

Model: TLLA50K20G-35-30

Low Noise Amplifier, 50KHz-20 GHz
Noise Figure: 3.0 dB, Gain: 35dB, P1dB: 15dBm

Feature:

- Ultra Wide Band: 50KHz-20GHz
- Gain: 35dB Typical
- Noise Figure: 3.0dB Typical
- Good Power and Gain Flatness
- 50 Ohm Matched Input / Output

电气特性 Electrical:

参数Parameter	Min.	Typ.	Max.	单位Units
频率范围 Frequency range	50KHz-20GHz			GHz
增益 Gain	35	37		dB
增益平坦度 Gain Flatness		±1.5		dB
噪声系数 Noise Figure		3.0		dB
线性输出功率 Output P1dB		15		dBm
输出电压 Output voltage		4.4		Vpp
输入驻波 Input VSWR			2.0	:1
输出驻波 Output VSWR			2.0	:1
直流电压 DC Voltage	+10	+12	+18	V DC
直流电流 DC Supply Current		150		mA
阻抗 Impedance	50			Ohms

机械特性 Mechanical:

参数Parameter	指标 Value	单位Units
输入输出接口 Input /Output Connector	SMA-Female	
直流偏置 Bias	Solder Pin	
尺寸 Size	44.8*29.2*11	mm
重量 Weight	55	g



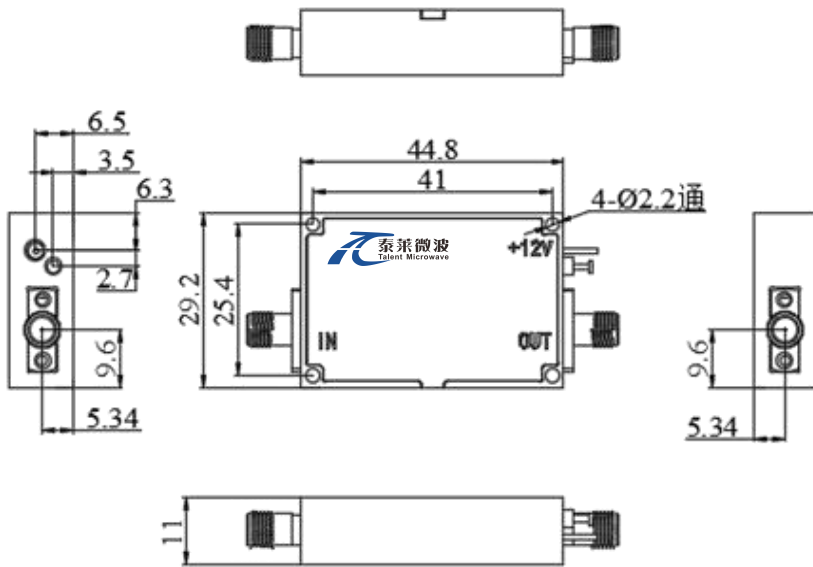
Available 220V System
Benchtop Amplifier

绝对最大值 Absolute Maximum Ratings:

参数Parameter	指标 Value
供电偏置电压 Supply Bias Voltage	+20 V
输入功率 RF INPUT POWER	+15 dBm
ESD灵敏度 ESD sensitivity (HBm)	Class 0, passed 150V

外形尺寸 Outline Drawing:

Unit: mm(Inches)



*****Heat Sink Required During Operation**

温度环境 Environmental Conditions:

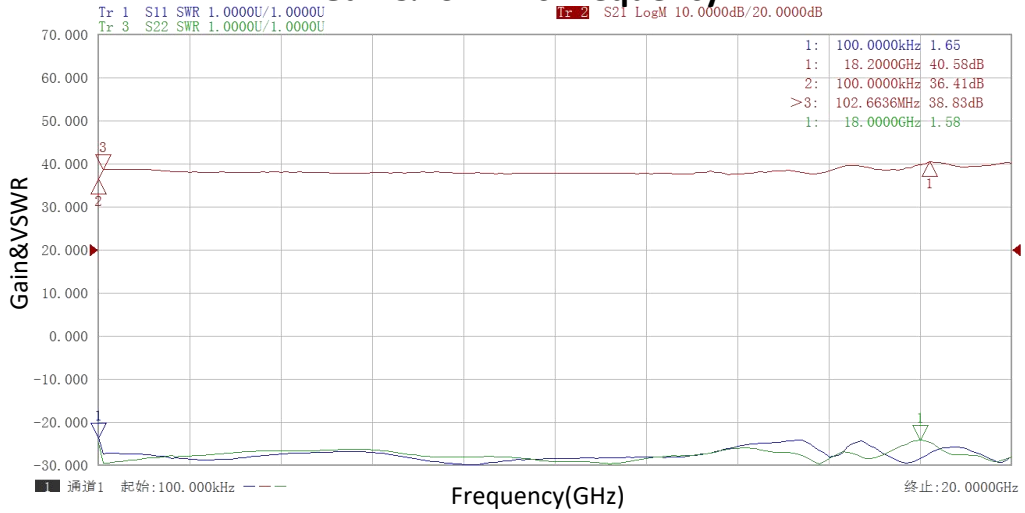
参数Parameter	Min.	Typ.	Max.	单位Units
操作温度 Operating Temperature	-40		+85	°C
存储温度 Non-operating Temperature	-55		+125	°C
相对湿度 Relative humidity		95		%
海拔 Altitude	50,000			feet
震动 Shock / Vibration(MIL-STD-810F)	25g rms (15 degree 2KHz) endurance, 1 hour per axis			
冲击 Shock(non operating)	20G for 11msc half sin wave,3 axis both directions			

订货信息 Ordering Information:

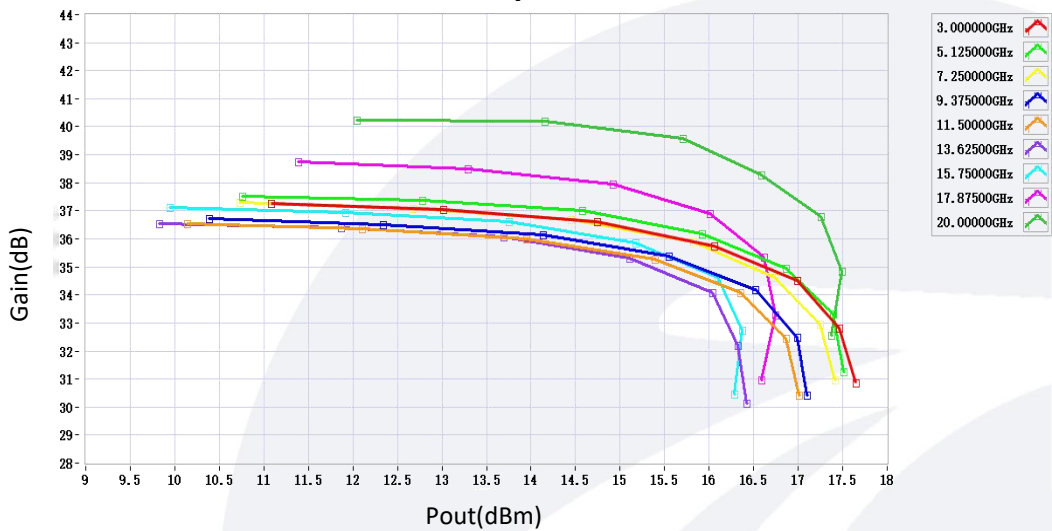
标准型号 Part Number	描述 Description	版本号Revision
TLLA50K20G-35-30	Low Noise Amplifier, 50KHz-20GHz, Noise Figure:3.0dB, Gain:35dB,P1dB:15dBm,12V DC,Without Heatsink	Rev.1.1
TLLA50K20G-35-30-HS	Low Noise Amplifier, 50KHz-20GHz, Noise Figure:3.0dB, Gain:35dB,P1dB:15dBm,12V DC,With Heatsink	Rev.1.1

典型曲线 Typical Performance Data:

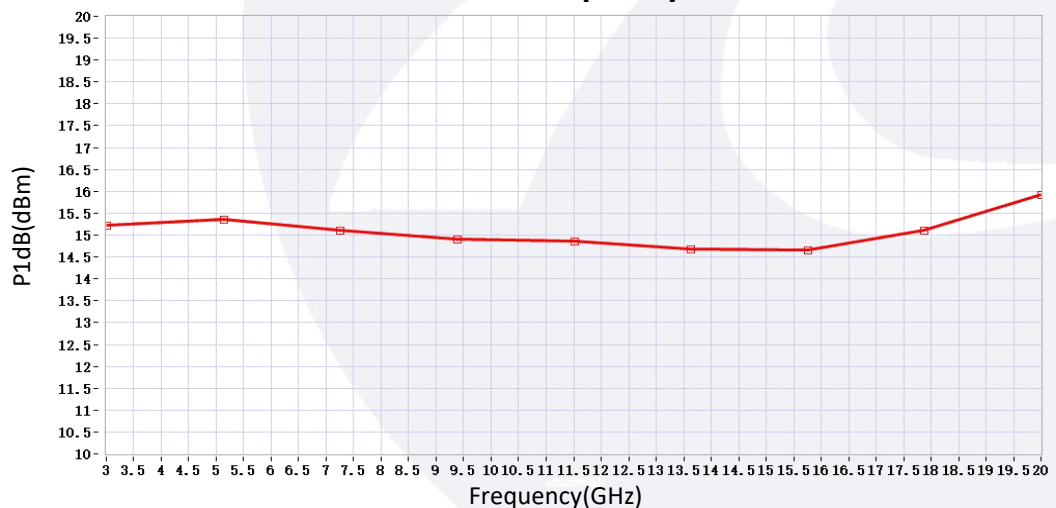
Gain&VSWR vs Frequency



Gain vs Output Power

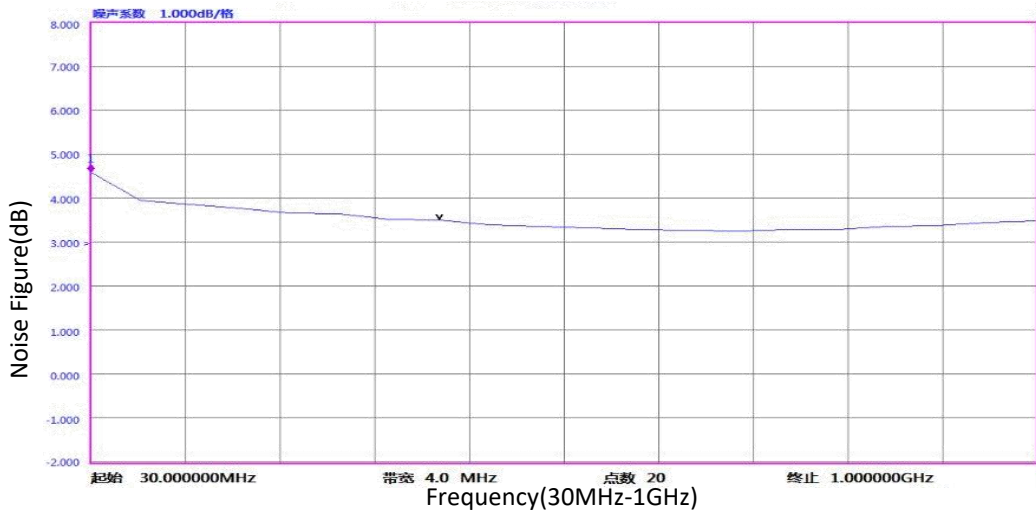


P1dB vs Frequency



典型曲线 Typical Performance Data:

Noise Figure vs Frequency



Noise Figure vs Frequency

