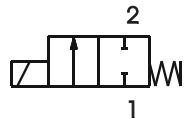


## 2/2 way solenoid valve normally closed or normally open

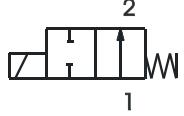
**type 34, stainless steel body AISI303  
direct operated, DN 1,5 – 10 mm, G1/4 – G3/8**



normally closed NC



normally open NO



<b>SPECIFICATION</b>	
<b>general</b>	
type of construction	2/2-poppet valve, normally closed NC or normally open NO, coil 360° rotatable
operator	solenoid, or by manual override
ports	G1/4 – G3/8
ambient temperature	-20°C to +50°C, higher allowed ambient temperatures on request
fluid temperature	dependent on sealing material and coil
viscosity	max. 37 mm²/s (cst) or 5° E
material	Body and tube: AISI 303 Inner parts: stainless steel AISI 430 FR Sealing: see type selection
mounting	installation into fixed piping systems or by use of 2 threads on the bottom side
installation	in any position, preferable vertical fixed solenoid coil
unit of supply	without connector
<b>electrical data</b>	
voltage	DC voltage or AC voltage
standard voltage	24V DC, 24V AC, 230V AC
special voltage on request	6V-200V DC, 12V-240V, 50Hz or 60Hz
acceptable voltage tolerance	+/- 10%
power consumption	see specifications at solenoid coils
coil type	temperature class F (155°C), winding class H (180°C), coil E3 temperature class H
duty cycle	100% ED (DB), continuous operation
protection class	IP65 according DIN EN 60529 (DIN 40050) with correctly mounted connector
<b>pneumatic – hydraulic</b>	
flow medium	all liquids and gases, which don't attack the used material
max. body housing pressure	PN 100 (bar) up to DN 4mm, PN 25 (bar) from DN 5 – 10mm
response time	depending on operating pressure and fluid
special equipment on request	coil type with cable, coils for temperature class H (180°C), higher differential pressure, PTFE seal

E & OE: We reserve the right to change design, dimensions or materials without notice.

**type 34A, normally closed**

type * (order-nr.)	NW DN (mm)	ports	maximum differential pressure in bar **									
			coil <b>E1AA</b>		coil <b>E2AA</b>		coil <b>E3AE</b>		coil <b>EXFA</b>		coil <b>F1AA</b>	
			~ (50Hz)	= (DC)	= (DC)	~ (50Hz)	= (DC)	~ (50Hz)	= (DC)	~ (50Hz)	= (DC)	
34A-2.15-.....	1,5	G 1/4	40	40				40	40			0,08
34A-2.20-.....	2,0	G 1/4	35	35				35	35			0,13
34A-2.25-.....	2,5	G 1/4	20	20	30	30	35	20	20			0,19
34A-2.30-.....	3,0	G 1/4	12	12	25	23	28	16	12			0,25
34A-2.35-.....	3,5	G 1/4	10	8	20	20	25	12	8			0,30
34A-2.40-.....	4,0	G 1/4	6	4	14	17	22	7	3,5			0,37
34A-2.50-.....	5,0	G 1/4	3,5	1	4	10	6	3	1	11	12	0,55
34A-2.60-.....	6,0	G 1/4	0,9	0,5	1,9	3,5	2,5	1,4	0,4	7,5	5	0,67
34A-3.80-.....	8,0	G 3/8	0,5	0,1	0,6	2	1	0,2	0,1	2,5	1,8	1,65
34A-3.100-.....	10	G 3/8	0,4	0,05	0,3	1,2	0,5	0,07	-	1,7	0,9	1,95

\* Type designation (order-nr.) must be completed with sealing material, short circuit ring, coil and supply voltage. (see order code)

\*\* At DC voltage all pressure specifications apply to a fluid temperature up to 80 °C. At higher fluid temperatures, the maximum differential pressure will be reduced by 0,4% / °C. All specifications refer to fluids with a maximum viscosity of 37 cSt. (5°E). Higher viscosities cause extended response time and need a special specification of the valve.

sealing material	Code	fluid temperature	applicable for
NBR (Perbunan)	<b>B</b>	max. 80°C	neutral gases and liquids
EPDM	<b>E</b>	max. 120°C	hot water, steam, not for oil and grease
FPM	<b>V</b>	max. 130°C	oil, petrol, oxygen, acids and bases

standard voltage	Code
24V = DC	<b>02400</b>
24V ~ (50Hz)	<b>02450</b>
230V ~ (50Hz)	<b>23050</b>

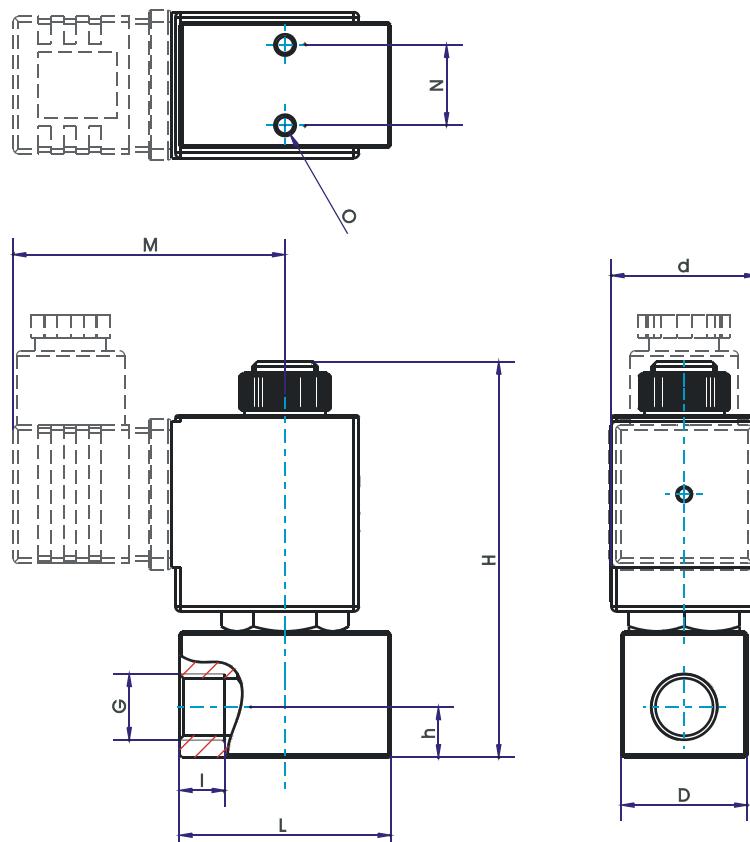
coil power consumption at 20 °C, protection class, interface					
coil type	inrush power ~ (50Hz) VA	rated power ~ (50Hz) VA	power = (DC) (W)	protection class with/without connector	interface
E1AA	32	14	12	IP65 / IP00	Connector DIN EN 175301-803 (DIN 43650) type A
E2AA	-	-	17	IP65 / IP00	Connector DIN EN 175301-803 (DIN 43650) type A
E3AE	70	30	27	IP65 / IP00	Connector DIN EN 175301-803 (DIN 43650) type A
EXFA	9	9	10,3	IP65	Coil explosion proof according to ATEX II 2G Ex mb II T4, II 2D ExtDA21 IP65 T130°C, cable length 3m
F1AA	70	30	27	IP65 / IP00	Connector DIN EN 175301-803 (DIN 43650) type A

ORDER CODE	34 B - 2 V 60 F Z - D E1AA 02400
type	type 34, body and medium contacting parts stainless steel AISI 303
function	A = normally closed, B = normally open
ports	2 = G 1/4, 3 = G 3/8
seal material	B = NBR (Perbunan), E = EPDM, V = FPM
nominal size seat	15 = 1,5 mm, 20 = 2,0 mm, 30 = 3,0 mm, 40 = 4,0 mm, 80 = 8,0 mm, 100 = 10,0 mm
throw off spring	only normally open – see specific type
stroke compensation spring	Z = only normally open
short circuit ring	A = copper short circuit ring, X = without short circuit ring, B = solid silver C = copper gold-plated, D = copper chemical nickel-plated
coil type	see specifications of the particular coil
supply voltage	always 5-digit, see code of standard voltage

type 34B, normally open								
type * (order-nr.)	NW DN (mm)	ports	maximum differential pressure in bar **					kv-value (m³/h)
			coil E1AA ~ (50Hz) and = (DC)	coil EXFA ~ (50Hz) and = (DC)	coil E3AE ~ (50Hz)	= (DC)	coil F1AA ~ (50Hz) and = (DC)	
34B-2.15CZ-E...	1,5	G1/4	35	35				0,08
34B-2.20CZ-E...	2,0		22	22				0,13
34B-2.25CZ-E...	2,5		13	13				0,19
34B-2.30CZ-E...	3,0		10,5	10,5				0,25
34B-2.35CZ-E...	3,5		6,5	6,5				0,30
34B-2.40CZ-E...	4,0		5,5	5,5				0,37
34B-2.50FZ.....	5,0				9		9	0,55
34B-2.60FZ.....	6,0				6		6	0,67

\* Type designation (order-nr.) must be completed with sealing material, short circuit ring, coil and supply voltage. (see order code)

\*\* Higher differential pressures on request.



Dimension table for type 34 in mm, weight approx. in g

G	coil	N	O	H 34A-	34B-	M	d	h	I	L	D	Weight (g) 34A-	34B-		
G 1/4	E1	16	M4	79	85.5	55	30	10	9	42	25	333	353		
	E2					57	35					399	419		
	E3					56	36					419	439		
	EX					54	38					673	693		
	F1			90	98	57						489	479		
G 3/8	E1	16	M4	79	85.5	55	30	12	10	45	32	325	345		
	E2					57	35					391	411		
	E3					56	36					411	431		
	EX					54	665					685			
	F1			90	98	57	38					481	471		