

# SA6H-20 DATA SHEET

# 20 dB Fixed Attenuator SMA Male To SMA Female Up To 6 GHz Rated To 2 Watts With Passivated Stainless Steel Body

Fairview Microwave carries a broad selection of fixed attenuators with a wide range of attenuation levels, frequency ranges, and power dissipation ranges. Also known as RF pads, RF microwave attenuators lower the amplitude of a signal (or attenuate) a known amount. These attenuator pads can be used in a wide variety of applications including reducing a signal level to protect measurement equipment or other circuitry, extending the range of power meters and amplifiers, and impedance matching 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 selections and ships them same day. The SA6H-20 is a 20 dB Fixed Attenuator that operates from DC to 6 GHz and is rated to 2 Watts. The versatile coaxial package uses SMA male to SMA female connectors and is also REACH and RoHS compliant.

## **Electrical Specifications**

Description	Min	Тур	Max	Units
Frequency Range	DC		6	GHz
Impedance		50		Ohms
Nominal Attenuation		20		dB
Attenuation Accuracy			±0.75	dB
VSWR			1.35:1	
Input Power, CW derated linearly to 0.2	W at +125°C		2	Watts
Input Power, Peak 5µs pulse, 0.01% duty	v cycle		200	Watts

# **Mechanical Specifications**

Size
Length 0.86 in [21.84 mm]
Width/Diameter 0.312 in [7.92 mm]
Weight 0.012 lbs [5.44 g]
Body Material and Plating Passivated Stainless Steel

Configuration

Design Fixed

Package Style Connectorized Module



#### Features:

- DC to 6 GHz Frequency Range
- Attenuation 20±0.75 dB
- Max Power 2 Watts (CW)
- VSWR < 1.35:1

# **Applications:**

- Instrumentation
- · Precision measurements
- Prototyping and characterization
- Production systems

Fairview Microwave 1130 Junction Dr. #100 Allen, TX 75013

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#### **Connectors**

Description	Connector 1	Connector 2		
Туре	SMA Male	SMA Female		
Contact Material & Plating	Beryllium Copper, Gold	Beryllium Copper, Gold		
Dielectric Type	Teflon	Teflon		
Hex Size	5/16 inch	5/16 inch		
Torque	8 in-lbs [0.9 Nm]			
Body Material & Plating	Passivated Stainless Steel	Passivated Stainless Steel		

## **Environmental Specifications**

**Temperature** 

Operating Range -65 to +125 deg C

**Compliance Certifications** (visit www.FairviewMicrowave.com for current document)

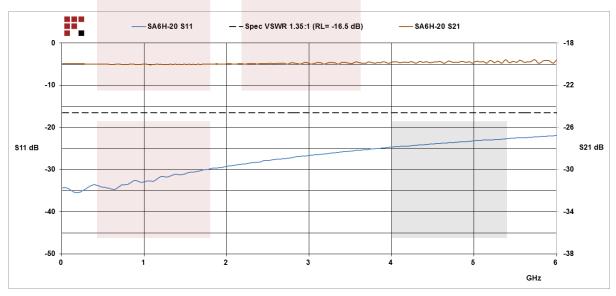
RoHS Compliant Yes

REACH Compliant 12/17/2015

## **Plotted and Other Data**

Notes:

### **Typical Performance Data**







20 dB Fixed Attenuator SMA Male To SMA Female Up To 6 GHz Rated To 2 Watts With Passivated Stainless Steel Body 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 Allen, Texas. Fairview Microwave is RF on-demand.

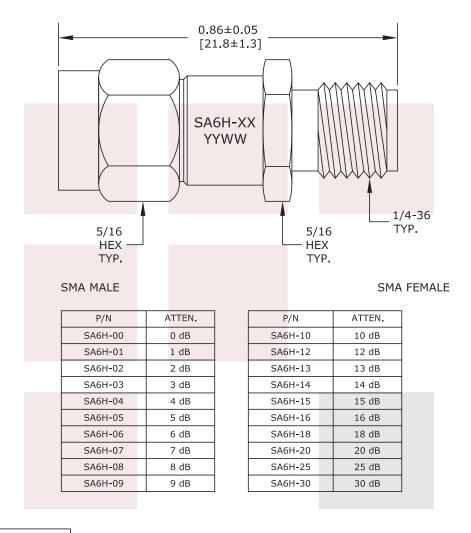
For additional information on this product, please click the following link: 20 dB Fixed Attenuator SMA Male To SMA Female Up To 6 GHz Rated To 2 Watts With Passivated Stainless Steel Body SA6H-20

URL: http://www.fairviewmicrowave.com/20db-fixed-attenuator-sma-male-sma-female-2-watts-sa6h-20-p.aspx









#### STANDARD TOLERANCES

.X ±0.03 .XX ±0.010 .XXX ±0.005

\*STANDARD TOLERANCES APPLY ONLY TO DIMENSIONS IN INCHES

FAIRVIEW MICROWAVE INC. ALLEN, TX 75013 WWW.FAIRVIEWMICROWAVE.COM	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].					
20 dB Fixed Attenuator SMA Male To SMA Female Up To 6 GHz Rated To 2 Watts With Passivated Stainless Steel Body	DWG NO SA6H			CAGE CODE 3FKR5		
	CAD FILE 031716	SHEET	SCALE	E N/A	SIZE A	3045