Product Specifications



158F7DM

7-16 DIN Male EZfit® for 1-5/8 in FXL-1873 and AVA7-50 cable



CHARACTERISTICS

General Specifications

Interface 7-16 DIN Male
Body Style Straight
Brand EZfit®
Mounting Angle Straight

Electrical Specifications

Connector Impedance 50 ohm

Operating Frequency Band 0 - 2700 MHz

Cable Impedance 50 ohm

3rd Order IMD -116 dBm @ 1800 MHz 3rd Order IMD Test Method Two +43 dBm carriers

RF Operating Voltage, maximum (vrms) 1415.00 V
dc Test Voltage 4000 V
Outer Contact Resistance, maximum 0.80 mOhm
Inner Contact Resistance, maximum 1.50 mOhm
Insulation Resistance, minimum 5000 MOhm

Average Power 3.0 kW @ 900 MHz

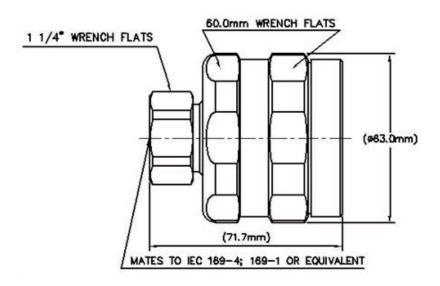
Peak Power, maximum 40.00 kW Insertion Loss, typical 0.05 dB Shielding Effectiveness -130 dB

Product Specifications



ANDREW® A CommScope Company

Outline Drawing



Mechanical Specifications

Outer Contact Attachment Method Clamp Inner Contact Attachment Method Captivated Trimetal Outer Contact Plating Inner Contact Plating Silver Attachment Durability 25 cycles Interface Durability 500 cycles Interface Durability Method IEC 61169-4:9.5 2224 N | 500 lbf Connector Retention Tensile Force

Connector Retention Torque 13.56 N-m | 120.00 in lb Insertion Force 200.17 N | 45.00 lbf Insertion Force Method IEC 61169-1:15.2.4

Pressurizable No.

Coupling Nut Proof Torque 24.86 N-m | 220.00 in lb Coupling Nut Retention Force 1000.85 N | 225.00 lbf Coupling Nut Retention Force Method MIL-C-39012C-3.25, 4.6.22

Dimensions

Nominal Size 1-5/8 in

 Diameter
 63.10 mm | 2.48 in

 Length
 71.72 mm | 2.82 in

 Weight
 563.60 g | 1.24 lb

www.commscope.com/andrew

Product Specifications



1.58F7DM

Environmental Specifications

Operating Temperature $-40 \, ^{\circ}\text{C} \text{ to } +85 \, ^{\circ}\text{C} \, (-40 \, ^{\circ}\text{F to } +185 \, ^{\circ}\text{F})$ Storage Temperature $-55 \, ^{\circ}\text{C} \, \text{to } +85 \, ^{\circ}\text{C} \, (-67 \, ^{\circ}\text{F to } +185 \, ^{\circ}\text{F})$

Immersion Depth1 mImmersion Test MatingMated

Immersion Test Method IEC 60529:2001, IP68

Water Jetting Test Mating Mated

Water Jetting Test Method IEC 60529:2001, IP66

Moisture Resistance Test Method MIL-STD-202F, Method 106F

Mechanical Shock Test Method MIL-STD-202F, Method 213B, Test Condition C

Vibration Test Method IEC 60068-2-6

Corrosion Test Method MIL-STD-1344A, Method 1001.1, Test Condition A

Standard Conditions

Attenuation, Ambient Temperature 20 °C | 68 °F Average Power, Ambient Temperature 40 °C | 104 °F

Return Loss/VSWR

Frequency Band	VSWR	Return Loss (dB)
45-400 MHz	1.02	41.70
401-805 MHz	1.03	37.00
806-960 MHz	1.04	34.60
961-1709 MHz	1.04	33.50
1710-2170 MHz	1.05	33.10
2170-2399 MHz	1.05	33.10
2400-2700 MHz	1.05	31.90

Regulatory Compliance/Certifications

Agency

RoHS 2002/95/EC China RoHS SJ/T 11364-2006 Classification

Compliant by Exemption

Above Maximum Concentration Value (MCV)





* Footnotes

Immersion Depth Immersion at specified depth for 24 hours

Insertion Loss, typical $0.05\sqrt{\text{freq (GHz)}}$ (not applicable for elliptical waveguide)

www.commscope.com/andrew