

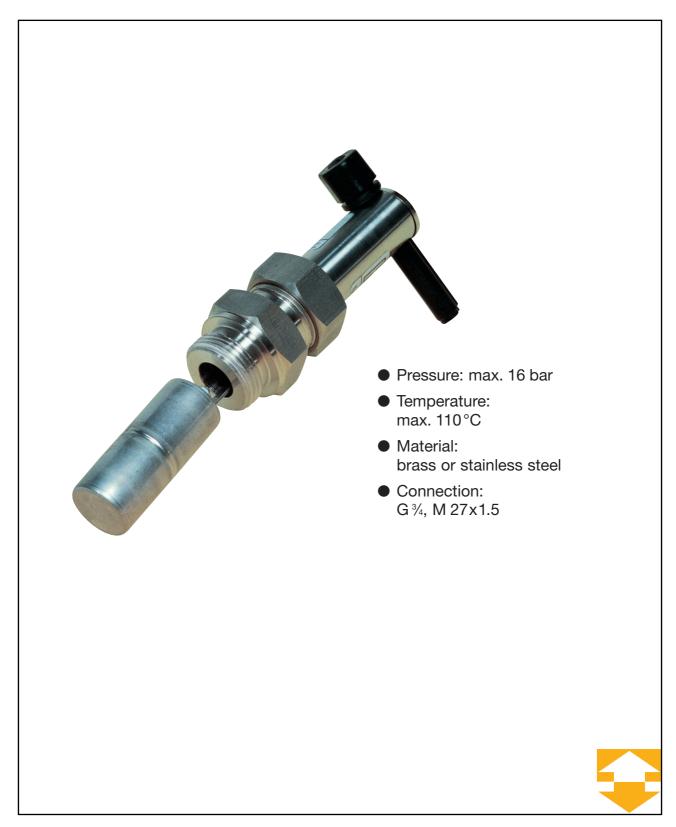
Level Switches



measuring

monitoring

analysing



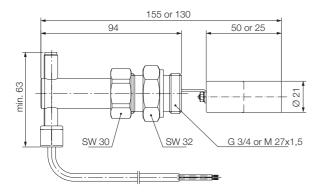


Description

The KOBOLD level switch model NV is a reasonably-priced compact instrument for monitoring levels. A stainless steel cylindrical float attached to one end of a balance arm moves up and down with the liquid level.

The motion of the float is transferred to a permanent magnet fitted at the other end of the balance arm. The permanent magnet switches a reed contact that is fitted in a sliding tube outside the medium. The tube is set as a N/O contact at the factory, that is, the contact closes when the level rises. The switching function is reversed by moving the tube. The instruments are delivered in standard sleeves for side installation. Teflon tape is used to seal the switch.

Dimensions



Re-adjusting the contact unit

To re-adjust the contact unit the locking plate on the top part of the housing must be loosened and the contact unit moved.

Blue (white) or red arrows are situated on the contact unit for re-adjustment purposes. The front edge of the locking plate serves as an adjustment mark.

N/O contact:

Adjust the contact unit near the red arrow. The contact closes as the liquid level rises.

N/C contact:

Adjust the contact unit near the blue (white) arrow. The contact opens as the liquid level rises.

Technical Details

Housing: NV-11..: brass, Ms 58

NV-12..: stainless steel, 1.4301

Connections: NV-11..: brass, Ms 58

NV-12..: stainless steel, 1.4301

Float: Stainless steel, 1.4301
Leaf spring: Stainless steel, 1.4310
Balance arm: Stainless steel, 1.4310
Sleeve: NV-11..: brass, Ms 58

NV-12..: stainless steel, 1.4301

Contact tube: Polyamide

Seal: NV-11..: NBR

NV-12..: FPM

Max. temperature: 110 °C

Max. pressure: 16 bar

Installation position: horizontal

Contact components: 1 N/O contact / N/C contact

depending on the setting

Electrical connection: 1.5 m cable, PVC Switching voltage: max. 230 $V_{AC/DC}$ Switch capacity: max. 40 VA / watt

Switching current: max. 2 A Contact resistance: max. 80 m Ω

Closing point: max. 6 mm (above centre line)

Opening point: max. 3 mm (below centre line)

Switching hysteresis: approximately 8 mm

Density: > 0.8 kg/dm³ to 25 mm float > 0.7 kg/dm³ to 50 mm float

Protection: IP 65

Ex-range: ATEX zone 1 as "simple operator"

Applications

- Heating boilers
- Car washes
- Cleaning machines

Order Details (Example: NV-1101 R1)

Model	Material	Connection/ Length of float	Contact type, PVC cable length
NV-	11=Brass 12=St. steel	01 = G 3/4; 25 m 02 = M27x1.5; 25 m 03 = G 3/4; 50 m 04 = M27x1.5; 50 m	R1 = N/O cont., 1.5 m U1 = SPDT, 1.5 m R2 = N/O cont., 2.0 m R4 = N/O cont., 3.0 m R6 = N/O cont., 4.0 m R8 = N/O cont., 5.0 m