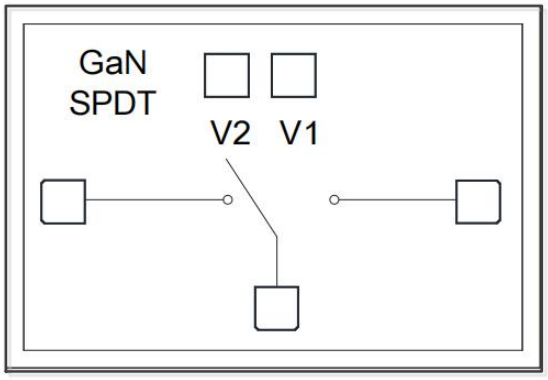
Performance

- Technology: 0.25um GaN FET
- Frequency: 0.5~2.5GHz
- Insertion loss: 0.6dB
- Isolation: 35dB
- Input P-0.3: 52dBm
- Input/Output VSWR: 1.2:1
- Switching Time: 20ns
- Control Mode: 0/-40V
- Voltage control reflective switch
- Chip size: 1.9*0.9*0.08mm

Function Diagram



Electrical Specifications (Ta=+25℃, V1~V2=0V/-40V, F=0.5~2.5GHz)

Symbol	Parameter	Min.	Typ.	Max.	Unit
Li	Insertion Loss	-	0.6	-	dB
ISO	Isolation	-	35	-	dB
VSWR	Input / Output VSWR	-	1.3	-	-

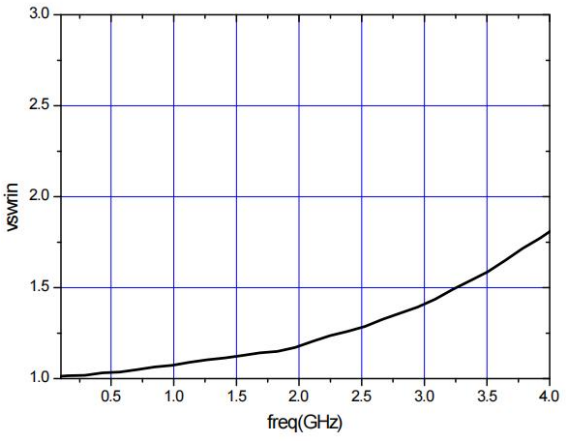
Absolute Maximum Ratings (Ta=+25℃)

Symbol	Parameter	Value	Notes
V1,2	Control Voltage	-60V	
Pcw	Input Continuous Wave Power	52.5dBm	
Tch	Channel Temperature	225℃	
T	Sintering Temperature	310℃	30s, N2 protection
Tstg	Storage Temperature	-55~150℃	

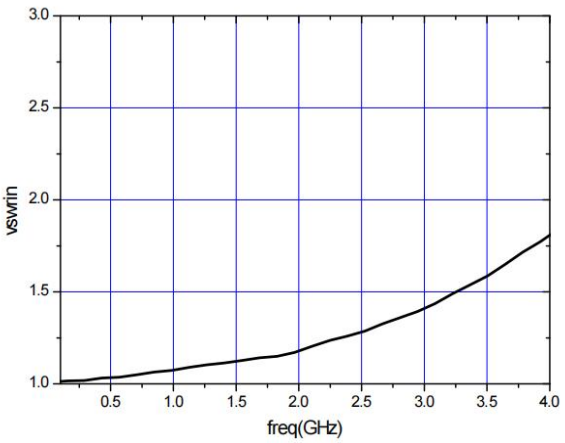
Exceed any of above listed ratings may cause permanent damage.

Test Curves (Ta=+25℃, ($V_{1,2}$=-40V))

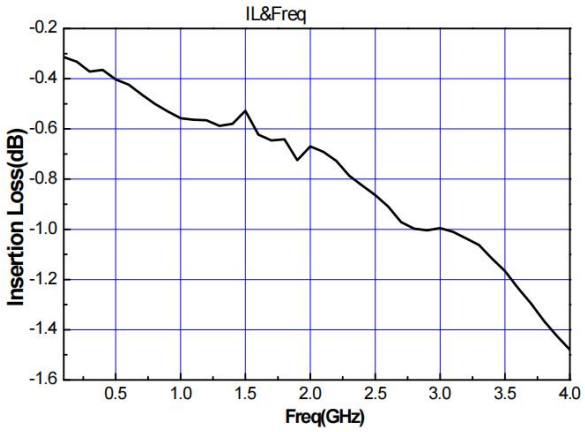
VSWRin



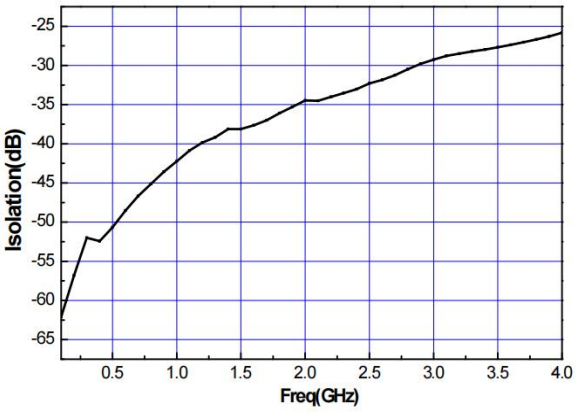
VSWRout



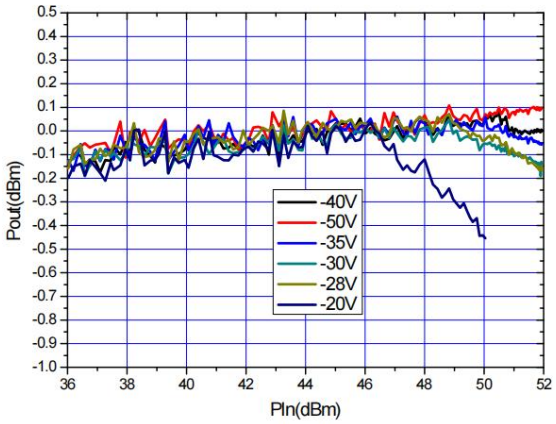
Insertion Loss

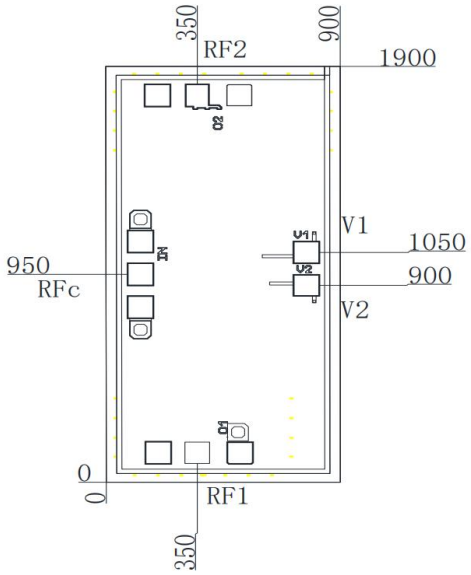
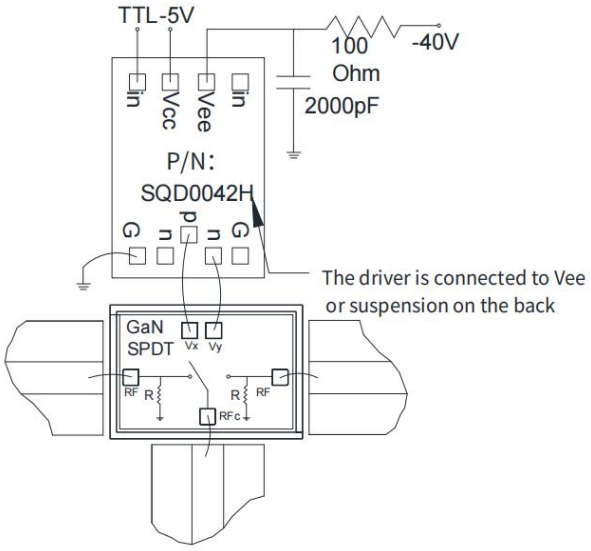


Isolation



Input Power (Y axis is normalized value of I.L)



Outline Size (μm)	Assembly Diagram
	

Note: Recommended single wire length for RF port is >0.8mm, <1.2mm.
Dual wires length is >1mm, <1.5mm.

PIN Definition

PIN	Description
RF1、RF2	RF ports, 50Ω
RFc	RF common ports, 50Ω
V1、V2	Control Ports
GND	Bottom must be grounded

Truth Table

V1	V2	$RF_C \rightarrow RF_1$	$RF_C \rightarrow RF_2$
1	0	OFF	ON
0	1	ON	OFF

Note: Low level “0” is -28V~-40V, High level “1” is 0V~0.5V