

Model:TLPA2G27G-40-33

Power Amplifier

2-27GHz, Gain:40dB, Psat:33dBm

Feature:

- Ultra Wide Band: 2-27GHz
- Gain:40dB Typ
- Psat Output Power: 33dBm Min
- Good Power and Gain Flatness
- 50 Ohm Matched Input / Output

Electrical Specifications:

Parameter	Min	Typ	Max	Units
Frequency range	2-27			GHz
Gain	33			dB
Small-signal Gain@2-8G		40		dB
Gain Flatness		±3		dB
Output P1dB		30		dBm
Output Psat	33	34		dBm
Nosie Figure		4		dB
Spurious			-60	dBc
Harmonic			-10	dBc
Input VSWR			2.0	:1
Output VSWR		2.0		:1
DC Voltage		+18		V DC
DC Supply Current			2	A
Impedance	50			Ohms

Mechanical Specifications:

Parameter	Value	Units
Input /Output Connector	2.92 Female/2.92 Female	
DC Power Interface	J30J-9ZKP	
Size	150*90*20	mm
Weight	500	g

Absolute Maximum Ratings:

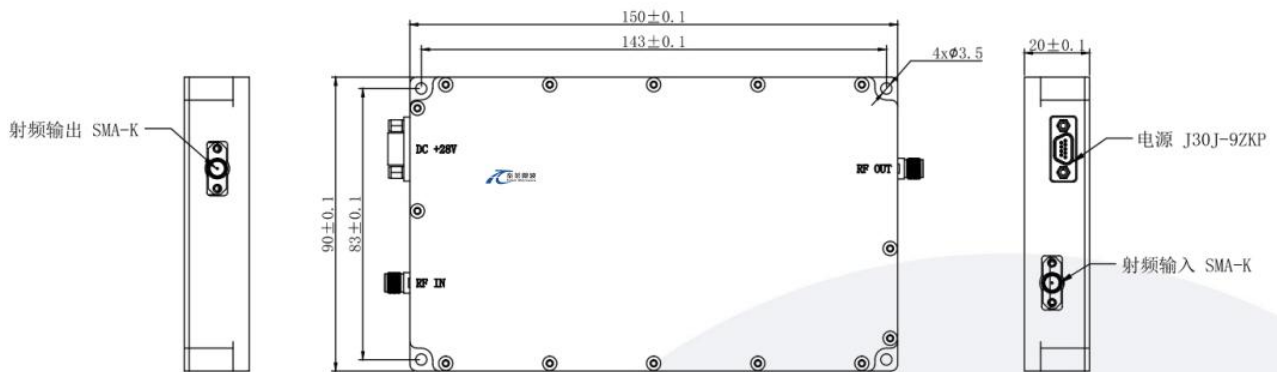
Parameter	Value
Supply Bias Voltage	TBD
RF Input Power	5dBm
ESD sensitivity (HBm)	Class 0, passed 150V



**Available 220V System
Benchtop Amplifier**

Outline Drawing:

Unit: mm



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



OBSERVE PRECAUTIONS
ELECTROSTATIC SENSITIVE
DEVICES

Environmental Conditions:

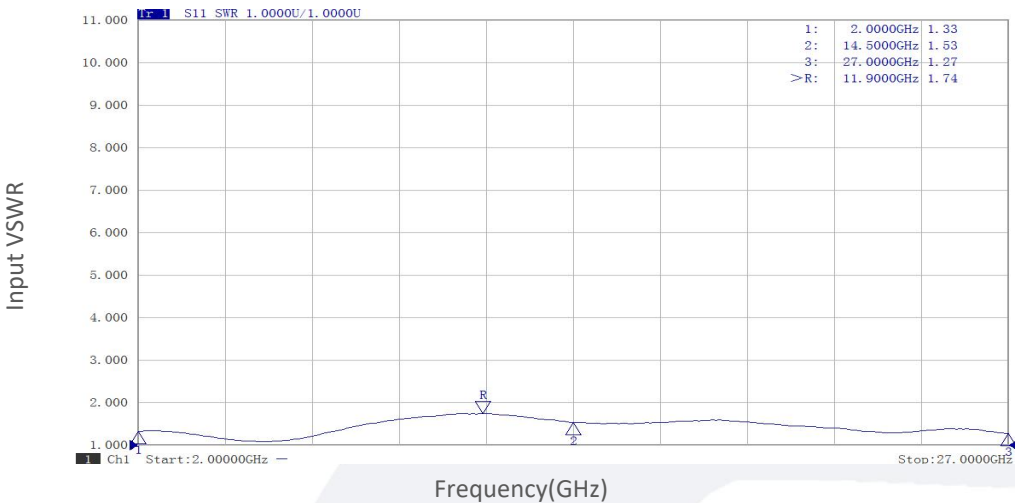
Parameter	Min	Typ	Max	Units
Operating Temperature	-40		+60	°C
Non-operating Temperature	-45		+65	°C
Relative humidity		95		%
Altitude	50,000			feet
Shock / Vibration(MIL-STD-810F)	25g rms (15 degree 2KHz) endurance, 1 hour per axis			
Shock(non operating)	20G for 11msc half sin wave,3 axis both directions			

Ordering Information:

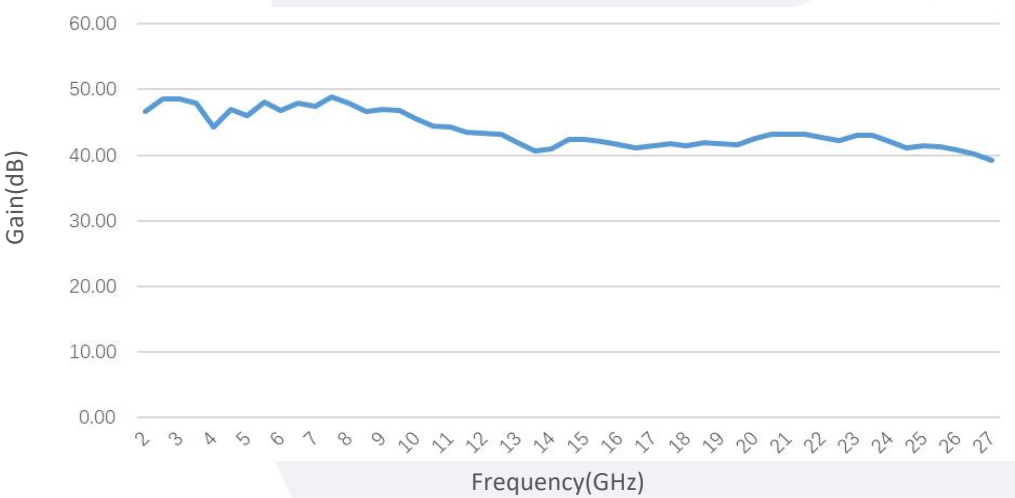
Part Number	Description	Revision
TLPA2G27G-40-33	Power amplifier 2-27GHz, Gain:40dB, Psat:33dBm, NF:4.0dB, +18V DC, Without Heatsink.	Rev.1.1
TLPA2G27G-40-33 -HS	Power amplifier 2-27GHz, Gain:40dB, Psat:33dBm, NF:4.0dB, +18V DC, With Heatsink.	Rev.1.1

Typical Performance Data:

Input VSWR vs Frequency

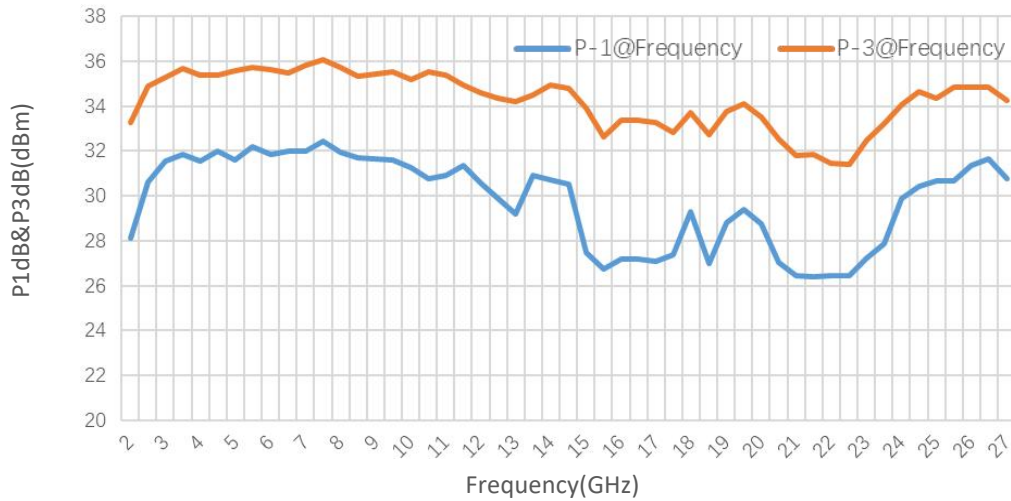


Gain vs Frequency

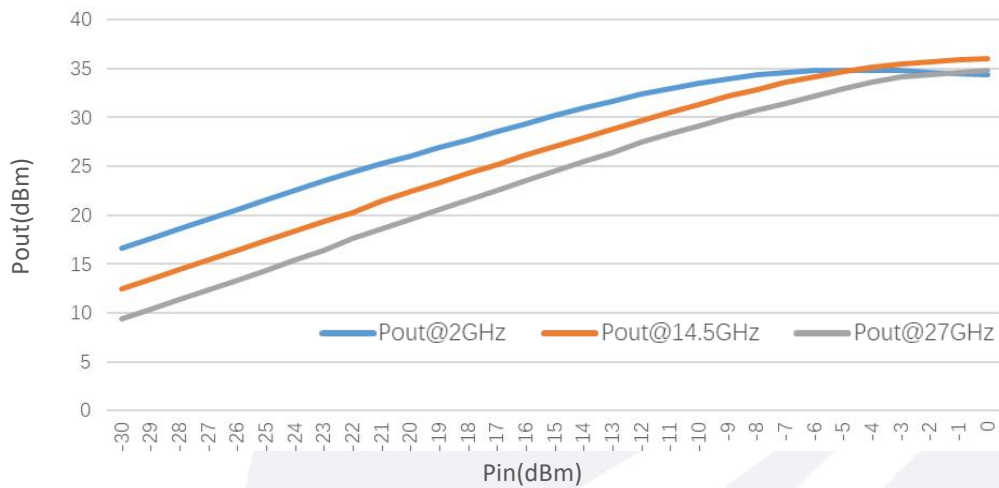


Typical Performance Data:

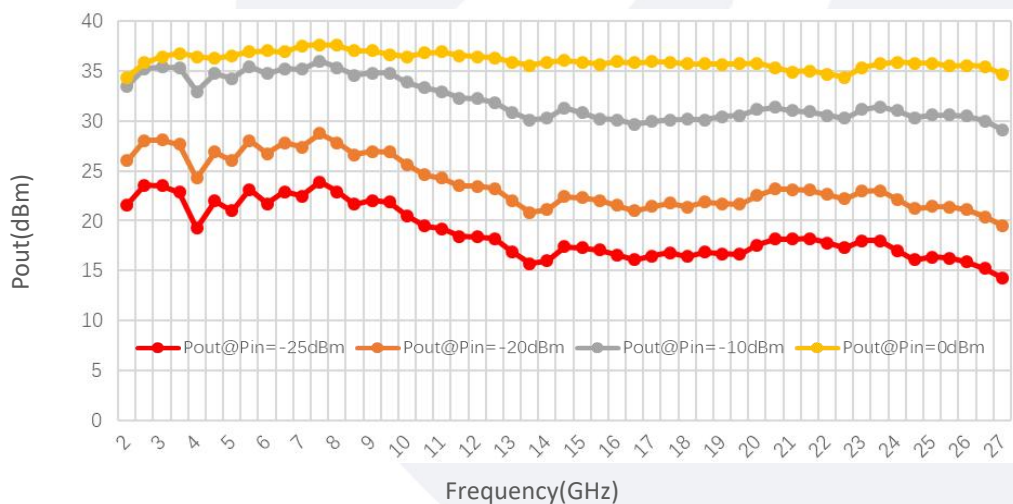
P1dB&P3dB vs Frequency



Pout@Pin

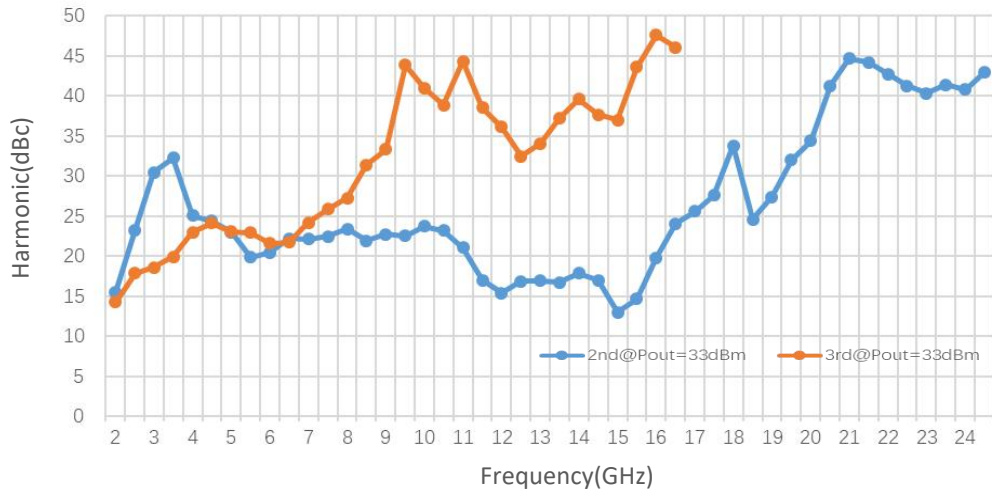


Pout@Equal_Pin



Typical Performance Data:

Harmonic vs Frequency



Spurious vs Frequency

