

HD24089

500 – 6000MHz Low Noise Amplifier

Features

- Frequency Range: 500-6000MHz
- Gain: 22dB
- P_{1dB}: +4.1dBm
- IP3: +15dBm
- Noise Figure: 1.8dB
- DC Power: 12V
- SMA Connector

Performance measured @ 2500MHz

Description

HD24089 is a wideband Low Noise Amplifier operates with frequency range usable from 500MHz to 6000MHz.



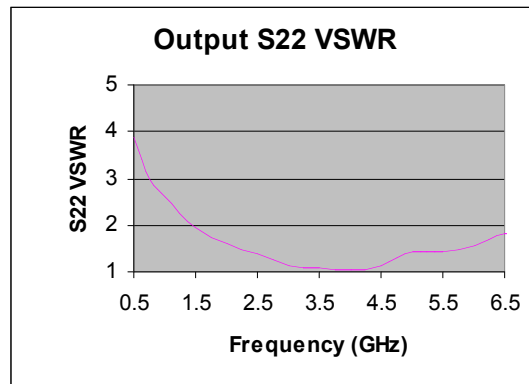
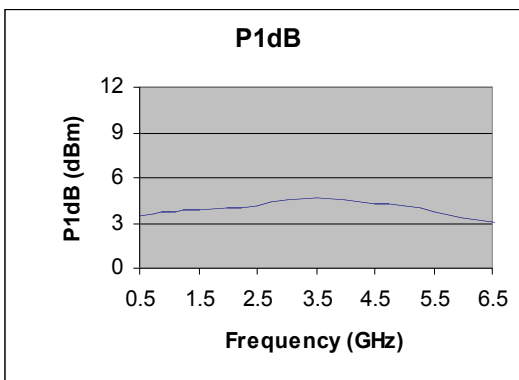
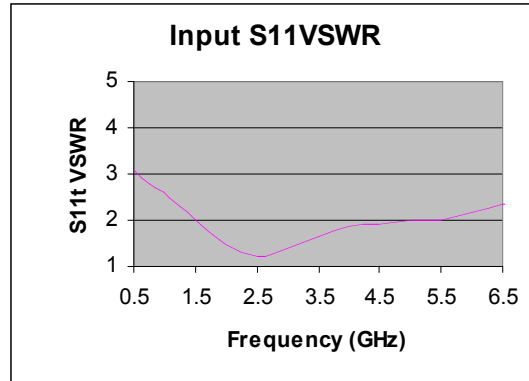
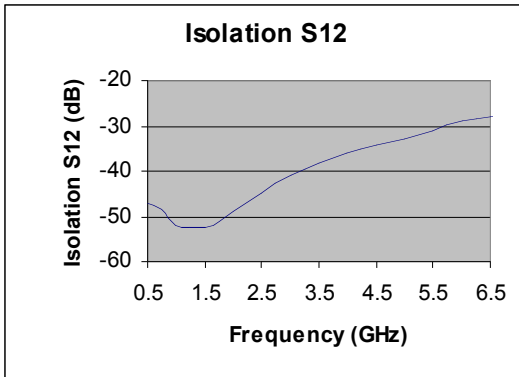
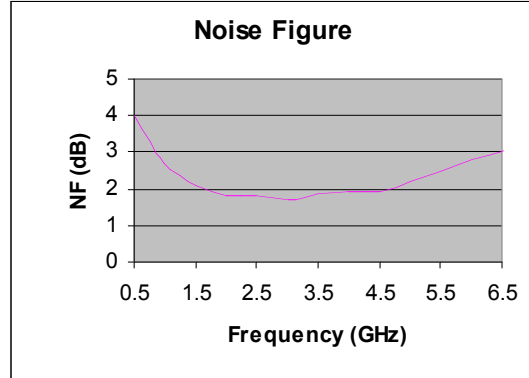
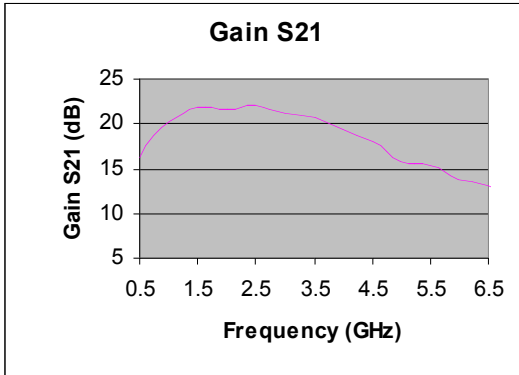
Electrical Specifications @ +25 °C

Parameter	Unit	Minimum	Typical	Maximum
Frequency Range	MHz	500		6000
Gain f = 500MHz	dB		16	
f = 2500MHz	dB		22	
f = 6000MHz	dB		14	
P _{1dB} f = 500MHz	dBm		+3.5	
f = 2500MHz	dBm		+4.1	
f = 6000MHz	dBm		+3.3	
IP3 f= 2500MHz	dBm		+15	
Noise Figure f = 500MHz	dB		4.0	
f = 2500MHz	dB		1.8	
f = 6000MHz	dB		2.9	
VSWR f = 2500MHz				
Input VSWR			1.3:1	
Output VSWR			1.4:1	
DC Power Supply	V	6	12	15
Supply Current	mA		15	

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Typical Performance @ +25 °C



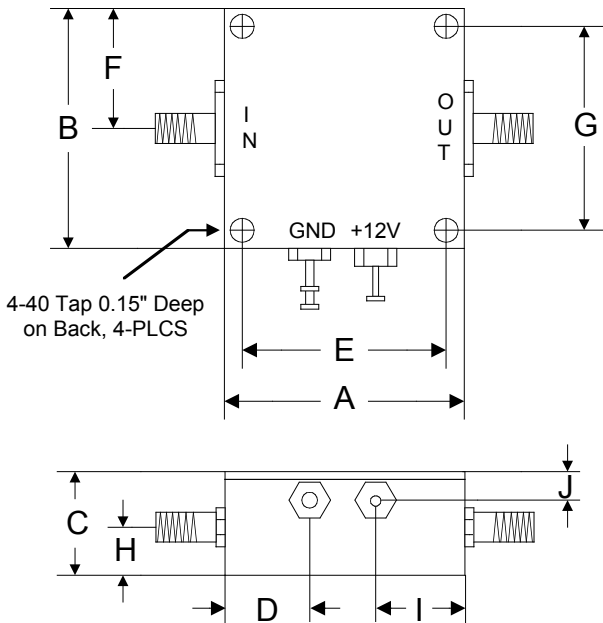
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Absolute Maximum Ratings

Parameter	Absolute Maximum
RF Input Power	+13dBm
Supply Voltage	+16V
Operating Temperature	-40 °C to +85 °C
Storage Temperature	-55 °C to +125 °C

Outline



	A	B	C	D	E	F	G	H	I	J
Inch	1.250	1.250	0.563	0.450	1.000	0.625	1.000	0.250	0.500	0.187
mm	31.75	31.75	14.29	11.43	25.40	15.88	25.40	6.35	12.70	4.76