



RRx/RTx5764-X Flier

SPECIFICATIONS

- Superheterodyne conversion (Rx)
- SiGe BiCMOS Technology
- Frequency band 57-64GHz
- Integrated image reject filter
- Integrated 9GHz IF filter
- Integrated Frequency Synthesizer with single external reference crystal
- Low noise amplifier <6dB NF
- Programmable IF gain blocks
- Universal I/Q interface
- Integrated FM & AM detectors
- Three-wire serial digital interface

Raditek Baseband Group will quote to design your base band, FPGA design solution using this revolutionary chip set. This is a high volume, commercial device; it requires special design techniques that Raditek will quote on demand, as well as the volume complete module. Applications include: HD video, High speed data (>1Gbps) and other high data rate applications.

Contact RADITEK for more information.

Typical RxIC Performance

Parameter	Typical	Units
Gain	0-70*	dB
Noise Figure	5-6.7**	dB
S11, RF in	-15	dB
Image Rejection	>30	dB
P1dB (in)	-37**	dBm
IIP3	-30**	dBm
Phase Noise (10MHz)	-113 to	dBc/Hz
Tripled	-115	
Phase Noise Floor	-130	dBc/Hz
I/Q Balance-Phase	0 to 4	degrees
I/Q Balance-Amplitude	<1	dB
Power Dissipation	195 (2.7V) 6 (1.2V)	mA

* Adjustable in 1-dB steps.

Typical TxIC Performance

Parameter	Typical	Units
Gain	26-30*	dB
P1dB	9-12	dBm
Psat	12-16	dBm
Image Rejection	20-30	dB
PAE of PA	6-10	%
Carrier Suppression	21-25	dB
3xLO Spur	-25 to -20	dBm
Phase Noise (10MHz)	-113 to	dBc/Hz
Tripled	-115	
I/Q Balance-Phase	+/-2	degrees
I/Q Balance-Amplitude	+/-0.5	dB
Power Dissipation	190 (2.7V) 70 (4.0V) 6 (1.2V)	mA

*At maximum IFVGA gain.