Proline Promass K 10 Coriolis flowmeter

Flowmeter with minimized total cost of ownership with easy-to-use operation concept

Benefits:

- Easy integration into your plant infrastructure with IO-link
- Cost effective device for basic process and hygienic applications (3-A and cGMP, EHEDG)
- Fewer process measuring points multivariable measurement (flow, density, temperature)
- Space-saving installation no in-/outlet run needs
- Optimum usability display with touch screen (HART and MODBUS RS485 communication only) or operation with mobile devices and SmartBlue app
- Simple, time-saving commissioning guided parameterization in advance and in the field
- Integrated verification Heartbeat Technology

Specs at a glance

- Max. measurement error Mass flow (liquid): ±0.5 % (standard),
 ±0.15 % (option) Mass flow (gas): ±0.75 %
- Measuring range 0 to 180 000 kg/h (0 to 6615 lb/min)
- Medium temperature range -40 to +150 °C (-40 to +302 °F)
- Max. process pressure PN 40, Class 300, 40K
- Wetted materials Measuring tube: 1.4539 (904L) Connection: 1.4404 (316/316L)

Field of application: Promass K is the cost-efficient Coriolis solution for elementary mass flow measuring tasks. It provides dependable measurement in basic applications featuring air, gas, fuel and water. With its straightforward hard- and software design, Promass K 10 simplifies every step in its life cycle from engineering to servicing at usual





More information and current pricing: www.it.endress.com/8KBB Endress+Hauser quality. Heartbeat Technology enables measurement reliability and extension of recalibration cycles.

Features and specifications

Liquids

Measuring principle

Coriolis

Product headline

Flowmeter with minimized total cost of ownership with easy-to-use operation concept.

Measurement of liquids and gases in utility processes and basic applications.

Sensor features

Cost-effective general-purpose device – alternative to mechanical flowmeters. Fewer process measuring points – multivariable measurement (flow, density, temperature). Space-saving installation – no in-/outlet run needs.

Compact dual-tube sensor. Medium temperature up to +150 °C (+302 °F). Process pressure up to 100 bar (1450 psi).

Transmitter features

Optimum usability – display with touch screen (HART and Modbus RS485 communication only) or operation with mobile devices and SmartBlue app. Simple, time-saving commissioning – guided parameterization in advance and in the field. Integrated verification – Heartbeat Technology.

System integration with HART, Modbus RS485, IO-Link. Flexible operation with app and optional display.

Nominal diameter range

DN 8 to 80 (¾ to 3")

Wetted materials

Measuring tube: 1.4539 (904L) Connection: 1.4404 (316/316L)

Liquids

Measured variables

Mass flow, temperature, Density (option), volume flow, corrected volume flow

Max. measurement error

Mass flow (liquid): ± 0.5 % (standard), ± 0.15 % (option) Mass flow (gas): ± 0.75 %

Measuring range 0 to 180 000 kg/h (0 to 6615 lb/min)

Max. process pressure PN 40, Class 300, 40K

Medium temperature range -40 to +150 °C (-40 to +302 °F)

Ambient temperature range Standard: -20 to +60 °C (-4 to +140 °F)

Sensor housing material Stainless steel 1.4301 (304)

Transmitter housing material AlSi10Mg, coated

Degree of protection Standard: IP66/67, Type 4X enclosure

Display/Operation

2.4" LCD display with touch & auto rotate; Configuration and operation via SmartBlue App (Bluetooth) possible

Outputs

4-20 mA HART (active/passive), Pulse/frequency/switch output Modbus RS485, 4-20 mA

Digital communication

HART, MODBUS RS485, IO-Link

Liquids

Power supply

DC 24 V AC 100 to 230 V AC 100 to 230 V / DC 24 V (non-hazardous area)

Hazardous area approvals

ATEX IECEx cCSAus EAC NEPSI INMETRO JPN UK Ex KC

Metrological approvals and certificates

Calibration performed on accredited calibration facilities (acc. to ISO/IEC 17025)

Heartbeat Technology complies with the requirements for measurement traceability according to ISO 9001:2015 – Section 7.1.5.2 a (TÜV SÜD attestation)

Pressure approvals and certificates

CRN, PED

Material certificates

3.1 material

Hygienic approvals and certificates EC 1935, FDA, GB4806, cGMP, 3-A

Measuring principle Coriolis

Gas

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DN 8 to 80 (% to 3")

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Measured variables

Mass flow, temperature, Density (option), volume flow, corrected volume flow

Max. measurement error

Mass flow (liquid): ± 0.5 % (standard), ± 0.15 % (option) Mass flow (gas): ± 0.75 %

Gas

Gas

Measuring range 0 to 180 000 kg/h (0 to 6615 lb/min)

Max. process pressure PN 40, Class 300, 40K

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Ambient temperature range Standard: -20 to +60 °C (-4 to +140 °F)

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Outputs

4-20 mA HART (active/passive), Pulse/frequency/switch output Modbus RS485, 4-20 mA

Digital communication

HART, MODBUS RS485, IO-Link

Power supply

DC 24 V AC 100 to 230 V AC 100 to 230 V / DC 24 V (non-hazardous area)

Hazardous area approvals

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