



Fire Rated N Male to SMA Male Low Loss Cable Using LMR-200-FR Coax With Times Microwave Components

RF Cable Assemblies Technical Data Sheet

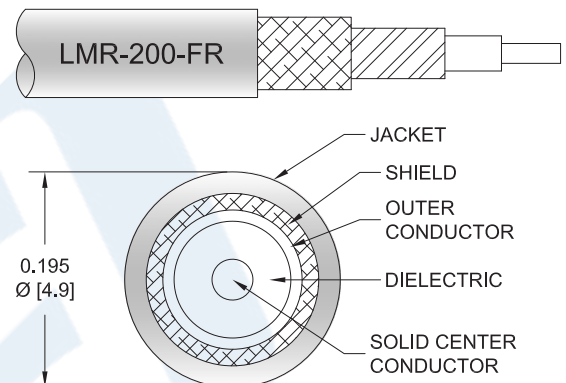
PE3C6455

Configuration

- Connector 1: N Male
- Connector 2: SMA Male
- Cable Type: LMR-200-FR

Features

- Max Frequency 5.8 GHz
- Shielding Effectivity > 90 dB
- 83% Phase Velocity
- Double Shielded
- FRPE Jacket



Applications

- General Purpose
- Laboratory Use

Description

Pasternack's PE3C6455 type N male to SMA male cable using LMR-200-FR 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 type N to SMA cable assembly has a male to male gender configuration with 50 ohm flexible LMR-200-FR coax. The PE3C6455 type N male to SMA male 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: [Fire Rated N Male to SMA Male Low Loss Cable Using LMR-200-FR Coax With Times Microwave Components PE3C6455](#)



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Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Frequency Range	DC		5.8	GHz
Velocity of Propagation		83		%
RF Shielding	90			dB
Group Delay		1.22 [4]		ns/ft [ns/m]
Capacitance		24.5 [80.38]		pF/ft [pF/m]
Inductance		0.061 [0.2]		uH/ft [uH/m]
DC Resistance Inner Conductor		5.36 [17.59]		Ω /1000ft [Ω /Km]
DC Resistance Outer Conductor		4.9 [16.08]		Ω /1000ft [Ω /Km]
Jacket Spark			3,000	Vrms

Specifications by Frequency

Description	F1	F2	F3	F4	F5	Units
Frequency	0.25	0.5	1	2.5	5.8	GHz
Insertion Loss (Typ.)	0.05	0.073	0.103	0.169	0.264	dB/ft
	0.16	0.24	0.34	0.55	0.87	dB/m

Electrical Specification Notes:

Insertion Loss does not include the loss of the connectors. Insertion Loss is estimated as 0.1 dB per connector.

Mechanical Specifications

Cable Assembly

Cable

Cable Type	LMR-200-FR
Impedance	50 Ohms
Inner Conductor Type	Solid
Inner Conductor Material and Plating	Copper
Dielectric Type	PE
Number of Shields	2
Shield Layer 1	Aluminum Tape
Shield Layer 2	Tinned Copper Braid
Jacket Material	FRPE, Black
Jacket Diameter	0.195 in [4.95 mm]
One Time Minimum Bend Radius	0.5 in [12.7 mm]
Repeated Minimum Bend Radius	2 in [50.8 mm]
Bending Moment	2 lbs-ft [2.71 N-m]

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Flat Plate Crush 15 lbs/in [0.27 Kg/mm]
Tensile Strength 40 lbs [18.14 Kg]

Connectors

Description	Connector 1	Connector 2
Type	N Male	SMA Male
Specification	MIL-STD-348	MIL-STD-348
Impedance	50 Ohms	50 Ohms
Contact Material and Plating	Brass, Gold	Beryllium Copper, Gold
Contact Plating Specification		ASTM B488
Dielectric Type	PTFE	Teflon
Body Material and Plating	Brass, Tri-Metal	Passivated Stainless Steel
Body Plating Specification		SAE-AMS-2700
Coupling Nut Material and Plating	Phosphor Bronze	Passivated Stainless Steel
Coupling Nut Plating Specification		SAE-AMS-2700
Hex Size	13/16 Inch	5/16 Inch

Environmental Specifications

Temperature

Operating Range

-40 to +125 deg C

Shock

MIL-STD-202G, Method 107, Condition B

Vibration

MIL-STD-202G, Method 204, Condition D

Thermal Shock

MIL-STD-202G, Method 213, Condition I

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

Plotted and Other Data

Notes:

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PE3C6455

How to Order

Part Number Configuration:

PE3C6455

- **xx**

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

Example: PE3C6455-12 = 12 inches long cable
PE3C6455-100cm = 100 cm long cable

Fire Rated N Male to SMA Male Low Loss Cable Using LMR-200-FR Coax With Times Microwave Components 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.

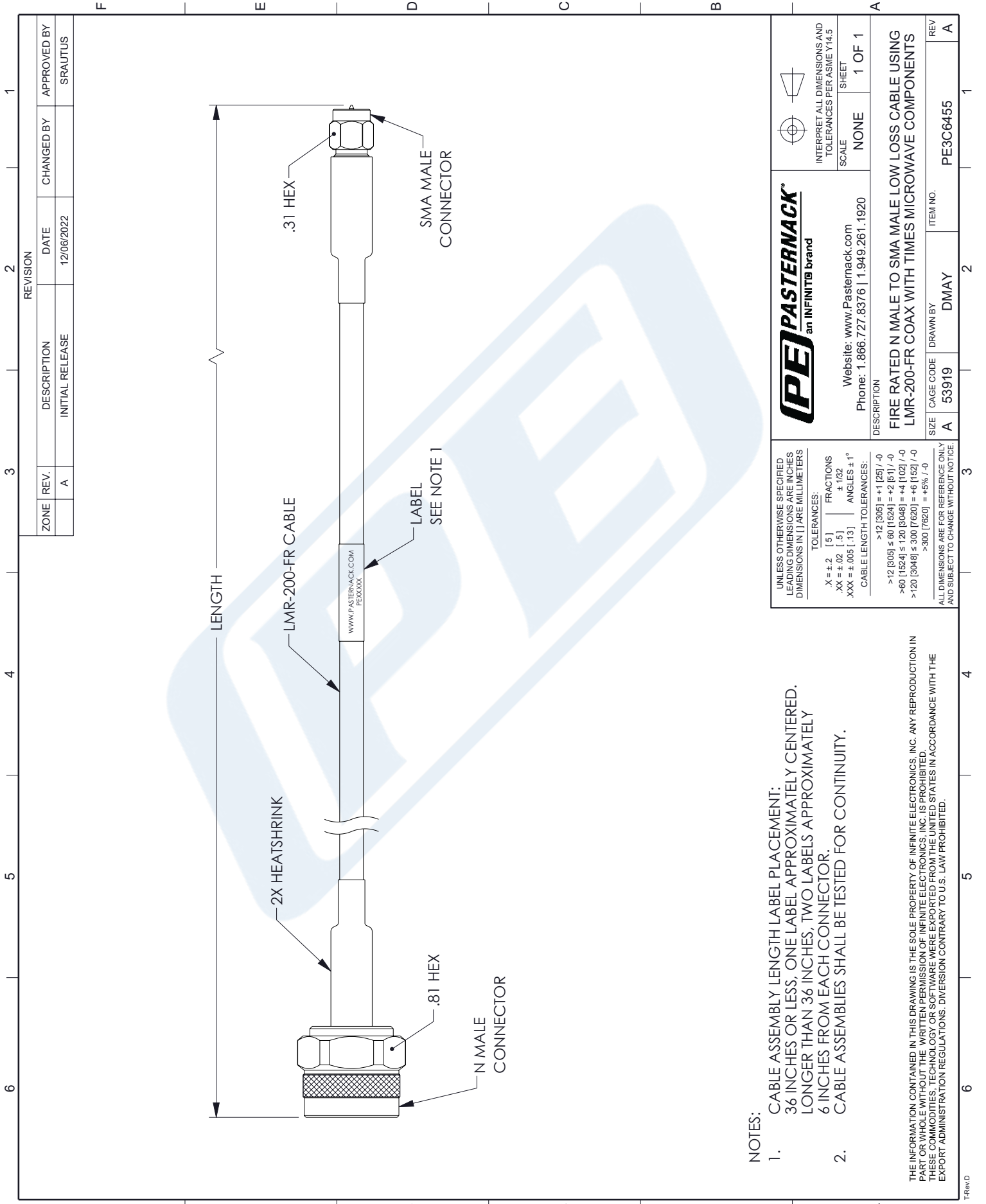
Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [Fire Rated N Male to SMA Male Low Loss Cable Using LMR-200-FR Coax With Times Microwave Components PE3C6455](https://www.pasternack.com/fire-rated-n-male-to-sma-male-low-loss-cable-using-lmr-200-fr-pe3c6455-p.aspx)

URL: <https://www.pasternack.com/fire-rated-n-male-to-sma-male-low-loss-cable-using-lmr-200-fr-pe3c6455-p.aspx>

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PE3C6455 CAD Drawing

Fire Rated N Male to SMA Male Low Loss Cable Using LMR-200-FR Coax With Times Microwave Components



NOTES:

1. CABLE ASSEMBLY LENGTH LABEL PLACEMENT: 36 INCHES OR LESS, ONE LABEL APPROXIMATELY CENTERED. LONGER THAN 36 INCHES, TWO LABELS APPROXIMATELY 6 INCHES FROM EACH CONNECTOR.
2. CABLE ASSEMBLIES SHALL BE TESTED FOR CONTINUITY.

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<p>an INFINITB brand</p>	<p>Website: www.Pasternack.com Phone: 1.866.727.8376 1.949.261.1920</p>	<p>INTERPRET ALL DIMENSIONS AND TOLERANCES PER ASME Y14.5</p> <p>SCALE: NONE</p> <p>SHEET: 1 OF 1</p>	
<p>DESCRIPTION: FIRE RATED N MALE TO SMA MALE LOW LOSS CABLE USING LMR-200-FR COAX WITH TIMES MICROWAVE COMPONENTS</p>		<p>ITEM NO. PE3C6455</p>	
<p>SIZE: A</p>	<p>CAGE CODE: 53919</p>	<p>DRAWN BY: DMAY</p>	<p>REV: A</p>

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

TOLERANCES:

X = ± .2	[.5]	FRACTIONS	± 1/32
.XX = ± .02	[.13]	ANGLES ± 1°	
XXX = ± .005	[.13]	CABLE LENGTH TOLERANCES:	

>12 [305] = +1 [25] / -0
 >60 [1524] = +2 [51] / -0
 >120 [3048] = +4 [102] / -0
 >300 [7620] = +6 [152] / -0
 >300 [7620] = +5% / -0

ALL DIMENSIONS ARE FOR REFERENCE ONLY AND SUBJECT TO CHANGE WITHOUT NOTICE.