

RF AMPLIFIER

MODEL TR7215

Available as: TR7215, 4 Pin TO-8B (T8)
RN7215, 4 Pin Surface Mount (SM19)
BR7215, Connectorized Housing (H2)

Features

- High Gain: 31.5 dB Typical
- Output Power: +13 dBm Typical
- Environmental Screening Available

Specifications

CHARACTERISTIC	TYPICAL Ta= 25 °C	MIN/MAX Ta = -55 °C to +85 °C
Frequency	5-200 MHz	5-200 MHz
Gain (dB)	31.5	30.0 Min.
Power @ 1 dB Comp. (dBm)	+13	+10.0 Min.
Reverse Isolation (dB)	-40	-35 Max.
VSWR In	<1.10:1	1.5:1 Max.
Out	<1.25:1	1.5:1 Max.
Noise Figure (dB)	2.5	4.0 Max.
Power Vdc	+15	+15 Min.
mA	58	70 Max.

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

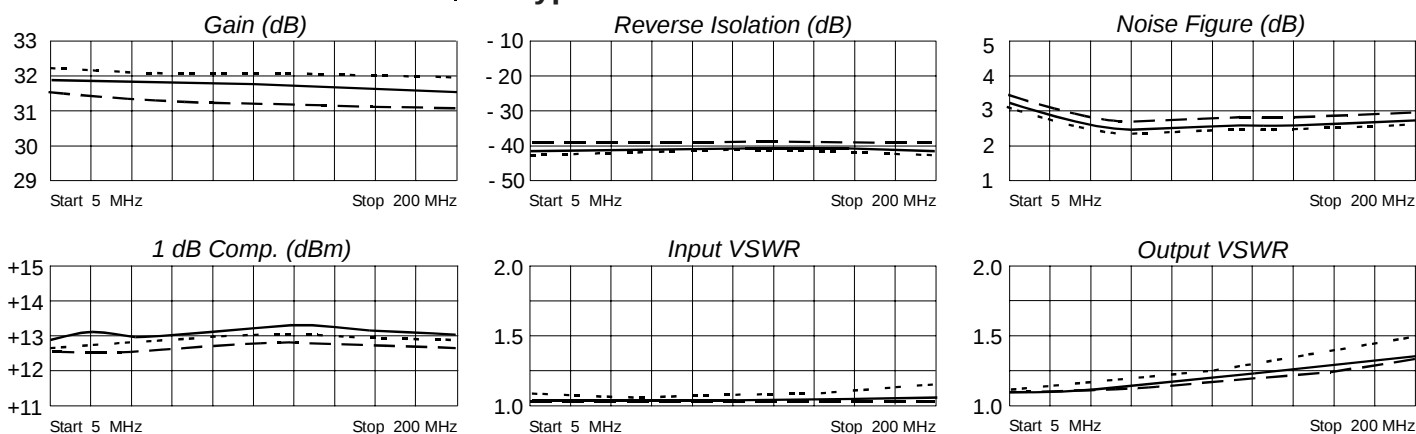
Typical Intermodulation Performance at 25 °C

Second Order Harmonic Intercept Point.....+45 dBm (Typ.)
Second Order Two Tone Intercept Point.....+39 dBm (Typ.)
Third Order Two Tone Intercept Point.....+26 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 + 20 dBm
Short Term RF Input Power 200 Milliwatts (1 Minute Max.)
Maximum Peak Power 0.5 Watt (3 µsec Max.)

Typical Performance Data



Legend ——— + 25 °C - - - + 85 °C -55 °C

Linear S-Parameters

FREQ. MHz	S11		S21		S12		S22	
	Mag	Deg	Mag	Deg	Mag	Deg	Mag	Deg
5	.03	- 54	39.35	2	.01	4	.07	-175
25	.01	- 86	38.74	- 9	.01	- 2	.08	-176
50	.02	-160	38.53	-19	.01	10	.09	-168
75	.04	-160	38.23	-28	.01	21	.10	-168
100	.05	-150	38.26	-37	.01	7	.12	-175
125	.05	-148	38.18	-46	.01	29	.13	-178
150	.04	-162	38.18	-56	.01	15	.12	-173
175	.03	161	37.93	-66	.01	31	.14	174
200	.05	147	38.06	-75	.01	27	.16	172



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