Performance

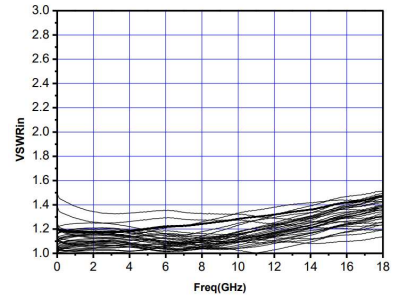
- Frequency: DC-18GHz
- Insertion loss: 3.5dB
- LSB: 0.5dB
- Attenuation: 0~31.5dB
- Attenuation Accuracy: 0.4dB
- Input/Output VSWR: 1.3/1.2
- Ton/Toff: 20ns
- Control Mode: TTL
- Voltage: -5V(3mA)
- Chip size: 2.2*1.0*0.08mm

Electrical Specifications (Ta=+25℃, 50Ω system)

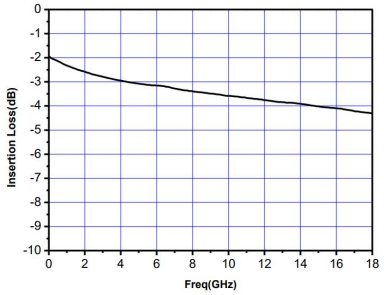
Parameter	Test Condition	Min	Typical	Max	Unit
Insertion Loss	Freq: DC-18GHz V1~V6=TTL	-	3.5	-	dB
Attenuation Accuracy		-	0.3	-	dB
VSWR in/out		-	1.3	-	

Test Curves

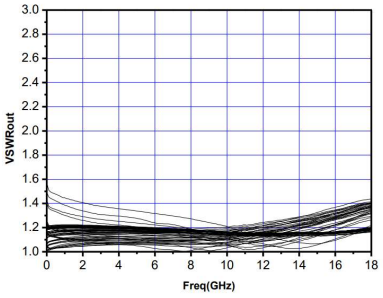
VSWRin vs. Freq



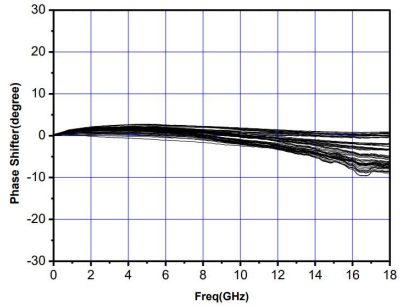
VSWRout vs. Freq



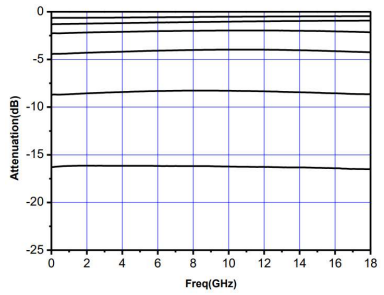
Insertion loss vs. Freq



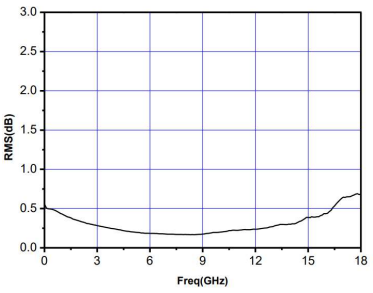
Add phase shift vs. Freq



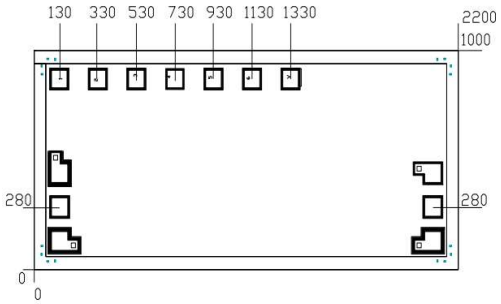
Attenuation all state vs. Freq



Attenuation accuracy vs. Freq



Outline Size



Note:

1. Unit: um
2. Bottom side is gold plated
3. Bottom side is GND
4. Bonding pads is gold plated
5. Don't bonding on thru holds
6. Tolerance: ±50um

Truth Table

Attenuation State RFin-RFout	V1	V2	V3	V4	V5	V6	VEE
IL	0	0	0	0	0	0	-5V
0.5dB	1	0	0	0	0	0	-5V
1dB	0	1	0	0	0	0	-5V
2dB	0	0	1	0	0	0	-5V
4dB	0	0	0	1	0	0	-5V
8dB	0	0	0	0	1	0	-5V
16dB	0	0	0	0	0	1	-5V

Absolute Max Ratings

Voltage	0.5/-6V
Input Power (CW mode)	25dBm
Channel Temperature	150℃
Mounting Temperature	300℃(1 min, N_2 protecting)
Storage Temperature	-55 ~ +150℃

Note: For high power application, assemble with Eutectic sintering.

Assembly Diagram