

## DIN Inserts

### Product Facts

- Meets requirements of DIN 41626 and CECC 22330
- Suitable for DIN 41612 Type M Connectors (Eurocard), Siedecon, and Z-PACK 2mm HM Connectors
- Meets DIN Performance Level II
- Crimp termination for inner and outer conductors (cable mount only) eliminates the need for solder
- Right-angle and vertical style board mount pin and socket contacts
- Board mount product available with both solder and compliant tails
- Straight cable mount pin and socket contacts for RG 316, and RG 179 cable
- Contact impedance of 50 and 75 ohms for cable mount and 50 ohms for board mount



*Coaxial inserts* according to CECC 22 330 and high-current inserts (CECC specification under preparation) can be used in conjunction with a DIN 41612 style M contact base (CECC 75 101-801), SIEDECON, and Z-PACK 2mm HM connectors.

*Coaxial inserts* have a contact system based on the pin-socket principle with the same dimensions as the Series 1.0/2.3 coaxial connectors and are plug-compatible. The product family is represented by various 50Ω and 75Ω styles that can be used far into the GHz range. The high mounting

density (pitch between adjacent contacts starting at 7.5 mm) and installation into the contact base, by means of a “snap-in” lock, make the inserts particularly well suited for applications.

Due to the centering,

- coaxial plugs are installed in contact bases with audio-frequency (AF) female contacts
- coaxial jacks are installed in contact bases with AF male contacts.

The high-quality materials used with coaxial inserts ensure a high grade of service even in an industrial atmosphere.

### Technical Data

**Electrical and mechanical characteristics of coaxial inserts in accordance with DIN 41626 Part 2 and CECC 22 330**

**Characteristic Impedance** — 50/75 Ω

**Frequency Range** — up to 2 GHz

**Reflection Factor Up To 2 GHz** <sup>1</sup> — ≤ 0.10

**Insulation Resistance** — Initial value — ≥ 1 GΩ  
After stressing — ≥ 200 MΩ

**Screening Effectiveness** — ≥ 70 dB

**Inner Conductor Contact Resistance After Stressing** — ≤ 10 mΩ

**Outer Conductor Continuity After Stressing** — ≤ 7.5 mΩ

**Voltage Proof** <sup>2</sup> —

**Flexible Cables (RG 316)**

At sea level — 750 V, 50 Hz

At 20 km altitude — 150 V, 50 Hz

**Working Voltage** <sup>2</sup> —

**Flexible Cables (RG 316)**

At sea level — 350 V, 50 Hz

At 20 km altitude — 65 V, 50 Hz

**Service Life** — 500 cycles

**Climatic Category** — 55/125/56

### Notes

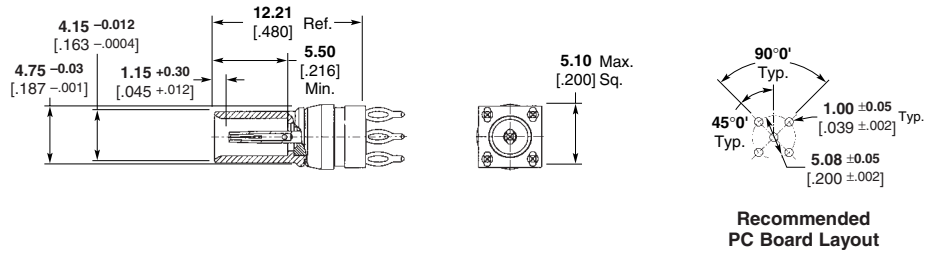
1 Guideline dimensions, depending on cable type and connector style.

2 Some cable types suitable for use with these connectors have lower characteristic values than specified here.

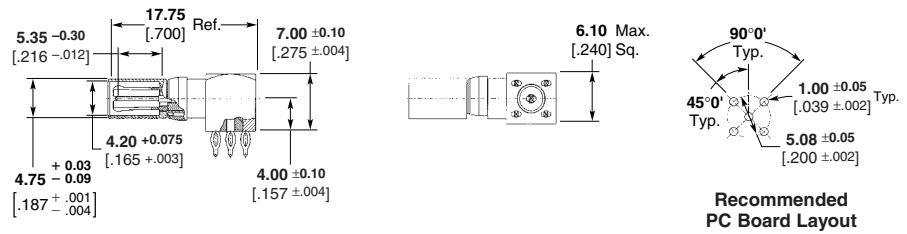
**DIN Inserts** (Continued)

**Coaxial Inserts,  
50 Ohm  
Z-PACK 2mm  
HM Connectors**

**Vertical PC Board Mount, Compliant**



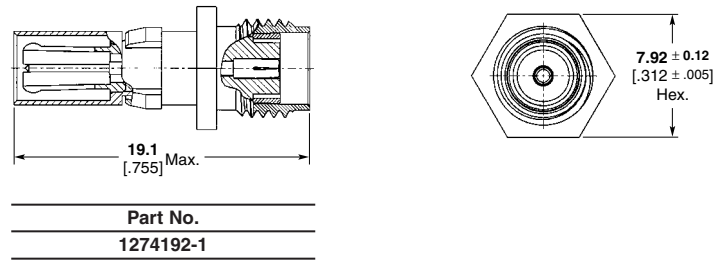
**Right-Angle PC Board Mount, Compliant**



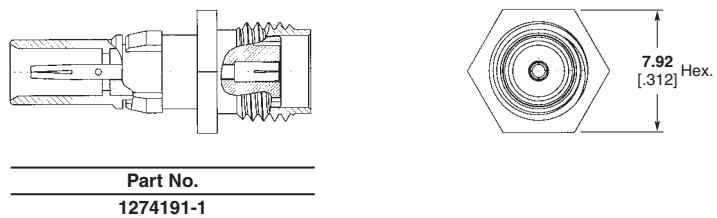
Type	Housing Type	Application Tooling	Part No.
Vertical PCB Socket, Compliant	Z-PACK 2mm HM Male	904800-1	5148385-1
Rt. Angle PCB Pin, Compliant	Z-PACK 2mm HM Female	904805-1 904804-1 Support Anvil	5148386-1

**Coaxial Inserts to  
SMA Adapters**

**Coaxial Insert Plug to SMA Jack**



**Coaxial Insert Socket to SMA Jack**

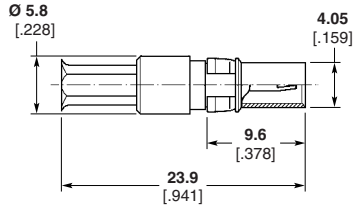


**Note:** Part Numbers are RoHS compliant except: ♦ Indicates non-RoHS compliant.

**DIN Inserts** (Continued)

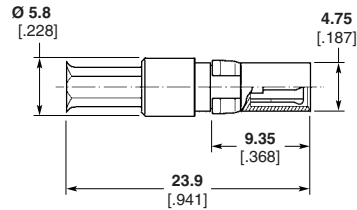
**Coaxial Inserts (50 Ω/75 Ω)**

**Bulkhead Cable Jack for male connectors**



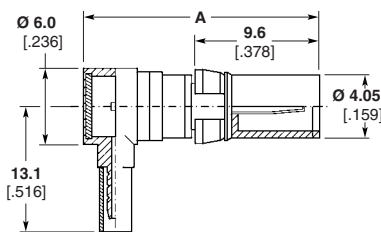
Ø Max.	Cable Type	Width Across Flats of Hex Profile	Part No.
2.6 .102	RG 316 (50 Ω)	3.2 .126	1392020-1
2.67 .105	RG 179 (75 Ω)	3.2 .126	3-1393668-4

**Bulkhead Cable Jack for female connectors**



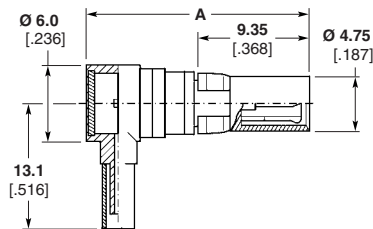
Ø Max.	Cable Type	Width Across Flats of Hex Profile	Part No.
2.6 .102	RG 316 (50 Ω)	3.2 .126	1392019-1
2.67 .105	RG 179 (75 Ω)	3.2 .126	3-1393668-0

**Right-Angle Bulkhead Jack for male connectors**



Dim A	Ø Max.	Cable Type	Width Across Flats of Hex Profile	Part No.
19 .748	2.6 .102	RG 316 (50 Ω)	3.2 .126	1-1393668-2
	2.67 .105	RG 179 (75 Ω)		
22.4 .882	2.67 .105	RG 179 (75 Ω)	3.2 .126	2-1393668-8
	2.67 .105	RG 179 (75 Ω)		
24.0 .945	2.67 .105	RG 179 (75 Ω)	3.2 .126	3-1393668-6

**Right-Angle Bulkhead Plug for female connectors**



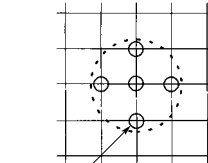
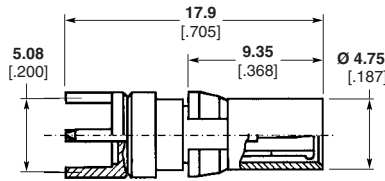
Dim A	Ø Max.	Cable Type	Width Across Flats of Hex Profile	Part No.
18.7 .736	2.6 .102	RG 316 (50 Ω)	3.2 .126	1393668-4
	2.6 .102	RG 316 (50 Ω)		
18.7 .736	3.0 .118	RD 316 (50 Ω)	3.6 .142	1393668-7
	2.67 .105	RG 179 (75 Ω)		
18.7 .736	2.67 .105	RG 179 (75 Ω)	3.2 .126	2-1393668-4

**Note:** Part Numbers are RoHS compliant except: ♦ Indicates non-RoHS compliant.

**DIN Inserts** (Continued)

**Coaxial Inserts (50 Ω/75 Ω)** (Continued)

**Bulkhead Plug, PC Board connection for DIN 41612 M female connectors**

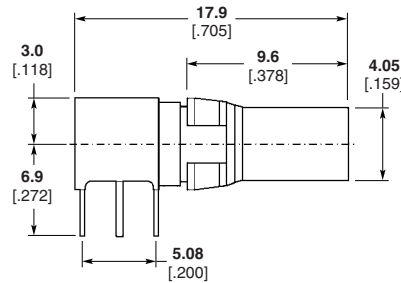


Ø 1.0  
[.039]  
**Recommended Mounting Hole**

Pitch 2.54  
[0.10]

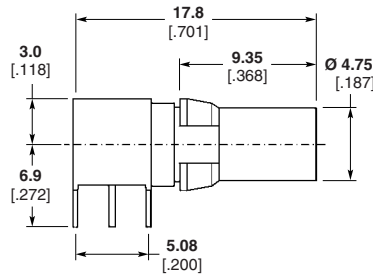
Part No.  
1-1393662-0

**Right-Angle Bulkhead Jack, PC Board for DIN 41612 M male connectors**

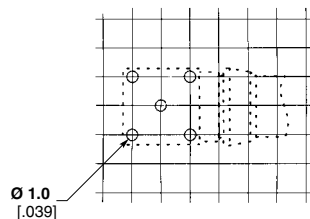


Part No.  
1-1393662-4

**Right-Angle Bulkhead Plug, PC Board for SIEDECON female connectors**



Part No.  
1-1393662-2



Pitch 2.54  
[0.10]

**Recommended Mounting holes for Part No. 1-1393662-2 and 1-1393662-4**

**Note:** Part Numbers are RoHS compliant except: ♦ Indicates non-RoHS compliant.