

VAT-A-SERIES

50Ω Up to 2W

DC to 6000 MHz

THE BIG DEAL

- Wideband coverage, DC to 6000 MHz
- Up to 2 watt rating
- Rugged unibody construction
- Excellent VSWR
- Excellent flatness

APPLICATIONS





Generic photo used for illustration purposes only

Model No.	VAT-A-SERIES	
Case Style	FF704	
Connectors	SMA	

+RoHS Compliant The +Suffix identifies RoHS Compliance. See our web site for RoHS Compliance methodologies and qualifications

PRODUCT OVERVIEW

Signal level adjustmentImpedance matching

Mini-Circuits' VAT-A series are fixed attenuators from DC to 6000 MHz frequency range with excellent flatness in attenuation. VAT-A series is available with nominal attenuation of 1 to 30 dB. This attenuator series support testing and measurement application. Precise performance, excellent VSWR and rugged unibody construction makes the model ideal solution for systems requiring precise attenuation across very wide frequency range.

KEY FEATURES

Feature	Advantages
Rugged construction	Excellent durability for a long lifetime of use
Up to 2 Watt rating	Good power handling
Excellent VSWR	Well-matched for 50 Ω systems
Flat attenuation	Good performance over the band



COAXIAL **Fixed Attenuator**

Unit

MHz

dB

dB

:1

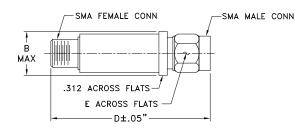
W

MAXIMUM RATINGS

Operating Temperature	-45°C to 100°C
Storage Temperature	-55°C to 100°C

Permanent damage may occur if any of these limits are exceeded.

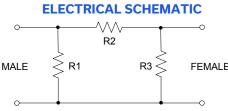
OUTLINE DRAWING



OUTLINE DIMENSIONS (Inch)

В	D	E	wt
.410	1.43	.312	grams
10.41	36.32	7.92	10.0

Note: Please refer to case style drawing for details



VAT-3A+ ATTENUATION 4.0 ATTENUATION (dB) 3.5 3.0 2.5 2.0 0 1000 2000 3000 4000 5000 6000 FREQUENCY (MHz)

VSWR 1.3 1.2 VSWR (:1) 1.1 1.0 3000 0 1000 2000 6000 4000 5000

NOTES

- A. Performance and quality attributes and conditions not expressly stated in this specification document are intended to be excluded and do not form a part of this specification document
- B. Electrical specifications and performance data contained in this specification document are based on Mini-Circuit's applicable established test performance criteria and measurement instructions.
- The parts covered by this specification document are subject to Mini-Circuits standard limited warranty and terms and conditions (collectively, "Standard Terms"); Purchasers of this part are entitled to the rights and benefits contained therein. For a full statement of the standard. Terms and the exclusive rights and remedies thereunder, please visit Mini-Circuits' website at www.minicircuits.com/MCLStore/terms.jsp C.

Mini-Circuits

FEMALE

	2.50	1110
100	2.94	1.13
500	2.99	1.12
900	3.03	1.12
1000	3.04	1.12
1400	3.06	1.13
1500	3.07	1.13
2000	3.09	1.14
2500	3.11	1.16
2800	3.12	1.17
3000	3.13	1.18
4000	3.16	1.21
4500	3.17	1.21
5000	3.18	1.21
6000	3.19	1.15

ELECTRICAL SPECIFICATIONS AT 25°C

Min.

DC

-

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TYPICAL PERFORMANCE DATA Attenuation

(dB)

2.93

Тур.

-

3 ± 0.3

0.25

0.15

0.15

0.30

1.20

1.25

1.40

-

Max.

6000

-

1.50

1.60

2.0

VSWR

(:1)

1.13

Condition

(MHz)

10

DC-3000

3000-5000

5000-6000

DC-6000

DC-3000

3000-5000

5000-6000

1. Attenuation varies by 0.3 dB max. over temperature. 2. Flatness = variation over band divided by 2.

4. RF power at 25°C is 2.0W; Derate linearly to 1.0W at 85°C

Parameter

Attenuation¹ nominal³

Attenuation Flatness²

3. Nominal attenuation at 10 MHz

Frequency (MHz)

10

VSWR

Input Power⁴

Frequency Range

