Suzhou Talent Microwave,Inc
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W-Band Power Amplifier

WR-10/75-110GHz/33dB Gain/34dBm Psat Model: TMPA-075110-3334-10

TMPA-075110-3334-10 is a W-Band power amplifier with a typical power gain of 33 dB and a nominal Psat of 34 dBm across the frequency range of 75 to 110 GHz. The DC power requirement for the amplifier is +18 VDC/10 A. The input and output port configuration offers an inline structure with WR-10 waveguides and UG-387/U-M anticocking flanges.

Features:

- Frequency range: 75-110 GHz
- Gain: 33dB Typ
- Output Power Psat: 34dBm Typ
- Good Power and Gain Flatness

Applications:

- Passive Imaging
- Communication Systems
- Radar Systems

Electrical Characteristics:

Parameter	Min	Typ	Max	Units
Frequency range	75		110	GHz
Power Gain	30	33		dB
Output Psat	33	34		dBm
Input VSWR		2		:1
Output VSWR		2		:1
DC Voltage	17.5	18	18.5	V DC
DC Supply Current		10	16	A

Mechanical Specifications:

Parameter	Value	Units
Input /Output Connector	WR-10/UG-387/U	
DC Bias	J30J-31ZKP	Pin1~16:+18V Pin17~31:GND
Size	260*200*150	mm

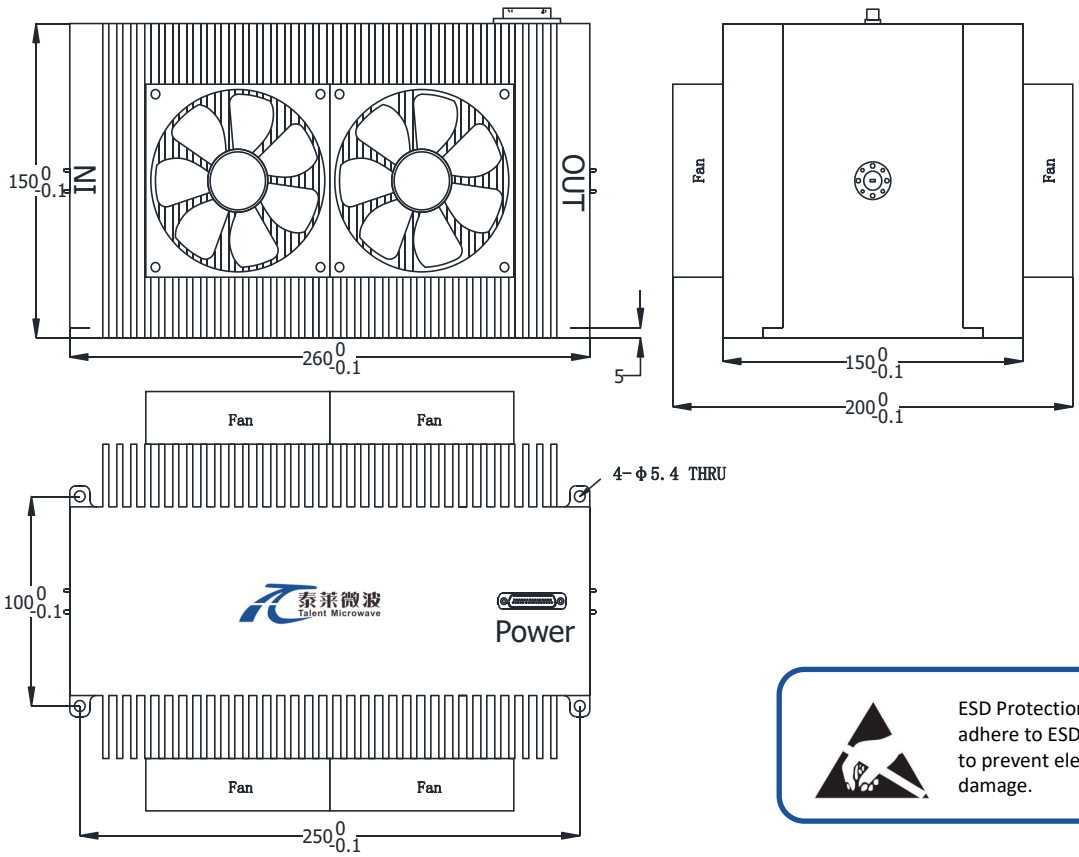
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Absolute Maximum Ratings:

Parameter	Value
Supply Bias Voltage	+18.5 V
RF Input Power	+13 dBm
ESD sensitivity (HBm)	Class 0, passed 150V

Outline Drawing:

Unit:mm; Tolerance:±0.1mm



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

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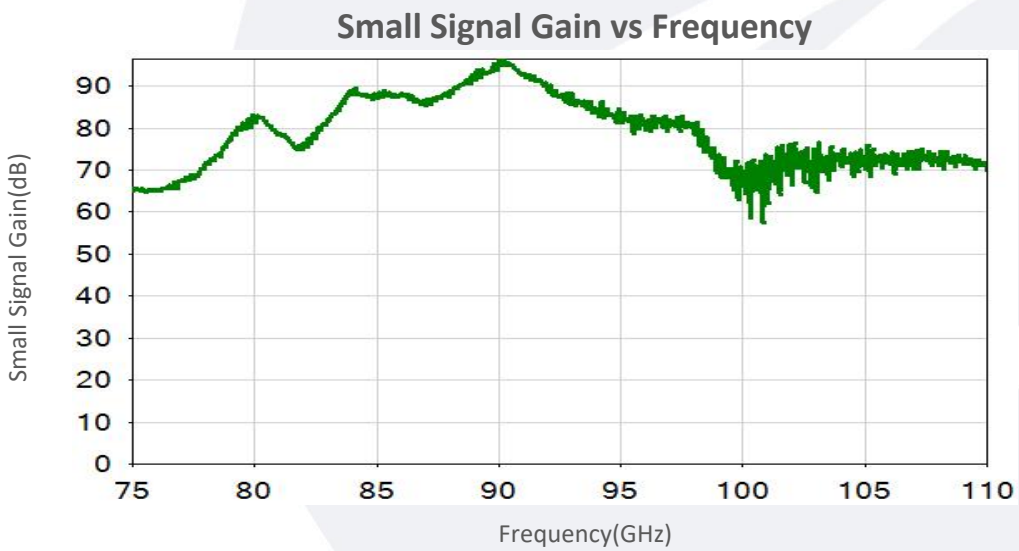
Environmental Conditions:

Parameter	Min	Typ	Max	Units
Operating Temperature	+10		+40	℃
Non-operating Temperature	0		+50	℃
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			

Ordering Information:

Base Number	Description	Revision
TMPA-075110-3334-10	Power Amplifier, 75-110 GHz, Gain:33 dB Type, Psat:34 dBm Type, +18V DC,WR-10, Without heatsink	Rev.1.1
TMPA-075110-3334-10-HS	Power Amplifier, 75-110 GHz, Gain:33 dB Type, Psat:34 dBm Type, +18V DC,WR-10, Without heatsink	Rev.1.1

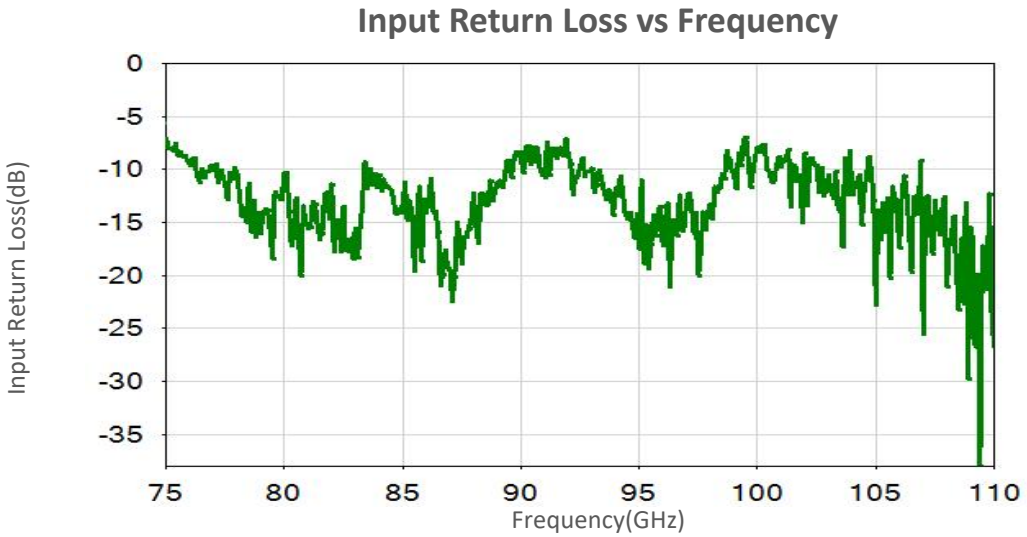
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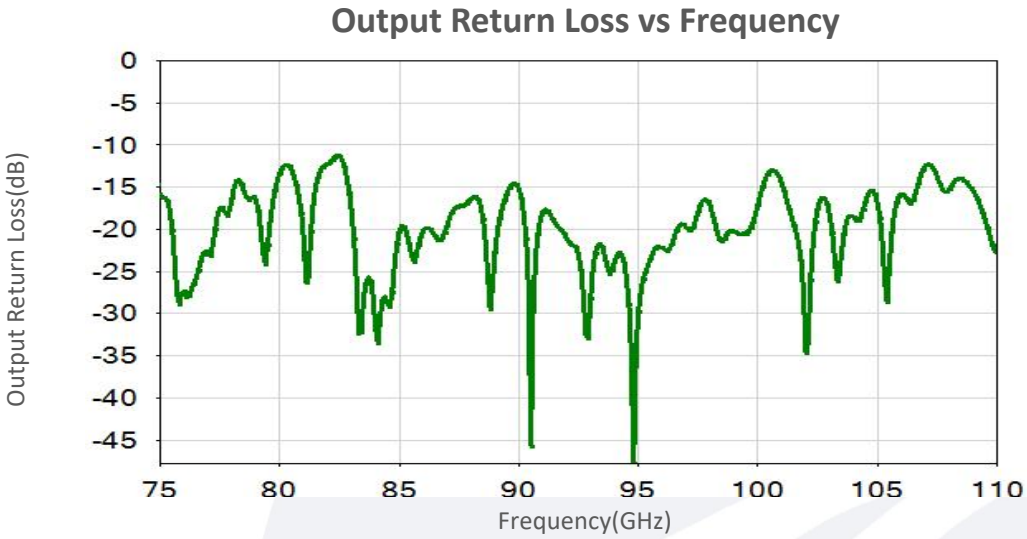


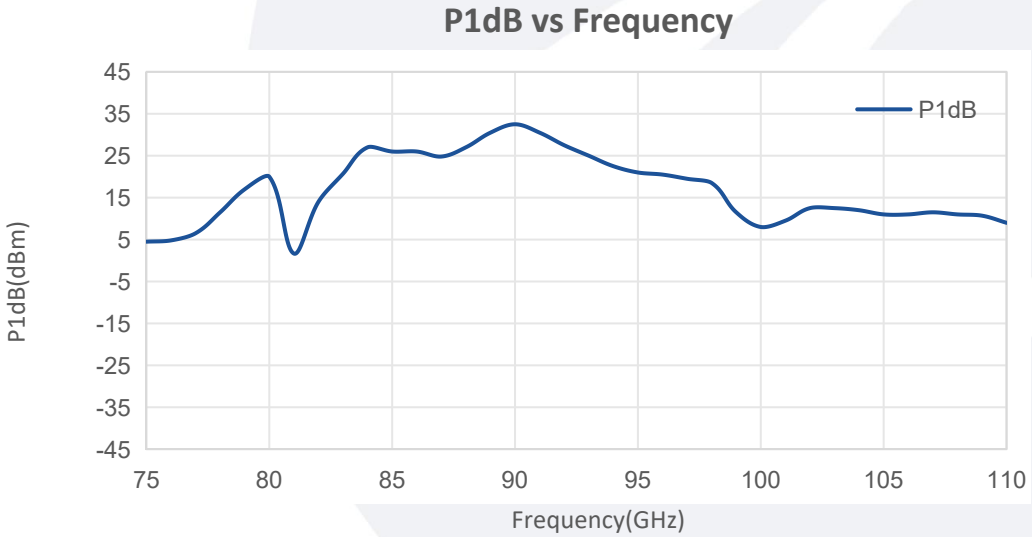
Note: Above data is for ref only, actual data may vary from unit to unit depending on operating environment and other factors like material lots etc.

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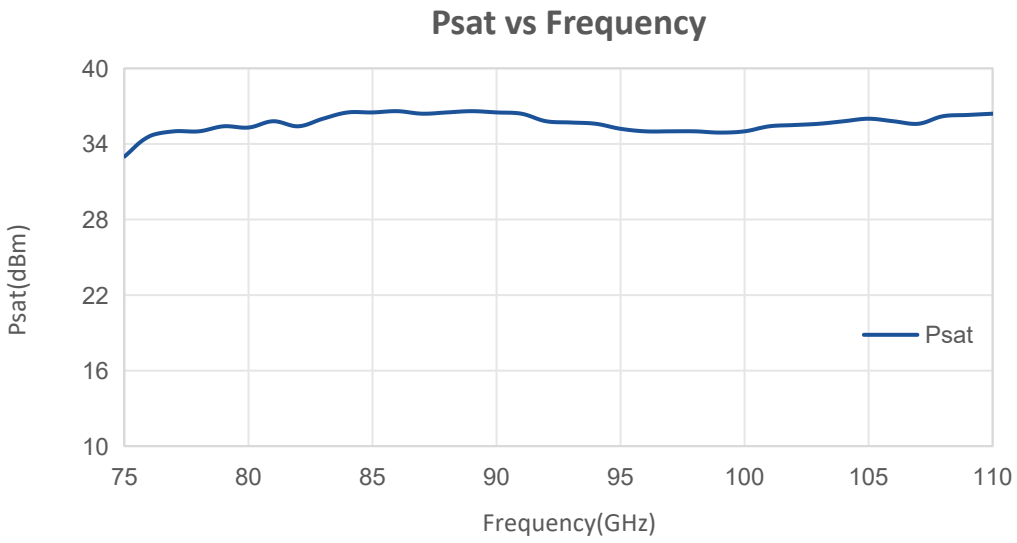




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