

Conv DC-DC 1.6V to 5.5V Synchronous Step Down Single-Out 0.6V to 5.5V 0.6A
Automotive 8-Pin DFN EP Tube

Manufacturers	Analog Devices, Inc
Package/Case	DFN8
Product Type	Power Management ICs
RoHS	
Lifecycle	



Images are for reference only

Please submit RFQ for LTC3409EDD#PBF or [Email to us: sales@ovaga.com](mailto:sales@ovaga.com) We will contact you in 12 hours.

[RFQ](#)

General Description

The LTC3409A is a high efficiency, monolithic synchronous buck regulator using a constant frequency, current mode architecture. The LTC3409A improves upon the LTC3409's light load regulation in Burst Mode operation. The output voltage is adjusted via an external resistor divider.

Fixed switching frequencies of 1.7MHz and 2.6MHz are supported. Alternatively, an internal PLL will synchronize to an external clock in the frequency range of 1MHz to 3MHz. This range of switching frequencies allows the use of small surface mount inductors and capacitors, including ceramics.

Supply current during Burst Mode operation is only 65 μ A dropping to <1 μ A in shutdown. The 1.6V to 5.5V input voltage range makes the LTC3409A ideally suited for single cell Li-Ion, Li-Metal and 2-cell alkaline, NiCd or NiMH battery-powered applications. 100% duty cycle capability provides low dropout operation, extending battery life in portable systems. Burst Mode operation can be user-enabled, increasing efficiency at light loads, further extending battery life.

The internal synchronous switch increases efficiency and eliminates the need for an external Schottky diode. Internal soft-start offers controlled output voltage rise time at startup without the need for external components.

VREF ToleranceLTC3409 VREF ToleranceLTC3409A \pm 3%

Features

1.6V to 5.5V Input Voltage Range

0.62V to 5.5V Output Voltage Range

Internal Soft-Start

Selectable 1.7MHz or 2.6MHz Constant Frequency Operation

Internal Oscillator Can Be Synchronized to an External Clock, 1MHz to 3MHz Range

High Efficiency: Up to 95%

65 μ A Quiescent Current, Burst Mode[®] Operation

600mA Output Current = 1.2V)

750mA Peak Inductor Current

No Schottky Diode Required

Low Dropout Operation: 100% Duty Cycle

0.612V Reference Voltage

Stable with Ceramic Capacitors

Shutdown Mode Draws <1 μ A Supply Current

Current Mode Operation for Excellent Line and Load Transient Response

Overtemperature Protection

Available in a Low Profile (0.75mm)

8-Lead (3mm \times 3mm) DFN Package

Application

Cellular Phones

Digital Cameras

MP3 Players

Related Products



[LT3763EFE](#)

Analog Devices, Inc
TSSOP28



[LTC4417IUF](#)

Analog Devices, Inc
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