Power Amplifier

Model: PA-6G-8G-25

6-8GHz 25W CW

Ultrabroad frequency range, high performanceand exceptional RF characteristics

Features:

- Frequency range: 6-8GHz
- High output power at saturation, 25W Min.
- High gain, 38 dB Typ.
- 50 Ohm Matched Input / Output.

Applications:

- Cellular
- PCN
- GSM
- ISM
- Lab Test

Product Overview：

The PA-6G-8G-25 is a power amplifier with a typical small signal gain of 38 dB and a minimum Psat of 25W across the frequency range of 6 to 8GHz. The DC power requirement for the amplifier is +28 VDC/2 A. The input and output port configuration offers coax adapter structure with SMA female.

Electrical Specifications at 25℃:

Parameter	Min	Typ	Max	Units
Frequency range	6		8	GHz
Small Signal Gain	36	38		dB
Small Signal Gain Flatness		±1.5		dB
Gain Variation@TEM			±2	dB
Output P1dB		41		dBm
Output Psat	44			dBm
Spurious		-60		dBc
Harmonic		-15		dBc
Input VSWR		1.5	2	:1
DC Voltage		+28		V DC
DC Supply Current@Pout=10W		2	4	A
Impedance		50		Ohms

Mechanical Specifications:

Parameter	Value	Notes
Operating Temerature*	-40℃ to +50℃	
Non-operating Temperature*	-50℃ to +60℃	
Relative humidity	95%	
RF Input/Output Connector	SMA Female/SMA Female	
DC Bias	Solder Pin	
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	
Dimensions W x H x D	115*100*20(Without Heatsink) 175*114*70(With Heatsink)	mm
Weight	1500	g

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

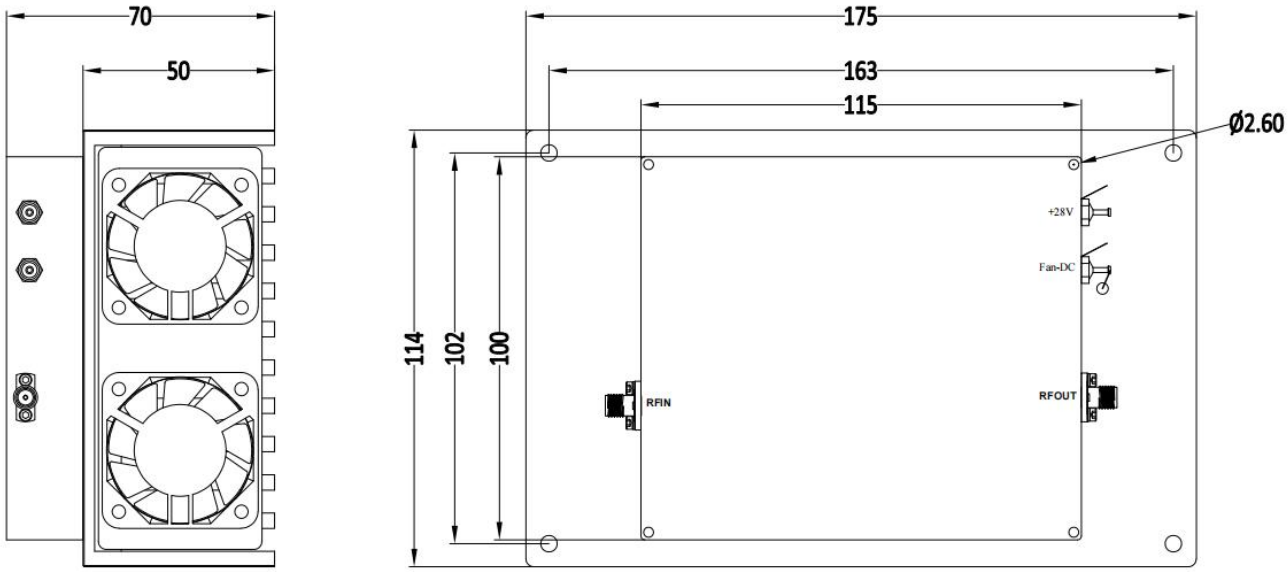
Absolute Maximum Ratings:

Parameter	Value
Supply Bias Voltage	TBD
RF Input Power	+15 dBm
ESD sensitivity (HBm)	Class 0, passed 150V

Outline Drawing:

Unit:mm

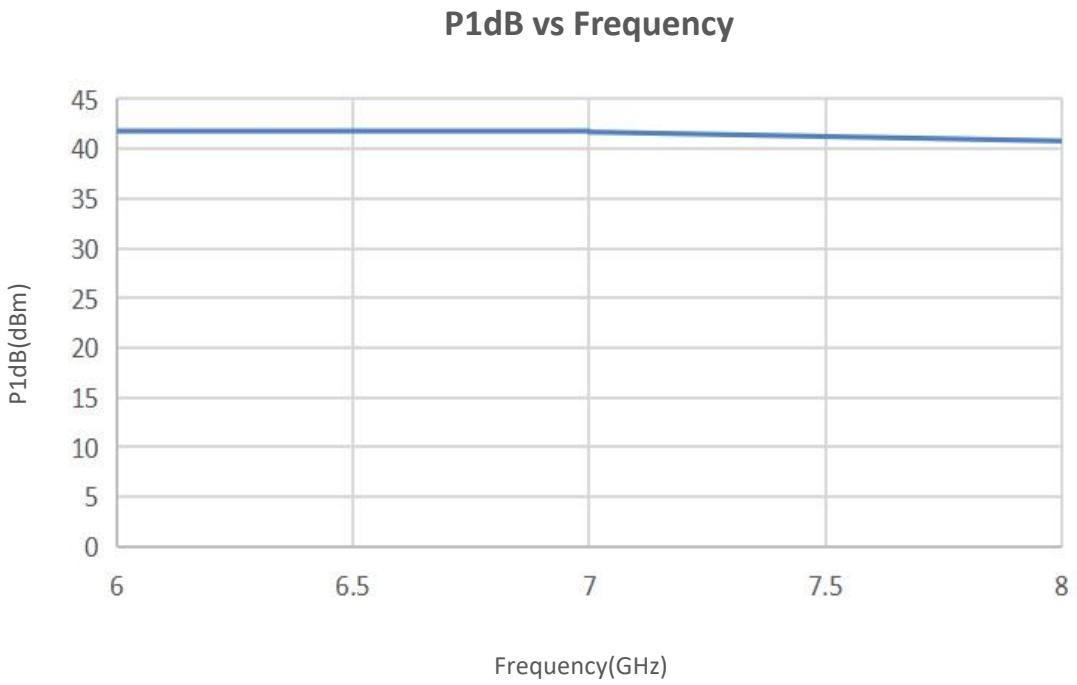
PA-6G-8G-25-HS

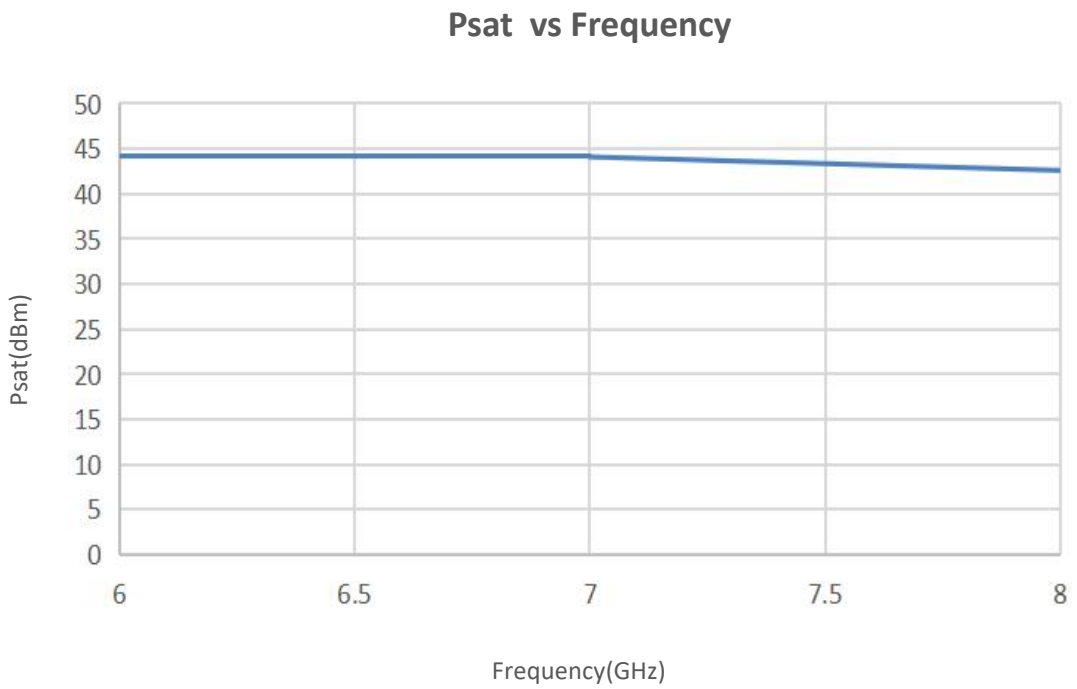


Ordering Information:

Base Number	Description	Optional
PA-6G-8G-25	Power Amplifier, 6-8GHz, Gain:38dB,Psat:25W,+28V DC	Without Heatsink
PA-6G-8G-25-HS	Power Amplifier, 6-8GHz, Gain:38dB,Psat:25W,+28V DC	With Heatsink

Typical Performance Data:





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.