

# FMC00319-48 DATA SHEET

# Low Loss N Male to BNC Male Cable LMR-240-UF Coax in 48 Inch

The type N male to BNC male 48 inch cable using LMR-240-UF coax, part number FMC00319-48, from Fairview Microwave is in-stock and ships same day. This Fairview type N to BNC cable assembly has a male to male gender configuration with 50 ohm flexible LMR-240-UF coax. Fairview Microwave's flexible RF cable assemblies are ideal for applications where tight bends and continual flexure are required. The FMC00319-48 type N male to BNC male cable assembly operates to 5.8 GHz. The double shielding of this Fairview cable assembly provides excellent shielding effectiveness of better than 90 dB.

Custom versions of most RF cable assemblies can be built and shipped same day. Custom cable assembly lengths can be obtained by specifying the desired length on the web site at time of order or by contacting a sales representative. Other RF cable assembly value added services including connector orientation or clocking, heat shrink booting and labeling are also available. RF testing can also be performed to document the electrical performance of your cable assembly.

# **Electrical Specifications**

Description		Min	Т	Тур Мах		ι	Units	
Frequency Range		DC			5.8		GHz	
VSWR					1.4:1			
Velocity of Propagation			8	34			%	
RF Shielding		90					dB	
Group Delay			1.21	[3.97]		ns/f	t [ns/n	<u>n]</u>
Capacitance			24.2	[79.4]		pF/f	t [pF/n	<u>n]</u>
Inductance	0.06	[0.2]		uH/f	t [uH/r	n]		
DC Resistance Inner Conductor				[14.04]		Ω/100	Oft [Ω/I	Km]
DC Resistance Outer Conductor			3.89	[12.76]		Ω/100	Oft [Ω/I	Km]
Jacket Spark					5,000	\	/rms	

#### **Performance by Frequency**

Description	F1	F2	F3	F4	F5	Units	
Frequency	0.25	0.5	1	2.5	5.8	GHz	
Insertion Loss (Typ.)	0.38	0.46	0.58	0.81	1.17	dB	

#### **Electrical Specification Notes:**

The Insertion Loss data above is based on the performance specifications of the coax cable and connectors used in this assembly. The Insertion Loss includes an estimated insertion loss of 0.1 dB per connector

### **Mechanical Specifications**

#### **Cable Assembly**

Length\* 48 in [121.92 cm]
Diameter 0.827 in [21.01 mm]

# Cable

Cable Type LMR-240-UF Impedance 50 Ohms



# **Configuration:**

- N Male
- BNC Male
- LMR-240-UF

# **Features:**

- Max Frequency 5.8 GHz
- Shielding Effectivity > 90 dB
- 84% Phase Velocity
- Double Shielded
- TPE Jacket

# **Applications:**

- General Purpose
- · Laboratory Use

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Inner Conductor Type

Inner Conductor Material and Plating

Dielectric Type Number of Shields

Shield Layer 1 Shield Layer 2 Jacket Material

Jacket Diameter

One Time Minimum Bend Radius Repeated Minimum Bend Radius

Bending Moment Flat Plate Crush Tensile Strength Stranded Copper PE (F)

> Aluminum Tape Tinned Copper Braid

TPE, Black

0.24 in [6.1 mm]

0.75 in [19.05 mm] 2.5 in [63.5 mm] 0.13 lbs-ft [0.18 N-m]

13 lbs/in [0.23 Kg/mm] 80 lbs [36.29 Kg]

#### **Connectors**

Description	Connector 1	Connector 2				
Туре	N Male	BNC Male				
Impedance	50 Ohms	50 Ohms				
Contact Material & Plating	Phosphor Bronze, G	old Brass, Gold				
Dielectric Type	PTFE	PTFE				
Outer Cond Material & Plating		Brass, Tri-Metal				
Body Material & Plating	Brass, Nickel	Brass, Tri-Metal				
Coupling Nut Material & Plating	Brass, Nickel					

#### Mechanical Specification Notes:

# **Environmental Specifications**

**Temperature** 

Operating Range Storage Range -40 to +85 deg C

-70 to +85 deg C

# **Compliance Certifications** (see product page for current document)

### **Plotted and Other Data**

Notes:

#### **How to Order**

Part Number Configuration: FMC00319 - xx uu | cm = Centimeters | cblank> = Inches

Example: FMC00319-12 = 12 inches long cable

FMC00319-100cm = 100 cm long cable

- Length

<sup>\*</sup>All cable assemblies have a length tolerance of 1.5% or  $\pm$  3/8", whichever is greater.





Low Loss N Male to BNC Male Cable LMR-240-UF Coax in 48 Inch from Fairview Microwave has same day shipment for domestic and International orders. Our RF, microwave and fiber optic products maintain a 99% availability and are part of the broadest selection in the industry.

Click the following link to obtain additional part information: Low Loss N Male to BNC Male Cable LMR-240-UF Coax in 48 Inch FMC00319-48

The information contained in this document is accurate to the best of our knowledge and representative of the part described herein. It may be necessary to make modifications to the part and/or the documentation of the part, in order

URL: https://www.fairviewmicrowave.com/n-male-bnc-male-cable-lmr240uf-coax-fmc00319-48-p.aspx

to implem	ent improvement	s. Fairview	Microw	ave reserv	es the righ	nt to mal	ke such	changes	as requ	uired. U	nless o	therwise
	specifications ar											
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arising ou	t of the use of an	y part or do	cument	ation.								





