

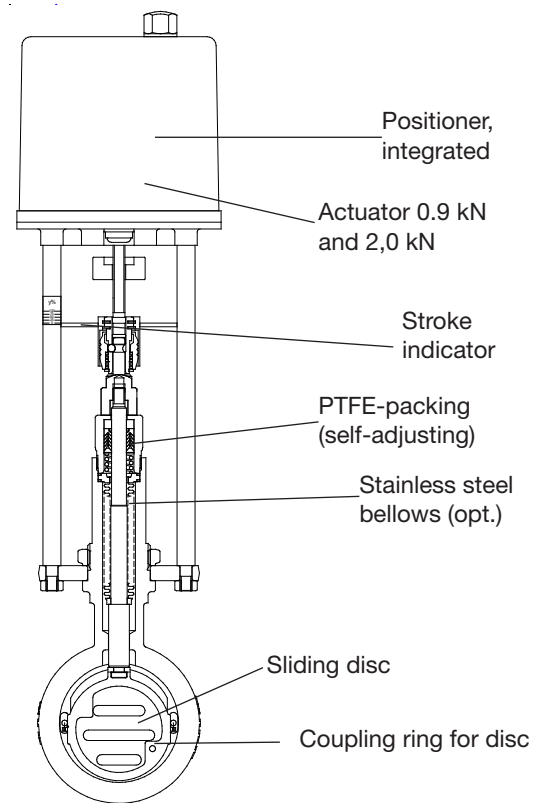
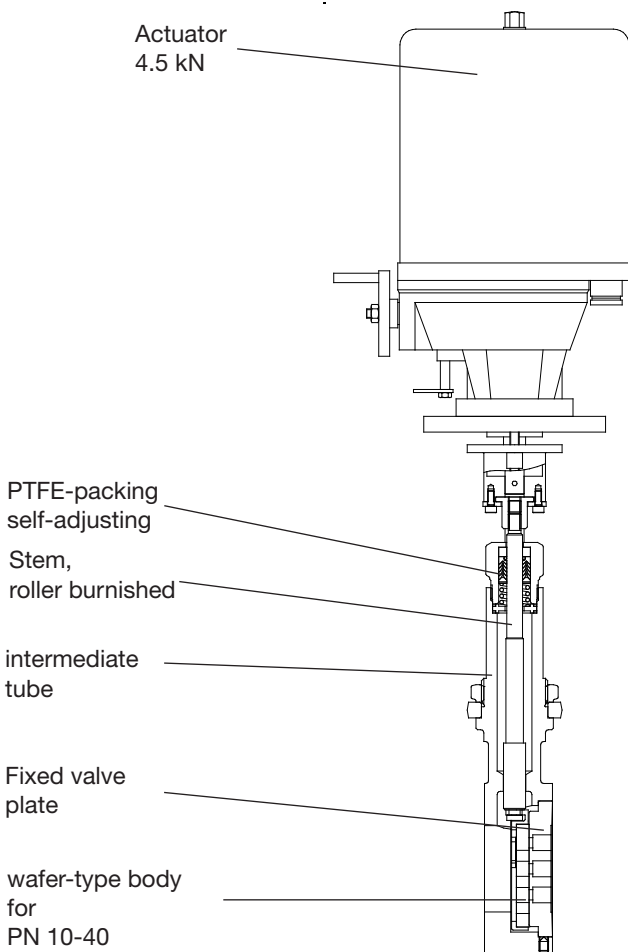
Sliding Gate Motor Valve 8030



GS 1 series, DN 15 up to DN 150

Sliding gate motor valve for control and switching of neutral through to highly aggressive media in process engineering, chemical industries and for plant equipment.

- Space saving wafer type construction
- Lowest possible weight (especially in larger sizes)
- Low operation noise level (quiet operation)
- Control of high differential pressures with small actuators
- Fast response time
- Fail safe option
- Meets the requirements of TA-Luft 2021



Technical information

| | | | |
|---------------------------------------|---|-----------------------|-------------------|
| Body material | Flangeless, wafer type construction Dimensions acc. DIN EN 558-1 series 20 For flanges acc. DIN EN 1092-1 form B More versions see data-sheet 8030-GS3 | | |
| Nominal sizes | DN 15 up to DN 150 | | |
| Nominal pressure | PN 40 acc. DIN 2401 also for flanges PN 10 up to PN 25 | | |
| Fluid temperature | Carbon steel body: -10°C up to +350°C Stainless steel body: -60°C up to +350°C (+300°C for SFC) | | |
| Flange gaskets (customer side) | DIN EN 1514-1 or ANSI B16.21 in the respective nominal pressure rating | | |
| Rangeability | 30 : 1 | | |
| Leakage | Disc Pair Carbon-stainless steel | Disc Pair SFC | Disc Pair STN2 |
| % of Kvs IEC 60534-4 EN 12266-1 | <0,0001 IV-S1 E | <0,0005 IV-S1 F | <0,001 IV F |
| Packing leakage | ISO FE - BH - CC3 - SSA0 - t (-40°C / +350 °C) - PN40 - ISO 15848-1 | | |

* With DN15 with reduction of less than 25%, different leakage rates possible.
K_{vs}-values see data sheet 8001.

Technical information of the motor actuator

| | |
|-----------------------------------|---|
| Driving force | 0.9 kN; 2 kN; 4.5 kN |
| Type of duty (according VDE 0530) | S 1 - 100 % ED (0,9kN; 2kN; 4,5kN DC) S 4 - 30 % ED (0.45 kN; 0.9 kN; 2 kN) S 4 - 30 % ED 600c/h (4.5 kN) |
| Power connections | 24 V AC 24 V DC 110/120V AC 230 V AC 400 V 3-phase-AC other on request |
| Ambient temperature | 0°C up to +60°C; - 20°C up to + 60°C with heating resistor element |
| Mounting position | free choice, but motor not vertical down |
| Protection class (Din 40050) | IP 65 (0,9 kN; 2 kN; 4.5 kN) |

Materials

| | | |
|-------------------------|-------------------------------------|------------------------|
| Body | Carbon steel 1.0619 | Stainless steel 1.4408 |
| Packing | PTFE (carbon filled), spring 1.4310 | |
| Actuating stem | Stainless steel, roller burnished | |
| Bellow | Stainless steel 1.4571 | |
| Fixed plate | Stainless steel 1.4571, plated | STN2-disc |
| Sliding disc | Standard: special carbon material | SFC-disc STN2-disc |
| Coupling ring for discs | Stainless steel 1.4581 | |

Stroking times (sec.):

| | 0,9 kN | 2,0 kN | 4,5 kN |
|-----------------------|--------|--------|--------|
| Stroking speed mm/min | 10 | 9,2 | 24 |
| DN 15 - 40 | 36 | 28 | 15 |
| DN 50 - 80 | 47 | 38 | 20 |
| DN 100 - 150 | 50 | 40 | 21 |

Power consumption (Watt):

| | | | |
|-----------------|----|-----|-------|
| 24 VAC, 230 VAC | 5 | 6,6 | 40/28 |
| 24 VDC | 10 | 20 | 30 |
| 400 V, 50 Hz | 10 | 10 | 35 |
| 110/120 V AC | 5 | 6,6 | 28 |

Options

| | | | |
|----------------------|--------|--------|---------|
| Limit switches | max. 2 | max. 2 | max. 2 |
| Potentiometer | 1 | 1 | max. 2* |
| Positioner, analogue | yes | yes | yes |

* one potentiometer is required for positioner option

Optional stroking times

| | | | | | | | | |
|------------------------|-----------------------|----|-----|-----|------|-----|-----|------|
| Driving force (kN) | 0,9 | | | | 2 | | 4,5 | |
| Stroking speed mm/min. | 13,5 | 8 | 5,1 | 2,9 | 15,2 | 7,5 | 5,6 | 50 |
| Nominal size | Stroking times (sec.) | | | | | | | |
| DN 15 - 40 | 28 | 47 | 74 | 129 | 25 | 50 | 67 | 7,5 |
| DN 50 - 80 | 37 | 62 | 97 | 171 | 33 | 66 | 88 | 9,9 |
| DN 100-150 | 39 | 66 | 103 | 181 | 35 | 70 | 94 | 10,5 |

Maximum Differential Pressures

| DN | 0,9 kN | | | 2,0 kN | | | 4,5 kN | | |
|-----|----------------------------|----|----|--------|-----|-----|--------|----|----|
| | carbon/SFC-stainless steel | | | STN2 | | | | | |
| 15 | 40 | 40 | 40 | 40 | 40 | 40 | 40 | 40 | 40 |
| 20 | 40 | 40 | 40 | 40 | 40 | 40 | 40 | 40 | 40 |
| 25 | 40 | 40 | 40 | 40 | 32 | 40 | 40 | 40 | 40 |
| 32 | 40 | 40 | 40 | 40 | 23 | 40 | 40 | 40 | 40 |
| 40 | 35 | 40 | 40 | 40 | 16 | 27 | 27 | 27 | 27 |
| 50 | 23 | 40 | 40 | 40 | 9 | 23 | 40 | 40 | 40 |
| 65 | 19 | 40 | 40 | 40 | 8 | 19 | 38 | 38 | 38 |
| 80 | 12 | 29 | 40 | 40 | 4,5 | 11 | 22 | 22 | 22 |
| 100 | 8 | 18 | 25 | 25 | 3 | 7 | 13 | 13 | 13 |
| 125 | 5 | 12 | 16 | 16 | 2 | 4,5 | 9 | 9 | 9 |
| 150 | - | 9 | 16 | 16 | - | 3 | 8 | 8 | 8 |

Applications limits for GS1-Valves made of stainless steel PN 40

| DN | Sliding unit: carbon/SFC - stainless steel, coated max. admissible pressures for GS1-valves | | | | | | Sliding unit: carbon - STN2 max. admissible pressures for GS1-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 - 25 | 40 | 36 | 31 | 28 | 26 | 24 | 40 | 36 | 31 | 28 | 26 | 24 |
| 32 | 40 | 36 | 31 | 28 | 26 | 24 | 40 | 36 | 31 | 28 | 25 | 22 |
| 40 | 40 | 36 | 31 | 28 | 26 | 24 | 26 | 25 | 24 | 19 | 16 | 14 |
| 50 | 40 | 36 | 31 | 28 | 26 | 24 | 40 | 36 | 31 | 28 | 26 | 24 |
| 65 | 40 | 36 | 31 | 28 | 26 | 24 | 37 | 35 | 31 | 27 | 22 | 19 |
| 80 | 40 | 36 | 31 | 28 | 26 | 24 | 22 | 20 | 19 | 16 | 13 | 11 |
| 100 | 24 | 23 | 22 | 19 | 17 | 16 | 13 | 12 | 12 | 9 | 8 | 6 |
| 125 | 16 | 15 | 14 | 13 | 11 | 10 | 8 | 8 | 7 | 6 | 5 | 4 |
| 150 | 16 | 16 | 16 | 16 | 14 | 13 | 10 | 10 | 9 | 7 | 6 | 5 |

Limitation for SFC-sliding discs: 300°C

Dimensions and Weights

| DN | A | C~ | | | L | Weight kg | | | Stroke |
|-----|-----|--------|--------|--------|----|-----------|--------|--------|--------|
| | | 0.9 kN | 2.0 kN | 4.5 kN | | 0.9 kN | 2.0 kN | 4.5 kN | |
| 15 | 53 | 450 | 487 | 525 | 33 | 3,9 | 4,2 | 7,2 | 6 |
| 20 | 62 | 455 | 492 | 530 | 33 | 4,0 | 4,3 | 7,3 | 6 |
| 25 | 72 | 460 | 497 | 535 | 33 | 4,1 | 4,4 | 7,4 | 6 |
| 32 | 82 | 465 | 502 | 540 | 33 | 4,2 | 4,5 | 7,5 | 6 |
| 40 | 92 | 470 | 507 | 545 | 33 | 4,3 | 4,6 | 7,6 | 6 |
| 50 | 108 | 480 | 517 | 555 | 43 | 5,5 | 5,8 | 8,8 | 8 |
| 65 | 127 | 490 | 527 | 565 | 46 | 6,0 | 6,3 | 9,3 | 8 |
| 80 | 142 | 495 | 532 | 570 | 46 | 6,7 | 7,0 | 10,0 | 8 |
| 100 | 164 | 510 | 547 | 585 | 52 | 7,9 | 8,2 | 11,2 | 8,5 |
| 125 | 194 | 525 | 562 | 600 | 56 | 9,7 | 10,0 | 13,0 | 8,5 |
| 150 | 219 | - | 577 | 615 | 56 | - | 11,9 | 14,9 | 8,5 |

Dimensions in mm

