

Low PIM 7/16 DIN Male to 7/16 DIN Male Plenum
Cable SPP-250-LLPL Coax in 36 Inch



FMCA1305-36

Configuration

- Connector 1: 7/16 DIN Male
- Connector 2: 7/16 DIN Male
- Cable Type: SPP-250-LLPL
- Coax Flex Type: Corrugated

Features

- Max Frequency 6 GHz
- Low PIM: -160 dBc Max
- Shielding Effectivity > 100 dB
- 76% Phase Velocity
- FEP Jacket
- Low PIM < -160 dBc
- IP67 (Mated)
- Low Loss with Excellent VSWR
- PIM Test Results Marked on Each Cable
- UL910 Plenum Rated Cable
- Extremely Flexible and Lightweight



Applications

- General Purpose
- Laboratory Use
- Low PIM Applications
- DAS
- Mobile Networks
- In-Building Wireless
- Small Cells
- PIM Testing

Description

Low PIM 7/16 DIN male to 7/16 DIN male part number FMCA1305 from Fairview Microwave is in-stock and ships same day. This low PIM 7/16 DIN male to 7/16 DIN male plenum coax cable assembly offers low PIM performance to support Distributed Antenna Systems (DAS), in-building wireless and other emerging mobile communication networks. The SPP-250-LLPL coax cable carries a UL910 rating for plenum installations. Each low PIM 7/16 DIN male to 7/16 DIN male cable assembly is marked with its actual Passive Intermodulation (PIM) test result.

Fairview's FMCA1305 datasheet specifications and outline drawing are shown below in this PDF. Our extensive offering of low PIM cable assemblies, low-PIM adapters and other RF products support multi-carrier system prototype, cable installations and PIM testing applications.

Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Frequency Range	DC		6	GHz
VSWR			1.35:1	
Velocity of Propagation		76		%
RF Shielding	100			dB
Passive Intermodulation IM3 (2x43dBm Tones) at 850 MHz or 1900 MHz		-165	-160	dBc
Capacitance		26.7 [87.6]		pF/ft [pF/m]

Low PIM 7/16 DIN Male to 7/16 DIN Male Plenum
Cable SPP-250-LLPL Coax in 36 Inch



FMCA1305-36

Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Operating Voltage (AC)			750	Vrms

Specifications by Frequency

Description	F1	F2	F3	F4	F5	Units
Frequency	0.5	1	2	4	6	GHz
Insertion Loss (Max.)	0.52	0.57	0.64	0.76	0.85	dB
VSWR (Max.)	1.25:1	1.25:1	1.25:1	1.35:1	1.35:1	
Power Handling (Max.)	850	507	460	370	250	Watts

Electrical Specification Notes:

Values at 25°C, sea level

PIM test results vary between cables

The Insertion Loss data above is based on the performance specifications of the coax used in this assembly. The Insertion Loss includes an estimated loss of 0.4dB of connector loss.

Mechanical Specifications

Cable Assembly

Length	36 in [914.4 mm]
Width/Diameter	0.28 in [7.11 mm]
Weight	0.542 lbs [245.85 g]

Cable

Cable Type	SPP-250-LLPL
Inner Conductor Type	Solid
Inner Conductor Material and Plating	Copper, Bare
Dielectric Type	PTFE
Number of Shields	1
Shield Layer 1	Annular Corrugated Copper Tube
Outer Conductor Diameter	0.25 in [6.35 mm]
Jacket Material	FEP
Jacket Diameter	0.28 in [7.11 mm]
One Time Minimum Bend Radius	1.5 in [38.1 mm]

Low PIM 7/16 DIN Male to 7/16 DIN Male Plenum
Cable SPP-250-LLPL Coax in 36 Inch



FMCA1305-36

Connectors

Description	Connector 1	Connector 2
Type	7/16 DIN Male	7/16 DIN Male
Impedance	50 Ohms	50 Ohms
Configuration	Straight	Straight
Contact Material and Plating	Brass, Silver	Brass, Silver
Dielectric Type	PTFE	PTFE
Body Material and Plating	Brass, Tri-Metal	Brass, Tri-Metal
Seal Gasket Material	Silicone Rubber	Silicone Rubber

Environmental Specifications

Operating Range Temperature	-55 to +125 deg C
Plenum Rating	UL910

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

Plotted and Other Data

Notes:
Values at 25°C, sea level.

Low PIM 7/16 DIN Male to 7/16 DIN Male Plenum
Cable SPP-250-LLPL Coax in 36 Inch



FMCA1305-36

Typical Performance Data



Low PIM 7/16 DIN Male to 7/16 DIN Male Plenum
Cable SPP-250-LLPL Coax in 36 Inch



FMCA1305-36

How to Order

Part Number Configuration:

FMCA1305

- **xx**

uu

Unit of Measure:
cm = Centimeters
<blank> = Inches
Length
Base Number

Example: FMCA1305-12 = 12 inches long cable
FMCA1305-100cm = 100 cm long cable

Low PIM 7/16 DIN Male to 7/16 DIN Male Plenum Cable SPP-250-LLPL Coax in 36 Inch from Fairview Microwave is in-stock and available to ship same-day. All of our RF/microwave products are available off-the-shelf from our ISO 9001:2008 certified facilities in Lewisville, Texas. Fairview Microwave is RF on-demand.

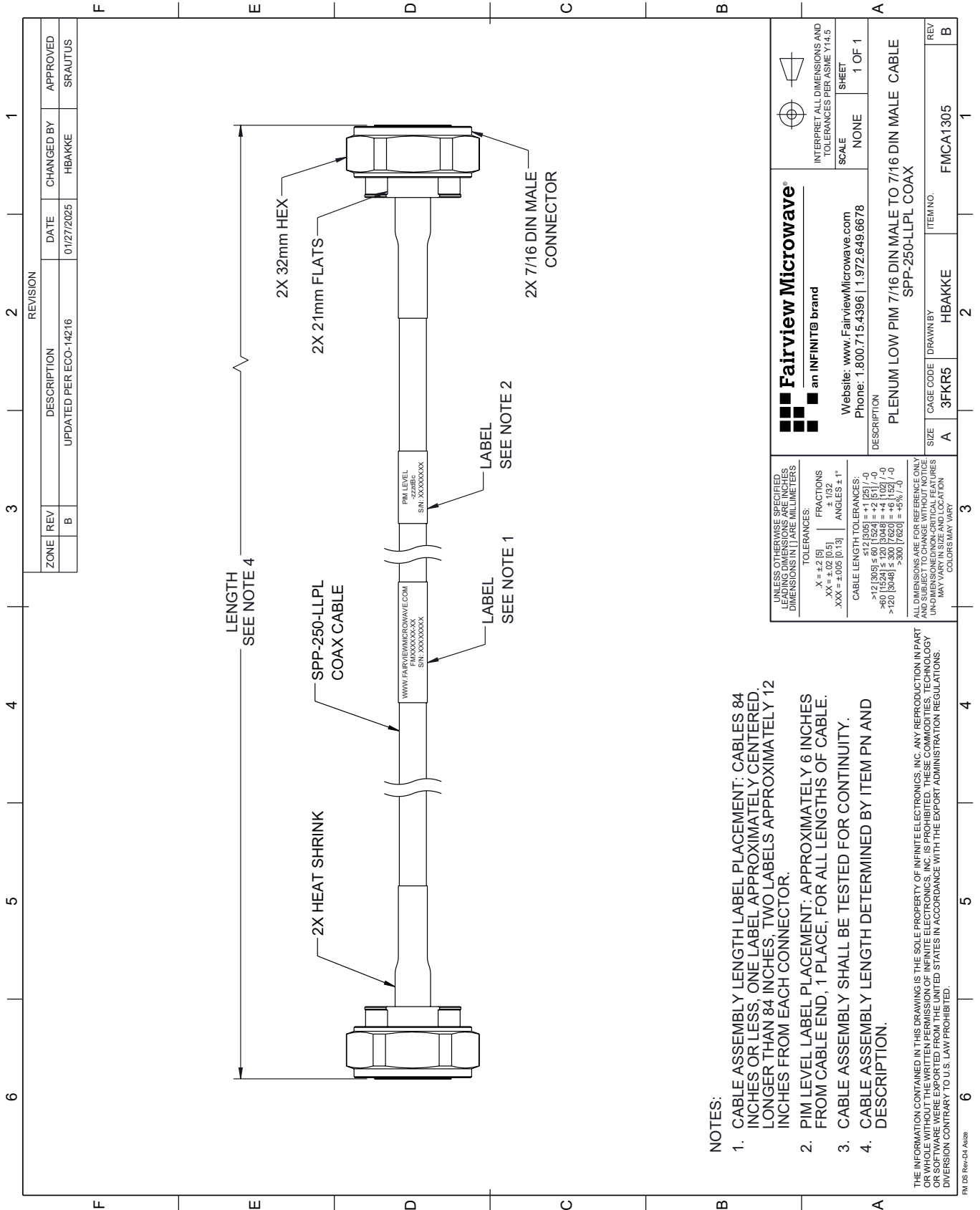
For additional information on this product, please click the following link: [Low PIM 7/16 DIN Male to 7/16 DIN Male Plenum Cable SPP-250-LLPL Coax in 36 Inch FMCA1305-36](https://www.fairviewmicrowave.com/7-16-male-7-16-male-cable-spp250llpl-fmca1305-36-p.aspx)

URL: <https://www.fairviewmicrowave.com/7-16-male-7-16-male-cable-spp250llpl-fmca1305-36-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. Fairview Microwave reserves the right to make such changes as required. Unless otherwise stated, all specifications are nominal. Fairview Microwave does not make any representation or warranty regarding the suitability of the part described herein for any particular purpose, and Fairview Microwave does not assume liability arising out of the use of any part or document.

FMCA1305-36 CAD Drawing

Low PIM 7/16 DIN Male to 7/16 DIN Male Plenum Cable SPP-250-LLPL Coax in 36 Inch



NOTES:

1. CABLE ASSEMBLY LENGTH LABEL PLACEMENT: CABLES 84 INCHES OR LESS, ONE LABEL APPROXIMATELY CENTERED, LONGER THAN 84 INCHES, TWO LABELS APPROXIMATELY 12 INCHES FROM EACH CONNECTOR.
2. PIM LEVEL LABEL PLACEMENT: APPROXIMATELY 6 INCHES FROM CABLE END, 1 PLACE, FOR ALL LENGTHS OF CABLE.
3. CABLE ASSEMBLY SHALL BE TESTED FOR CONTINUITY.
4. CABLE ASSEMBLY LENGTH DETERMINED BY ITEM PN AND DESCRIPTION.

THE INFORMATION CONTAINED IN THIS DRAWING IS THE SOLE PROPERTY OF INFINITE ELECTRONICS, INC. ANY REPRODUCTION IN PART OR WHOLE WITHOUT THE WRITTEN PERMISSION OF INFINITE ELECTRONICS, INC. IS PROHIBITED. THESE COMMODITIES, TECHNOLOGY OR SOFTWARE WERE EXPORTED FROM THE UNITED STATES IN ACCORDANCE WITH THE EXPORT ADMINISTRATION REGULATIONS. DIVERSION CONTRARY TO U.S. LAW PROHIBITED.

<p>Fairview Microwave® an INFINIT® brand</p> <p>Website: www.FairviewMicrowave.com Phone: 1.800.715.4396 1.972.649.6678</p>		<p>INTERPRET ALL DIMENSIONS AND TOLERANCES PER ASME Y14.5</p> <p>SCALE: NONE</p> <p>SHEET: 1 OF 1</p>
<p>UNLESS OTHERWISE SPECIFIED, LEADING DIMENSIONS ARE IN INCHES, DIMENSIONS IN [] ARE MILLIMETERS.</p> <p>TOLERANCES: .X = ±.2 [5] .XX = ±.02 [0.5] .XXX = ±.005 [0.13] FRACTIONS ± 1/32 ANGLES ± 1°</p> <p>CABLE LENGTH TOLERANCES: >12 [305] ≤ 60 [1524] = ±.1 [25] / -0 >60 [1524] ≤ 120 [3048] = ±.4 [102] / -0 >120 [3048] ≤ 300 [7620] = ±.8 [20] / -0</p> <p>ALL DIMENSIONS ARE FOR REFERENCE ONLY. UNKNOWN DIMENSIONS/NON-CRITICAL FEATURES MAY VARY IN SIZE AND LOCATION. COLORS MAY VARY.</p>		
<p>DESCRIPTION PLENUM LOW PIM 7/16 DIN MALE TO 7/16 DIN MALE CABLE SPP-250-LLPL COAX</p>	<p>SIZE A</p>	<p>ITEM NO. FMCA1305</p>
<p>REV B</p>	<p>CHANGED BY HBAKKE</p>	<p>APPROVED SRAUTUS</p>
<p>DATE 01/27/2025</p>	<p>DESCRIPTION UPDATED PER ECO-14216</p>	<p>REVISION 1</p>