

Model:TLPA12.5G18G-47-40

Power Amplifier
12.5-18GHz,Gain:47dB,Psat:40dBm

Feature:

- Ultra Wide Band:12.5-18GHz
- Gain:47dB Min
- Psat Output Power:40dBm Min
- Good Power and Gain Flatness
- 50 Ohm Matched Input / Output

Electrical Specifications:

Parameter	Min	Typ	Max	Units
Frequency range	12.5-18			GHz
Gain	47			dB
Gain Flatness		±2		dB
Output P1dB		37		dBm
Output Psat	40			dBm
Input VSWR		2		:1
DC Voltage		+28		V DC
DC Supply Current		5		A
Impedance	50			Ohms

Mechanical Specifications:

Parameter	Value	Units
Input /Output Connector	SMA Female/SMA Female	
DC Bias	Solder Pin	
Size	/	mm
Weight	1	Kg

Absolute Maximum Ratings:

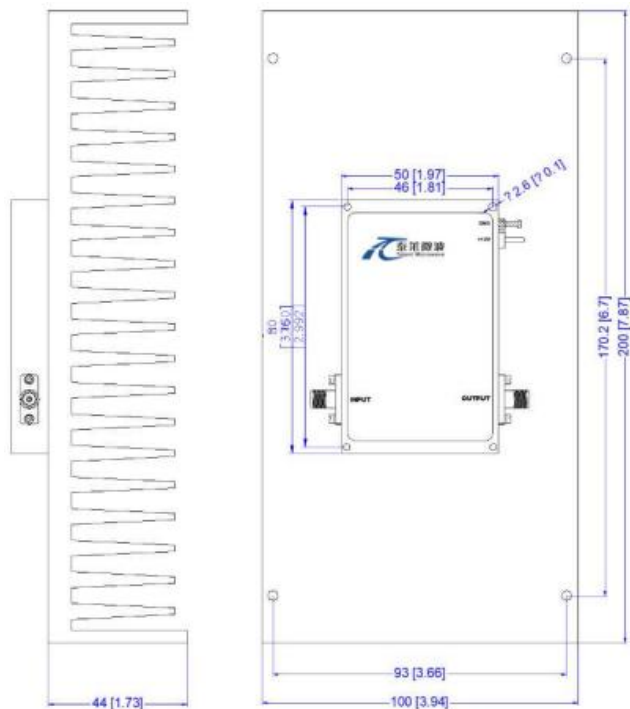
Parameter	Value
Supply Bias Voltage	+28V
RF Input Power	5dBm
ESD sensitivity (HBm)	Class 0, passed 150V



**Available 220V System
Benchtop Amplifier**

Outline Drawing:

Unit: mm



OBSERVE PRECAUTIONS
ELECTROSTATIC SENSITIVE
DEVICES

Environmental Conditions:

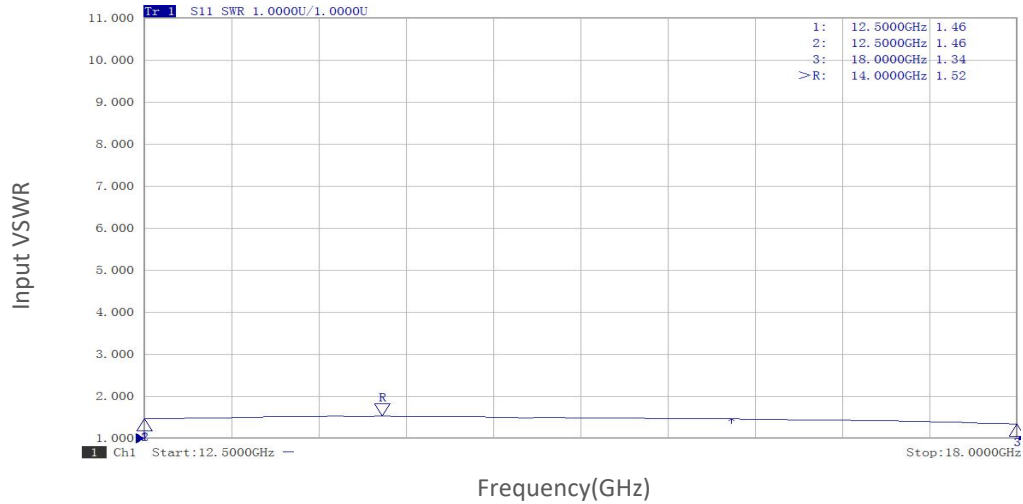
Parameter	Min	Typ	Max	Units
Operating Temperature	-45		+85	°C
Non-operating Temperature	-55		+125	°C
Relative humidity		95		%
Altitude	30000			feet
Shock / Vibration(MIL-STD-810F)	25g rms (15 degree 2KHz) endurance, 1 hour per axis			
Shock(non operating)	20G for 11msc half sin wave,3 axis both directions			

Ordering Information:

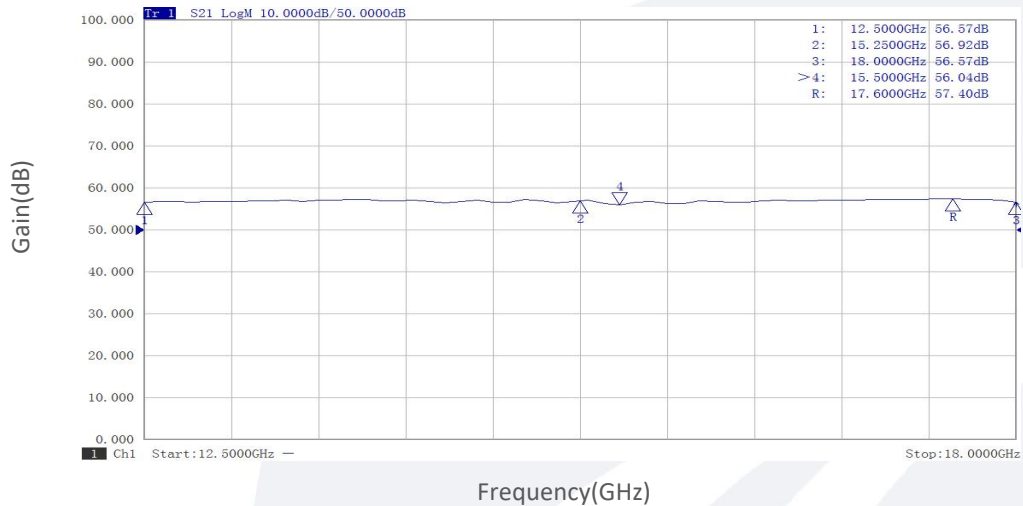
Part Number	Description	Revision
TLPA12.5G18G-47-40	Power amplifier 12.5-18GHz,Gain 47dB,Psat:40dBm,+28V DC,Without Heatsink.	Rev.1.1
TLPA12.5G18G-47-40-HS	Power amplifier 12.5-18GHz,Gain 47dB,Psat:40dBm,+28V DC,With Heatsink.	Rev.1.1

Typical Performance Data:

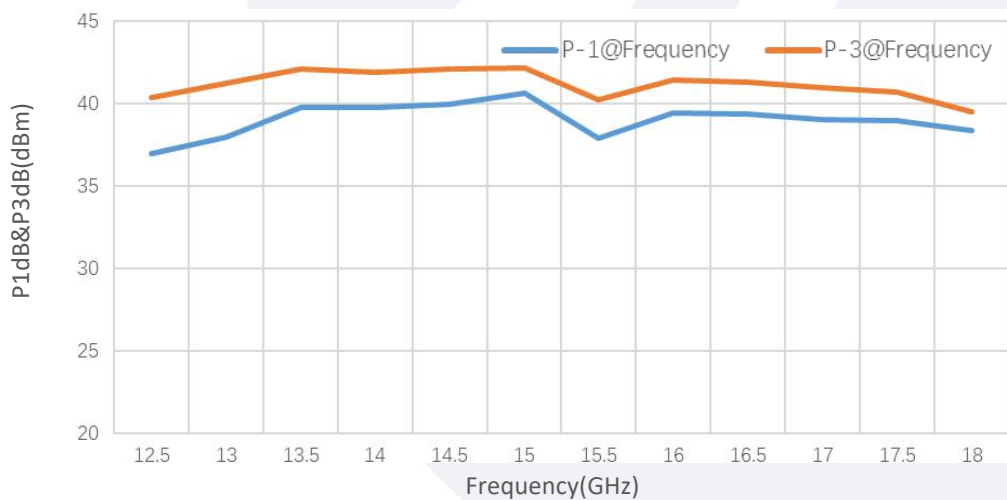
Input VSWR vs Frequency



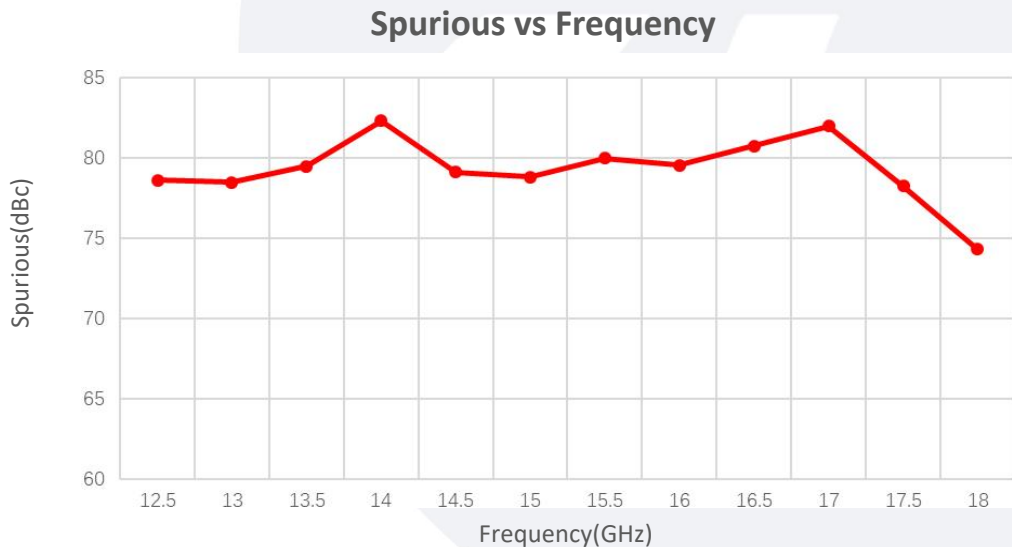
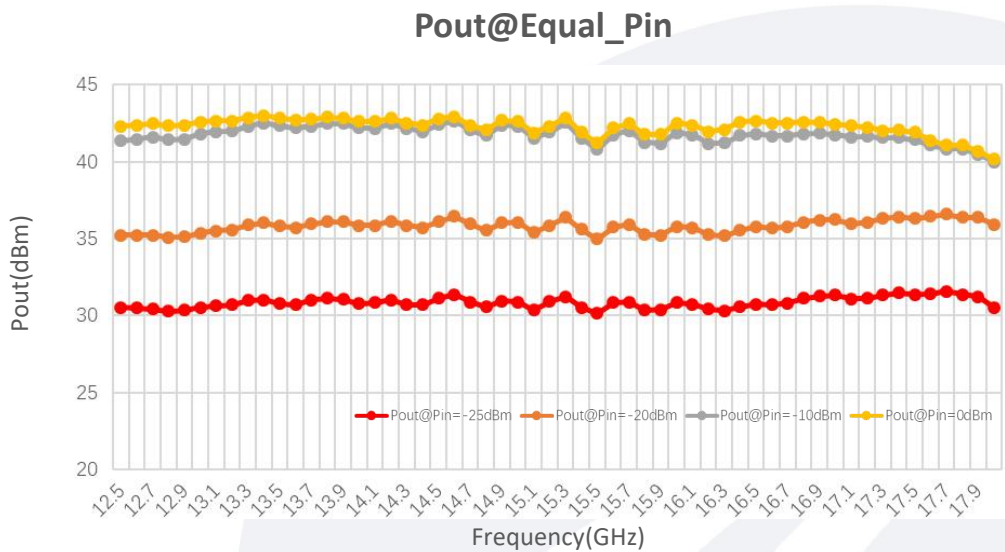
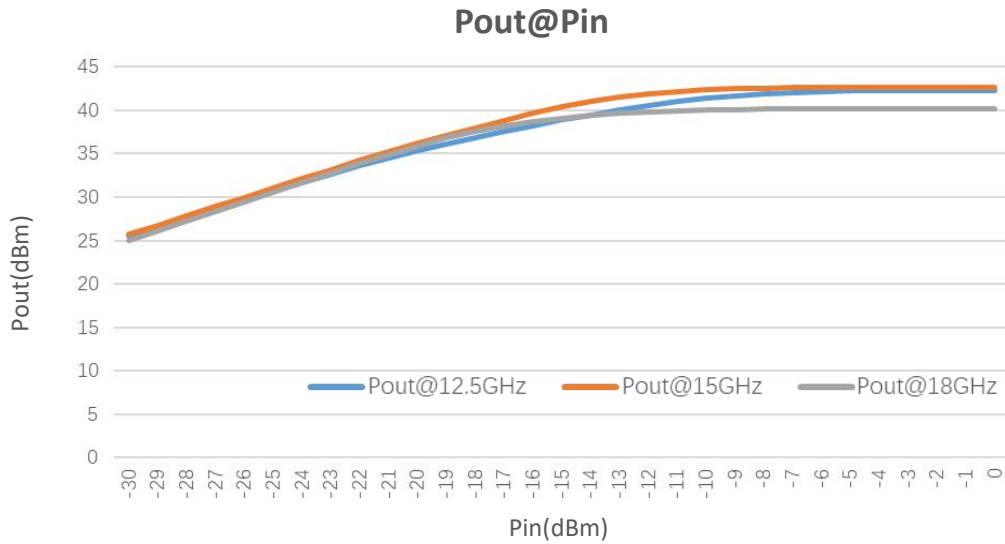
Gain vs Frequency



P1dB&P3dB vs Frequency



Typical Performance Data:



Typical Performance Data:

Harmonic vs Frequency

