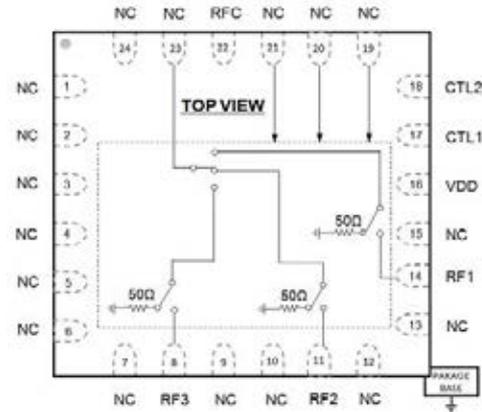




### 主要特点

- 工作频段: 0.1~ 6 GHz
- 插损: 1.0 dB
- 隔离度: 50 dB
- P-0.1: 35 dBm
- IIP3: 55 dBm
- 耐功率: +35 dBm (公共端), +29 dBm (负载端)
- I/O 控制电平: 兼容 1.8V/2.5V/3.3V LVTTTL, 5V TTL
- ESD: RF 2000V HBM, I/O 4000V HBM
- 封装: 20-Lead, 4mmx4mm QFN

### 功能框图

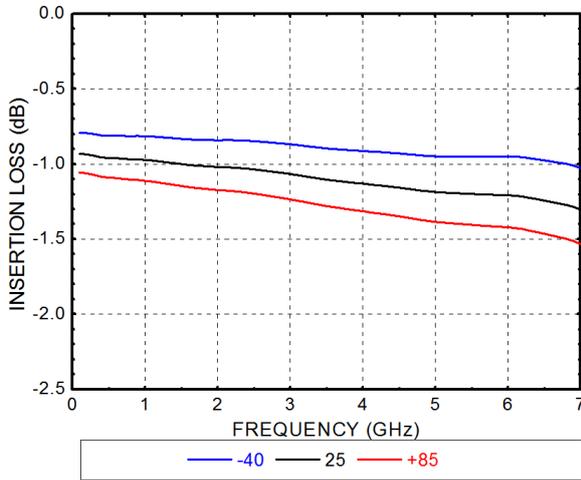


### 性能指标 ( $T_A = +25^\circ\text{C}$ , $V_{DD}=2.5\sim 5\text{V}$ , $V_{CTL1/2}=0\text{V}/V_{DD}$ , $50\Omega$ )

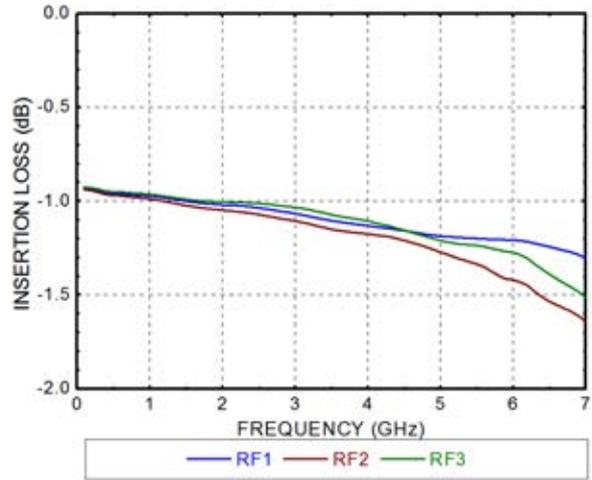
参数	条件		最小	典型	最大	单位
插损	0.1GHz~2GHz			0.9	1.3	dB
	2.0GHz~4.0GHz			1.0	1.4	dB
	4.0GHz~6.0GHz			1.2	1.6	dB
隔离度	RFC~RFX	0.1GHz~2GHz	45	60		dB
		2.0GHz~4.0GHz	40	50		dB
		4.0GHz~6.0GHz	37	45		dB
	RFX~RFX	0.1GHz~2GHz	40	55		dB
		2.0GHz~4.0GHz	37	45		dB
		4.0GHz~6.0GHz	32	42		dB
回波损耗	导通态	0.1GHz~2GHz		20		dB
		2.0GHz~4.0GHz		20		dB
		4.0GHz~6.0GHz		25		dB
	关断态	0.1GHz~2GHz		30		dB
		2.0GHz~4.0GHz		25		dB
		4.0GHz~6.0GHz		22		dB
开关时间	导通	50% $V_{CTL}$ to 90% $RF_{OUT}$		270		ns
	关断	50% $V_{CTL}$ to 10% $RF_{OUT}$		100		ns
输入功率压缩点	P-0.1	$V_{DD}=5\text{V}$		35		dBm
	P-1	$V_{DD}=5\text{V}$		36		dBm
IIP3	$P_{OUT}=12\text{dBm}/\text{tone}$			55		dBm
工作电压	$V_{DD}$		2.5	5	5.5	V
控制电压	$V_{CTL1}, V_{CTL2}$		0		$V_{DD}$	V
控制电压输入电平范围	$V_{DD}=+5.0\text{V}$	低电平 ( $V_{IL}$ )	0		0.6	V
		高电平 ( $V_{IH}$ )	1.1		5	V
功耗	$V_{DD}=+5.0\text{V}$			60		$\mu\text{A}$



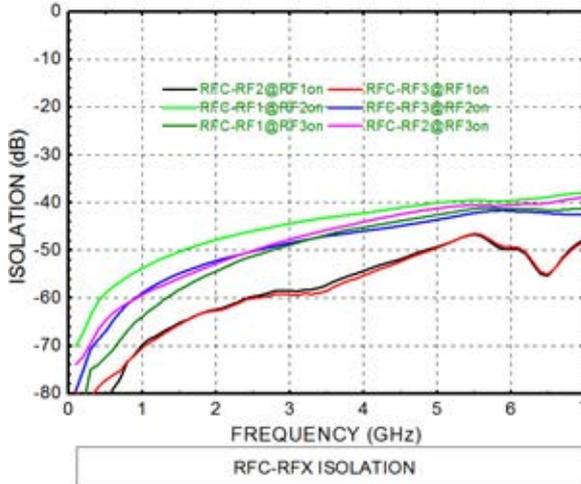
### 插损 vs. 温度



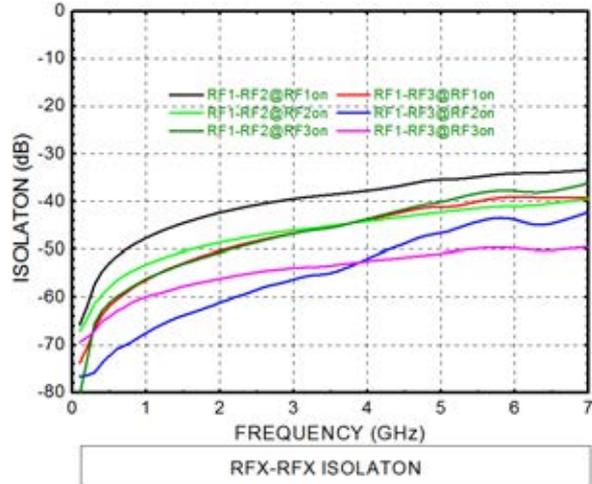
### 插损



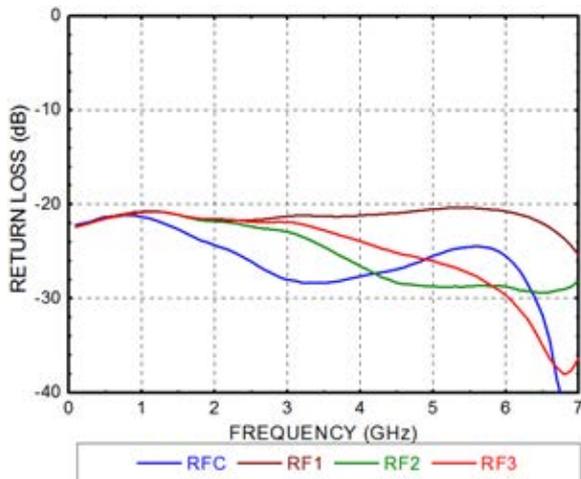
### RFC~RFX 隔离度



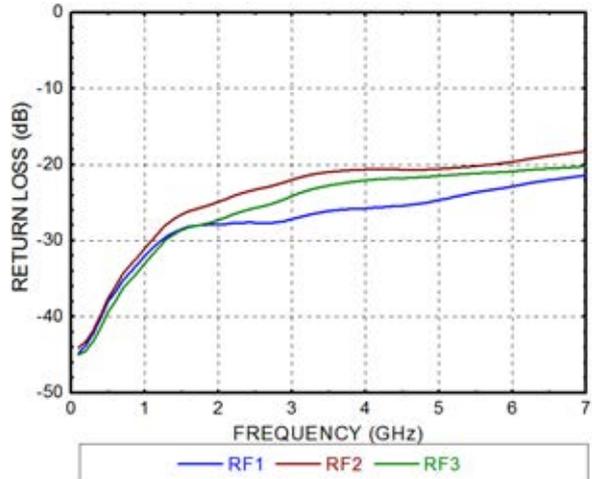
### RFX~RFX 隔离度



### 回波损耗 (导通态)

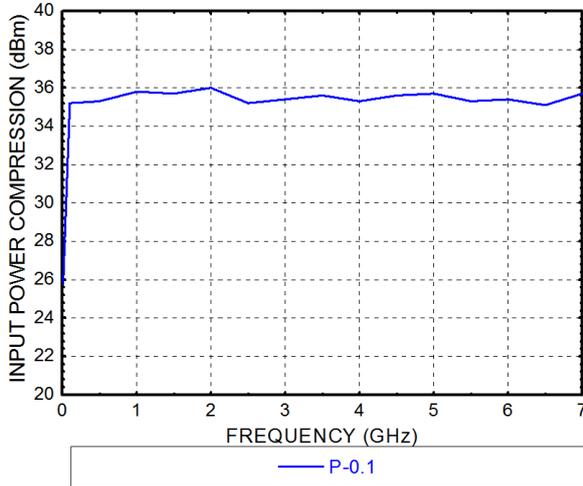


### 回波损耗 (关断态)

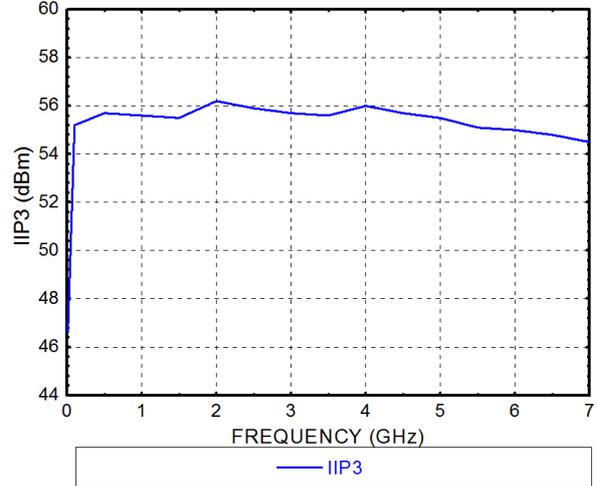




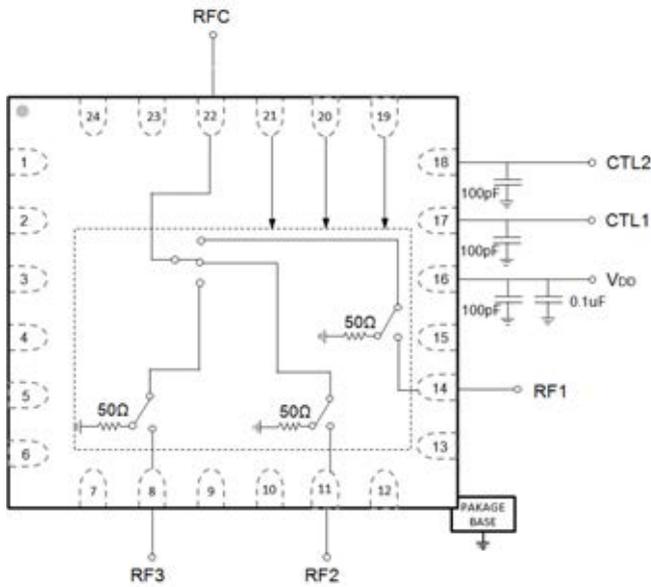
输入P-0.1 (10MHz~7GHz)



IIP3 (10MHz~7GHz)



应用框图



控制关系

状态	V <sub>CTL1</sub>	V <sub>CTL2</sub>
ALL OFF	0	0
RFC-RF1 ON	1	1
RFC-RF2 ON	0	1
RFC-RF3 ON	1	0

