

New. SLG slide

FESTO

A new definition in space saving – super flat, super short and super precise

A new slide for the precision mechanics and the electronics industry

Info 107 →→

A slide full of superlatives

Super compact

The SLG slide from Festo is flatter than any other drive of its class, and yet still shorter. The design principle of a rodless drive unit with parallel precision guide permits greater strokes across shorter distances and considerably less height. Basically nothing new, and yet never before achieved to this extent. The familiar profile slot accommodates the optional cylinder switch, so that there is no need for you to forego the benefits of reduced space requirement.

Super precision

Precision comes as standard with the SLG – thanks to its recirculating ball-bearing guide. Yet another superlative for this slide. For example, infinite precision adjustment is possible for any desired stroke length. Precision adjustment can be made even under pressure. For corrosion protection, the ball-bearing carriage and rail are made of stainless steel.

Super flexible

Through holes at regular intervals ensure that the SLG can be directly attached in line with most requirements. Similarly, the air supply can be effected either on one side only or on both sides. Even greater flexibility can be achieved by combining the SLG with another slide unit. This means that the SLG can be combined with a SLF or SLT via adapter plates to achieve a multiaxis solution.

Space - where previously there was none!

This is why the design of our new slide is super flat and super short. Not merely a coincidence, but the result of a systematic analysis of requirements. Anyone involved in the production of precision mechanics or the electronics industry, can't afford to give away space.

End products are becoming ever more miniaturized. Therefore, anyone producing tools for their manufacture, has to keep up with this trend, or better still join it. This is what we have done and will continue to systematically pursue. Our goal was not just to create space, but to come up with new definitions and intelligent applications. The SLG has many additional features apart from its miniature design, such as the direct attachment, precision operation, adjustable stroke and many more. Turn to the next page for further details.

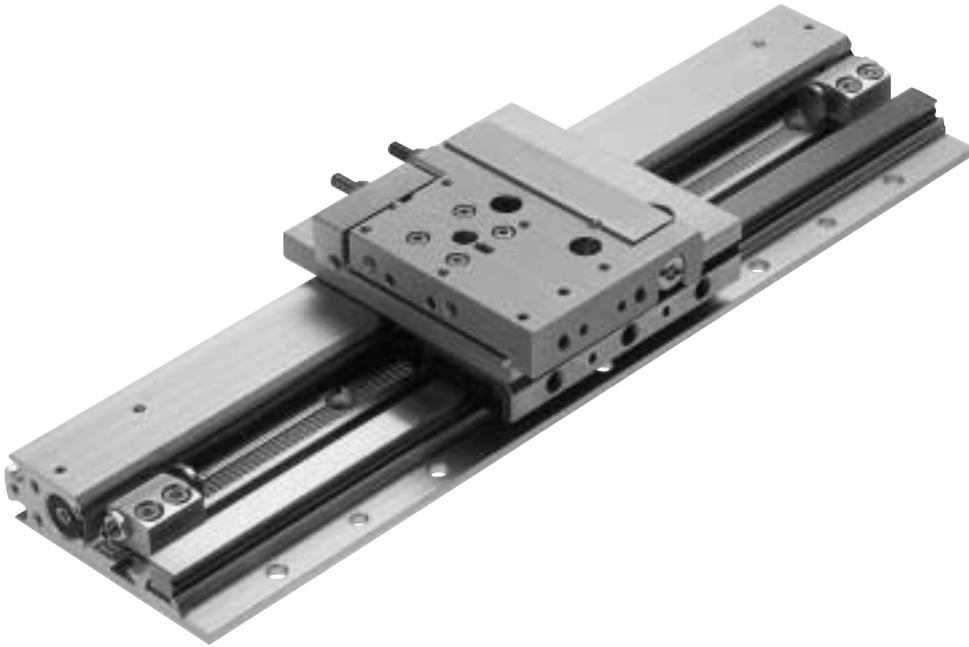
Versatile – functional – intelligent: Innovative technology isn't just a matter of size.

Industrie
Forum
Design
Hannover



Product
Design
Award
1999



**An overview of the SLG**

- 3 sizes with diameters of 8, 12 and 18 mm
- Standard stroke lengths of 100 to 900 mm (depending on piston diameter), stroke adjustable as desired
- Up to 15 kg permissible working load
- Integrated cylinder switch for all diameters: SM...-10 (standard cylinder switches for miniature pneumatics)
- Cushioning: P = flexible cushioning, YSR = integrated shock absorbers

Super flat, super short

Powerful technology, in a condensed form: With the SLG slide, we have succeeded in achieving a new dimension in pneumatics for precision mechanics and the electronics industry.

Mounting: simple and variable

The SLG slide is equipped with direct mounting facility, P or YSR cushioning and variable stroke limiter as standard. In line with a particular task, optional mounting components may be attached either on the upper side or on the outer narrow side of the slide.

Simple handling, precision positioning

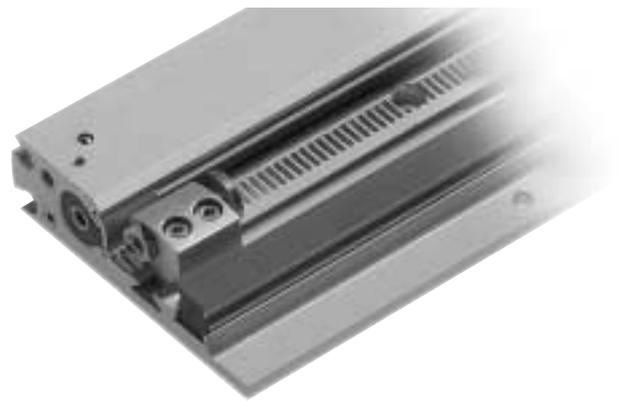
Guide and cylinder are precision aligned in that both are permanently connected by means of the roller slide profile.

Flexibility in stroke and air supply

The SLG brings with it overall flexibility – be it with the stroke, the mounting or the air connections.

Open for numerous applications

With the SLG slide, flat multi axis applications can be quickly, easily and cost-effectively constructed. Appropriate adapter plates for SLF and SLT slides are available ex stock from Festo.



Stroke adjustments can be effected via the toothed rail and precision adjustments can be made under pressure via an adjusting screw.

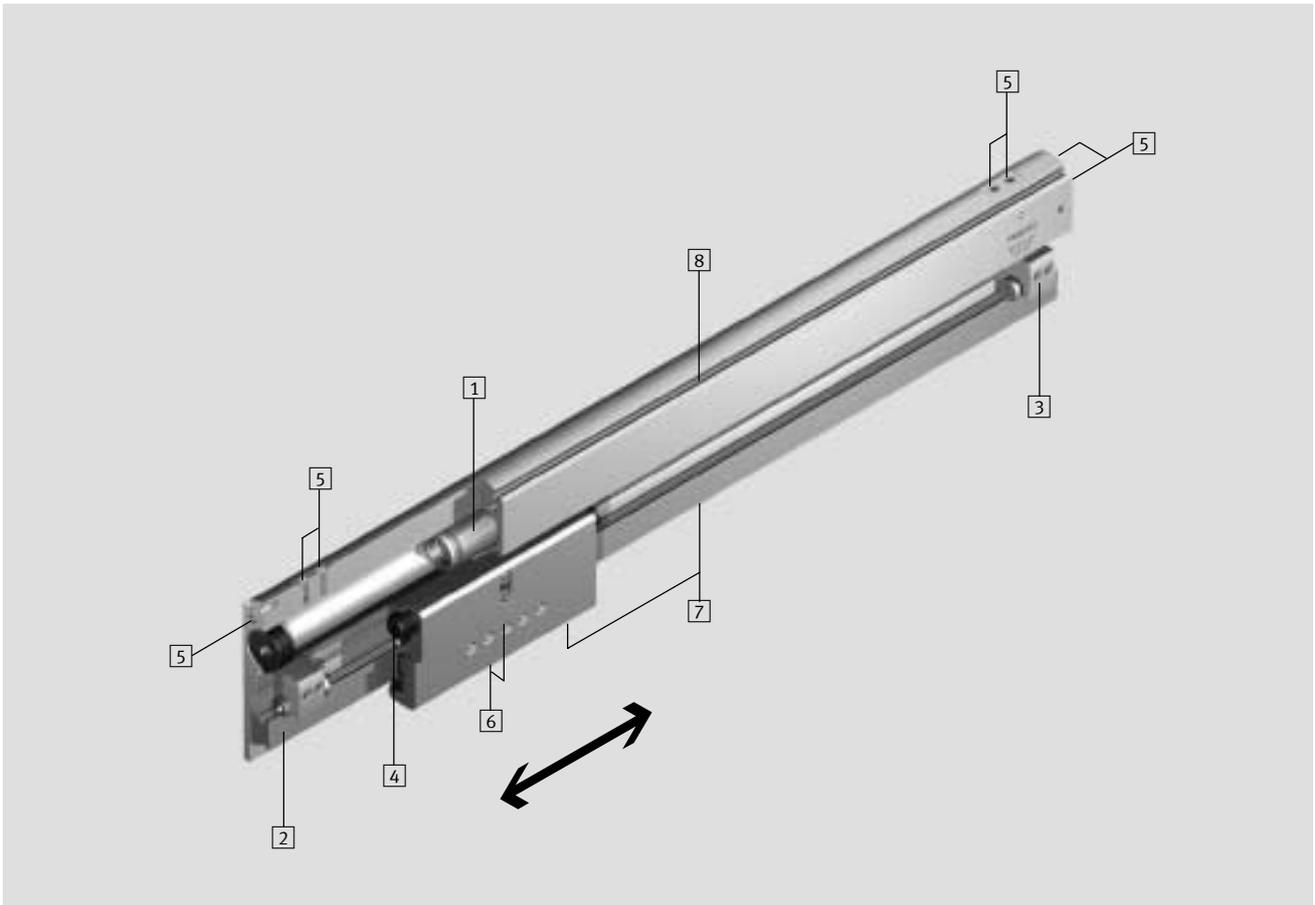


New: The intermediate position module

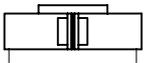
Rodless slide units SLG

Key features at a glance

Drives with linear guide



SLG



New
Intermediate position
module SLG-Z...



Diameter
8 ... 18 mm



Stroke length
100 ... 900 mm



Software tools
on CD ROM:
ProDrive

- 1** Rodless drive:
Flat, compact and handy
- 2** Highly accurate, rigid precision
guide unit:
Stainless steel roller track
pressed into aluminium profile
with ball bearing guide
- 3** End-position stops can be
adjusted and finely adjusted
over entire stroke range (fine
adjustment under pressure)
- 4** Two end-position cushioning
systems:
Flexible cushioning elements or
hydraulic shock absorbers
- 5** Versatile air connection facilities
- 6** Highly flexible thanks to versa-
tile mounting and assembly
options
- 7** Optional attachment of an
intermediate position module
for advancing to one or more
intermediate positions
- 8** Sensors can be integrated:
Sensor slots for one or more
freely adjustable SME/SMT-10
proximity sensors
→ www.festo.com



Rodless slide units SLG

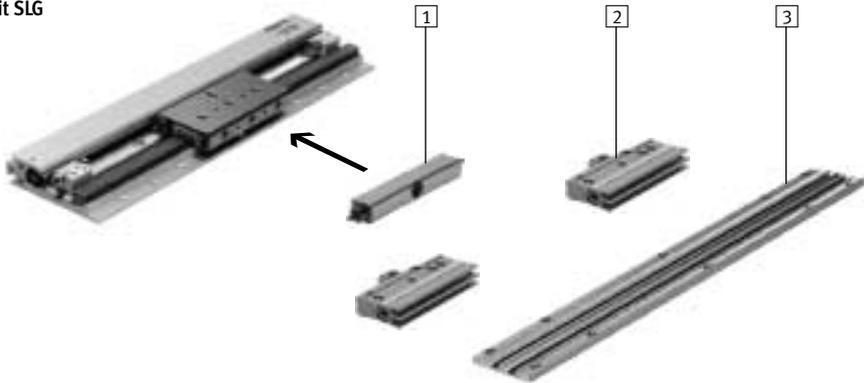
Key features at a glance

Drives with linear guide

Realising intermediate positions

- The intermediate position module can be used for advancing to one or more intermediate positions
- It is mounted parallel to the rodless slide unit SLG via an additional mounting rail. This means that it can also be easily retrofitted.
- Fine adjustment of the intermediate position is effected via a stop screw with lock nut
- With two modules the same position can be approached from either direction
- The intermediate positions can be freely selected across the entire stroke range (observe minimum distances)
- The module's symmetry means that it can advance to its right or left once mounted
- It can be activated and sensed before the movement starts
- Integrated proximity sensors in the module housing mean that the intermediate position (activated or initial position) can be sensed without contact
- Up to 4 modules can be ordered via the SLG product module range
- The slide must be retracted once the intermediate position is reached. The module can then swing back into its initial position.

In connection with the rodless slide unit SLG



1 Shock absorber retainer SLG-D:
The retainer accepts rubber buffers or shock absorbers and is attached to the slide part of the SLG. The use of shock absorber YSRG (Accessories → 12) is recommended to ensure accurate positioning of stops and in the case of vertical assembly positions.

2 Intermediate position module SLG-Z:
The stop with cushioning screw is retracted and extended by means of a 90° swivel motion based on a double-acting rotary drive (rack and pinion principle). The module is fastened to the mounting rail using screws and slot nuts.

3 Mounting rail SLG-B:
The rail is used for mounting the intermediate position module. It can also accept the end stops of the rodless slide unit SLG. The gear teeth on the rail and module permit rough pre-adjustment vis-à-vis the drive part of the SLG.

 Note

The intermediate position module can also be used independently of the rodless slide unit SLG. It is simply mounted on any even surface using mounting screws and locating pins

and can then be used universally as an autonomous intermediate position module in numerous applications.



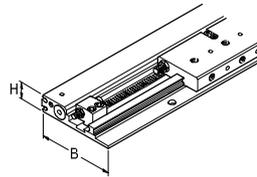
Rodless slide units SLG

Key features at a glance

Drives with linear guide

Super flat rodless slide units SLG

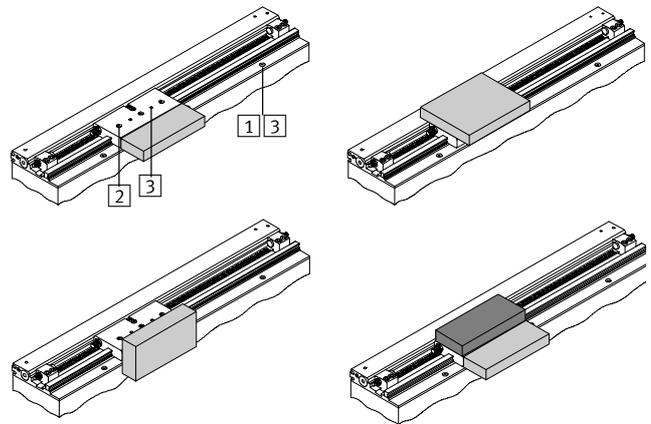
The height H remains the same even if the intermediate position module is used.



Piston Ø	Width (B)	Height (H)
8 mm	53.5	x 15 mm
12 mm	64.5	x 18.5 mm
18 mm	85.5	x 25.5 mm

Mounting and assembly options

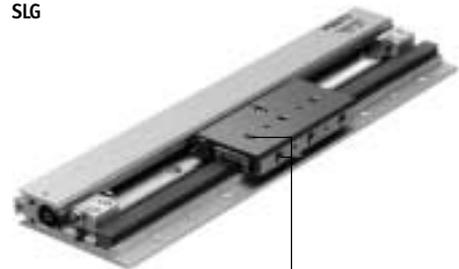
- Drive:
 - 1 Through-hole
 - 3 Locating hole for centring pin ZBS
- Slide:
 - 2 Threaded hole
 - 3 Locating hole for centring pin ZBS



Adapter kits for attaching rodless slide units to drives

Rodless slide units

SLG



Adapter kit

- Direct mounting



Attachment components

- Drive combinations
- www.festo.com

Drives
Mini slide

SLF



SLT

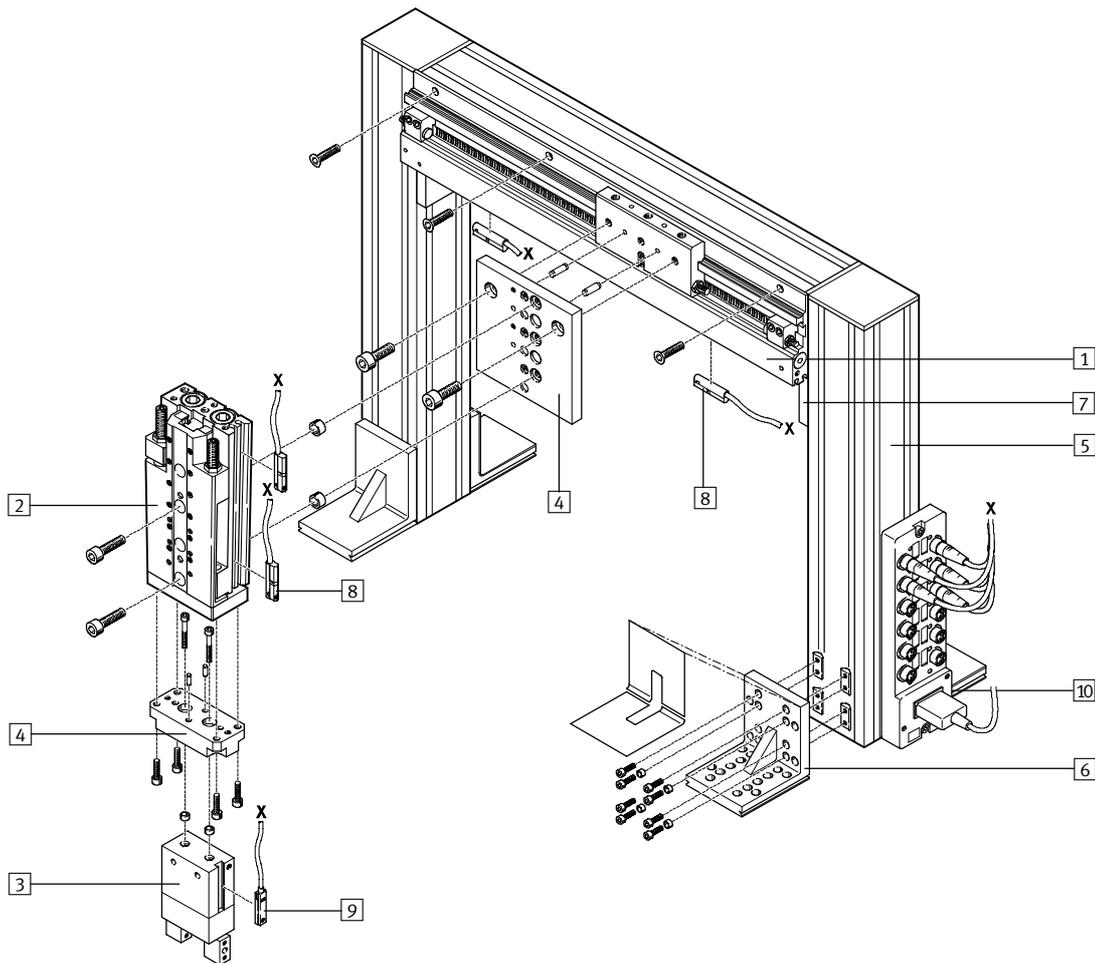


Drives with linear guide

Rodless slide units SLG

Typical applications

System overview: Handling and assembly technology



Drives

- 1 Rodless slide unit SLG
- 2 Mini slide SLT

Gripper

- 3 Parallel gripper HGP

Adapter kit

- 4 HAPS

Basic components

- 5 Profile column
HMBS
- 6 Foot bracket
HMBF-DB
- 7 Angle bracket
HMBV-ND

Proximity sensors

- 8 SME/SMT-10
- 9 SME/SMT-8

Electrical interface

- 10 Multi-pin plug distributor MPV



Rodless slide units SLG

Ordering data – Product modules

Drives with linear guide

M Mandatory data						O Options
Module No.	Type	Size	Stroke length	Cushioning	Position sensing	Intermediate position
187 857	SLG	8	100 ... 500	P	A	Z1
187 855		12	100 ... 700	YSR		Z2
187 853		18	100 ... 900			Z3 Z4
Order example						
187 853	SLG	18	500	P	A	

Order table							
Size	8	12	18	Condi- tions	Code	Enter code	
M Module No.	187 857	187 855	187 853				
Drive function	Rodless linear drive unit				SLG	SLG	
Piston Ø [mm]	8	12	18		-...		
Stroke length [mm]	100	100	100	1	-100		
	200	200	200	1	-200		
	300	300	300	2	-300		
	400	400	400	3	-400		
	500	500	500	3	-500		
	-	600	600	3	-600		
	-	700	700	3	-700		
	-	-	800	3	-800		
-	-	900	3	-900			
Cushioning	Flexible cushioning elements in the end positions				-P		
	Hydraulic shock absorbers in the end positions (both ends)				-YSR		
Position sensing	With proximity sensor				-A	-A	
O Intermediate position	1 intermediate position				-Z1		
	2 intermediate positions				-Z2		
	3 intermediate positions				-Z3		
	4 intermediate positions				-Z4		

- 1 Max. 2 intermediate positions
- 2 Max. 3 intermediate positions
- 3 Max. 4 intermediate positions

Transfer order code

	SLG	-		-		-	A	-	
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Rodless slide units SLG

Drives with linear guide

Ordering data – Individual components in the intermediate position module

Retrofitting of the rodless slide unit SLG or for combination with other drives

Intermediate position module SLG-Z...



For SLG Ø [mm]		Part No.	Type
8	The module's symmetric design makes it suitable for both approach directions.	525 680	SLG-Z-8/12-A
12			
18		525 681	SLG-Z-18-A

Shock absorber retainer SLG-D...



For SLG Ø [mm]		Part No.	Type
8	The scope of delivery for individual components does not include cushioning elements (Accessories → 12)	525 703	SLG-D-8
12		525 704	SLG-D-12
18		525 705	SLG-D-18

Mounting rail SLG-S...



For SLG Ø [mm]	Stroke [mm]	Part No.	Type
8	100	525 682	SLG-S-8-100
	200	525 683	SLG-S-8-200
	300	525 684	SLG-S-8-300
	400	525 685	SLG-S-8-400
	500	525 686	SLG-S-8-500
12	100	525 687	SLG-S-12-100
	200	525 688	SLG-S-12-200
	300	525 689	SLG-S-12-300
	400	525 690	SLG-S-12-400
	500	525 691	SLG-S-12-500
	600	525 692	SLG-S-12-600
	700	525 693	SLG-S-12-700
18	100	525 694	SLG-S-18-100
	200	525 695	SLG-S-18-200
	300	525 696	SLG-S-18-300
	400	525 697	SLG-S-18-400
	500	525 698	SLG-S-18-500
	600	525 699	SLG-S-18-600
	700	525 700	SLG-S-18-700
	800	525 701	SLG-S-18-800
	900	525 702	SLG-S-18-900

Rodless slide units SLG

Ordering data – Accessories and spare parts

Drives with linear guide

Accessories and spare parts

– for rodless slide units SLG-...



– for intermediate position module SLG-Z-...



	Type Size	SLG-.../SLG-Z-... 8	12	18
Magnetic proximity sensors SME-10/SMT-10 		For end-position sensing → www.festo.com		
Shock absorber YSRG (for YSR cushioning) 		381 042 YSRG-5-5-C		384 581 YSRG-8-8-C
Rubber buffer (for P cushioning)		379 802		381 219
Centring pins ZBS 		525 237 ZBS-02		150 928 ZBS-5 ¹⁾
Adapter kits HAPS 		→ www.festo.com		
Grease gun		647 958		

1) Supplied in packs of 10 only



Rodless slide units SLG

Technical data

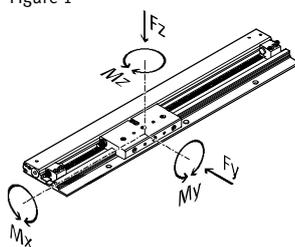
Drives with linear guide

Rodless slide units		Type	SLG-...			
		Size	8	12	18	
Pneumatic data	Min. operating pressure	[bar]	2.5	2	1	
	Max. operating pressure	[bar]	8			
	Connection*		M3		M5	
Mechanical data	Design		Double-acting cylinder			
Size	∅	[mm]	8	12	18	
Nominal stroke**	100 mm					
	200 mm					
	300 mm					
	400 mm					
	500 mm					
	600 mm					
	700 mm					
	800 mm					
Effective force at 6 bar***	Max. thrust	[N]	30	68	153	
	Max. return force	[N]	30	68	153	
Characteristic load values → Figure 1	Forces	F _y max	[N]	255	565	930
		F _z max	[N]	255	565	930
	Lateral torque	M _x max	[Nm]	1	3	7
		M _y max	[Nm]	3.5	9	23
	Longitudinal torque	M _z max	[Nm]	3.5	9	23
		Rotational backlash	... M _x max	[°]	±0.03	±0.04
	at M _y max	[°]	±0.005	±0.007	±0.007
... M _z max		[°]	±0.005	±0.007	±0.007	
End-position cushioning			Graphs → 14			
Speed	Max. travel speed	[m/s]	1		1.5	
Weights	Drive weight	With P cushioning	[g]	215	410	965
		With YSR cushioning	[g]	225	420	995
		Per 100 mm stroke	[g]	115	175	295
	Moving load	With P cushioning	[g]	80	160	440
		With YSR cushioning	[g]	90	170	470
Materials	Profile barrel		Anodised aluminium			
	Stop sleeve		Anodised aluminium			
	Guide		Stainless steel			
	Slide		Stainless steel			
	Seals		PU			
Ambient conditions	Temperature range	[°C]	-10 ... +60			

- * Unused air connection holes must be sealed with blanking plugs
- ** Intermediate strokes are infinitely adjustable with external stops
- *** 70 – 80% efficiency

Static and dynamic, characteristic load values F_y, F_z, M_x, M_y, M_z

Figure 1



Torques are indicated with reference to the centre of the guide rails.

Max. piston speed
SLG-8/12 = 1 m/s
SLG-18 = 1.5 m/s

If the guide rails are subjected to more than two of the indicated forces and torques simultaneously, the following equation must be satisfied in addition to adherence to the indicated maximum loads:

$$\frac{M_y}{M_{y\max.}} + \frac{M_z}{M_{z\max.}} + \frac{M_x}{M_{x\max.}} + \frac{F_y}{F_{y\max.}} + \frac{F_z}{F_{z\max.}} \leq 1$$

Rodless slide units SLG

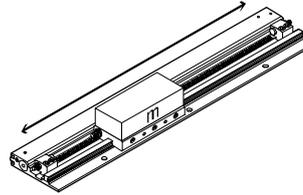
Technical data

Drives with linear guide

Permissible horizontal load

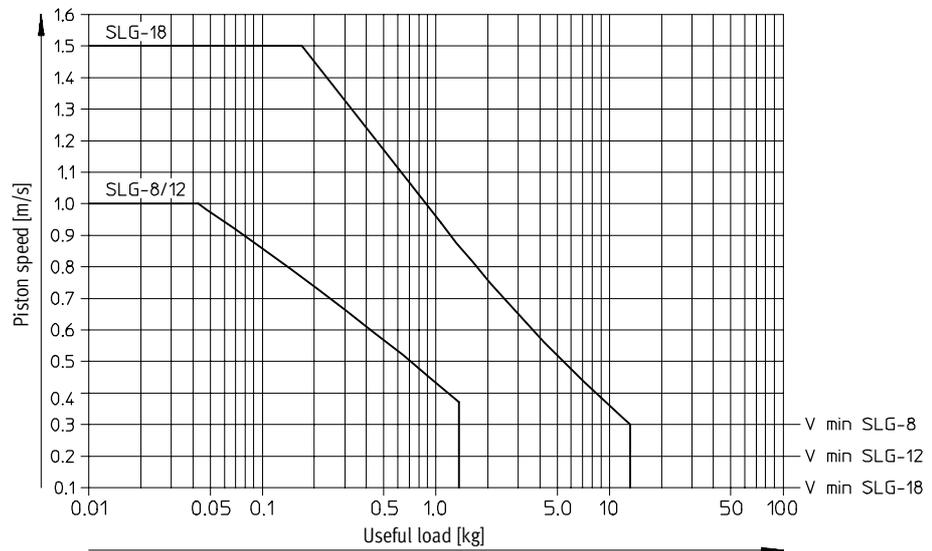
As a function of operating pressure and end-position cushioning system

A rodless slide unit SLG with YSR cushioning (YSRG shock absorbers) must be used in applications with very high repeat accuracy.



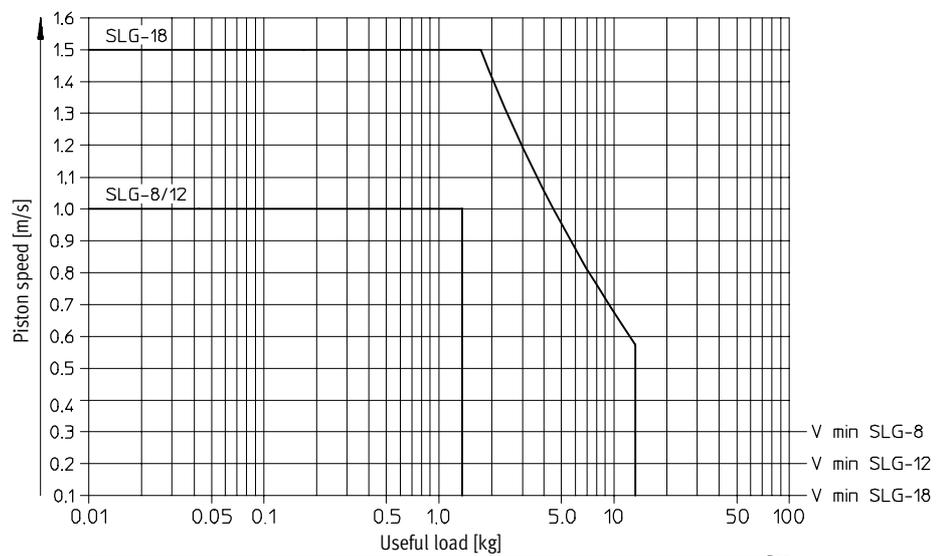
Flexible cushioning elements

P cushioning



Hydraulic shock absorbers

YSR cushioning



Rodless slide units SLG

Technical data

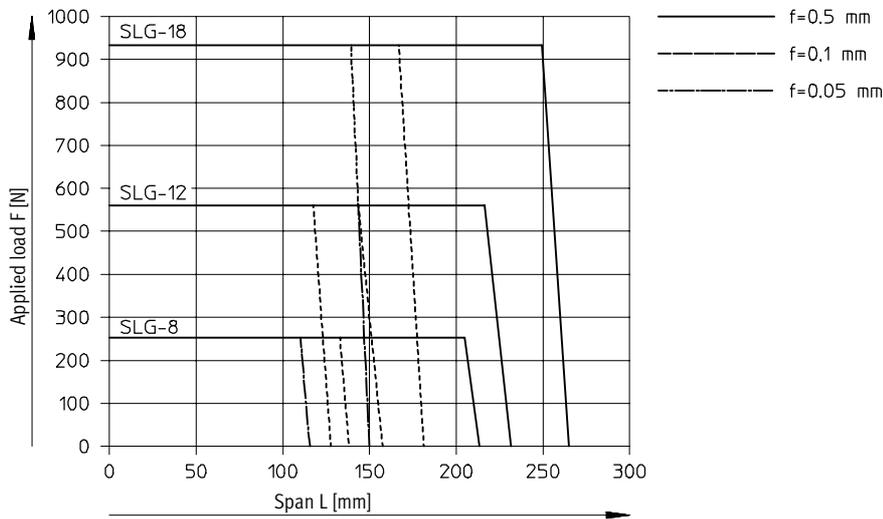
Drives with linear guide

Calculation of required points of support as a function of applied load

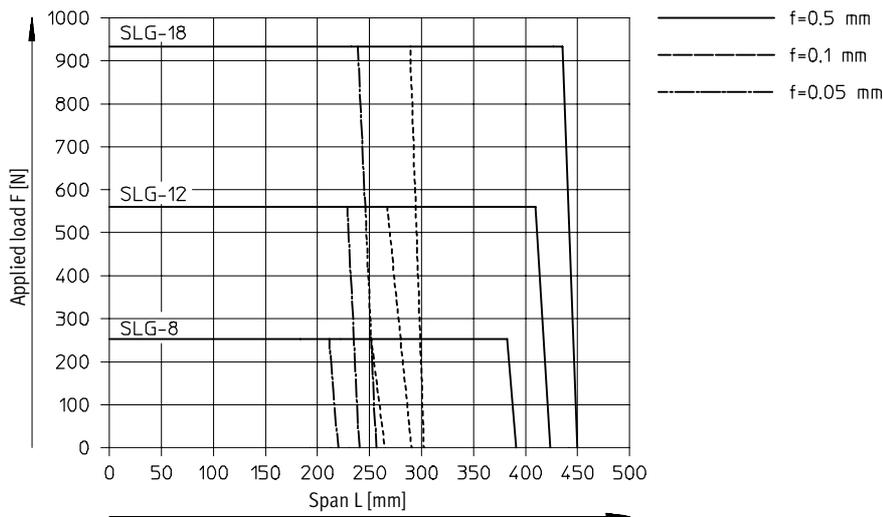
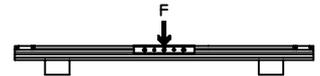


Support spacing, deflection and flatness

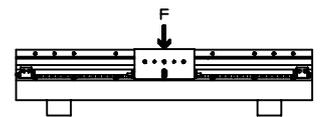
Note
The support spacings must be laid out in this way so that the mounting profile for the intermediate position module will exhibit less deflection than the drive itself.



Deflection around the X axis



Deflection around the Y axis



The surface which supports the rodless slide SLG at points which are no farther than 100 mm from each other, or over its entire surface, should be

flat to within at least 0.1 mm. The support surface for the load on the slide should be flat to within at least 0.05 mm.

Flatness of the bearing surface

Rodless slide units SLG

Technical data

Drives with linear guide

Minimum clearances for SLG rodless slide units to ferrite materials for reliable sensor functioning	Slot 1 Slot 2	Minimum clearances [mm]																	
		x																	y
		Slot 1	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17
	SLG-8	1																	
		2																	
	SLG-12	1																	
		2																	
	SLG-18	1																	
		2																	
	SLG-8	1																	
		2																	
	SLG-12	1																	
		2																	
	SLG-18	1																	
		2																	
	SLG-8	1																	
		2																	
	SLG-12	1																	
		2																	
	SLG-18	1																	
		2																	
	SLG-8	1																	
		2																	
	SLG-12	1																	
		2																	
	SLG-18	1																	
		2																	
	SLG-8	1																	17
		2																	
	SLG-12	1																	16
		2																	
	SLG-18	1																	12
		2																	

■ Permissible range

Permissible spanner widths for the compressed air connectors

The following spanner widths can be used on the external surface and front side:

- SLG-8: $\approx 5.5 \dots 8$
- SLG-12: $\approx 5.5 \dots 8$
- SLG-18: $\approx 8 \dots 10$

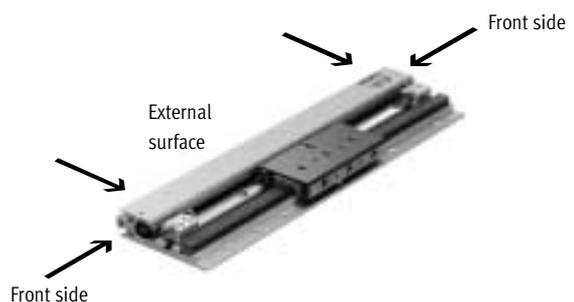
Restrictions at the front side:

The threaded connectors protrude from the top or bottom of the profile with compressed air connections at

both ends. The connector threads are too close to one another for the threaded fittings with compressed air connections at one end only.

For this reason, the following spanner widths can only be used in certain conditions:

- SLG-8: ≈ 8
- SLG-12: ≈ 8
- SLG-18: ≈ 10





Rodless slide units SLG

Technical data

Drives with linear guide

Intermediate position module		Type	SLG-Z-...			
		Size	8	12	18	
Pneumatic data	Min. operating pressure	[bar]	1			
	Max. operating pressure	[bar]	8			
	Connection		M3			
Mechanical data	Design		Stop in the form of a rotary drive system in accordance with the rack and pinion principle			
Mounting position*			Any			
Size	∅	[mm]	8	12	18	
Rotation angle		[°]	90 (non-adjustable)			
Fine adjustment of the intermediate position		[mm]	1.7			
End-position cushioning**			Graphs → 14			
Speed	Min. swivel time at 6 bar	[ms]	30		50	
	Max. frequency at 6 bar	[1/s]	16		10	
	Max. permissible impact velocity	[m/s]	1		1.5	
Max. permissible end stop impact force***	Static	[N]	200		500	
Max. permissible energy in the intermediate position	With P cushioning	[Nm]	0.1		0.6	
	With YSR cushioning	[Nm]	1 (YSRG-5)		3 (YSRG-8)	
Weights	Intermediate position module SLG-Z-...	Basic weight	180		249	
	Shock absorber retainer SLG-D-...	With P cushioning	[g]	18	24	60
		With YSR cushioning	[g]	28	34	90
	Mounting rail SLG-S-...	Basic weight	[g]	39	65	162
		Per 100 mm stroke	[g]	36	49	95
Materials	Intermediate position module SLG-Z-...	Housing	Hard anodised aluminium			
		Stop	Nickel plated steel			
		Cushioning screw	High-alloy steel			
		Seals	PU			
	Shock absorber retainer SLG-D-...	Hard anodised aluminium				
	Mounting rail SLG-S-...	Hard anodised aluminium				
Ambient conditions	Temperature range	[°C]	-10 ... +60			

* Shock absorbers YSRG-... must be used for high repetition accuracy as well as in non-horizontal movements.

With vertical installations (where the stop moves upwards), it must be ensured that no foreign particles enter the swivel range of the stop.

** The end position of the slide or other drive is not exactly defined when rubber buffers are used. Shock absorbers YSRG-... must be used for high repetition accuracy.

*** The max. stop force must hit the disk of the cushioning screw.

Mounting options

Interface		Size	8	12	18
Through-holes for direct mounting with screws to DIN 912	Intermediate position module		M2,5		M3
	Shock absorber retainer		M4		M5
	Mounting rail		M3		M4
Centring pins	Intermediate position module		∅ 4 H7		∅ 5 H7
	Shock absorber retainer		∅ 2 H7		∅ 5 H7
	Mounting rail		∅ 3 H7		∅ 5 H7

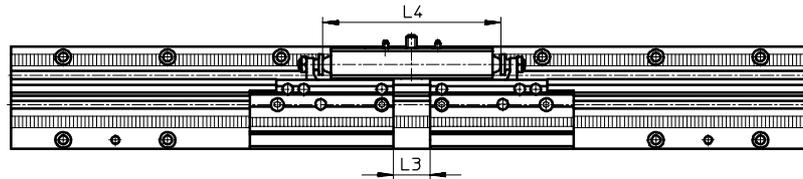
Rodless slide units SLG

Technical data

Drives with linear guide

Intermediate position module SLG-Z...

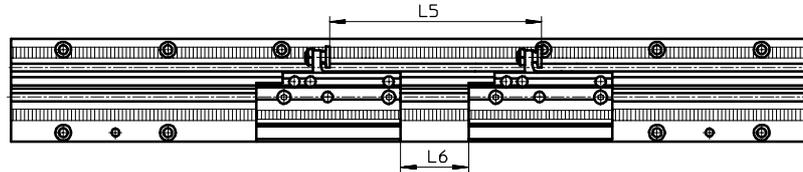
The same position approached from
two directions



Size [mm]	L3 ¹⁾		L4
	min.	max.	
8 ²⁾	21	27	68
12	39	45	86
18	50	56.5	111

- 1) Depends on the fine adjustment
- 2) Due to the narrowness of the space L3 only the following threaded connector can be used for the compressed air connection:
30 491 LCN-M3-PK-2-B

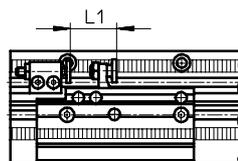
Two positions approached from
the same direction



Size [mm]	L5 min.	L6 ³⁾
	8	
12		
18	97	

- 3) The space between the modules is such that the following threaded connectors can be used for the compressed air connections:
153 330 QSML-M3-3
153 332 QSML-M3-4
30 491 LCN-M3-PK-2-B
30 984 LCN-M3-PK-2

Space between end stop and
intermediate position module



Size [mm]	L1 min.
8	20
12	
18	

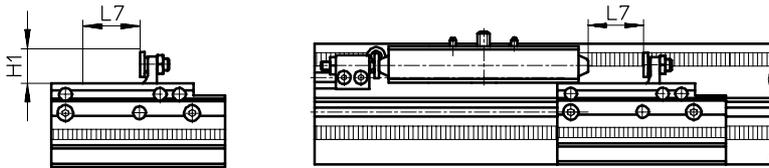
 Note
The space for 2 intermediate positions can be reduced to 0 mm by mounting the second module upright at 90° (Example → 21).

Rodless slide units SLG

Technical data

Drives with linear guide

Intermediate position modules in various mounting planes



Care must be taken to ensure that each intermediate position module has sufficient space for the swivel movement in the specified range (both outwards and inwards) while it is swivelling. This corresponds to

the distance (stroke) that the shock absorber retainer must travel from the intermediate position to ensure safe inward or outward swivelling of the pinion (example → 21).

Size [mm]	H1	L7	
		P cushioning	YSR cushioning
8	11	18	23
12			
18	16	23	31

Maximum number of intermediate position modules on one mounting rail

The number of intermediate position modules that can be ordered via the rodless slide SLG product module range is restricted to max. 4. If addi-

tional intermediate positions are required, further modules can be ordered separately and fitted in another mounting plane.

Size [mm]	Stroke length of the mounting rail [mm]									
	100	200	300	400	500	600	700	800	900	
8	2		3	4		-	-	-	-	
12	2		3	4		4		-	-	
18	2		3	4		4		4		

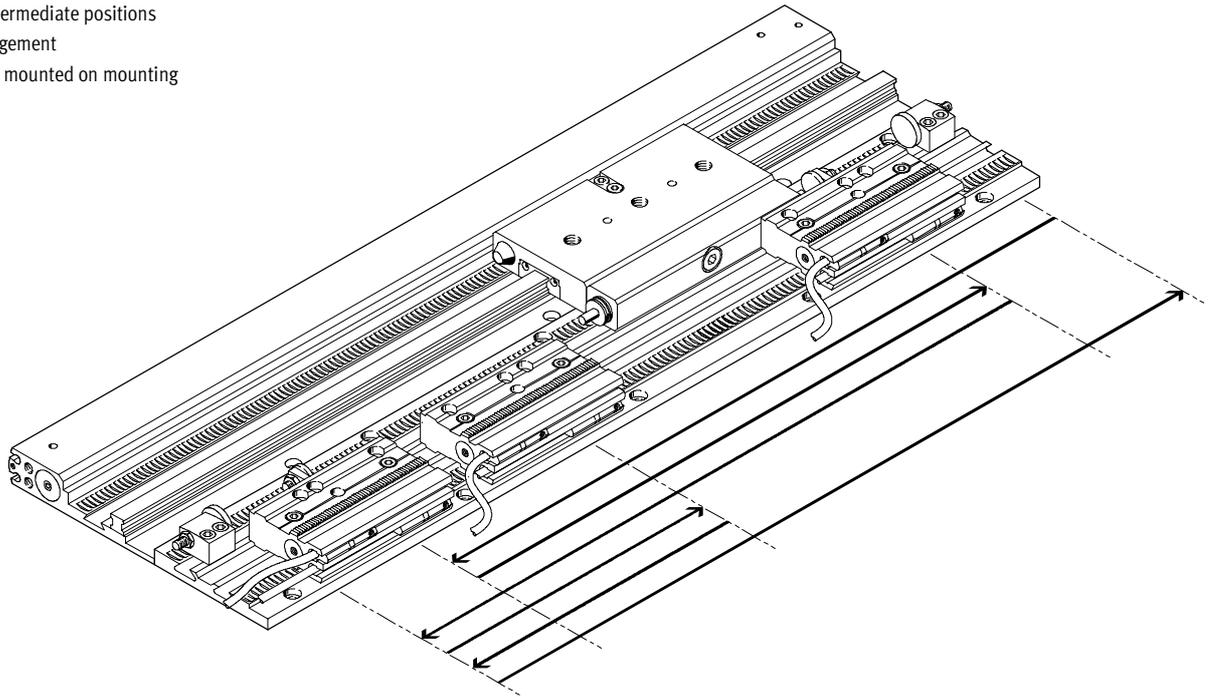
Rodless slide units SLG

Typical applications

Drives with linear guide

Rodless slide unit SLG with intermediate positions

- With 3 intermediate positions
- Flat arrangement
- End stops mounted on mounting rail



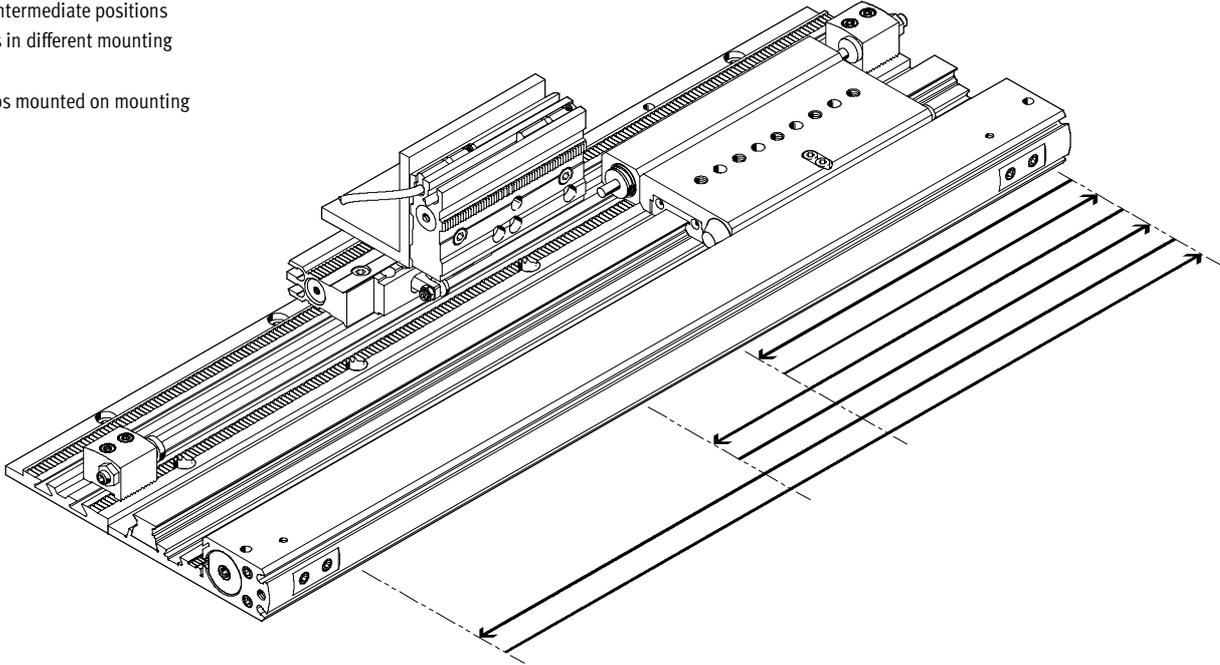
Rodless slide units SLG

Typical applications

Drives with linear guide

Rodless slide unit SLG with intermediate positions

- With 2 intermediate positions
- Modules in different mounting planes
- End stops mounted on mounting rail

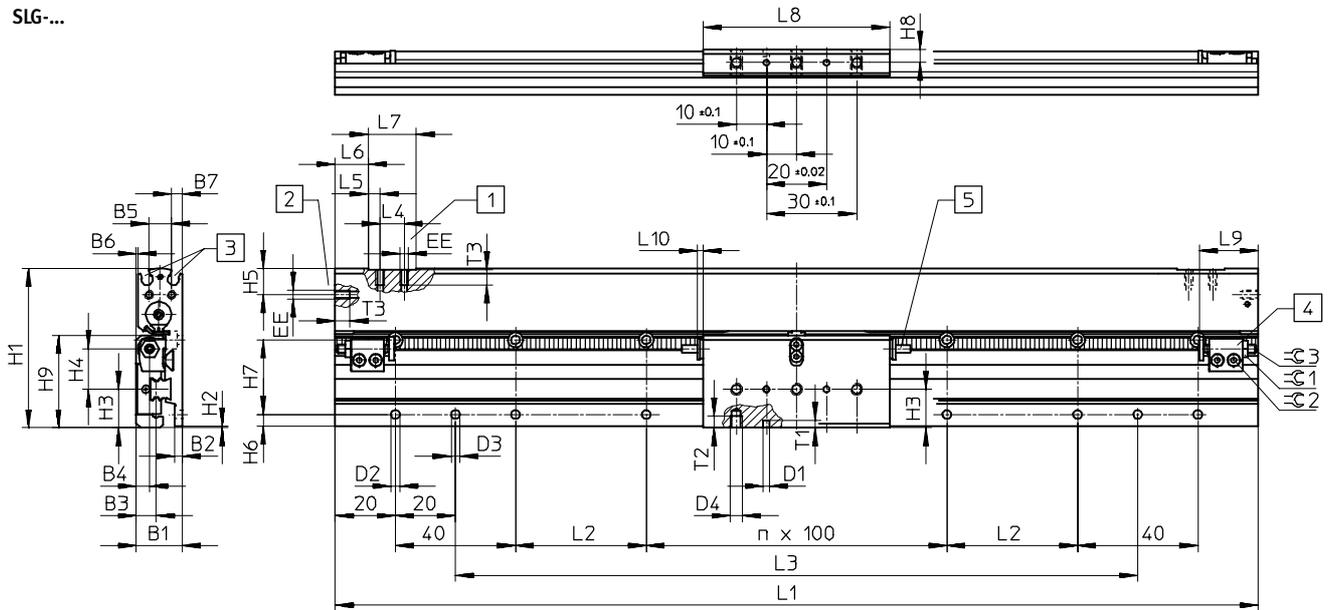


Rodless slide units SLG

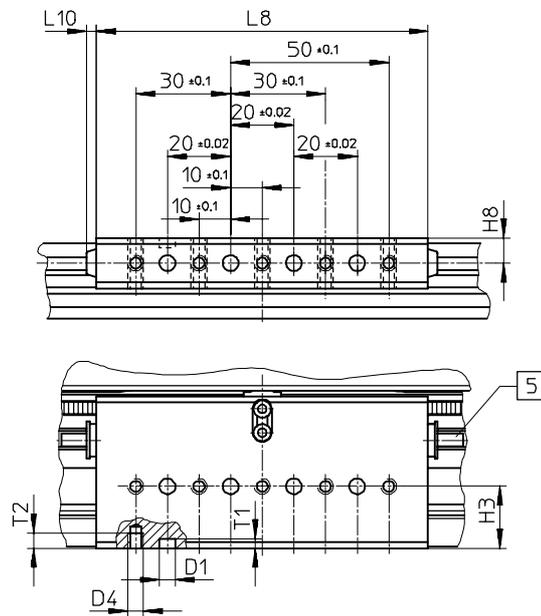
Dimensions

Drives with linear guide

SLG-...



SLG-18

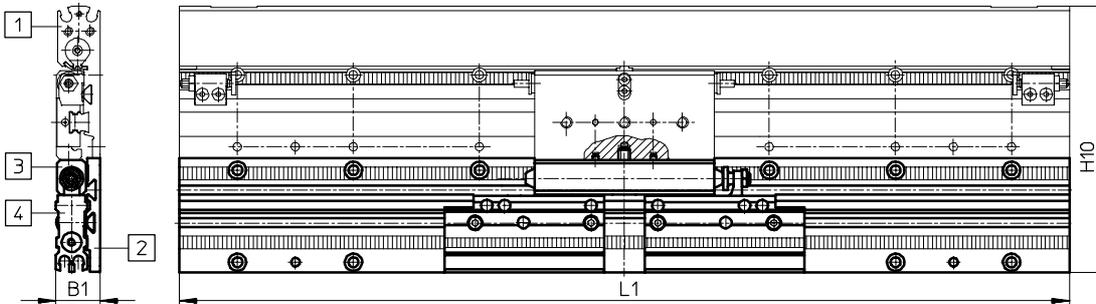


- | | | | |
|---|-------------------------------|---|--------------------------|
| 1 | Supply port, external surface | 4 | Stop |
| 2 | Supply port, front side | 5 | Hydraulic shock absorber |
| 3 | Slot for proximity sensor | | YSRG or rubber buffer |
| | SME/SMT-10 | | (P cushioning) |

Rodless slide units SLG

Dimensions

Drives with linear guide



SLG-S-...
SLG-D-...
SLG-Z-...

- 1 Rodless slide SLG
- 2 Mounting rail SLG-S
- 3 Shock absorber retainer SLG-D
- 4 Intermediate position module SLG-Z

	B1	B2	B3	B4	B5	B6	B7	D1* ∅ H7	D2 ∅	D3* ∅ H7	D4	EE	H1	H2	H3	H4	H5	H6	H7
SLG-8	15	2.5	6.6	4.4	7.5	0.65	3.5	2	3.4	3	M4	M3	53.5	0.5	13	13.6	8.8	3.9	25
SLG-12	18.5	2.6	7.9	5.2	8.5	0.5	4.75	2	3.4	3	M4	M3	64.5	0.5	15.9	16.5	9.5	4.3	30
SLG-18	25.5	3.5	13.3	8	13.2	1.6	5.4	5	4.5	5	M5	M5	85.5	0.5	19.8	21.7	11.5	4.1	40

	H8	H9	H10	n	L1	L2	L3	L4	L5	L6	L7	L8	L9 min.	L10	T1	T2 min.	T3	≅C1	≅C2	≅C3
SLG-8-100	4.4	31	93.1	0	207	43.5	127	10	5	10	20	62	20	2	2.5	4	4.5	5.5	1.5	1.5
SLG-8-200				1	307		227													
SLG-8-300				2	407		327													
SLG-8-400				3	507		427													
SLG-8-500				4	607		527													
SLG-12-100	5.25	36.7	104.1	0	233	56.5	153	10	5	10	20	80	36.5	2	2.5	4	4.5	7	2	2
SLG-12-200				1	333		253													
SLG-12-300				2	433		353													
SLG-12-400				3	533		453													
SLG-12-500				4	633		553													
SLG-12-600				5	733		653													
SLG-12-700	6	833	753																	
SLG-18-100	8	48.5	135.5	0	271	75.5	191	12	6	13	24	105	29	3	3	5	6	8	2.5	2.5
SLG-18-200				1	371		291													
SLG-18-300				2	471		391													
SLG-18-400				3	571		491													
SLG-18-500				4	671		591													
SLG-18-600				5	771		691													
SLG-18-700				6	871		791													
SLG-18-800				7	971		891													
SLG-18-900	8	1071	991																	

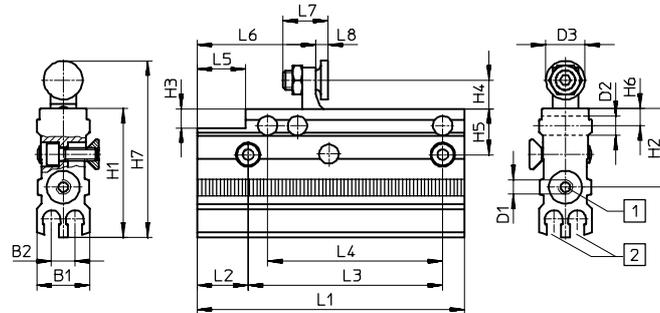
* Locating hole for centring pin ZBS

Rodless slide units SLG

Dimensions

Drives with linear guide

SLG-Z...

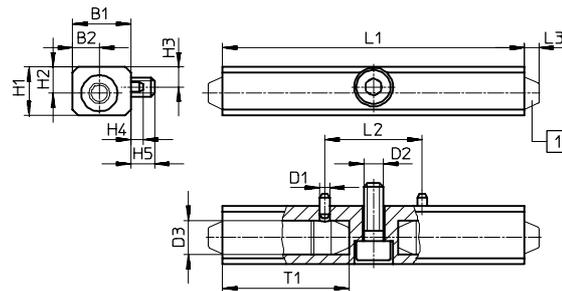


- 1 Air connections on both sides
- 2 Slot for proximity sensor SME/SMT-10

	B1	B2	D1	D2 ∅ H7	D3 ∅	H1	H2	H3	H4	H5
SLG-Z-8/12	10.8	4.8	M3	4	8	26.6	16.2	4	6	9.5
SLG-Z-18	15.6	4.8	M3	5	10	29.6	19.2	-	9.6	11.5

	H6	H7	L1	L2	L3 ±0.1	L4 ±0.02	L5	L6	L7	L8	
										min.	max.
SLG-Z-8/12	3.5	36.6	55	10.5	40	36	10	24.4	9.25	2.5	4.2
SLG-Z-18	4.3	44.2	62	7.5	50	50	-	21.6	12	3.7	5.4

SLG-D...



- 1 Rubber buffer or shock absorber

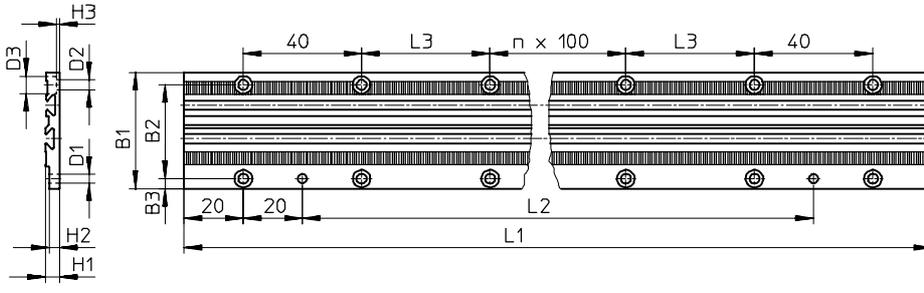
	B1	B2	D1 ∅ H7/h8	D2	D3 ∅	H1	H2	H3	H4	H5	L1	L2 ±0.02	L3	T1
SLG-D-8	11.5	5	2	M4	7.5 +0.05	10	5.4	4.1	2.25	4.8	62	20	3	26
SLG-D-12											80			
SLG-D-18	17	8	5	M5	10 +0.02	15	7.5	7.75	2	4.7	105	60	3	43

Drives with linear guide

Rodless slide units SLG

Dimensions

SLG-S...



	Stroke [mm]	B1	B2	B3	D1 ∅ H7	D2 ∅	D3 ∅	H1	H2	H3	n	L1	L2	L3
SLG-S-8	100	39.6	32	3.4	3	3.4	6	4.8	3.5	0.9	0	207	127	43.5
	200										1	307	227	
	300										2	407	327	
	400										3	507	427	
	500										4	607	527	
SLG-S-12	100	39.6	32	4.1	3	3.4	6	7.2	1.9	1.9	0	233	153	56.5
	200										1	333	253	
	300										2	433	353	
	400										3	533	453	
	500										4	633	553	
	600										5	733	653	
	700										6	833	753	
SLG-S-18	100	50	40	4.75	5	4.5	7.5	10.3	9	2.5	0	271	191	75.5
	200										1	371	291	
	300										2	471	391	
	400										3	571	491	
	500										4	671	591	
	600										5	771	691	
	700										6	871	791	
	800										7	971	891	
	900										8	1071	991	



100 % Service for 100 % Partnership

Welcome to Festo's world of service. We live out our philosophy of customer orientation on a daily basis. And this creates a foundation for the future, and for successful cooperation with our customers.

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- 24-hour technical advice available from hotlines at many of our sales offices

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- Drives and drive accessories
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- Valve terminals and bus systems
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- Compressed air preparation
- Tubing, fittings, mounting accessories
- Sensors and pressure switches
- Pneumatic control technology
- Electronic control technology
- Festo Didactic products and services for continuing vocational training

Customer Service

- Hotlines available for technical advice
- Quick on-site assistance
- Reliable maintenance service and complaints department

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- Quick response times thanks to on-site replacement parts service throughout the world
- Delivery from Festo service points and well-stocked parts warehouses
- On-time delivery of original replacement parts
- Practically all accessory and standard components are immediately available from well-stocked warehouses at the Festo sales offices for especially urgent requirements.

Delivery Service

- Quick delivery of catalogue products direct from the warehouse
- Custom manufacturing (SMS) in 28 countries

- Fully automated manufacturing and logistics at the Customer Service Centre in St. Ingbert-Rohrbach, Germany
- Minimal turnaround times
- International manufacturing controls are maintained for product quality
- 7,400 orders with a total of 16,000 units processed each day
- 6,500 cases with a total weight of 50,000 kg shipped each day
- Shipments dispatched direct to the customer throughout Europe

Brand Name Quality

- First manufacturer of pneumatic components with DQS certification for manufacturing in accordance with ISO 9001
- 33 Festo companies throughout the world are certified in accordance with ISO 9001/9002
- TQM and Quality Engineering
- Quality improvement programs
- 2,800 international patents, approximately 100 new patent applications each year
- Design awards for “Good Industrial Design” (top ten), “Ecology Design” and “Product Quality”



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All technical data subject to change according to technical update.

Highly commendable – and not just because of excellent guidance in restricted spaces

Excellent guidance frequently leads to unhindered movement in controlled environments. The SLG permits greater freedom of design and increased economy in purchasing. Below is a summary of the most important points.

	Benefits for designers	Benefits for buyers
1. Sturdy and extremely flat design	<ul style="list-style-type: none"> – More compact machines – Greater guiding stability 	<ul style="list-style-type: none"> – Long service life – More compact installations increase overall economic efficiency
2. Integrated standard cylinder switches SM...-10	<ul style="list-style-type: none"> – One cylinder switch for a wide range of drives 	<ul style="list-style-type: none"> – Simplified logistics – Reduced downtimes thanks to flush-fitting design
3. Maximum flexibility of stroke, mounting and air supply	<ul style="list-style-type: none"> – Maximum installation flexibility – Wide range of mounting options – Minimal time requirement for design and assembly 	<ul style="list-style-type: none"> – Fewer downtimes – Reduced costs, since need for specific mounting material is eliminated – Minimized costs of design and assembly

Summary of further components

Important components in our product range

Compressed air preparation

- Service units D series



Control technology

- Individual valves type CPE
- Valve terminal type CPV
- Smart Positioning Controller type SPC200
- Front-End Controller IPC FEC Standard type FC640



Long linear movement

- Rodless cylinder type DGPL
- Electric toothed-belt drive type DGE
- Standard cylinder type DNC and type DSNU



Short linear movement

- Linear module type HMP
- Guide unit type DFM
- Mini slide type SLT
- Flat slide type SLG
- Linear module type HMPL
- Short-stroke cylinder type ADVC



Rotary movement

- Rotary drive type DRQD
- Swivel module type DSM
- Swivel/linear module type DSL



Gripping, mechanical ...

- Precision gripper type HGPP
- Micro gripper type HGWM
- Three-point gripper type HGD



... or with vacuum

- Suction gripper type ESG
- Vacuum generator type VADMI
- Vacuum generator type VAD New Line



Connecting and installing

- Basic elements
- Screw connectors
- Restrictors
- Tubing



Parts sorting and testing

- Checkbox family



Further products and details: <http://catalog.festo.com> or consult your Festo technical advisor.

Pneumatic Pictograms

	Stroke length		Service
	Flow rate		Repair service
	Voltage		Worldwide service
	Force		Hotline
	Pressure		Collection facility
	Temperature range		Delivery time
	Diameter		In stock
	Vacuum		Important
	Width		Type discontinued
			New
			Repairable