



Flow Monitor / Flow Indicator DKG-1, viscosity compensated

Operation: float measuring principle



- Universal orientation
- Viscosity compensated
- High switch accuracy
- Infinitely variable switch point adjustment through user
- EX-version to ATEX available
- Scales are burnt into the sight glass
- Threaded connection, special threads on request

D-EN-DKG1-20200526



Flow Monitor / Flow Indicator DKG-1, viscosity compensated

Operation: float measuring principle

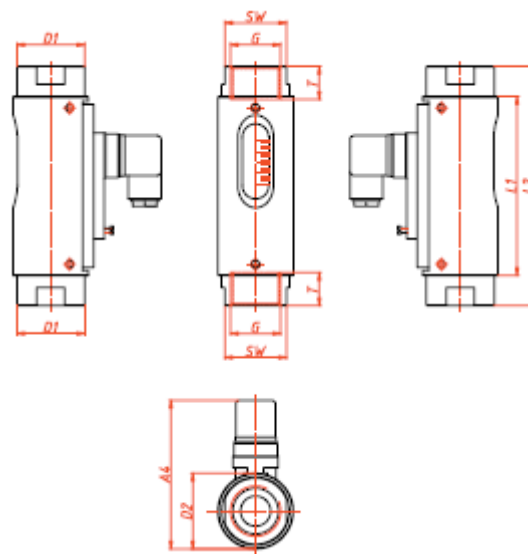
Applications

- Central lubrication
- Circulation lubrication
- Transformers

Operating data

Operating pressure max.	10 bar
Pressure drop	0,02 – 0,4 bar
Viscosity range	30 cSt to 600 cSt
Temperature max.	120°C (optional 160°C)
Accuracy	±10% full scale

Mechanical drawing



Measuring ranges

Type	Switch range for oil, density 0.9 kg/dm³ (1)		
	[l/min]	[gph]	[gpm]
DKG-1/1 (2)	0,1 – 0,8	1,6 – 12,7	
DKG-1/2	0,5 – 1,5	8,0 – 24,0	
DKG-1/4	1 - 4	16,0 – 63,0	
DKG-1/8	2 - 8	32,0 – 127,0	
DKG-1/10	3 - 10	48,0 – 159,0	
DKG-1/15	5 - 15	80,0 – 240,0	
DKG-1/24	8 - 24	125,0 – 380,0	
DKG-1/30	10 - 30	160,0 – 475,0	
DKG-1/45	15 - 45	240,0 – 710,0	
DKG-1/60	20 - 60	320,0 – 950,0	
DKG-1/90	30 - 90		8,0 – 24,0

- (1) The specified data are switch-off points. Other switch ranges on request
(2) Up to 400 cSt



Flow Monitor / Flow Indicator DKG-1, viscosity compensated

Operation: float measuring principle

Summary of types													
Type	Overall dimensions [mm]												Weight
	SW	L1	L2	D1	G	T	D2	DN	A1	A2	A3	A4	Approx. [g]
DKG-1/1	41	118,5	144,5	45	1/4"	10	50	8	-	-	-	approx. 99	850
DKG-1/2			144,5		1/2"	14		15					
DKG-1/4			138,5 158,5		3/4" 1"	15 17		20 25					
DKG-1/8	41	118,5	144,5	45	1/2"	14	50	15	-	-	-	approx. 99	850
DKG-1/10			138,5		3/4"	15		20					
DKG-1/15			138,5		1"	17		25					
DKG-1/24													
DKG-1/30	41	118,5	138,5 158,5	45	3/4" 1"	15 17	50	20 25	-	-	-	approx. 99	850
DKG-1/45													
DKG-1/60													
DKG-1/90													

Material		
Wetted parts:	Brass version	Stainless steel version
Sight glass	Duran 50	Duran 50
Spring	1.4571	1.4571
Gaskets	FKM (optional: NBR, EPDM) ⁽³⁾	FKM (optional: NBR, EPDM) ⁽³⁾
Magnets	Hard ferrite	Hard ferrite
All other wetted parts	Brass nickel-plated	1.4571
Non wetted parts:		
Housing	Aluminium anodized	Aluminium anodized

(3) Other gasket materials on request



Flow Monitor / Flow Indicator DKG-1, viscosity compensated

Operation: float measuring principle

Electrical data	
Change over	250 V • 1,5A • 50 VA (2)
Normally open	250 V • 3A • 100 VA
ATEX II 2G Ex mb II T6 & ATEX II 2 D Ex tD A21 IP67 T80 °C	
ATEX II 2G Ex mb II T6 & ATEX II 2 D Ex tD A21 IP67 T80 °C	
Change over	250 V • 1A • 30 VA
Normally open	250 V • 2A • 100 VA
Change over M 12x1 (-20 °C – 85 °C)	250 V • 1,5A • 50 VA
Normally open M 12x1 (-20 °C – 85 °C)	250 V • 3A • 100 VA
Change over SPS	250 V • 1A • 60 VA
Ingress protection: IP65: Plug connection DIN 43650 Form A IP67: 1 m sealed in cable (with EEx-version 2 m) or plug connection M 12x1	
Output signal The contact opens / changes, when the flow decreases below the set point.	
Power supply Not required (potential free reed contacts)	
Plug types Other plug types or cable lengths on request.	
(2) Minimum load 3 VA	



Flow Monitor / Flow Indicator DKG-1, viscosity compensated

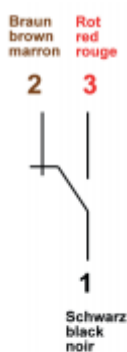
Operation: float measuring principle

Connection diagram

Connector in compliance with EN 175301-803
and cable

M12x1

Change over (COC)



Change over (COC)



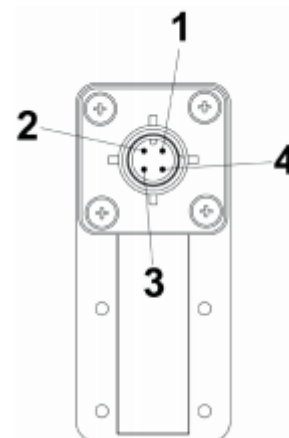
Normally open (NOC)



Normally open (NOC)



Pin-assignment



Important instructions!

Technical changes and errors reserved.

Pictures can be similar.

The operating instructions belonging to this device must be observed! Download at www.schmidt-messtechnik.com.