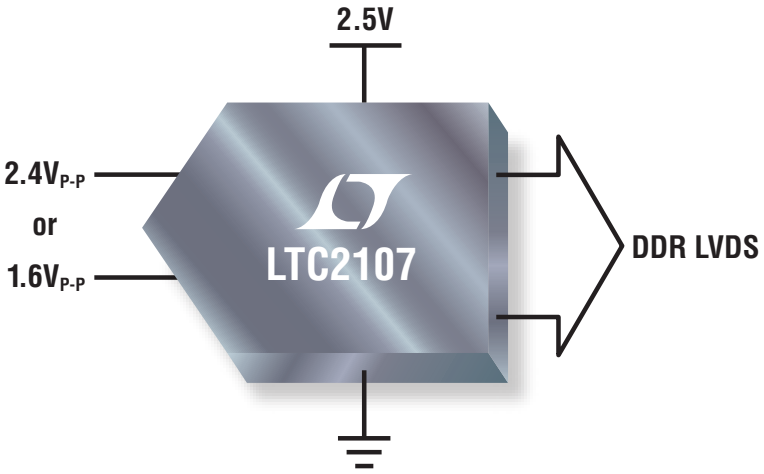
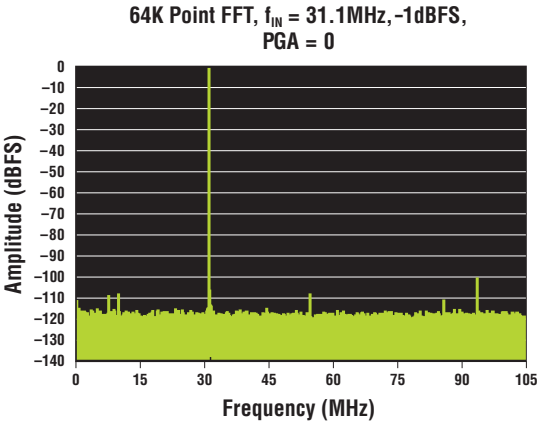
16-Bit 210Msps ADC 98dB SFDR



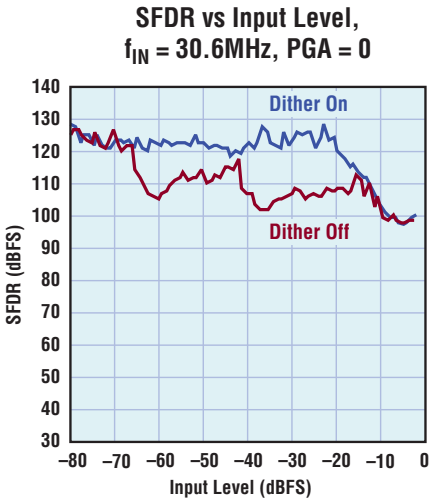


LTC2107 Achieves 80dB SNR from Single 2.5V Supply

The LTC2107 is a high performance 16-bit 210Msps ADC delivering exceptional dynamic range performance for the most demanding wideband, low noise, signal acquisition applications. Exceptional aperture jitter of only $45fs_{RMS}$ enables direct sampling of frequencies up to 500MHz with excellent SNR performance. The internal transparent dither circuit dramatically improves low level input SFDR, while the digital output randomizer eliminates digital coupling between the ADC outputs and analog input.

Features

- 98dBFS SFDR
- 80dBFS SNR Noise Floor
- Aperture Jitter = $45fs_{RMS}$
- PGA Front-End $2.4V_{P-P}$ or $1.6V_{P-P}$ Input Range
- Optional Internal Dither
- Optional Data Output Randomizer
- Power Dissipation: 1280mW
- Shutdown Mode
- Serial SPI Port for Configuration
- Clock Duty Cycle Stabilizer
- 48-Lead (7mm × 7mm) QFN Package



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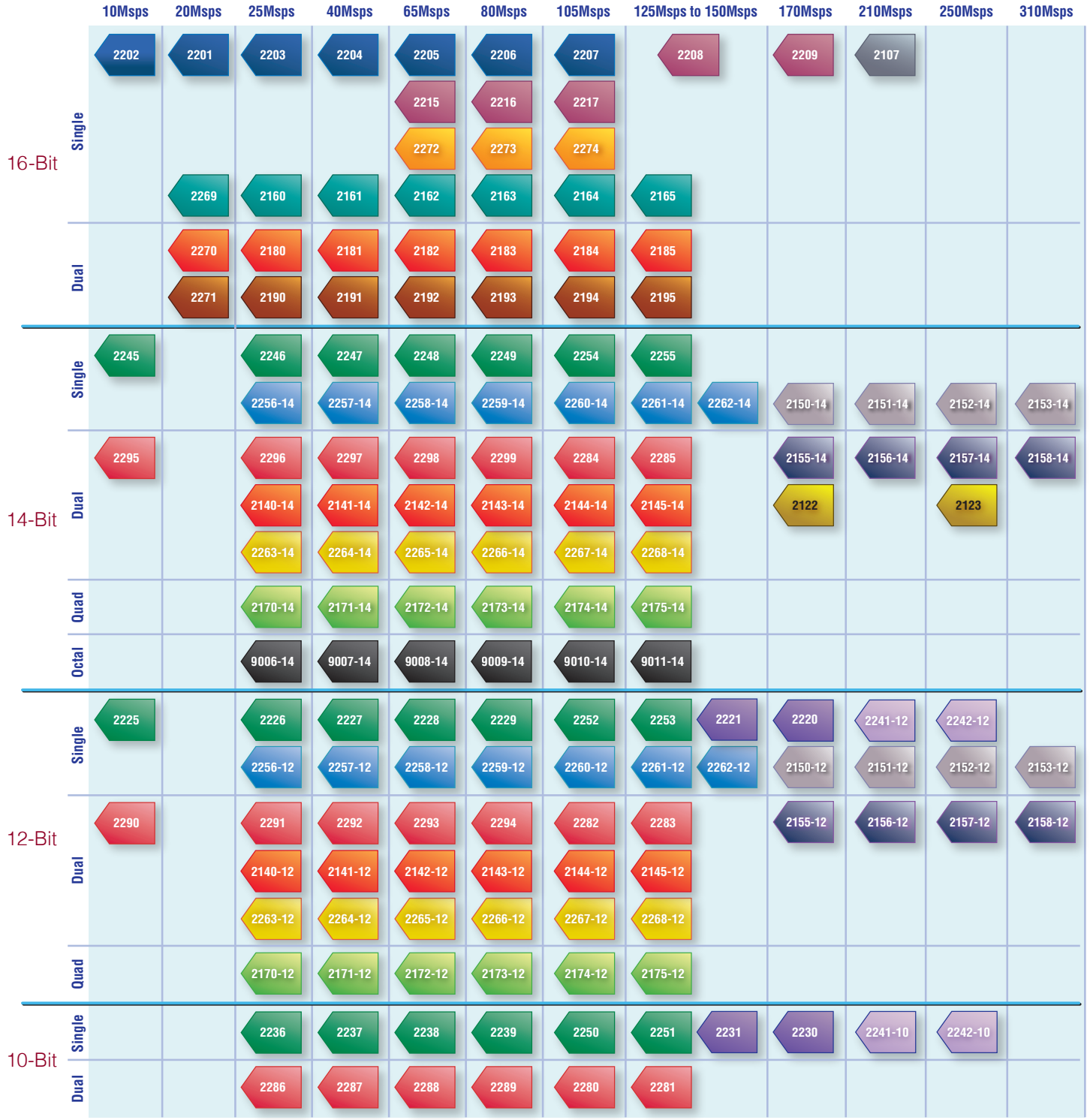
High Speed ADC Portfolio



Parallel

- 6x6, 7x7, 9x9 — 1.8V Lowest Power, Single & Dual ADCs, CMOS/DDR CMOS/DDR LVDS
- 7x7, 9x9 — 3.3V High SNR/SFDR ADCs, CMOS/LVDS
- 7x7 — 2.5V High SNR/SFDR ADC, DDR LVDS
- 9x9, 9x9 — 3.3V/2.5V ADCs, CMOS/LVDS
- 6x6, 9x9 — 1.8V High IF Undersampling Single & Dual ADCs, DDR LVDS
- 5x5 — 3V ADCs, CMOS
- 9x9 — 3V Dual ADCs, CMOS

Serial

- 6x6 — 3.3V Single ADCs, JESD204
- 7x8 — 1.8V Dual ADCs, Serial LVDS
- 7x7 — 1.8V Dual ADCs, JESD204B
- 6x6 — 1.8V Dual ADCs, Serial LVDS
- 7x8 — 1.8V Quad ADCs, Serial LVDS
- 11x9 — 1.8V Octal ADCs, Serial LVDS

www.linear.com/2107 ▪ 1-800-4-LINEAR

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