

Low PIM 30 dB Fixed Attenuator 4.3-10 Female (Jack) to 4.3-10 Female (Jack) 0.6 GHz to 6 GHz Rated to 50 Watts Anodized Aluminum 1.3:1 VSWR



FMAT7481-30

Features

- 0.6 to 6 GHz Frequency Range
- 4.3-10 Connectorized Design
- Attenuation 30 dB $\pm$ 2 dB
- Max Power 50 Watt (CW)
- Typical VSWR of 1.3:1
- PIM rating -168 dBc typical

Applications

- Instrumentation
- Precision Measurements
- Prototyping and Characterization
- Production Systems

Description

Fairview Microwave carries a wide range of fixed attenuators with a broad selection of attenuation levels, frequency ranges, and power dissipation ranges. RF microwave attenuators (also known as RF pads) lower the amplitude of a signal (attenuate) a known amount and can be used in a wide variety of applications. These attenuator pads are used when a signal needs to be reduced to protect measurement equipment or other circuitry, to extend the range of power meters and amplifiers, and to impedance match circuits by reducing the VSWR seen by adjacent components. RF attenuators can prevent signal overload in amplifiers, receivers and detectors, adjusting the signal level to a range that is optimal.

Few RF components are as commonly used as fixed coaxial attenuators, and Fairview Microwave carries one of the largest in-stock varieties and ships them same day. The 30 dB Fixed Attenuator FMAT7481-30 is rated to 50 Watts and operates from 0.6 to 6 GHz. The fixed attenuator offers 1.3:1 VSWR and low PIM (passive intermodulation) rating of -168 dBc typical. The versatile coaxial package uses 4.3-10 female to 4.3-10 female connectors.

Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Frequency Range	0.6		6	GHz
Impedance		50		Ohms
Nominal Attenuation		30		dB
Attenuation Accuracy		2		dB
VSWR		1.3:1		
Passive Intermodulation		-168	-160	dBc
2x43dBm				
Input Power, CW			50	Watts
Input Power, Peak			500	Watts
8% duty cycle, 20us PW				

Mechanical Specifications

Size

Length	6.69 in [169.93 mm]
Width/Diameter	5.12 in [130.05 mm]
Height	1.46 in [37.08 mm]
Weight	2.65 lbs [1.2 kg]
Body Material and Plating	Black Anodized Aluminum Heatsink

Configuration

Design	Fixed, Directional
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Package Style	Connectorized	
Connectors		
Description	Connector 1	Connector 2
Type	4.3-10 Female	4.3-10 Female
Contact Material and Plating	Beryllium Copper, Gold	Beryllium Copper, Gold
Body Material and Plating	Brass, Tri-Metal	Brass, Tri-Metal

Environmental Specifications

Temperature

Operating Range	-40 to +75 deg C
Storage Range	-50 to +85 deg C
Humidity	<95%
Shock	IEC 60068-2-27
Vibration	IEC 60068-2-6-Fc
Altitude	<5000m
Thermal Shock	IEC 60068 -2-14-Na

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

Plotted and Other Data

Notes:

Typical Performance Data

Low PIM 30 dB Fixed Attenuator 4.3-10 Female (Jack) to 4.3-10 Female (Jack) 0.6 GHz to 6 GHz Rated to 50 Watts Anodized Aluminum 1.3:1 VSWR 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 30 dB Fixed Attenuator 4.3-10 Female \(Jack\) to 4.3-10 Female \(Jack\) 0.6 GHz to 6 GHz Rated to 50 Watts Anodized Aluminum 1.3:1 VSWR FMAT7481-30](#)

URL: <https://www.fairviewmicrowave.com/30db-fixed-attenuator-4.3-10-female-4.3-10-female-50-watts-fmat7481-30-p.aspx>

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FMAT7481-30 CAD Drawing

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