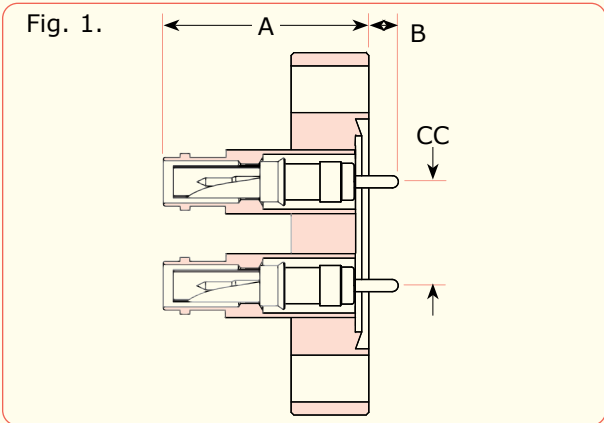
Features:

- Shielded conductor.
- Recessed air side pin for increased safety.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors available.
- Custom versions available on request.

Specifications:

Voltage ¹	5,000VDC max
Current ¹	5A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	Nickel
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.



All dimensions are nominal in millimetres unless otherwise specified

CF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	CC	Part Code	Price £	Price €
1	1	DN16CF	41.9	8.1	2.4	-	FH5-SHV-16CF	£112	€129
1	1	DN40CF	41.9	8.1	2.4	-	FH5-SHV-40CF	£133	€153
1	2	DN40CF	41.9	8.1	2.4	19.1	FH5-SHV2-40CF	£203	€234
1	3	DN40CF	41.9	8.1	2.4	24.1	FH5-SHV3-40CF	£295	€340
1	4	DN40CF	41.9	8.1	2.4	24.1	FH5-SHV4-40CF	£371	€427

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	CC	Part Code	Price £	Price €
2	1	DN16KF	43.2	6.9	2.4	-	FH5-SHV-16KF	£112	€129
2	1	DN40KF	40.6	9.4	2.4	-	FH5-SHV-40KF	£122	€141
2	2	DN40KF	40.6	9.4	2.4	19.1	FH5-SHV2-40KF	£189	€218
2	3	DN50KF	40.6	9.4	2.4	24.1	FH5-SHV3-50KF	£325	€374
2	4	DN40KF	40.6	9.4	2.4	19.1	FH5-SHV4-40KF	£371	€427
2	4	DN50KF	40.6	9.4	2.4	24.1	FH5-SHV4-50KF	£371	€427

Weldable



Fig.	No. Pins	A	B	C	E	Part Code	Price £	Price €
3	1	40.6	9.4	2.4	12.6	FH5-SHV-W	£61	€71
4	1	106.7	48.3	15.8	10.2	FH5-SHV-D-W	£223	€257

Accessories



Description	Part Code	Price £	Price €
Power push-on connector BeCu 2.4mm 150°C air 200°C vacuum 10/PK	FHP-BECU-2.4-CON	£41	€48
Power in-line connector BeCu 3.1mm 150°C air 400°C vacuum 10/PK	FHP-BECU-3IL-CON	£44	€51

Connector details are included in Section 9 of this catalogue.

All dimensions are nominal in millimetres unless otherwise specified

5,000 Volts, 5 Amps, SHV Floating Shield



Features:

- Shielded conductor.
- Recessed air side pin for increased safety.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors available.
- Custom versions available on request.

Specifications:

Voltage¹ 5,000VDC max
(Floating shield - ground : 2,500VDC max)

Current¹ 5A max

Impedance Non constant

Material

Flange 304 St.St.

Shell 304 St.St.

Pin Nickel

Insulation Alumina ceramic

Temperature Range²

CF flanged feedthrough -200°C to 450°C

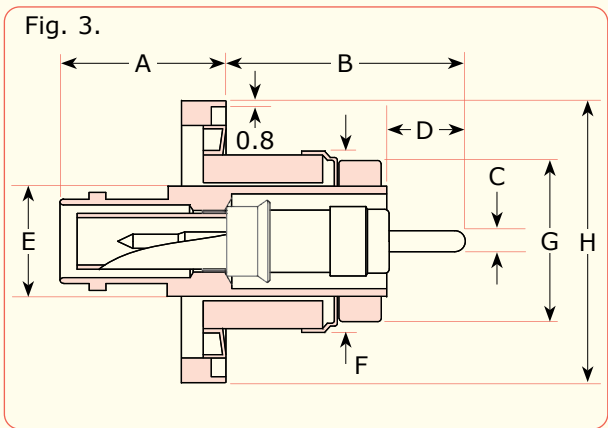
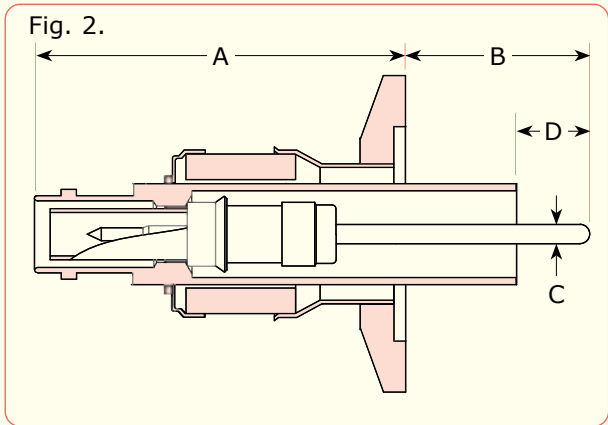
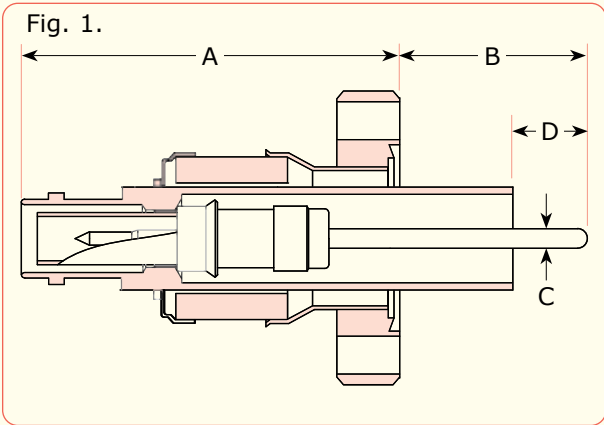
KF flanged feedthrough -20°C to 150°C

Weldable feedthrough -200°C to 450°C

Air side connector -65°C to 165°C

¹ - Please see section introduction for safety information.

² - Assembly rating is reduced to that of the lowest rated component.



CF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	D	Part Code	Price £	Price €
1	1	DN16CF	51.8	35.1	2.4	12.7	FH5-SHV-FS-16CF*	£197	€227
1	1	DN40CF	57.2	29.7	2.4	12.7	FH5-SHV-FS-40CF	POA	POA

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	D	Part Code	Price £	Price €
2	1	DN16KF	51.1	36.8	2.4	12.7	FH5-SHV-FS-16KF*	POA	POA
2	1	DN40KF	51.1	36.8	2.4	12.7	FH5-SHV-FS-40KF*	POA	POA

Weldable



Fig.	No. Pins	A	B	C	D	E	F	G	H	Part Code	Price £	Price €
3	1	23.4	26.7	2.4	9.4	12.6	19.8	17.3	32.6	FH5-SHV-FS-W	£1537	€1768

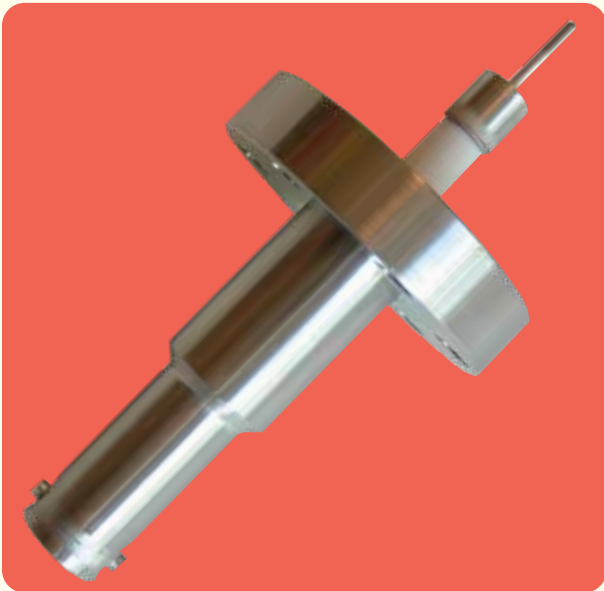
Accessories



Description	Part Code	Price £	Price €
Power push-on connector BeCu 2.4mm 150°C air 200°C vacuum 10/PK	FHP-BECU-2.4-CON	£41	€48
Power in-line connector BeCu 3.1mm 150°C air 400°C vacuum 10/PK	FHP-BECU-3IL-CON	£44	€51

* - Use grounded shield cable assemblies with these feedthroughs
Connector details are included in Section 9 of this catalogue.

10,000 Volts, 5 Amps, SHV Grounded Shield Exposed Pin



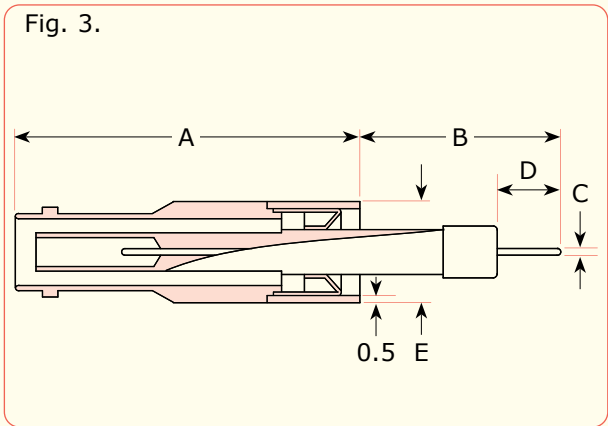
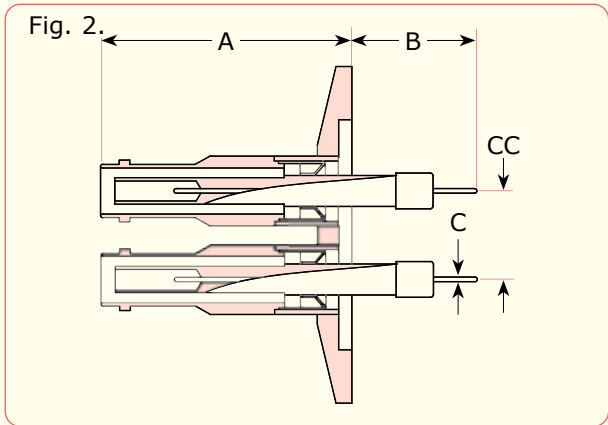
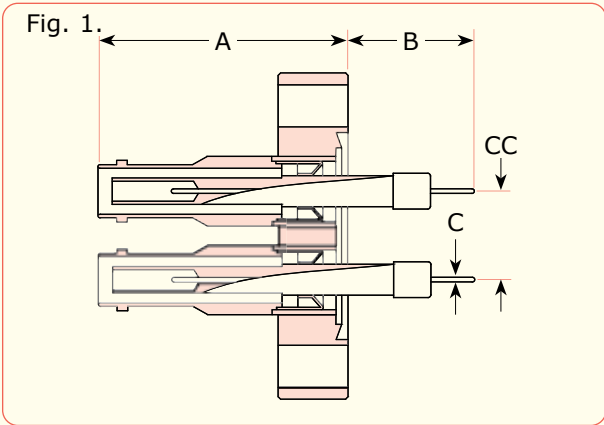
Features:

- Shielded conductor.
- Recessed air side pin for increased safety.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors available.
- Custom versions available on request.

Specifications:

Voltage ¹	10,000VDC max
Current ¹	5A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	Nickel
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.



CF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	CC	Part Code	Price £	Price €
1	1	DN16CF	46.2	24.1	1.3	-	FH10-SHV-E-16CF	£198	€228
1	1	DN40CF	46.2	24.1	1.3	-	FH10-SHV-E-40CF	£209	€241
1	2	DN40CF	46.2	24.1	1.3	19.1	FH10-SHV2-E-40CF	£365	€420
1	3	DN40CF	46.2	24.1	1.3	19.1	FH10-SHV3-E-40CF	£527	€607
1	4	DN40CF	46.2	24.1	1.3	24.1	FH10-SHV4-E-40CF	£689	€793

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	CC	Part Code	Price £	Price €
2	1	DN16KF	47.5	22.9	1.3	-	FH10-SHV-E-16KF	£198	€228
2	1	DN40KF	45.0	25.4	1.3	-	FH10-SHV-E-40KF	£209	€241
2	2	DN40KF	45.0	25.4	1.3	19.1	FH10-SHV2-E-40KF	£365	€420
2	3	DN50KF	45.0	25.4	1.3	19.1	FH10-SHV3-E-50KF	£527	€607
2	4	DN50KF	45.0	25.4	1.3	24.1	FH10-SHV4-E-50KF	£588	€677

Weldable



Fig.	No. Pins	A	B	C	D	E	Part Code	Price £	Price €
3	1	45.0	25.4	1.3	9.4	12.7	FH10-SHV-E-W	£158	€182

Accessories



Description	Part Code	Price £	Price €
Power push-on connector BeCu 1.3mm 150°C air 200°C vacuum 10/PK	FHP-BECU-1.3-CON	£41	€48
Power in-line connector BeCu 1.5mm 150°C air 400°C vacuum 10/PK	FHP-BECU-1.5L-CON	£44	€51

Connector details are included in Section 9 of this catalogue.

10,000 Volts, 5 Amps, SHV Grounded Shield Recessed Pin



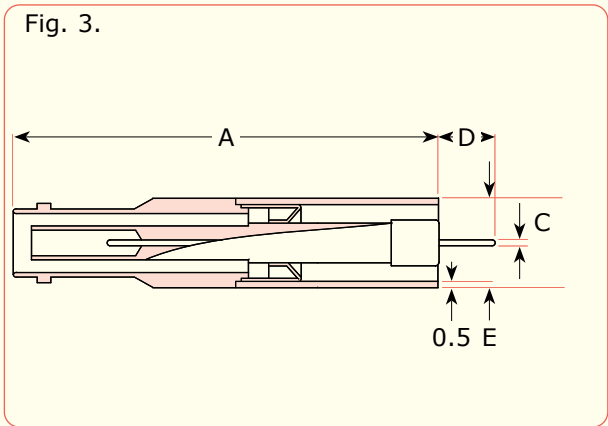
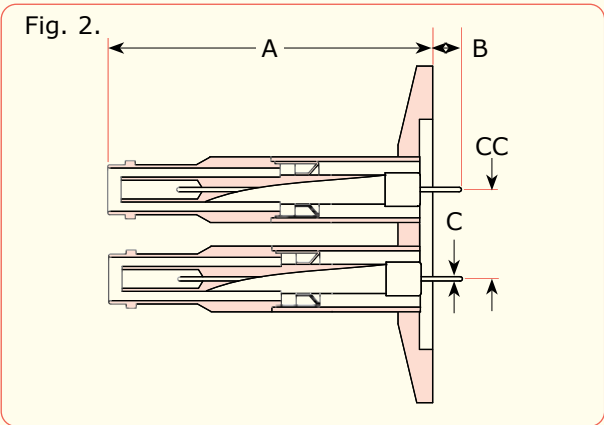
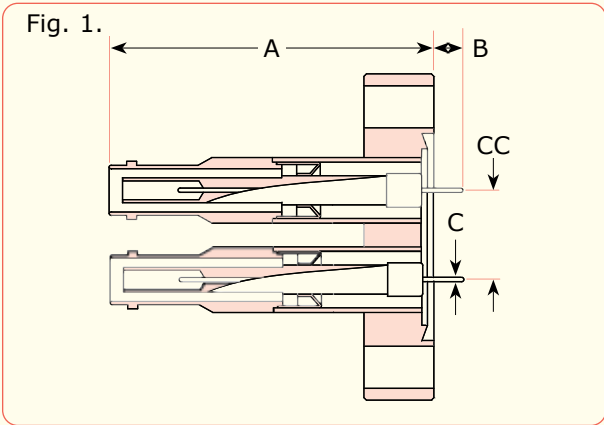
Specifications:

Voltage ¹	10,000VDC max
Current ¹	5A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	Nickel
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.

Features:

- Shielded conductor.
- Recessed air side pin for increased safety.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors available.
- Custom versions available on request.



CF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	CC	Part Code	Price £	Price €
1	1	DN16CF	62.2	8.1	1.3	-	FH10-SHV-16CF	£183	€211
1	1	DN40CF	62.2	8.1	1.3	-	FH10-SHV-40CF	£193	€222
1	2	DN40CF	62.2	8.1	1.3	19.1	FH10-SHV2-40CF	£351	€404
1	3	DN40CF	62.2	8.1	1.3	19.1	FH10-SHV3-40CF	£507	€584
1	4	DN40CF	62.2	8.1	1.3	24.1	FH10-SHV4-40CF	£659	€758

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	CC	Part Code	Price £	Price €
2	1	DN16KF	63.2	9.7	1.3	-	FH10-SHV-16KF	£183	€211
2	1	DN40KF	60.7	9.7	1.3	-	FH10-SHV-40KF	£193	€222
2	2	DN40KF	60.7	9.7	1.3	19.1	FH10-SHV2-40KF	£351	€404
2	3	DN50KF	60.7	9.7	1.3	19.1	FH10-SHV3-50KF	£507	€584
2	4	DN50KF	60.7	9.7	1.3	24.1	FH10-SHV4-50KF	£659	€758

Weldable



Fig.	No. Pins	A	C	D	E	Part Code	Price £	Price €
3	1	61.0	1.3	9.7	12.7	FH10-SHV-W	£142	€164

Accessories



Description	Part Code	Price £	Price €
Power in-line connector BeCu 1.5mm 150°C air 400°C vacuum 10/PK	FHP-BECU-1.5IL-CON	£44	€51
Power push-on connector BeCu 1.3mm 150°C air 200°C vacuum 10/PK	FHP-BECU-1.3-CON	£41	€48

Connector details are included in Section 9 of this catalogue.

20,000 Volts, 15 Amps, SHV Grounded Shield Exposed Pin



Specifications:

Voltage ¹	20,000VDC max
Current ¹	15A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	Nickel
Insulation	Alumina ceramic

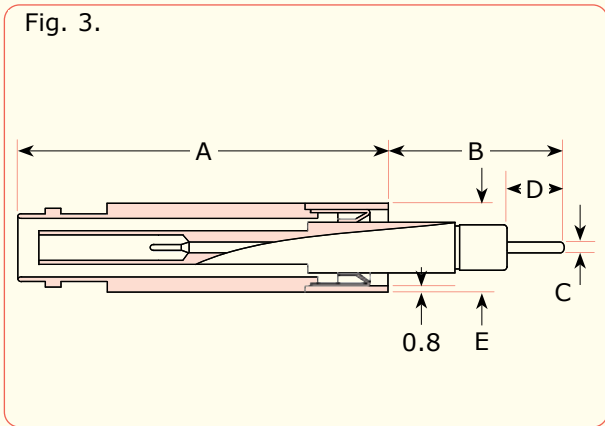
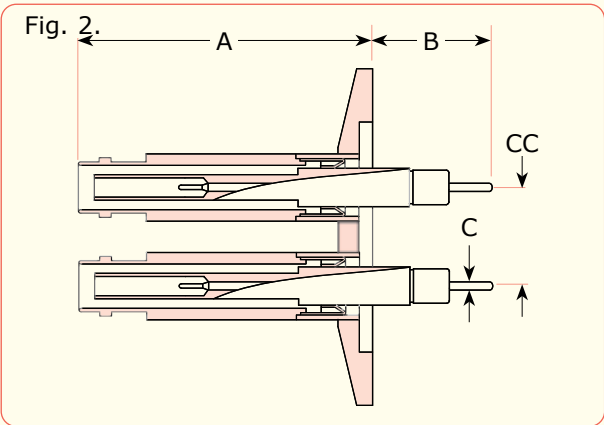
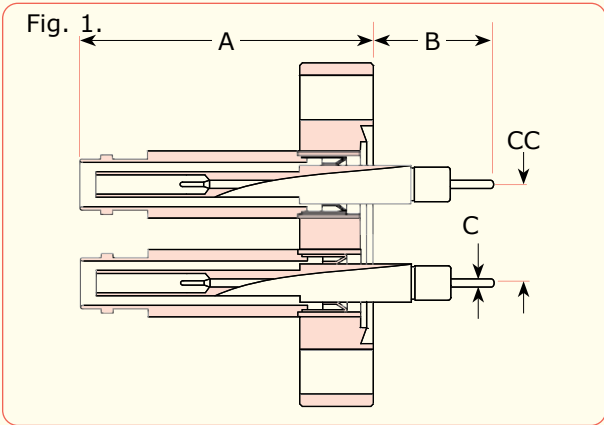
Temperature Range²

CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.

Features:

- Shielded conductor.
- Recessed air side pin for increased safety.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors available.
- Custom versions available on request.



CF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	CC	Part Code	Price £	Price €
1	1	DN16CF	71.1	33.5	2.4	-	FH20-SHV-E-16CF	£254	€293
1	1	DN40CF	71.1	33.5	2.4	-	FH20-SHV-E-40CF	£264	€304
1	2	DN40CF	71.1	33.5	2.4	24.1	FH20-SHV2-E-40CF	£513	€590

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	CC	Part Code	Price £	Price €
2	1	DN16KF	72.4	32.3	2.4	-	FH20-SHV-E-16KF	£254	€293
2	1	DN40KF	69.9	34.8	2.4	-	FH20-SHV-E-40KF	£264	€304
2	2	DN50KF	69.9	34.8	2.4	24.1	FH20-SHV2-E-40KF	£513	€590

Weldable



Fig.	No. Pins	A	B	C	D	E	Part Code	Price £	Price €
3	1	69.9	34.8	2.4	9.1	15.7	FH20-SHV-E-W	£198	€228

Accessories



Description	Part Code	Price £	Price €
Power in-line connector BeCu 3.1mm 150°C air 400°C vacuum 10/PK	FHP-BECU-3IL-CON	£44	€51

Connector details are included in Section 9 of this catalogue.

20,000 Volts, 15 Amps, SHV Grounded Shield Recessed Pin



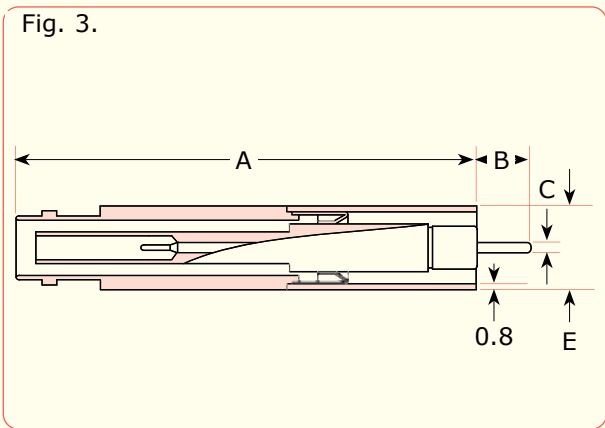
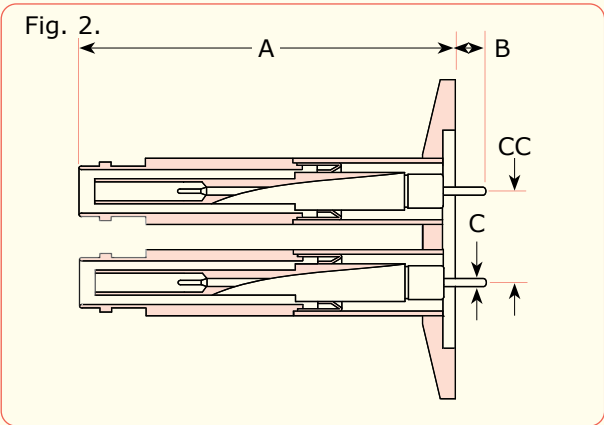
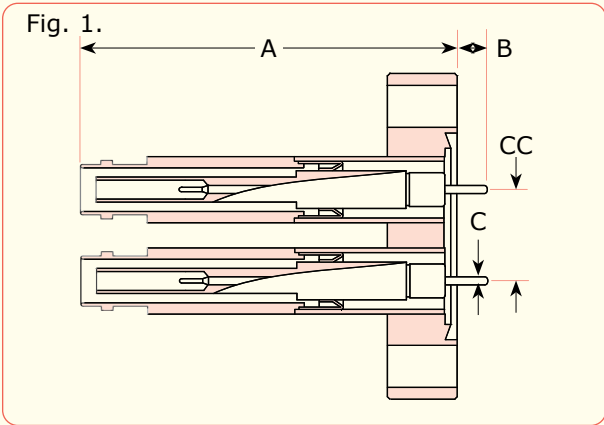
Specifications:

Voltage ¹	20,000VDC max
Current ¹	15A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	Nickel
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.

Features:

- Shielded conductor.
- Recessed air side pin for increased safety.
- Industry standard bayonet connector.
- Air side connector included.
- In-vacuum connectors available.
- Custom versions available on request.



CF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	CC	Part Code	Price £	Price €
1	1	DN16CF	96.5	8.1	2.4	-	FH20-SHV-16CF	£254	€293
1	1	DN40CF	96.5	8.1	2.4	-	FH20-SHV-40CF	£264	€304
1	2	DN40CF	96.5	8.1	2.4	24.1	FH20-SHV2-40CF	£513	€590

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	C	CC	Part Code	Price £	Price €
2	1	DN16KF	97.8	6.9	2.4	-	FH20-SHV-16KF	£254	€293
2	1	DN40KF	96.5	9.4	2.4	-	FH20-SHV-40KF	£264	€304
2	2	DN50KF	96.5	9.4	2.4	24.1	FH20-SHV2-50KF	£513	€590

Weldable



Fig.	No. Pins	A	B	C	E	Part Code	Price £	Price €
3	1	95.5	9.1	2.4	15.7	FH20-SHV-W	£191	€220

Accessories



Description	Part Code	Price £	Price €
Power in-line connector BeCu 3.1mm 150°C air 400°C vacuum 10/PK	FHP-BECU-3IL-CON	£44	€51

Connector details are included in Section 9 of this catalogue.

500 Volts, 3 Amps, Type N Single Ended



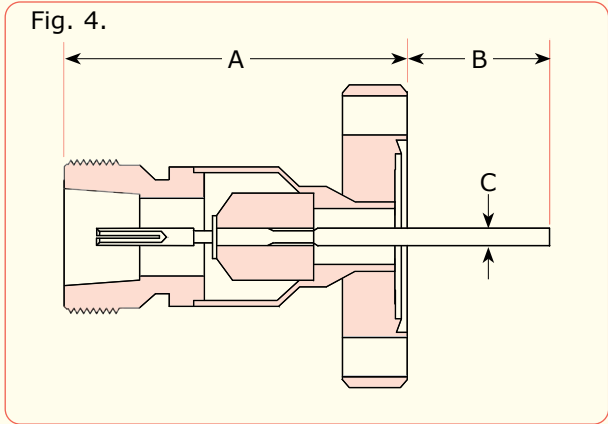
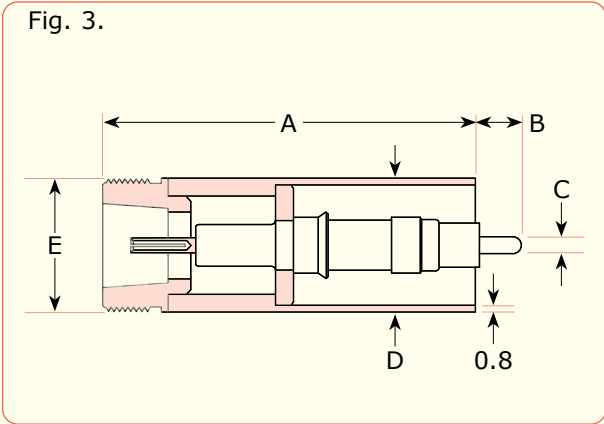
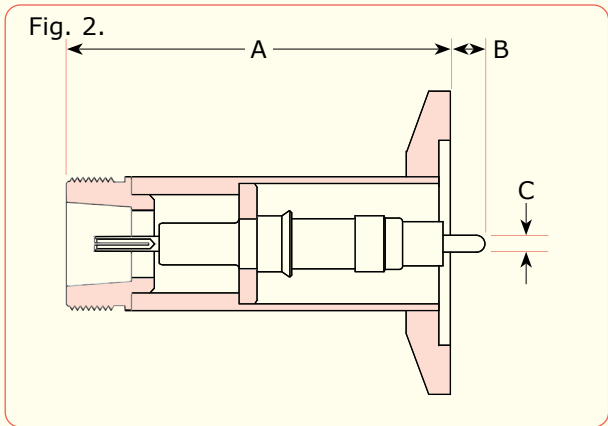
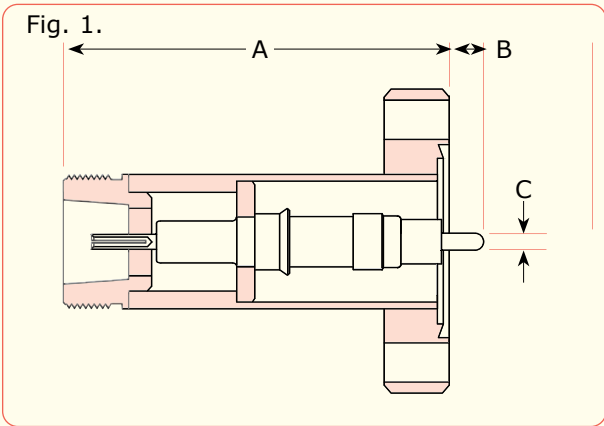
Features:

- Shielded conductor.
- High frequency transmission, up to 1GHz./ 6GHz.*
- Industry standard screw connector.
- Non-constant / 50 Ohm version.*
- Air side connector included.
- In-vacuum connectors available.
- Custom versions available on request.

Specifications:

Voltage ¹	500VDC max
Current ¹	3A max
Impedance	See Table
Material	1GHz / 6GHz*
Flange	304 St.St.
Shell	304 St.St. / Kovar*
Pin	304 St.St. / 416 St.St.*
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.
* - 1GHz for non-constant impedance, 6GHz for 50 Ohm version



CF Flange Mounted



Fig.	No. Pins	Impedance	Flange	A	B	C	Part Code	Price £	Price €
1	1	Non-constant	DN16CF	49.8	5.6	2.4	FH-N-16CF	£183	€211
1	1	Non-constant	DN40CF	49.8	5.6	2.4	FH-N-40CF	£189	€218
4	1	50 Ohm / 6GHz	DN16CF	43.4	29.2	3.0	FH-N50-16CF	£452	€520
4	1	50 Ohm / 6GHz	DN40CF	43.4	29.2	3.0	FH-N50-40CF	£462	€532

KF Flange Mounted



Fig.	No. Pins	Impedance	Flange	A	B	C	Part Code	Price £	Price €
2	1	Non-constant	DN16KF	51.1	4.3	2.4	FH-N-16KF	POA	POA
2	1	Non-constant	DN40KF	48.5	7.9	2.4	FH-N-40KF	POA	POA
5	1	50 Ohm / 6GHz	DN16KF	42.2	30.5	3.0	FH-N50-16KF	£435	€501
5	1	50 Ohm / 6GHz	DN40KF	42.2	30.5	3.0	FH-N50-40KF	£492	€566

Weldable



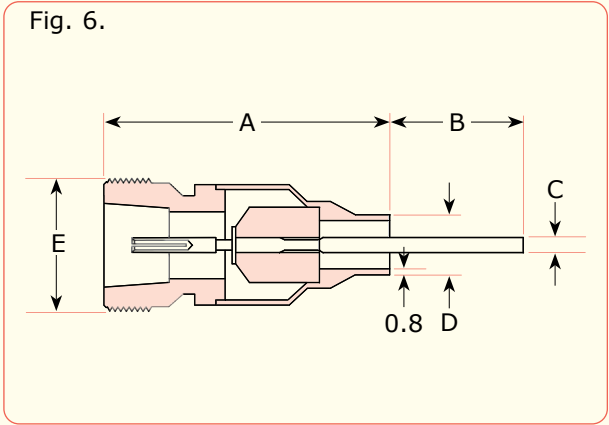
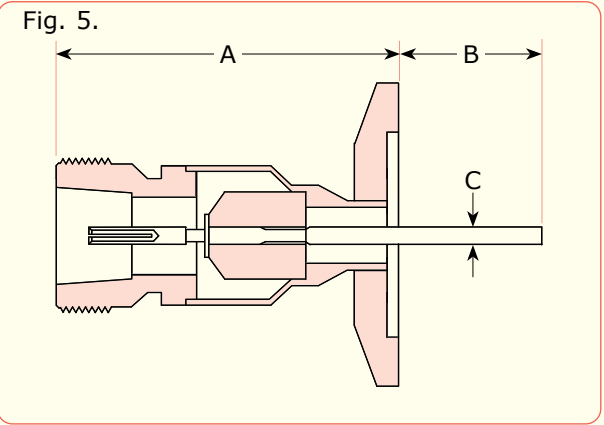
Fig.	No. Pins	Impedance	A	B	C	D	E	Part Code	Price £	Price €
3	1	Non-constant	48.5	6.9	2.4	15.8	16.0	FH-N-W	£122	€141
6	1	50 Ohm / 6GHz	42.2	30.5	3.0	8.2	16.0	FH-N50-W	£355	€409

Accessories



Description	Part Code	Price £	Price €
Power push-on connector BeCu 2.4mm 150°C air 200°C vacuum 10/PK	FHP-BECU-2.4-CON	£41	€48
Power in-line connector BeCu 3.1mm 150°C air 400°C vacuum 10/PK	FHP-BECU-3.1L-CON	£44	€51

Connector details are included in Section 9 of this catalogue.
Non-constant versions pictured.



All dimensions are nominal in millimetres unless otherwise specified

All dimensions are nominal in millimetres unless otherwise specified

500 Volts, 3 Amps, Type N Double Ended



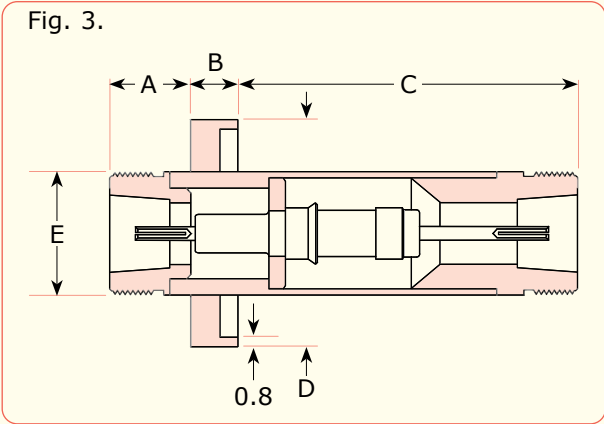
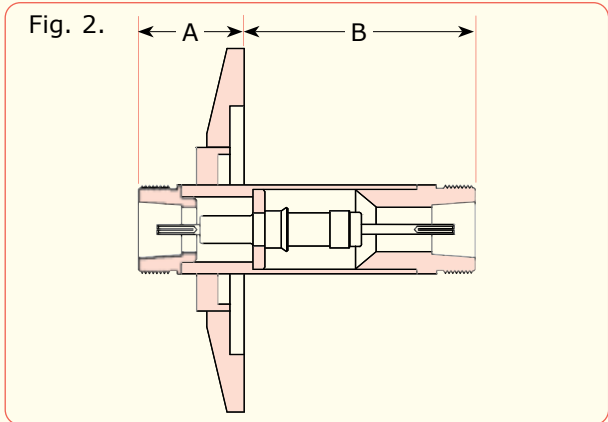
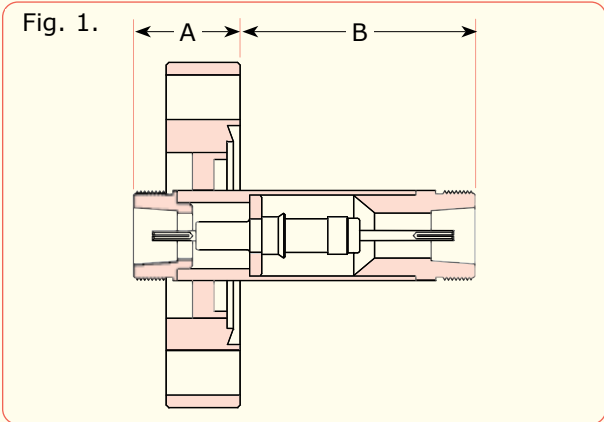
Features:

- Shielded conductor.
- High frequency transmission, up to 1GHz.
- Industry standard screw connector.
- Air side connector included.
- Custom versions available on request.

Specifications:

Voltage ¹	500VDC max
Current ¹	3A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	416 St.St.
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.



CF Flange Mounted



Fig.	No. Pins	Flange	A	B	Part Code	Price £	Price €
1	1	DN40CF	20.3	42.2	FH-N-D-40CF	£320	€368

KF Flange Mounted

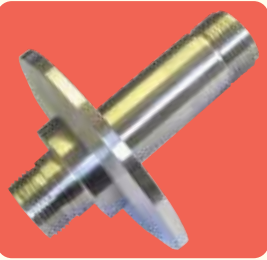


Fig.	No. Pins	Flange	A	B	Part Code	Price £	Price €
2	1	DN40KF	19.1	43.4	FH-N-D-40KF	£320	€368

Weldable



Fig.	No. Pins	A	B	C	D	E	Part Code	Price £	Price €
3	1	12.7	6.4	43.7	25.3	16.0	FH-N-D-W	£259	€298

All dimensions are nominal in millimetres unless otherwise specified

All dimensions are nominal in millimetres unless otherwise specified

500 Volts, 3 Amps, Triaxial Double Ended



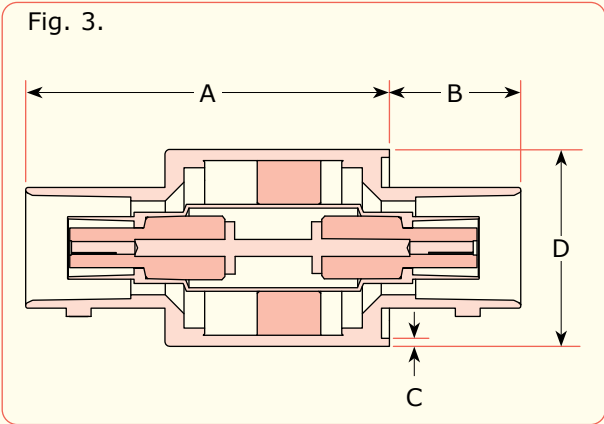
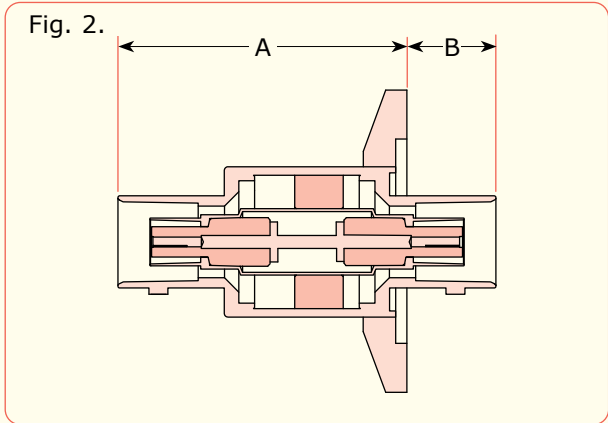
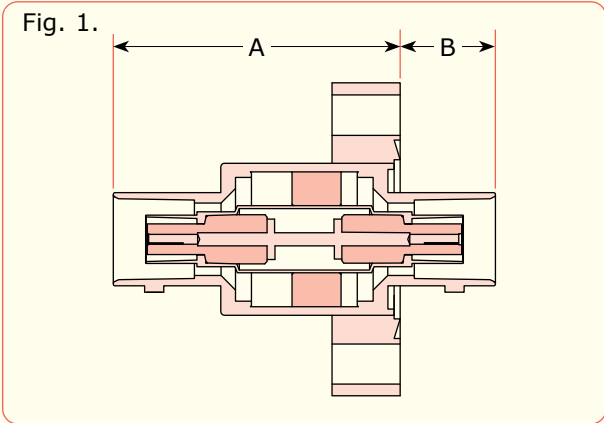
Features:

- Inner & mid shielded conductors.
- Industry standard bayonet connector.
- Air side connector included.
- Custom versions available on request.

Specifications:

Voltage ¹	500VDC max
Current ¹	3A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	Nickel
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.



CF Flange Mounted



Fig.	No. Pins	Flange	A	B	Part Code	Price £	Price €
1	1	DN16CF	30.3	9.3	FH5-TRX-16CF	£6030	€6935

KF Flange Mounted



Fig.	No. Pins	Flange	A	B	Part Code	Price £	Price €
2	1	DN16KF			FH5-TRX-16KF	POA	POA

Weldable



Fig.	No. Pins	A	B	C	D	Part Code	Price £	Price €
3	1	29.1	10.5	0.6	15.8	FH5-TRX-W	£546	€628

All dimensions are nominal in millimetres unless otherwise specified

All dimensions are nominal in millimetres unless otherwise specified

700 Volts, 1 Amp, SMA Grounded Shield Single Ended



Features:

- Shielded conductor.
- Industry standard screw connector.
- Constant 50 Ohm >6GHz version available.
- Air side connector included.
- In-vacuum connectors available.

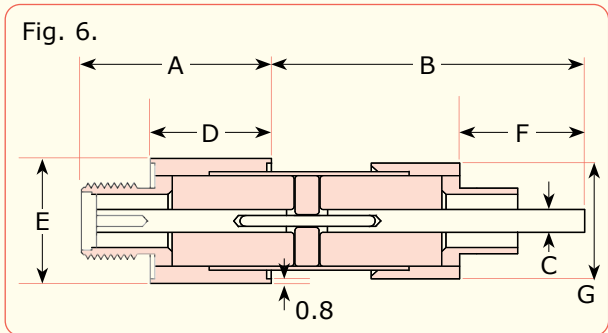
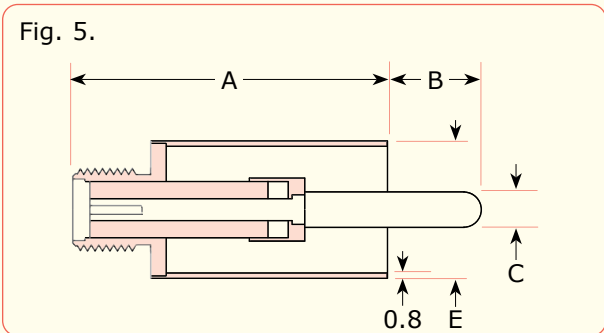
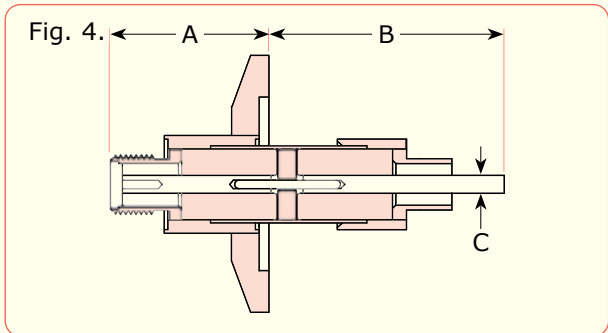
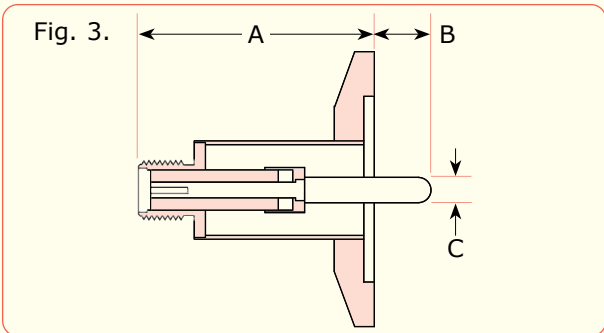
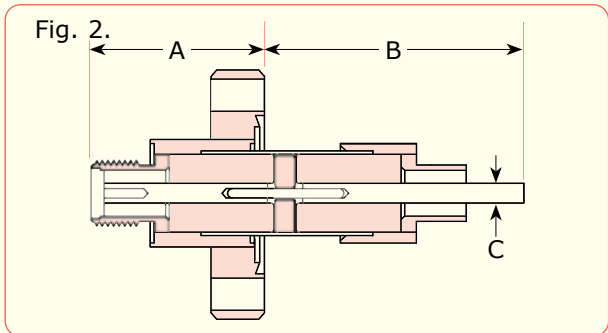
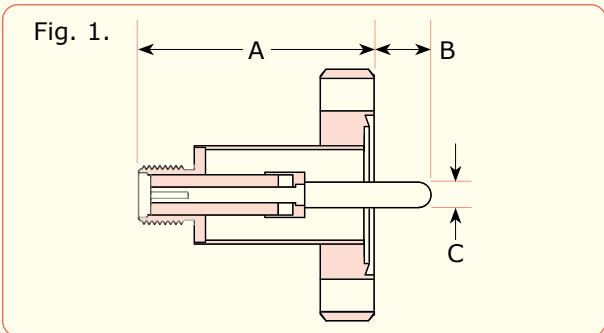
Specifications:

Voltage ¹	700VDC max
Current ¹	1A max
Impedance	See table
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	Nickel
Insulation	Alumina ceramic

Temperature Range²

CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.



All dimensions are nominal in millimetres unless otherwise specified

CF Flange Mounted



* - 4 pins on 25.4 pcd, 1 pin central.

Fig.	No. Pins	Impedance	Flange	A	B	C	PCD	Part Code	Price £	Price €
1	1	Non-Constant	DN16CF	23.1	5.1	2.4	-	FH-SMA-16CF	£183	€211
1	1	Non-Constant	DN40CF	22.9	5.1	2.4	-	FH-SMA-40CF	£193	€222
1	2	Non-Constant	DN40CF	22.9	5.1	2.4	21.6	FH-SMA-2-40CF	POA	POA
1	3	Non-Constant	DN40CF	22.9	5.1	2.4	21.6	FH-SMA-3-40CF	POA	POA
1	4	Non-Constant	DN40CF	22.9	5.1	2.4	24.1	FH-SMA-4-40CF	POA	POA
1	5	Non-Constant	DN40CF	22.9	5.1	2.4	24.1*	FH-SMA-5-40CF	POA	POA
2	1	50 Ω >6GHz	DN16CF	17.3	26.9	1.5	-	FH-SMA-16CF50	£452	€520
2	1	50 Ω >6GHz	DN40CF	17.3	26.9	1.5	-	FH-SMA-40CF50	£462	€532

KF Flange Mounted



* - 4 pins on 31.8 pcd, 1 pin central.

Fig.	No. Pins	Impedance	Flange	A	B	C	PCD	Part Code	Price £	Price €
3	1	Non-Constant	DN16KF	21.8	6.4	2.4	-	FH-SMA-16KF	£183	€211
3	1	Non-Constant	DN40KF	21.8	6.4	2.4	-	FH-SMA-40KF	POA	POA
3	2	Non-Constant	DN40KF	21.8	6.4	2.4	19.1	FH-SMA-2-40KF	POA	POA
3	3	Non-Constant	DN40KF	21.8	6.4	2.4	19.1	FH-SMA-3-40KF	POA	POA
3	4	Non-Constant	DN40KF	21.8	6.4	2.4	24.1	FH-SMA-4-40KF	POA	POA
3	4	Non-Constant	DN50KF	21.8	6.4	2.4	31.8	FH-SMA-4-50KF	POA	POA
3	5	Non-Constant	DN50KF	21.8	6.4	2.4	31.8*	FH-SMA-5-50KF	POA	POA
4	1	50 Ω >6GHz	DN16KF	18.5	25.7	1.5	-	FH-SMA-16KF50	£452	€520
4	1	50 Ω >6GHz	DN40KF	18.5	25.7	1.5	-	FH-SMA-40KF50	POA	POA

Weldable



Fig.	No. Pins	Imp	A	B	C	D	E	F	G	Part Code	Price £	Price €
5	1	N/C	21.8	6.6	2.4	-	9.5	-	-	FH-SMA-W	£82	€95
6	1	50 Ω >6GHz	16.0	28.2	1.5	10.9	12.6	11.2	10.2	FH-SMA-W50	£351	€404

Accessories



Description	Part Code	Price £	Price €
Power push-on connector BeCu 2.4mm 150°C air 200°C vacuum 10/PK	FHP-BECU-2.4-CON	£41	€48
Power push-on connector BeCu 1.5mm 150°C air 200°C vacuum 10/PK	FHP-BECU-1.5-CON	£39	€45
Power in-line connector BeCu 3.1mm 150°C air 400°C vacuum 10/PK	FHP-BECU-3IL-CON	£44	€51
Power in-line connector BeCu 1.5mm 150°C air 400°C vacuum 10/PK	FHP-BECU-1.5IL-CON	£44	€51

Connector details are included in Section 9 of this catalogue.

All dimensions are nominal in millimetres unless otherwise specified

700 Volts, 1 Amp, SMA Grounded Shield Double Ended



Features:

- Shielded conductor.
- Industry standard screw connector.
- Constant 50 Ohm impedance.
- Up to 6GHz operation.
- Air side connector included.
- In-vacuum connectors & cables available.
- Custom versions available on request.

Specifications:

Voltage ¹	700VDC max
Current ¹	1A max
Impedance	50Ω
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	Nickel
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.

Fig. 1.

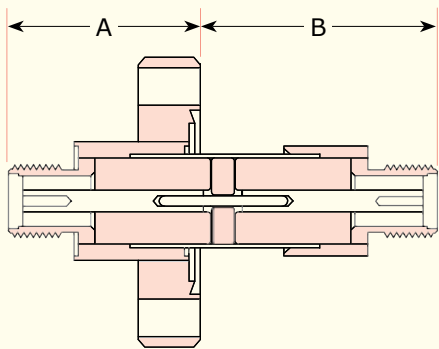


Fig. 2.

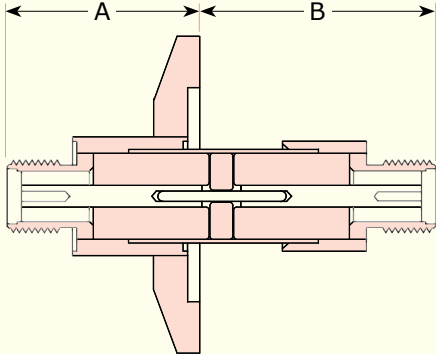
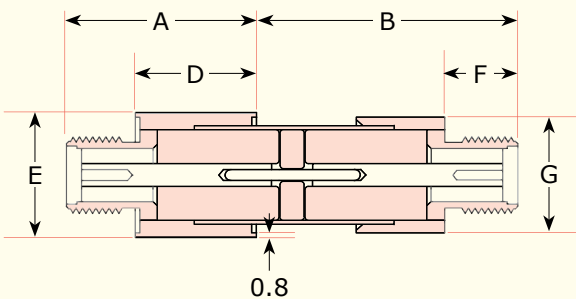


Fig. 3.



All dimensions are nominal in millimetres unless otherwise specified

CF Flange Mounted



Fig.	No. Pins	Impedance	Flange	A	B	Part Code	Price £	Price €
1	1	50 Ω	DN16CF	17.3	21.8	FH-SMA-D-16CF	£452	€520
1	1	50 Ω	DN40CF	17.3	21.8	FH-SMA-D-40CF	£462	€532
1	2	50 Ω	DN40CF	17.3	21.8	FH-SMA-D-2-40CF	£811	€933
1	3	50 Ω	DN40CF	17.3	21.8	FH-SMA-D-3-40CF	POA	POA
1	4	50 Ω	DN40CF	17.3	21.8	FH-SMA-D-4-40CF	£1571	€1807

KF Flange Mounted



Fig.	No. Pins	Impedance	Flange	A	B	Part Code	Price £	Price €
2	1	50 Ω	DN16KF	18.5	20.8	FH-SMA-D-16KF	£452	€520
2	1	50 Ω	DN40KF	18.5	20.8	FH-SMA-D-40KF	POA	POA
2	2	50 Ω	DN40KF	18.5	20.8	FH-SMA-D-2-40KF	POA	POA
2	4	50 Ω	DN40KF	18.5	20.8	FH-SMA-D-4-40KF	POA	POA
2	2	50 Ω	DN50KF	18.5	20.8	FH-SMA-D-2-50KF	POA	POA
2	4	50 Ω	DN50KF	18.5	20.8	FH-SMA-D-4-50KF	POA	POA

Weldable



Fig.	No. Pins	Imp	A	B	D	E	F	G	Part Code	Price £	Price €
3	1	50 Ω	16.0	23.1	10.7	12.6	6.4	10.2	FH-SMA-D-W	£351	€404

Accessories

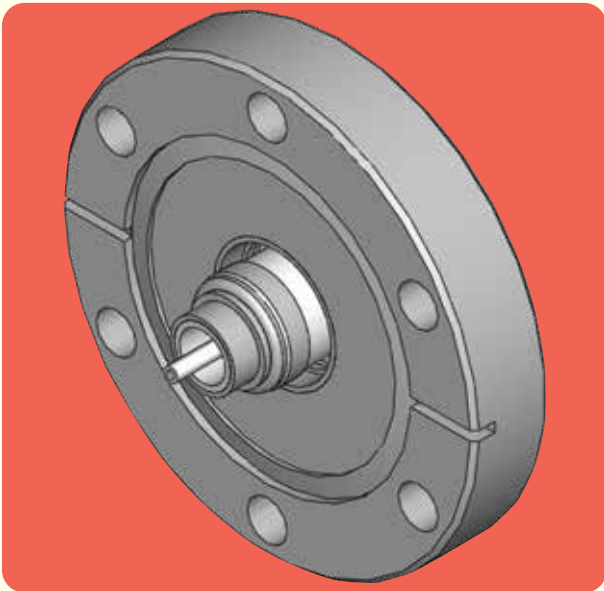


Description	Part Code	Price £	Price €
50 OHM Kapton® coax UHV cable SMA - N/C L=500mm	CC-50-SMA-500	£91	€105
50 OHM Kapton® coax UHV cable SMA - N/C L=1000mm	CC-50-SMA-1000	£101	€117
User end female	Add -UEF	£163	€188
SMA male	Add -SMA	£87	€101
SMA female	Add -SMAF	£87	€101

Connector details are included in Section 9 of this catalogue.

All dimensions are nominal in millimetres unless otherwise specified

700 Volts, 1 Amp, SMA Floating Shield Single Ended



Features:

- Shielded conductor.
- Industry standard screw connector.
- Air side connector included.
- In-vacuum connectors & cables available.
- Custom versions available on request.

Specifications:

Voltage¹ 700VDC max
Shield to flange rated @ 2,500V

Current¹ 1A max

Impedance Non constant

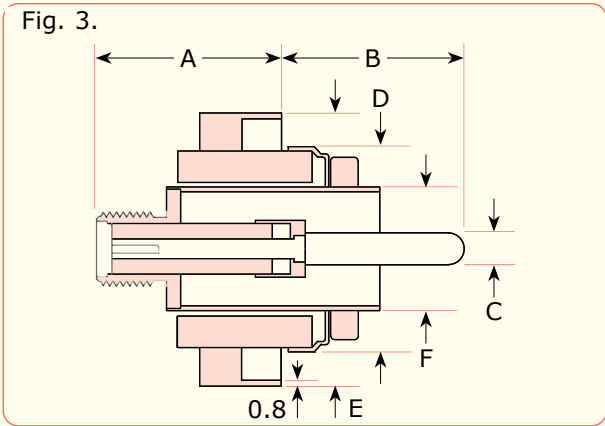
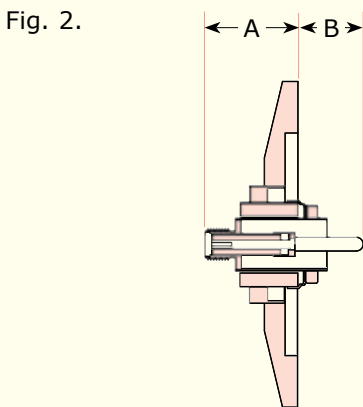
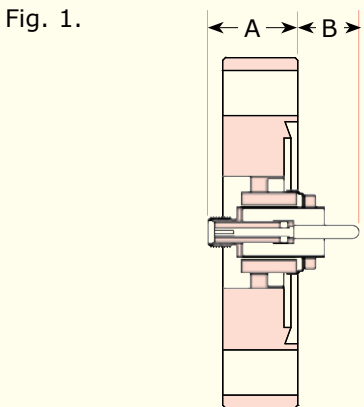
Material

Flange 304 St.St.
Shell 304 St.St.
Pin Nickel
Insulation Alumina ceramic

Temperature Range²

CF flanged feedthrough -200°C to 450°C
KF flanged feedthrough -20°C to 150°C
Weldable feedthrough -200°C to 450°C
Air side connector -65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.



CF Flange Mounted



Fig.	No. Pins	Impedance	Flange	A	B	Part Code	Price £	Price €
1	1	Non-constant	DN40CF	18.3	17.8	FH-SMA-FS-40CF	£355	€409

KF Flange Mounted



Fig.	No. Pins	Impedance	Flange	A	B	Part Code	Price £	Price €
2	1	Non-constant	DN40KF	17.0	19.1	FH-SMA-FS-40KF	£355	€409

Weldable



Fig.	No. Pins	Imp	A	B	C	D	E	F	Part Code	Price £	Price €
3	1	N/C	17.0	19.1	2.4	15.7	20.6	10.9	FH-SMA-FS-W	£254	€293

Accessories



Description	Part Code	Price £	Price €
Power push-on connector BeCu 2.4mm 150°C air 200°C vacuum 10/PK	FHP-BECU-2.4-CON	£41	€48
Power in-line connector BeCu 3.1mm 150°C air 400°C vacuum 10/PK	FHP-BECU-3IL-CON	£44	€51

Connector details are included in Section 9 of this catalogue.

Double ended 50Ω version of this feedthrough is also available, please contact sales office for details

500 Volts, 2 Amps, Microdot®



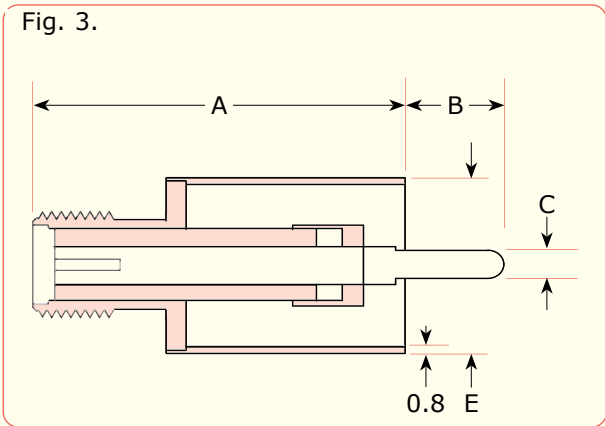
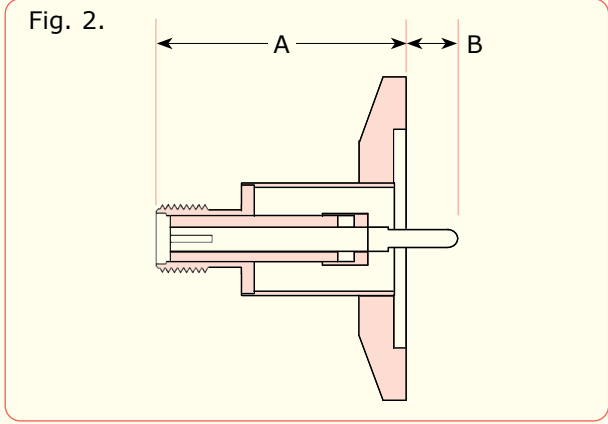
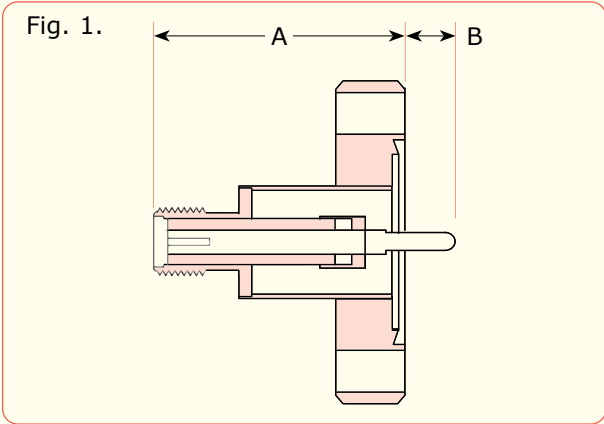
Features:

- Shielded conductor.
- Industry standard S-50 microdot® connector.
- Air side connector included.
- In-vacuum connectors available.
- Custom versions available on request.

Specifications:

Voltage ¹	500VDC max
Current ¹	2A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	Molybdenum
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.



CF Flange Mounted

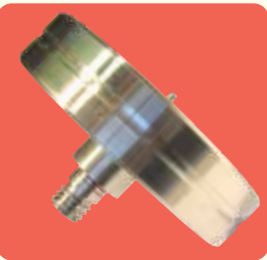


Fig.	No. Pins	Flange	A	B	Part Code	Price £	Price €
1	1	DN16CF	17.3	2.5	FH-MIC-16CF	£227	€262

KF Flange Mounted

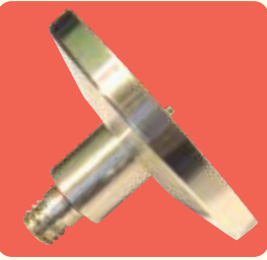


Fig.	No. Pins	Flange	A	B	Part Code	Price £	Price €
1	1	DN16KF	16.0	3.8	FH-MIC-16KF	POA	POA

Weldable



Fig.	No. Pins	A	B	C	E	Part Code	Price £	Price €
3	1	16.0	3.8	1.0	7.8	FH-MIC-W	£202	€233

Accessories



Description	Part Code	Price £	Price €
Power push-on connector BeCu 1.0mm 150°C air 200°C vacuum 10/PK	FHP-BECU-1-CON	£41	€48
Power in-line connector BeCu 1.5mm 150°C air 400°C vacuum 10/PK	FHP-BECU-1.5IL-CON	£44	€51

Connector details are included in Section 9 of this catalogue.

All dimensions are nominal in millimetres unless otherwise specified

All dimensions are nominal in millimetres unless otherwise specified

BNC to Microdot®, 500 Volts, 1 Amp



Features:

- Shielded conductor.
- Industry standard S-50 microdot® / bayonet connector.
- Air side connector included.
- In-vacuum connectors & cables available.
- Custom versions available on request.

Specifications:

Voltage ¹	500VDC max
Current ¹	1A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	304 St.St.
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.

Fig. 1.

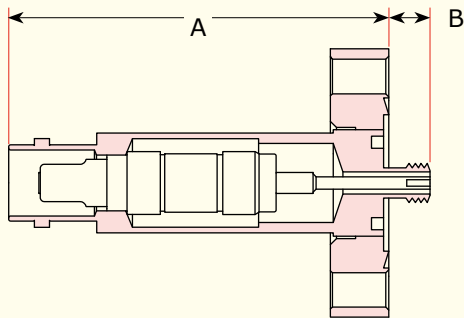


Fig. 2.

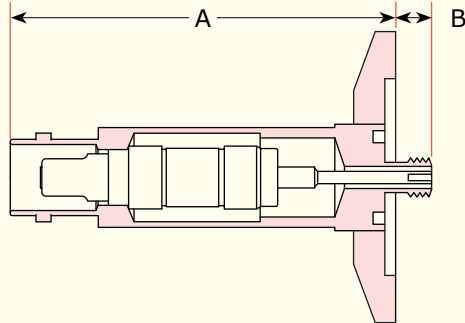
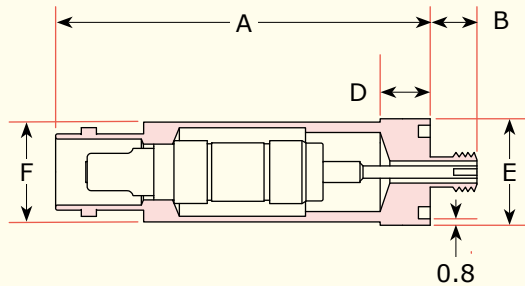


Fig. 3.



All dimensions are nominal in millimetres unless otherwise specified

BNC To Microdot - CF Flange



Fig.	No. Pins	A	B	Part Code	Price £	Price €
1	1	47.8	5.1	FH-BNC-MIC-16CF	£290	€321
1	1	47.2	4.8	FH-BNC-MIC-40CF	£300	€332

Connector details are included in Section 9 of this catalogue.

In-Vacuum cables for microdot feedthroughs are available, please see section 7 of this catalogue.

BNC To Microdot - KF Flange



Fig.	No. Pins	A	B	Part Code	Price £	Price €
2	1	49.8	3.3	FH-BNC-MIC-25KF	POA	POA
2	1	49.8	3.3	FH-BNC-MIC-40KF	POA	POA

BNC To Microdot - Weldable



Fig.	No. Pins	A	B	D	E	F	Part Code	Price £	Price €
3	1	47.2	5.8	6.4	13.4	12.6	FH-BNC-MIC-W	£218	€251

All dimensions are nominal in millimetres unless otherwise specified

Type N to SMA, 500 Volts, 1 Amp



Specifications:

Voltage ¹	500VDC max
Current ¹	1A max
Impedance	Non constant
Material	
Flange	304 St.St.
Shell	304 St.St.
Pin	Nickel
Insulation	Alumina ceramic
Temperature Range ²	
CF flanged feedthrough	-200°C to 450°C
KF flanged feedthrough	-20°C to 150°C
Weldable feedthrough	-200°C to 450°C
Air side connector	-65°C to 165°C

¹ - Please see section introduction for safety information.
² - Assembly rating is reduced to that of the lowest rated component.

Features:

- Shielded conductor.
- Industry standard screw connectors.
- Air side connector included.
- In-vacuum connectors & cables available.
- Custom versions available on request.

Fig. 1.

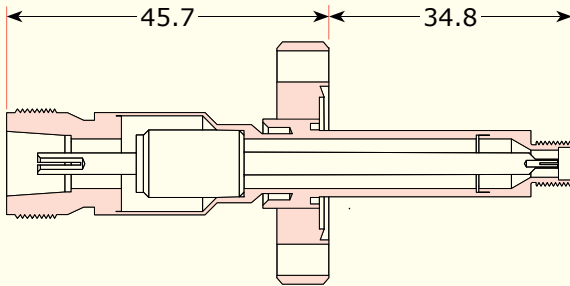


Fig. 2.

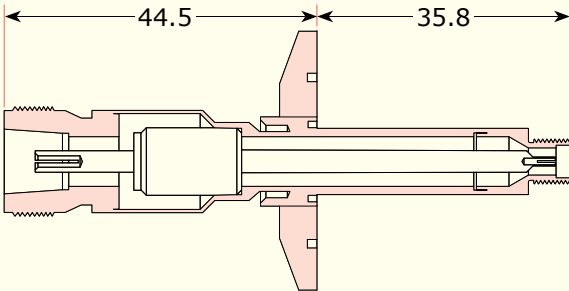
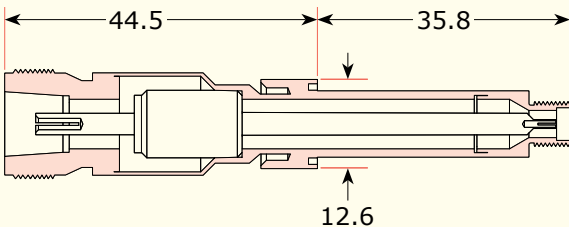


Fig. 3.



All dimensions are nominal in millimetres unless otherwise specified

Type N To SMA - CF Flange



Description	Part Code	Price £	Price €
Coax F/T N to SMA 500V 1A DN16CF (asc)	FH-N-SMA-16CF	£462	€532
Coax F/T N to SMA 500V 1A DN40CF (asc)	FH-N-SMA-40CF	£472	€543
Coax F/T N to SMA 500V 1A 2 pin DN40CF (asc)	FH-N-SMA-2-40CF	£862	€992

Type N To SMA - KF Flange



Description	Part Code	Price £	Price €
Coax F/T N to SMA 500V 1A DN40KF (asc)	FH-N-SMA-40KF	£462	€532
Coax F/T N to SMA 500V 1A DN50KF (asc)	FH-N-SMA-50KF	£462	€532
Coax F/T N to SMA 500V 1A 2 pin DN50KF (asc)	FH-N-SMA-2-50KF	£862	€992

Type N To SMA - Weldable



Description	Part Code	Price £	Price €
Coax F/T N to SMA 500V 1A WELD (asc)	FH-N-SMA-W	£360	€414

All dimensions are nominal in millimetres unless otherwise specified

