

LTC3878EGN#PBF

Data Sheet

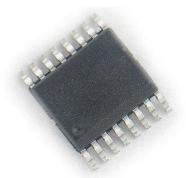
IC REG CTRLR BUCK PWM CM 16-SSOP

Manufacturers Analog Devices, Inc

Package/Case SSOP16

Product Type Power Management ICs

RoHS Pb-free Halide free



Images are for reference only

Please submit RFQ for LTC3878EGN#PBF or <u>Emailto:sales@ovaga.com</u> We will contact you in 12 hours.

RFO

General Description

Lifecycle

The LTC3878 is a synchronous step-down switching DC/DC controller optimized for high switching frequency and fast transient response. The constant on-time valley current mode architecture allows for a wide input range, including very low duty factor operation. No external sense resistor or slope compensation is required. The LTC3878 is pin compatible with the LTC1778 in applications that do not use EXTVCC while offering better efficiency. Consult with the factory to verify compatibility.

Operating frequency is set by an external resistor and compensated for variations in VIN to offer excellent line stability. Discontinuous mode operation provides high efficiency during light load conditions. A forced continuous control pin allows the user to reduce noise and RF interference. Safety features include output overvoltage protection and programmable current limit with foldback. Soft-start capability for supply sequencing is accomplished through an external timing capacitor. The current limit is user programmable.

The LTC3878 allows operation from 4V to 38V at the input and from 0.8V to 90% VIN at the output. The LTC3878 is available in a small 16-pin narrow SSOP package.

Features

Wide VIN Range: 4V to 38V

Extremely Fast Transient Response

tON(MIN): 43ns

No RSENSETM Valley Current Mode Control

Stable with Low ESR Ceramic COUT

Supports Smooth Start-Up Into Pre-Biased Output

Optimized for High Step-Down Ratios

Pin Compatible with the LTC1778 (No EXTVCC Pin)

Power Good Output Voltage Monitor

Dual N-Channel MOSFET Synchronous Drive

Adjustable Switching Frequency

Programmable Current Limit with Foldback

Output Overvoltage Protection

Small 16-Pin Narrow SSOP Package

Related Products



LT3763EFE

Analog Devices, Inc



LTC4417IUF

TSSOP28

Analog Devices, Inc QFN-24



LTC1966CMS8#PBF

Analog Devices, Inc MSOP-8P



LTM8045EY#PBF

Analog Devices, Inc BGA40



Distributed Power Systems

Embedded Computing

Communications Infrastructure



LT1038CK

Analog Devices, Inc TO-3



LTC3440EMS

Analog Devices, Inc MSOP10



LTC2990IMS#PBF

Analog Devices, Inc 10MSOP



LT4295IUFD#PBF

Analog Devices, Inc 28-WFQFN