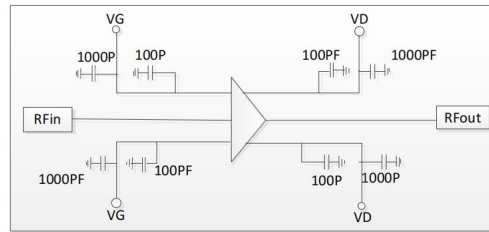## Performance

- Frequency: 32~38GHz
- Typical Signal Gain: 19dB
- Typical Pout: 40dBm@24V
- Bias: 24V, 1A (Static)
- Typical PAE: 25%
- Size: 19.2mm*9.15mm*1.84mm
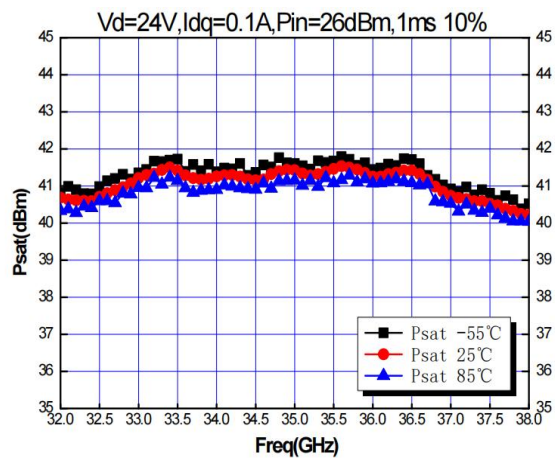
Function Diagram

Electrical Specifications (T$_A$=25℃, V$_d$=24V, Idq=0.1A, F: 32~38GHz,T=1ms,D.C=10%)

Symbol	Parameter	Min	Typical	Max	Unit
G	Small Signal Gain	-	19	-	dB
Gp	Power Gain	-	14	-	dB
Pout	Saturated Power	-	40	-	dBm
PAE	Power Added Efficiency	-	25	-	%

Test Curves

Pout@ Different Temp

Id
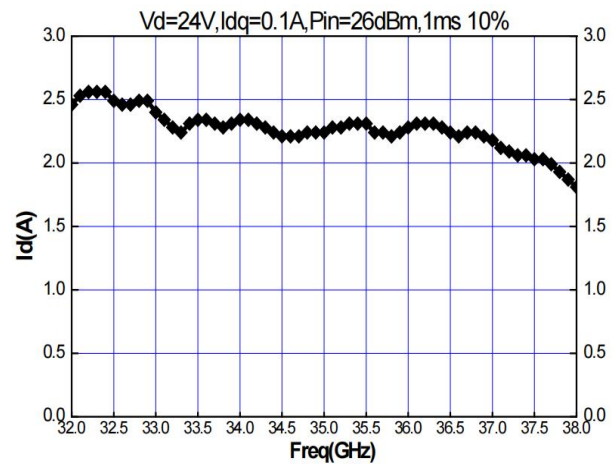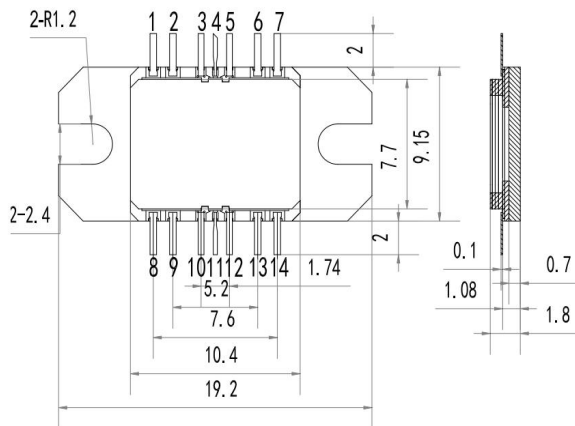
PAE@ Different Temp
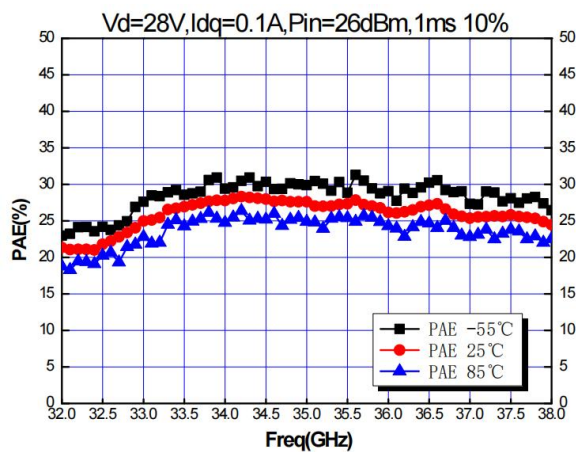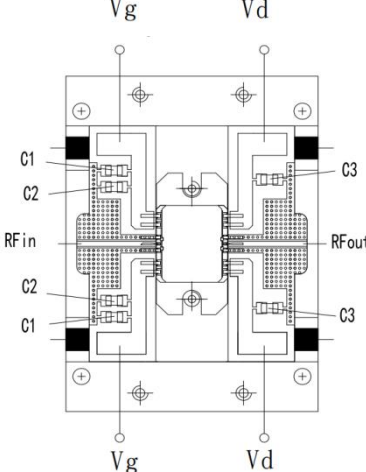
Absolute Max Ratings (T$_A$=25℃)

Symbol	Parameter	Value	Remark
Vd	Drain Voltage	28V	
Vg	Gage Voltage	-10V	
Ig	Gate Current	100mA	
Pin	Input Power	28dBm	
VSWRout	Output VSWR	5:1	
Operating Temp.	Operating Temperature range	140℃	
Tstg	Storage Temperature	-55~125℃	
ESD Level	ESD Sensitivity, Human Body Model	Class A	

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

Outline Drawing		Pin Definition	

Unit：mm

Pin No.	Function	Pin No.	Function
1,2	VG	8,9	VD
3,4,5	RFin	10,11,12	RFout
6,7	VG	13,14	RFout

Assembly Drawing	Recmmended external capacitor
	<table><tr><th>Symbol</th><th>Recommended capacitance</th></tr><tr><td>C1</td><td>10uF</td></tr><tr><td>C2</td><td>1uF</td></tr><tr><td>C3</td><td>1000pF</td></tr></table>

1、Apply the transmission line configuration as shown in drawing at RF input and output ports during usage.

2、Apply recommended operating voltage during turn on procedure.

3、When the module is operating under CW mode, add additional μ grade filter capacitors near Vd port as closely as possible.

4、If you use voltage stabilizer to switch the voltage, please make sure the selected stabilizer has higher over-current ability than recommended operating current.

5、During turn on procedure, first negative then positive time sequense.

6、Pay attention to current limiting during usage.

7、Make sure of well grounding during usage.

8、Pay attention to ESD protection during usage, storage and transportation.

9、Operating temperature has to be controlled strictly within the range data sheet specified.

10、When there's a quality issue, please return it to manufacture for repair, don't open the lid by yourself.