PASTERNACK®
THE ENGINEER'S RF SOURCE

2.4mm Male Connector Solder Attachment for PE-SR405AL, RG405, PE-SR405FLJ

RF Connectors Technical Data Sheet PE45414

Configuration

- 2.4mm Male Connector
- 50 Ohms
- Straight Body Geometry
- PE-SR405AL, RG405, PE-SR405FLJ Interface Type
- Solder Attachment
- 5/16 inch Hex

Features

- Max. Operating Frequency 50 GHz
- Excellent VSWR of 1.16:1
- Gold over Nickel Plated Beryllium Copper Contact
- 50 µin minimum contact plating

Applications

- General Purpose Test
- Custom Cable Assemblies

Description

Pasternack's PE45414 2.4mm male connector with solder attachment for PE-SR405AL, RG405 and PE-SR405FLJ is part of our full line of RF components available for same-day shipping. Our 2.4mm male connector operates up to a maximum frequency of 50 GHz and offers excellent VSWR of 1.16:1.

Our 2.4mm male connector PE45414 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		50	GHz
VSWR			1.16:1	
Insertion Loss			0.283	dB
Operating Voltage (AC)			335	Vrms
Dielectric Withstanding Voltage (AC)			1,000	Vrms
High Potential Voltage 5 to 7.5 MHz			670	Vrms
Corona Discharge at 70,000 ft			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: 2.4mm Male Connector Solder Attachment for PE-SR405AL, RG405, PE-SR405FLJ PE45414

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RF Connectors Technical Data Sheet PE45414

Performance by Frequency

Description	F1	F2	F3	F4	F5	Units
Frequency Range	DC to 18	18 to 26.5	26.5 to 40	40 to 50		GHz
VSWR, Max	1.1:1	1.12:1	1.14:1	1.16:1		

Electrical Specification Notes:
Insertion loss: 0.04 x sqrt(fGHz) dB.

Mechanical Specifications

Size

Length	0.58 in [14.73 mm]
Width/Dia.	0.312 in [7.92 mm]
Height	0.35 in [8.89 mm]
Mating Cycles	500 Cycles
Mating Torque	8 to 10 in-lbs [0.90 to 1.13 Nm]

Material Specifications

Description	Material	Plating
Contact	Beryllium Copper	Gold over Nickel 50 µin minimum
Insulation	PEI	
Body	Beryllium Copper	Gold over Nickel 50 µin minimum
Coupling Nut	Passivated Stainless Steel	ASTM-A582
Retaining Ring	Beryllium Copper	
Gasket	Silicone Rubber	

Environmental Specifications

Temperature

Operating Range	-65 to +150 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
Salt Spray	MIL-STD-202, Method 101, Condition B, 5% salt solution

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2.4mm Male Connector Solder Attachment for PE-SR405AL, RG405, PE-SR405FLJ

Compliance Certifications (see product page for current document)

Plotted and Other Data

Notes:

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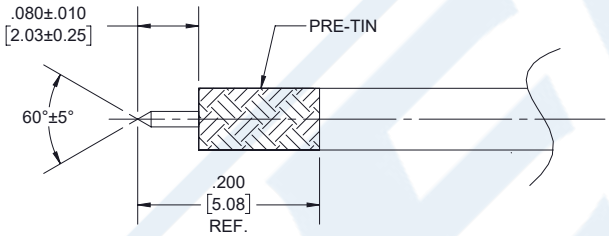
2.4mm Male Connector Solder Attachment for PE-SR405AL, RG405, PE-SR405FLJ

Assembly Instruction

Assembly Instructions



STEP 1:

- PRE-TIN CABLE OUTER JACKET OVER APPROX. LENGTH SHOWN.
- TRIM CABLE TO EXPOSE CENTER CONDUCTOR AS SHOWN.
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STEP 2:

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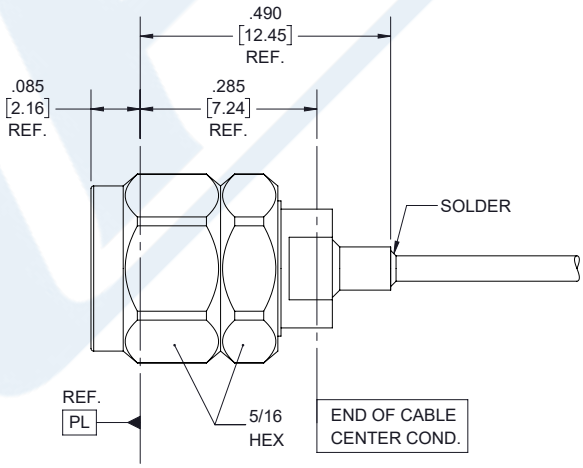

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2.4mm Male Connector Solder Attachment for PE-SR405AL, RG405, PE-SR405FLJ

RF Connectors Technical Data Sheet PE45414

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URL: https://www.pasternack.com/2.4mm-male-pe-sr405al-rg405-pe-sr405flj-connector-pe45414-p.aspx

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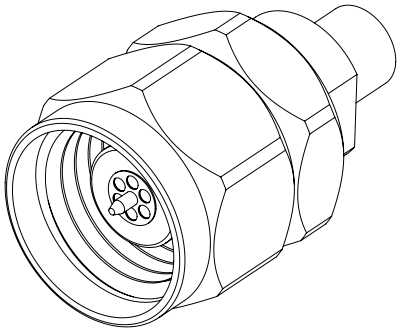
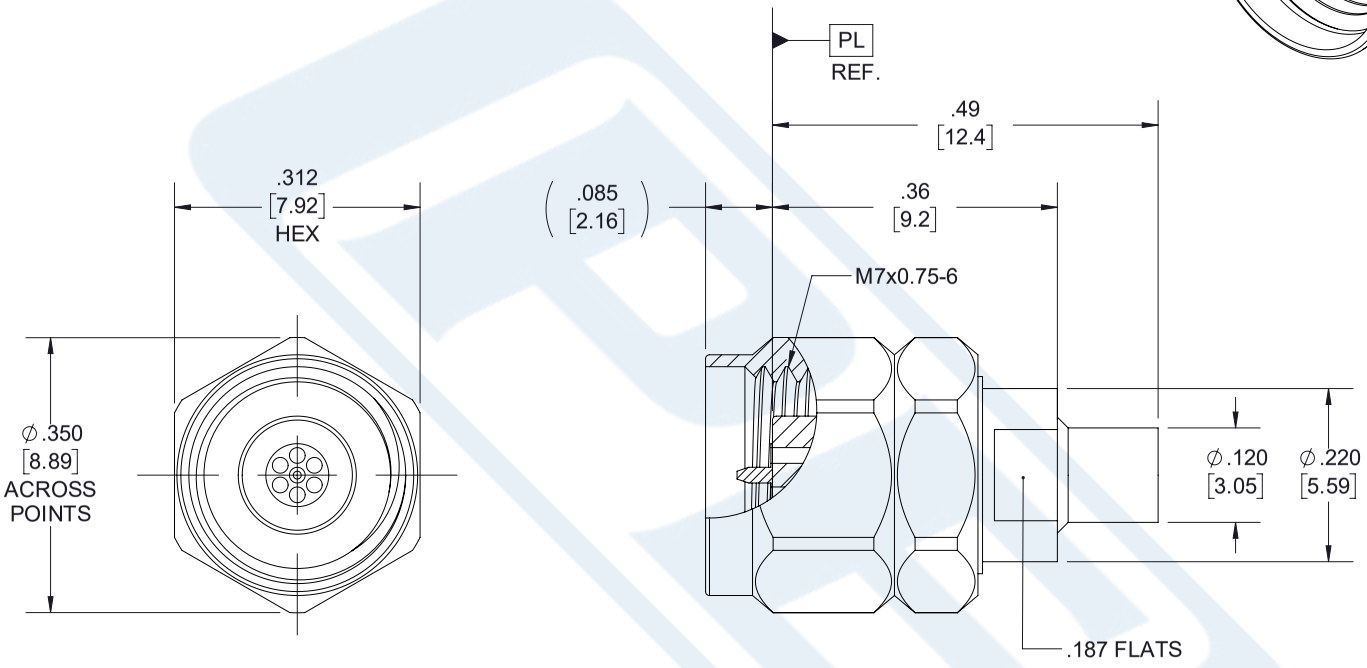
PE45414 CAD Drawing

2.4mm Male Connector Solder Attachment for PE-SR405AL, RG405, PE-SR405FLJ





2.4mm PLUG

STANDARD TOLERANCES	
.X	±0.2
.XX	±0.02
.XXX	±0.005

*STANDARD TOLERANCES APPLY ONLY TO DIMENSIONS IN INCHES

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DWG TITLE

PE45414

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CAGE CODE 53919	CAD FILE 110217	SCALE N/A	SIZE A	7361

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2.4mm Male Connector Solder Attachment for PE-SR405AL, RG405, PE-SR405FLJ

RF Connectors Technical Data Sheet PE45414

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- 50 Ohms
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- 5/16 inch Hex

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RF Leakage	-90			dB

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2.4mm Male Connector Solder Attachment for PE-SR405AL, RG405, PE-SR405FLJ

Compliance Certifications (see product page for current document)

Plotted and Other Data

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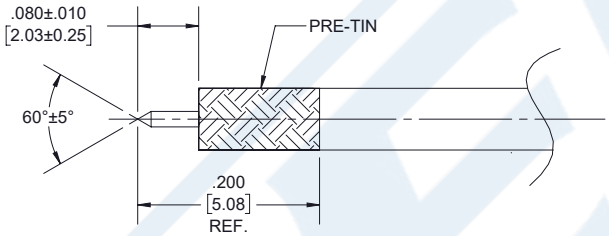

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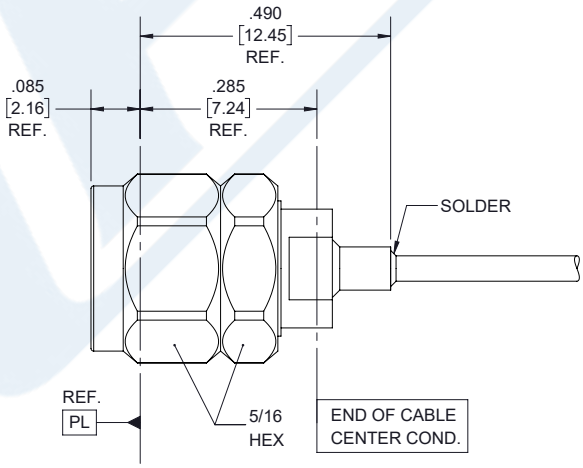

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RF Connectors Technical Data Sheet PE45414

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URL: https://www.pasternack.com/2.4mm-male-pe-sr405al-rg405-pe-sr405flj-connector-pe45414-p.aspx

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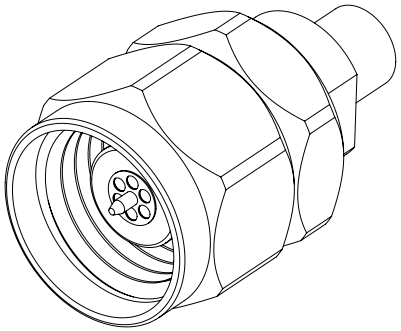
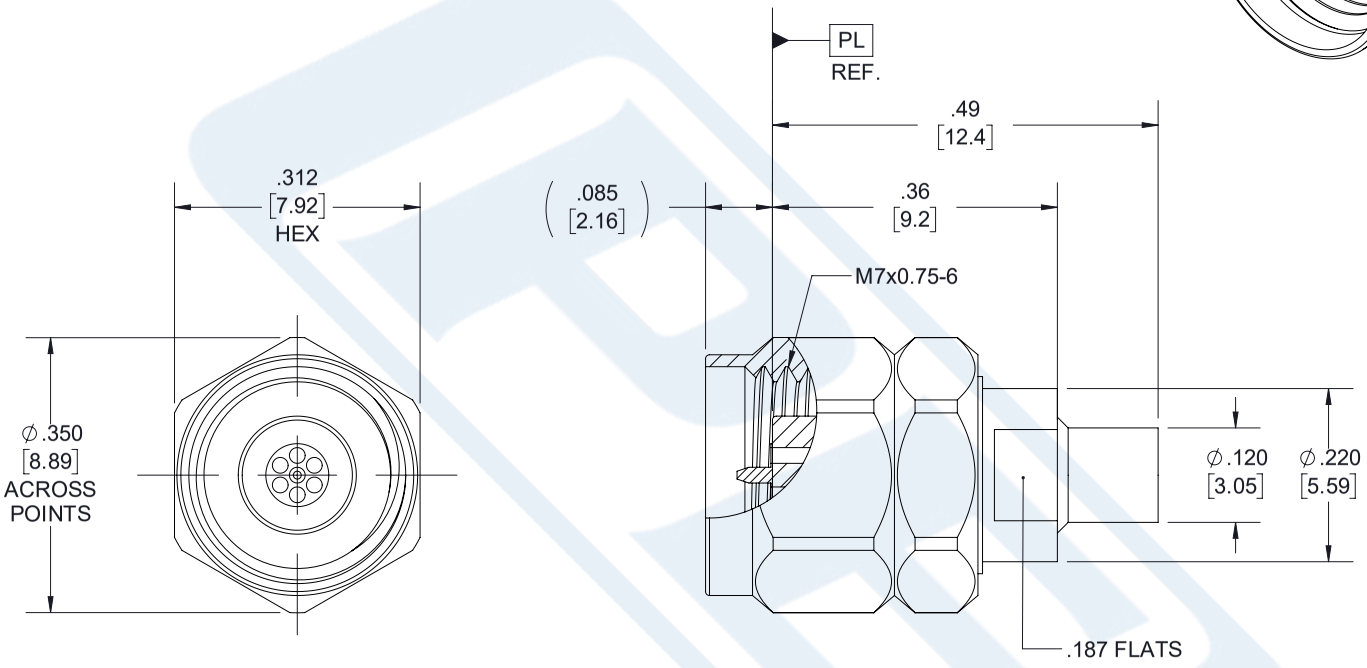
PE45414 CAD Drawing

2.4mm Male Connector Solder Attachment for PE-SR405AL, RG405, PE-SR405FLJ





2.4mm PLUG

STANDARD TOLERANCES	
.X	±0.2
.XX	±0.02
.XXX	±0.005

*STANDARD TOLERANCES APPLY ONLY TO DIMENSIONS IN INCHES

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DWG TITLE

PE45414

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CAGE CODE 53919	CAD FILE 110217	SCALE N/A	SIZE A	7361

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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

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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.

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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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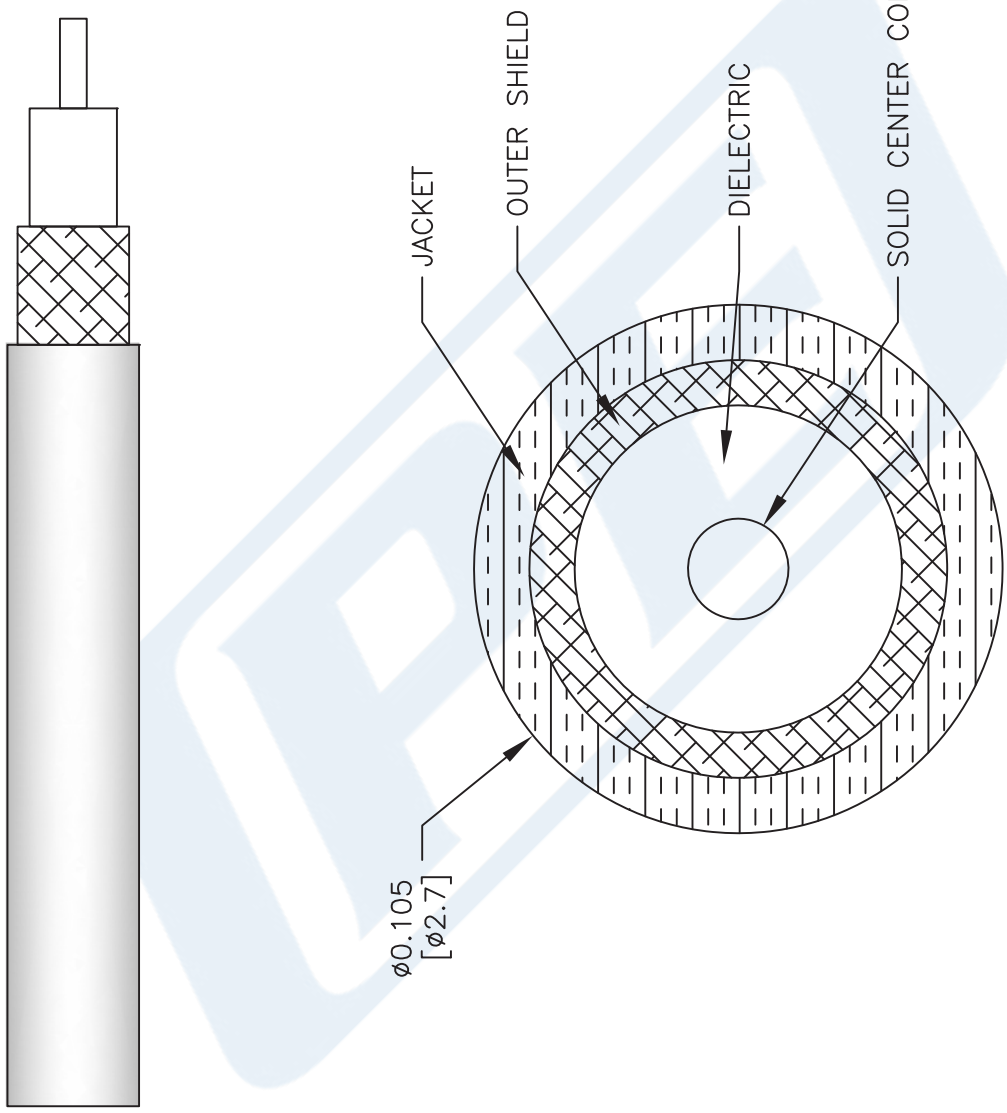
PE-SR405FLJ CAD Drawing

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



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DWG TITLE **PE-SR405FLJ**

CAD FILE 062817 | SCALE N/A | SIZE A | 2233

CAGE CODE 53919

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