

# Stop Valve 8040

GS 3 series, DN 15 up to DN 200



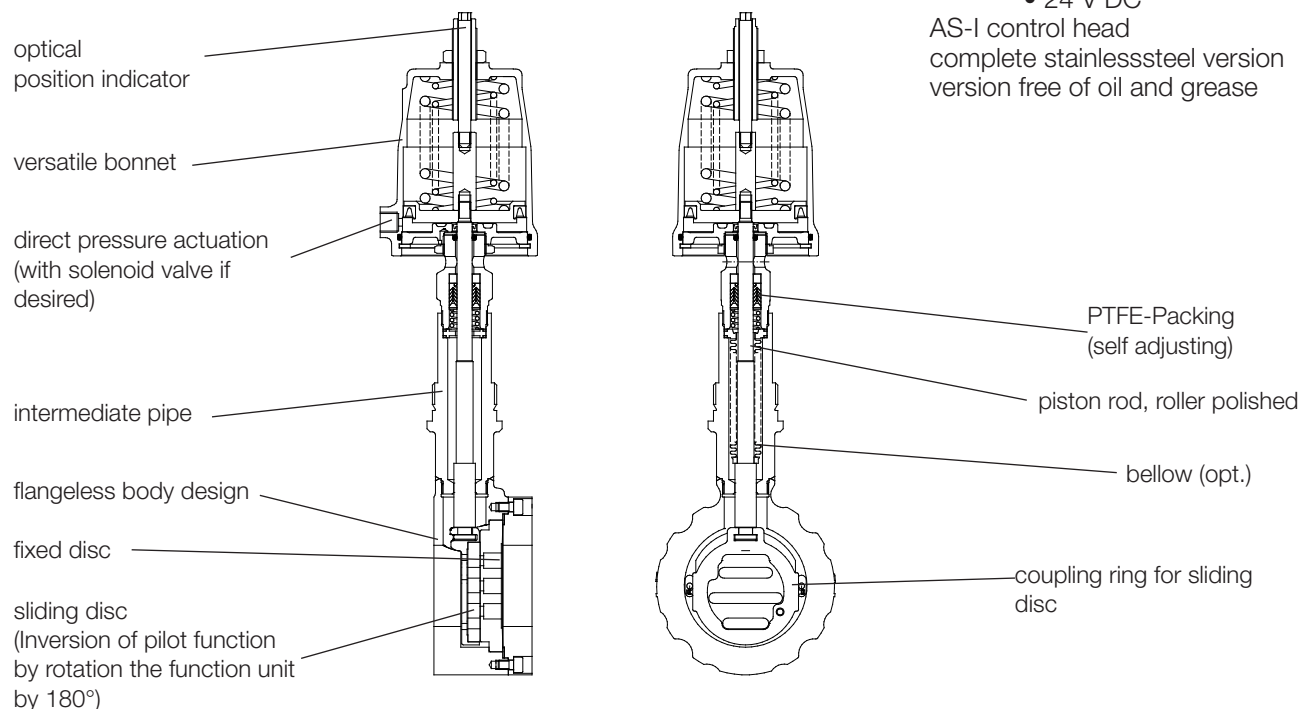
**Pneumatic piston operated stop valve for switching of neutral through to highly aggressive media in process engineering, chemical industry and for plant equipment.**

- Space saving wafer-type construction
- Lowest possible weight (especially in larger sizes)
- Low operation noise level
- Control of high differential pressures with small actuators
- Greatly reduced energy consumption rates due to short strokes and low actuating force
- High Kvs-values

## Technical Information

Design	flangeless, wafer-type construction further versions see data sheet 8040/41-GS1		
Nominal size	DN 15 up to DN 200		
Nominal pressure acc. DIN 2401 for flanges with facing type B	PN 40 (fits also to PN 10-25)	DN 15 - DN 150	
	PN 16	DN 200	
Nominal pressure acc. ANSI for flanges acc. ASME B16.5 RF	ANSI 150	DN 15 - DN 200	
	ANSI 300	DN 15 - DN 150	
Nominal pressure acc. JIS for "raiced face" flanges	10K	DN 15 - DN 50	
	20K	DN 15 - DN 40	
Media temperature	carbon steel body	-10°C up to +300°C	
	stainless steel body	-60°C up to +350°C (+300°C for SFC)	
Ambient temperature	-20°C up to +100°C		
Pilot pressure	maximum 10 bar (higher on demand)		
Leakage (% of Kvs)	disc pair	disc pair	disc pair
	carbon-stainless steel < 0,0001	SFC < 0,0005	STN 2 < 0,001

Kvs-values see data sheet 8001.



## Options

- stainless steel bellows
- electrical position indicator
  - inductive switches
  - contact switches
  - manual operation
- pilot valve
  - 230 V AC
  - 24 V DC

AS-I control head  
complete stainlesssteel version  
version free of oil and grease

**Admissible differential pressures**  
(For temperatures of up to 120°C)

**For temperatures of 120°C and above: obey application limits !**

		Disc pair carbon/SFC - stainless steel	
DN	actuator	max. working pressure (bar)	required pilot pressure (bar)
15	50	33	3,8
20	50	28	3,8
25	50	24	3,8
32	50	19	3,9
40	50	15	4,2
50	50	9	4,8
65	50	8	5
80	50	5	5,3
100	50	3	5,5
125	50	2	5,6
150	50	1,5	5,6

		STN2-disc pair	
DN	actuator	max. working pressure (bar)	required pilot pressure (bar)
15	50	23	3,8
20	50	18	4
25	50	13	4,4
32	50	10	4,7
40	50	6,5	4,9
50	50	4	5,4
65	50	3	5,4
80	50	2	5,5
100	50	1	5,6
125	50	--	--
150	50	--	--

15	80	40	3,1
20	80	40	3,1
25	80	40	3,1
32	80	40	3,2
40	80	40	3,6
50	80	26	4,1
65	80	22	4,3
80	80	14	4,5
100	80	9	4,7
125	80	6	4,8
150	80	4	4,9
200	80	2,5	4,9

15	80	40	3,1
20	80	40	3,3
25	80	36	3,7
32	80	27	4
40	80	18	4,3
50	80	11	4,6
65	80	9	4,7
80	80	5	4,8
100	80	3	4,9
125	80	2	4,9
150	80	1,5	5
200	80	-	-

15	125	40	1,8
20	125	40	1,8
25	125	40	1,8
32	125	40	1,8
40	125	40	2,1
50	125	38	2,4
65	125	32	2,5
80	125	20	2,6
100	125	13	2,7
125	125	8,5	2,8
150	125	6,5	2,8
200	125	3,5	2,9

15	125	40	1,8
20	125	40	1,9
25	125	40	2,1
32	125	39	2,3
40	125	27	2,5
50	125	16	2,7
65	125	13	2,7
80	125	8	2,8
100	125	5	2,8
125	125	3	2,8
150	125	2	2,8
200	125	-	-

	Upper limits for admissible pressures in bar					
	PN16	PN40	PN100	ANSI 150	ANSI 300	ANSI 600
P max.	16	40	100	16	40	80



## Application limitations for GS3 valves in stainless steel

These pressure must not be exceeded for GS-valves from the GS3-series made of stainless steel, even though the actuator power might allow it.

### PN 40

DN	Sliding unit: carbon/SFC - stainless steel, coated max. admissible diff. pressures for GS3-valves						Sliding unit: carbon - STN2 max. admissible diff. pressures for GS3-valves					
	100°C	150°C	200°C	250°C	300°C	350°C	100°C	150°C	200°C	250°C	300°C	350°C
15 - 65	40	38	34	32	31	29	40	38	34	32	31	29
80	40	38	34	32	31	29	36	34	33	26	22	19
100	33	31	29	27	25	24	33	31	26	24	20	17
125	23	21	20	19	18	17	22	21	17	16	13	11
150	16	15	14	13	12	12	16	15	13	11	9	8
200 (PN16 only)	16	15	14	13	12	11,0	-	-	-	-	-	-
250 (PN16 only)	10,5	10	9,5	8,4	7,4	6,9	-	-	-	-	-	-

Limitation for SFC-sliding discs: 300°C

### ANSI #150

DN	Sliding unit: carbon/SFC - stainless steel, coated max. admissible diff. pressures for GS3-valves						Sliding unit: carbon - STN2 max. admissible diff. pressures for GS3-valves					
	100°C	150°C	200°C	250°C	300°C	350°C	100°C	150°C	200°C	250°C	300°C	350°C
15 - 125	16	15	13	12	10	8	16	15	13	12	10	8
150	16	15	13	12	10	8	16	15	13	11	9,5	8
200	16	15	13	12	10	8	-	-	-	-	-	-
250	10,5	10	9,5	8,4	7,4	6,9	-	-	-	-	-	-

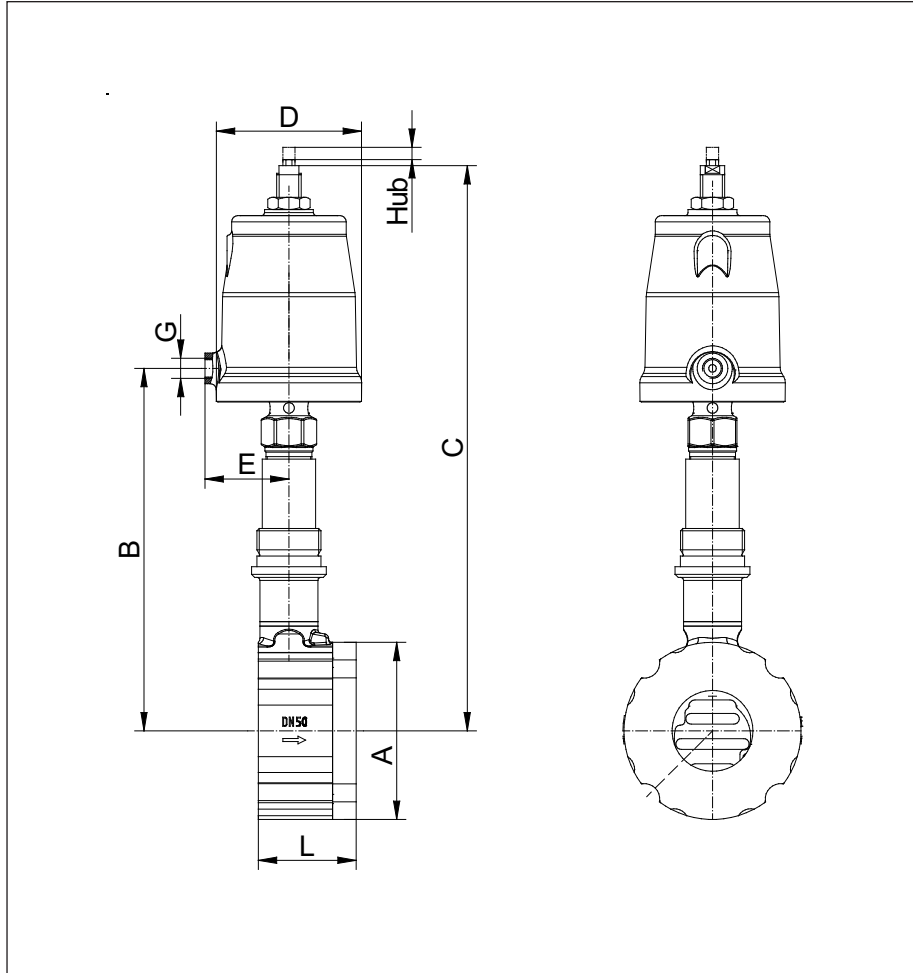
Limitation for SFC-sliding discs: 300°C

### ANSI #300

DN	Sliding unit: carbon/SFC - stainless steel, coated max. admissible pressures in bar for GS3-valves						Sliding unit: STN2 max. admissible pressures for GS3-valves					
	100°C	150°C	200°C	250°C	300°C	350°C	100°C	150°C	200°C	250°C	300°C	350°C
15 - 65	40	38	35	33	31	30	40	38	35	32	31	29
80	40	38	35	33	31	30	36	34	33	26	22	19
100	33	31	29	27	25	24	33	31	26	24	20	17
125	23	21	20	19	18	17	22	21	17	16	13	11
150	16	15	14	13	12	12	16	15	13	11	9	8

Limitation for SFC-sliding discs: 300°C

## Dimensions and Weights



DN	A	B actuator			C max actuator			L	Weight kg actuator			Stroke H
		50	80	125	50	80	125		50	80	125	
15	64	209	213	215	306	344	362	56	3,4	5,6	7	6
20	72	213	217	219	310	348	366	56	3,6	5,8	7,2	6
25	82	218	222	224	315	353	371	56	3,9	6,1	7,5	6
32	89	220	224	226	317	355	373	56	4,1	6,3	7,7	6
40	99	226	230	232	323	361	379	56	4,4	6,6	8	6
50	116	234	238	240	333	371	389	64	5,9	8,1	9,5	8
65	138	243	247	249	342	380	398	68	7,4	9,6	11	8
80	153	252	256	258	351	389	407	70	8,6	11	12	8
100	184	265	269	271	364	402	420	75	12	14	15	8,5
125	212	279	283	285	378	416	434	80	14	16	18	8,5
150	242	292	296	298	391	429	447	80	18	20	22	8,5
200	302	320	324	326	419	457	475	93	35	37	38	8,5

Dimension C „reduced design“ shortened by 25,4 mm      Dimensions in mm

Actuator mm	D	G	E
50	62	1/8"	34,5
80	96	1/4"	55
125	146	1/4"	80

Dimensions in mm