

# FMCA1557-12 DATA SHEET

# Skew Matched Pair 2.92mm Male to 2.92mm Male Cable FM-125LLS Coax in 12 Inch and RoHS

The 2.92mm male to 2.92mm male skew matched coaxial pair, part number FMCA1557-12, from Fairview Microwave is in-stock and ships same day. This 2.92mm to 2.92mm flexible cable assembly pair is delay matched to reduce skew, supporting signal integrity, jitter measurements and SERDES applications. Fairview Microwave phase matches these coaxial pairs to control the time delay as so signals can be applied to differential circuits with minimal skew. The FMCA1557-12 2.92mm male to 2.92mm male matched cable pair operates to 40 GHz.

Fairview's 2.92mm to 2.92mm male skew matched pair FMCA1557-12 datasheet, specifications and outline drawing are shown in this PDF below. Our extensive offering of RF, microwave and high speed digital connections allows designers to configure and customize their signals however they like. From reducing skew, improving jitter performance or performing signal integrity testing, Fairview Microwave has the right delay matched cable solutions to meet your needs.

#### **Electrical Specifications**

Description	Min	Т	ур	Max	ι	Jnits
Frequency Range	0.05			40		GHz
VSWR				1.65:1		
Insertion Loss				1.5		dB
Velocity of Propagation		-	74			%
Capacitance		27 [8	38.58]		pF/f	t [pF/m]
Channel-to-Channel Delay Match		1			ps	

#### **Performance by Frequency**

Description	F1	F2	F2 F3		F5	Units	
Frequency	1	5	10	20	28	GHz	
Insertion Loss (Max.)	0.19	0.43	0.63	0.92	1.15	dB	

VSWR (Max.) 1.45:1

Description	F6	F7	F8	F9	F10	Units
Frequency	32	40				GHz
Insertion Loss (Max.)	1.27	1.5				dB
VSWR (Max.)	1.55:1	1.65:1				

**Electrical Specification Notes:** 

Electrical specifications are per channel. Delay match of  $\pm 1$  applies when cables are bent in same shape/configuration.

#### **Mechanical Specifications**

**Cable Assembly** 

Length\*

12 in [304.8 mm]



### **Configuration:**

- 2.92mm Male
- 2.92mm Male
- FM-125LLS
- 2 Channels

#### **Features:**

- Max Frequency 40 GHz
- 74% Phase Velocity
- FEP Jacket
- Extremely Flexible
- 1 ps Delay match
- Excellent VSWR of 1.65:1
- 100% Skew Match Tested
- Polarity Indicators For Matched Cable Ends

## **Applications:**

- General Purpose
- Laboratory Use
- Gbps SERDES
- Jitter Measurements
- Differential Signals
- Physical Layer Characterization
- Signal Integrity Measurements

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





Weight 0.1385 lbs [62.82 g]

Cable

Cable Type FM-125LLS Impedance 50 Ohms Inner Conductor Type Stranded Inner Conductor Material and Plating **PTFE** 

Dielectric Type Number of Shields

Shield Layer 1 Outer Conductor Material and Plating Outer Conductor Plating Specification

Outer Conductor Diameter

Jacket Material

Jacket Diameter

Copper, Silver

Silver Plated Copper Copper, Silver

Flat Braid 0.084 in [2.13 mm]

FEP

0.124 in [3.15 mm]

#### **Connectors**

Description		Connect	or 1		Connector 2	
Туре		2.92mm	Male		2.92mm Male	
Contact Material & Plating		Beryllium Cop	per, G	old	Beryllium Copper, Gold	b
Dielectric Type		Polyphenyler	e Oxi	ide	Polyphenylene Oxide	9
Body Material & Plating		Steel, Pass	ivated	Steel, Passivated		
Coupling Nut Material & Pla	iting	Steel, Pass	ivated		Steel, Passivated	
Seal Gasket Material		Silicone Ru	ıbber	Silicone Rubber		

Mechanical Specification Notes:

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

**Plotted and Other Data** 

Notes:

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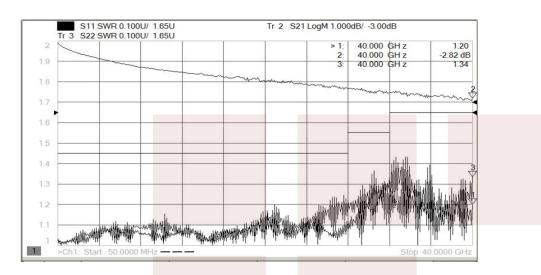
<sup>\*</sup>All cable assemblies have a length tolerance of 1.5% or  $\pm$  3/8", whichever is greater.





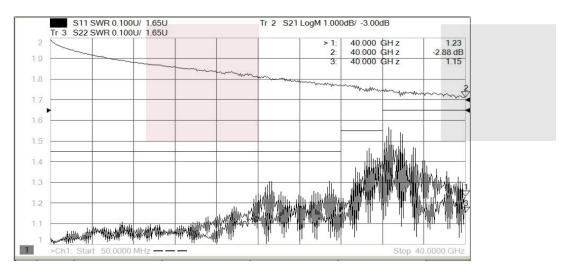
#### **Typical Performance Data**

Part Number: FMCA1557-24 Serial Number 018 A / 1920



ELECTRICAL LENGTH (TWO WAY) = 5475PS ELECTRICAL LENGTH (ONE WAY) = 2737PS

Part Number: FMCA1557-24 Serial Number 018 B / 1920



ELECTRICAL LENGTH (TWO WAY) = 5473PS ELECTRICAL LENGTH (ONE WAY) = 2736PS





#### **How to Order**

Part Number Configuration:	FMCA1557	-	хх	uu	
					- cm = Centimeters <blank> = Inches - Length</blank>

Example: FMCA1557-12 = 12 inches long cable

FMCA1557-100cm = 100 cm long cable

Skew Matched Pair 2.92mm Male to 2.92mm Male Cable FM-125LLS Coax in 12 Inch and RoHS 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: Skew Matched Pair 2.92mm Male to 2.92mm Male Cable FM-125LLS Coax in 12 Inch and RoHS FMCA1557-12

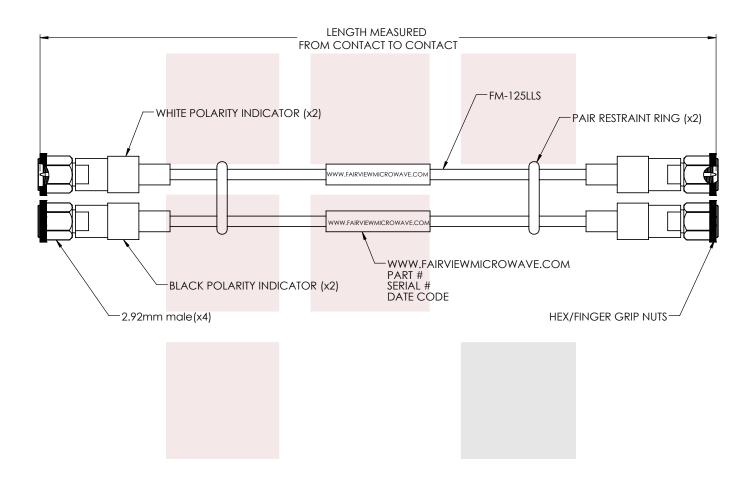
URL: https://www.fairviewmicrowave.com/skew-matched-pair-2.92mm-male-2.92mm-male-cable-fm-125lls-coax-fmca1557-12-p.aspx

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.

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STANDARD TOLERANCES

.X ±0.2 .XX ±0.01 .XXX ±0.005

\*STANDARD TOLERANCES APPLY ONLY TO DIMENSIONS IN INCHES

FAIRVIEW MICROWAVE INC. ALLEN, TX 75013 WWW.FAIRVIEWMICROWAVE.COM	NOTES:  1. UNLESS OTHERWISE SPECIFIED ALL DIMENSIONS ARE NOMINAL.  2. ALL SPECIFICATIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE AT ANY TIME.  3. DIMENSIONS ARE IN INCHES [mm].						
Skew Matched Pair 2.92mm Male to 2.92mm Male Cable FM-125LLS Coax in 12 Inch and RoHS	DWG NO FMCA1557				CAGE CODE 3FKR5		
	CAD FILE 11/06/2017	SHEET	SCAL	E N/A	SIZE A	CN2245	