

## FMCA2272-60 DATA SHEET

# Low PIM RA 2.2-5 Male to 2.2-5 Female Cable 1/4 inch Superflexible Coax in 60 Inch

The RA 2.2-5 male to 2.2-5 female 60 inch cable using 1/4 inch superflexible coax, part number FMCA2272-60, from Fairview Microwave is in-stock and ships same day. This Fairview 2.2-5 to 2.2-5 cable assembly has a male to female gender configuration with 50 ohm corrugated 1/4" superflexible coax. Fairview Microwave's corrugated RF cable assemblies are ideal for applications where durability and high power are needed. Our low PIM design offers excellent passive intermodulation performance with PIM levels better than -150 dBc. The FMCA2272-60 2.2-5 male to 2.2-5 female cable assembly operates to 6 GHz. The right angle 2.2-5 interface on the 1/4" Superflexible cable allows for easier connections in tight spaces.

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	T	ур	Max	U	nits
Frequency Range	DC			6	(	GHz
VSWR				1.5:1		
Velocity of Propagation		8	32			%
RF Shielding	120				(	dB
Passive Intermodulation				-150	C	dBc

	24.4 [80.05]		pF/ft [pF/m]	
	0.059 [0.19]		uH/ft [uH/m]	]
DC Resistance Inner Conductor			Ω/1000ft [Ω/Km]	
DC Resistance Outer Conductor			Ω/1000ft [Ω/Km]	
		2,000	Vrms	
		0.059 [0.19] nductor 3.2 [10.5]	nductor 2.53 [8.3]	0.059 [0.19]       uH/ft [uH/m]         nductor       3.2 [10.5]       Ω/1000ft [Ω/Kr         nductor       2.53 [8.3]       Ω/1000ft [Ω/Kr

#### **Performance by Frequency**

Description	F1	F2	F3	F4	F5	Units
Frequency	0.1	0.25	0.5	1	3	GHz
Insertion Loss (Typ.)	0.33	0.38	0.44	0.53	0.78	dB

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

The Insertion Loss data above is based on the performance specifications of the coax and connectors used in this assembly. The Insertion Loss includes an estimated 0.15 dB for the right angle connector and 0.1 dB for the straight connector.

#### **Mechanical Specifications**

#### **Cable Assembly**

Length\* Diameter

60 in [152.4 cm] 0.69 in [17.53 mm]



### **Configuration:**

- 2.2-5 Male Right Angle
- 2.2-5 Female
- 1/4" Superflexible

#### Features:

- Max Frequency 6 GHz
- Low PIM: -150 dBc Max
- Shielding Effectivity > 120 dB
- 82% Phase Velocity
- PE Jacket
- Low PIM and Low Loss
- 100% Tested with PIM Test Results Marked on Cable

## **Applications:**

- General Purpose
- Laboratory Use
- Low PIM Applications
- Distributed Antenna Systems (DAS)
- Low PIM Applications and PIM Testing

Fairview Microwave 301 Leora Ln., Suite 100 Lewisville, TX 75056 Tel: 1-800-715-4396 / (972) 649-6678 Fax: (972) 649-6689 www.fairviewmicrowave.com sales@fairviewmicrowave.com





**Cable** 

Cable Type 1/4" Superflexible Impedance 50 Ohms

Inner Conductor Type Solid

Inner Conductor Material and Plating Copper Clad Aluminum

Dielectric Type PE (F) Number of Shields 1

Shield Layer 1 Helically Corrugated Copper Tube

Jacket Material PE, Black

Jacket Diameter 0.303 in [7.7 mm]

One Time Minimum Bend Radius 0.5 in [12.7 mm]
Repeated Minimum Bend Radius 1 in [25.4 mm]

Typical Flex Cycles 2

Tensile Strength 79 lbs [35.83 Kg]

#### **Connectors**

Description	Connect	or 1	Connecto	r 2	
Туре	2.2-5 M	ale	2.2-5 Female		
Specification	2.2-5		2.2-5		
Impedance	50 Ohms		50 Ohm	S	
Contact Material & Plating	Brass, Silver				
Dielectric Type	PTFE		PTFE		
Outer Cond Material & Plati	ing		Bronze, Sil	ver	
Body Material & Plating	Brass, Tri-Metal		Brass, Tri-Metal		
Coupling Nut Material & Pla	ating Brass, Tri-Metal				
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**Environmental Specifications** 

Temperature

Operating Range

-40 to +85 deg C

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

**Plotted and Other Data** 

Notes:

**How to Order** 

Part Number Configuration:

FMCA2272 - xx uu | cm = Centimeters | chank> = Inches | Length

Example: FMCA2272-12 = 12 inches long cable

FMCA2272-100cm = 100 cm long cable

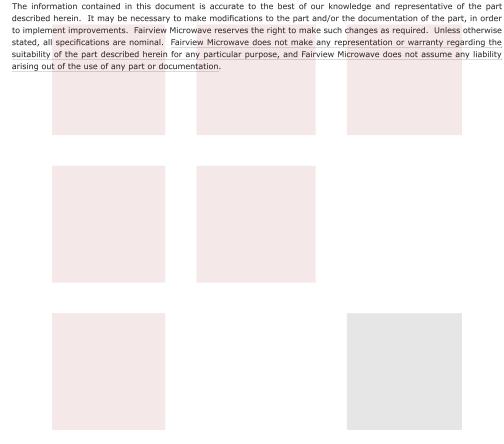




Low PIM RA 2.2-5 Male to 2.2-5 Female Cable 1/4 inch Superflexible Coax in 60 Inch from Fairview Microwave has same day shipment for domestic and International orders. Our RF, microwave and millimeter wave products maintain a 99% availability and are part of the broadest selection in the industry.

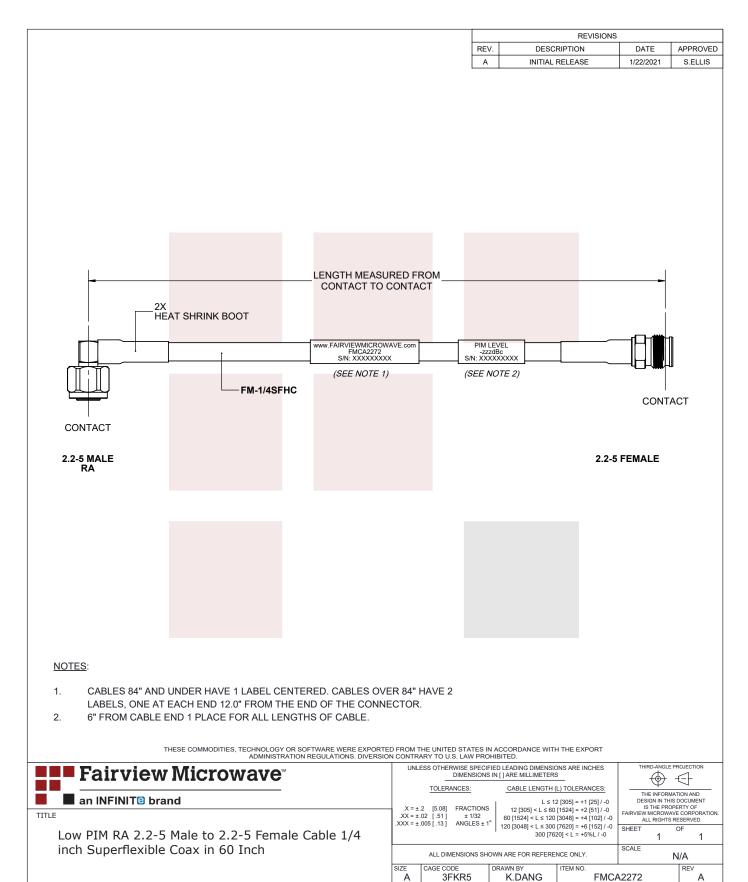
Click the following link to obtain additional part information: Low PIM RA 2.2-5 Male to 2.2-5 Female Cable 1/4 inch Superflexible Coax in 60 Inch FMCA2272-60

URL: https://www.fairviewmicrowave.com/low-pim-ra-2.2-5-male-2.2-5-female-cable-fm-1-4-sfhc-coax-fmca2272-60-p. aspx









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