



OMC-408 stainless steel measuring probe with sintered filter For Zone 0/20



OMC-408 on an offshore platform



OMC-408 transmitter for Zone 1/2 and 21/22



OMC-408 in the petrochemical industry

Datasheet

OMC-408 Ex Temperature and humidity Transmitter

Obviously every engineer tries to keep measurement devices beyond hazardous areas, on plants, ships, LNG jetties and offshore objects. However, sometimes this is not possible. While choosing the best location for meteorological and hydrological sensors it is sometimes required putting these in hazardous areas. Observator's wide range of MetOcean sensors can also be supplied as Ex sensors, nowadays supplied with required ATEX certificates.

The OMC-408 Temperature humidity sensor is the Ex version of the popular OMC-406 sensor. It consists of a probe and transmitter for safe and accurate measurement of temperature and humidity in Zone 0 and 1.

Features

- Explosion protection classes (gas and dust):

Transmitter:

II 2(1) G Ex eb mb [ia Ga] IIC T5 Gb

II 2(1) D Ex tb [ia Da] IIIC T80°C Db

Probe:

Ex II 1/2 G Ex ia IIC T5-T4 Ga/Gb

Ex II 1/2 D Ex ia IIIC T80 °C...110 °C Da/Db

- Interchangeable intrinsically safe stainless steel probe
- Suitable for offshore environments
- Operates as loop powered (10-28VDC) 2 wire 4..20 mA temperature and humidity transmitter
- Standard with 2m cable, on request 5 or 10m
- Housing protection grade IP66
- ATEX Directives: 2014/34/EU(ATEX)CSA22.2, UL 508

General

The OMC-408 is a dual-channel meter for precise humidity and temperature measurement in an explosive atmosphere, where an ex classification is required.

It consists of a probe and transmitter. The connected sensor is encapsulated in a stainless steel sensor tube and is designed for use in Zone 0/20. The transmitter itself is only designed for use in Zone 1/21 or Zone 2/22.

The transmission signal is composed of two two-channel current loop interfaces, where the signal is formed in an accurate flow of each 4 to 20 mA. Between the measurement circuit on the secondary side and the primary side is a galvanic separation.

Data summary

HUMIDITY

Measuring range 0 to 100% RH

Accuracy at 5 deg. C ± 0.8 % RH

Linear output 4...20 mA, loop powered, 2-wire, 10-28 VDC

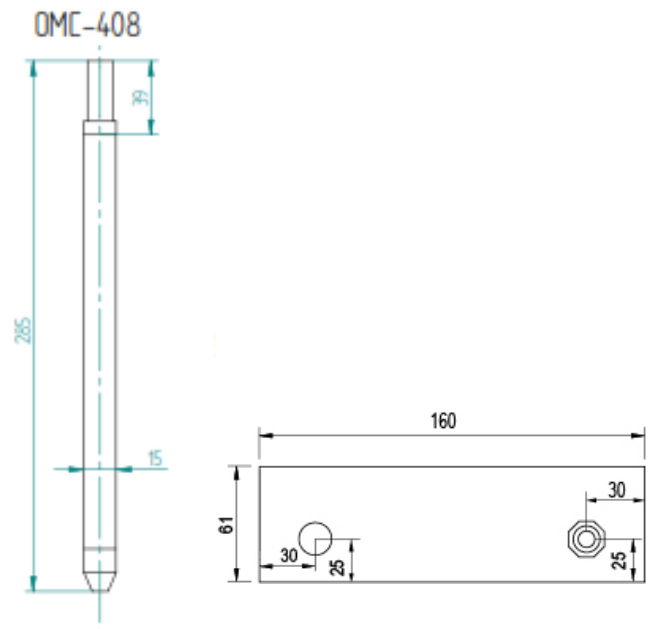
TEMPERATURE

- Measuring range -40 to $+60$ deg. C

- Accuracy at 5 deg. C ± 0.1 deg. C

- Linear output 4-20 mA, loop powered, 2-wire, 10-28VDC

- Measuring system Pt100, Class A



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Originating from the Netherlands, Observator has grown into an internationally oriented company with a worldwide distribution network and offices in Australia, Germany, the Netherlands, Singapore and the United Kingdom.

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