

N Male to N Male Low Loss Cable Using PE-C400 Coax with HeatShrink



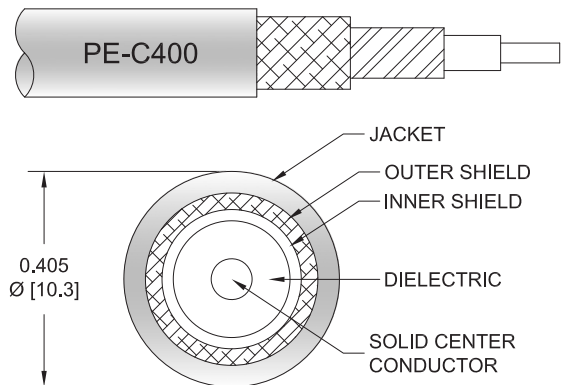
PE37942/HS

Configuration

- Connector 1: N Male
- Connector 2: N Male
- Cable Type: PE-C400
- Coax Flex Type: Flexible

Features

- Max Frequency 6 GHz
- Shielding Effectivity > 90 dB
- 85% Phase Velocity
- Double Shielded
- PE Jacket



Applications

- General Purpose
- Laboratory Use

Description

Pasternack's PE37942/HS type N male to type N male cable using PE-C400 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 type N cable assembly has a male to male gender configuration with 50 ohm flexible PE-C400 coax. The PE37942/HS type N male to type N male cable assembly operates to 6 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.

Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Frequency Range	DC		6	GHz
VSWR			1.4:1	
Velocity of Propagation		85		%
RF Shielding	90			dB
Capacitance		23.9 [78.41]		pF/ft [pF/m]
Inductance		0.059 [0.19]		uH/ft [uH/m]
DC Resistance Inner Conductor		1.39 [4.56]		Ohms/1000ft [Ohms/Km]
DC Resistance Outer Conductor		1.85 [6.07]		Ohms/1000ft [Ohms/Km]

Specifications by Frequency

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Part Number	Length	Description	F1	F2	F3	F4	F5	Units	Weight (lbs)
			Frequency		250	500	1000	2500	
PE37942/HS	Custom Lengths Available	Insertion Loss (Typ.)	0.02	0.028	0.041	0.068	0.108	dB/ft	
			0.07	0.1	0.14	0.23	0.36	dB/m	
PE37942/HS-24	24 In	Insertion Loss (Typ.)	0.24	0.26	0.29	0.34	0.42	dB	0.276
PE37942/HS-36	36 In	Insertion Loss (Typ.)	0.26	0.29	0.33	0.41	0.53	dB	0.339
PE37942/HS-48	48 In	Insertion Loss (Typ.)	0.28	0.32	0.37	0.48	0.64	dB	0.402
PE37942/HS-60	60 In	Insertion Loss (Typ.)	0.3	0.34	0.41	0.54	0.74	dB	0.465
PE37942/HS-72	72 In	Insertion Loss (Typ.)	0.32	0.37	0.45	0.61	0.85	dB	0.528

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: 0.213 pounds
 Additional Weight per Inch: 0.00525 pounds

Mechanical Specifications

Cable Assembly

Width/Diameter 0.5 in [12.7 mm]
 Weight lbs [0 g]

Cable

Cable Type PE-C400
 Impedance 50 Ohms
 Inner Conductor Type Solid
 Inner Conductor Material and Plating Copper Clad Aluminum
 Dielectric Type PE (F)
 Number of Shields 2
 Shield Layer 1 Aluminum Tape
 Shield Layer 2 Tinned Copper Braid
 Jacket Material PE, Black
 Jacket Diameter 0.405 in [10.29 mm]
 Repeated Minimum Bend Radius 4 in [101.6 mm]

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Connectors

Description	Connector 1	Connector 2
Type	N Male	N Male
Impedance	50 Ohms	50 Ohms
Configuration	Straight	Straight
Contact Material and Plating	Brass, Gold	Brass, Gold
Contact Plating Specification	15 µin minimum	15 µin minimum
Dielectric Type	PTFE	PTFE
Body Material and Plating	Brass, Tri-Metal	Brass, Tri-Metal
Coupling Nut Material and Plating	Brass, Tri-Metal	Brass, Tri-Metal
Hex Size	18 mm	18 mm

Environmental Specifications

Operating Range Temperature -40 to +85 deg C

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

Plotted and Other Data

Notes:

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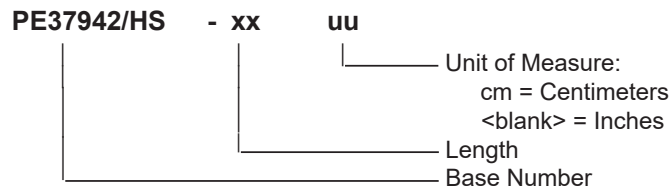


PE37942/HS

Typical Performance Data

How to Order

Part Number Configuration:



Example: PE37942/HS-12 = 12 inches long cable
PE37942/HS-100cm = 100 cm long cable

N Male to N Male Low Loss Cable Using PE-C400 Coax with HeatShrink 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.

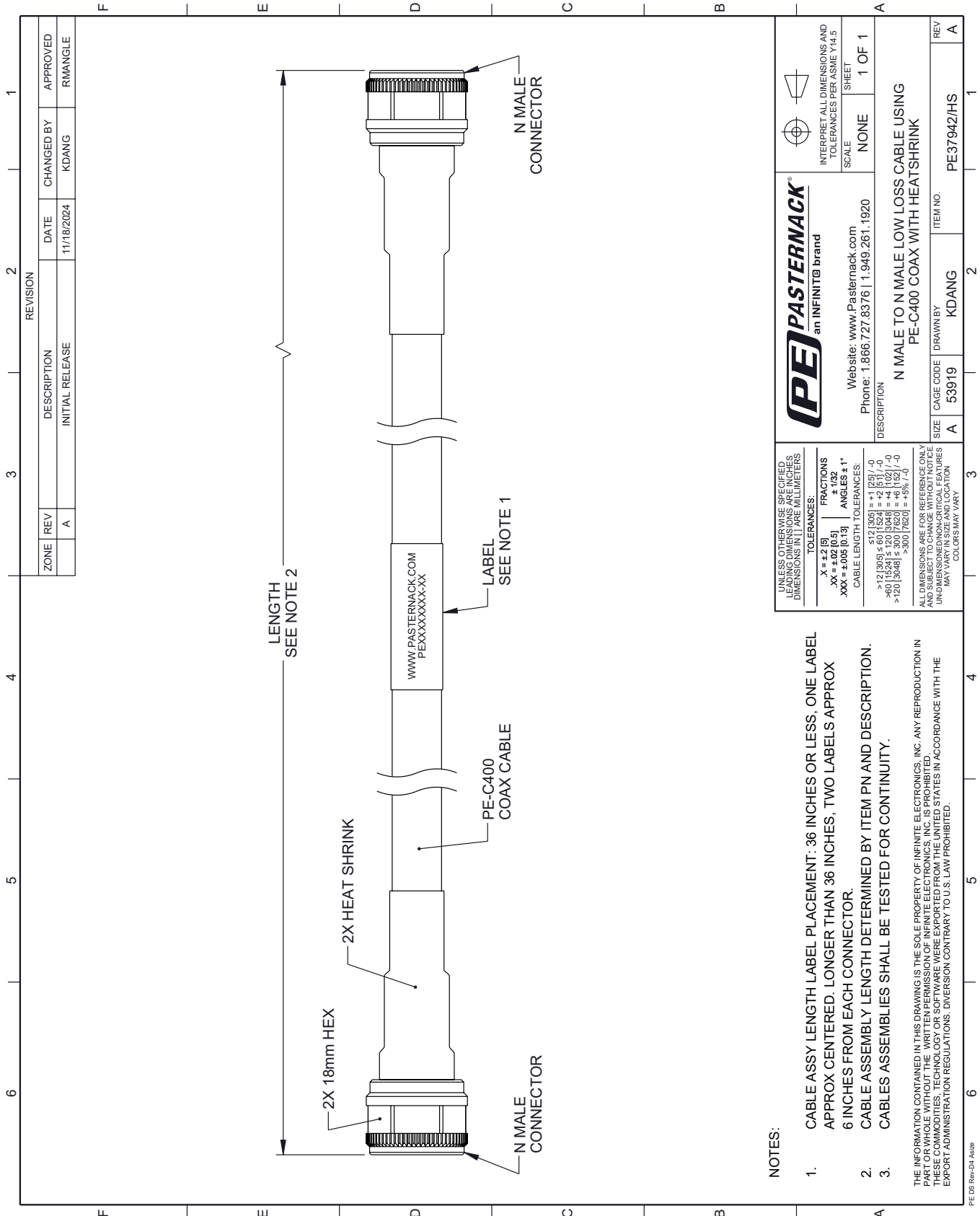
Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [N Male to N Male Low Loss Cable Using PE-C400 Coax with HeatShrink PE37942/HS](#)

URL: <https://www.pasternack.com/n-male-to-n-male-low-loss-cable-using-pe-c400-with-heatshrink-pe37942-hs-p.aspx>

The information contained within 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. Pasternack Enterprises reserves the right to make such changes as required. Unless otherwise stated, all specifications are nominal. Pasternack Enterprises does not make any representation or warranty regarding the suitability of the part described herein for any particular purpose, and Pasternack Enterprises does not assume liability arising out of the use of any part or document.

PE37942/HS CAD Drawing

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REVISION		DATE	CHANGED BY	APPROVED
ZONE	REV			
	A	11/18/2024	KDANG	RMANGLE
DESCRIPTION				
INITIAL RELEASE				

		INTERPRET ALL DIMENSIONS AND TOLERANCES PER ASME Y14.5 SCALE NONE SHEET 1 OF 1
Website: www.Pasternack.com Phone: 1.866.727.8376 1.949.261.1920		
DESCRIPTION N MALE TO N MALE LOW LOSS CABLE USING PE-C400 COAX WITH HEATSHRINK		
SIZE	CAGE CODE	ITEM NO.
A	53919	PE37942/HS

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.
- CABLE ASSEMBLIES SHALL BE TESTED FOR CONTINUITY.

ALL DIMENSIONS ARE FOR REFERENCE ONLY. UNLESS OTHERWISE SPECIFIED, LEADING DIMENSIONS ARE IN INCHES AND UNLEADING DIMENSIONS IN MILLIMETERS.

TOLERANCES:
 .X = ±.2 [5]
 .XX = ±.02 [0.5]
 .XXX = ±.005 [0.13]

FRACTIONS ± 1/32
 ANGLES ± 1°

CABLE LENGTH TOLERANCES:
 <12 [305] ±.60 [1524] = +.2 [51] / -0
 >12 [305] ±.60 [1524] = +.2 [51] / -0
 >120 [3048] ±.300 [7620] = +.5% [1.9]

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PE DS Rev-D4-A320