



# Hydrogen Sensor with Implemented Digital Temperature Sensor and EEPROM

## 1. FEATURES

- Detection of hydrogen levels up to 100% LEL with 0.25 % resolution in air
- No sensitivity against typical catalyst poisons such as volatile siloxanes and carbon monoxide
- Fast response and recovery times
- No humidity-induced base line drift
- Applicable in relative humidity (rh) between 0 % to 100 %
- Industrial temperature range from -40 °C to +85 °C
- Linear output up to 100 % LEL
- On-board digital temperature sensor and EEPROM with I2C® bus connectivity

## 2. APPLICATION

- Hydrogen warning systems in a wide temperature range

## 3. DESCRIPTION

H2-CNI I2C is a calorimetric hydrogen sensor with a catalytically highly active and siloxane-resistant sensor element and is based on a non-isothermal calorimetric operation principle. It contains a digital temperature sensor and an EEPROM for an advanced control of sensor characteristics in a wide temperature range of -40 to +85°C.

## 4. SIMPLIFIED SCHEMATIC

