

Pressure switch MDR 4



Pressure switch MDR 4 S

3-phase
Switching capacity 4.0 / 5.5 kW
Max. cut-out pressure 16 bar
3-pole (N.C.)
Acc. to EN 60947
4-way-flange



From now
on also with
4-way-flange

Type overview MDR 4S

Order reference	ON / OFF Rotary knob	Pressure range P _{OFF} in bar	Flange	Weight in g	Part No.
MDR-4 DBA AFAA 040A060 XAA XXX	EA	1.5 - 6	G 1/4"	420	212584
MDR-4 DAA AFAA 040A060 XAA XXX	EA	1.5 - 6	G 1/2"	420	212591
MDR-4 DOA AFAA 040A060 XAA XXX	EA	1.5 - 6	G 1/2" + 1/4"	420	212607
MDR-4 GBA AFAA 090A110 XAA XXX	EA	4 - 11	G 1/4"	420	212614
MDR-4 GAA AFAA 090A110 XAA XXX	EA	4 - 11	G 1/2"	420	212621
MDR-4 GOA AFAA 095A110 XAA XXX	EA	4 - 11	G 1/2" + 1/4"	420	212638
MDR-4 HBA AFAA 135A160 XAA XXX	EA	6 - 16	G 1/4"	420	212645
MDR-4 HAA AFAA 135A160 XAA XXX	EA	6 - 16	G 1/2"	420	212652
MDR-4 HOA AFAA 135A160 XAA XXX	EA	6 - 16	G 1/2" + 1/4"	420	212669
MDR-4 DBA BFAA 040A060 XAA XXX	-	1.5 - 6	G 1/4"	420	220084
MDR-4 DAA BFAA 040A060 XAA XXX	-	1.5 - 6	G 1/2"	420	220077
MDR-4 DOA BFAA 040A060 XAA XXX	-	1.5 - 6	G 1/2" + 1/4"	420	220121
MDR-4 GBA BFAA 090A110 XAA XXX	-	4 - 11	G 1/4"	420	204251
MDR-4 GAA BFAA 090A110 XAA XXX	-	4 - 11	G 1/2"	420	206194
MDR-4 GOA BFAA 095A110 XAA XXX	-	4 - 11	G 1/2" + 1/4"	420	227069
MDR-4 HBA BFAA 135A160 XAA XXX	-	6 - 16	G 1/4"	420	204244
MDR-4 HAA BFAA 135A160 XAA XXX	-	6 - 16	G 1/2"	420	220107
MDR-4 HOA BFAA 135A160 XAA XXX	-	6 - 16	G 1/2" + 1/4"	420	227076

Unloader valves and cable glands for retrofitting see Accessories!

Type overview MDR 4S with 4-way-flange

Order reference	ON / OFF Rotary knob	Pressure range P _{OFF} in bar	Flange	Weight in g	Part No.
MDR-4 DEA AFAA 040A060 XAA XXX	EA	1.5 - 6	F 1/4"	460	257899
MDR-4 DDA AFAA 040A060 XAA XXX	EA	1.5 - 6	F 1/2"	460	257905
MDR-4 DFA AFAA 040A060 XAA XXX	EA	1.5 - 6	F 3/8"	460	257912
MDR-4 GEA AFAA 090A110 XAA XXX	EA	4 - 11	F 1/4"	460	257929
MDR-4 GDA AFAA 090A110 XAA XXX	EA	4 - 11	F 1/2"	460	257936
MDR-4 GFA AFAA 090A110 XAA XXX	EA	4 - 11	F 3/8"	460	257943
MDR-4 HEA AFAA 135A160 XAA XXX	EA	6 - 16	F 1/4"	460	257950
MDR-4 HDA AFAA 135A160 XAA XXX	EA	6 - 16	F 1/2"	460	257967
MDR-4 HFA AFAA 135A160 XAA XXX	EA	6 - 16	F 3/8"	460	257974
MDR-4 DEA BFAA 040A060 XAA XXX	-	1.5 - 6	F 1/4"	460	257981
MDR-4 DDA BFAA 040A060 XAA XXX	-	1.5 - 6	F 1/2"	460	257998
MDR-4 DFA BFAA 040A060 XAA XXX	-	1.5 - 6	F 3/8"	460	258001
MDR-4 GEA BFAA 090A110 XAA XXX	-	4 - 11	F 1/4"	460	258018
MDR-4 GDA BFAA 090A110 XAA XXX	-	4 - 11	F 1/2"	460	258025
MDR-4 GFA BFAA 090A110 XAA XXX	-	4 - 11	F 3/8"	460	258032
MDR-4 HEA BFAA 135A160 XAA XXX	-	6 - 16	F 1/4"	460	258049
MDR-4 HDA BFAA 135A160 XAA XXX	-	6 - 16	F 1/2"	460	258056
MDR-4 HFA BFAA 135A160 XAA XXX	-	6 - 16	F 3/8"	460	258063

Unloader valves and cable glands for retrofitting see Accessories!

Pressure switch MDR 4



Pressure switch MDR 4 SD

3-phase
 Switching capacity 4.0 / 5.5 kW
 Max. cut-out pressure 11 bar
 With scale and transparent cover
 3-pole (N.C.)
 Acc. to EN 60947

Type overview MDR 4 SD

Order reference	ON / OFF Rotary knob	Pressure range P _{OFF} in bar	Flange	Weight in g	Part No.
MDR-4 DAA BFDA 040A060 XAA XXX	-	1.5 - 6	1/2"	420	212737
MDR-4 DBA BFDA 040A060 XAA XXX	-	1.5 - 6	1/4"	420	212744
MDR-4 GAA BFDA 090A110 XAA XXX	-	4 - 11	1/2"	420	212751

Unloader valves and cable glands for retrofitting see Accessories!



Pressure switch MDR 4 SU

3-phase
 Switching capacity 2.5 / 4.0 kW
 Max. cut-out pressure 16 bar
 With reversed function
 3-pole (N.O.)
 Acc. to EN 60947

Type Summary MDR 4 SU

Order reference	ON / OFF Rotary knob	Pressure range P _{OFF} in bar	Flange	Weight in g	Part No.
MDR-4 DAA BFCA 040A060 XAA XXX	-	1.5 - 6	1/2"	420	212706
MDR-4 GAA BFCA 090A110 XAA XXX	-	4 - 11	1/2"	420	212713
MDR-4 HAA BFCA 090A110 XAA XXX	-	6 - 16	1/2"	420	212720

Unloader valves and cable glands for retrofitting see Accessories!

Pressure switch MDR 4



Technical Data MDR 4

Technical Data MDR 4 S / MDR 4 SD acc. to EN 60947	
Rated insulation voltage U_i	500 V
Motor switching capacity (AC 3) $U_e=240$ V (1~)	2.5 kW
Motor switching capacity (AC 3) $U_e=230$ V (3~)	4.0 kW
Motor switching capacity (AC 3) $U_e=400$ V (3~)	5.5 kW
Motor switching capacity (AC 3) $U_e=500$ V (3~)	5.5 kW
Electrical life (AC 3) Cycles	$> 1 \times 10^5$
Mechanical life Cycles	$> 5 \times 10^5$
Max. electrical cycles Cycles/h	120

Technical Data MDR 4 S / MDR 4 SD acc. to EN 60947	
Max. mechanical cycles Cycles/h	600
Rated operational current I_e at 240 V AC	20 A
Bursting strength P_z	> 35 bar
Permissible medium temperature Air	- 5...+ 80 °C
Permissible medium temperature Water	+ 80 °C
Degree of Protection acc. to EN 60529	IP 44
Conductor cross-section 1 .. fine stranded cable 1 x / 2 x	2.5 / 2.5mm ²
Conductor cross-section 1 rigid cable 1 x / 2 x	2.5 / 2.5mm ²

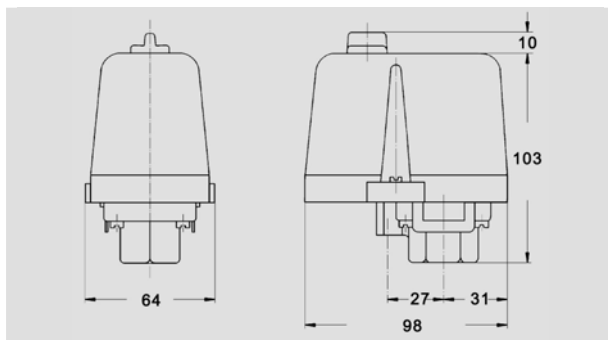
Technical Data MDR 4 SU acc. to EN 60947	
Rated insulation voltage U_i	500 V
Motor switching capacity (AC 3) $U_e=240$ V (1~)	1.5 kW
Motor switching capacity (AC 3) $U_e=230$ V (3~)	2.5 kW
Motor switching capacity (AC 3) $U_e=400$ V (3~)	4.0 kW
Electrical life (AC 3) Cycles	$> 1 \times 10^5$
Mechanical life Cycles	$> 5 \times 10^5$
Max. electrical cycles Cycles/h	120
Max. mechanical cycles Cycles/h	600
Rated operational current I_e at 240 V AC	20 A
Bursting strength P_z	> 35 bar

Technical Data MDR 4 SU acc. to EN 60947	
Permissible medium temperature Air	- 5...+ 80 °C
Permissible medium temperature Water	+ 80 °C
Degree of Protection acc. to EN 60529	IP 44
Conductor cross-section 1 .. fine stranded cable 1 x / 2 x	2.5 / 2.5mm ²
Conductor cross-section 1 rigid cable 1 x / 2 x	2.5 / 2.5mm ²

Diaphragm media resistance MDR 4 ..	
Air, Water	resistant

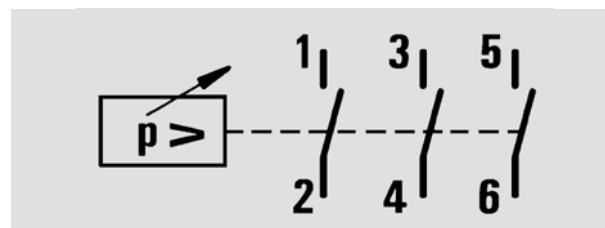
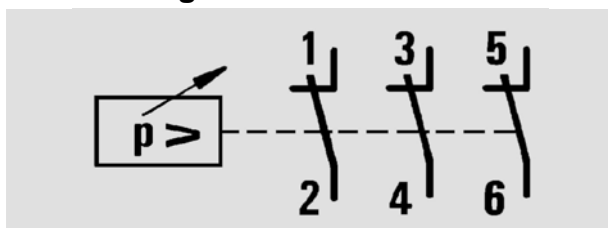
A detailed overview of diaphragm media resistance for all pressure switches can be found in the table on page 2.11

Dimensions MDR 4



Pressure switch MDR 4

Circuit Diagrams MDR 4



Accessories MDR 4

Order reference	Description	Weight in g	Part No
	Unloader valves		
EV 4	With screw connection for 6 mm plastic or copper discharge tubes	25	201601
EV 4S	With quick-connect for 6 mm plastic discharge tubes	25	201625
EV 4W	90° with screw connection for 6 mm plastic or discharge copper tubes	15	255055
EV 4Wi	90° with screw connection for 1/4" mm plastic or discharge copper tubes	15	255062
EV 4WS	90° with quick-connect for 6 mm plastic discharge tubes	15	201656
	Unloader valves for difficult motor starting conditions		
AEV 4S	With quick-connect for 6 mm plastic discharge tubes	25	201687
AEV 4W	90° with screw connection for 6 mm plastic or copper discharge tubes	15	201694
AEV 4Wi	90° with screw connection for 1/4" mm plastic or copper discharge tubes	15	255079
AEV 4WS	90° with quick-connect for 6 mm plastic discharge tubes	15	255086
	Cable glands		
WN	Grommet	6	200888
PG 11 G	Conduits for mounting of cable glands (Inner thread)	6	200895
PG 11 V	Cable gland complete	12	200901
PG 11 Z	With strain relief	12	200925
PG 11 ZK	With strain relief and cable support	12	200918
PG 13.5 G	Conduits for mounting of cable glands (Inner thread)	6	200963
PG 13.5 V	Cable gland complete	12	200932
PG 13.5 Z	With strain relief	12	200956
PG 13.5 ZK	With strain relief and cable support	12	200949
MW 4	Mounting bracket	65	230021
	Cover		
H4 (Cover MDR 4S)	Cover without rotary knob (Neutral version, without marking)	70	229469
H4S+EA (Cover MDR 4S+EA)	Cover with rotary knob for manual On/Off (Neutral version, without marking)	70	229476
H4SD (Cover MDR 4SD)	Cover without rotary knob for MDR 4 SD (transparent)	70	229483

Pressure switch MDR 4



Unloader valves / Delayed unloader valves



EV 4



EV 4S



AEV 4S



EV 2W / EV 4Wi



AEV 4W / AEV 4Wi



EV 4WS



AEV 4WS

Wall-mounting bracket / Cable glands MDR 4



MW 4



WN



PG .. G



PG .. V

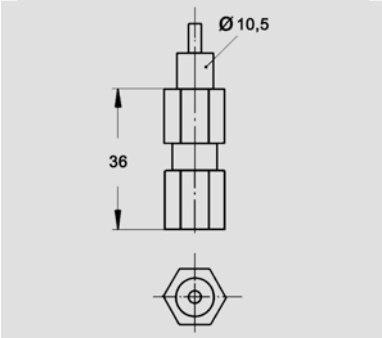


PG .. Z

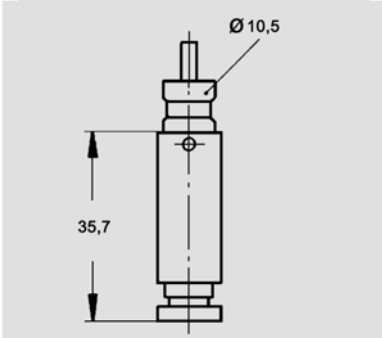


PG .. ZK

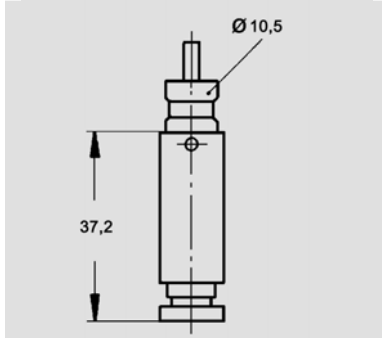
Dimensions, Accessories MDR 4



EV 4

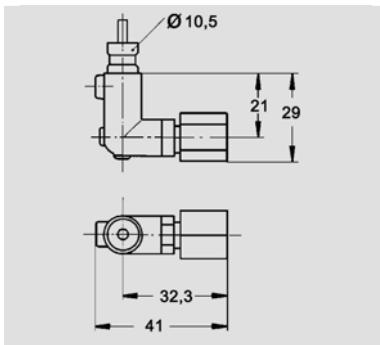


EV 4 S

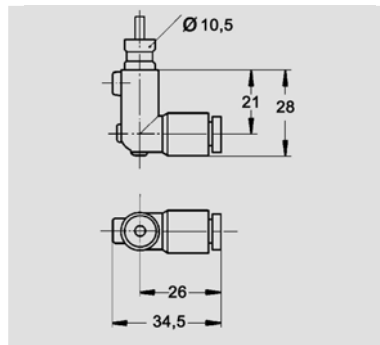


AEV 4 S

Pressure switch MDR 4



EV 4W / EV 4Wi
AEV 4W / AEV 4Wi



EV4 WS
AEV 4WS

Pressure Diagrams MDR 4

