Zertifiziertes QM-System
DIN EN ISO 9001
Zertifikat-Nr. 01017

Pressure Sensor with Ceramic Sensor Element

measuring • monitoring • analysing

Option:
Pluggable
Sandwich
Display
Model AUF

- Gauge pressure
- Internal diaphragm
- Measuring range:
  -1...0 to 0...600 bar
- Temperature (medium):
  max. 85 °C
- Accuracy class:
  0.5 or 1.0
- Material:
  stainless steel and ceramic
- Connection: G ½ male

KOBOLD companies worldwide:
ARGENTINA, AUSTRIA, BELGIUM, CANADA, CHILE, CHINA, COLOMBIA, CZECHIA, FRANCE, GERMANY, GREAT BRITAIN, INDIA, IRAN, INDONESIA, ITALY, MALAYSIA, MEXICO, NETHERLANDS, PERU, POLAND, SINGAPORE, SLOVAKIA, SPAIN, SWITZERLAND, THAILAND, USA, VENEZUELA, VIETNAM

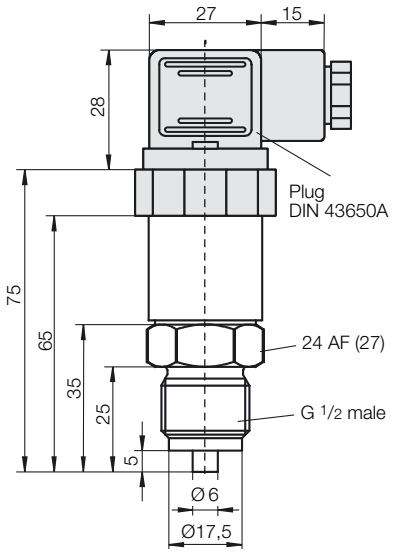
KOBOLD Messring GmbH
Nordring 22-24
D-65719 Hofheim/Ts.
☎ +49(0)6192 299-0
Fax +49(0)6192 23398
E-Mail: info.de@kobold.com
Internet: www.kobold.com

Model:
SEN-86

Description

KOBOLD Pressure sensors model SEN-86 are inexpensive pressure sensors with thick film ceramic pressure element.
With their accuracy, reliability and compact design, they are perfectly suitable for OEM applications in medium to high quantities.
The materials and technology used make these pressure sensors insensitve to chemically aggressive media and mechanical load.
Particularly hydraulics systems with their high and fast pressure peaks are thus preferred applications.

Dimensions



Applications

- Plant engineering
- Machine Building
- Environmental engineering
- Cooling circuit

Technical Data

Technology:	internal diaphragm
Pressure type:	gauge pressure
Housing:	stainless steel 1.4305
Connection:	G ½ male stainless steel 1.4301 (NPT, UNF on request)
Sensor element:	ceramic (Al_2O_3)
Measuring principle:	thick film techn. (DMS)
O-Ring:	NBR
Max. Temperature:	storage: -40...+100 °C medium: -20...+85 °C ambient: -40...+85 °C
Pressure limitation:	< 60 bar: 2 x range > 60 bar: 1.5 x range
Accuracy class:	SEN-86∗0: 0.5 SEN-86∗1: 1.0
Repeatability:	SEN-86∗0: ≤ ±0.15 % (f.s.d.) SEN-86∗1: ≤ ±0.3 % (f.s.d.)
Characteristic deviation:	SEN-86∗0: ≤ ±0.3 % (f.s.d.) SEN-86∗1: ≤ ±0.6 % (f.s.d.)
Stability (annual):	≤ ±0.2 % of full scale in rated conditions
Electrical connection:	plug DIN 43 650 A / plug M12x1 cable connection
Power supply:	15...32 V_{DC}
Output signal:	4 - 20 mA (2-wire), 0 - 5 V_{DC}, 0 -10 V_{DC}
Load (Ω):	≤ (U_B - 15 V) / 0.02 A (for 4 - 20 mA)
Response time:	≤ 1 ms (within 10 - 90 % of full scale)
Temp. comp. range:	-25...+85 °C
Temperature drift:	zero point: SEN-86∗0: ≤ ±0.02 % K SEN-86∗0: ≤ ±0.04 % K span: SEN-86∗0: ≤ ±0.01 % K SEN-86∗1: ≤ ±0.02 % K
Protection:	IP 65 (SEN-860..; SEN-863..) IP 68 (SEN-865..)

Order Details Sensor (Example: **SEN-8600 C315**)

Electrical connection	Class	Model	Output	Measuring range*
DIN plug; IP 65	0.5	**SEN-8600..**	**without** = 4 - 20 mA **/1** = 0 - 5 V **/2** = 0 - 10 V	**C315** = -1 to 0 bar **B025** = 0 to 1 bar **B035** = 0 to 1.6 bar **B045** = 0 to 2.5 bar **B055** = 0 to 4 bar **B065** = 0 to 6 bar **B075** = 0 to 10 bar **B085** = 0 to 16 bar **A095** = 0 to 25 bar **A105** = 0 to 40 bar **A115** = 0 to 60 bar **A125** = 0 to 100 bar **A135** = 0 to 160 bar **A145** = 0 to 250 bar **A155** = 0 to 400 bar **A165** = 0 to 600 bar
M12 plug; IP 65	0.5	**SEN-8630..**		
Cable connection; IP 68	0.5	**SEN-8650..**		
DIN plug; IP 65	1.0	**SEN-8601..**		
M12 plug; IP 65	1.0	**SEN-8631..**		
Cable connection; IP 68	1.0	**SEN-8651..**		

*PSI on request

Zertifiziertes QM-System
DIN EN ISO 9001
Zertifikat-Nr. 01017

Pressure Sensor with Ceramic Sensor Element

KOBOLD

measuring • monitoring • analysing

Option:
Pluggable
Sandwich
Display
Model AUF

- Gauge pressure
- Internal diaphragm
- Measuring range:
  -1 ... 0 to 0 ... 600 bar
- Temperature (medium):
  max. 85 °C
- Accuracy class:
  0.5 or 1.0
- Material:
  stainless steel and ceramic
- Connection: G ¼ male

KOBOLD companies worldwide:
ARGENTINA, AUSTRIA, BELGIUM, CANADA, CHILE, CHINA, COLOMBIA, CZECHIA, FRANCE, GERMANY, GREAT BRITAIN, INDIA, IRAN, INDONESIA, ITALY, MALAYSIA, MEXICO, NETHERLANDS, PERU, POLAND, SINGAPORE, SLOVAKIA, SPAIN, SWITZERLAND, THAILAND, USA, VENEZUELA, VIETNAM

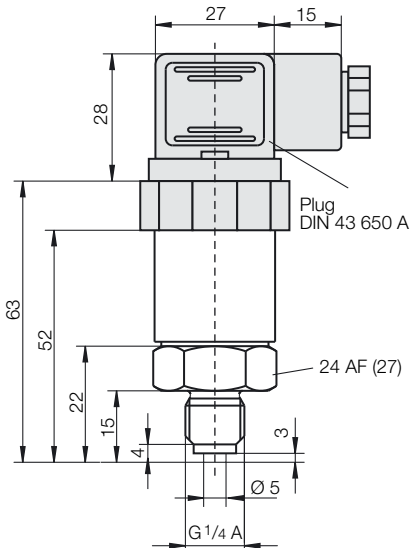
KOBOLD Messring GmbH
Nordring 22-24
D-65719 Hofheim/Ts.
☎ +49(0)6192 299-0
Fax +49(0)6192 23398
E-Mail: info.de@kobold.com
Internet: www.kobold.com

Model:
SEN-87

Description

KOBOLD Pressure sensors model SEN-87 are inexpensive pressure sensors with thick film ceramic pressure element.
With their accuracy, reliability and compact design, they are perfectly suitable for OEM applications in medium to high quantities.
The materials and technology used make these pressure sensors insensitive to chemically aggressive media and mechanical load.
Particularly hydraulics systems with their high and fast pressure peaks are thus preferred applications.

Dimensions



Applications

- Plant engineering
- Machine Building
- Environmental engineering
- Cooling circuit

Technical Data

Technology:	internal diaphragm
Pressure type:	gauge pressure
Housing:	stainless steel 1.4305
Connection:	G ¼ male; stainless steel 1.4301 (NPT, UNF on request)
Sensor element:	ceramic (Al_2O_3)
Measuring principle:	thick flim techn. (DMS)
O-Ring:	NBR
Max. Temperature:	storage: -40...+100 °C medium: -20...+85 °C ambient: -40...+85 °C
Pressure limitation:	< 60 bar: 2 x range > 60 bar: 1.5 x range
Accuracy class:	SEN-87∗0: 0.5 SEN-87∗1: 1.0
Repeatability:	SEN-87∗0: ≤ ±0.15 % (f.s.d.) SEN-87∗1: ≤ ±0.3 % (f.s.d.)
Characteristic deviation:	SEN-87∗0: ≤ ±0.3 % (f.s.d.) SEN-87∗1: ≤ ±0.6 % (f.s.d.)
Stability (annual):	≤ ±0.2 % of full scale rated conditions
Electrical connection:	plug DIN 43 650 / plug M12x1 cable connection
Power supply:	15...32 V_{DC}
Output signal:	4 - 20 mA (2-wire), 0 - 5 V_{DC}, 0 - 10 V_{DC}
Load (Ω):	≤ (U_B -15 V)/0.02 A (for 4 - 20 mA)
Response time:	≤ 1 ms (within 10 - 90 % of full scale)
Temp. comp. range:	-25...+85 °C
Temp. drift:	zero point: SEN-87∗0: ≤ ±0.02 % K SEN-87∗1: ≤ ±0.04 % K span: SEN-87∗0: ≤ ±0.01 % K SEN-87∗1: ≤ ±0.02 % K
Protection:	IP 65 (SEN-870..; SEN-873..) IP 68 (SEN-875..)

Order Details Sensor (Example: **SEN-8700 C315**)

Electrical connection	Class	Model	Output	Switching range*
DIN plug; IP 65	0.5	**SEN-8700..**	**without** = 4 - 20 mA **/1** = 0 - 5 V **/2** = 0 - 10 V	**C315** = -1 to 0 bar **B025** = 0 to 1 bar **B035** = 0 to 1.6 bar **B045** = 0 to 2.5 bar **B055** = 0 to 4 bar **B065** = 0 to 6 bar **B075** = 0 to 10 bar **B085** = 0 to 16 bar **A095** = 0 to 25 bar **A105** = 0 to 40 bar **A115** = 0 to 60 bar **A125** = 0 to 100 bar **A135** = 0 to 160 bar **A145** = 0 to 250 bar **A155** = 0 to 400 bar **A165** = 0 to 600 bar
M12 plug; IP 65	0.5	**SEN-8730..**		
Cable connection; IP 68	0.5	**SEN-8750..**		
DIN plug; IP 65	1.0	**SEN-8701..**		
M12 plug; IP 65	1.0	**SEN-8731..**		
Cable connection; IP 68	1.0	**SEN-8751..**		

*PSI on request

02 / 04-2007