

MLX90328 / MLX90329

AUTOMOTIVE SENSOR INTERFACES

FLEXIBLE INTERFACES WITH
ANALOG AND SENT OUTPUTS



The goby fish and shrimp represent our pressure sensor interfaces because they live together in symbiosis in a similar way to how our interfaces interact with the pressure sensor. The shrimp digs holes that serve as its home with the goby fish as its roommate. The shrimp is an excellent digger but is almost blind, so whenever there are predators, the goby fish always saves the shrimp's life by touching its tail to warn it and they both quickly retreat into the burrow.

SENSOR INTERFACES FOR PASSENGER VEHICLE UNDER THE HOOD APPLICATIONS

Used to interface all kinds of resistive sensors configured as a Wheatstone bridge found typically in pressure sensors applications.

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The MLX90328 and MLX90329 cover the most typical resistive type of Wheatstone bridge applications for use in an automotive environment. They offer gain adjustment, offset control as well as temperature compensation in order to accommodate variations of the different resistive sensing elements. Compensation values are stored in EEPROM and can be reprogrammed through the application pins with a Melexis tool which includes the necessary software. Calibrated analog and SENT outputs with an outstanding accuracy become possible. Melexis factory calibrated media temperature from an external NTC is also available for the MLX90329 product.

KEY FEATURES

MLX90328

- ✓ Sensor interface IC for use in harsh automotive environments
- ✓ Possibilities to achieve outstanding overall sensor performances
- ✓ Ratiometric analog output



MLX90329

- ✓ Sensor interface IC for use in harsh automotive environments
- ✓ Possibilities to achieve outstanding overall sensor performances
- ✓ SENT output with option for pressure, calibrated temperature information and compensated NTC temperature
- ✓ Outstanding factory calibrated NTC accuracy

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