

Coaxial

Low Pass Filter

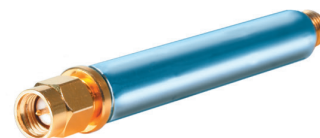
VLFX-2500+

50Ω

DC to 2500 MHz (30 dB Isolation up to 20 GHz)

The Big Deal

- Very good rejection, 30 dB up to 20 GHz
- Excellent power handling, 9W
- Rugged unibody construction



CASE STYLE: FF1118

Product Overview

VLFX-2500+ is a 50Ω low pass filter built in rugged unibody construction. Covering DC-2500 MHz bandwidth, these units offer good matching within the passband and high rejection in stopband, 30 dB up to 20 GHz. This will find its applications in harmonic rejection, transmitters / receivers and test instrumentation.

Key Features

Feature	Advantages
Low passband insertion loss	Suitable for high performance application
Fast roll-off	Provides very good adjacent band rejection
Connectorized package	The connectorized package is easy to interface with other devices and well suited for test setups

Notes

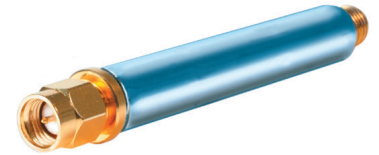
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Low Pass Filter

VLFX-2500+

50Ω DC to 2500 MHz (30 dB Isolation up to 20 GHz)



Features

- Very good isolation, 30 dB up to 20 GHz
- Excellent power handling, 9W
- Temperature stable LTCC internal structure
- Re-entry frequency > 20 GHz
- Protected by US patent 6,943,646
- Rugged unibody construction

Applications

- Harmonic rejection
- Transmitters/receivers
- Lab use
- Test instrumentation

CASE STYLE: FF1118

Connectors	Model
SMA	VLFX-2500+

Electrical Specifications at 25°C

Parameter	F#	Frequency (MHz)	Min.	Typ.	Max.	Unit
Pass Band	Insertion Loss	DC-F1	DC-2500	—	1.5	2.0 dB
	Freq. Cut-Off	F2	3075	—	3.0	dB
	VSWR	DC-F1	DC-2500	—	1.54	:1
Stop Band	Insertion Loss	F3	3675	20	30.3	dB
		F4-F5	3800-20000	—	30	dB
	VSWR	F3-F5	3675-20000	—	10	:1

Maximum Ratings

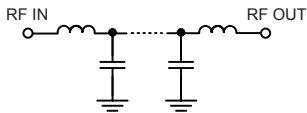
Operating Temperature	-55°C to 100°C
Storage Temperature	-55°C to 100°C
RF Power Input*	9W max.

*Passband rating, derate linearly to 3W at 100°C ambient.
Permanent damage may occur if any of these limits are exceeded.

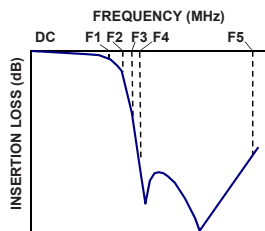
Typical Performance Data at 25°C

Frequency (MHz)	Insertion Loss (dB)	VSWR (:1)
10	0.08	1.02
100	0.16	1.05
1000	0.54	1.18
2500	1.32	1.39
2950	3.15	2.66
3075	4.91	4.12
3250	10.12	9.35
3475	20.39	18.97
3675	29.87	24.33
3700	31.01	24.85
3800	35.38	26.73
5850	40.94	41.18
6800	102.61	43.98
7850	58.69	38.24
10000	82.20	17.62
11700	58.87	27.00
15275	93.00	9.20
17850	40.02	2.02
19500	50.70	5.43
20000	73.45	15.14

Functional Schematic

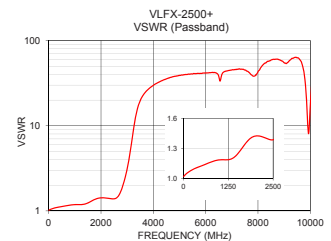
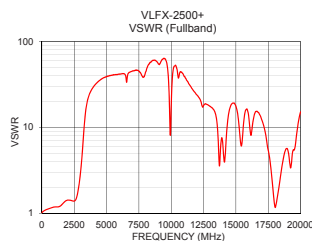
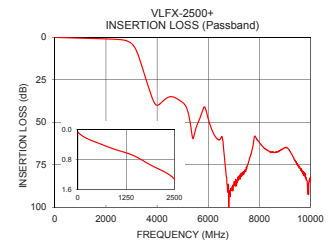
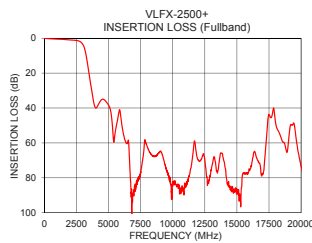


Typical Frequency Response



+RoHS Compliant

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



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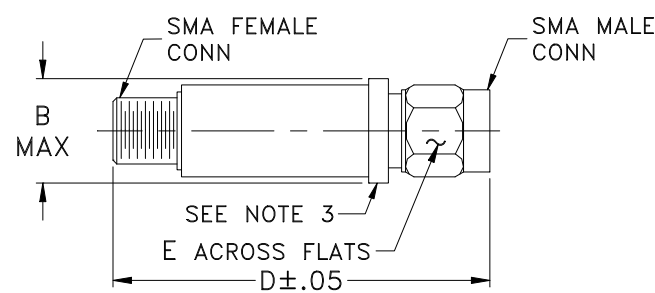
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Coaxial Connections

INPUT	SMA-Female
OUTPUT	SMA-Male

Outline Drawing



Outline Dimensions (^{inch}_{mm})

B	D	E	wt.
.410	2.67	.312	grams
10.41	67.82	7.92	17.0

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