

## Power Amplifier

26-40GHz/37dB Gain/37dBm Psat

Model: TLPA26G40G-37-37

TLPA26G40G-37-37 is a power amplifier with a typical small signal gain of 37 dB and a minimum Psat of 37 dBm across the frequency range of 26 to 40 GHz. The DC power requirement for the amplifier is +24 VDC/1.1 A. The input and output port configuration offers coax adapter structure with 2.92mm female.

### Features:

- Frequency range: 26-40GHz
- Gain: 37dB Typ
- Output Power Psat: 37dBm Min
- Good Power and Gain Flatness
- 50 Ohm Matched Input / Output

### Applications:

- Cellular
- PCN
- GSM
- ISM
- Lab Test

### Electrical Characteristics:

Parameter	Min	Typ	Max	Units
Frequency range	26		40	GHz
Small Signal Gain		37		dB
Output Psat	37			dBm
Input VSWR			2	:1
DC Voltage		24		V DC
DC Supply Current		1.1		A
Impedance	50			Ohms

### Mechanical Specifications:

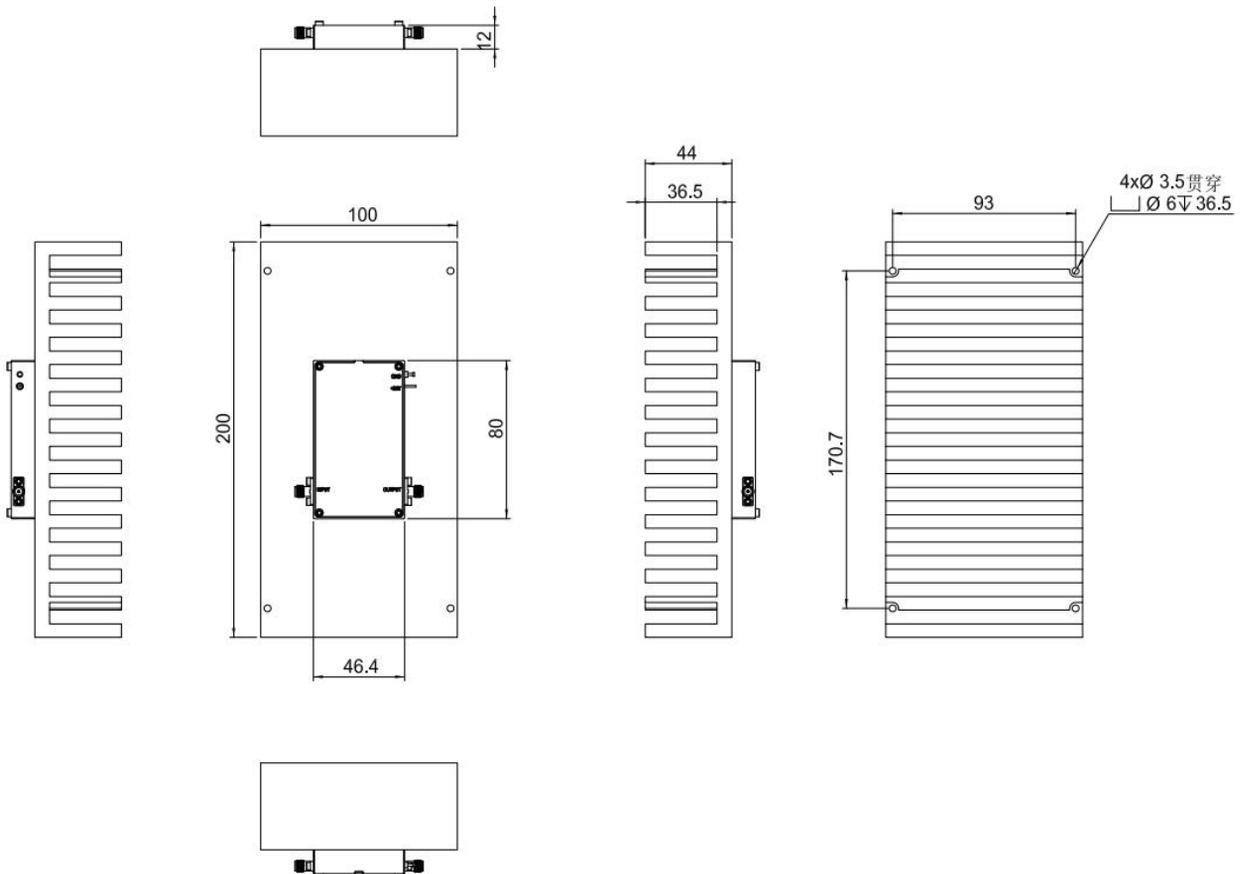
Parameter	Value	Units
Input /Output Connector	2.92mm Female/2.92mm Female	
DC Bias	Solder Pin	
Size	46.4*80*12(Without heatsink) 100*200*56(With heatsink)	mm

### Absolute Maximum Ratings:

Parameter	Value
Supply Bias Voltage	+26 V
RF Input Power	+20 dBm
ESD sensitivity (HBm)	Class 0, passed 150V

### Outline Drawing:

Unit:mm



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



ESD Protection: Strictly adhere to ESD precautions to prevent electrostatic damage.

### Environmental Conditions:

Parameter	Min	Typ	Max	Units
Operating Temperature*	-40		+60	°C
Non-operating Temperature*	-50		+70	°C
Relative humidity		95		%
Altitude	10,000			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			

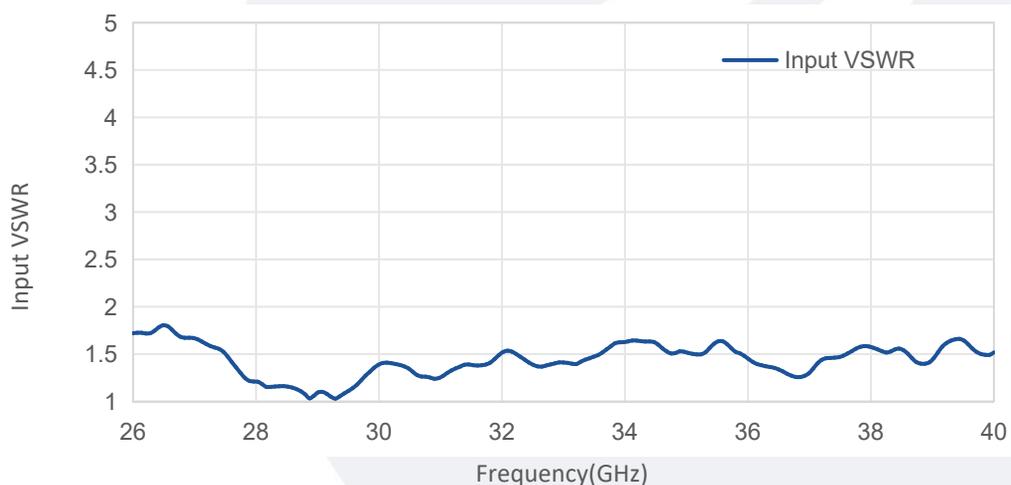
\*Note: For a wider temperature range, please consult the manufacturer.

### Ordering Information:

Base Number	Description	Revision
TLPA26G40G-37-37	Power amplifier 26-40GHz, Gain:37dB,Psat:37dBm,+24V DC,Without Heatsink	Rev.1.0
TLPA26G40G-37-37-HS	Power amplifier 26-40GHz, Gain:37dB,Psat:37dBm,+24V DC,With Heatsink	Rev.1.0

### Typical Performance Data:

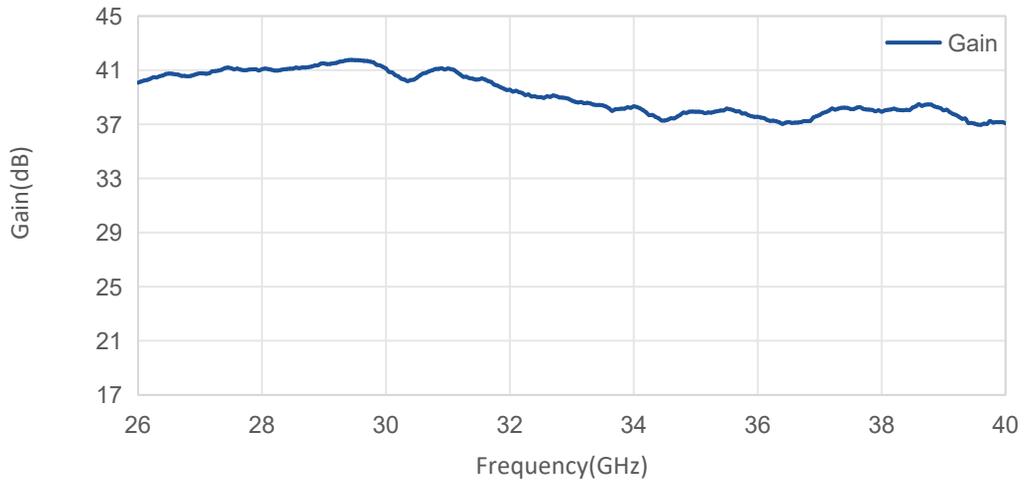
Input VSWR vs Frequency



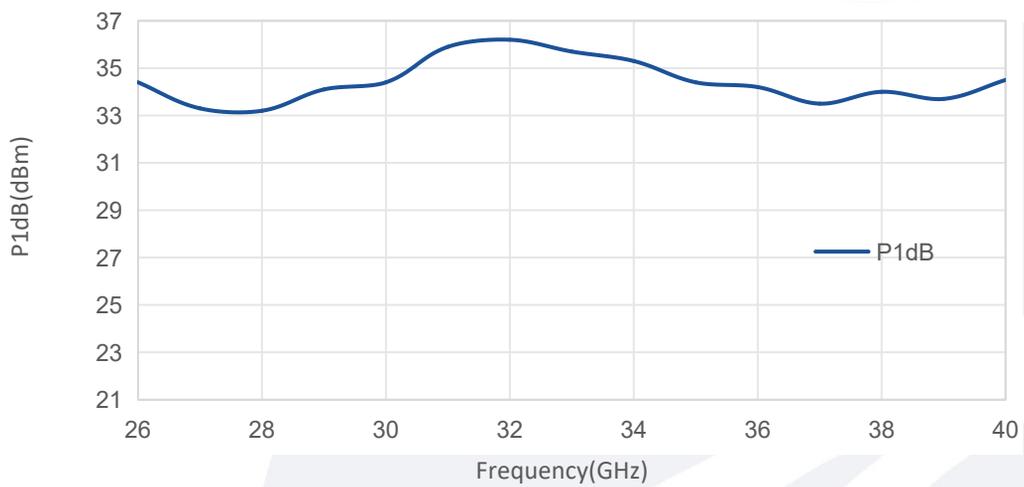
Note: Above data is for ref only, actual data may vary from unit to unit depending on operating environment and other factors like material lots etc.

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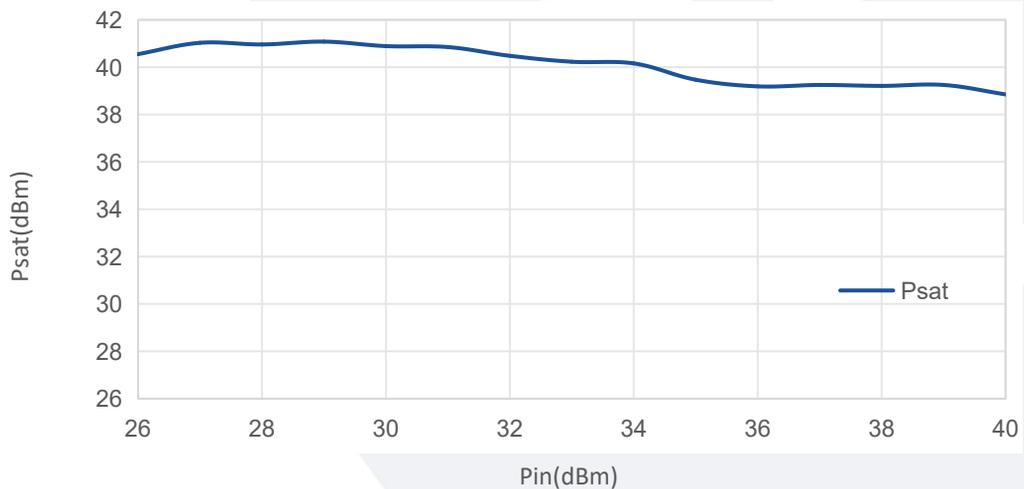
### Small Signal Gain vs Frequency



### P1dB vs Frequency



### Psat vs Frequency



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