



MMCX Plug to SMA Female Low Loss Cable Using LMR-100 Coax

TECHNICAL DATA SHEET

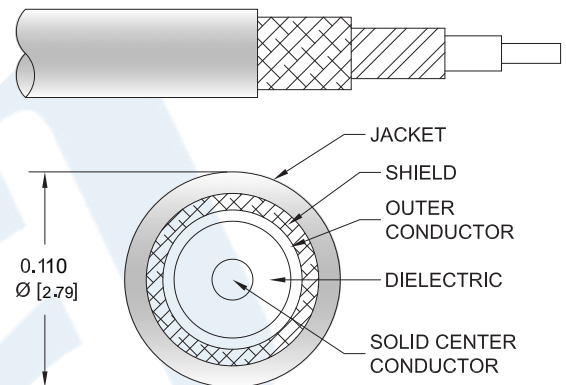
PE3W06710

Configuration

- Connector 1: MMCX Plug
- Connector 2: SMA Female
- Cable Type: LMR-100A
- Coax Flex Type: Flexible

Features

- Max Frequency 5.8 GHz
- Shielding Effectivity > 90 dB
- 66% Phase Velocity
- Double Shielded
- PVC Jacket



Applications

- General Purpose
- Laboratory Use

Description

Pasternack's PE3W06710 MMCX plug to SMA female cable using LMR-100 coax is part of our full line of RF components available for same-day shipping. Pasternack's flexible RF cable assemblies are ideal for applications where tight bends and flexure are required. This Pasternack MMCX to SMA cable assembly has a plug to female gender configuration with 50 ohm flexible LMR-100A coax. The PE3W06710 MMCX plug to SMA female cable assembly operates to 5.8 GHz. The double shielding of this Pasternack 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 available RF cable assembly value added services include connector orientation or clocking, heat shrink booting and custom labeling. RF testing can also be performed to document the electrical performance of your cable assembly.

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [MMCX Plug to SMA Female Low Loss Cable Using LMR-100 Coax PE3W06710](#)



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Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Frequency Range	DC		5.8	GHz
VSWR			1.4:1	
Velocity of Propagation		66		%
RF Shielding	90			dB
Group Delay		1.54 [5.05]		ns/ft [ns/m]
Capacitance		30.8 [101.05]		pF/ft [pF/m]
Inductance		0.077 [0.25]		uH/ft [uH/m]
DC Resistance Inner Conductor		81 [265.75]		Ω /1000ft [Ω /Km]
DC Resistance Outer Conductor		9.5 [31.17]		Ω /1000ft [Ω /Km]
Jacket Spark			2,000	Vrms

Specifications by Frequency

Part Number	Length	Description	F1	F2	F3	F4	F5	Units	Weight (lbs)
		Frequency	250	500	1000	2500	5800	MHz	
PE3W06710	Custom Lengths Available	Insertion Loss (Typ.)	0.12	0.17	0.24	0.4	0.64	dB/ft	
			0.38	0.55	0.79	1.31	2.11	dB/m	
PE3W06710-24	24 inch	Insertion Loss (Typ.)	0.43	0.53	0.68	1	1.49	dB	0.035
PE3W06710-36	36 inch	Insertion Loss (Typ.)	0.55	0.7	0.92	1.4	2.13	dB	0.044
PE3W06710-48	48 inch	Insertion Loss (Typ.)	0.66	0.86	1.16	1.8	2.77	dB	0.053
PE3W06710-100CM	100 cm	Insertion Loss (Typ.)	0.58	0.75	0.99	1.51	2.31	dB	0.047
PE3W06710-200CM	200 cm	Insertion Loss (Typ.)	0.96	1.29	1.78	2.82	4.41	dB	0.077

The insertion loss data for the base model does not include loss due to the connectors. Each length includes insertion loss due to the connectors.

Loss due to Connector 1: 0.1 dB
 Loss due to Connector 2: 0.1 dB
 Base Weight: 0.026 pounds
 Additional Weight per Inch: 0.00075 pounds

Mechanical Specifications

Cable Assembly

Weight 0.026 lbs [11.79 g]

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MMCX Plug to SMA Female Low Loss
Cable Using LMR-100 Coax

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PE3W06710

Cable

Cable Type	LMR-100A
Impedance	50 Ohms
Inner Conductor Type	Solid
Inner Conductor Material and Plating	Copper Clad Steel
Dielectric Type	PE
Number of Shields	2
Shield Layer 1	Aluminum Tape
Shield Layer 2	Tinned Copper Braid
Jacket Material	PVC, Black
Jacket Diameter	0.11 in [2.79 mm]
One Time Minimum Bend Radius	0.25 in [6.35 mm]
Repeated Minimum Bend Radius	1 in [25.4 mm]
Bending Moment	0.1 lbs-ft [0.14 N-m]
Flat Plate Crush	10 lbs/in [0.18 Kg/mm]
Tensile Strength	15 lbs [6.8 Kg]

Connectors

Description	Connector 1	Connector 2
Type	MMCX Plug Push-On	SMA Female Threaded
Specification	BS EN 122340	MIL-STD-348A
Impedance	50 Ohms	50 Ohms
Contact Material and Plating	Brass, Gold	Beryllium Copper, Gold
Contact Plating Specification	30 µin minimum	50µ in. minimum
Dielectric Type	PTFE	Teflon
Outer Conductor Material and Plating	Brass, Gold	Brass, Gold
Outer Conductor Plating Specification	3 µin minimum	3µ in. minimum
Body Material and Plating	Brass, Gold	Brass, Gold
Body Plating Specification	3 µin minimum	3µ in. minimum

Environmental Specifications

Temperature

Operating Range	-40 to +85 deg C
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Compliance Certifications (see [product page](#) for current document)

Plotted and Other Data

Notes:

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TECHNICAL DATA SHEET

PE3W06710

How to Order

Part Number Configuration:

PE3W06710

- **xx**

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Unit of Measure:
cm = Centimeters
<blank> = Inches
Length
Base Number

Example: PE3W06710-12 = 12 inches long cable
PE3W06710-100cm = 100 cm long cable

MMCX Plug to SMA Female Low Loss Cable Using LMR-100 Coax from Pasternack Enterprises has same day shipment for domestic and International orders. Our RF, microwave and millimeter wave products maintain a 99.4% availability and are part of the broadest selection in the industry.

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [MMCX Plug to SMA Female Low Loss Cable Using LMR-100 Coax PE3W06710](https://www.pasternack.com/mmcs-plug-to-sma-female-low-loss-cable-using-lmr-100-pe3w06710-p.aspx)

URL: <https://www.pasternack.com/mmcs-plug-to-sma-female-low-loss-cable-using-lmr-100-pe3w06710-p.aspx>

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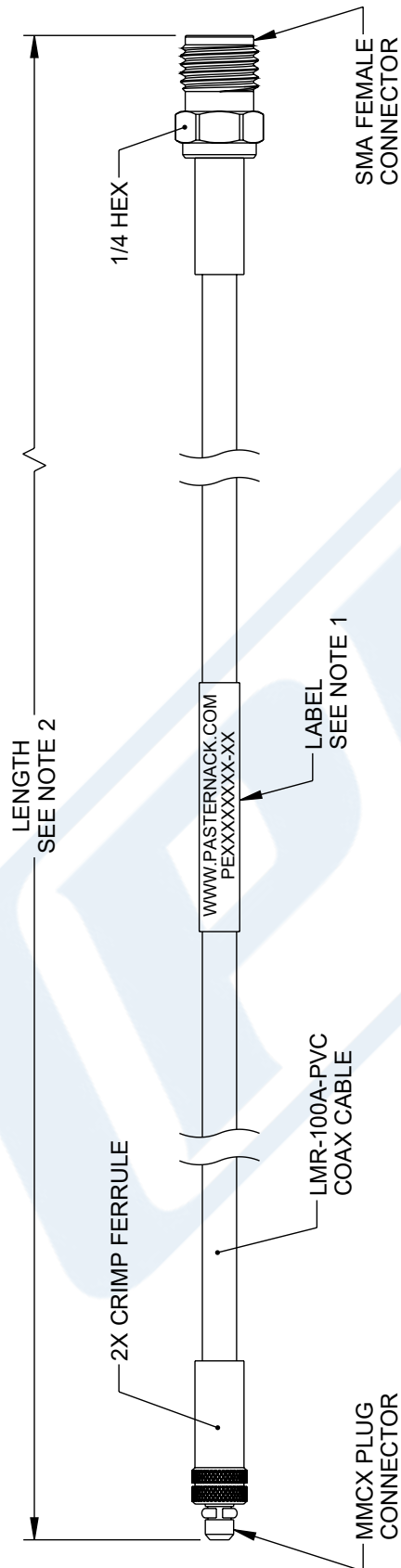
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REVISION

ZONE	REV	DESCRIPTION	DATE	CHANGED BY	APPROVED
	A	INITIAL RELEASE	10/2/2023	KDANG	AGANWANI



NOTES:

- CABLE ASSY LENGTH LABEL PLACEMENT: 36 INCHES OR LESS, ONE LABEL APPROX CENTERED. LONGER THAN 36 INCHES, TWO LABELS APPROX 6 INCHES FROM EACH CONNECTOR.
- CABLE ASSEMBLY LENGTH DETERMINED BY ITEM PN AND DESCRIPTION.
- CABLES ASSEMBLIES SHALL BE TESTED FOR CONTINUITY.

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

TOLERANCES:

X = ±2 [5] FRACTIONS

.XX = ±02 [0.5] ± 1/32

.XXX = ±.005 [0.13] ANGLES ± 1°

CABLE LENGTH TOLERANCES:

≤12 [305] = ±1 [25] / -0

>12 [305] ≤60 [1524] = ±2 [51] / -0

>60 [1524] ≤120 [3048] = ±4 [102] / -0

>120 [3048] ≤300 [7620] = ±8 [52] / -0

>300 [7620] = ±16 [762] / -0

ALL DIMENSIONS ARE FOR REFERENCE ONLY
AND SUBJECT TO CHANGE WITHOUT NOTICE
UN-DIMENSIONED NON-CRITICAL FEATURES
MAY VARY IN SIZE AND LOCATION
COLORS MAY VARY



Website: www.Pasternack.com

Phone: 1.866.727.8376 | 1.949.261.1920

DESCRIPTION

MMCX Plug to SMA Female Low Loss Cable Using LMR-100 Coax



INTERPRET ALL DIMENSIONS AND
TOLERANCES PER ASME Y14.5

SCALE

NONE

SHEET

1 OF 1

REV

A

ITEM NO.

PE3W06710

DRAWN BY

KDANG

CAGE CODE

53919

SIZE

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REVISION

2

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6