## FITDM



#### 7-16 DIN Male for 1/4 in FSJ1-50A cable

#### **OBSOLETE**

This product was discontinued on: December 31, 2010

Replaced By:

F1TDM-C 7-16 DIN Male for 1/4 in FSJ1-50A cable

F1TDM-HC 7-16 DIN Male for 1/4 in FSJ1-50A cable

#### **Product Classification**

**Product Type**Wireless and radiating connector

Product Brand HELIAX®

General Specifications

Body Style Straight

Cable Family FSJ1-50A

 Inner Contact Attachment Method
 Solder

 Inner Contact Plating
 Silver

Interface 7-16 DIN Male

Mounting Angle Straight

Outer Contact Attachment Method Self-clamping

Outer Contact Plating Trimetal

**Pressurizable** No

**Dimensions** 

 Height
 35.81 mm | 1.41 in

 Width
 35.81 mm | 1.41 in

 Length
 46.23 mm | 1.82 in

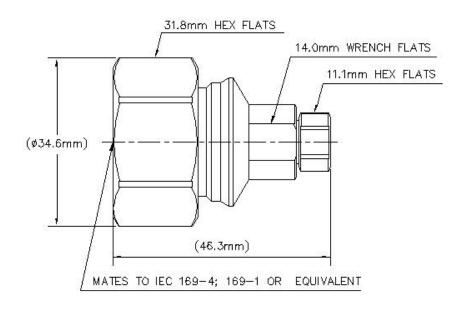
 Diameter
 35.81 mm | 1.41 in

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Nominal Size

### Outline Drawing



1/4 in

## Electrical Specifications

**3rd Order IMD at Frequency** -112 dBm @ 910 MHz

**3rd Order IMD Test Method** Two +43 dBm carriers

Average Power at Frequency 0.4 kW @ 900 MHz

Cable Impedance50 ohm

**Connector Impedance** 50 ohm

dc Test Voltage 1600 V

**Inner Contact Resistance, maximum** 0.4 mOhm

**Insulation Resistance, minimum** 10000 MOhm

**Operating Frequency Band** 0 - 6000 MHz

Outer Contact Resistance, maximum 1.5 m0hm

Peak Power, maximum 6.4 kW

**RF Operating Voltage, maximum (vrms)** 565 V

**Shielding Effectiveness** -110 dB

VSWR/Return Loss



# **FITDM**

Frequency Band VSWR Return Loss (dB)

**824–2700 MHz** 1.036 35.05

Mechanical Specifications

**Connector Retention Tensile Force** 449.27 N | 101 lbf

Coupling Nut Proof Torque 25 N-m | 221.269 in lb

**Coupling Nut Proof Torque Method** IEC 61169-16:9.3.11

**Coupling Nut Retention Force** 1000 N | 224.81 lbf

**Coupling Nut Retention Force Method** IEC 61169-4:15.2.6

**Insertion Force** 889.64 N | 200 lbf

**Insertion Force Method** IEC 61169-16:9.3.5

Interface Durability 500 cycles

Interface Durability Method IEC 61169-4:17

Mechanical Shock Test Method IEC 60068-2-27

### **Environmental Specifications**

**Operating Temperature** -55 °C to +85 °C (-67 °F to +185 °F)

**Storage Temperature**  $-65 \,^{\circ}\text{C}$  to  $+125 \,^{\circ}\text{C}$  (-85  $^{\circ}\text{F}$  to  $+257 \,^{\circ}\text{F}$ )

**Attenuation, Ambient Temperature** 20 °C | 68 °F

Average Power, Ambient Temperature 40 °C | 104 °F

**Average Power, Inner Conductor Temperature** 100 °C | 212 °F

Corrosion Test Method IEC 60068-2-11

Moisture Resistance Test Method IEC 60068-2-3

Thermal Shock Test Method IEC 60068-2-14

Vibration Test Method IEC 60068-2-6

Packaging and Weights

**Weight, net** 174 g | 0.384 lb

