

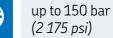
Pressure sensor DSD

Digital pressure switch





Oil or fluid grease up to NLGI 0



(2 175 psi)



-25 to +100 °C (-13 to 212 °F)



M10×1 tap. connection thread



M3 screw, tab connector, M12×1 or cubic plug

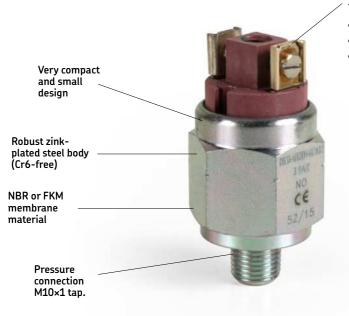


Applications

- Machine tools
- Printing machines
- Minerals and mining
- Food and beverage
- Wind turbines
- Service vehicles



Product information



3 possible electrical connection options:

- Combination plug tab connector 6,3 × 0,8 or M3 screwed contacts (DSD3-A...A12)
- Cubic plug DIN EN 175301-803-A (DSD3-A...A14)
- M12×1 (DSD3-A...A13)





DSD3-A...A13



DSD3-A...A12

DSD3-A...A14

Description

DSD sensors are single, mechanical-diaphragm pressure switches. They are used for pressure monitoring and vary in regard of preadjusted pressures, electrical connections and dimensions. Under pressure, a pressure plunger carries the contact washer and moves it to the opposing contact and closes the electrical circuit. If the pressure is reduced by the amount of hysteresis, the switch opens again. On an NC contact, contacts are made in the opposite way. In single-line systems, DSD sensors can be integrated before the last metering device at the end of the lubrication line.

Features and benefits

- Very small and compact design
- Available for a pressure rating from 0 to 45 bar (0 to 653 psi) in fixed increments
- Electrical connection is established via screwed contacts, tab connectors, circular or cubic plug connectors
- Pressure monitoring, dependent upon the mechanical design of resulting pressure and preloaded spring force of the pressure spring
- Mechanical switch can be used as both a normally closed contact (NC) and a normally open contact (NO)

Technical data

Function principle Lubricant Operating temperature: FKM membrane NBR membrane Operating pressure Overpressure Switching pressure Switch type

Contact type

Contact rating: DSD3-A...A12/DSD3-A...A14 DSD3-A...A13 Switching voltage/current: DSD3-A...A12 DSD3-A...A13 DSD3-A...A14

Electrical connection: DSD3-A...A12

DSD3-A...A13 DSD3-A...A14 Pressure port Materials: Housing Contact Membrane Protection class (housing) Dimensions, $\emptyset \times h$: DSD3-A...A12 DSD3-A...A13 DSD3-A...A14 ¹) Mounting position digital pressure switch oil and fluid grease NLGI 000, 00, 0

-10 to +100 °C; -13 to +212 °F -25 to +100 °C; 14 to 212 °F max. 150 bar; max. 2 175 psi max. 300 bar; max. 4 350 psi 0,5 to 45 bar; 7.25 to 653 psi mechanical diaphragm pressure switch NO, NC (change-over with cubic plug connector only)

100 VA 24 VA

48V DC/AC 2,5 A (min. 20 mA) 48V DC/AC 0,5 A (min. 20 mA) 30V DC 2,5 A/ 250V AC 5 A (min. 20 mA)

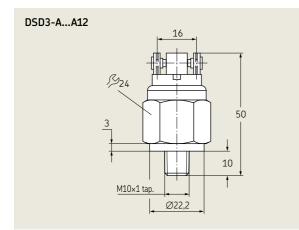
combination plug - tab connector 6,3 × 0,8 mm or M3 screw M12×1 plug cubic plug DIN EN 175301-803-A M10×1 tapered

steel, galvanized, Cr6-free silver plated NBR or FKM IP 65

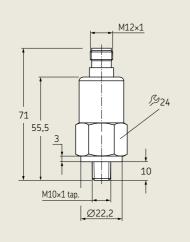
26,75 × 50 mm; 1.05 × 1.97 in 26,75 × 71 mm; 1.05 × 2.79 in 26,75 × 85 mm; 1.05 × 3.34 in anv

1) Dimensions without cubic plug

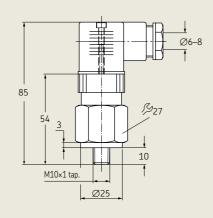
Drawings and plans

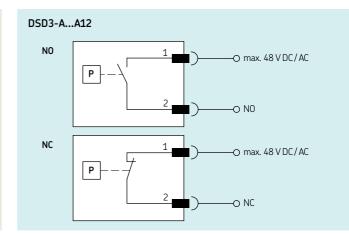




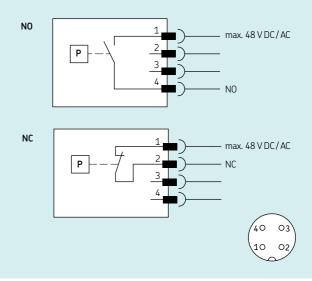


DSD3-A...A14

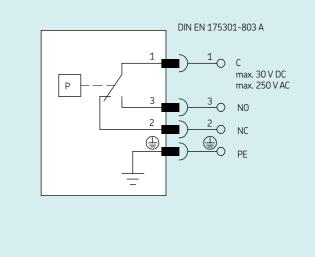












LINCOLN

Order information

entification code DSD3-A A A A
roduct series DS
ressure switch type D
anufacturer marking 3 = marking 3
rpe A
ated switching pressure 1)
0005 = 0,5 bar, 7 psi 0020 = 2 bar, 29 psi 0030 = 3 bar, 44 psi 0080 = 8 bar, 116 psi 0120 = 12 bar, 174 psi 0200 = 20 bar, 290 psi 0280 = 28 bar, 405 psi 0450 = 45 bar, 653 psi
embrane material
N = NBR F = FKM
rpe of contact
NC = closed (only with electrical connection 2–3 available) NO = open (only with electrical connection 2–3 available) CO = change-over (only with electrical connection 4 available)
ontact material 1)
A = silver contacts
pe thread 1)
1 = M10×1 tapered
ectrical connection

2 = combination plug - tab connector $6,3 \times 0,8$ or M3 screwed contacts ²) **3** = circular connector M12×1

4 = cubic plug connector DIN EN 175301-803-A (only as change-over (CO) available)

More versions available on request.
Protection cap 898-420-001 to be ordered separately

skf.com/lubrication

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CAD models: skf-lubrication.partcommunity.com