

Model: TMLA-060090-3050-12-N
**Terahertz Low Noise Amplifier
 60-90GHz, NF:5.0 dB, Gain:30 dB**
Feature:

- Ultra Wide Band: 60-90 GHz
- Gain: 30dB Typ
- Noise Figure:5.0dB Typ
- Unconditional stability

电气特性 Electrical Specifications:

| 参数Parameter | Min | Typ | Max | 单位Units |
|------------------------|-----|-----|-----|---------|
| 频率范围 Frequency range | 60 | | 90 | GHz |
| 增益 Gain | | 30 | | dB |
| 噪声系数 Noise Figure | | 5 | | dB |
| 输出功率1dB压缩点 Output P1dB | | 15 | | dBm |
| 直流电压 DC Voltage | | +5 | | V DC |
| 直流供电 DC power supply | | 250 | | mA |

机械特性 Mechanical Specifications:

| 参数Parameter | 指标 Value | 单位Units |
|-----------------------|-----------------|---------|
| 输入接口 Input Connector | WR-12/ UG-387/U | |
| 输出接口 Output Connector | WR-12/ UG-387/U | |
| 供电引脚 Power Supply Pin | Solder Pin | |
| 尺寸 Size | 45*30*22 | mm |

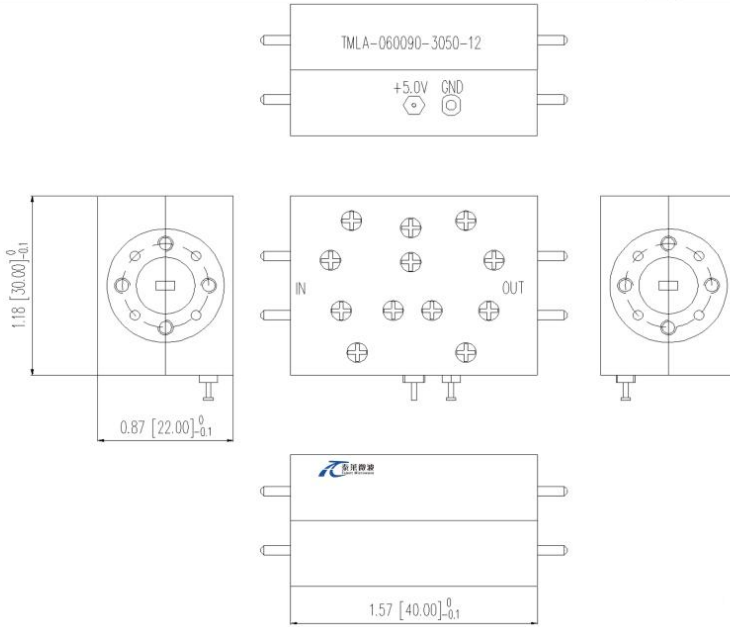
绝对最大值 Absolute Maximum Ratings:

| 参数Parameter | 指标 Value |
|------------------------------|----------------------|
| 供电偏置电压 Supply Bias Voltage | +5 V |
| 输入功率 RF Input Power | 10dBm |
| ESD灵敏度 ESD sensitivity (HBm) | Class 0, passed 150V |


**Available 220V System
 Benchtop Amplifier**

外形尺寸 Outline Drawing:

Unit: Inches(mm)



OBSERVE PRECAUTIONS
ELECTROSTATIC SENSITIVE
DEVICES

温度环境 Environmental Conditions:

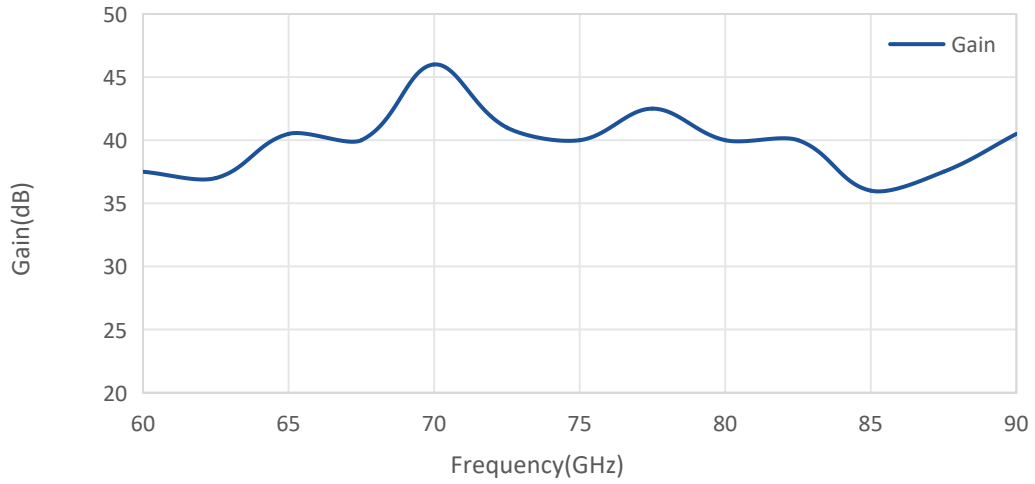
| 参数Parameter | Min | Typ | Max | 单位Units |
|------------------------------------|---|-----|------|---------|
| 操作温度 Operating Temperature | 0 | | +60 | °C |
| 存储温度 Non-operating Temperature | -45 | | +125 | °C |
| 相对湿度 Relative humidity | | 95 | | % |
| 海拔 Altitude | 50,000 | | | feet |
| 震动 Shock / 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:

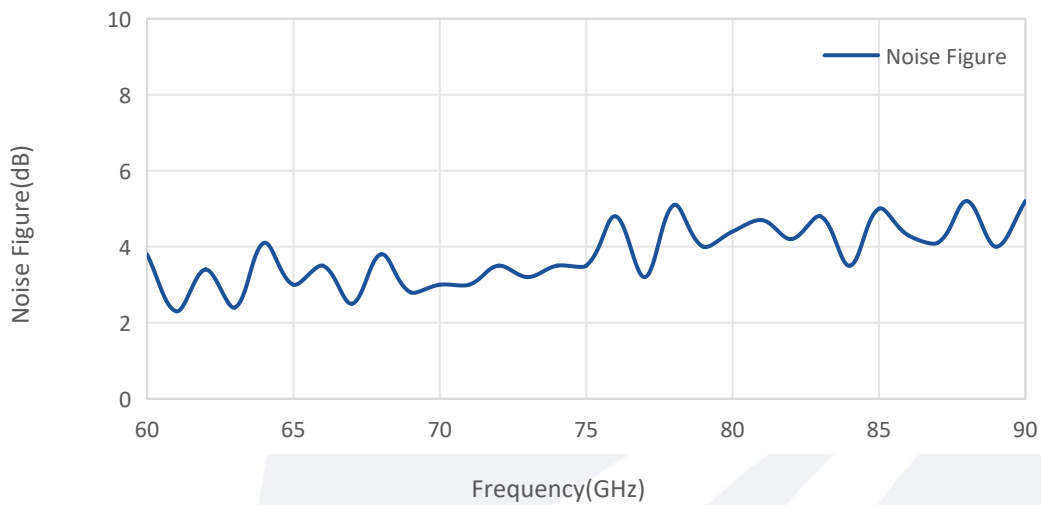
| 标准型号 Part Number | 描述 Description | 版本号Revision |
|-----------------------|--|-------------|
| TMLA-060090-3050-12-N | Low Noise Amplifier,60-90GHz, Noise Figure:5.0dB, Gain:30dB,+5V DC,WR-12 | Rev.1.1 |

典型曲线 Typical Performance Data:

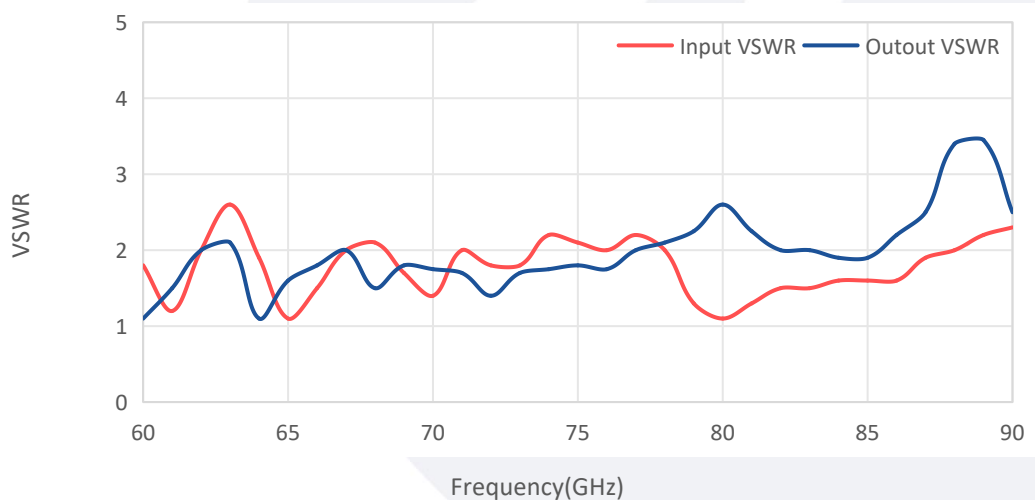
Gain vs Frequency



Noise Figure vs Frequency

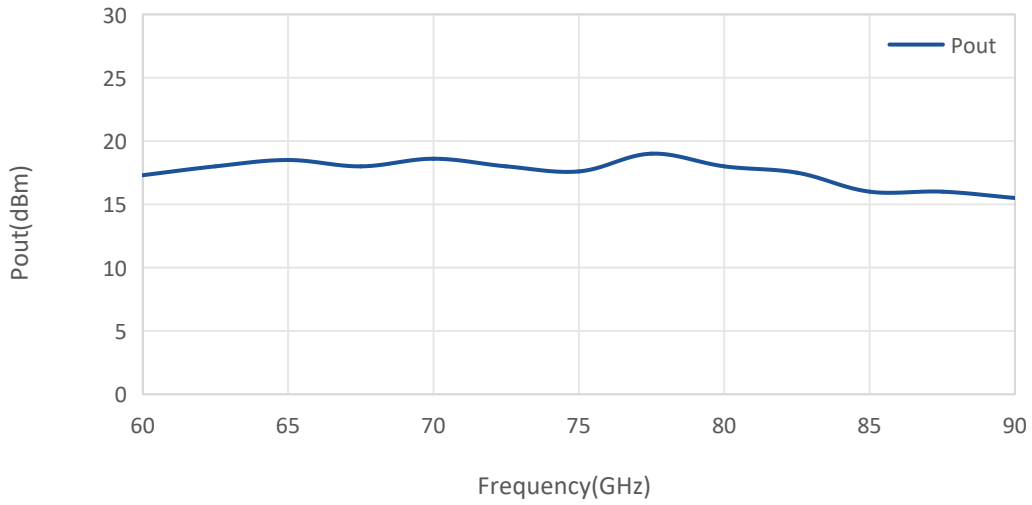


VSWR vs Frequency



典型曲线 Typical Performance Data:

Pout vs Frequency@Pin=-22dBm



I vs Frequency@Pin=-22dBm

