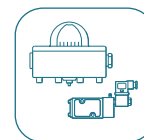
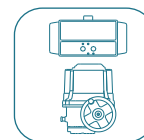
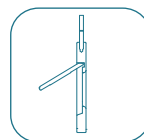
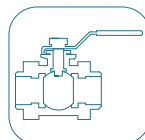
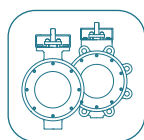
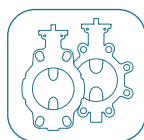


Y-angle seat valve

Fig.450



www.coreline.dk



Specifications and design features

Specifications

Size:	DN15 - DN65
Thread:	G1/8" - G2 1/2" (PT, NPT available on request)
Body:	Stainless steel AISI316
Actuator material:	Aluminium, stainless steel, plastic
Seat seal:	PTFE
Stem seal:	PTFE, FPM
Working pressure:	0 - 16bar
Application medium:	Water, neutral gas, oil, water steam, weak acid or weak alkaline solution
Medium temperature:	-10 °C ~ +180 °C
Environmental temperature:	-10 °C ~ +60 °C
Viscosity:	Max. 600mm ² /s(cst)
Control medium:	Air or neutral gas
Air supply pressure:	3bar ~ 10bar

Design features

With visible position indicator on actuator.

The seat cone is fixed without using nut to achieve better Kv value.

Actuator polished inside for lower friction to achieve longer lifetime.

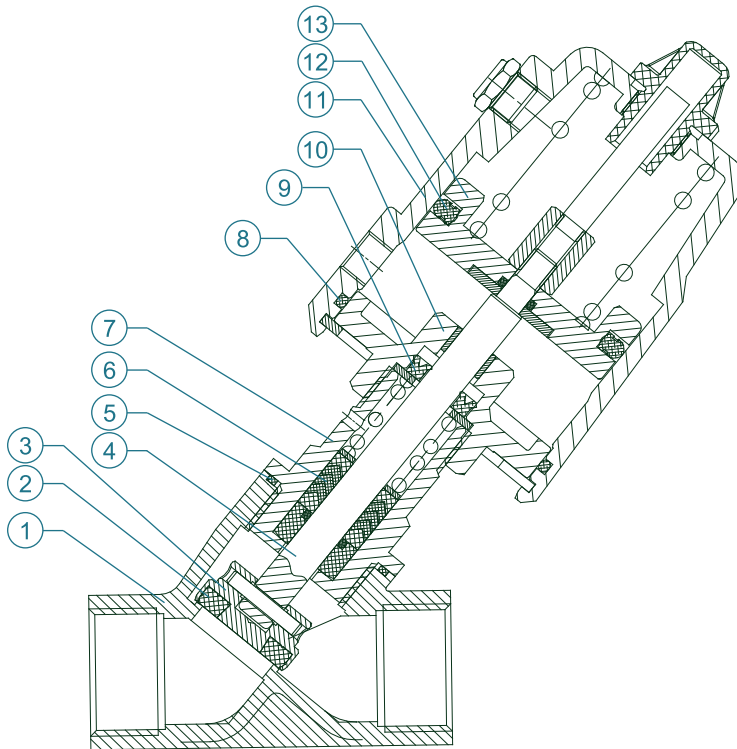
Sealing material in PTFE material which can be used in many applications.

Lubricating for inner parts, no need for maintenance.

No water hammer effect - when the flow is under the seat, the water hammer will be absorbed.



Material part list

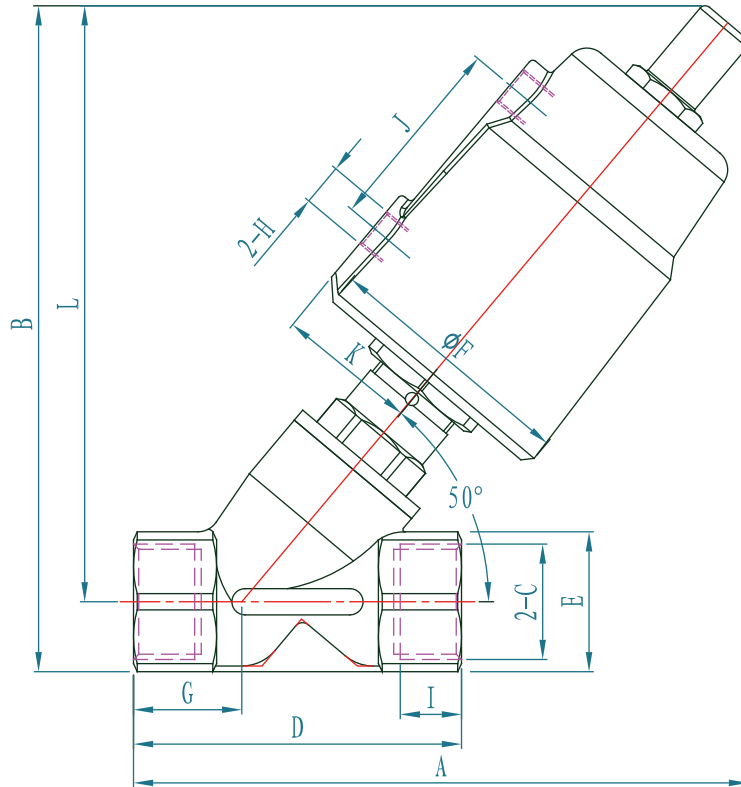


Material part list

No.	Part name	Material
1	Seat	SS316
2	Piston ring	PTFE
3	Piston	SS316
4	Plunger	SS316
5	Cover sealing	PTFE
6	Piston packing	PTFE
7	Cover	SS316
8	O-ring	FPM
9	Y-ring	FPM
10	Cover	SS304
11	Actuator body	SS304 ⁽¹⁾
12	Piston sealing	FPM
13	Piston	Aluminium alloy

(1) Actuator body available also in aluminium and plastic material. Contact Coreline for request.

Dimensions

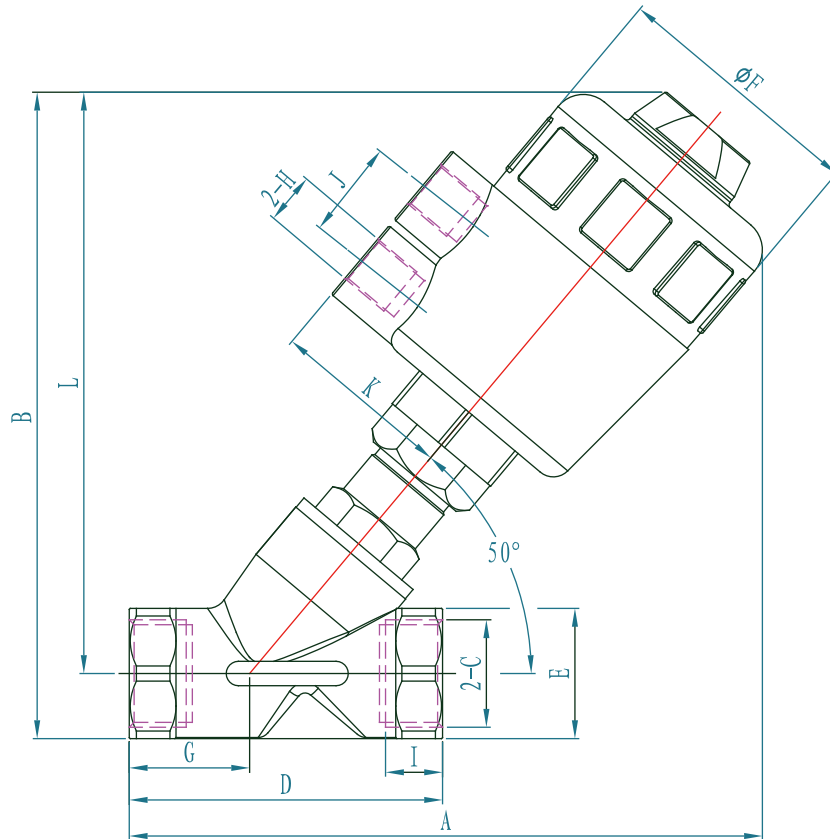


Dimensions (For SS actuator and Aluminium actuator type)

No.	Type	A	B	C (1)	D	E	F	G	H	I	J	K	L
1	450-S40-10	127.5	136	G3/8	69	27	50	25	G1/8	12	33.5	26.5	122.5
2	450-S50-10	140	150	G3/8	69	27	60.5	25	G1/8	12	45	32	136.5
3	450-S40-15	127.5	136	G1/2	69	27	50	23.1	G1/8	12	33.5	26.5	122.5
4	450-S50-15	140	150	G1/2	69	27	60.5	23.1	G1/8	12	45	32	136.5
5	450-S50-20	143	155	G3/4	75.5	32	60.5	25	G1/8	14	45	32	139
6	450-S50-25	163.5	176	G1	90.5	39	60.5	30.3	G1/8	14.5	45	32	156.5
7	450-S63-25	174.5	189.5	G1	90.5	39	77	30.3	G1/8	14.5	60	40.5	170
8	450-S63-32	190.5	207.5	G1 1/4	117.5	50	77	37.7	G1/8	20	60	40.5	180
9	450-S63-40	190.5	207.5	G1 1/4	117.5	55	77	37.7	G1/8	18.5	60	40.5	180
10	450-S80-40	207.5	220.5	G1 1/2	117.5	55	98	37.7	G1/4	18.5	74.5	51	193
11	450-S63-50	219.5	232.5	G1 1/2	137.5	70	77	48	G1/8	22	60	40.5	207.5
12	450-S80-50	233	253	G2	137.5	70	98	48	G1/4	22	74.5	51	218
13	450-S80-65	261.5	278	G2	170	85	98	52	G1/4	24	74.5	51	237.5
14	450-S100-65	270	290.5	G2 1/2	170	85	116	52	G1/4	24	80.5	63.5	248

(1) Thread type with PT and NPT for option. Contact Coreline for request.

Dimensions



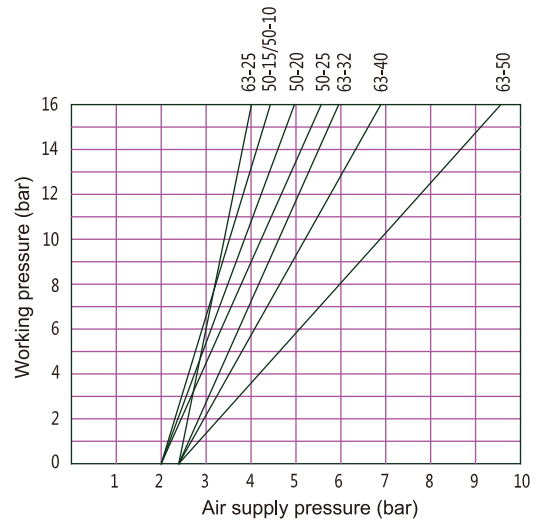
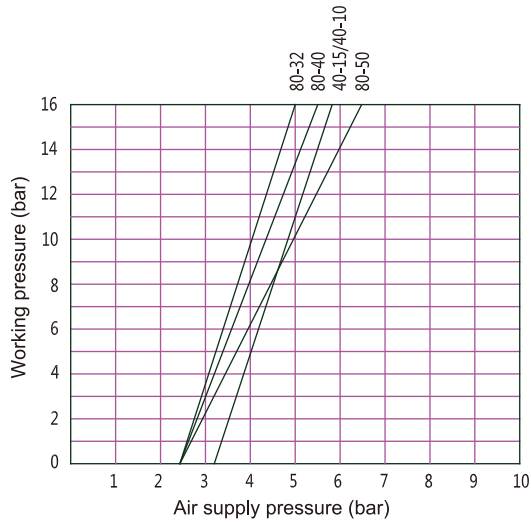
Dimensions (For plastic actuator type)

No.	Type	A	B	C (1)	D	E	F	G	H	I	J	K	L
1	450-P40-10	138	147	G3/8	69	27	53	25	G1/4	12	20.5	33	133.5
2	450-P50-10	148	157	G3/8	69	27	63.3	25	G1/4	12	24	44.5	143.5
3	450-P40-15	138	147	G1/2	69	27	53	25	G1/4	12	20.5	33	133.5
4	450-P50-15	148	157	G1/2	69	27	63.3	23.1	G1/4	12	24	44.5	143.5
5	450-P50-20	151	161.5	G3/4	75.5	32	63.3	25	G1/4	14	24	44.5	145.5
6	450-P50-25	172	183.5	G1	90.5	39	63.3	30.3	G1/4	14.5	24	44.5	164
7	450-P63-25	213.5	209	G1	90.5	39	79.5	30.3	G1/4	14.5	24	51.8	189.5
8	450-P63-32	213.5	227	G1 1/4	117.5	50	79.5	37.7	G1/4	20	24	51.8	199.5
9	450-P80-32	229	243.5	G1 1/4	117.5	50	100	37.7	G1/4	20	24	59	216
10	450-P63-40	213.5	227	G1 1/2	117.5	55	79.5	37.7	G1/4	18.5	24	51.8	199.5
11	450-P80-40	229	243.5	G1 1/2	117.5	55	100	37.7	G1/4	18.5	24	59	216
12	450-P63-50	237.5	251	G2	137.5	70	79.5	48	G1/4	22	24	51.8	216
13	450-P80-50	256	270.5	G2	137.5	70	100	48	G1/4	22	24	59	235.5

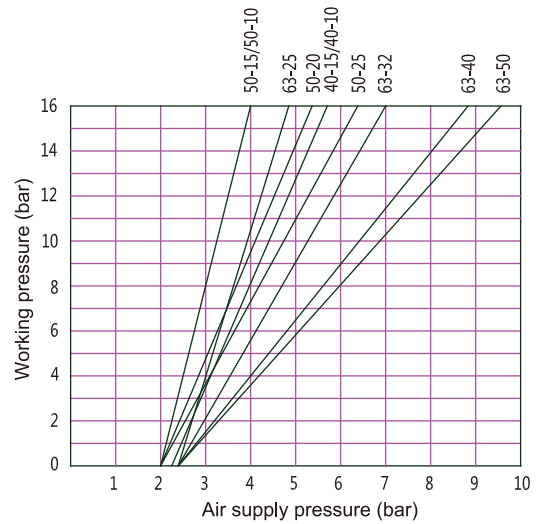
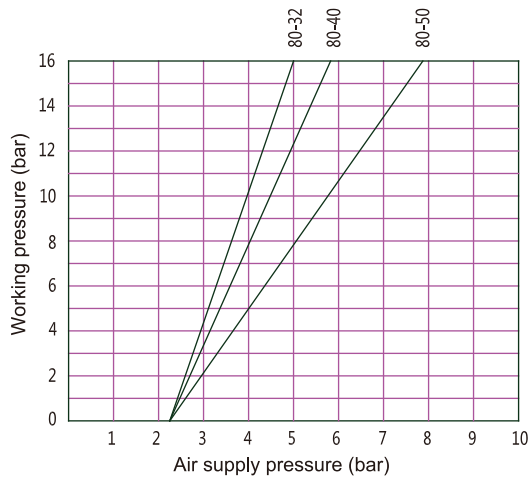
(1) Thread type with PT and NPT for option. Contact Coreline for request.

Working pressure / Air supply pressure

NC type(with water hammer) / Double acting type



NO type



NC		Double acting		NO	
Working P. [MPa]	Air supply P. [MPa]	Working P. [MPa]	Air supply P. [MPa]	Working P. [MPa]	Air supply P. [MPa]
0-1.6	0.3-0.45	0-1.6	0.3-0.45	0-1.6	≥0.3
0-1.6	0.3-0.35	0-1.6	0.3-0.35	0-1.6	≥0.3
0-1.6	0.3-0.45	0-1.6	0.3-0.45	0-1.6	≥0.3
0-1.6	0.3-0.35	0-1.6	0.3-0.35	0-1.6	≥0.3
0-1.6	0.3-0.4	0-1.6	0.3-0.4	0-1.2	≥0.3
0-1.6	0.3-0.45	0-1.6	0.3-0.45	0-0.3	≥0.3
0-1.6	0.3-0.35	0-1.6	0.3-0.35	0-1.6	≥0.45
0-1.6	0.3-0.55	0-1.6	0.3-0.55	0-1.4	≥0.45
0-1.6	0.3-0.65	0-1.6	0.3-0.65	0-1.4	≥0.45
0-0.9	0.3-0.7	0-0.9	0.3-0.7	0-0.6	≥0.45
0-1.6	0.25-0.45	0-1.6	0.25-0.45		
0-1.0	0.2-0.6	0-1.6	0.2-0.6		
0-1.6	0.2-0.4	0-1.6	0.2-0.4	0-1.2	≥0.45

Technical data

Flow capacity and sizing

Type	Orifice [mm]	Thread	Actuator size	Kv [m ³ /h]	Max. working pressure [bar]				* Min. air supply [bar]
					NC with water hammer	NO	Double acting	NC without water hammer	NC without water hammer
450-S(P)40-10	14	G3/8"	40	3.5	16	8	16	4.5	5
450-S(P)50-10	14	G3/8"	50	3.5	16	12	16	11	5
450-S(P)40-15	14	G1/2"	40	4	16	8	16	4.5	5
450-S(P)50-15	14	G1/2"	50	4	16	12	16	11	5
450-S(P)50-20	17.5	G3/4"	50	6	16	12	16	9	5
450-S(P)50-25	25	G1"	50	14	16	8	16	5	5
450-S(P)63-25	25	G1"	63	14	16	12	16	11	5.5
450-S(P)63-32	31	G1 1/4"	63	20	16	8	16	7	5.5
450-S(P)80-32	31	G1 1/4"	80	20	16	12	16	10	5
450-S(P)63-40	35	G1 1/2"	63	21	16	8	16	5	5.5
450-S(P)80-40	35	G1 1/2"	80	21	16	12	16	8	5
450-S(P)63-50	45	G2"	63	35	16	8	16	—	—
450-S(P)80-50	45	G2"	80	35	16	12	16	3.5	5
450-S80-65	58	G2 1/2"	80	58	14	8	14	—	—
450-S100-65	58	G2 1/2"	100	58	16	8	16	7	5.5

* Please find the minimum air supply pressure for NC with water hammer, NO and double acting type on the curve graph on previous page.

Electrical position feedback and installation guide

Electrical position feedback

Electrical position feedback, combined with a pneumatic valve, transfer position signal - open or closed - of the valve.

The position of the valve is given by light(s) and by electrical signal on the mechanical contact.

The duplication rod fitted with 2 cams in Fig.565 switch when the valve opens or closes. When the switch is activated, there is LED light and electrical signal is transmitted.



Usage and maintenance

1. Make sure the working conditions of the product is consistent with the technical data in this catalogue. Never use the product out of the specified range.
2. Maintenance, inspection and disassembly of this product are not allowed until the system has been cooled down and released from pressure.
3. Due to the pre-loaded spring pressure in the actuator for normally closed angle seat valve, during the disassembly of the valve, first make sure there is air supply to make sure the piston moving to the right position, then disassembly the valve body. Never directly disassemble the valve body which might result in failure of disassembly due to the threads deathly contacted with each other.
4. If the actuator needs maintenance, it should be disassembled with special tools under the guidance of professional technicians.

Coreline

The contents of this catalogue are confidential and proprietary to Coreline, we reserve the right to change the specifications without any notice.

CORELINE LTD.

Add: No.4 Wangjiang Road, Muqiao Town, Zhengpugang New District, 238200 Hexian, Ma'anshan City, Anhui Province, China

Http: // www.coreline.dk

E-mail : mail@coreline.cn