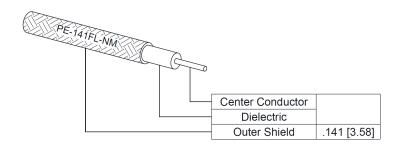


# Party Party

# PE3M0400

#### Configuration

- Connector 1: Push-on BMZ SocketConnector 2: Push-on BMZ Socket
- Cable Type: PE-141FL-NM
- · Coax Flex Type: Formable



#### **Features**

- · Max Frequency: 18 GHz
- · Can be installed in all D38999 size 8 inserts

# **Applications**

- · Military and Aerospace
- Avionics

- · Lot traceability
- · High speed RF cable assembly
- · Industrial Automation

# **Description**

The PE3M0400 from Pasternack is a D398999 cable assembly that is built with a size 8 BMZ Socket contact on one end and a BMZ Socket connector on the other. Pasternack MIL-DTL-38999 (also known as D38999 or 38999) coaxial cable assembly products are used in applications requiring high quality such as laboratory RF test and measurement, rugged and designed for defense/military, production environments, general use, etc. This BMZ to BMZ cable assembly is a part of one of the largest selections of same-day ship coaxial cables for RF, microwave, and millimeter wave interconnect solutions. This high frequency D38999 cable assembly operates at a maximum frequency of 18 GHz.

The PE3M0400 RF cable has a Copper jacket. This radio frequency cable assembly can withstand temperatures ranging from -65 to 165 degrees C. Our BMZ Socket to BMZ Socket cable has a maximum VSWR of 1.4:1. This formable RF cable assembly with a 0.5-inch diameter has silver plated copper as the cable's inner conducting material and PTFE dielectric type. The PE3M0400 in-series RF cable has 0.375 inches of repeated minimum bend radius along with 90 dB of minimum RF shielding.

BMZ Socket to BMZ Socket cable assembly is built with PE-141FL-NM, which is a flexible coax type. The Pasternack PE3M0400 formable cable assembly has a 50 Ohm impedance and is single shielded. Additional dimensions, specifications, and CAD drawings for this BMZ to BMZ RF cables are available on our downloadable PDF datasheet.

BMZ Socket to BMZ Socket cable assembly is just one of more than one million in-stock RF products available. Pasternack is where to buy high quality custom RF cable assembly products for rugged and MIL-STD designed military/defense, aerospace, outdoor and harsh environment, microwave and millimeter wave radio transmitter receiver, component inter-connection and more for RF test & measurement labs, telecom, phase stable, phase and delay matching, and other radio frequency applications can be manufactured. Variations of BMZ cable assemblies can also be built and will ship on the same day as well, search this website or contact us for assistance. For further information on similar products, our expert technical support and trained sales team can get you the ideal BMZ to BMZ RF cable assembly as per your requirements.





# PE3M0400

#### **Referenced Specifications**

IPC J-STD-001 Requirements for Soldered Electrical and Electronic Assemblies

IPC J-STD-006 Requirements for Electronic Grade Solder Alloys and Fluxed and Non-Fluxed Solid Solders for Electronic Soldering

**Applications** 

IPC/WHMA-A-620 Requirements and Acceptance for Cable and Wire Harness Assemblies
MIL-DTL-17 Cables, Radio Frequency, Flexible and Semirigid, General Specification for

MIL-PRF-39012 Connectors, Coaxial, Radio Frequency, General Specification for

MIL-STD-348 Radio Frequency Connector Interfaces for MIL-DTL-3643, MIL-DTL-3655, MIL-DTL-25516, MIL-DTL-25516, MIL-DTL-3650, MIL-DTL-3655, MIL

PRF-31031, MIL-PRF-39012, MIL-PRF-49142, MIL-PRF-55339, MIL-DTL-83517

SAE AS22520 Crimping Tools, Wire Termination, General Specification For

SAE AS23053 Insulation Sleeving, Electrical, Heat Shrinkable, General Specifications For

SAE AS5942 Marking of Electrical Insulating Materials

IPC J-STD-001 Requirements for Soldered Electrical and Electronic Assemblies

#### **Material Specifications**

Component	Specification
Cable	PE-141FL-NM in accordance with PE-141FL-NM datasheet
Connector 1	in accordance with MIL-DTL-38999
Connector 2	in accordance with MIL-DTL-38999
Heat Shrink 1	M23053/5-106-0 in accordance with SAE AS23053
Heat Shrink 2	M23053/5-106-0 in accordance with SAE AS23053
Solder	SAC305 in accordance with J-STD-006

# **Electrical Specifications**

Description	Minimum	Typical	Maximum	Units
Frequency Range	DC		18	GHz
VSWR			1.4:1	
Velocity of Propagation		70		%
RF Shielding	90			dB

# Specifications by Frequency





# PE3M0400

Part Number	Length	Description	F1	F2	F3	F4	F5	Units	Weight (lbs)
Fait Nullibel	Lengui	Frequency	1000	2000	4500	9000	18000	MHz	weight (ibs)
PE3M0400	Custom Lengths	Insertion Loss (Typ.)	0.16	0.22	0.36	0.55	0.852	dB/ft	
F E 3 1 1 1 4 0 0	Available	ilisertion Loss (Typ.)	0.54	0.72	1.2	1.82	2.8	dB/m	
PE3M0400-6	6 inch	Insertion Loss (Typ.)	0.29	0.31	0.39	0.48	0.63	dB	0.68
PE3M0400-12	12 inch	Insertion Loss (Typ.)	0.37	0.42	0.57	0.76	1.06	dB	1.34
PE3M0400-24	24 inch	Insertion Loss (Typ.)	0.53	0.64	0.93	1.31	1.91	dB	2.66
PE3M0400-36	36 inch	Insertion Loss (Typ.)	0.69	0.86	1.29	1.86	2.76	dB	3.98
PE3M0400-48	48 inch	Insertion Loss (Typ.)	0.85	1.08	1.66	2.42	3.61	dB	5.3
PE3M0400-60	60 inch	Insertion Loss (Typ.)	1.01	1.3	2.02	2.97	4.46	dB	6.62

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:
1.34 pounds
Additional Weight per Foot:
1.32 pounds

Electrical Specification Notes: Values at 25°C, sea level.

#### **Mechanical Specifications**

#### **Cable Assembly**

Description	Minimum	Typical	Maximum	Units
Weight		1.34 [607.81]		lbs [g]
Repeated Minimum Bend Radius	0.375			in

#### **Cable Characteristics**

Description	Specification	
Cable Type	PE-141FL-NM	
Impedance	50 Ohms	
Inner Conductor Type	Solid	
Inner Conductor Material and Plating	Silver Plated Copper	
Dielectric Type	PTFE	
Number of Shields	1	
Outer Conductor 1 Material and Plating	Copper-Tin Composite	
Jacket Material	Copper	

# **Connector Characteristics**

Description	Connector 1	Connector 2
Туре	BMZ Socket	BMZ Socket
Specification	MIL-DTL-38999	MIL-DTL-38999





# PE3M0400

#### **Connector Characteristics**

Bornel Co.	0	0
Description	Connector 1	Connector 2
Impedance	50 Ohms	50 Ohms
Configuration	Straight	Straight
Connection Method	Push-on	Push-on
Contact Size	8	8
Mating Cycles	1,000	1,000
Contact Material and Plating	Beryllium Copper, Gold	Beryllium Copper, Gold
Dielectric Type	PTFE	PTFE
Outer Conductor Material and Plating	Stainless Steel, Gold	Stainless Steel, Gold
Body Material and Plating	Stainless Steel, Gold	Stainless Steel, Gold

Mechanical Specification Notes:

# **Environmental Specifications**

Description	Specification
Temperature Operating Range	-65 to +165 deg C

Compliance Certifications (see product page for current document)

# **Plotted and Other Data**

Notes:

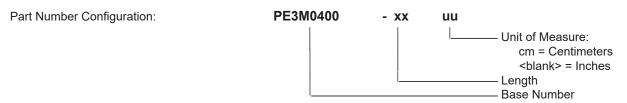
Values at 25°C, sea level.





# PE3M0400

#### **How to Order**



Example: PE3M0400-12 = 12 inches long cable

PE3M0400-100cm = 100 cm long cable

#### Cable Assembly Length Tolerances:

Imperial English		Metric		
"L" ≤ 1 ft	+0.5 in / -0 in	"L" ≤ 0.3 m	+12.5 mm / -0 mm	
1 ft < "L" ≤ 5 ft	+1 in / -0 in	0.3 m < "L" ≤ 1.5 m	+25 mm / -0 mm	
5 ft < "L" ≤ 10 ft	+2 in / -0 in	1.5 m < "L" ≤ 3 m	+50 mm / -0 mm	
10 ft < "L" ≤ 25 ft	+3 in / -0 in	3 m < "L" ≤ 7.5 m	+75 mm / -0 mm	
25 ft < "L"	+2%"L" / -0%"L"	7.5 m < "L"	+2%"L" / -0%"L"	

<sup>\*</sup> Cable Length = "L"

BMZ Size 8 D38999 Contact Socket to BMZ Size 8 D38999 Contact Socket Cable Using PE-141FL-NM Coax with HeatShrink, LF Solder 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: BMZ Size 8 D38999 Contact Socket to BMZ Size 8 D38999 Contact Socket Cable Using PE-141FL-NM Coax with HeatShrink, LF Solder PE3M0400

URL: https://www.pasternack.com/bmz-8-contact-socket-to-bmz-8-contact-socket-cable-using-pe-141fl-nm-coax-with-heatshrink-lf-solder-pe3m0400-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 impliment 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.

# PE3M0400 CAD Drawing

BMZ Size 8 D38999 Contact Socket to BMZ Size 8 D38999 Contact Socket Cable Using PE-141FL-NM Coax with HeatShrink, LF Solder

