

High Efficiency, Constant Current, Boost DC/DC White-LEDs Drive

Features

- Operating Voltage : 2.7V to 5.5V
- High Operating Frequency : 1MHz
- High Output Voltage : 28V
- Shutdown Current : <math><1\mu\text{A}</math>
- Over-Voltage Protection
- Digital Dimming Control
- Built-in Cycle-by-Cycle Current-Limiting
- Soft-Start Function
- 0.2V Low Reference Voltage
- SOT-23-6 & TDFN2X2-8 Package

General Description

The G5126 boost converter contains a 0.7Ω internal switch. The IC operates at constant frequency 1MHz, allowing the use of tiny, low cost and low height inductors and capacitors. The IC operates from a 2.7V to 5.5V supply voltage. High inrush current at start-up is eliminated using the soft-start function. Constant frequency current mode PWM architecture results in low, predictable output noise. The G5126 includes cycle-by-cycle 850mA current limiting to maximum inductor current and over-temperature protection circuit. The over-voltage protection will be enabled when VOUT exceeds 28V. The current of LED is set by a resistor connected between FB and GND. The G5126 is available in SOT-23-6 & TDFN2X2-8 package.

Applications

- LED Module
- Compact Back Light Module
- Constant Current Source

Ordering Information

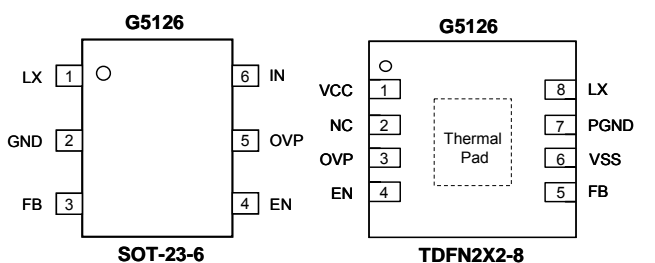
ORDER NUMBER	MARKING	TEMP. RANGE	PACKAGE (Green)
G5126TB1U	5126x	-40°C to 85°C	SOT-23-6
G5126RC1U	5126	-40°C to 85°C	TDFN2X2-8

Note: TB: SOT-23-6 RC: TDFN2X2-8

1 : Bonding Code

U: Tape & Reel

Pin Configuration



Note: Recommend connecting the Thermal Pad to the Ground for excellent power dissipation.

Typical Application Circuit

