

# Coaxial SMA Fixed Attenuator

## FW-20+

50Ω 1W 20dB DC to 12000 MHz



Generic photo used for illustration purposes only

CASE STYLE: FF704

Connectors	Model
SMA	FW-20+

**+RoHS Compliant**

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

### 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.

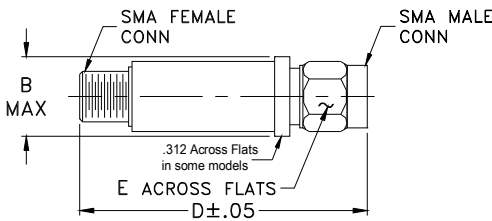
### Features

- wideband coverage, DC to 12000 MHz
- 1 watt rating
- rugged unibody construction
- off-the-shelf availability
- very low cost

### Applications

- impedance matching
- signal level adjustment

### Outline Drawing



### Outline Dimensions (inch/mm)

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

### Electrical Specifications at 25°C

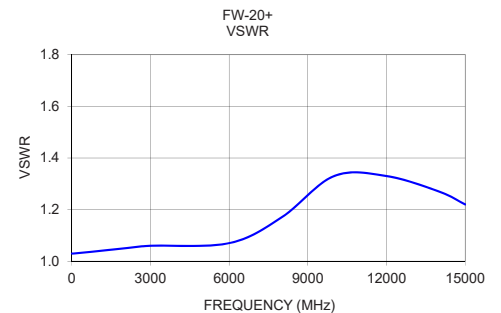
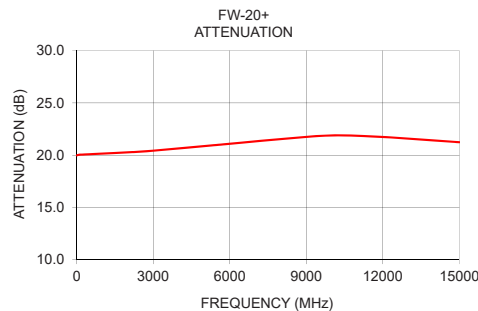
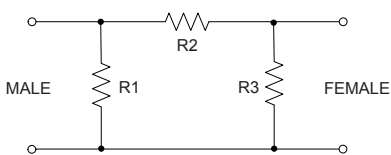
Parameter	Condition (MHz)	Min.	Typ.	Max.	Unit
Frequency Range		DC	—	12000	MHz
Attenuation	10	—	20	—	dB
	DC - 3000	19.1	20.2	21.4	
	3000 - 8000	19.45	21	22.9	
VSWR	8000 - 12000	20.25	21.85	23.2	:1
	DC - 3000	—	1.05	1.20	
	3000 - 8000	—	1.20	1.35	
Input Power	8000 - 12000	—	1.35	—	W
	DC - 12000	—	—	1.0	

1. Flatness = variation over band divided by 2.

### Typical Performance Data

Frequency (MHz)	Attenuation (dB)	VSWR (:1)
10.00	19.98	1.03
100.00	20.04	1.03
2000.00	20.27	1.05
3000.00	20.43	1.06
6000.00	21.09	1.07
8000.00	21.54	1.17
10000.00	21.89	1.33
12000.00	21.74	1.33
14000.00	21.41	1.27
15000.00	21.24	1.22

### Electrical Schematic



### Notes

- 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.
- 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/VCLStore/terms.jsp](http://www.minicircuits.com/VCLStore/terms.jsp)



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