



Contact gauge with inductive contact (KI), for visual and acoustic warning of low gas supply pressure and to monitor the cylinder pressures; for inert, combustible, oxidizing and corrosive gases and gas mixtures, nominal pressure maximum 300 bar

#### SPECIAL FEATURES

- Construction conforms to safety regulations EN 837-01
- Switching point is freely adjustable in marked area (45°)
- Pressure display at location and signal transmission for recording measured data
- Ex-protection is possible in conjunction with corresponding signal box

#### DESCRIPTION

These pressure measuring instruments have a robust chrome nickel steel/cooper-zinc-alloy housing in accordance with DIN 16063. When the gas cylinder is empty and by sinking cylinder pressure an inductive contact switch is activated. The switch point, i.e. the pressure level at which the signal should be triggered is freely adjustable within a sector of 45° (at 315 bar type e.g. 38 bar).

To set the switch point the pressure level marking is simply adjusted to the desired switch point.

# **APPLICATION**

Panel and manifolds can be fitted out with contact gauges as an optional. Contact gauges combine the advantages of a local display with the demand for an electric signal transmission. This allows for - in conjunction with special signal boxes - the optical and acoustic warning signal by low gas supply pressure or the monitoring of the line pressure with freely adjustable threshold.

# NOTICE ABOUT ELECTRICAL CONNECTIONS

The polarity must be taken into consideration when connecting as the inductive contact is an active electronic component, The KI 50 can only be operated with a special amplifier.

Suitable for operation are: Signal boxes DGM-SK 60 2/4/6/10 Ex \*, switch amplifier WE 77/Ex \*.

# **TECHNICAL DATA**

Measuring element:	Bourbon tube
Diameter:	50 mm
Design:	Chemical-safety version DIN 16063
Housing:	CrNi-steel/copper-zinc-alloy
Measuring element:	CrNi-steel 1.4571, circular form/copper-zink-alloy
Inspection glass:	Polycarbonate
Accuracy:	Class 2.5 (DIN 16005)
Wrench size:	14 mm
Nominal pressure:	230 bar/ 300 bar
Display range:	see gauge scale
Threshold:	Freely adjustable in marked range (45° of the display range
	from p = 0 originating)
Gas suitability:	All gases
Contact:	inductive slit sensor (in accordance with NAMUR)
Working temperature:	ambiant: -25°C to +70°C
	measuring medium maximum +100°C
Protection class:	II 2 G EEx ia IIC T6, PTB 99 ATEX 2219 X
Switching hysteresis:	+/- 5 % (SEW)
Control behavior:	Contact type 1 (I1), contact of low impedance with increasing pressure
Dimensions (Ø×d×h):	50×35×70 mm
Connection:	NPT 1/4"m outside thread

Art.-Nr. Type/Contact-Material Display range Display range Type (bar) (psi) H28191103 KI 50-315/i1 BC 0 - 3150 - 4500 H28191101 KI 50-315/i1 SS 0 - 3150 - 4500H28191203 BC KI 50-400/i1 0 - 58000 - 400H28191201 KI 50-400/i1 SS 0 - 5800

<sup>\*</sup> The deployment of contact gauges in ex-zone 1 is possible with these instruments. When connecting the contact gauges to an existing fault alarm system it is important to check, in the technical manual, if the operation of NAMUR-Initiators is possible. In case of doubt please contact the manufacturer of your equipment