

SMB Plug to BNC Male Cable Using RG316 Coax

PE3C3731

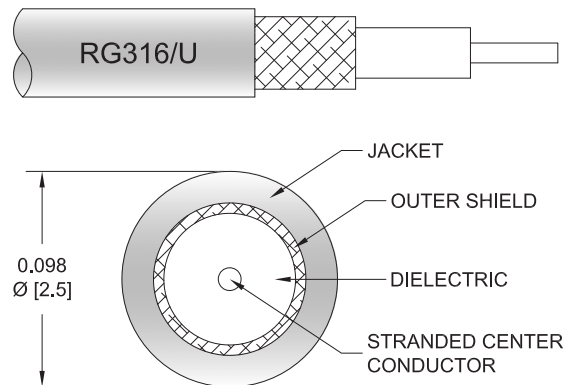


Configuration

- Connector 1: SMB Plug
- Connector 2: BNC Male
- Cable Type: RG316
- Coax Flex Type: Flexible

Features

- Max Frequency 3 GHz
- 69% Phase Velocity
- FEP Jacket



Applications

- General Purpose
- Laboratory Use

Description

Pasternack's PE3C3731 SMB plug to BNC male cable using RG316 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 SMB to BNC cable assembly has a plug to male gender configuration with 50 ohm flexible RG316 coax. The PE3C3731 SMB plug to BNC male cable assembly operates to 3 GHz.

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.

Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Frequency Range	DC		3	GHz
VSWR			1.4:1	
Velocity of Propagation		69		%
Capacitance		29.4 [96.46]		pF/ft [pF/m]
DC Resistance Inner Conductor		8.41 [27.59]		Ohms/1000ft [Ohms/Km]
Operating Voltage (AC)			335	Vrms
Jacket Spark			2,000	Vrms

Specifications by Frequency

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Part Number	Length	Description	F1	F2	F3	F4	F5	Units	Weight (lbs)
		Frequency	100	250	500	1000	3000	MHz	
PE3C3731	Custom Lengths Available	Insertion Loss (Typ.)	0.11	0.16	0.24	0.38	0.58	dB/ft	
			0.37	0.53	0.79	1.25	1.91	dB/m	
PE3C3731-12	12 inch	Insertion Loss (Typ.)	0.41	0.46	0.54	0.68	0.88	dB	0.064
PE3C3731-24	24 inch	Insertion Loss (Typ.)	0.52	0.62	0.78	1.06	1.46	dB	0.075
PE3C3731-36	36 inch	Insertion Loss (Typ.)	0.63	0.78	1.02	1.44	2.04	dB	0.085
PE3C3731-48	48 inch	Insertion Loss (Typ.)	0.74	0.94	1.26	1.82	2.62	dB	0.095
PE3C3731-72	72 inch	Insertion Loss (Typ.)	0.96	1.26	1.73	2.58	3.78	dB	0.115

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:	0.2 dB
Base Weight:	0.064 pounds
Additional Weight per Inch:	0.00084 pounds

Mechanical Specifications

Cable Assembly

Weight	0.064 lbs [29.03 g]
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Cable

Cable Type	RG316
Impedance	50 Ohms
Inner Conductor Type	Stranded
Inner Conductor Material and Plating	Copper Clad Steel, Silver
Dielectric Type	PTFE
Number of Shields	1
Shield Layer 1	Silver Plated Copper Braid
Jacket Material	FEP, Tan
Jacket Diameter	0.102 in [2.59 mm]

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Connectors

Description	Connector 1	Connector 2
Type	SMB Plug	BNC Male
Specification	MIL-STD-348A	MIL-STD-348A
Impedance	50 Ohms	50 Ohms
Configuration	Straight	Straight
Mating Cycles		500
Contact Material and Plating	Beryllium Copper, Gold	Brass, Gold
Contact Plating Specification	30 µin minimum	30 µin minimum
Dielectric Type	PTFE	PTFE
Body Material and Plating	Brass, Nickel	Brass, Nickel
Body Plating Specification	100 µin minimum	100 µin minimum
Coupling Nut Material and Plating	Brass, Nickel	Brass, Nickel
Coupling Nut Plating Specification	100 µin minimum	

Environmental Specifications

Operating Range Temperature -55 to +165 deg C

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

Plotted and Other Data

Notes:

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Typical Performance Data

How to Order

Part Number Configuration:

PE3C3731

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Unit of Measure:
cm = Centimeters
<blank> = Inches

Length
Base Number

Example: PE3C3731-12 = 12 inches long cable
PE3C3731-100cm = 100 cm long cable

SMB Plug to BNC Male Cable Using RG316 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: [SMB Plug to BNC Male Cable Using RG316 Coax PE3C3731](#)

URL: <https://www.pasternack.com/smb-plug-to-bnc-male-cable-using-rg316-pe3c3731-p.aspx>

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PE3C3731 CAD Drawing
SMB Plug to BNC Male Cable Using RG316 Coax

