

RF AMPLIFIER

MODEL TZ9408

Available as: TZ9408, 4 Pin TO-8 (T4)
 TN9408, 4 Pin Surface Mount (SM3)
 FP9408, 4 Pin Flatpack (FP4)
 BX9408, Connectorized Housing (H1)

Features

- Low Cost: 5 to 400 MHz
- High Gain: 28 dB Typical
- Operating Temp. -55 °C to +85 °C
- Environmental Screening Available

Specifications

CHARACTERISTIC	TYPICAL Ta= 25 °C	MIN/MAX Ta = -55 °C to +85 °C
Frequency	5 - 400 MHz	5 - 400 MHz
Gain (dB)	28	26.0 Min.
Power @ 1 dB Comp. (dBm)	+10.5	+9.0 Min.
Reverse Isolation (dB)	-35.5	-34 Max.
VSWR In	1.25:1	2.0:1 Max.
Out	1.6:1	2.0:1 Max.
Noise figure (dB)	<5.0	6.0 Max.
Power Vdc	+15	+15
mA	45	50 Max.

Note: Care should always be taken to effectively ground the case of each unit.

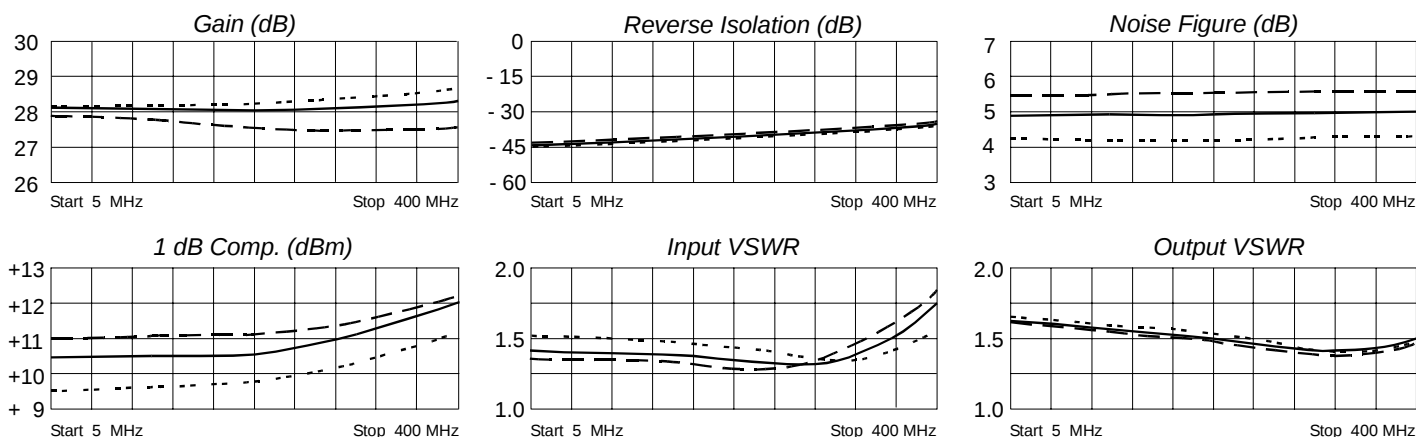
Typical Intermodulation Performance at 25 °C

Second Order Harmonic Intercept Point +40 dBm (Typ.)
 Second Order Two Tone Intercept Point +34 dBm (Typ.)
 Third Order Two Tone Intercept Point +22 dBm (Typ.)

Maximum Ratings

Ambient Operating Temperature -55°C to + 100 °C
 Storage Temperature -62°C to + 125 °C
 Case Temperature + 125 °C
 DC Voltage + 18 Volts
 Continuous RF Input Power + 13 dBm
 Short Term RF Input Power..... 50 Milliwatts (1 Minute Max.)
 Maximum Peak Power 0.5 Watt (3 µsec Max.)

Typical Performance Data



Linear S-Parameters

FREQ. MHz	S11		S21		S12		S22	
	Mag	Deg	Mag	Deg	Mag	Deg	Mag	Deg
5	.08	-165	25.38	1	.01	3	.23	- 4
50	.07	172	25.29	- 21	.01	14	.23	- 11
100	.07	161	25.09	- 42	.01	21	.22	- 23
150	.06	146	25.02	- 63	.01	17	.22	- 35
200	.04	123	24.98	- 84	.01	32	.20	- 49
250	.02	72	25.04	-105	.01	30	.19	- 67
300	.05	- 7	25.26	-126	.01	27	.17	- 90
350	.12	- 40	25.68	-149	.01	24	.18	-120
400	.20	- 60	26.28	-172	.02	19	.21	-154



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