

## Low Loss SMA Male to RA BNC Male Cable RG-223 Coax

The SMA male to RA BNC male cable using RG-223 coax, part number FMC00272, from Fairview Microwave is in-stock and ships same day. This Fairview SMA to BNC cable assembly has a male to male gender configuration with 50 ohm flexible RG223 coax. Fairview Microwave's flexible RF cable assemblies are ideal for applications where tight bends and continual flexure are required. The FMC00272 SMA male to BNC male cable assembly operates to 12.4 GHz. The right angle BNC interface on the RG223 cable allows for easier connections in tight spaces. The double shielding of this Fairview cable assembly provides excellent shielding effectiveness.

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	Typ	Max	Units
Frequency Range	DC		12.4	GHz
VSWR			1.4:1	
Velocity of Propagation		66		%
Capacitance		30.8 [101.05]		pF/ft [pF/m]
Operating Voltage (AC)			500	Vrms

### Performance by Frequency

Description	F1	F2	F3	F4	F5	Units
Frequency	0.4	1	3	5	11	GHz
Insertion Loss (Typ.)	0.08	0.13	0.24	0.33	0.54	dB/ft
	0.26	0.43	0.79	1.08	1.77	dB/m

### Electrical Specification Notes:

Insertion Loss does not include the loss of the connectors. Insertion Loss is estimated as 0.1 dB for the straight connector and 0.2 dB for the right angle connector

### Mechanical Specifications

#### Cable Assembly

Diameter 0.571 in [14.5 mm]

#### Cable

Cable Type RG223  
 Impedance 50 Ohms  
 Inner Conductor Type Solid  
 Inner Conductor Material and Plating Copper, Silver  
 Dielectric Type PE  
 Number of Shields 2  
 Shield Layer 1 Silver Plated Copper Braid



### Configuration:

- SMA Male
- BNC Male Right Angle
- RG223

### Features:

- Max Frequency 12.4 GHz
- 66% Phase Velocity
- Double Shielded
- PVC Jacket

### Applications:

- General Purpose
- Laboratory Use

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Shield Layer 2 Silver Plated Copper Braid  
 Jacket Material PVC, Black  
 Jacket Diameter 0.209 in [5.31 mm]  
 Repeated Minimum Bend Radius 1 in [25.4 mm]

**Connectors**

Description	Connector 1	Connector 2
Type	SMA Male	BNC Male
Specification	MIL-STD-348A	MIL-STD-348A
Impedance	50 Ohms	50 Ohms
Contact Material & Plating	Brass, Gold	Brass, Gold
Contact Plating Spec.	50 µin minimum	30 µin minimum
Dielectric Type	PTFE	PTFE
Body Material & Plating	Brass, Gold	Brass, Nickel
Body Plating Spec.	3 µin minimum	100 µin minimum
Coupling Nut Material & Plating	Brass, Gold	Brass, Nickel
Coupling Nut Plating Spec.	3 µin minimum	100 µin minimum
Hex Size	5/16 inch	
Torque	3 in-lbs 0.34 Nm	

**Environmental Specifications**  
**Temperature**

Operating Range -20 to +80 deg C

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

**Plotted and Other Data**

Notes:

**How to Order**

Part Number Configuration:

**FMC00272 - xx uu**

cm = Centimeters  
 <blank> = Inches  
 Length

Example: FMC00272-12 = 12 inches long cable  
 FMC00272-100cm = 100 cm long cable

Low Loss SMA Male to RA BNC Male Cable RG-223 Coax 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.

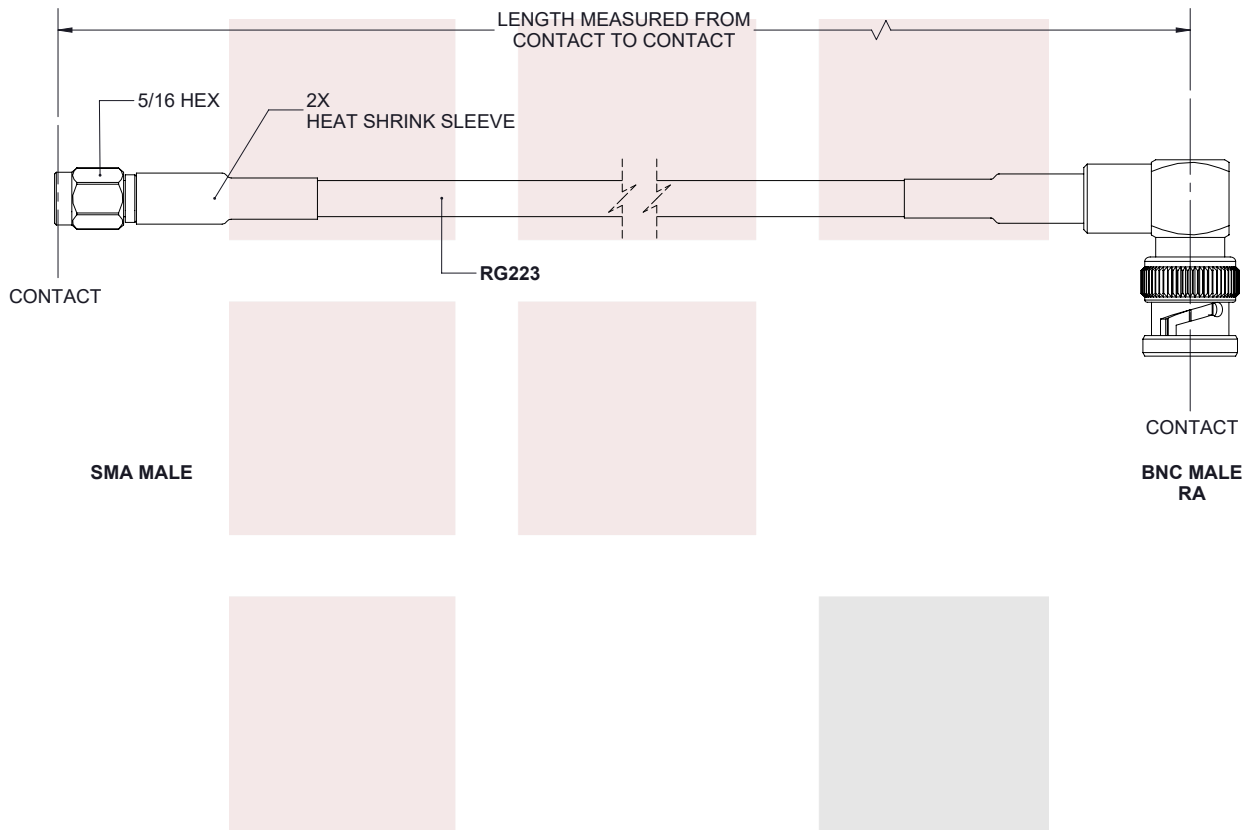
Click the following link to obtain additional part information: [Low Loss SMA Male to RA BNC Male Cable RG-223 Coax FMC00272](#)

URL: <https://www.fairviewmicrowave.com/low-loss-sma-male-ra-bnc-male-cable-rg223-coax-fmc00272-p.aspx>

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 to implement improvements. Fairview Microwave reserves the right to make such changes as required. Unless otherwise stated, all specifications are nominal. Fairview Microwave does not make any representation or warranty regarding the suitability of the part described herein for any particular purpose, and Fairview Microwave does not assume any liability arising out of the use of any part or documentation.



REVISIONS			
REV.	DESCRIPTION	DATE	APPROVED
A	INITIAL RELEASE	2/24/2020	S.ELLIS



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TITLE  
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Coax

UNLESS OTHERWISE SPECIFIED LEADING DIMENSIONS ARE INCHES  
DIMENSIONS IN [ ] ARE MILLIMETERS

TOLERANCES:		CABLE LENGTH (L) TOLERANCES:	
.X = ±.2 [ .508 ]	FRACTIONS ± 1/32	L ≤ 12 [305] = +1 [25] / -0	
.XX = ±.02 [ .51 ]		12 [305] < L ≤ 60 [1524] = +2 [51] / -0	
.XXX = ±.005 [ .13 ]	ANGLES ± 1°	60 [1524] < L ≤ 120 [3048] = +4 [102] / -0	
		120 [3048] < L ≤ 300 [7620] = +6 [152] / -0	
		300 [7620] < L = +5%L / -0	

THIRD-ANGLE PROJECTION  
  
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SHEET 1 OF 1

ALL DIMENSIONS SHOWN ARE FOR REFERENCE ONLY.

SCALE N/A

SIZE A	CAGE CODE 3FKR5	DRAWN BY K.DANG	ITEM NO. FMC00272	REV A
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