



## 12G SDI 75 Ohm BNC Male Connector Crimp/Solder Attachment for Belden 4694R, Belden 1694A, RG6

### RF Connectors Technical Data Sheet

**PE40001**

#### Configuration

- BNC Male Connector
- 75 Ohms
- Straight Body Geometry
- Connector Interface Types: Belden 4694R, Belden 1694A, RG6

#### Features

- Max. Operating Frequency 12 GHz
- Gold Plated Brass Contact
- 10 µin minimum contact plating
- Meets SMPTE ST 2082-1
- Backwards Compatible with 2081-1
- 12Gb/s Transmission
- Cost Effective

#### Applications

- General Purpose Test
- Custom Cable Assemblies
- CATV
- 12G-SDI, Video, and Broadband UHDTV
- Broadband Internet Delivery
- Broadcast A/V
- 4K/8K Video Equipment
- Medical Equipment Requiring High Speed Video
- HD Cameras

#### Description

Pasternack's PE40001 75 ohm BNC male connector with crimp/solder attachment for Belden 4694R, Belden 1694A and RG6 is part of our full line of RF components available for same-day shipping. Our BNC male connector operates up to a maximum frequency of 12 GHz. Pasternack's 12G-SDI BNC connector PE40001 utilizes 12Gb/s data transfer rates to enable high resolution uncompressed video signal transmission. These products offer 4K and Ultra-HD quality signals that meet SMPTE Standard 2082-1. These 75 Ohm connectors are available in PCB edge-mount, straight, or right angle configurations, as well as coaxial connectors to be used in industry standard cable assemblies.

Our 75 ohm BNC male connector PE40001 datasheet specifications and drawing with dimensions are shown below in this PDF. Pasternack's broad catalog of RF, microwave and millimeter wave connectors allows designers to configure and customize their signal connections however they like. Whether the need is to provide an I/O for a board design, or simply create a custom cable assembly configuration, Pasternack has the right connector for the job. Pasternack can also expertly build your custom cable assemblies for you and ship same-day.

#### Electrical Specifications

| Description     | Minimum | Typical | Maximum | Units |
|-----------------|---------|---------|---------|-------|
| Frequency Range | DC      |         | 12      | GHz   |

#### Mechanical Specifications

##### Size

|            |                   |
|------------|-------------------|
| Length     | 1 in [25.4 mm]    |
| Width/Dia. | 0.6 in [15.24 mm] |
| Height     | 0.6 in [15.24 mm] |

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [12G SDI 75 Ohm BNC Male Connector Crimp/Solder Attachment for Belden 4694R, Belden 1694A, RG6 PE40001](#)



12G SDI 75 Ohm BNC Male Connector Crimp/Solder Attachment for Belden 4694R, Belden 1694A, RG6

## RF Connectors Technical Data Sheet

**PE40001**

Weight 0.05 lbs [22.68 g]

### Material Specifications

| Description     | Material | Plating                   |
|-----------------|----------|---------------------------|
| Contact         | Brass    | Gold<br>10 µin minimum    |
| Insulation      | PTFE     |                           |
| Outer Conductor | Brass    | Nickel<br>50 µin minimum  |
| Body            | Brass    | Nickel<br>100 µin minimum |
| Gasket          | Silicone |                           |
| Crimp Sleeve    | Brass    | Nickel                    |

### Environmental Specifications

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

### Plotted and Other Data

Notes:

12G SDI 75 Ohm BNC Male Connector Crimp/Solder Attachment for Belden 4694R, Belden 1694A, RG6 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: [12G SDI 75 Ohm BNC Male Connector Crimp/Solder Attachment for Belden 4694R, Belden 1694A, RG6 PE40001](#)

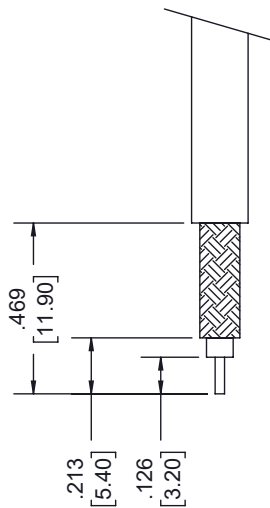
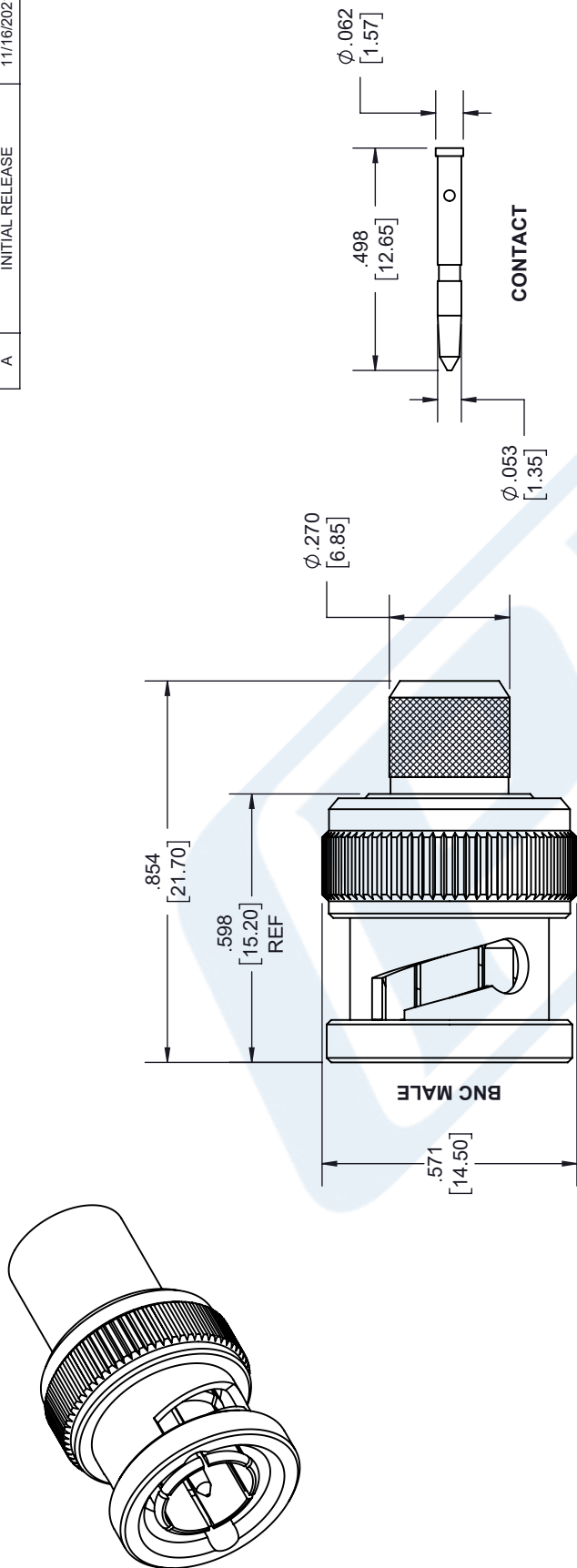
URL: <https://www.pasternack.com/bnc-male-belden-4694r-belden-1694a-rg6-connector-pe40001-p.aspx>

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

# PE40001 CAD Drawing

12G SDI 75 Ohm BNC Male Connector Crimp/Solder Attachment for Belden 4694R, Belden 1694A, RG6

| REVISIONS |                 |            |
|-----------|-----------------|------------|
| REV.      | DESCRIPTION     | DATE       |
| A         | INITIAL RELEASE | 11/16/2021 |
|           |                 | A. GANWANI |



### STRIPPING DIMENSIONS

#### NOTES:

- CABLE ATTACHMENT:
  - OUTER: CRIMP.
  - INNER: SOLDER/CRIMP.
- CRIMP SIZE REQUIRED:
  - FERRULE: .324 [8.23] HEX DIE.

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

TOLERANCES:  
 .X = ±.2 [5.08] FRACTIONS ± 1/32  
 .XX = ±.02 [ .51] ANGLES ± 1°  
 .XXX = ±.005 [ .13] CABLE LENGTH (L): TOLERANCES:  
 L ≤ 12 [305] = +1 [25] / -0  
 12 [305] < L ≤ 60 [1524] = +2 [51] / -0  
 60 [1524] < L ≤ 120 [3048] = +4 [102] / -0  
 120 [3048] < L ≤ 300 [7620] = +6 [152] / -0  
 300 [7620] < L = +5% / -0

ALL DIMENSIONS SHOWN ARE FOR REFERENCE ONLY.



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SHEET 1 OF 1

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 E-mail: sales@pasternack.com

SIZE A CAGE CODE 53919 DRAWN BY K.DANG ITEM NO. PE40001



# 12G SDI 75 Ohm 1.0/2.3 Male Connector Crimp/Solder Attachment for Belden 4694R, Belden 1694A, RG6

## RF Connectors Technical Data Sheet

**PE40003**

### Configuration

- 1.0/2.3 Male Connector
- 75 Ohms
- Straight Body Geometry
- Connector Interface Types: Belden 4694R, Belden 1694A, RG6

### Features

- Max. Operating Frequency 12 GHz
- Gold Plated Brass Contact
- 10 µin contact plating
- Meets SMPTE ST 2082-1
- Backwards Compatible with 2081-1
- 12Gb/s Transmission
- Cost Effective
- Designed for High Density Applications

### Applications

- General Purpose Test
- Custom Cable Assemblies
- 12G-SDI, Video, and Broadband UHDTV
- Broadband Internet Delivery
- Broadcast A/V
- 4K/8K Video Equipment
- Medical Equipment Requiring High Speed Video
- HD Cameras

### Description

Pasternack's PE40003 75 ohm 1.0/2.3 male connector with crimp/solder attachment for Belden 4694R, Belden 1694A and RG6 is part of our full line of RF components available for same-day shipping. Our 1.0/2.3 male connector operates up to a maximum frequency of 12 GHz. Pasternack's 12G-SDI 1.0/2.3 connector PE40003 utilizes 12Gb/s data transfer rates to enable high resolution uncompressed video signal transmission. These products offer 4K and Ultra-HD quality signals that meet SMPTE ST 2082-1. These 75 Ohm connectors are available in PCB edge-mount, straight, or right angle configurations, as well as coaxial connectors to be used in industry standard cable assemblies.

Our 75 ohm 1.0/2.3 male connector PE40003 datasheet specifications and drawing with dimensions are shown below in this PDF. Pasternack's broad catalog of RF, microwave and millimeter wave connectors allows designers to configure and customize their signal connections however they like. Whether the need is to provide an I/O for a board design, or simply create a custom cable assembly configuration, Pasternack has the right connector for the job. Pasternack can also expertly build your custom cable assemblies for you and ship same-day.

### Electrical Specifications

| Description     | Minimum | Typical | Maximum | Units |
|-----------------|---------|---------|---------|-------|
| Frequency Range | DC      |         | 12      | GHz   |

### Mechanical Specifications

| Size       |                    |
|------------|--------------------|
| Length     | 1.1 in [27.94 mm]  |
| Width/Dia. | 0.325 in [8.26 mm] |
| Height     | 0.325 in [8.26 mm] |

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [12G SDI 75 Ohm 1.0/2.3 Male Connector Crimp/Solder Attachment for Belden 4694R, Belden 1694A, RG6 PE40003](#)



12G SDI 75 Ohm 1.0/2.3 Male Connector Crimp/Solder Attachment for Belden 4694R, Belden 1694A, RG6

## RF Connectors Technical Data Sheet

**PE40003**

Weight 0.05 lbs [22.68 g]

### Material Specifications

| Description     | Material | Plating                   |
|-----------------|----------|---------------------------|
| Contact         | Brass    | Gold<br>10 µin            |
| Insulation      | PTFE     |                           |
| Outer Conductor | Brass    | Gold<br>3 µin             |
| Body            | Brass    | Nickel<br>100 µin minimum |
| Crimp Sleeve    | Brass    | Nickel                    |

### Environmental Specifications

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

### Plotted and Other Data

Notes:

12G SDI 75 Ohm 1.0/2.3 Male Connector Crimp/Solder Attachment for Belden 4694R, Belden 1694A, RG6 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: [12G SDI 75 Ohm 1.0/2.3 Male Connector Crimp/Solder Attachment for Belden 4694R, Belden 1694A, RG6 PE40003](#)

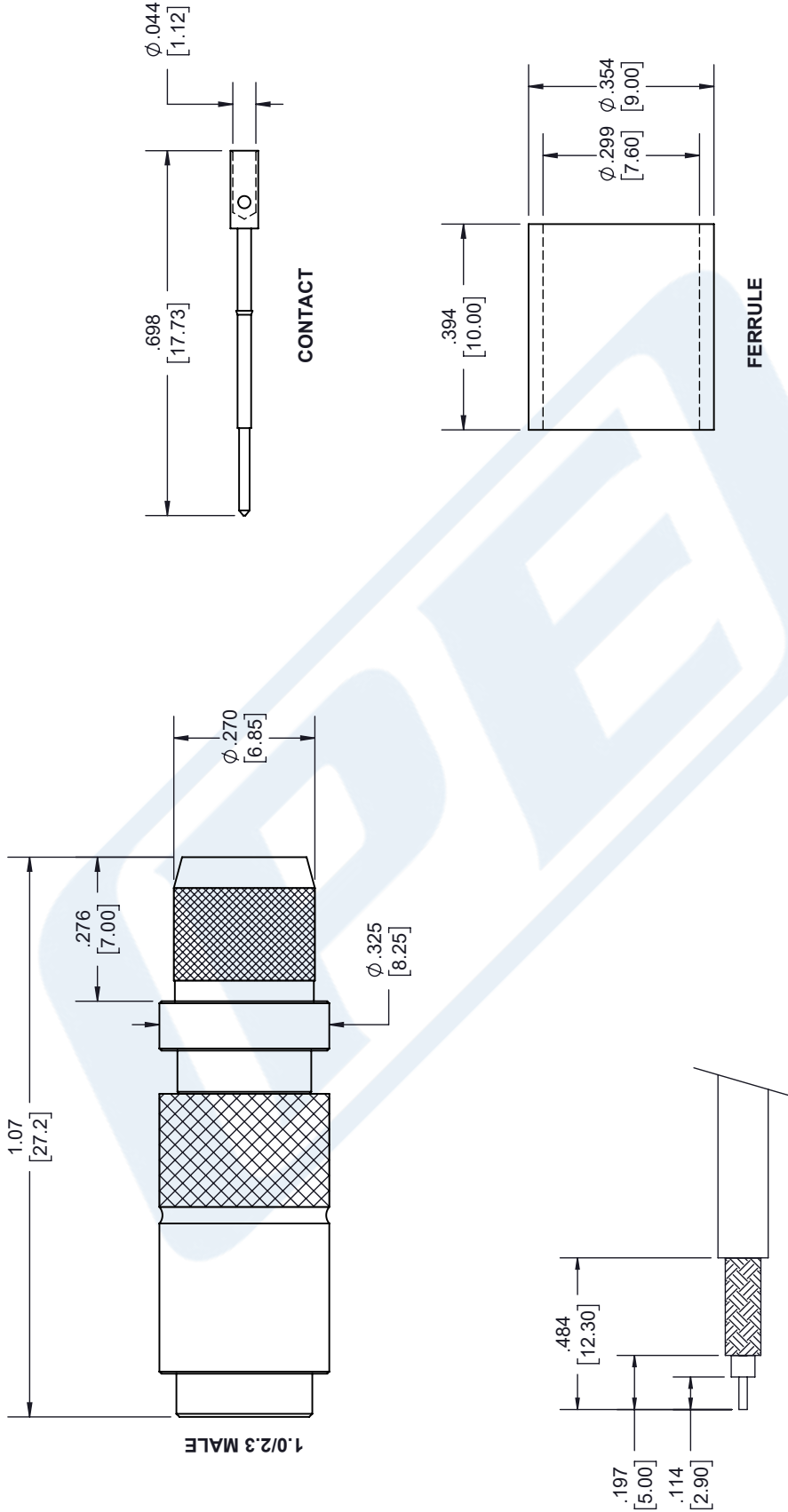
URL: <https://www.pasternack.com/1.0-2.3-male-belden-4694r-belden-1694a-rg6-connector-pe40003-p.aspx>

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# PE40003 CAD Drawing

12G SDI 75 Ohm 1.0/2.3 Male Connector Crimp/Solder Attachment for Belden 4694R, Belden 1694A, RG6

| REVISIONS |                 |            |            |
|-----------|-----------------|------------|------------|
| REV.      | DESCRIPTION     | DATE       | APPROVED   |
| A         | INITIAL RELEASE | 11/23/2021 | A. GANWANI |



### STRIPPING DIMENSIONS

- NOTES:
- CABLE ATTACHMENT:
    - OUTER: CRIMP.
    - INNER: SOLDER.
  - CRIMP SIZE REQUIRED:
    - FERRULE: .324 [8.23] HEX DIE.

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

TOLERANCES:

.X = ±.2 [5.08] FRACTIONS ± 1/32  
 .XX = ±.02 [ .51] ANGLES ± 1°  
 .XXX = ±.005 [ .13]

CABLE LENGTH (L), TOLERANCES:  
 L ≤ 12 [305] = +1 [25] / -0  
 12 [305] < L ≤ 60 [1524] = +2 [51] / -0  
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 120 [3048] < L ≤ 300 [7620] = +6 [152] / -0  
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## Low Loss Flexible LMR-100-FR Outdoor Rated Coax Cable Double Shielded with Black FRPE Jacket Fire Rated

### RF Cables Technical Data Sheet



LMR-100A-FR

### Times Microwave Systems Coax Cable Specification

#### Configuration

- Low Loss, Outdoor Flexible Cable
- 2 Shield(s)

#### Features

- CMR Riser Rated Coax
- Non-Halogen, Low Smoke FRPE Jacket
- Max Operating Frequency of 5.8 GHz
- Phase Velocity 66% VoP
- Max Operating Temperature +85°C
- Min Install Bend Radius of 0.25 inches

#### Applications

- In-Building Riser Runs
- Short Antenna Installs
- RF Test Systems
- General Purpose RF Interconnect
- Laboratory Applications

#### Description

LMR-100-FR Fire Rated version of the 100 series Low Loss Coax from Times Microwave is part of the large product offering by Pasternack of radio frequency coaxial cable types specifically stocked to be ready for same-day shipment. Pasternack LMR-100-FR coax cable is manufactured in a flexible design and has a 50 Ohm impedance. This low loss and CMR riser rated 50 Ohm coax cable LMR-100-FR is constructed with a 0.110 inch diameter and Black FRPE jacket.

LMR-100-FR flexible 50 Ohm coax cable with FRPE jacket is rated for a 5.8 GHz maximum operating frequency. This 50 Ohm 0.110 inch diameter and low loss fire rated coax cable is built with an aluminum double shield count and RF shielding of 90 dB. Times Microwave LMR-100-FR FRPE coax is constructed with PE dielectric and a maximum operating temperature of 85 degrees C. Pasternack's offering of LMR-100-FR coax cable provides specs for this wire on its RF coax cable LMR-100-FR datasheet.

LMR-100-FR cable is part of more than one million RF, microwave parts in stock at Pasternack. This Times Microwave low loss flexible LMR-100-FR coax cable is ready to buy and can be shipped worldwide. Pasternack also maintains a wide selection of other radio frequency coaxial cable types that ship same-day from our warehouse as with the rest of our other RF/microwave components.

\* LMR™ is a trademark of Times Microwave Systems.

#### Electrical Specifications

| Description                          | Minimum | Typical   | Maximum | Units      |
|--------------------------------------|---------|-----------|---------|------------|
| Frequency Range                      | DC      |           | 5.8     | GHz        |
| Impedance                            |         | 50        |         | Ohms       |
| Velocity of Propagation              |         | 66        |         | %          |
| Time Delay                           |         | 1.54 5.05 |         | ns/ft ns/m |
| Shielding Effectiveness              | 90      |           |         | dB         |
| Dielectric Withstanding Voltage (DC) |         |           | 500     | Vdc        |

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [Low Loss Flexible LMR-100-FR Outdoor Rated Coax Cable Double Shielded with Black FRPE Jacket Fire Rated LMR-100A-FR](#)



## Low Loss Flexible LMR-100-FR Outdoor Rated Coax Cable Double Shielded with Black FRPE Jacket Fire Rated

### RF Cables Technical Data Sheet



LMR-100A-FR

|                               |               |              |
|-------------------------------|---------------|--------------|
| Jacket Spark                  | 2,000         | Vrms         |
| Inner Conductor DC Resistance | 81            | Ohms/1000ft  |
| Outer Conductor DC Resistance | 9.5           | Ohms/1000ft  |
| Nominal Capacitance           | 30.8 [101.05] | pF/ft [pF/m] |
| Nominal Inductance            | 0.077 [0.25]  | uH/ft [uH/m] |
| Input Power (Peak)            | 600           | Watts        |

#### Performance by Frequency Band

| Description           | F1    | F2   | F3    | F4    | F5   | Units    |
|-----------------------|-------|------|-------|-------|------|----------|
| Frequency             | 50    | 150  | 220   | 450   | 900  | MHz      |
| Attenuation, Typ      | 5.1   | 8.9  | 10.9  | 15.8  | 22.8 | dB/100ft |
|                       | 16.73 | 29.2 | 35.76 | 51.84 | 74.8 | dB/100m  |
| Input Power (CW), Max | 180   | 100  | 83    | 57    | 39   | Watts    |

| Description           | F6    | F7     | F8     | F9     | F10   | Units    |
|-----------------------|-------|--------|--------|--------|-------|----------|
| Frequency             | 1.5   | 1.8    | 2      | 2.5    | 5.8   | GHz      |
| Attenuation, Typ      | 30.1  | 33.2   | 35.2   | 39.8   | 64.1  | dB/100ft |
|                       | 98.75 | 108.92 | 115.49 | 130.58 | 210.3 | dB/100m  |
| Input Power (CW), Max | 29    | 27     | 25     | 22     | 13    | Watts    |

#### Mechanical Specifications

|                                 |                           |
|---------------------------------|---------------------------|
| Diameter                        | 0.11 in [2.79 mm]         |
| Weight                          | 0.0092 lbs/ft [0.01 Kg/m] |
| Min. Bend Radius (Installation) | 0.25 in [6.35 mm]         |
| Min. Bend Radius (Repeated)     | 1 in [25.4 mm]            |
| Bending Moment                  | 0.1 lbs-ft [0.14 N-m]     |
| Tensile Strength                | 15 lbs [6.8 kg]           |
| Flat Plate Crush                | 10 lbs/in [0.18 Kg/mm]    |

#### Construction Specifications

| Description     | Material and Plating | Diameter           |
|-----------------|----------------------|--------------------|
| Inner Conductor | Copper, 1 Strand     | 0.018 in [0.46 mm] |

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [Low Loss Flexible LMR-100-FR Outdoor Rated Coax Cable Double Shielded with Black FRPE Jacket Fire Rated LMR-100A-FR](#)



## Low Loss Flexible LMR-100-FR Outdoor Rated Coax Cable Double Shielded with Black FRPE Jacket Fire Rated

### RF Cables Technical Data Sheet



LMR-100A-FR

|                |               |                   |
|----------------|---------------|-------------------|
| Conductor Type | Solid         |                   |
| Dielectric     | PE            | 0.06 in [1.52 mm] |
| First Shield   | Aluminum Tape | [ ]               |
| Second Shield  | Tinned Copper | [ ]               |
| Jacket         | FRPE, Black   | 0.11 in [2.79 mm] |

#### Environmental Specifications

##### Temperature

|                    |                  |
|--------------------|------------------|
| Operating Range    | -40 to +85 deg C |
| Installation Range | -40 to +85 deg C |
| Storage Range      | -70 to +85 deg C |

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

#### Plotted and Other Data

Notes:

Low Loss Flexible LMR-100-FR Outdoor Rated Coax Cable Double Shielded with Black FRPE Jacket Fire Rated 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.

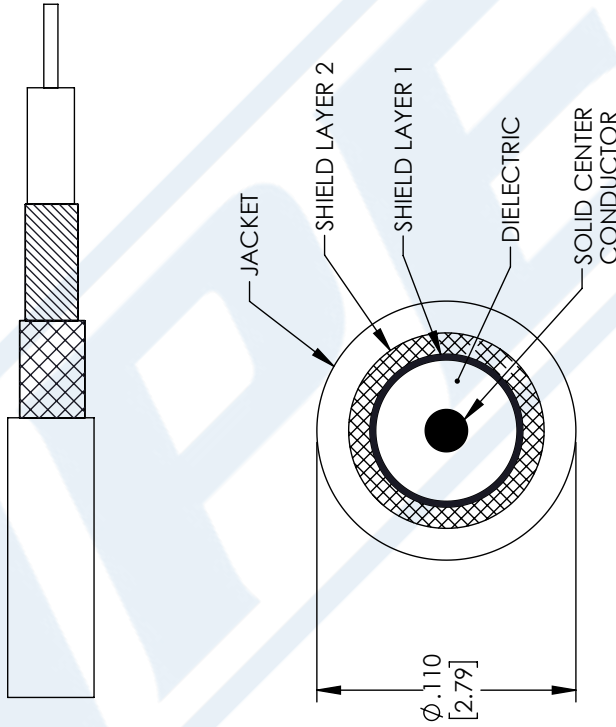
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URL: <https://www.pasternack.com/low-loss-flexible-lmr100fr-frpe-jacket-aluminum-tape-over-tinned-copper-outer-conductor-double-shielded-lmr-100a-fr-p.aspx>

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**TIMES** MICROWAVE SYSTEMS **LMR-100A-FR CAD Drawing**  
 Low Loss Flexible LMR-100-FR Outdoor Rated Coax Cable  
 Double Shielded with Black FRPE Jacket Fire Rated

| REVISIONS |                 |            |
|-----------|-----------------|------------|
| REV.      | DESCRIPTION     | DATE       |
| A         | INITIAL RELEASE | 06-04-2021 |
|           |                 | APPROVED   |
|           |                 | SELLIS     |



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**TOLERANCES:**

.X = ±.2 [ .008]    FRACTIONS ± 1/32  
 .XX = ±.02 [ .51]    ANGLES ± 1°  
 .XXX = ±.005 [ .13]

**CABLE LENGTH (L) TOLERANCES:**

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

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SIZE: A    CAGE CODE: 53919    DRAWN BY: MVEERAPPAN    ITEM NO.: LMR-100A-FR

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SCALE: N/A

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