

14 Aseptic Control Valve RA



INFORMATION

Flow control is a major aspect in aseptic processes of beverage production. Durable, high-grade valves are needed for typical operations such as redirection, shutting off of product flows and tank discharge. To adjust processes exactly and fast, reliable aseptic control valves are necessary.

The aseptic control valve was developed in a similar way to the EVOGUARD aseptic seat valve. Therefore, EVOGUARD provides suitable components for all aseptic applications. Furthermore, a high service life and ease of replacement are very important for the decision of the valve technology.

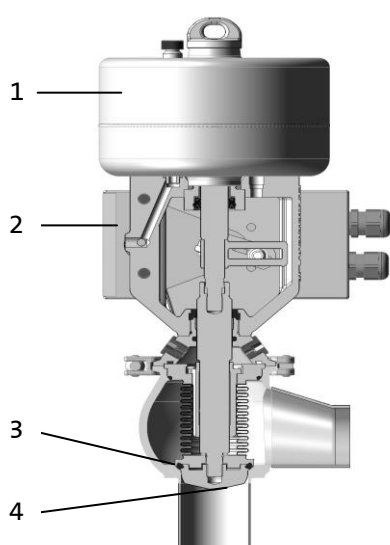
EVOGUARD control valves are designed to deliver high performance during day-to-day operation.

To cover a lot of control processes, the equal percentage cone is standard. The allocation of the control valve results from nominal diameter, KV value and seat diameter.

The metal stop on the valve disk and the positioning of the seal prevent excessive stress on the seal. Optimal compliance with hygienic design is another outstanding feature of the valves.

Design features of modular aseptic control valves

- The housing resists highest pressures of operating pressure of PN25. The execution and the optimized geometry, which is according to the specification of EHEDG, ensure high reliability in the production process.
- The metal bellows provides for hermetic sealing of the product space from the atmosphere. Its multilayer design and optimised guidance by means of a support element result in prolonged service life and prevent the bellows from being overloaded during dismantling.
- The valve disk has a flow-efficient design. It is possible to choose between a single-piece version with a seal made of PTFE compound and a two-piece threaded version with a seal made of EPDM/FDA or FKM HF.
- Actuator size matched to product pressure
- Allocation according to nominal diameter, KV value and seat diameter



1. Diaphragm actuator
2. Positioner
3. Metal stop
4. Two-piece valve disk, threaded



Two-piece valve disk,
threaded,
EPDM/FDA
or FKM HF seal



One-piece
valve disk,
PTFE Compound
seal

Seat Ø	Value		Stroke 20			Stroke 30		
	Kvs m3/h	Cvs USgal/min	DN25	DN40	DN50	DN65	DN80	DN100
10	0,63	0,73	x					
	1	1,16						
	1,6	1,86						
	2,5	2,9						
19	4	4,64	x	x				
	6,3	7,31						
26	10	11,6	x	x				
38	16	18,56		x	x	x		
	25	29						
50	32	37,12			x	x	x	
	40	46,4						
66	63	73,1				x	x	
81	100	116					x	x
100	160	185,6						x

TECHNICAL DATA

Pressures

Product pressure	PN 87 psi (6 bar), 145 psi (10 bar) / vacuum -13.8 psi (-0.95 bar)
Housing	PN 360 psi (25 bar)
Control air pressure	min. 87 psi (6 bar) - max. 115 psi (8 bar)

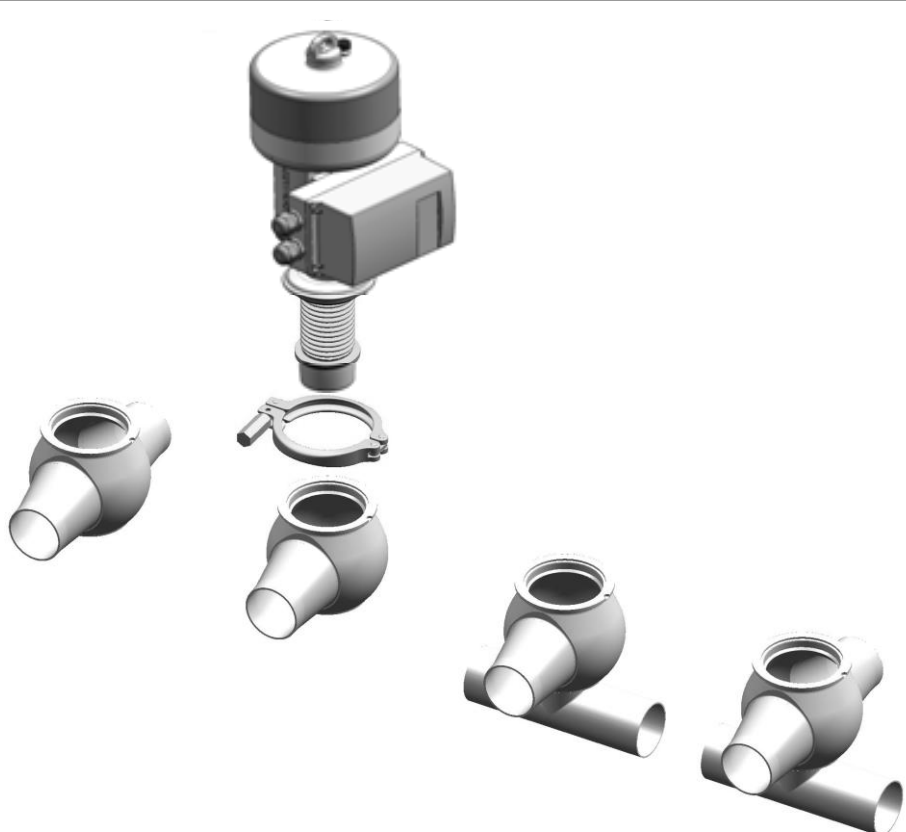
Material

With product contact	1.4404 / AISI 316L
Without product contact	1.4301
Seal	EPDM / FDA, FKM HF PTFE Compound

Surface

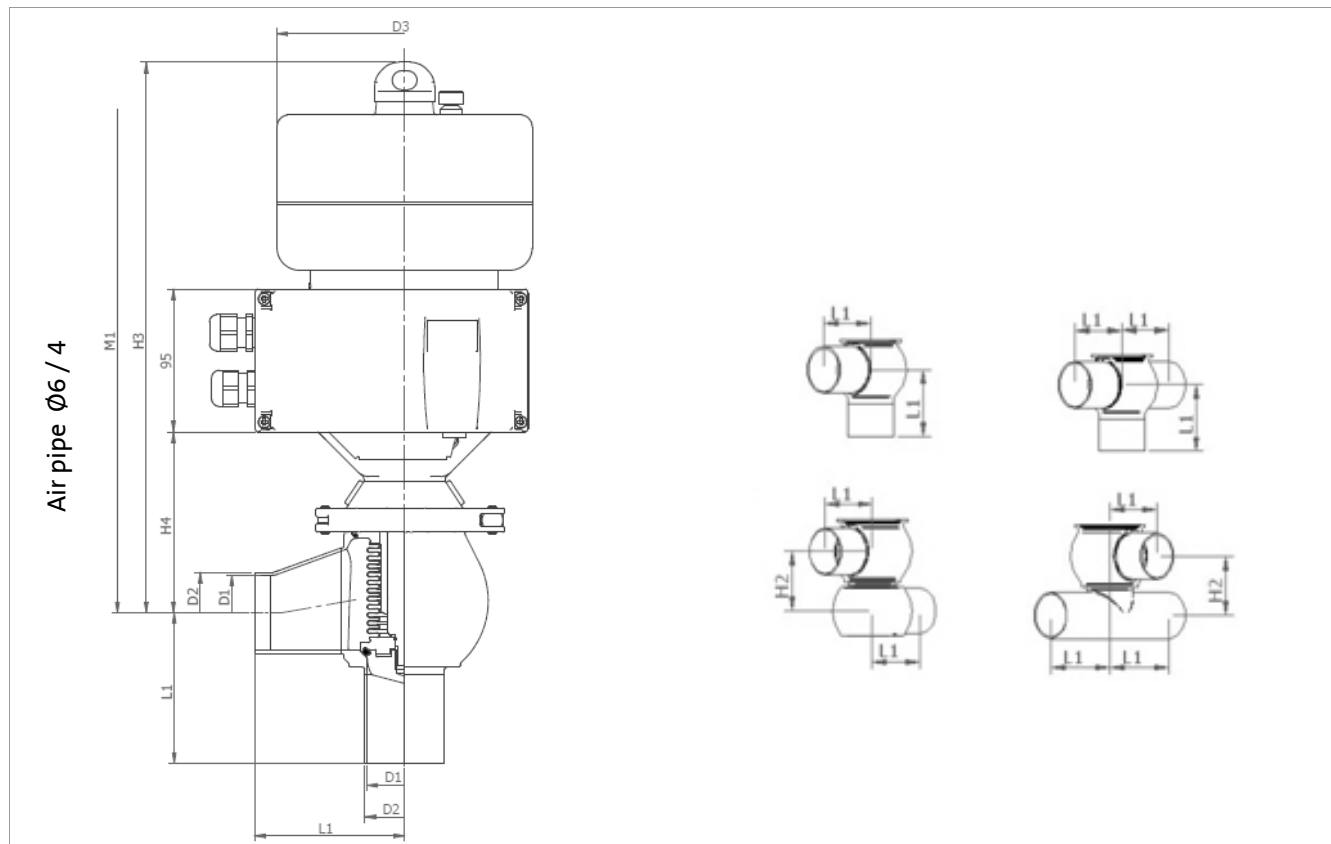
With product contact	Ra ≤ 0.8 μ
Without product contact	Ra ≤ 1.6 μ

Designs

Housing versions	
Actuator	Pneumatic diaphragm actuator NC / NO
Additional equipment	Positioner set value 4 – 20 mA

According to legal requirements
EU Pressure Equipment Directive 2014/68/EU
EU Machinery Directive 2006/42/EC
Design check by TÜV Süd

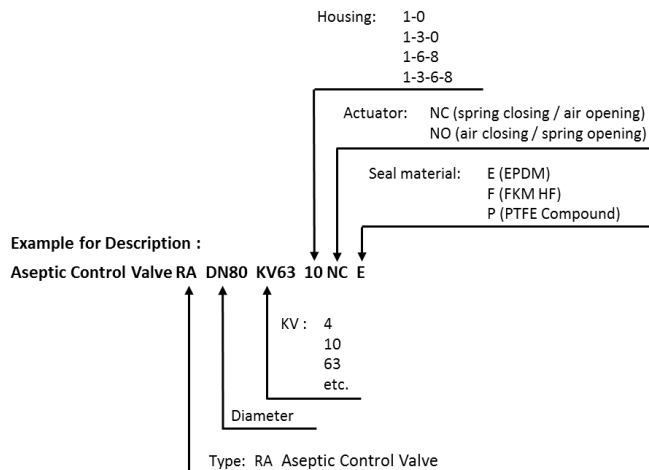


ASEPTIC CONTROL VALVE RA

Dimensions

DN	ØD1 mm	ØD2 mm	ØD3 mm	L1 mm	H1 mm	H2 mm	H3 mm	H4 mm	M1 mm
25	26	29	170	70			350	88	440
40	38	41	170	90			355	103	465
50	50	53	170	100			366	109	495
65	66	70	170	100			373	117	515
80	81	85	270	125			390	125	560
100	100	104	270	155			410	138	615
125									
150									

Weight

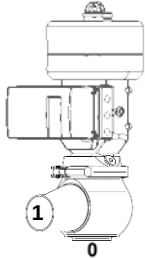
DN	1-0 kg	1-3-0 kg	1-6-8 kg	1-3-6-8 kg
25	13,5			
40	15,1			
50	15,3			
65	17,5			
80	20,3			
100	45,5			
125				
150				



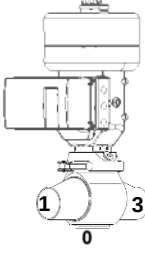
ASEPTIC CONTROL VALVE RA PRODUCT PRESSURE 6 BAR

KV value max. corresponding to nominal diameter, positioner Siemens Sipart PS2

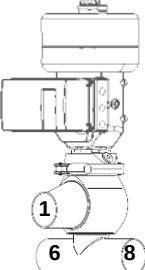
1-0
1.4404 / AISI 316L

	DN	- EPDM	- FKM HF	- PTFE Compound
		Material no.	Material no.	Material no.
25				
40				
50				
65		0903786295		
80				
100				
125				
150				

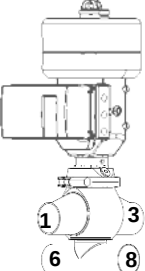
1-3-0
1.4404 / AISI 316L

	DN	- EPDM	- FKM HF	- PTFE Compound
		Material no.	Material no.	Material no.
25				
40				
50				
65				
80		0903067738		
100				
125				
150				

1-6-8
1.4404 / AISI 316L

	DN	- EPDM	- FKM HF	- PTFE Compound
		Material no.	Material no.	Material no.
25				
40				
50				
65				
80				
100				
125				
150				

1-3-6-8
1.4404 / AISI 316L

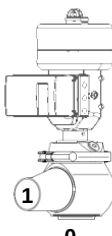
	DN	- EPDM	- FKM HF	- PTFE Compound
		Material no.	Material no.	Material no.
25				
40				
50				
65				
80				
100				
125				
150				

Further types available upon request

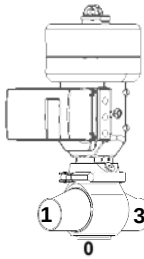
ASEPTIC CONTROL VALVE RA PRODUCT PRESSURE 10 BAR

KV value max. corresponding to nominal diameter, positioner Siemens Sipart PS2

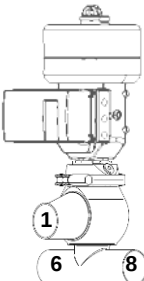
1-0
1.4404 / AISI 316L

	DN	- EPDM	- FKM HF	- PTFE Compound
		Material no.	Material no.	Material no.
25				
40				
50				
65				
80				
100				
125				
150				

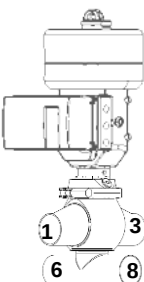
1-3-0
1.4404 / AISI 316L

	DN	- EPDM	- FKM HF	- PTFE Compound
		Material no.	Material no.	Material no.
25				
40				
50				
65				
80				
100				
125				
150				

1-6-8
1.4404 / AISI 316L

	DN	- EPDM	- FKM HF	- PTFE Compound
		Material no.	Material no.	Material no.
25				
40				
50				
65				
80				
100				
125				
150				

1-3-6-8
1.4404 / AISI 316L

	DN	- EPDM	- FKM HF	- PTFE Compound
		Material no.	Material no.	Material no.
25				
40				
50				
65				
80				
100				
125				
150				

Further types available upon request

SPARE PARTS ASEPTIC CONTROL VALVE RA

Seal kit with product contact up to KV 10

DN	EPDM	FKM HF	PTFE Compound
	Material no.	Material no.	Material no.
25	0903426051	0903867262	0903867221
40	0903426052	0903867264	0903426082
50			
65			
80			
100			
125			
150			

Seal kit with product contact KV 16 to KV 40

DN	EPDM	FKM HF	PTFE Compound
	Material no.	Material no.	Material no.
25			
40	0903426052	0903867264	0903426082
50	0903426052	0903867264	0903426082
65	0903426053	0903867265	0903426083
80	0903426055	0903867287	0903867225
100			
125			
150			

Seal kit with product contact KV 63

DN	EPDM	FKM HF	PTFE Compound
	Material no.	Material no.	Material no.
25			
40			
50			
65	0903426056	0903867282	0903867222
80	0903426055	0903867287	0903867225
100	0903426059	0903867289	0903867228
125			
150			

Seal kit with product contact KV 100

DN	EPDM	FKM HF	PTFE Compound
	Material no.	Material no.	Material no.
25			
40			
50			
65			
80	0903426058	0903867288	0903867226
100	0903426059	0903867289	0903867228
125			
150			

Seal kit with product contact KV 160

	DN	EPDM	FKM HF	PTFE Compound
		Material no.	Material no.	Material no.
	25			
	40			
	50			
	65			
	80			
	100	0903426080	0903867310	0903867261
	125			
	150			

Bellow, elastomer seal

	DN	Material no.
	25	0902567648
	40	0902567649
	50	0902567780
	65 bis KV40	0902875167
	65 KV63	0902567781
	80 bis KV63	0902876012
	80 KV100	0902567782
	100 bis KV100	0902883454
	100 KV160	0902567783
	125	
	150	

Bellow, PTFE Compound seal shrunk-on

	DN	Material no.
	25	
	40	
	50 KV25	0903420577
	50 KV40	0903420575
	65 KV40	0903420573
	80 KV100	0904023423
	100 KV63	0904202599
	100 KV100	0904124966
	125	
	150	

Diaphragm for diaphragm actuator

	TYPE	NBR
	813	Material no.
	MF I	0904201142
	MF III	0904201144

Sealing and bearing set for diaphragm actuator

	TYPE	NBR
	813	Material no.
	MF I	0904202629
	MF III	0904202289

Positioner without mounting parts

	DN	Material no.
	Siemens Sipart PS2	0902798583
	Siemens Sipart PS 2 HART	0903626760

