

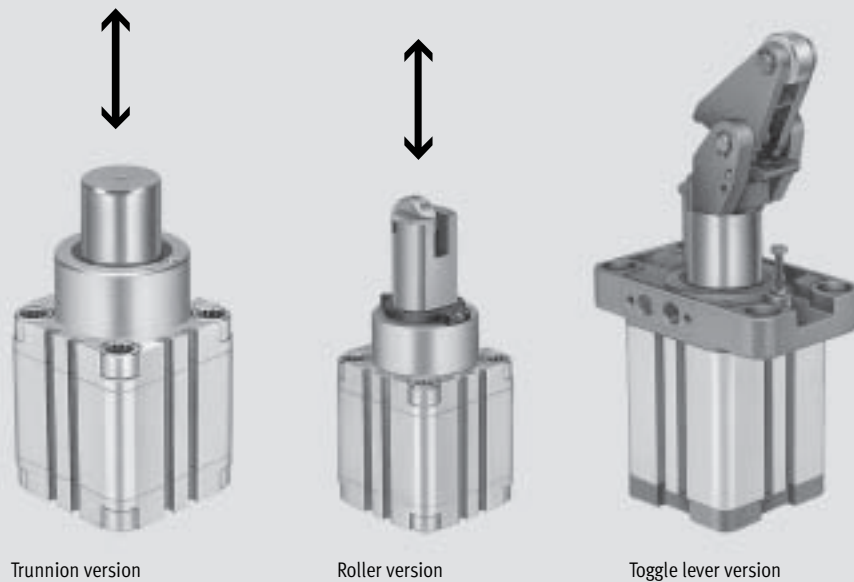


- Gentle stopping without impact vibrations or noise
- Simple activation via valve terminal
- Single-acting or double-acting

# Stopper cylinders STA/STAF

Features

FESTO



## Brief description

- Single-acting or double-acting
- Variants
  - Trunnion
  - Roller
  - Toggle lever
- Solenoid valves mounted directly to flange plate
- Fast and simple set-up of conveyor lines
- Workpiece carriers, pallets and packages weighing up to 300 kg can be safely stopped
- Gentle stopping without impact vibrations or noise with toggle lever version
- Simple activation via valve terminal (e.g. in combination with other cylinders at an assembly station)
- Flanged solenoid valve on individual stopper cylinders permits fast actuation even over long distances
- Space saving sensing with integrated proximity sensors

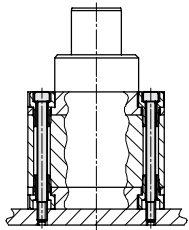
# Stopper cylinders STA/STAF

Features

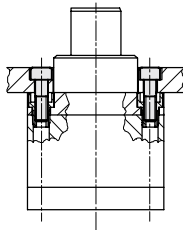
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## Mounting options

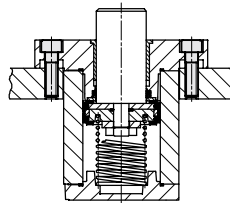
Through-hole mounting



Direct mounting

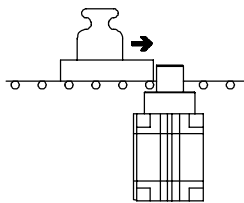


Flange mounting

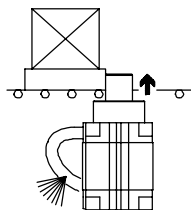


## Application options and versions

For large masses



Safety

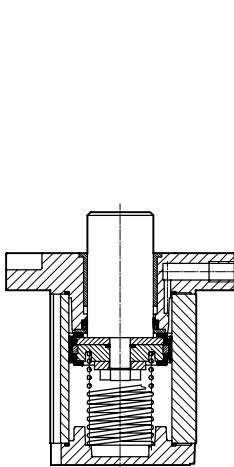


by means of piston rod spring return  
in the event of pressure failure

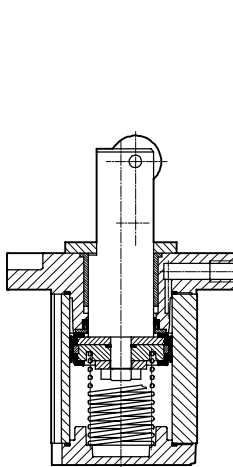
Highly effective, low noise level

Toggle lever version with integrated  
shock absorber facilitates precise and  
gentle stopping of the workpiece  
carrier

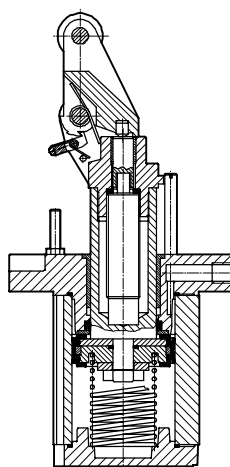
Trunnion version



Roller version



Toggle lever version



Special-function drives  
Stopper cylinders

5.2

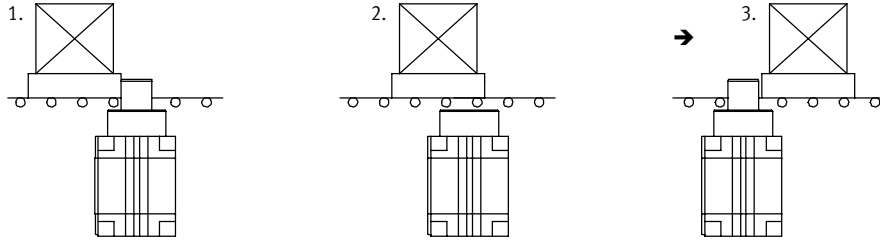
# Stopper cylinders STA/STAF

Features

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## Trunnion version

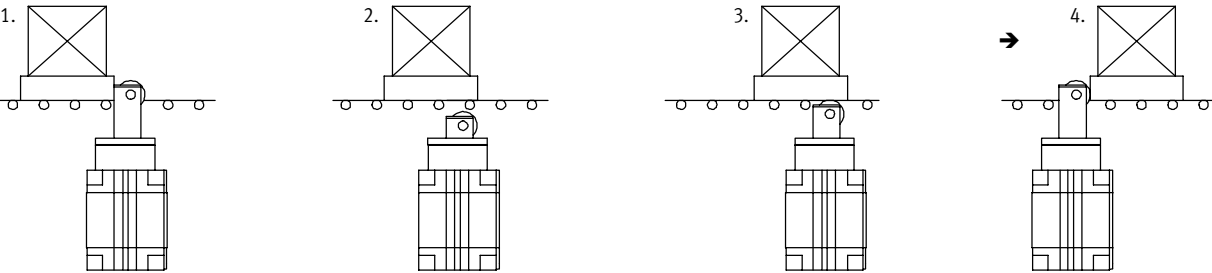
Technical data → 1 / 5.2-12



1. Sudden braking of the workpiece carrier via the piston rod.
2. The workpiece carrier is released by activating the cylinder. The control system must hold the piston down until the workpiece carrier has passed the stopper cylinder.
3. The piston rod then advances by means of spring force or compressed air. The next workpiece carrier can then be stopped.

## Roller version

Technical data → 1 / 5.2-16



1. Sudden braking of the workpiece carrier via the piston rod.
2. The workpiece carrier is released by activating the cylinder.
3. The piston rod then advances by means of spring force or compressed air until the roller makes contact with the workpiece carrier. The workpiece carrier continues to move forward.
4. After the workpiece carrier has passed, the piston rod advances to the end position. The next workpiece carrier can then be stopped.

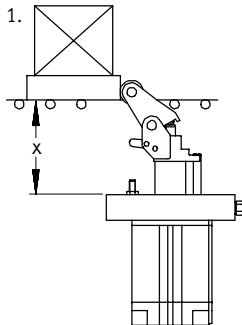
# Stopper cylinders STA/STAF

Features

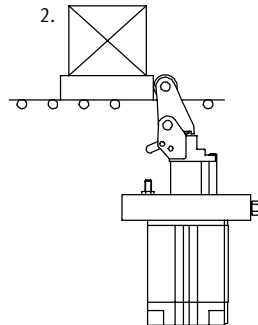
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## Toggle lever version

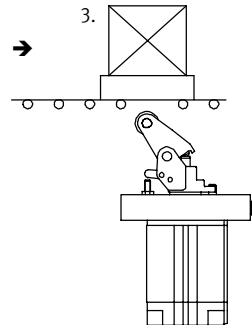
Technical data → 1 / 5.2-20



1. Gentle stopping of heavy loads via a hydraulic shock absorber in the piston rod.

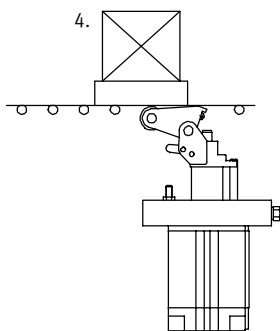


2. The toggle lever is latched into the retracted end position so that the workpiece carrier cannot be pushed back by the shock absorber.

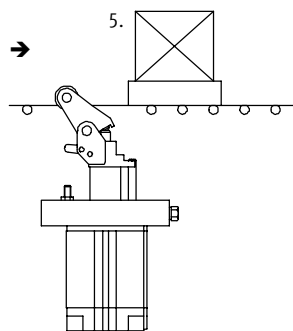


3. The workpiece carrier is released by means of compressed air, and the toggle lever is released simultaneously.

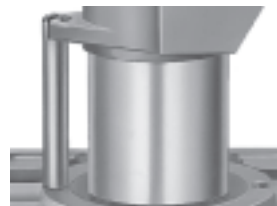
X = STAF-32:	62.8 ... 63.4 mm
STAF-50:	96.5 ... 99.5 mm
STAF-80:	163 ... 166 mm



4. The piston is extended by means of spring force or compressed air. The toggle lever tips back which prevents the workpiece carrier from being lifted.



5. The toggle lever is raised by means of spring force and stops the next workpiece carrier.



Protection against rotation:  
The guide rod always aligns the toggle lever precisely to the approaching workpiece carrier.



Integrated shock absorber: Absorbs impact energy and stops the workpiece carrier gently, and with low noise levels.  
The impact energy can be adjusted using the regulating screw in the toggle lever.



Detenting roller lever: The workpiece carrier cannot be pushed back by the shock absorber.



Locking mechanism for disabling the stopper function: The workpiece carrier is able to pass the holding point without activating the cylinder.

Note

Trunnion or roller type stopper cylinders can be mounted in any position.  
Stopper cylinders with toggle lever must be mounted in the vertical, upright position.

# Stopper cylinders STA/STAF

Features

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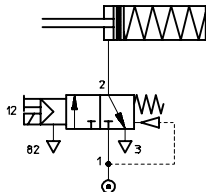
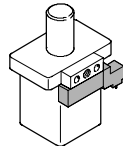
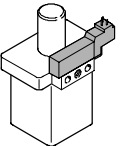
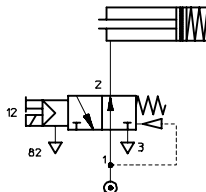
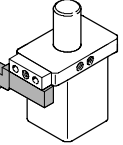
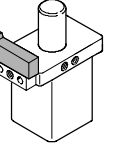
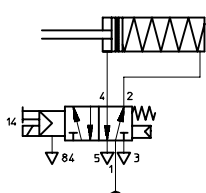
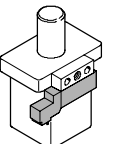
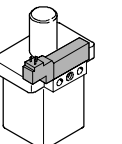
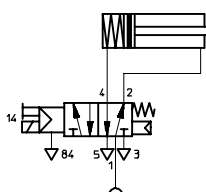
## Mounting options for solenoid valves and valve functions

An MEH, MEBH, MOEH or MOEBH solenoid valve can be mounted on the stopper cylinder for quick, direct actuation of the cylinder. This type of

actuation is only possible for stopper cylinders with flange mounting. The valve must be mounted on the flange

plate via a ZVA valve sub-base. The position of the piston rod when the solenoid valve is in the normal

position depends upon the valve type and the position of the valve on the cylinder.

Application	Piston rod initial position	Required solenoid valve	Type of mounting for the solenoid valve with sub-base ZVA
	Single-acting		
		Normally extended 173 125 MEH-3/2-5,0-B 172 999 MEBH-3/2-5,0-B	 
		Normally retracted 173 429 MOEH-3/2-5,0-B 173 002 MOEBH-3/2-5,0-B	 
	Double-acting		
		Normally extended 173 128 MEH-5/2-5,0-B 173 005 MEBH-5/2-5,0-B	 
		Normally retracted 173 128 MEH-5/2-5,0-B 173 005 MEBH-5/2-5,0-B	



Note

Cylinders are always supplied single-acting with spring. If a double-acting stopper cylinder is required, the filter

nipple in the exhaust port must be removed. The exhaust port is then used as a supply port.

Solenoid valves MEH, MEBH  
→ Volume 2

# Stopper cylinders STA/STAF

Features

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## Selection aid

Complete the following three steps for quick and accurate selection of a suitable stopper cylinder:

1. If gentle cushioning is required in your application in order to avoid vibration and shifting of the workpiece, and to reduce noise, use a stopper cylinder with toggle lever (graph 2).
2. Check to see whether or not the stopper cylinder covers the desired working range (see graph 1 and selection example).
3. Check to see whether or not the installation dimensions for the selected cylinder fulfil your requirements.

## Example

A workpiece carrier with workpiece (material-dependent frictional value  $\mu = 0.1$ ) and a total weight of 200 kg moving at a speed of 17.5 m/min is to be stopped gently. The intersection of the vertical line in graph toggle lever version STAF-80 → 1 / 5.2-8 (impact

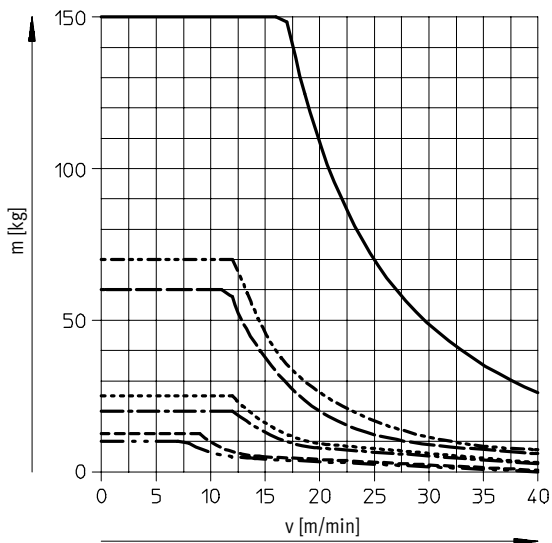
mass) and the horizontal line (impact velocity) is within the working range of the stopper cylinder (with toggle lever) STAF-80-40-P-A-K, i.e. this stopper cylinder fulfils the requirement and can be utilised.

The maximum permissible kinetic impact energy on the piston rod of stopper cylinders must not be exceeded. Mechanical failure of the cylinder may otherwise result. The values in the graph presuppose the

use of a flexible buffer on the workpiece carrier with a deformation capacity of 1 mm for trunnion and roller type stopper cylinders.

## Impact velocity $v$ as a function of the impact mass $m$

Trunnion or roller version



- STAF-80-30-P-A-R
- STAF-80-40-P-A-R
- - - STA...-50-30-P-A
- - - STA...-50-30-P-A-R
- - - STA...-32-20-P-A
- - - STA...-32-20-P-A-R
- - - STA-20-15-P-A
- - - STA-20-15-P-A-R

# Stopper cylinders STA/STAF

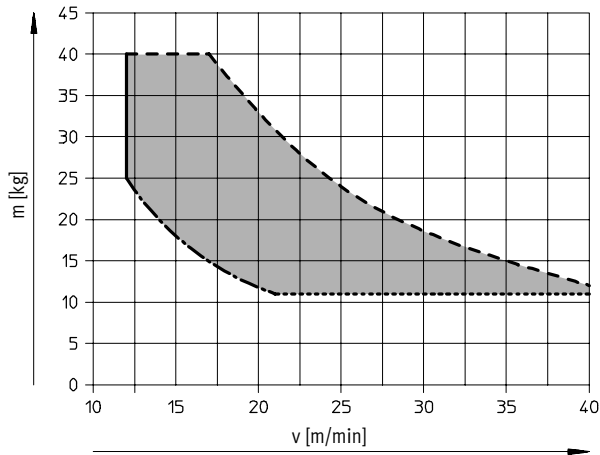
Features

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## Impact velocity $v$ as a function of the impact mass $m$

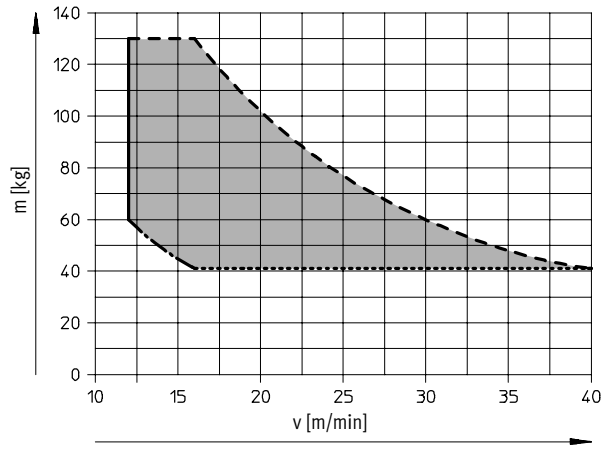
Toggle lever version

STAF-32 with a frictional value of  $\mu = 0.1$



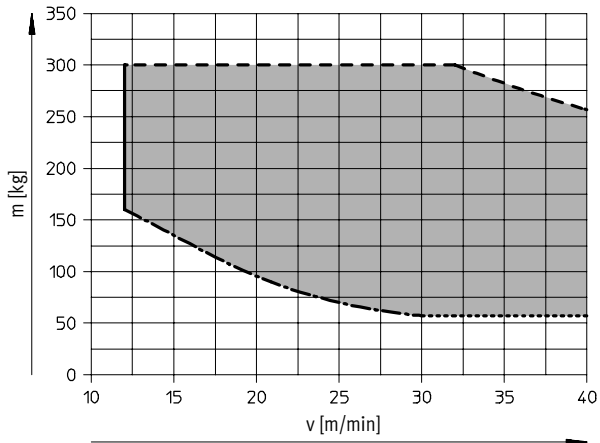
Toggle lever version

STAF-50 with a frictional value of  $\mu = 0.1$



Toggle lever version

STAF-80 with a frictional value of  $\mu = 0.1$



- Operational range
- Max. utilisation
- Recommended minimum utilisation<sup>1)</sup>
- Required mass<sup>2)</sup>

- 1) For optimal shock absorber operation.
- 2) Required mass for the toggle lever to be fully depressed to the end position with this frictional value.

### Note

The required mass for the full depression of the lever is dependent on the frictional mating between conveyor belt and transported material, other frictional values available on

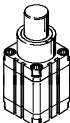
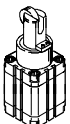
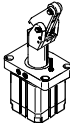
request. The cushioning time increases in the partial load range. Energy values are valid for room temperature  $T = 20^\circ\text{C}$ .



# Stopper cylinders STA/STAF

Product range overview

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Function	Design	Type	Piston $\varnothing$ [mm]	Stroke [mm]	Type of mounting DirectWith flange		Cushioning P	Position sensing A	→ Page
Single or double- acting	Basic version								
		Trunnion version	20	15	■	–	■	■	1 / 5.2-12
			32	20	■	■	■	■	
			50	30	■	■	■	■	
		Roller version	20	15	■	–	■	■	1 / 5.2-16
			32	20	■	■	■	■	
			50	30	■	■	■	■	
			80	30, 40	–	■	■	■	
		Toggle lever version	32	20	–	■	■	■	1 / 5.2-20
			50	30	–	■	■	■	
			80	40	–	■	■	■	

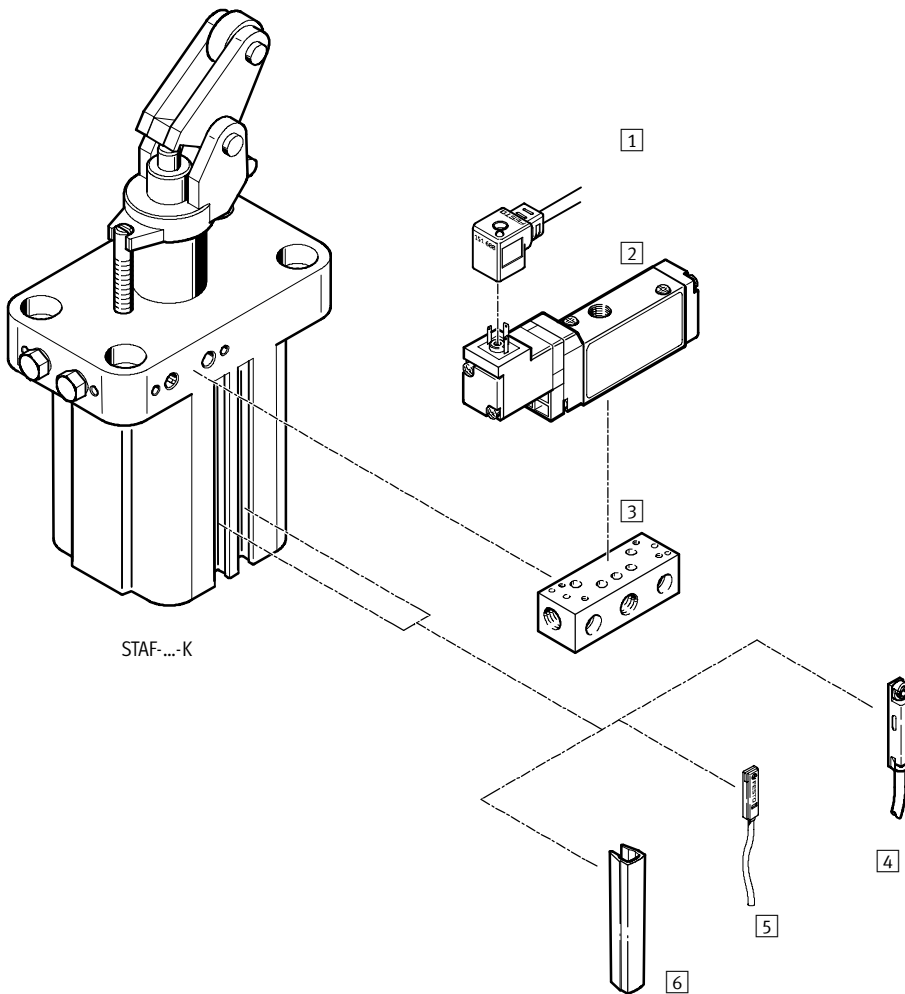
Special-function drives  
Stopper cylinders

**5.2**

# Stopper cylinders STA/STAF

Peripherals overview

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Accessories		
	Brief description	→ Page
1	Plug socket with cable KMEB	– Volume 2
2	3/2-way valve MEBH	For fast and direct actuation of the stopper cylinder Volume 2
3	Sub-base ZVA	For stopper cylinder with flange 1 / 5.2-23
4	Proximity sensors SME/SMT-8F	Can be integrated in the cylinder profile barrel from above 1 / 5.2-25
5	Proximity sensors SME/SMT-8	Can be integrated flush with the cylinder profile barrel 1 / 5.2-25
6	Slot cover ABP	To protect the sensor cable and keep dirt out of the sensor slots 1 / 5.2-25

# Stopper cylinders STA/STAF

Type codes



STA		-	20	-	15	-	P	-	A	
<b>Type</b>										
Single-acting or double-acting										
STA	Stopper cylinder									
STAF	Stopper cylinder with flange mounting									
<b>Piston Ø [mm]</b>										
<b>Stroke [mm]</b>										
<b>Cushioning</b>										
P	Non-adjustable at either end									
<b>Sensing</b>										
A	Position sensing									
<b>Design</b>										
	Trunnion version									
R	Roller version									
K	Toggle lever version									




# Stopper cylinders STA/STAF, trunnion


Technical data

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Function



-  - Diameter  
20 ... 50 mm
-  - Stroke length  
15 ... 30 mm
-  - [www.festo.com/en/Spare\\_parts\\_service](http://www.festo.com/en/Spare_parts_service)

-  - Note  
Contact with liquids must be avoided during use.

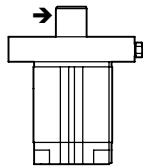


General technical data				
Piston Ø		20	32	50
Pneumatic connection	STA	M5	G $\frac{1}{8}$	G $\frac{1}{8}$
	STAF	–	M5	G $\frac{1}{8}$
Stroke	[mm]	15	20	30
Piston rod Ø	[mm]	12	20	32
Operating pressure	[bar]	10		
Operating medium		Filtered compressed air, lubricated or unlubricated		
Design		Piston cylinder with spring return		
Cushioning		Non-adjustable		
Position sensing		Via proximity sensor		
Type of mounting		Via through-holes		
		Using female threads		
Mounting position		Any		
Mode of operation		Single-acting or double-acting		
Protection against torsion		None		
Ambient temperature <sup>1)</sup>	[°C]	+5 ... +60		

1) Note operating range of proximity sensors

Forces [N]			
Piston Ø	20	32	50
Impact force	260	1,000	2,900
Spring force	13 ... 18	20 ... 42	47 ... 64

Impact force is the basis for the calculation of permissible impact energy. Depending upon the type of load to be stopped, it is advisable to use a flexible buffer to cushion the impact, reduce noise levels and to optimise impact energy.



→ = Direction of impact force

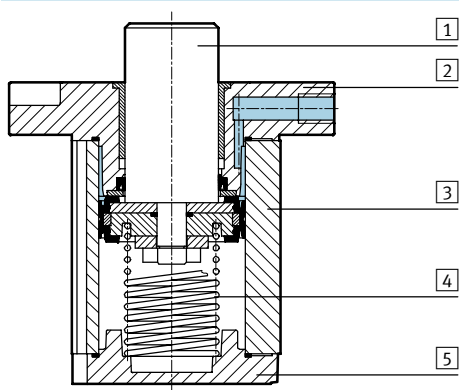
# Stopper cylinders STA/STAF, trunnion

Technical data



## Materials

### Sectional view



Stopper cylinder		
1	Piston rod	Stainless steel
2	Flange	Die-cast aluminium
3	Cylinder barrel	Anodised aluminium
4	Springs	Spring steel
5	Plug cap	Anodised aluminium
-	Seals	Polyurethane
-	Note on material	Free of copper, PTFE and silicone

# Stopper cylinders STA/STAF, trunnion

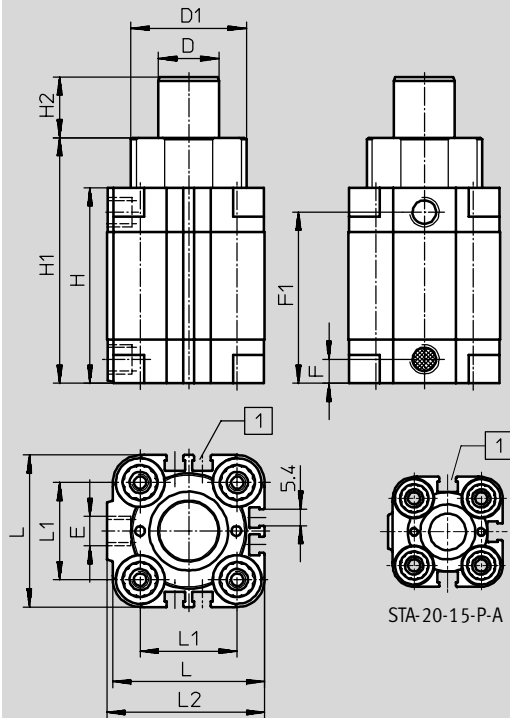
Technical data

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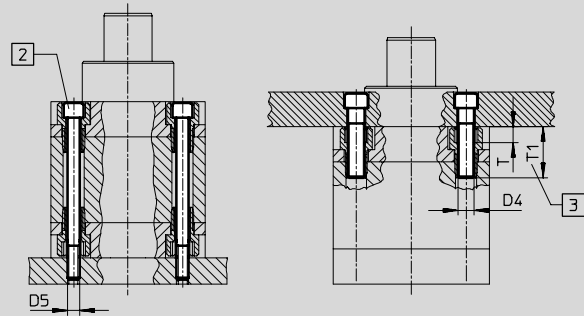
## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

### Direct mounting



STA-20-15-P-A



- Note

The socket head screw may only be inserted via the bearing cap for design reasons.

1 Sensor slot for proximity sensor SME/SMT-8

2 Socket head screw to DIN 912, screwed through

3 Recommended minimum screw-in depth

Ø	Stroke	D	D1	D4	D5	E	F	F1	H	H1	H2	L	L1	L2	T	T1
[mm]	[mm]	Ø	Ø													
20	15	12	26	M5	M4	M5	8	45	53	64.5	15	36	22	37.5	4	18
32	20	20	38	M6	M5	G <sup>1</sup> / <sub>8</sub>	8	56.5	64.5	80.5	20	50	32	52	5	20
50	30	32	53	M8	M6	G <sup>1</sup> / <sub>8</sub>	8	67.5	75.5	99.5	30	68	50	71	6	20

# Stopper cylinders STA/STAF, trunnion

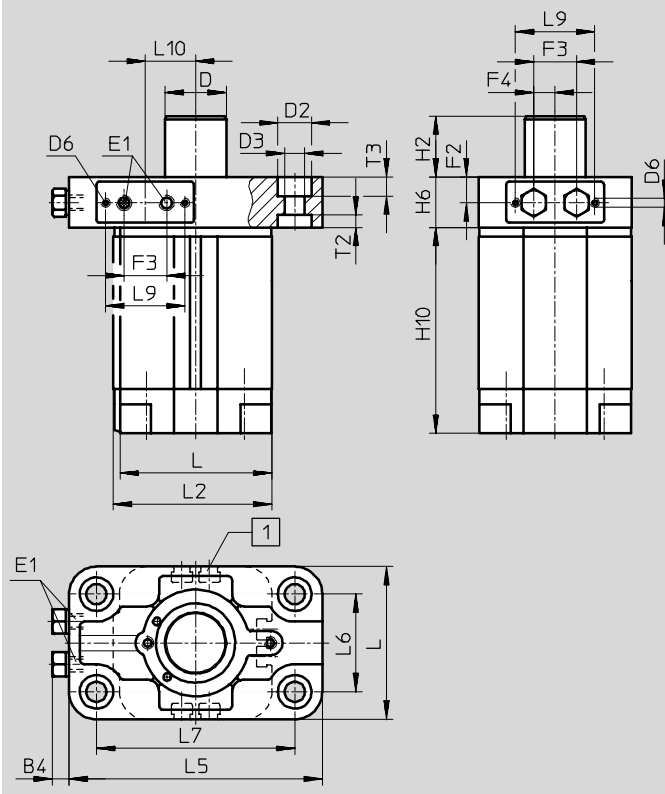
Technical data

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## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

### Flange mounting



1 Sensor slot for proximity sensor  
SME/SMT-8

Ø	Stroke	B4	D	D2	D3	D6	E1	F2	F3	F4	H2
[mm]	[mm]		Ø	Ø	Ø						
32	20	4.5	20	11	6.6	M3	M5	8.5	14	7	20
50	30	4.5	32	15	9	M4	G $\frac{1}{8}$	9	17	8	30

Ø	Stroke	H6	H10	L	L2	L5	L6	L7	L9	L10	T2	T2
[mm]	[mm]											
32	20	16.5	67.5	50	52	83	32	65	26	16.5	4	6.2
50	30	18	85	68	71	111	45	90	36	7	5	5

## Ordering data

Piston Ø [mm]	Stroke [mm]	Direct mounting		Flange mounting	
		Part No.	Type	Part No.	Type
20	15	164 887	STA-20-15-P-A	-	-
32	20	164 888	STA-32-20-P-A	164 890	STAF-32-20-P-A
50	30	164 889	STA-50-30-P-A	164 891	STAF-50-30-P-A


# Stopper cylinders STA/STAF, roller


Technical data

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Function



- $\varnothing$  - Diameter  
20 ... 80 mm
- $|$  - Stroke length  
15 ... 40 mm
-  - [www.festo.com/en/Spare\\_parts\\_service](http://www.festo.com/en/Spare_parts_service)

-  - **Note**  
Contact with liquids must be avoided during use.

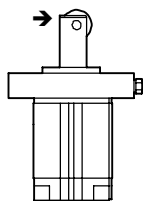


General technical data					
Piston Ø		20	32	50	80
Pneumatic connection	STA	M5	G¼	G¼	–
	STAF	–	M5	G¼	G¼
Stroke	[mm]	15	20	30	30/40
Piston rod Ø	[mm]	12	20	32	50
Operating pressure	[bar]	10			
Operating medium		Filtered compressed air, lubricated or unlubricated			
Design		Piston cylinder with spring return			
Cushioning		Non-adjustable			
Position sensing		Via proximity sensor			
Type of mounting		Via through-holes			
		Using female threads			
Mounting position		Any			
Mode of operation		Single-acting or double-acting			
Protection against torsion		Flat-sided piston rod			
Ambient temperature <sup>1)</sup>	[°C]	+5 ... +60			

1) Note operating range of proximity sensors

Forces [N]					
Piston $\varnothing$		20	32	50	80
Stroke		15	20	30	30    40
Impact force		170	830	2,300	14,600    13,300
Spring force		13 ... 18	20 ... 42	47 ... 64	79 ... 115    101 ... 170

Impact force is the basis for the calculation of permissible impact energy. Depending upon the type of load to be stopped, it is advisable to use a flexible buffer to cushion the impact, reduce noise levels and to optimise impact energy.



➔ = Direction of impact force



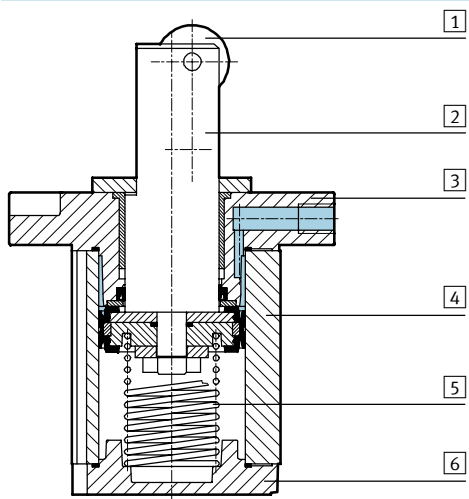
# Stopper cylinders STA/STAF, roller

Technical data



## Materials

Sectional view



Stopper cylinder		
1	Roller	Polymer
2	Piston rod	Stainless steel
3	Flange	Die-cast aluminium
4	Cylinder barrel	Anodised aluminium
5	Springs	Spring steel
6	Plug cap	Anodised aluminium
-	Seals	Polyurethane
-	Note on material	Free of copper, PTFE and silicone

# Stopper cylinders STA/STAF, roller

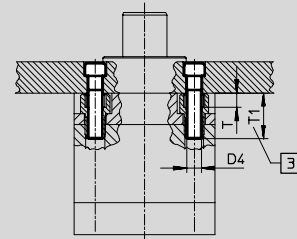
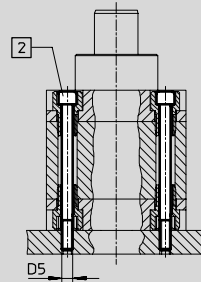
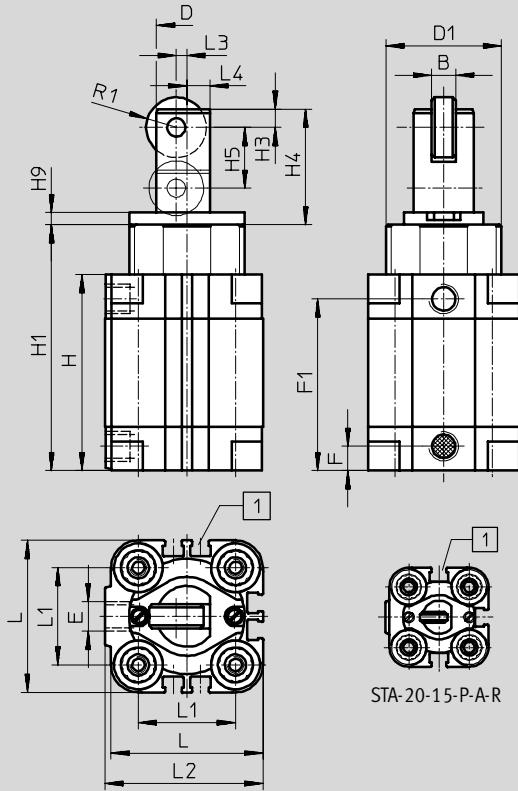
Technical data

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## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

### Direct mounting



Note

The socket head screws may only be inserted via the bearing cap for design reasons.

1 Sensor slot for proximity sensor SME/SMT-8

2 Socket head screw to DIN 912, screwed through

3 Recommended minimum screw-in depth

Ø	Stroke	B	D	D1	D4	D5	E	F	F1	H	H1	H3
[mm]	[mm]		Ø	Ø								
20	15	4	12	26	M5	M4	M5	8	45	53	64.5	3
32	20	8	20	38	M6	M5	G1/8	8	56.5	64.5	80.5	6
50	30	10	32	53	M8	M6	G1/8	8	67.5	75.5	99.5	6

Ø	Stroke	H4	H5	H9	L	L1	L2	L3	L4	R1	T	T1
[mm]	[mm]											
20	15	24	15	4	36	22	37.5	2	4.5	5	4	18
32	20	38	20	4	50	32	52	3.5	7.5	9	5	20
50	30	50.5	30	5	68	50	71	7	12	12.5	6	20

# Stopper cylinders STA/STAF, roller

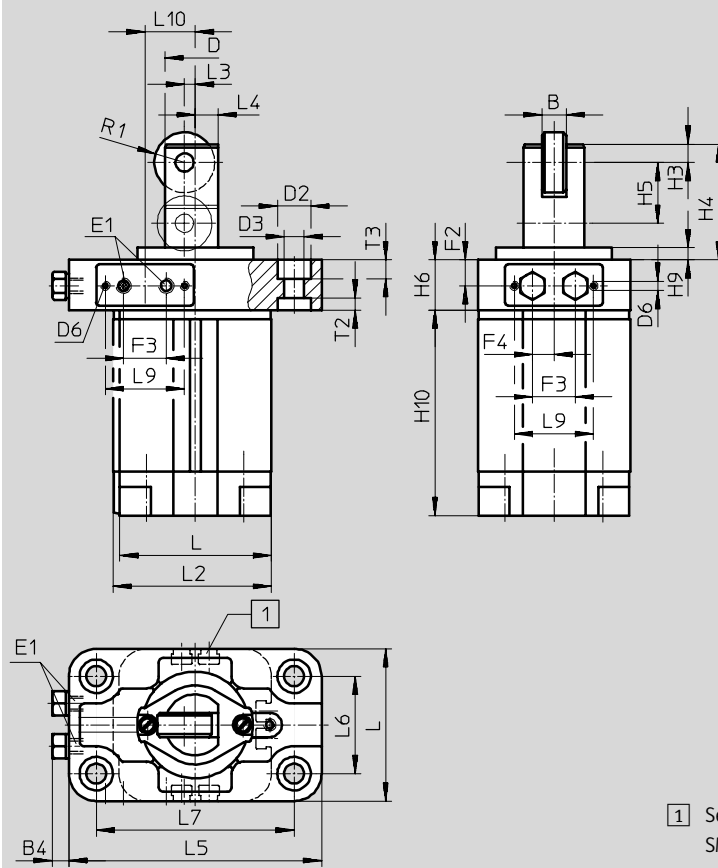
Technical data

**FESTO**

## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

### Flange mounting



1 Sensor slot for proximity sensor  
SME/SMT-8

Ø [mm]	Stroke [mm]	B	B4	D Ø	D2 Ø	D3 Ø	D6	E1	F2	F3	F4	H3	H4	H5	H6
32	20	8	4.5	20	11	6.6	M3	M5	8.5	14	7	6	38	20	16.5
50	30	10	4.5	32	15	9	M4	G $\frac{1}{8}$	9	17	8	6	50.5	30	18
80	30	18	4.5	50	18	11	M4	G $\frac{1}{8}$	11	17	4.5	10	63	30	22
	40												73	40	

Ø [mm]	Stroke [mm]	H9	H10	L	L2	L3	L4	L5	L6	L7	L9	L10	R1	T2	T3
32	20	4	67.5	50	52	3.5	7.5	83	32	65	26	16.5	9	4	6.2
50	30	5	85	68	71	7	12	111	45	90	36	7	12.5	5	5
80	30	8	119	107	111	11	18	160	63	135	36	18.5	18	6	6
	40		129												

## Ordering data

Piston Ø [mm]	Stroke [mm]	Direct mounting		Flange mounting	
		Part No.	Type	Part No.	Type
20	15	164 883	STA-20-15-P-A-R	-	-
32	20	164 884	STA-32-20-P-A-R	164 892	STAF-32-20-P-A-R
50	30	164 885	STA-50-30-P-A-R	164 893	STAF-50-30-P-A-R
80	30	-	-	164 886	STAF-80-30-P-A-R
80	40	-	-	164 894	STAF-80-40-P-A-R




# Stopper cylinders STA/STAF, toggle lever

Technical data

FESTO

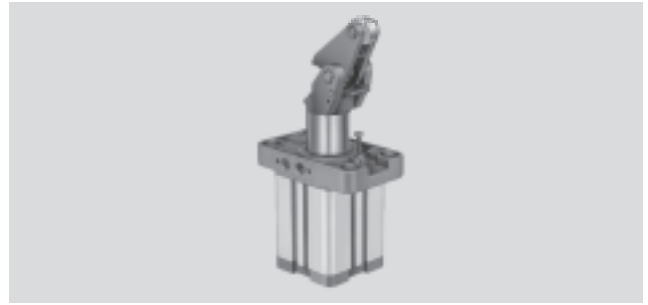
## Function



-  Diameter  
32 ... 80 mm
-  Stroke length  
20 ... 40 mm
-  [www.festo.com/en/Spare\\_parts\\_service](http://www.festo.com/en/Spare_parts_service)

-  - Note

Contact with liquids must be avoided during use.

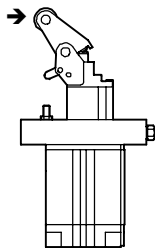


General technical data			
Piston Ø	32	50	80
Pneumatic connection	M5	G $\frac{1}{8}$	G $\frac{1}{8}$
Stroke [mm]	20	30	40
Piston rod Ø [mm]	20	32	50
Operating pressure [bar]	10		
Operating medium	Filtered compressed air, lubricated or unlubricated		
Design	Piston cylinder with spring return		
Cushioning	Non-adjustable		
Position sensing	Via proximity sensor		
Type of mounting	Via through-holes		
Mounting position	Vertical, upright		
Mode of operation	Single-acting or double-acting		
Protection against torsion	Guide rod		
Ambient temperature <sup>1)</sup> [°C]	+5 ... +60		

1) Note operating range of proximity sensors

Forces [N]			
Piston Ø	32	50	80
Impact force	480	1,200	6,400
Spring force	20 ... 42	47 ... 64	101 ... 170

Impact force is the basis for the calculation of permissible impact energy. Depending upon the type of load to be stopped, it is advisable to use a flexible buffer to cushion the impact, reduce noise levels and to optimise impact energy.



→ = Direction of impact force

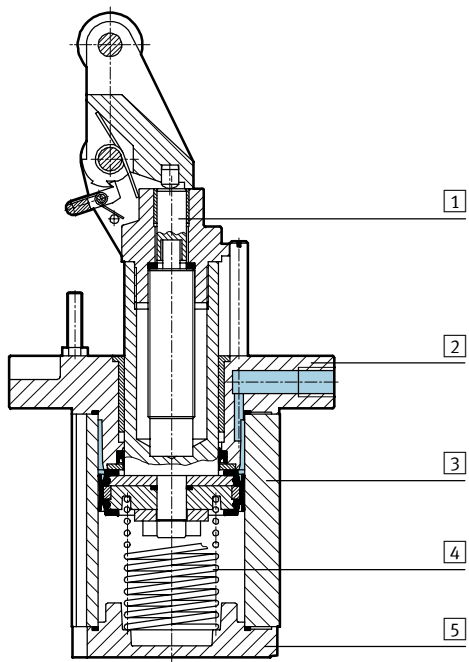
# Stopper cylinders STA/STAF, toggle lever

Technical data



Materials

Sectional view



Stopper cylinder		
1	Piston rod	Stainless steel
2	Flange	Die-cast aluminium
3	Cylinder barrel	Anodised aluminium
4	Springs	Spring steel
5	Plug cap	Anodised aluminium
-	Seals	Polyurethane
-	Note on material	Free of copper, PTFE and silicone

Special-function drives  
Stopper cylinders

5.2

# Stopper cylinders STA/STAF, toggle lever

Technical data

FESTO

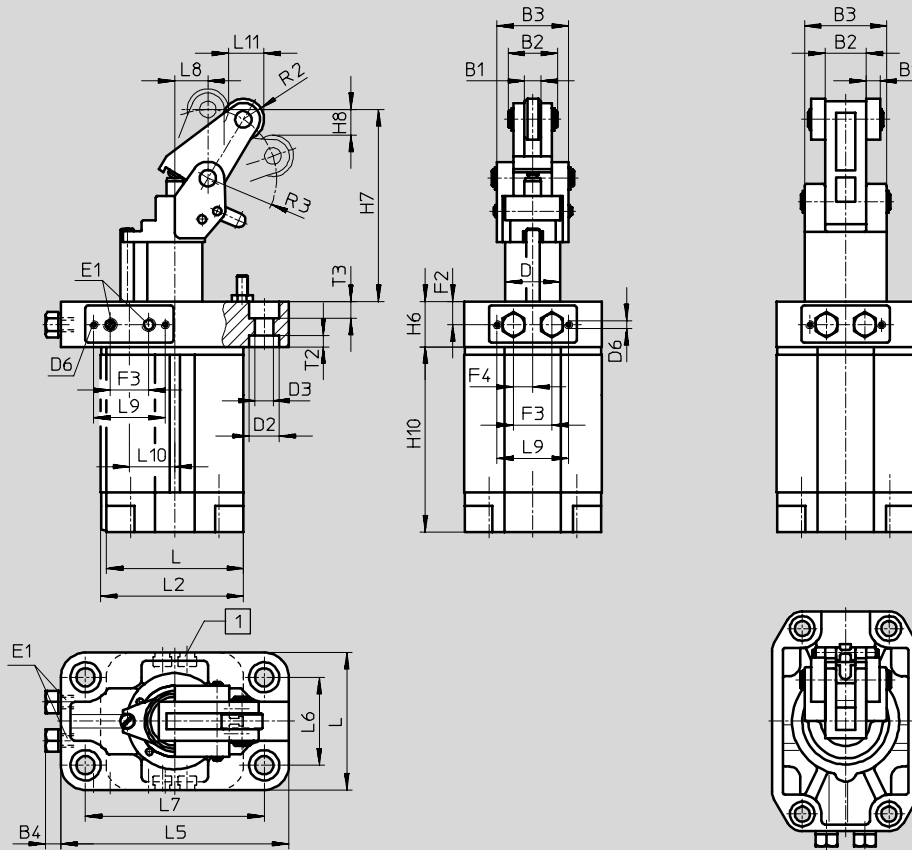
## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

### Flange mounting

STAF-80-40-P-A-K:

Toggle lever with double roller



1 Sensor slot for proximity sensor SME/SMT-8

Ø	Stroke	B1	B2	B3	B4	D	D2	D3	D6	E1	F2	F3	F4	H6	H7	H8
[mm]	[mm]					Ø	Ø	Ø								
32	20	6	18	26	4.5	20	11	6.6	M3	M5	8.5	14	7	16.5	70	9.5
50	30	10	27	38	4.5	32	15	9	M4	G $\frac{1}{8}$	9	17	8	18	106	12
80	40	10	30	60	4.5	50	18	11	M4	G $\frac{1}{8}$	11	17	4.5	22	182.5	23

Ø	Stroke	H10	L	L2	L5	L6	L7	L8	L9	L10	L11	R2	R3	T2	T3
[mm]	[mm]														
32	20	67.5	50	52	83	32	65	12	26	16.5	13	7.5	25	4	6.2
50	30	85	68	71	111	45	90	21	36	7	17	11	39	5	5
80	40	129	107	111	160	63	135	30	36	18.5	34	16	60	6	6

## Ordering data

Piston Ø [mm]	Stroke [mm]	Direct mounting		Flange mounting	
		Part No.	Type	Part No.	Type
32	20	—	—	164 880	STAF-32-20-P-A-K
50	30	—	—	164 881	STAF-50-30-P-A-K
80	40	—	—	164 895	STAF-80-40-P-A-K

# Stopper cylinders STA/STAF

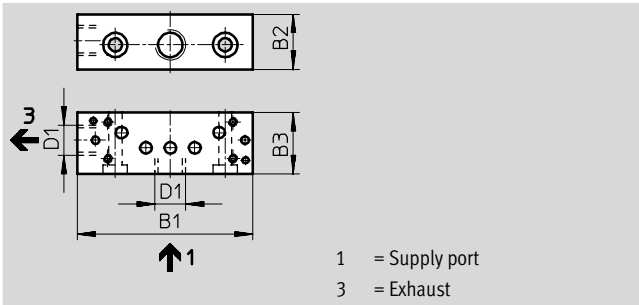
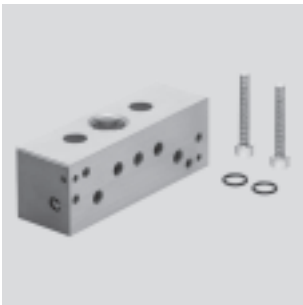
Accessories



## Sub-base ZVA

for stopper cylinder with flange

Material:  
Wrought aluminium alloy  
Free of copper, PTFE and silicone



Dimensions and ordering data								
For Ø	B1	B2	B3	D1	CRC <sup>1)</sup>	Weight	Part No.	Type
[mm]						[g]		
32	56	18	20	G1/8	2	50	164 896	ZVA-1
50/80	57.5	18	20	G1/8	2	52	164 897	ZVA-2

1) Corrosion resistance class 2 according to Festo standard 940 070  
Components requiring moderate corrosion resistance. Externally visible parts with primarily decorative surface requirements which are in direct contact with a surrounding industrial atmosphere or media such as cooling or lubricating agents.

# Stopper cylinders STA/STAF

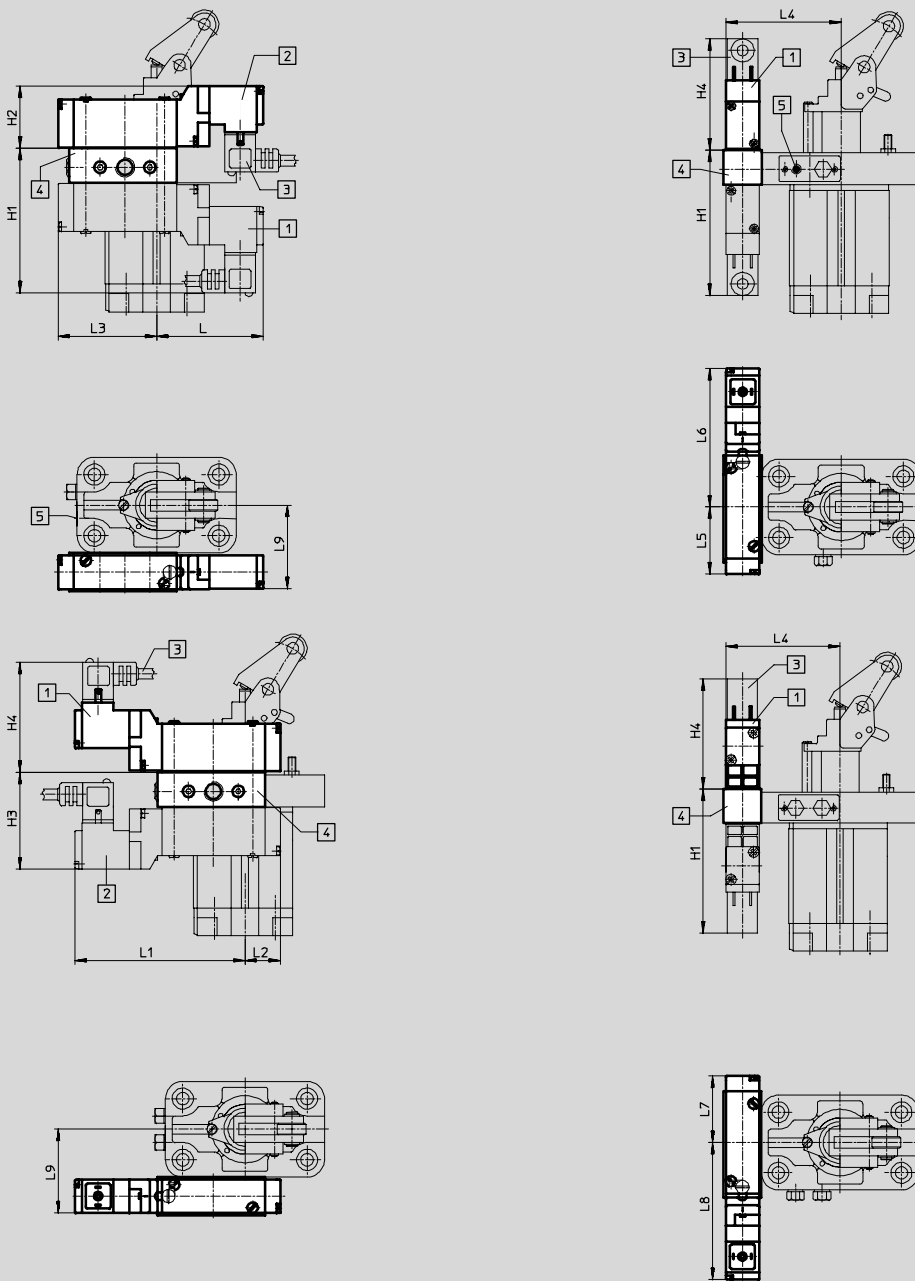
Accessories

FESTO

## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

Mounting dimensions for solenoid valves with sub-base ZVA on stopper cylinders



- 1 Solenoid can be repositioned by 180°
- 2 Solenoid rotated 180° (not as supplied)
- 3 Plug socket KME
- 4 Sub-base
- 5 Filter nipple with 3/2-way valves, sealing plug with 5/2-way valves

For Ø [mm]	L	L1	L2	L3	L4	L5	L6
32	55.5	88.5	18.5	51.5	59	35	72
50	65	79	28	42	73	36	71
80	48.5	95.5	11.5	58.5	98	39	68




For Ø [mm]	L7	L8	L9	H1	H2	H3	H4
32	35	72	42	74.5	33.5	48.5	59.5
50	34	73	52	77	31	31	57
80	31	76	71	79	29	53	56












# Stopper cylinders STA/STAF

Accessories

FESTO

Ordering data – Proximity sensors for slot type 8, magneto-resistive							Technical data ➔ 1 / 10.2-13	
	Mounting	Switch output	Electrical connection			Cable length [m]	Part No.	Type
			Cables	M8 plug	M12 plug			
NO contact								
	Via accessories	PNP	3-wire	–	–	2.5	525 898	SMT-8F-PS-24V-K2,5-OE
		NPN					525 909	SMT-8F-NS-24V-K2,5-OE
		–	2-wire	–	–	2.5	525 908	SMT-8F-ZS-24V-K2,5-OE
		PNP	–	3-pin	–	0.3	525 899	SMT-8F-PS-24V-K0,3-M8D
		NPN					525 910	SMT-8F-NS-24V-K0,3-M8D
		PNP	–	–	3-pin	0.3	525 900	SMT-8F-PS-24V-K0,3-M12
	Via accessories	PNP	3-wire	–	–	2.5	175 436	SMT-8-PS-K-LED-24-B
			–	3-pin	–	0.3	175 484	SMT-8-PS-S-LED-24-B
NC contact								
	Via accessories	PNP	3-wire	–	–	7.5	525 911	SMT-8F-PO-24V-K7,5-OE

Ordering data – Proximity sensors for slot type 8, magnetic reed						Technical data ➔ 1 / 10.2-18	
	Mounting	Electrical connection		Cable length [m]	Part No.	Type	
		Cables	M8 plug				
NO contact							
	Via accessories	3-wire	–	2.5	525 895	SME-8F-DS-24V-K2,5-OE	
				5.0	525 897	SME-8F-DS-24V-K5,0-OE	
		2-wire	–	2.5	525 907	SME-8F-ZS-24V-K2,5-OE	
				–	3-pin	0.3	525 896
	Via accessories	3-wire	–	2.5	150 855	SME-8-K-LED-24	
		–	3-pin	0.3	150 857	SME-8-S-LED-24	
NC contact							
	Via accessories	3-wire	–	7.5	525 906	SME-8F-DO-24V-K7,5-OE	

Ordering data – Plug sockets						Technical data ➔ 7 / 1.1-104	
	Mounting	Switch output		Connection	Cable length [m]	Part No.	Type
		PNP	NPN				
Straight socket							
	M8 union nut			3-pin	2.5	159 420	SIM-M8-3GD-2,5-PU
					5	159 421	SIM-M8-3GD-5-PU
Angled plug socket							
	M8 union nut			3-pin	2.5	159 422	SIM-M8-3WD-2,5-PU
					5	159 423	SIM-M8-3WD-5-PU

Ordering data – Slot cover for slot type 8				
	Mounting	Length [m]	Part No.	Type
	Insertable from above	2x 0.5	151 680	ABP-5-S

Core Range