

LTC3895HFE#TRPBF

Data Sheet

DC-DC Cntrlr Single-OUT Step Down 900kHz Automotive 31Pin TSSOP EP T/R

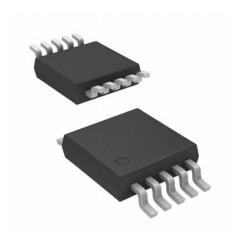
Manufacturers Analog Devices, Inc

Package/Case 38-TFSOP (0.173"

Product Type Power Management ICs

RoHS Green

Lifecycle



Images are for reference only

Please submit RFQ for LTC3895HFE#TRPBF or Email to us: sales@ovaga.com We will contact you in 12 hours.

RFO

General Description

The LTC3895 is a high performance step-down switching regulator DC/DC controller that drives an all N-channel synchronous power MOSFET stage that can operate from input voltages up to 140V. A constant frequency current mode architecture allows a phase-lockable frequency of up to 850kHz

The gate drive voltage can be programmed from 5V to 10V to allow the use of logic or standard-level FETs to maximize efficiency. An integrated switch in the top gate driver eliminates the need for an external bootstrap diode. An internal charge pump allows for 100% duty cycle operation.

The low $40\mu A$ no-load quiescent current extends operating run time in battery-powered systems. OPTI-LOOP® compensation allows the transient response to be optimized over a wide range of output capacitance and ESR values. The LTC3895 features a precision 0.8V reference and power good output indicator. The output voltage can be programmed between 0.8V to 60V using external resistors or pin-programmed for a fixed 5V or 3.3V.

Features

Wide VIN Range: 4V to 140V (150V Abs Max)

Wide Output Voltage Range: 0.8V to 60V

Adjustable Gate Drive Level: 5V to 10V (OPTI-DRIVE)

Low Operating IQ: 40µA>

100% Duty Cycle Operation

No External Bootstrap Diode Required

Selectable Gate Drive UVLO Thresholds

Onboard LDO or External NMOS LDO for DRVCC

EXTVCC LDO Powers Drivers from VOUT

Phase-Lockable Frequency (75kHz to 850kHz)

Programmable Fixed Frequency (50kHz to 900kHz)

Selectable Continuous, Pulse-Skipping or Low Ripple Burst Mode® Operation at Light Loads

Adjustable Burst Clamp and Current Limit

Adjustable or Fixed (5V/3.3V) Output Voltage

Power Good Output Voltage Monitor

Programmable Input Overvoltage Lockout

38-Lead TSSOP High Voltage Package

Related Products



LT3763EFE
Analog Devices, Inc
TSSOP28



LTC4417IUF

Analog Devices, Inc

QFN-24



LTC1966CMS8#PBF
Analog Devices, Inc
MSOP-8P



LT1038CK
Analog Devices, Inc
TO-3

Application

Automotive and Industrial Power Systems

High Voltage Battery Operated Systems

Telecommunications Power Systems



LTC3440EMS
Analog Devices, Inc
MSOP10



LTC2990IMS#PBF
Analog Devices, Inc
10MSOP



LTM8045EY#PBF
Analog Devices, Inc
BGA40



LT4295IUFD#PBF
Analog Devices, Inc
28-WFQFN