

General Description

The ET9366 is a low noise, constant frequency charge pump DC/DC converter for white LED applications. The ET9366 is capable of driving up to six channels of LEDs at preset 25mA per channel from a 2.5V to 6.0V input. The current sinks may be operated individually parallel for driving higher current LEDs. Only one 0.47 μ F flying capacitors and two small 1 μ F capacitors (at Vcc and Vout) make this part ideally suited for small, battery-powered applications.

The serial digital input is used to enable, disable, and set current for each LED with 16 settings down to 1.5mA. Each output of the ET9366 is equipped with built-in soft-start circuitry prevents excessive inrush current during start-up. A low-current shutdown feature disconnects the load from the input and reduces quiescent current to less than 1 μ A.

The ET9366 is available in a Pb-free, space-saving 3.0 \times 3.0mm 16-pin QFN16 package.

Features

- VIN Range: 2.5V to 6.0V
- Fully Programmable Current with Single Wire——16 Current Levels
- Drives up to Six Channels of LEDs
- Overcurrent and Overtemperature Protected
- No Inductors, Low Noise Operation
- Small Application Circuit
- Automatic Soft Start
- I_Q < 1 μ A in Shutdown
- Undervoltage Lockout with Hysteresis
- Package : 3.0 \times 3.0mm QFN16

Applications

- Cell Phone/Smart Phone/PDA
- Mp3/Mp4/PMP
- White LED Backlighting

Pin Configuration

