FuehlerSysteme eNET International
Die Marke für Sensorik

EN **DATA SHEET**



CO-K/A

CO air quality sensor for ducts with measurement range switch

Measuring size: CO
Output: 0-10 V, 4-20 mA, Relay
Highlights: easy to install with included mounting flange

MADE IN GERMANY

Description

The duct air quality sensor CO-K/A registers the CO concentration in the air in the environment in the range of 0-1000 ppm via an electro-chemical sensor and converts this measured value into a linear output signal 0-10 V respectively. 4-20 mA. As an option the air quality sensor has a potential-free changeover contact and a backlit display. The display content can be rotated in 90° steps using a menu and the measured value, the switching threshold set, the state of the relay, the MIN/MAX measured values for the selected intervals (1 h / 6 h / 12 h / 24 h) etc. can be read out.
3 different measuring ranges can be selected 0-200 ppm, 0-500 ppm, 0-1000 ppm which can be switched, according to requirements, by the innovative DIP switching technology.

Technical Specifications

Measurement range CO	0-1000 ppm
Scales	0-200/500/1000 ppm
Accuracy	±5 ppm + max. ±5% f. mv (at 20°C, 50% r.H.)
Temperature dependency	CO: ±2 ppm / K
Running-in time	1 min
Response time (t90)	< 5 min
Long term stability	±1% FS/year
Sensor	Electrochemical sensor
Sensor protection	sinter filter
Supply voltage	24 V AC/DC (±5%)
Current consumption	max. 100 mA
Analogue output 0-10 V	3-wire connection
Analogue output 4-20 mA	3-wire connection
Alarm output	1 x potential-free change-over contact, 48 V, 1 A
Switching Hysteresis Relay	2% FS (without Display), 0,5...5% FS adjustable (with Display)
Electrical connection	screw terminals max. 1,5 mm²
Housing	Polycarbonate PC UL 94 V0 with hinge locks, color signal white similar to RAL 9003
Cable gland	PG11 high-strength cable gland with strain relief
Display	optional LCD display with backlight on/off/auto
Material	Protection tube: stainless steel V2A
Dimensions	Housing: L 89 x W 80 x H 47 mm, Protection tube: Ø 25 x 190 mm
Protection type	Housing/electronic: IP65, Sensor: IP30
Protection class	III
Working range r.H.	0...98% r.H. in contaminant-free, non-condensing air
Working temperature	0...+50°C
Storage temperature	-20...+50°C
Initial operation	After switch-on of the device it runs a self-test and the zero-point calibration. This process takes, depending on ambient conditions, about 1 minutes. Within this time, the linear output signal deviates from the actual measured value.
Installation	mounting flange (in scope of delivery)
Approvals	CE, EAC, RoHS

Variants

Article Number		
CO	Output CO	Version
CO-K/A-I		
0-200/500/1000 ppm	4-20 mA	without display
CO-K/A-UI		
0-200/500/1000 ppm	0-10V, 4-20 mA	without display
CO-K/A-UID		
0-200/500/1000 ppm	0-10V, 4-20 mA	with display
CO-K/A-UIR		
0-200/500/1000 ppm	0-10 V, 4-20 mA, change-over contact	without display
CO-K/A-UIRD		
0-200/500/1000 ppm	0-10 V, 4-20 mA, change-over contact	with display

Accessories



motrona AX350

AX350: touchMATRIX® Process Indicator with two 16 bit Analog Inputs



motrona AX020

AX020: Process Indicator for Analog Signals

Dimensional Drawing

