

# Coaxial Low Noise Amplifier

## ZEL-1217LN+

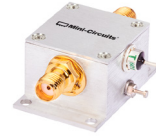
50Ω      1200 to 1700 MHz

### Features

- very low noise figure, 1.6 dB max.
- wideband, 1200 to 1700 MHz
- rugged, shielded case

### Applications

- GPS
- mar sat
- communication systems



Generic photo used for illustration purposes only

Case Style: EEE132

Connectors	Model
SMA	ZEL-1217LN+

### +RoHS Compliant

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

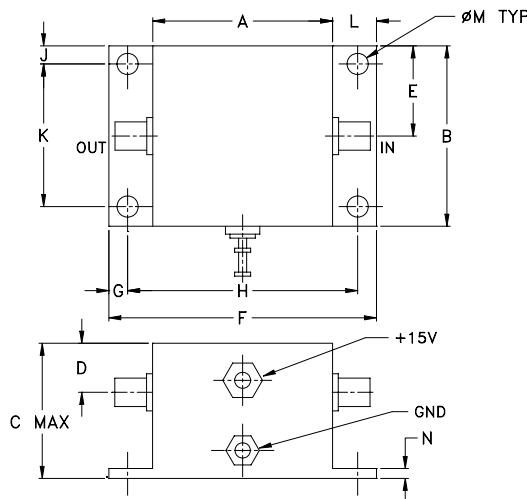
### Electrical Specifications

Parameter	Frequency (MHz)	Min.	Typ.	Max.	Units
Frequency Range		1200		1700	MHz
Noise Figure	1200-1700	—	—	1.6	dB
Gain	1200-1700	20	—	—	dB
Gain Flatness	1200-1700	—	—	±1.0	dB
Output Power at 1dB compression	1200-1700	—	+8	—	dBm
Output third order intercept point	1200-1700	—	+25	—	dBm
Input VSWR	1200-1700	—	—	2.5	:1
Output VSWR	1200-1700	—	—	2.5	:1
DC Supply Voltage		—	15	—	V
Supply Current		—	—	70	mA

Noise Figure specified at room temperature, increases to 2 dB typical at +85°C

Open load is not recommended, potentially can cause damage.  
With no load derate max input power by 20 dB

### Outline Drawing



### Maximum Ratings

Parameter	Ratings
Operating Temperature	-54°C to 85°C
Storage Temperature	-55°C to 100°C
DC Voltage	17V
Input RF Power (no damage)	+13 dBm

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

### Outline Dimensions (inch/mm)

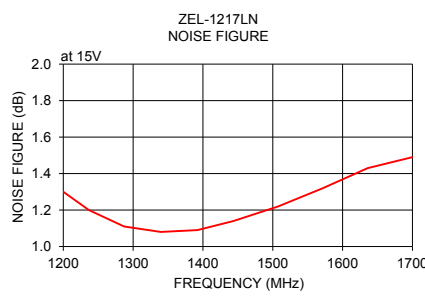
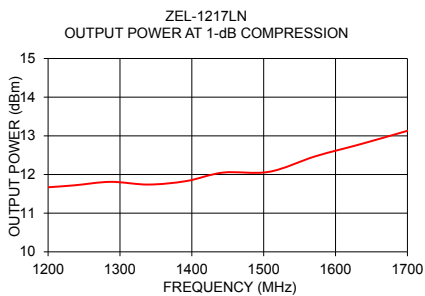
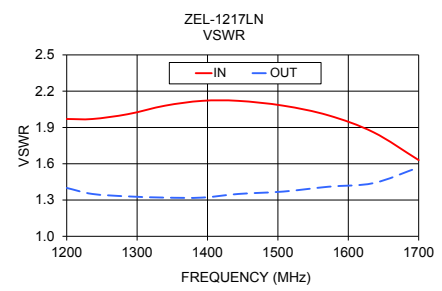
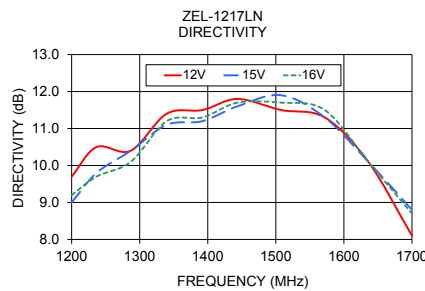
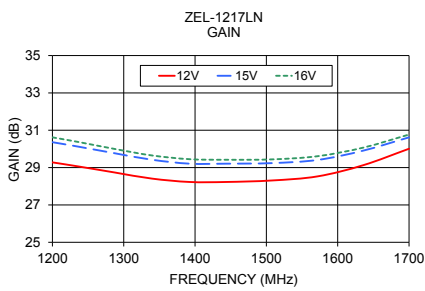
A	B	C	D	E	F	G	H	J	K	L	M	N	wt
.90	.90	.675	.245	.45	1.34	.09	1.152	.09	.712	.22	.106	.05	grams
22.86	22.86	17.15	6.22	11.43	34.04	2.29	29.26	2.29	18.08	5.59	2.69	1.27	50.0

### 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.
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FREQUENCY (MHz)	GAIN (dB)			DIRECTIVITY (dB)			VSWR (:1)		NOISE FIGURE (dB)	POUT at 1 dB COMPR. (dBm)
	12V	15V	16V	12V	15V	16V	IN	OUT		
1200.00	29.28	30.36	30.62	9.70	9.00	9.20	1.97	1.40	1.30	11.67
1236.60	29.06	30.12	30.37	10.50	9.80	9.70	1.97	1.35	1.20	11.72
1287.00	28.74	29.77	30.00	10.40	10.40	10.10	2.01	1.33	1.11	11.81
1339.60	28.41	29.42	29.65	11.40	11.10	11.20	2.08	1.32	1.08	11.74
1392.30	28.23	29.21	29.45	11.50	11.20	11.30	2.12	1.32	1.09	11.83
1443.60	28.23	29.21	29.42	11.80	11.60	11.70	2.12	1.35	1.14	12.05
1507.70	28.31	29.24	29.44	11.50	11.90	11.70	2.08	1.37	1.22	12.07
1571.80	28.53	29.41	29.61	11.30	11.30	11.50	2.00	1.41	1.32	12.47
1635.90	29.13	29.91	30.07	10.10	10.10	10.10	1.86	1.44	1.43	12.79
1700.00	30.01	30.62	30.77	8.10	8.80	8.70	1.63	1.57	1.49	13.13



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