

LTC6409IUDB#TRMPBF

Data Sheet

Differential Amplifier, Low Distortion, 1 Amplifiers, 300 μV, 10 GHz, -40 °C, 85 °C

Manufacturers <u>Analog Devices, Inc</u>

Package/Case QFN10

Product Type Amplifier ICs

RoHS Pb-free Halide free



Images are for reference only

Please submit RFQ for LTC6409IUDB#TRMPBF or Email to us: sales@ovaga.com We will contact you in 12 hours.

RFO

General Description

Lifecycle

The LTC6409 is a very high speed, low distortion, differential amplifier. Its input common mode range includes ground, so that a ground-referenced input signal can be DC-coupled, level-shifted, and converted to drive an ADC differentially.

The gain and feedback resistors are external, so that the exact gain and frequency response can be tailored to each application. For example, the amplifier could be externally compensated in a no-overshoot configuration, which is desired in certain time-domain applications.

The LTC6409 is stable in a differential gain of 1. This allows for a low output noise in applications where gain is not desired. It draws 52mA of supply current and has a hardware shutdown feature which reduces current consumption to $100\mu A$.

The LTC6409 is available in a compact 3mm × 2mm 10-pin leadless QFN package and operates over a -40°C to 125°C temperature range.

Features

10GHz Gain-Bandwidth Product

88dB SFDR at 100MHz, 2VP-P

1.1nV/√Hz Input Noise Density

Input Range Includes Ground

External Resistors Set Gain (Min 1V/V)

3300V/µs Differential Slew Rate

52mA Supply Current

2.7V to 5.25V Supply Voltage Range

Fully Differential Input and Output

Adjustable Output Common Mode Voltage

Low Power Shutdown

Small 10-Lead 3mm \times 2mm \times 0.75mm QFN Package

Application

Differential Pipeline ADC Driver

High-Speed Data-Acquisition Cards

Automated Test Equipment

Time Domain Reflectometry

Communications Receivers

Related Products



LTC1151CSW#PBF

Analog Devices, Inc

SOIC-16



LTC2053CMS8

Analog Devices, Inc

MSOP8



LT1491ACS

Analog Devices, Inc

SOP14



LTC1150CS8

Analog Devices, Inc

SOP8



LT1498CS8

Analog Devices, Inc

SOP-8



LTC1150CN8

Analog Devices, Inc

DIP8



LT6105IMS8

Analog Devices, Inc

MSOP-8



LT1013CN8

Analog Devices, Inc

DIP-8