Current Limited Load Switch

Features

- **Input Voltage Range: 2.7V to 5.5V**
- **Programmable Over-Current Threshold**
- **90mΩ Typical $R_{DS(ON)}$ at V_{IN}=5V**
- **Only 2.5V Needed for ON/OFF Control**
- **Under-Voltage Lockout**
- **Thermal Shutdown**
- **No Reverse Leakage Current**
- **5-Pin SOT-23 Package**

Applications

- **Hot Swap Supplies**
- **Notebook Computers**
- **Peripheral Ports**
- **Personal Communication Devices**

General Description

The G5254 is a current limited N-channel MOSFET power switch designed for highside load switching applications. The low $R_{DS(ON)}$ N-channel power MOSFET is driven by a built-in charge pump which generates a voltage higher than the supply voltage to fully enhance the switch.

This switch operates with inputs ranging from 2.7V to 5.5V, making it ideal for both 3.3V and 5V systems. An integrated current-limiting circuit protects the input supply against large current which may cause the supply to fall out of regulation. The G5254 is also protected from thermal overload which limits power dissipation and junction temperatures. Current limit threshold is programmed with a resistor from SET to ground. In shutdown mode, the supply current decreases to less than 1μA. The reverse leakage current is also less than 1μA.

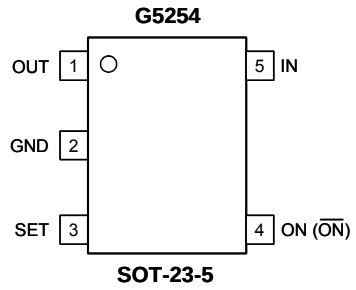
The G5254 is available in a SOT-23-5 package

Ordering Information

ORDER NUMBER	MARKING	ENABLE	TEMP. RANGE	PACKAGE (Green)
G5254LT11U	E254Lx	Active Low	-40°C to +85°C	SOT-23-5
G5254HT11U	E254Hx	Active High	-40°C to +85°C	SOT-23-5

Note:T1: SOT-23-5
1: Bonding Code
U : Tape & Reel

Pin Configuration



Typical Application Circuit

