Performance

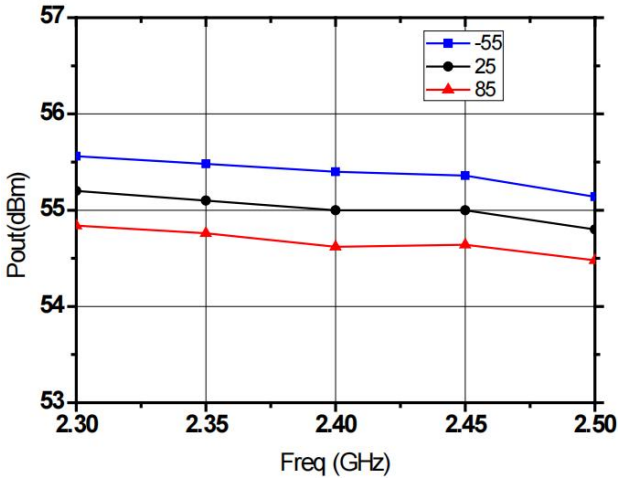
- Technology: 0.35um Power GaN HEMT
- Frequency: 2.3~2.5GHz
- Typical Pout : 55dBm
- Typical Gain: 13dB
- Typical PAE: 62%
- Bias: 32V/-3.1V
- Impedance: 50Ω
- Package: Metal Ceramic

Electrical Specifications (T_A=25℃,V_d=32V,Vg=-3.1V,F: 2.3~2.5GHz,PL=450us,D.C=15%)

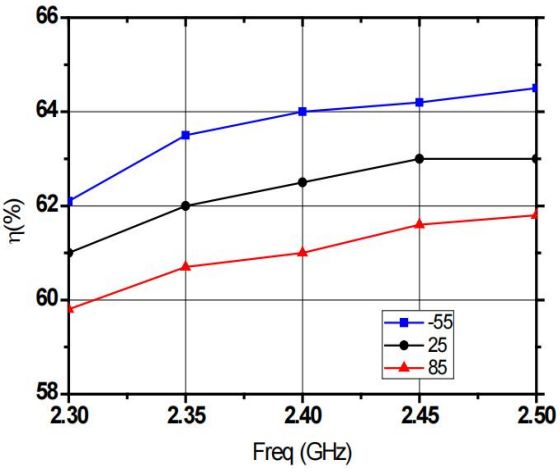
Symbol	Parameter	Min	Typical	Max	Unit
Pout	Output Power	-	55	-	dBm
Gp	Power Gain	-	13	-	dB
ηadd	Power Added Efficiency		62	-	%
Rth	Thermal Resistance	-	-	0.32	℃/W

Test Curves

Pout&Freq. @ Different Temp.



PAE&Freq. @ Different Temp.

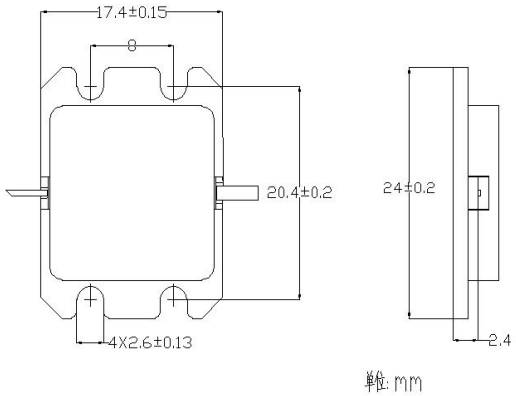


Absolute Max Ratings (T_A=25℃)

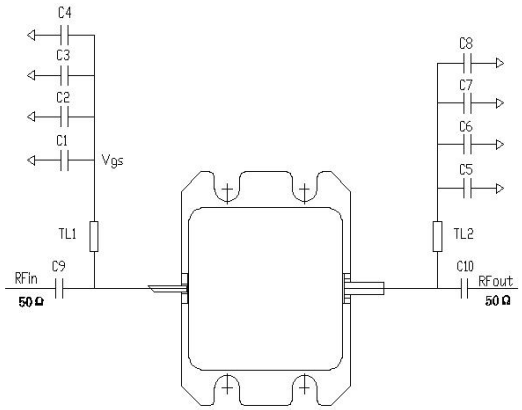
Symbol	Parameter	Value	Remark
Vd	Drain Voltage	36V	
Vg	Grid Voltage	-5V	
Tch	Channel Temperature	225℃	【1】
Tm	Mounting Temperature	300℃	1 min, N_2 Protection
Tstg	Storage Temperature	-55~175℃	
Tc	Operating Temperature	-55~85℃	

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

Outline Drawing



Application Circuit



Parameter	Symbol	Value	Unit
Filter capacitor	C1,C5	27	pF
Filter capacitor	C2,C6	1000	pF
Filter capacitor	C3,C7	10	nF
Filter capacitor	C4,C8	47	μF
DC isolation capacitance	C9,C10	27	pF
Microstrip line	TL1,TL2	λ/4	-

Note:

(1) Connect the circuit according to the diagram, pay attention to anti-static, and ensure good grounding and heat dissipation when using power devices;

(2) In order to ensure the good performance of the power module, the capacity value of the power filter and the energy storage capacitor shall be reasonably selected according to the modulation mode during pulse operation;

(3) Power module power-up sequence: Vgs, Vds;

(4) Power module power-off sequence: Vds, Vgs.