

Performance

- Technology: 0.25um Power GaN HEMT
- Frequency: 0.35~2.0GHz
- Typical Pout : 44dBm(CW)
- Typical Gain: 34dB
- Typical PAE: 40%
- Bias: 28V/-2~-2.5V@0.5A
- Package: Metal Ceramic

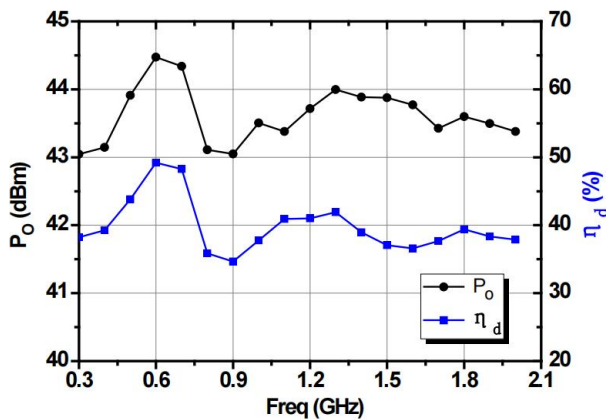


Electrical Specifications ($T_A=25^\circ\text{C}$, $V_d=28\text{V}$, $I_{dQ}=0.5\text{A}$, $F: 0.35\sim 2.0\text{GHz}$, $P_{in}=10\text{dBm}$)

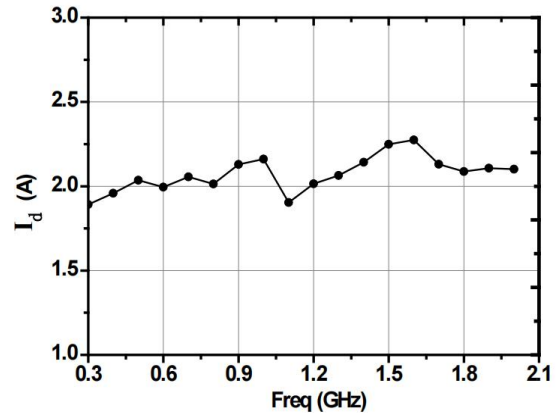
Symbol	Parameter	Min	Typical	Max	Unit
Pout	Output Power	-	44	-	dBm
Gp	Power Gain	-	34	-	dB
η_{add}	Power Added Efficiency	-	40	-	%
ΔGp	Gain Flatness	-	-	± 0.7	dB
Rth	Thermal Resistance	-	2	-	$^\circ\text{C}/\text{W}$

Test Curves

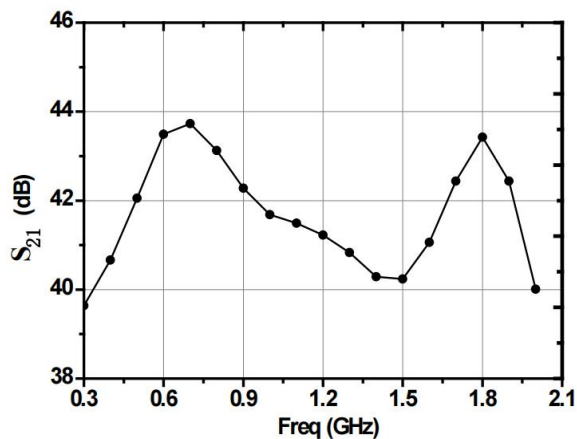
Pout, η_{add} &Freq.



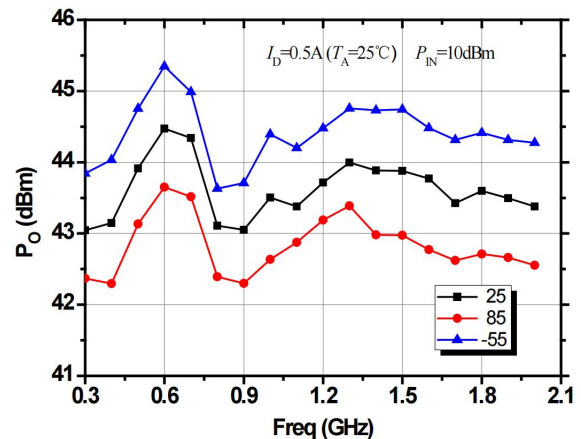
I_d &Freq.

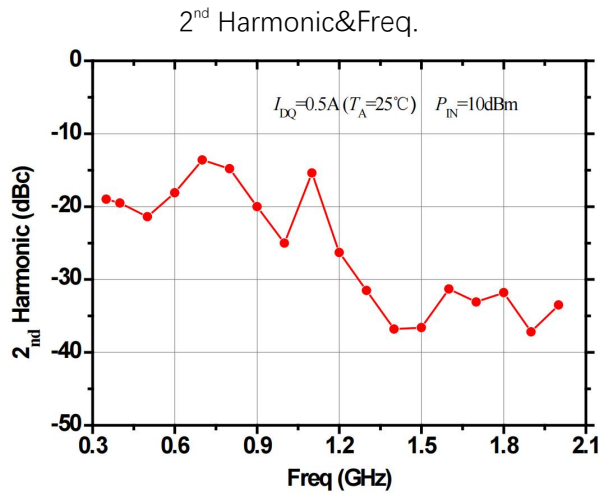


Gain&Freq.



Pout&Freq. @ Different Temp.

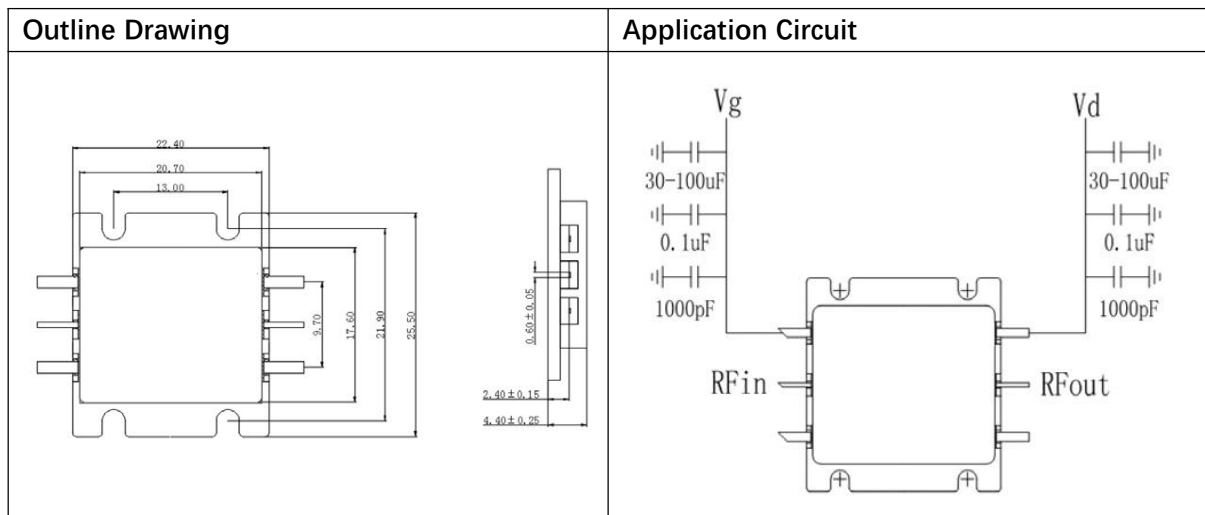




Absolute Max Ratings ($T_A=25^\circ C$)

Symbol	Parameter	Value	Remark
Vd	Drain Voltage	40V	
Vg	Grid Voltage	-5V	
Pd	DC Dissipation	100W	25°C
Tch	Channel Temperature	225°C	【1】
Tm	Mounting Temperature	300°C	1 min, N2 Protection
Tstg	Storage Temperature	-55~175°C	

【1】 Exceeding any one or combination of these limits may cause permanent damage.



Note:

- (1) This product is an internal matching power amplifier module, and the input and output impedance values are both 50 ohms;
- (2) Please strictly follow the order of adding negative electricity first and then positive electricity in the power-on sequence. When de-energizing, first reduce the drain voltage and then reduce the gate voltage;
- (3) This product is a high-power device. It is necessary to pay attention to heat dissipation during use. The higher the case temperature, the shorter the service life. It is advisable to use the temperature not higher than 85 degrees;
- (4) This product is an electrostatic sensitive device, you need to pay attention to electrostatic protection during storage and use, and you need to be well grounded when using it;
- (5) The input standing wave is relatively high, and radio frequency isolation measures are required at the input end.