



SMP Female Connector Solder Attachment for PE-SR405AL,  
PE-SR405FL, PE-SR405FLJ, PE-SR405TN, RG405

RF Connectors  
Technical Data Sheet

PE44786

**Configuration**

- SMP Female Connector
- MIL-STD-348
- 50 Ohms
- Straight Body Geometry
- Connector Interface Types: PE-SR405AL, PE-SR-405FL, PE-SR405FLJ, PE-SR405TN, RG405

**Features**

- Max. Operating Frequency 18 GHz
- Excellent VSWR of 1.2:1
- Gold Plated Beryllium Copper Contact
- Contact plating according to MIL-G-45204
- Blind Mate Connector

**Applications**

- General Purpose Test
- Custom Cable Assemblies

**Description**

Pasternack's PE44786 SMP female connector with solder/solder attachment for PE-SR405AL, PE-SR405FL, PE-SR405FLJ, PE-SR405TN and RG405 is part of our full line of RF components available for same-day shipping. Our SMP female connector operates up to a maximum frequency of 18 GHz and offers excellent VSWR of 1.2:1. The Pasternack blind mate connector is ideal for applications where direct visual or tactile access to the connection point is not possible, for example, when two circuit boards need to be mated.

Our SMP female connector PE44786 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      |         | 18      | GHz   |
| VSWR            |         |         | 1.2:1   |       |

**Mechanical Specifications**

|             |                    |
|-------------|--------------------|
| <b>Size</b> |                    |
| Length      | 0.25 in [6.35 mm]  |
| Width/Dia.  | 0.134 in [3.40 mm] |
| Weight      | 0.006 lbs [2.72 g] |

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [SMP Female Connector Solder Attachment for PE-SR405AL, PE-SR405FL, PE-SR405FLJ, PE-SR405TN, RG405 PE44786](#)



SMP Female Connector Solder Attachment for PE-SR405AL,  
PE-SR405FL, PE-SR405FLJ, PE-SR405TN, RG405

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PE44786

**Material Specifications**

| Description | Material         | Plating             |
|-------------|------------------|---------------------|
| Contact     | Beryllium Copper | Gold<br>MIL-G-45204 |
| Insulation  | PTFE             |                     |
| Body        | Beryllium Copper | Gold<br>MIL-G-45204 |

**Environmental Specifications**

**Temperature**

Operating Range -65 to +165 deg C

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

**Plotted and Other Data**

Notes:

SMP Female Connector Solder Attachment for PE-SR405AL, PE-SR405FL, PE-SR405FLJ, PE-SR405TN, RG405 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: [SMP Female Connector Solder Attachment for PE-SR405AL, PE-SR405FL, PE-SR405FLJ, PE-SR405TN, RG405 PE44786](#)

URL: <https://www.pasternack.com/smp-female-standard-pe-p086-pe-p086ll-connector-pe44786-p.aspx>

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# PE44786 CAD Drawing

SMP Female Connector Solder Attachment for PE-SR405AL, PE-SR405FL, PE-SR405FLJ, PE-SR405TN, RG405



BODY

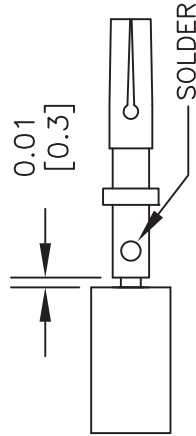
CONTACT

### ASSEMBLY PROCEDURES

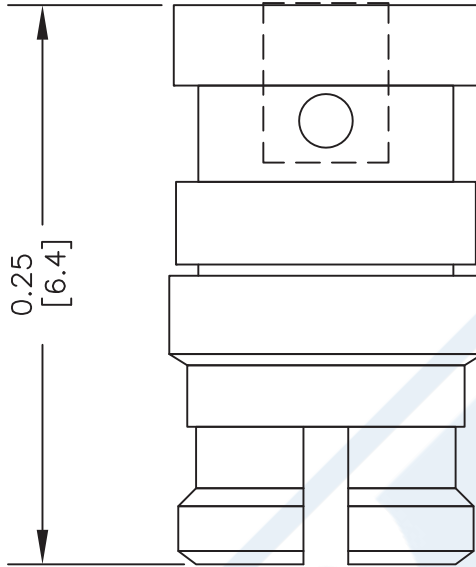
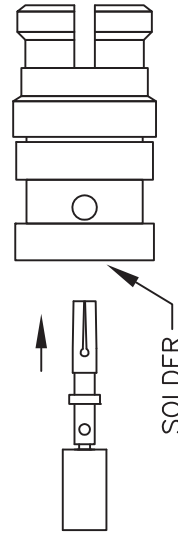
1. STRIP CABLE AS SHOWN. DO NOT NICK CENTER CONDUCTOR.



2. PLACE CONTACT OVER CENTER CONDUCTOR AS SHOWN. SOLDER CONTACT TO CENTER CONDUCTOR AS SHOWN.



3. INSERT CABLE AND CONTACT INTO CONNECTOR BODY UNTIL FULLY ENGAGED. SOLDER BODY TO CABLE.



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**Phone:** (949) 261-1920 | **Fax:** (949) 261-7451  
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DWG TITLE

**PE44786**

FSCM NO. 53919

NOTES:  
 1. UNLESS OTHERWISE SPECIFIED ALL DIMENSIONS ARE NOMINAL.  
 2. ALL SPECIFICATIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE AT ANY TIME.  
 3. DIMENSIONS ARE IN INCHES [mm].  
 4. FITS MIL-C-17 AND EQUIVALENT CABLES.

CAD FILE 020613

SCALE N/A

SIZE A

2233



## SMA Male Connector Solder Attachment for RG405, RG405 Tinned

### RF Connectors Technical Data Sheet

PE45481

#### Configuration

- SMA Male Connector
- 50 Ohms
- Straight Body Geometry
- RG405, RG405 Tinned Interface Type
- Solder Attachment

#### Features

- Max. Operating Frequency 26.5 GHz
- Excellent VSWR of 1.14:1
- Gold Plated Beryllium Copper Contact
- Contact plating according to ASTM-B488

#### Applications

- General Purpose Test
- Custom Cable Assemblies

#### Description

Pasternack's PE45481 SMA male connector with solder attachment for RG405 and RG405 Tinned is part of our full line of RF components available for same-day shipping. Our SMA male connector operates up to a maximum frequency of 26.5 GHz and offers excellent VSWR of 1.14:1.

Our SMA male connector PE45481 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      |         | 26.5    | GHz   |
| VSWR                                 |         |         | 1.14:1  |       |
| Dielectric Withstanding Voltage (AC) |         |         | 1,000   | Vrms  |
| High Potential Voltage               |         |         | 670     | Vrms  |
| Corona Discharge                     |         |         | 250     | Vrms  |
| Insulation Resistance                | 5,000   |         |         | MOhms |
| RF Leakage                           | -90     |         |         | dB    |

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [SMA Male Connector Solder Attachment for RG405, RG405 Tinned PE45481](#)



## SMA Male Connector Solder Attachment for RG405, RG405 Tinned

### RF Connectors Technical Data Sheet

PE45481

#### Performance by Frequency

| Description     | F1       | F2         | F3 | F4 | F5 | Units |
|-----------------|----------|------------|----|----|----|-------|
| Frequency Range | DC to 18 | 18 to 16.5 |    |    |    | GHz   |
| VSWR, Max       | 1.11:1   | 1.14:1     |    |    |    |       |

Electrical Specification Notes:  
Insertion Loss = 0.04\*SQRT(Fghz) dB

#### Mechanical Specifications

Mating Cycles 500 Cycles  
Mating Torque 7 to 10 in-lbs [0.79 to 1.13 Nm]

#### Material Specifications

| Description  | Material         | Plating           |
|--------------|------------------|-------------------|
| Contact      | Beryllium Copper | Gold<br>ASTM-B488 |
| Insulation   | PTFE             |                   |
| Body         | Beryllium Copper | Gold<br>ASTM-B488 |
| Coupling Nut | Steel            |                   |
| Gasket       | Silicone Rubber  |                   |

#### Environmental Specifications

**Temperature**  
Operating Range -65 to +165 deg C  
**Shock** MIL-STD-202, Method 213, Condition I  
**Vibration** MIL-STD-202, Method 204, Condition D  
**Thermal Shock** MIL-STD-202, Method 107, Condition B

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

#### Plotted and Other Data

Notes:

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [SMA Male Connector Solder Attachment for RG405, RG405 Tinned PE45481](#)

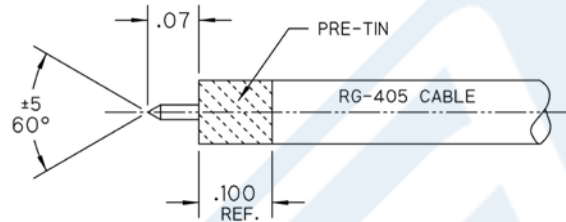


SMA Male Connector Solder Attachment  
for RG405, RG405 Tinned

RF Connectors  
Technical Data Sheet

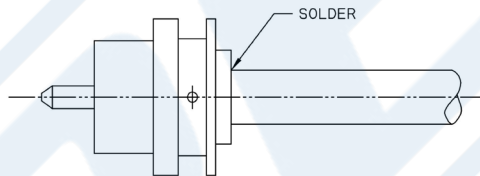
PE45481

Assembly Instruction



**STEP 1:**

- TRIM CABLE TO EXPOSE CENTER CONDUCTOR AS SHOWN.
- PRE-TIN CABLE OUTER JACKET OVER APPROX. LENGTH SHOWN.

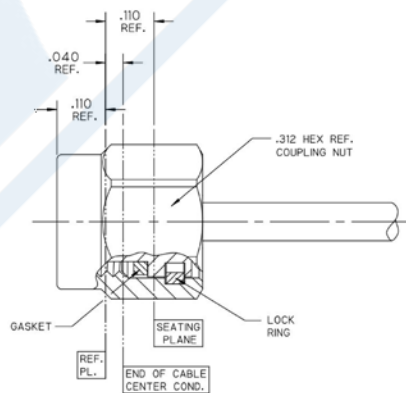


**STEP 2:**

- INSERT CABLE INTO CONNECTOR BODY UNTIL CENTER CONDUCTOR PLUGS IN AND CABLE FULLY SEATS IN CONNECTOR BORE.
- SOLDER CABLE TO BODY WHERE SHOWN.

**STEP 3:**

- INSTALL LOCK RING, GASKET, AND COUPLING NUT ONTO MAIN BODY USING APPROPRIATE SMA ASSEMBLY TOOLS.



Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [SMA Male Connector Solder Attachment for RG405, RG405 Tinned PE45481](#)



## SMA Male Connector Solder Attachment for RG405, RG405 Tinned

### RF Connectors Technical Data Sheet

PE45481

SMA Male Connector Solder Attachment for RG405, RG405 Tinned 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.

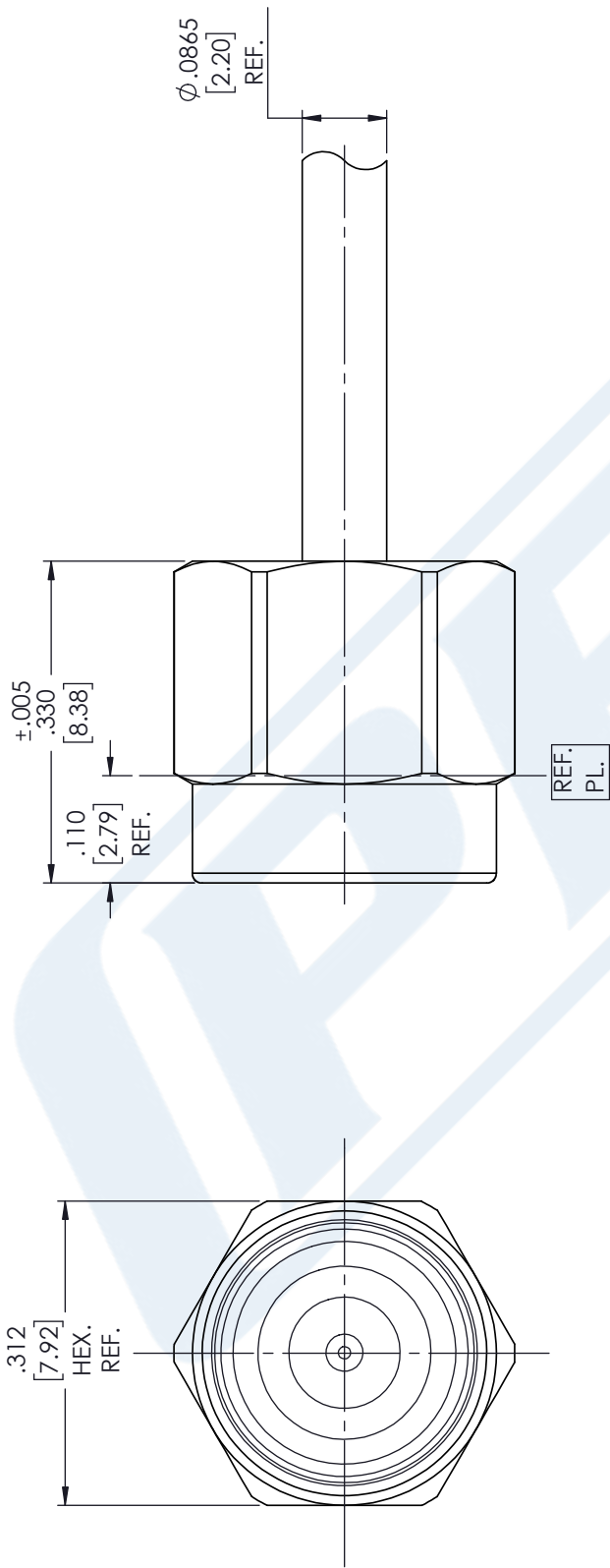
Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [SMA Male Connector Solder Attachment for RG405, RG405 Tinned PE45481](https://www.pasternack.com/sma-male-rg405-rg405-tinned-connector-pe45481-p.aspx)

URL: <https://www.pasternack.com/sma-male-rg405-rg405-tinned-connector-pe45481-p.aspx>

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# PE45481 CAD Drawing

SMA Male Connector Solder Attachment for RG405, RG405 Tinned



| STANDARD TOLERANCES |        |
|---------------------|--------|
| .X                  | ±0.2   |
| .XX                 | ±0.01  |
| .XXX                | ±0.005 |

\*STANDARD TOLERANCES APPLY ONLY TO DIMENSIONS IN INCHES NOTES: DISTANCE FROM END OF CABLE CENTER COND. TO REF. PL. IS .040



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|  |  |                      |  |              |           |        |
|--|--|----------------------|--|--------------|-----------|--------|
| DWG TITLE<br>PE45481   |  | CAD FILE<br>07/26/18 |  | SCALE<br>N/A | SIZE<br>A | CN2379 |
| NOTES:<br>1. UNLESS OTHERWISE SPECIFIED ALL DIMENSIONS ARE NOMINAL.<br>2. ALL SPECIFICATIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE AT ANY TIME<br>3. DIMENSIONS ARE IN INCHES [mm]. |  |                      |  |              |           |        |
| CAGE CODE<br>53919   |  |                      |  |              |           |        |



## Formable 086 Semirigid Coax Cable with Tinned Braid Outer Conductor and Black FEP Jacket

### RF Cables Technical Data Sheet

PE-SR405FLJ

#### Configuration

- Formable Cable
- 1 Shield(s)

#### Features

- Dimensionally the same as standard solid outer conductor semi-rigid coax
- Standard semi-rigid connectors can be used
- Cable is hand formable and does not require special tools to bend
- Connectors are easily soldered to Tin soaked outer conductor
- Cable can be formed more than once without damage to outer conductor
- High RF Shielding >100 dB

#### Description

Formable semi-rigid coax is a hand formable version of standard semi-rigid that does not require complicated and costly pre-formed cable assemblies. Because the dimensions and electrical characteristics are so closely matched to semi-rigid coax, standard semi-rigid connectors can be used. The tin soaked copper braid outer shield provides excellent RF shielding. FEP Jacket reduces the chance of shorting exposed contacts or circuit conductors.

#### Electrical Specifications

| Description                   | Minimum | Typical     | Maximum | Units        |
|-------------------------------|---------|-------------|---------|--------------|
| Frequency Range               | DC      |             | 61      | GHz          |
| Impedance                     |         | 50          |         | Ohms         |
| Velocity of Propagation       |         | 69.5        |         | %            |
| Time Delay                    |         | 1.43 [4.69] |         | ns/ft [ns/m] |
| Shielding Effectiveness       | 100     |             |         | dB           |
| Operating Voltage (AC)        |         |             | 1,500   | Vrms         |
| Inner Conductor DC Resistance |         |             | 65.7    | Ohms/1000ft  |
| Outer Conductor DC Resistance |         |             | 10.2    | Ohms/1000ft  |
| Nominal Capacitance           |         | 29 [95.14]  |         | pF/ft [pF/m] |

#### Performance by Frequency Band

| Description           | F1    | F2    | F3     | F4    | F5    | Units    |
|-----------------------|-------|-------|--------|-------|-------|----------|
| Frequency             | 0.5   | 1     | 5      | 10    | 20    | GHz      |
| Attenuation, Typ      | 15    | 22.5  | 54.9   | 81.2  | 120   | dB/100ft |
|                       | 49.21 | 73.82 | 180.12 | 266.4 | 393.7 | dB/100m  |
| Input Power (CW), Max | 173.5 | 121.5 | 52.2   | 35.8  | 24.3  | Watts    |

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [Formable PE-SR405FLJ Coax Cable with Outer Conductor and Black FEP Jacket PE-SR-405FLJ](#)



## Formable 086 Semirigid Coax Cable with Tinned Braid Outer Conductor and Black FEP Jacket

### RF Cables Technical Data Sheet

PE-SR405FLJ

#### Mechanical Specifications

|                                 |                          |
|---------------------------------|--------------------------|
| Diameter                        | 0.105 in [2.67 mm]       |
| Weight                          | 0.015 lbs/ft [0.02 Kg/m] |
| Min. Bend Radius (Installation) | 0.5 in [12.7 mm]         |
| Min. Bend Radius (Repeated)     | 0.787 in [19.99 mm]      |

#### Construction Specifications

| Description     | Material and Plating                 | Diameter           |
|-----------------|--------------------------------------|--------------------|
| Inner Conductor | Copper Clad Steel, Silver, 1 Strands | 0.02 in [0.51 mm]  |
| Conductor Type  | Solid                                |                    |
| Dielectric      | PTFE                                 | 0.062 in [1.57 mm] |
| Outer Conductor | Tinned Copper Composite Braid        | 0.085 in [2.16 mm] |
| Jacket          | FEP, Black                           | 0.105 in [2.67 mm] |

#### Environmental Specifications

##### Temperature

|                 |                   |
|-----------------|-------------------|
| Operating Range | -55 to +125 deg C |
|-----------------|-------------------|

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

#### Plotted and Other Data

Notes:

Formable 086 Semirigid Coax Cable with Tinned Braid Outer Conductor and Black FEP Jacket 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: [Formable PE-SR405FLJ Coax Cable with Outer Conductor and Black FEP Jacket PE-SR405FLJ](#)

URL: <https://www.pasternack.com/50-ohm-formable-086-semirigid-tinned-braid-outer-conductor-fep-jacket-black-pe-sr405flj-p.aspx>

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# PE-SR405FLJ CAD Drawing

Formable 086 Semirigid Coax Cable with Tinned Braid  
Outer Conductor and Black FEP Jacket



NOTES:  
1. UNLESS OTHERWISE SPECIFIED ALL DIMENSIONS ARE NOMINAL.  
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3. DIMENSIONS ARE IN INCHES [mm].

DWG TITLE  
**PE-SR405FLJ**

CAGE CODE 53919

CAD FILE 062817 SCALE N/A SIZE A 2233

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