

Power Amplifier

1-1.1GHz/50dB Gain/57dBm Psat

Model: TLPA1G1.1G-50-57

TLPA1G1.1G-50-57 is a power amplifier with a typical gain of 50 dB and a minimum Psat of 57 dBm across the frequency range of 1 to 1.1 GHz. The DC power requirement for the amplifier is +32 VDC/50 A. The input and output port configuration offers coax adapter structure with SMA female.

Features:

- Frequency range: 1-1.1GHz
- Gain: 50dB Typ
- Output Power Psat: 57dBm 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	1		1.1	GHz
Gain	45	50		dB
Gain Flatness		±1	±2	dB
Output P1dB	50	53		dBm
Output Psat	57	57.5		dBm
Input VSWR		1.5	2	:1
DC Voltage	+30	+32	+34	V DC
DC Supply Current		5	50	A
Impedance	50			Ohms

Mechanical Specifications:

Parameter	Value	Units
Input /Output Connector	SMA Female/SMA Female	
DC Supply Connector	Solder Pin	
Size	230*150*25	mm
Weight	1500	g

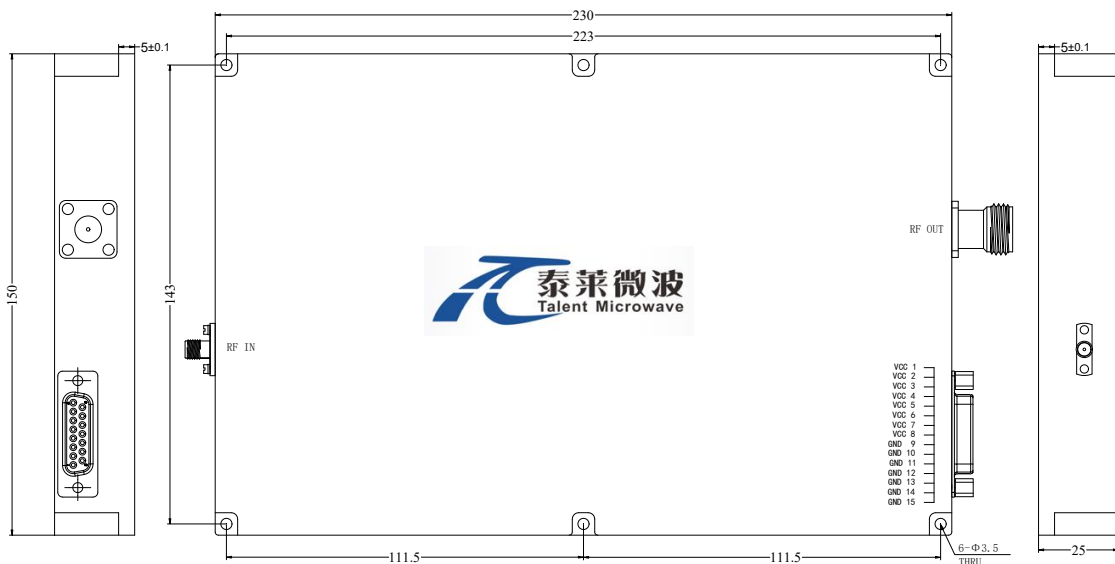
Absolute Maximum Ratings:

Parameter	Value
Supply Bias Voltage	+30 V
RF Input Power	+5 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*	-20		+50	°C
Non-operating Temperature*	-30		+60	°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
TLPA1G1.1G-50-57	Power amplifier 1-1.1GHz, Gain:50dB,Psat:57dBm,+32V DC,Without Heatsink	Rev.1.1
TLPA1G1.1G-50-57-HS	Power amplifier 1-1.1GHz, Gain:50dB,Psat:57dBm,+32V DC,With Heatsink	Rev.1.1