

L4NM-F



N Male for 1/2 in LDF4-50A cable

Product Classification

Product Type	Wireless and radiating connector
Product Brand	HELIAX®
Product Series	LDF4-50A
Ordering Note	CommScope® standard product (Global)

General Specifications

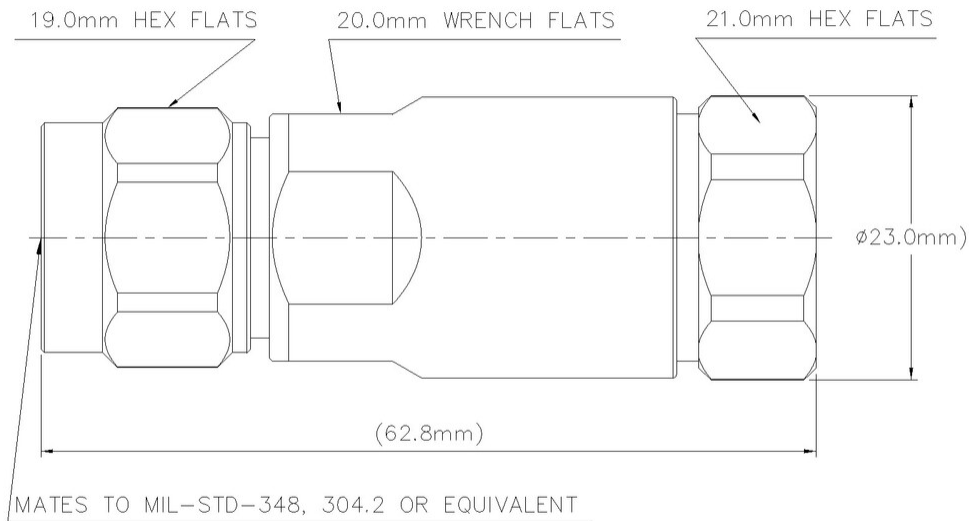
Body Style	Straight
Cable Family	LDF4-50A
Inner Contact Attachment Method	Captivated
Inner Contact Plating	Silver
Interface	N Male
Mounting Angle	Straight
Outer Contact Attachment Method	Clamp
Outer Contact Plating	Trimetal

Dimensions

Length	62.8 mm 2.472 in
Diameter	23 mm 0.906 in
Nominal Size	1/2 in

Outline Drawing

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Electrical Specifications

3rd Order IMD	-159 dBc
3rd Order IMD at Frequency	-116 dBm @ 900 MHz
3rd Order IMD Test Method	Two +43 dBm carriers
Insertion Loss Coefficient, typical	0.05
Average Power at Frequency	0.6 kW @ 900 MHz
Connector Impedance	50 ohm
dc Test Voltage	2000 V
Impedance	50 ohm
Inner Contact Resistance, maximum	1 mOhm
Insulation Resistance, minimum	5000 MOhm
Operating Frequency Band	0 – 8000 MHz
Outer Contact Resistance, maximum	0.25 mOhm
RF Operating Voltage, maximum (vrms)	707 V

VSWR/Return Loss

Frequency Band	VSWR	Return Loss (dB)	VSWR, typical	Return Loss, typical (dB)
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0–1000 MHz	1.05	32.26		
1000–2000 MHz	1.1	26.44		
2000–3000 MHz	1.18	21.66		
3000–4000 MHz	1.2	20.83		
4000–6000 MHz	1.25	19.08		
6000–8800 MHz			1.3	17.69

Mechanical Specifications

Attachment Durability	25 cycles
Connector Retention Tensile Force	600 N 134.885 lbf
Connector Retention Torque	4.5 N-m 39.828 in lb
Coupling Nut Proof Torque	1.7 N-m 15.046 in lb
Coupling Nut Retention Force	450 N 101.164 lbf
Coupling Nut Retention Force Method	MIL-C-39012C-3.25, 4.6.22
Interface Durability	500 cycles
Interface Durability Method	IEC 61169-16:9.5
Mechanical Shock Test Method	IEC 60068-2-27

Environmental Specifications

Operating Temperature	-55 °C to +85 °C (-67 °F to +185 °F)
Storage Temperature	-55 °C to +85 °C (-67 °F to +185 °F)
Corrosion Test Method	IEC 60068-2-11
Immersion Depth	1 m
Immersion Test Mating	Mated
Immersion Test Method	IEC 60529:2001, IP68
Thermal Shock Test Method	IEC 60068-2-14
Vibration Test Method	IEC 60068-2-6

Packaging and Weights

Height, packed	248.92 mm 9.8 in
Width, packed	266.7 mm 10.5 in
Length, packed	266.7 mm 10.5 in
Packaging quantity	50

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* Footnotes

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

Immersion Depth Immersion at specified depth for 24 hours