

Features

- CAN-FD bus interface compatible to ISO 11898 up to 2MBit/s data rate
- Supply voltage range from 5V up to 40V
- External voltage regulator control
- Advanced channel power management
- Individual PWM generators with 10bit resolution
- Individually programmable LED drivers up to 100mA
- LED driver current selection step size of 400µA
- PWMIN interface pin for fail-safe behavior
- 10bit ADC for LED open, short and system diagnosis
- Channel bundling option
- Configurable supply and temperature dependent LED derating
- LED channel individual bin class brightness correction
- Optional external LED bin class resistor evaluation
- Configurable single lamp behavior
- EEPROM for configuration data
- Development according to ISO26262
- Supports applications with safety requirements up to ASIL B
- Full automotive qualification according to AEC-Q100

Applications

- Automotive interior and exterior light systems
- General LED Applications
- High speed LED light animations

General Description

The E522.95 is a multi-channel PWM driver connected to the CAN-FD in-vehicle network. The direct CAN-FD bus connection enables fast light animation sequences controlled by a body controller or a light control unit. The device provides 16 digitally configurable current sinks up to 100mA with an independent 10bit PWM generator for each channel. For fail safe operation the device provides internal nonvolatile memory to store channel individual parameters for highest flexibility.

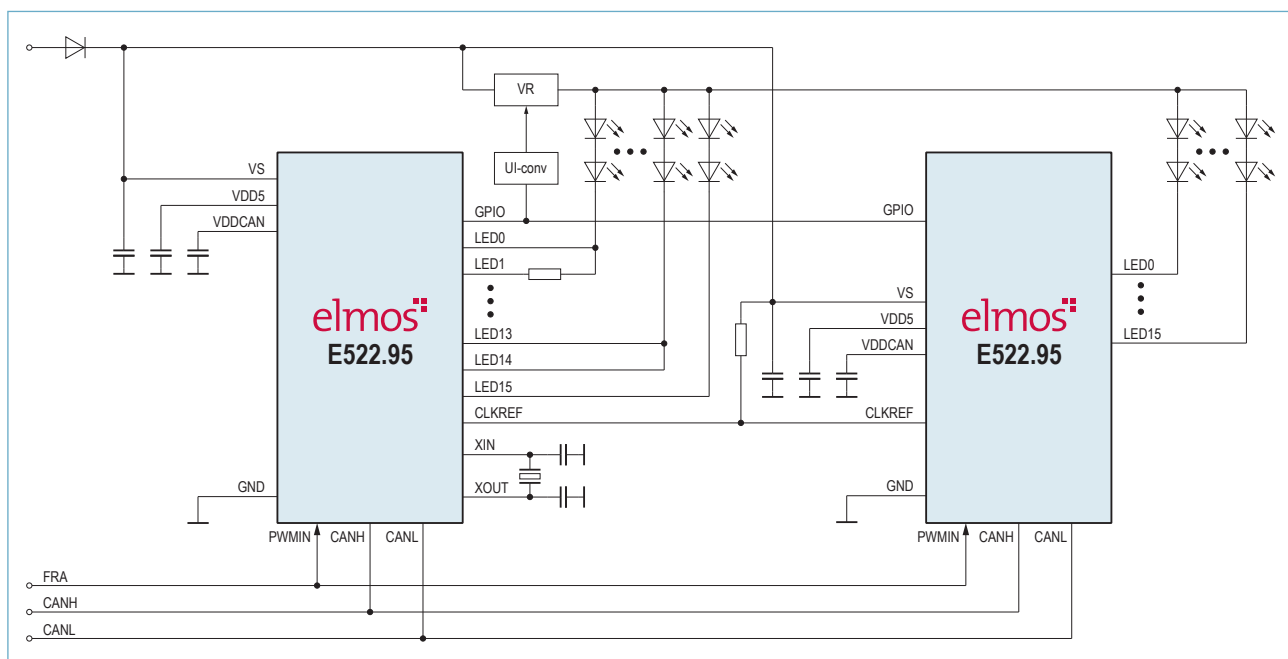
An advanced device power management feature allows LED channel bundling with automatic current balancing to external resistors resulting in reduced device power dissipation. The device provides advanced diagnostic features to meet automotive requirements. Configurable supply and temperature derating offers excellent power management.

Ordering Information

Product ID	Temp Range	Package
E52295A44B605	-40°C to +125°C	QFN40L6, 0.6mm option - SLP

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Typical Application Circuit



Elmos Semiconductor SE reserves the right to change the detail specifications as may be required to permit improvements in the design of its products.

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