

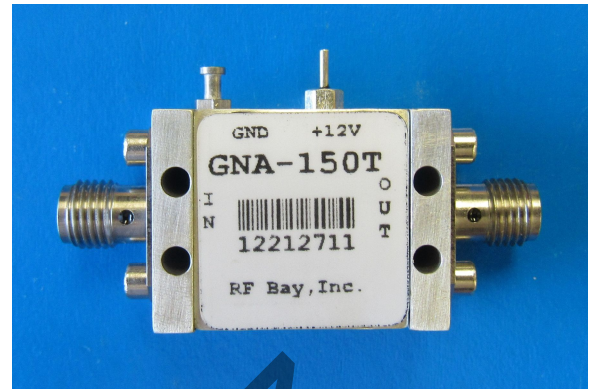
## GNA Series

## 5000-6000MHz Low Noise Amplifier

### Features

- Frequency Range: 5000-6000MHz
- Gain: 18dB
- $P_{1dB}$ : +15dBm
- IP3: +32dBm
- Noise Figure: 1.1dB
- DC Power: +9V to +15V @ 60mA
- Internally Voltage Regulated
- Reverse Voltage Protected
- RF Connector: SMA-Female

### Photo



### Description

GNA-150T is a high performance Microwave Low Noise Amplifier, with standard frequency range of 5000MHz to 6000MHz.

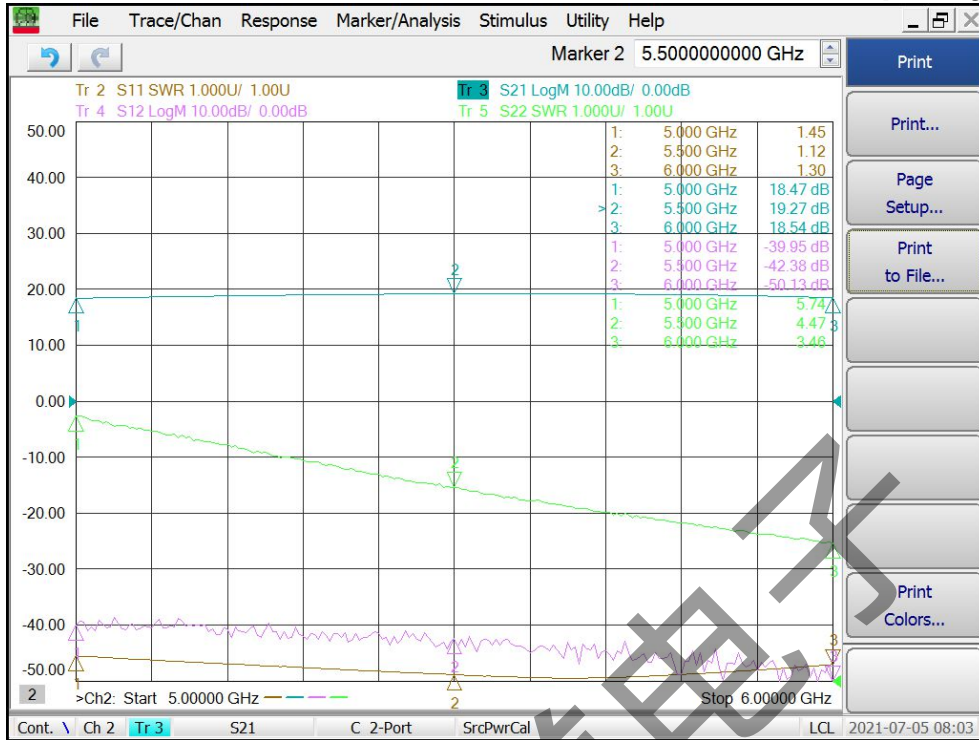
### Electrical Specifications @+25°C, $Z_{in}=Z_{out}=50\ \Omega$ , DC Supply = +12VDC

Parameter	Unit	Minimum	Typical	Maximum
Frequency Range	MHz	5000		6000
Gain S21	f = 5000MHz	17.0	18.0	
	f = 5500MHz	17.0	18.0	
	f = 6000MHz	17.0	18.0	
Gain Flatness	dB		$\pm 0.5$	$\pm 1.0$
Gain Variation Over Temperature	dB/°C		0.014	0.025
Output Power $P_{1dB}$	f = 5500MHz	+14	+15	
Output Third Order Intercept IP3	f = 5500MHz	+30	+32	
Noise Figure	f = 5500MHz		1.1	1.5
Reverse Isolation S12	f = 5500MHz	-30	-40	
Input VSWR S11	f = 5500MHz		1.2:1	1.5:1
Output VSWR S22	f = 5500MHz		4.5:1	5.0:1
DC Power Supply - voltage	V	9	12	15
DC Power Supply - current	mA		60	75

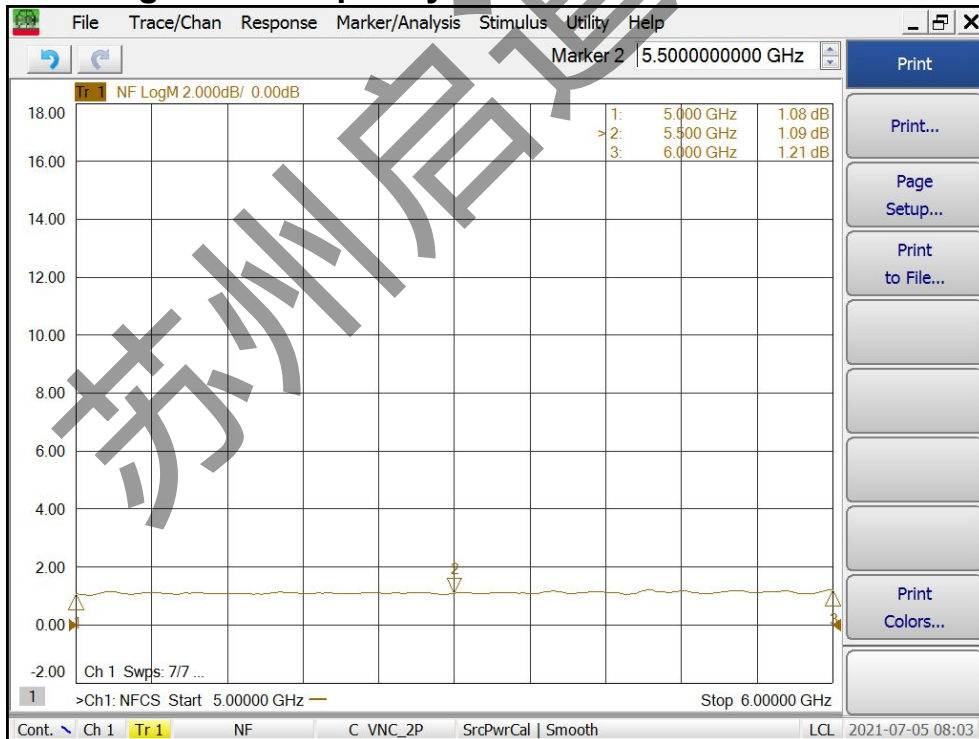
## GNA Series

## 5 – 6GHz Low Noise Amplifier

### Gain S21, Isolation S12, Return Loss S11, S22 vs Frequency



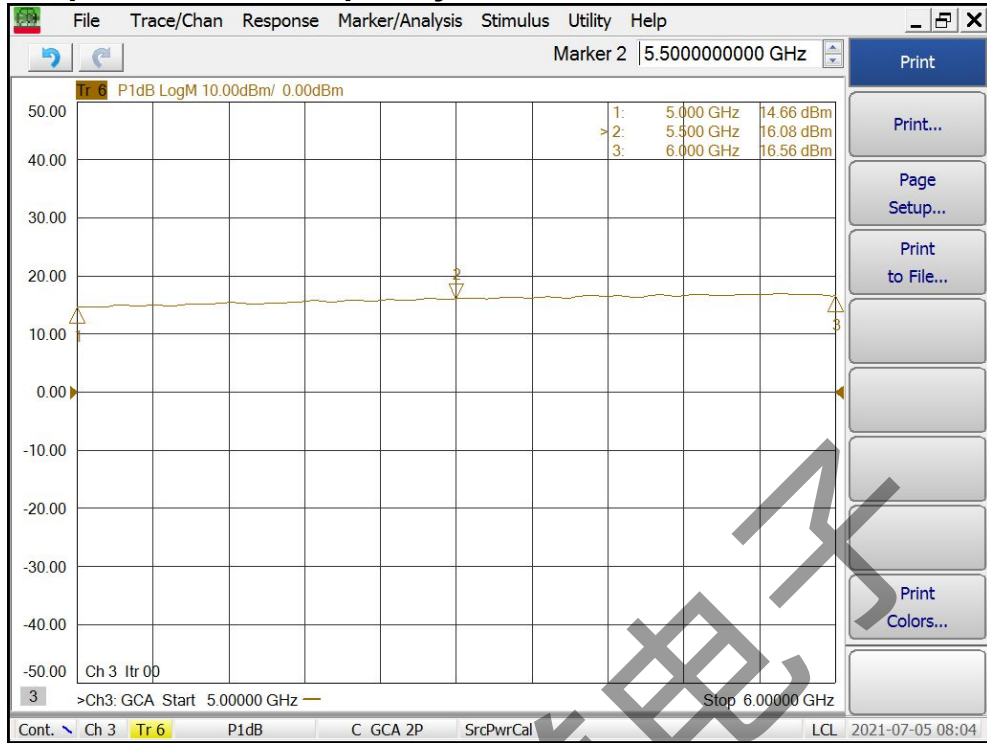
### Noise Figure vs Frequency



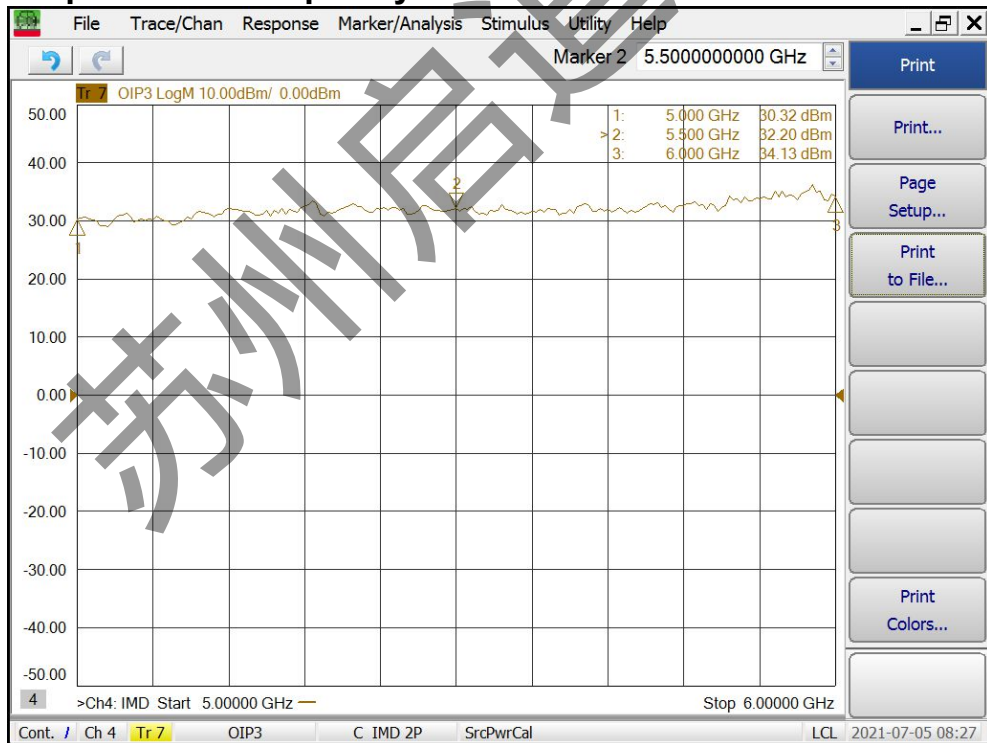
## GNA Series

## 5 – 6GHz Low Noise Amplifier

### Output P1dB vs Frequency



### Output IP3 vs Frequency



## GNA Series

## 5 – 6GHz Low Noise Amplifier

### Absolute Maximum Ratings

Parameter	Absolute Maximum
Supply Voltage (Survival)	+16V
RF Input Power	+22dBm
Operating Temperature	-40 °C to +85 °C
Storage Temperature	-55 °C to +125 °C

### ESD Sensitive Material



### Outline

