



# SPIDER Low-Side (4 channel) TLE 7231G/33G

#### SPI Driver for Enhanced Relay Control

The Infineon SPIDER low-side (4 channel) family consists of two family members. They are both four-channel SPI-controlled low-side switches especially designed to drive automotive relays.

The TLE 7231G features one direct input which can be individually routed to each output. The TLE 7233G is equipped with 4 direct input pins to allow PWM (pulse with modulation) operation and direct control of every channel. Furthermore the integrated Limp Home feature allows to address safety critical applications

All devices are protected against short circuit and overload and especially designed to fulfill the requirements of the harsh automotive environment.

### Application:

- Lowside driven automotive Relays
- Small LEDs and other small signal loads
- Unipolar stepper motors





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#### **Key Features:**

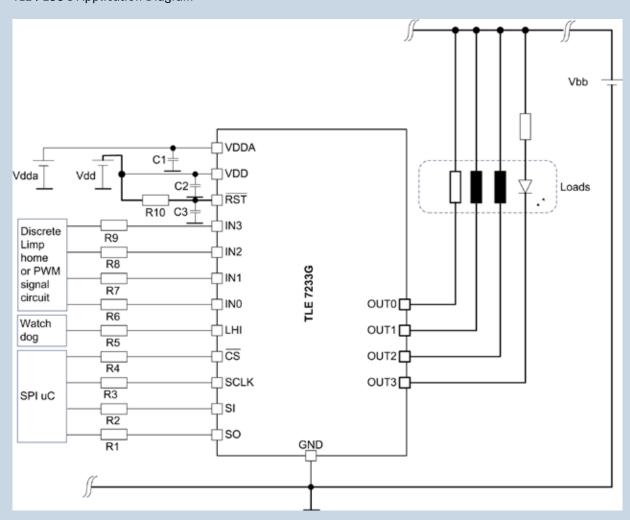
- scalable by current capability and feature set
- SPI communication
- Short circuit and over load protection, thermal shutdown

#### Key Benefits:

- Reduced microcontroller I/Os
- Small package to reduce board space
- Possibility to address safety critical applications under harsh automotive conditions

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#### TLE 7233G Application Diagram



#### SPIDER LS (4 channel) family

Product	Nominal Current	Rds <sub>on</sub> (typ.@25°C)	Features	Package
TLE 7231G	4*320mA	4*1,0Ω	one direct input	PG-DS014
TLE 7233G	4*390mA	4*1,0Ω	Limp Home functionality 4 direct inputs	PG-SSOP24

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