baelz 344

DESCRIPTION

The baelz 344 is an industrial 2-way control valve. The stainless steel housing allows utilization under demanding operating conditions.

TECHNICAL SPECIFICATIONS

Connection type: Flange EN 1092-2; EN 1092-1 Shapes D / E / F on request.

Plug type: parabolic plug / conical

Control characteristic: equal percentage, linear, OPEN / CLOSED

Working fluids: liquids, water, thermal oil, steam, gases

Leakage class (EN 1349)
metal-to-metal seal: 0.004% Kvs (better than class IV)
with PTFE plug: 0.001% Kvs (better than class VI)

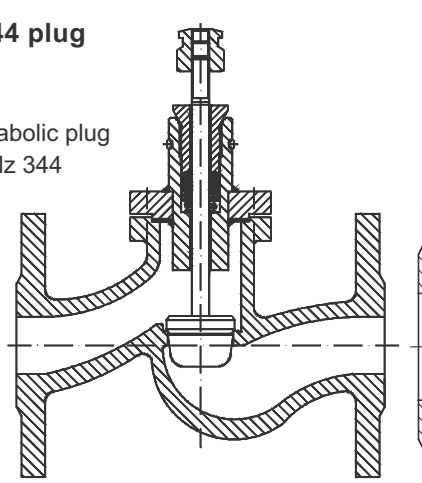
Stroke (mm)		Spindle Ø (mm)
DN 65	22	10
DN 80	22	10
DN 100, DN 125	22	16
DN 150	44	22

Options		Designation
Plug	Parabolic plug (standard)	baelz 344...
Spindle seal	V-rings in PFTE standard	baelz 344...
	Cooling tube	MP344-K
	Cooling tube + double-walled stainless steel bellows seal	MP344-SS...
Additional options	V-shaped seal heating (for fluids at temperatures of - 10 to - 40°C) Pmax. 20 W; 12-24 V / 110-230 V AC/DC	baelz 85950...
	Version for drinking water	MP344-Twg

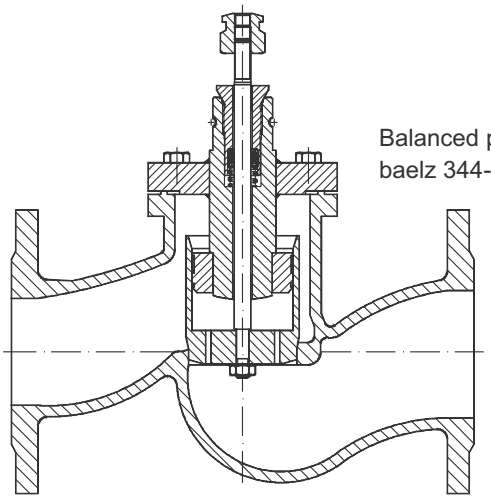
T max. (°C) / P max. (bar)		
Housing material	**Stainless steel 1.4408** (internal parts in contact with working fluid 1.4571)	
Nominal pressure	**PN 16**	**PN 25/40**
baelz 344	240/12.8 … 100/16	240/32.1 … 100/40
baelz 344-EMF		
baelz 344-K	350/11.4 … 100/16	350/28.5 … 100/40
baelz 344-K-SS	350/11.4 … 100/16	350/25 … 100/40

Sectional drawings of the baelz 344 plug

Parabolic plug
baelz 344



Balanced plug
baelz 344-EMF



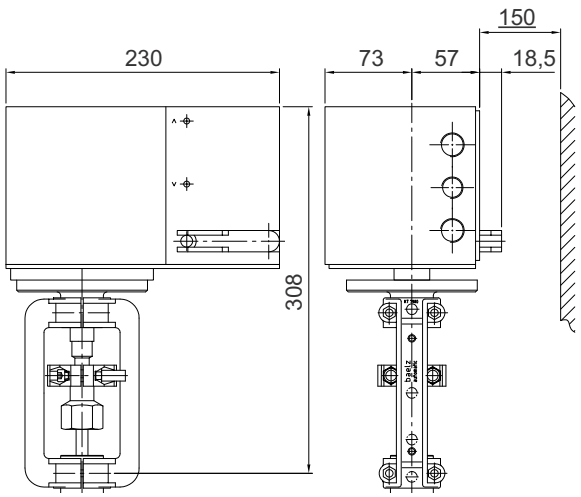
Kvs value (m³/h)					
DN	**65**	**80**	**100**	**125**	**150**
Standard	-	100	130	200	360
Balanced (EMF)	63				
Cage plug (LK)	on request				

Approximate weights of the baelz 344 valves (kg)					
DN	**65**	**80**	**100**	**125**	**150**
PN 16	28.4	28.7	39	57	90
PN 25/40	28.4	29.7	41	60	93

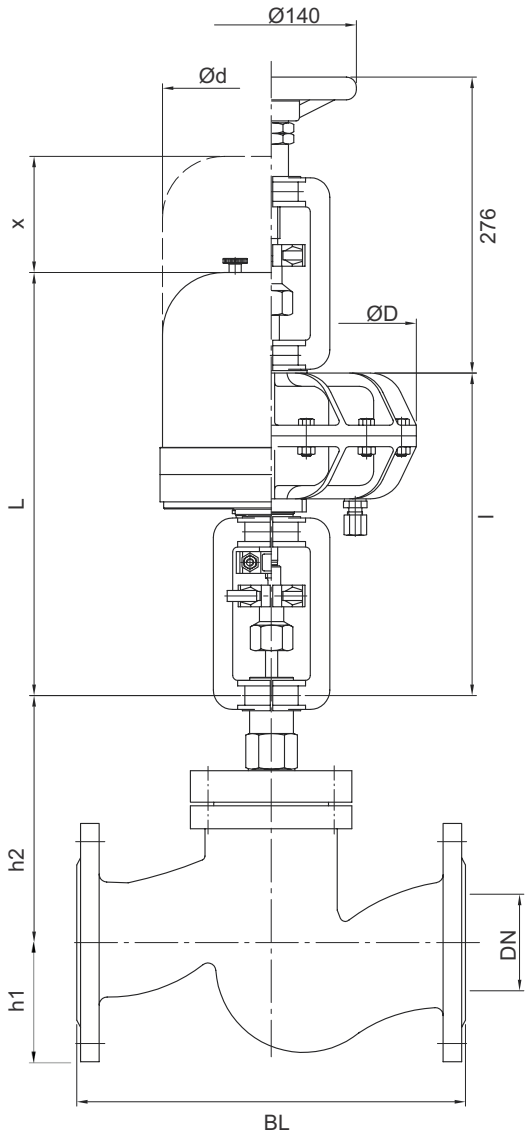
Dimensions of the baelz 344 valves (mm)			
DN	**BL**	**h1**	**h2**
80	310	154	189
100	350	169	208
125	400	189	227
150	480	194	261

Dimensions of the baelz 373 actuators (mm)					
Designation	**L**	**x**	**Ød**	**l**	**ØD**
E07	320	145	129		
E07-OSX	354	145	129		
E45	560	150	175		
E65	see dimensional drawing below				
P11				244	160
P21				268	242
P21-V6				304	242
P22				322	242

Electric actuators: baelz 373-E
Pneumatic actuators: baelz 373-P



Dimensions of the baelz 373-E65 actuator



baelz 344 dimensions

Maximum differential pressure ΔPmax (bar) at which the actuator closes the valve completely
The differential pressures specified here are limited by the nominal pressure of the housings, if this is lower.

Electric actuators. Plug closes against the flow.

Actuator baelz 373-	Power (N)	DN (mm) / maximum differential pressure ΔPmax (bar)													
		15	20	25	32	40	50	65	80	100	125	150	200	250	300
E07- OSX-	700	14	14	10	5	2.5	1.2	0.3							
E07- 20-	2000	40	40	32	20	12	8	4.8	3	2	1.2				
E65- 11-	1100	25	25	21	11	6.3	3.5	1.7	0.9	0.3					
E65- 20-	2000	40	40	32	20	12	8	4.8	3	2	1.2				
E45- 40-	4000	40	40	40	40	25	16	10	6.9	4.4	2.8	1.7			
E66- 80-	8000											3.1	1.6	0.9	
E66- 150-	15000											7.1	3.8	2.3	1.5
E88- 100-	10000							28	18	11	7.4	5	2.7	1.7	1.1
E88- 100-	13000							37	24	15	9.8	6.7	3.7	2.3	1.5
E88- 100-	16000							40	30	19	12	8.4	4.6	2.9	2
E88- 300-	30000											15.3	9	5.8	3.9
E88- 300-	35000											18.9	10.5	6.7	4.6
E88- 300-	40000											21.7	12.1	7.7	5.3

Pneumatic actuators (OPG) closed without compressed air. Plug closes against the flow.

Actuator baelz 373-	Power (N)	req. feed pressure (bar)	DN (mm) / maximum differential pressure ΔPmax (bar)												
			15	20	25	32	40	50	65	80	100	125	150	200	250	300
P11- 1	950	3.0	39.5	18.2	13.6	8.1	4.3	2.4	1.1	0.5						
P21- 3	1020	1.2	29	29	16	9.9	6.3	4.6	2.7	1.8	1	0.6				
P21- 6	2040	3.0	40	40	35	21	13.5	8.9	5.2	3.4	2.2	1.4				
P21- 12	3390	6.0	40	40	40	36	23	14	8	5	3.5	2.1				
P21- 18	4030	6.0	40	40	40	40	27	18	10	7	4.5	2.8				
P21- V6	7590	6.0	40	40	40	40	40	34	20	13	8	5				
P22- 3	1846	3.0	40	40	34.5	18.8	11	6.5	3.4	2	1.1	0.5				
P22- 6	3692	6.0	40	40	40	40	25.2	15.3	8.5	5.3	3.2	1.9				
P31- 3	2480	1.2											1.1			
P31- 6	4960	3.0											2.4			
P31- 18	10560	6.0											5.3			
P32- 6	4402	3.0												0.8		
P32- 18	8115	6.0												1.8		
P41- 3	3765	1.2											2.4	1	0.6	0.4
P41- 6	7530	3.0											5	2	1.3	0.9
P41- V6	31920	6.0											21	10.5	6.5	4.5

Pneumatic actuators (OPO) open without compressed air. Plug closes against the flow.

Actuator baelz 373-	Power (N)	req. feed pressure (bar)	DN (mm) / maximum differential pressure ΔPmax (bar)												
			15	20	25	32	40	50	65	80	100	125	150	200	250	300
P11- 1	2111	6.0	40	40	40	29.2	17	10.5	5.8	3.7						
P21- 3	1020	1.2	7	7	4.5	2.8	1.8	1.1	0.6	0.4						
		3.0	40	40	40	40	31	19	12	8	5	3				
		6.0	40	40	40	40	40	40	30	20	12	8				
P21- 6	2040	3.0	40	40	35	21	14	8	5.3	3.5	2.2	1.4				
		6.0	40	40	40	40	40	39	24	16	10	6				
P31- 3	2480	1.2											0.6			
		3.0											6			
		6.0											14.8			
P31- 6	4960	3.0											3			
		6.0											12			
P41- 3	3765	1.2											1.2	0.7	0.4	0.3
		3.0											12	6.8	4.3	3
		6.0											30	17	11	7.5
P41- 6	7530	3.0												5	3	2
		6.0												15	10	6