Compact cylinder CDC, to ISO 21287, clean design

Key features

Design

- The cylinder series CDC (Clean Design Compact) provides an easy-to-clean, compact cylinder variant for the modular system ADN
- It is based on ISO 21287 for compact cylinders, and is characterised by short strokes and a compact design, just like compact cylinder ADN
- Space savings of up to 50% compared with standard ISO 15552
- The compact cylinder CDC is designed as a double-acting pneumatic cylinder with piston, piston rod and profile barrel

Easy to clean

- Clean design means smooth surfaces without grooves and edges, making it difficult for dirt to accumulate
- For hygiene reasons, the threads on the cylinder caps should be sealed with suitable cover screws
- Resistant to conventional cleaning agents
- Increased corrosion protection

Easy to install

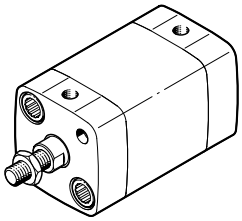
- Comprehensive range of mounting accessories for just about every type of installation
- Contactless position sensing via proximity switches

Flexible

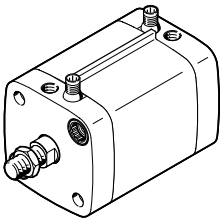
- The variants can be configured according to individual needs using a modular product system
- Excellent flexibility thanks to a wide range of variants

Variants

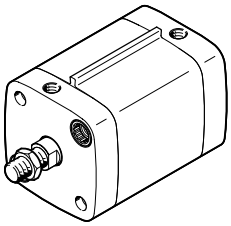
CDC-...
- Ø 20, 25 mm
- Without position sensing



CDC-...-A...-R
- Ø 32 ... 80 mm
- With position sensing integrated in the end positions



CDC-...-A-R
- Ø 32 ... 80 mm
- With sensor mounting rail for external position sensing

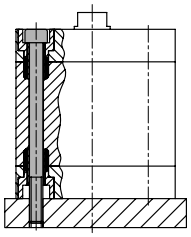


Note

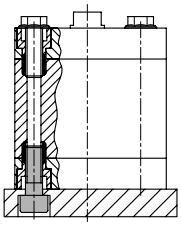
A combination with both integrated and external position sensing is possible.

Mounting options

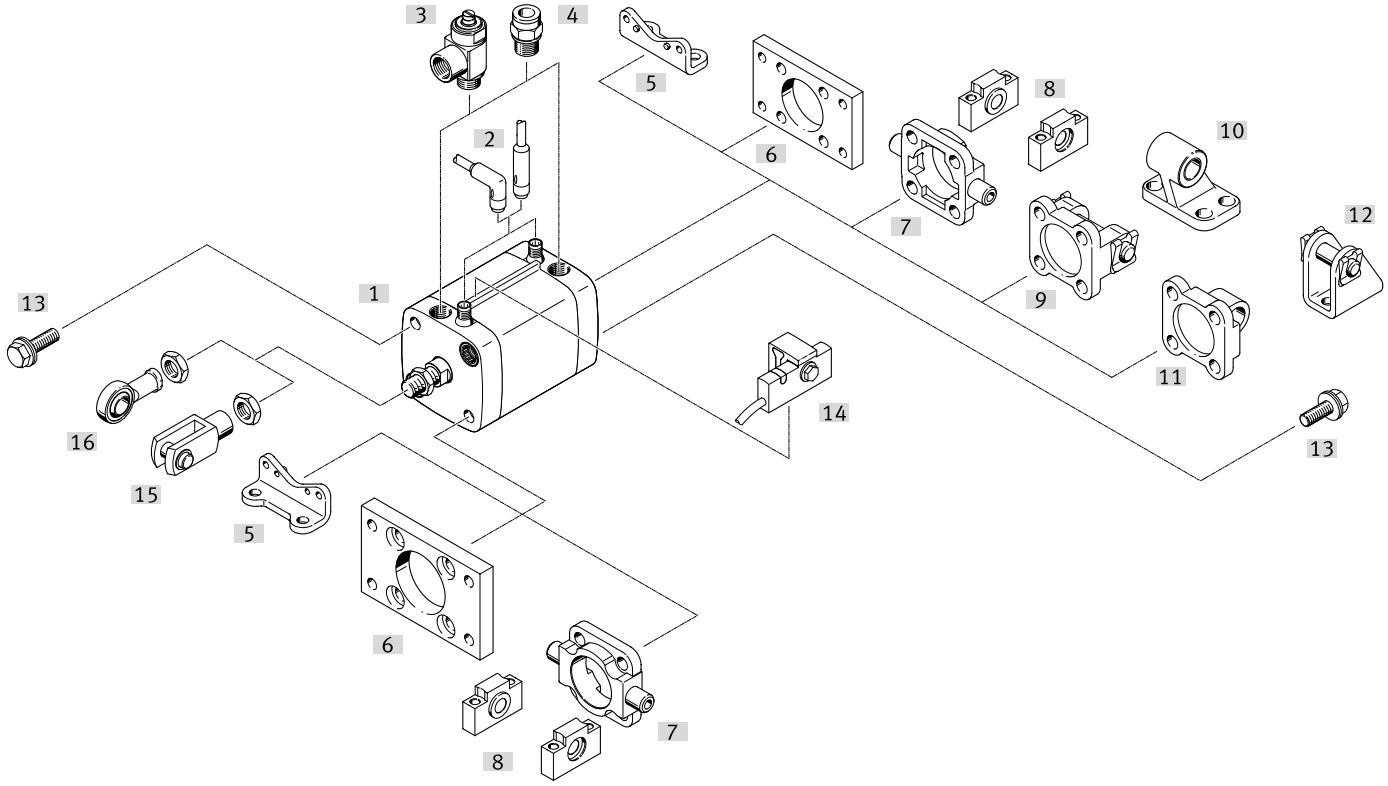
With through screws



Direct mounting



Peripherals overview



Mounting attachments and accessories

		Description	→ Page/Internet
[1]	Compact cylinder CDC	Conforms to ISO 21287	
[2]	Connecting cable NEBA	For electrical signal transmission and power supply	21
[3]	One-way flow control valve CRGRLA	For regulating speed	23
[4]	Push-in fittings NPQH/NPQH-L/CRQS/CRQSL	For connecting tubing with standard O.D.	22
[5]	Foot mounting HNA-...-R3	For bearing and end caps	17
[6]	Flange mounting CRFNG	For bearing or end caps	17
[7]	Trunnion flange CRZNG	For bearing or end caps in combination with trunnion supports CRLNZG	18
[8]	Trunnion supports CRLNZG	For trunnion flange CRZNG	18
[9]	Swivel flange SNCB- ... -R3	For end caps	19
[10]	Clevis foot CRLNG	For swivel flange SNCB- ... -R3	19
[11]	Swivel flange SNCL- ... -R3	For end caps	20
[12]	Clevis foot CRLBN	For swivel flange SNCL- ... -R3	20
[13]	Cover screws DAMD-P- ...	For covering unused mounting threads	23
[14]	Proximity switch SMT-C1	For mounting on the sensor mounting rail	21
[15]	Rod clevis CRSG	Permits a swivelling movement of the cylinder in one plane	23
[16]	Rod eye CRSGS	With spherical bearing	23

Type codes

001	Series	
CDC	Standards-based cylinder, double-acting, based on ISO 21287, clean design	

002	Piston diameter	
20	20	
25	25	
32	32	
40	40	
50	50	
63	63	
80	80	

003	Stroke	
...	1 ... 500	

004	Piston rod thread type	
A	Male thread	
I	Female thread	

005	Cushioning	
P	Elastic cushioning rings/plates on both sides	

006	Position sensing	
	None	
A	For proximity sensor	
AIB	At both ends, integrated	
AIH	Rear, integrated	
AIV	Front, integrated	

007		
	None	
SME	SME (contacting)	

008		
	None	
R	Sensor mounting rail for external position sensing	

009	Piston rod type	
	At one end	
S2	Through piston rod	

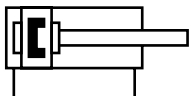
010		
	None	
...K2	1...30 mm	

011		
“M6”K5	M6	
“M8”K5	M8	
“M10”K5	M10	
“M10x1,25”K5	M10x1.25	
“M12”K5	M12	
“M16”K5	M16	
“M5”K5	M5	
“M20”K5	M20	

012		
	None	
...K8	1...500 mm	

013		
	Standard	
S6	Heat-resistant seals max. 120 °C	

Datasheet



– Ø – Diameter
20 ... 80 mm
– | – Stroke length
1 ... 500 mm
– – www.festo.com

CDC-...-A-P

CDC-...-A-P-R

General technical data								
Piston ø			20	25	32	40	50	63	80
Pneumatic connection			M5	M5	G1/8	G1/8	G1/8	G1/8	G1/8
Piston rod thread			M8	M8	M10x1.25	M10x1.25	M12x1.25	M12x1.25	M16x1.5
Design			Piston						
			Piston rod						
			Cylinder barrel						
Cushioning			Elastic cushioning rings/plates at both ends						
Position sensing		A	–		Via proximity switch				
		AIB	–		At both ends, integrated				
		AIV	–		Front, integrated				
		AIH	–		Rear, integrated				
Type of mounting			With through-hole						
			With female thread						
			With accessories						
Mounting position			Any						

Operating and environmental conditions								
Piston ø			20	25	32	40	50	63	80
Operating medium			Compressed air to ISO 8573-1:2010 [7:4:4]						
Note on the operating/pilot medium			Lubricated operation possible (in which case lubricated operation will always be required)						
Operating pressure		[bar]	0.8 ... 10		0.6 ... 10				
	S2	[bar]	1.2 ... 10		1 ... 10			0.8 ... 10	
	S6	[bar]	1 ... 10	0.6 ... 10					
Ambient temperature[1]		[°C]	–20 ... +80						
	S6	[°C]	0 ... +120						
Food-safe[2]			→ Supplementary material information						
CE marking (see declaration of conformity)			To EU EMC Directive						
UKCA marking (see declaration of conformity)			To UK EMC regulations						
Corrosion resistance class CRC[3]			3						

1) Note operating range of proximity switches.
2) More information www.festo.com/sp → Certificates.
3) More information www.festo.com/x/topic/crc

Datasheet

Forces [N] and impact energy [J]								
Piston ø		20	25	32	40	50	63	80
Theoretical force at 6 bar, advancing		188	295	483	754	1178	1870	3016
	S2	141	247	415	686	1057	1750	2827
Theoretical force at 6 bar, retracting		141	247	415	686	1057	1750	2827
Max. impact energy in the end positions		0.2	0.3	0.4	0.7	1	1.3	1.8
	S6	0.1	0.15	0.2	0.35	0.5	0.65	0.9

Permissible impact velocity: $V = \sqrt{\frac{2 \times E}{m_1 + m_2}}$

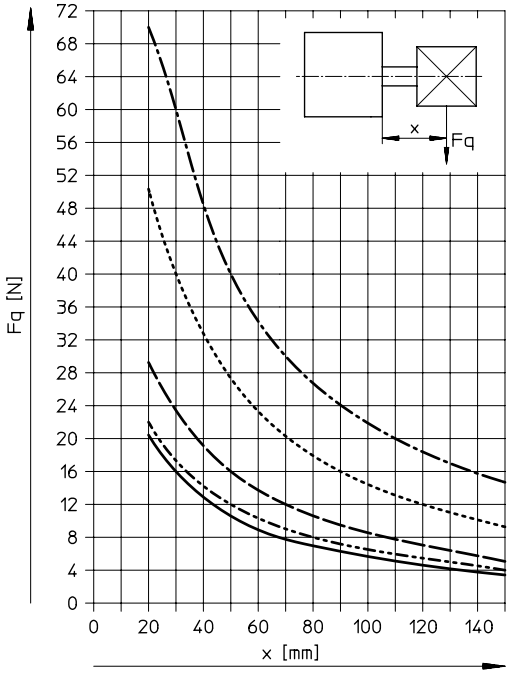
Maximum permissible mass: $m_2 = \frac{2 \times E}{v^2} - m_1$

V	Permissible impact velocity
E	Max. impact energy
m1	Moving mass (drive)
m2	Moving payload

Note

These specifications represent the maximum values that can be achieved. The maximum permissible impact energy must be observed.

Max. lateral force Fq as a function of projection x



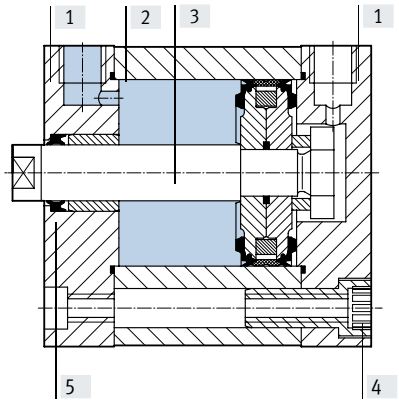
Ø 20
Ø 25
Ø 32/40
Ø 50/63
Ø 80

Datasheet

Weight [g]							
Piston ø	20	25	32	40	50	63	80
Basic version							
Product weight with 0 mm stroke	133	170	277	377	567	790	1475
Additional weight per 10 mm stroke	20	23	31	35	52	59	84
Moving mass with 0 mm stroke	24	33	53	82	128	177	367
Additional mass per 10 mm stroke	6	6	9	9	16	16	25
S2 – Through piston rod							
Product weight with 0 mm stroke	150	183	296	386	600	827	1507
Additional weight per 10 mm stroke	26	29	40	44	67	74	109
Moving mass with 0 mm stroke	34	40	64	81	144	195	367
Additional mass per 10 mm stroke	12	12	18	18	32	32	49

Materials

Sectional view

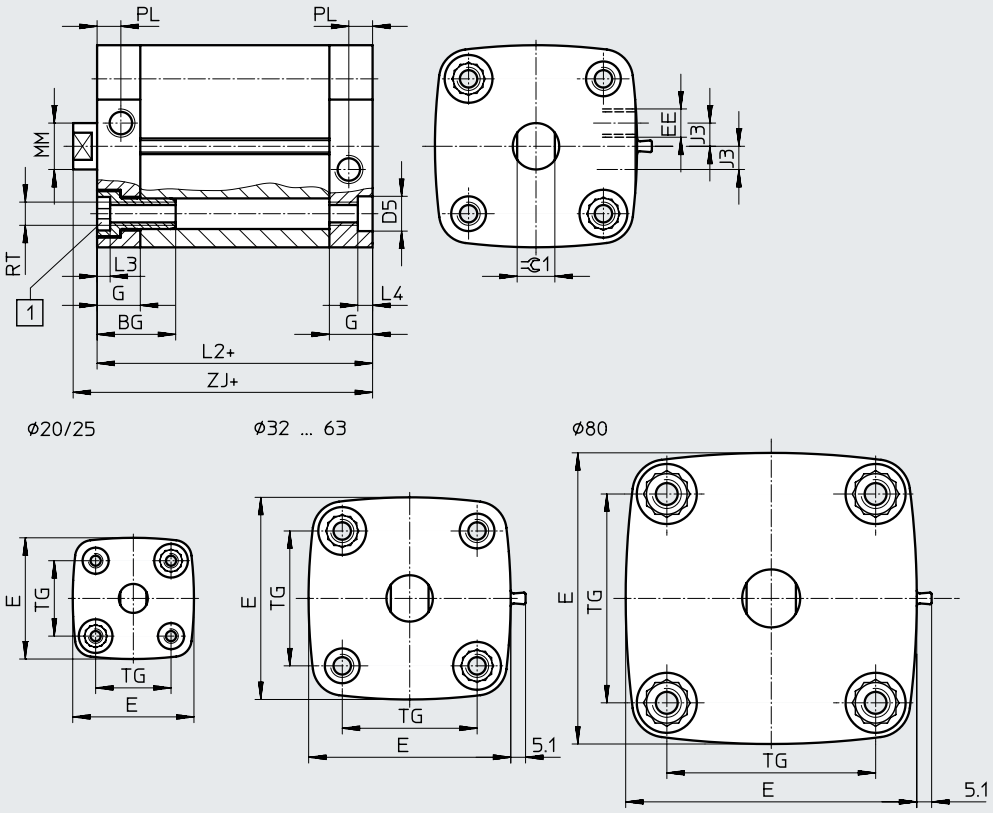


Compact cylinder		Basic version	S6
[1]	Cover	Anodised aluminium	
[2]	Cylinder barrel	Anodised aluminium	
[3]	Piston rod	High-alloy steel	
[4]	Flange screws	Corrosion-resistant steel	
[5]	Seals	NBR, TPE-U (PUR) media seal (modified for resistance to hydrolysis and cleaning)	FPM
–	LABS (PWIS) conformity	VDMA24364-B2-L	VDMA24364 zone III

Datasheet

Dimensions Download CAD data ➔ www.festo.com

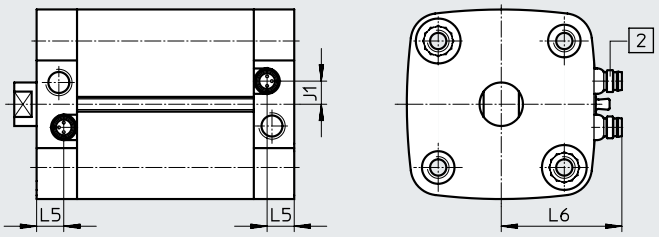
Basic version



[1] Socket head screw with female thread for mounting components

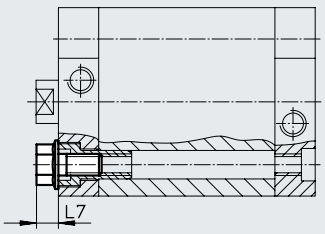
\+ = plus stroke length

With position sensing integrated in the end positions



[2] Mini plug connector, 3-pin, with integrated proximity switch (order code SME), suitable for connecting cable NEBA-M8CW3-...

Projection of the cover screw



Datasheet

ø [mm]	BG	D5 F9	E	EE	G	J1 ±0.1	J3 ±0.1	L2	L3	L4
20	19.5	9	36.8	M5	12	–	–	37	4.4	5
25			41.8					39		
32	26		49.8	G1/8	15	5.8	7	44		
40			57.8			8	8	45		
50	27	12	69.7			8.5				
63			81.3			12		49		
80		–	100.4		16.5	15		54	8	–

ø [mm]	L5	L6 ±2	L7	MM ø h8	PL ±0.1	RT	TG	ZJ +1	⇄1 h13
20	**–**	**–**	**7**	**10**	**6**	**M5**	**22**	**42.7**	**9**
25							**26**	**44.7**	
32	**10**	**35**	**8.7**	**12**	**8.2**	**M6**	**32.5**	**50.2**	**10**
40		**39**					**38**	**51.2**	
50		**45**	**10.3**	**16**		**M8**	**46.5**	**53.2**	**13**
63		**50**					**56.5**	**57.2**	
80	**11.5**	**60**	**11.9**	**20**		**M10**	**72**	**63**	**17**

Note

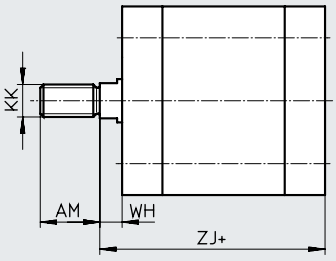
If used with a swivel mounting on the end cap, the following maximum stroke lengths should be noted:

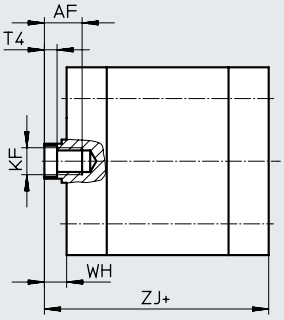
ø [mm]	20	25	32	40	50	63	80
Max. stroke length	50		100				150

Datasheet

Dimensions – Variants Download CAD data ➔ www.festo.com

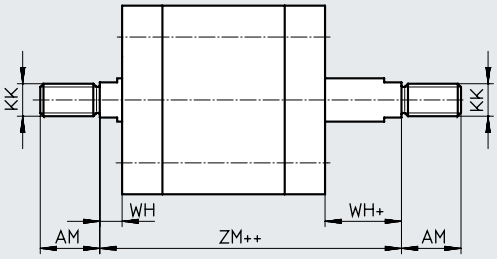
Basic version

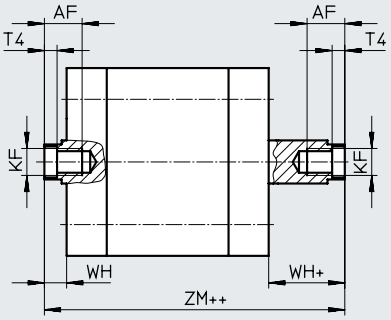




\+ = plus stroke length

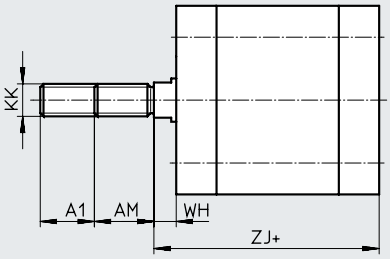
S2 – Through piston rod





++ = plus 2x stroke length

K2 – Extended male piston rod thread



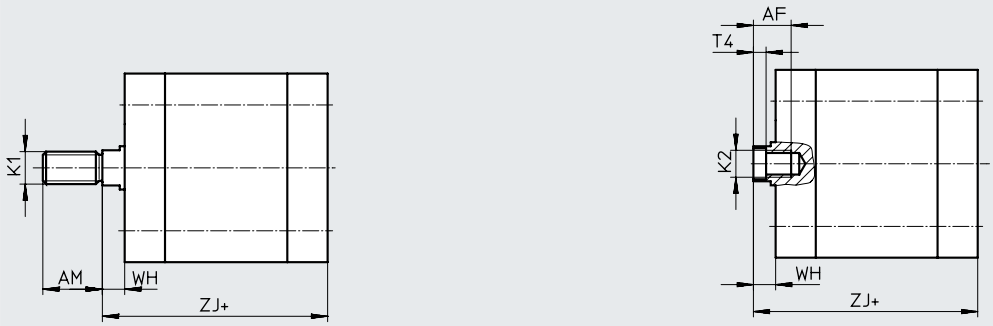
\+ = plus stroke length

ø [mm]	A1	AF min.	AM –0.5	KF	KK	T4	WH +1	ZJ +1	ZM
20	1 … 20	14	16	M6	M8	2.6	5.7	42.7	49.8
25								44.7	51.8
32		16	19	M8	M10x1.25	3.3	6.2	50.2	57.8
40								51.2	58.9
50		20	22	M10	M12x1.25	4.7	8.2	53.2	63.1
63								57.2	66.9
80	1 … 30		28	M12	M16x1.5	6.1	9	63	73.5

Datasheet

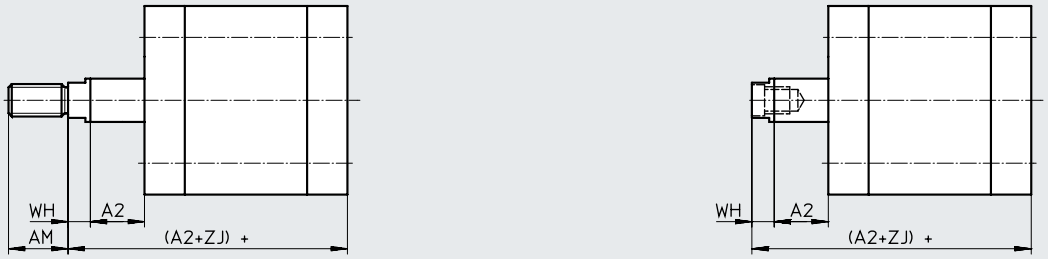
Dimensions – Variants Download CAD data ➔ www.festo.com

K5 – Special piston rod thread



\+ = plus stroke length

K8 – Extended piston rod

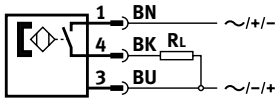


\+ plus stroke length

ø [mm]	AF min.	A2	AM –0.5	K1	K2	T4	WH +1	ZJ +1
20	14	1 … 300	16	M10, M10x1.25	M5	2.6	5.7	42.7
25								44.7
32	16	1 … 400	19	M10, M12	M6	3.3	6.2	50.2
40								51.2
50	20		22	M12, M12	M8	4.7	8.2	53.2
63								57.2
80		1 … 500	28	M16, M20	M10	6.1	9	63

Datasheet

Proximity switch
Magnetic reed
(order code SME)



Note

The proximity switch can only be ordered using the order code AIB, AIV and AIH (integrated position sensing) via the modular product system.

Technical data		
General		
Design		Built in
Based on standard		EN 60947-5-2
CE marking (see declaration of conformity)		To EU EMC Directive
Input signal/measuring element		
Measuring principle		Magnetic reed
Ambient temperature	[°C]	–20 ... +60
Switching output		
Switching output		Contacting, bipolar
Switching element function		N/O
Reproducibility of switching value	[mm]	±0.1
Hysteresis	[mm]	1 ... 4 depending on the cylinder
Switch-on time	[ms]	0.5
Switch-off time	[ms]	0.5
Max. output current	[mA]	500
Max. switching capacity AC	[W]	10 VA
Max. switching capacity DC	[W]	10 W
Inductive protective circuit		Adapted to MZ coil with LED
Residual current	[mA]	0
Output, additional data		
Short circuit current rating		No
Overload protection		No
Electronics		
Operating voltage range	[V AC]	12 ... 30
	[V DC]	12 ... 30
Reverse polarity protection		No
Electromechanics		
Electrical connection		Plug, M8x1, 3-pin
outlet direction of connection		Lateral
Information on pin contact materials		Gold-plated brass

Datasheet

Technical data		
Mechanical components		
Tightening torque	[Nm]	0.3
Mounting position		Any
Product weight	[g]	2.7
Information on housing materials		Polyamide, epoxy resin, nickel-plated brass
Display/operation		
Switching status indication		Yellow LED
Immission/Emission		
Degree of protection		IP65, IP67, to EN 60529
		IP69K, to DIN 40050 part 9
		Only in combination with connecting cable NEBA-M8CW3-...
Corrosion resistance class CRC[1)]		3

1) More information www.festo.com/x/topic/crc

Ordering data – Modular product system

Ordering table

Size		20	25	32	40	50	63	80	Conditions	Code		Enter code
Module no.		**543305**	**543306**	**543307**	**543308**	**543309**	**543310**	**543311**				
Function		Standards-based cylinder, double-acting, based on ISO 21287 (clean design)								**CDC**		CDC
Piston ø	[mm]	20	25	32	40	50	63	80		**-...**		
Stroke	[mm]	1 ... 300		1 ... 400				1 ... 500		**-...**		
Piston rod thread		Male thread								**-A**		
		Female thread							[1]	**-I**		
Cushioning		Elastic cushioning rings/plates at both ends								**-P**		-P
Position sensing		Without position sensing		–	–	–	–	–				
		–	–	Via proximity switch						**-A**		
		–	–	At both ends, integrated					[2]	**-AIB**		
		–	–	Front, integrated					[2]	**-AIV**		
		–	–	Rear, integrated					[2]	**-AIH**		

[1] I Not with extended male thread K2

[2] AIB, AIV, AIH Only with proximity switch SME

Ordering data – Modular product system

Ordering table

		20	25	32	40	50	63	80	Conditions	Code		Enter code
Proximity switch		–	–	SME (contacting)					[3]	**-SME**		
Sensor mounting rail		–	–	Sensor mounting rail for external position sensing					[4]	**-R**		
Piston rod type		Through piston rod								**-S2**		
Extended male thread		Extended male piston rod thread										
	[mm]	1 … 20						1 … 30		**-…K2**		
Special piston rod thread	Male thread	M10x1.25 M10		M10 M12		M12 M16		M16 M20		**-"…"K5**		
	Female thread	M5		M6		M8		M10				
Extended piston rod		Extended piston rod										
	[mm]	1 … 300		1 … 400				1 … 500	[5]	**-…K8**		
Temperature resistance		Heat-resistant seals max. 120 °C							[6]	**-S6**		

[3] SME Only with position sensing AIB, AIV, AIH.
Minimum stroke 15 mm

[4] R Must be selected for size 32, 40, 50, 63, 80

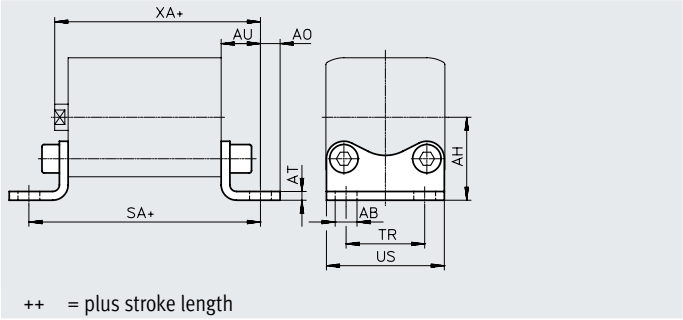
[5] K8 The sum of the stroke length and piston rod extension must not exceed the maximum permissible stroke length

[6] S6 Not with position sensing AIB, AIV, AIH

Accessories

Foot mounting HNA-...-R3

Material:
Steel with protective coating
RoHS-compliant



++ = plus stroke length

Dimensions and ordering data

For Ø [mm]	AB Ø H14	AH JS14	AO	AT ±0.5	AU ±0.2	SA	TR ±0.2
20	7	27	6.25	4	16	69	22
25		29				71	26
32		33.5	7			76	32
40	10	38	9		18	81	36
50		45	8	5	21	87	45
63		50				91	50
80	12	63	10.5	6	26	106	63

For Ø [mm]	US –0.5	XA	CRC[1)]	Weight [g]	Part no.	Type
20	34.5	59	3	84	**537254**	**HNA-20-R3**
25	38.5	61	3	90	**537255**	**HNA-25-R3**
32	46	66	3	123	**537256**	**HNA-32-R3**
40	54	69	3	157	**537257**	**HNA-40-R3**
50	64	74	3	278	**537258**	**HNA-50-R3**
63	75	78	3	328	**537259**	**HNA-63-R3**
80	93	89	3	634	**537260**	**HNA-80-R3**

1) More information www.festo.com/x/topic/crc

Note

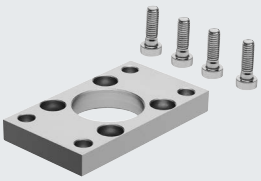
Screws with a special length are required for mounting diameter 80 mm

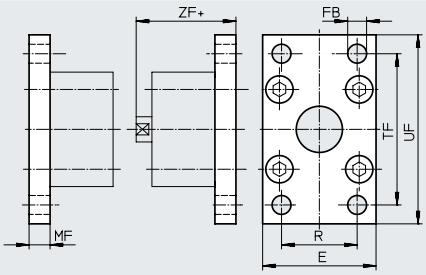
➔ page 23

Accessories

Flange mounting CRFNG

Material:
High-alloy steel





++ = plus stroke length

Dimensions and ordering data

For Ø [mm]	E	FB Ø H13	MF	R	TF	UF
32	45	7	10	32	64	80
40	54	9	10	36	72	90
50	65	9	12	45	90	110
63	75	9	12	50	100	120
80	93	12	16	63	126	150

For Ø [mm]	ZF	CRC[1)]	Weight [g]	Part no.	Type
32	54	4	220	**161846**	**CRFNG-32**
40	55	4	291	**161847**	**CRFNG-40**
50	57	4	526	**161848**	**CRFNG-50**
63	61	4	680	**161849**	**CRFNG-63**
80	70	4	1508	**161850**	**CRFNG-80**

1) More information www.festo.com/x/topic/crc

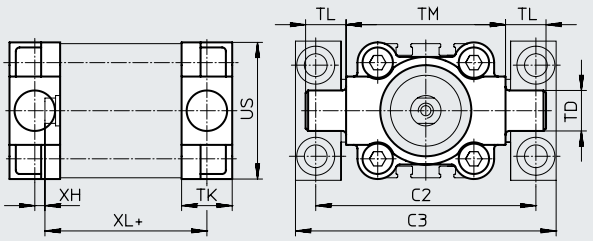
Note

Screws with a special length are required for mounting diameter 80 mm
➔ page 23

Accessories

Trunnion flange CRZNG

Material:
CRZNG: Electropolished stainless steel casting
RoHS-compliant



++ = plus stroke length

Dimensions and ordering data

For Ø [mm]	C2)	C3)	TD Ø e9	TK	TL	TM	US	XH	XL	CRC[1)]	Weight [g]	Part no.	Type
32	71	86	12	16	12	50	45	2	52	4	150	**161852**	**CRZNG-32**
40	87	105	16	20	16	63	54	4	55	4	285	**161853**	**CRZNG-40**
50	99	117	16	24	16	75	64	4	57	4	473	**161854**	**CRZNG-50**
63	116	136	20	24	20	90	75	4	61	4	687	**161855**	**CRZNG-63**
80	136	156	20	28	20	110	93	5	81	4	1296	**161856**	**CRZNG-80**

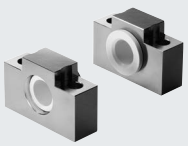
1) More information www.festo.com/x/topic/crc

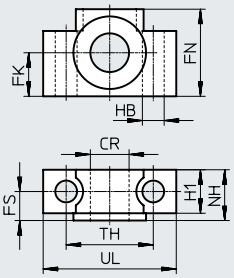
Note

Screws with a special length are required for mounting diameter 80 mm
➔ page 23

Trunnion supports CRLNZG

Material:
High-alloy steel
RoHS-compliant





Dimensions and ordering data

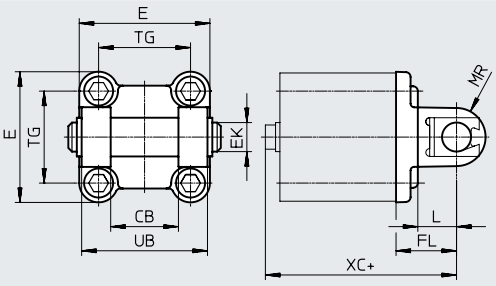
For Ø [mm]	CR Ø D11	FK Ø ±0.1	FN	FS	H1	HB Ø H13	NH	TH ±0.2	UL	CRC[1)]	Weight [g]	Part no.	Type
32	12	15	30	10.5	15	6.6	18	32	46	4	205	**161874**	**CRLNZG-32**
40, 50	16	18	36	12	18	9	21	36	55	4	323	**161875**	**CRLNZG-4 0/50**
63, 80	20	20	40	13	20	11	23	42	65	4	435	**161876**	**CRLNZG-6 3/80**

1) More information www.festo.com/x/topic/crc

Accessories

Swivel flange SNCB-...-R3

Material:
Die-cast aluminium with protective coating, high corrosion protection
RoHS-compliant



++ = plus stroke length

Dimensions and ordering data

For Ø [mm]	CB H14	EK Ø e8	FL ±0.2	L	MR	UB h14	XC	CRC[1]	Weight [g]	Part no.	Type
32	26	10	22	13	8.5	45	72	3	100	**176944**	**SNCB-32-R3**
40	28	12	25	16	12	52	76	3	151	**176945**	**SNCB-40-R3**
50	32	12	27	16	12	60	80	3	228	**176946**	**SNCB-50-R3**
63	40	16	32	21	16	70	89	3	371	**176947**	**SNCB-63-R3**
80	50	16	36	22	16	90	99	3	632	**176948**	**SNCB-80-R3**

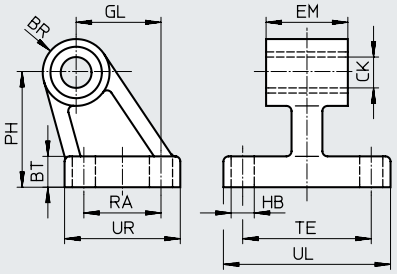
1) More information www.festo.com/x/topic/crc

Note

Screws with a special length are required for mounting diameter 80 mm
➔ page 23

Clevis foot CRLNG

Material:
High-alloy steel



Dimensions and ordering data

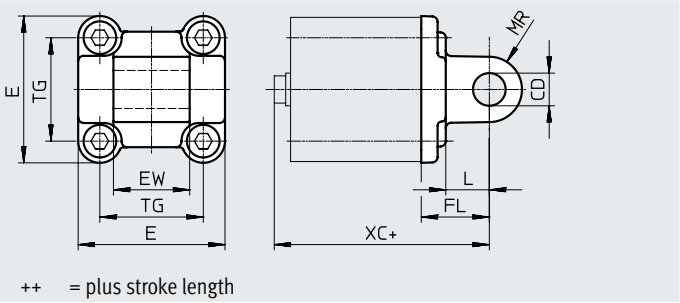
For Ø [mm]	BR	BT	CK Ø D11	EM –0.4	GL	HB Ø H13	PH	RA	TE	UL	UR	CRC[1]	Weight [g]	Part no.	Type
32	10	8	10	25.8	21	6.6	32	18	38	51	31	4	133	**161840**	**CRLNG-32**
40	11	10	12	27.8	24	6.6	36	22	41	54	35	4	161	**161841**	**CRLNG-40**
50	12	12	12	31.8	33	9	45	30	50	65	45	4	281	**161842**	**CRLNG-50**
63	15	12	16	39.8	37	9	50	35	52	67	50	4	370	**161843**	**CRLNG-63**
80	15	14	16	49.8	47	11	63	40	66	86	60	4	562	**161844**	**CRLNG-80**

1) More information www.festo.com/x/topic/crc

Accessories

Swivel flange SNCL-...-R3

Material:
SNCL-...-R3: Die-cast aluminium with protective coating
RoHS-compliant



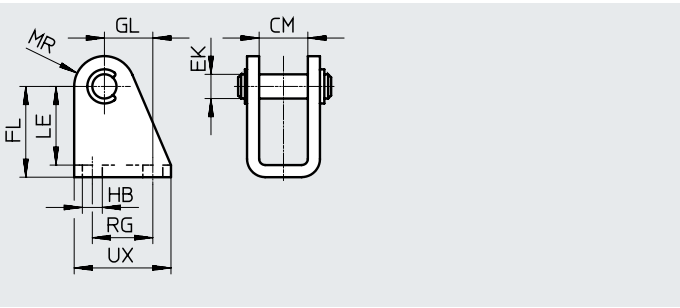
Dimensions and ordering data

For Ø [mm]	CD Ø H9	EW h12	FL ±0.2	L	MR	XC	CRC[1]	Weight [g]	Part no.	Type
20	8	16	20	14	8	63	3	38	**537796**	**SNCL-20-R3**
25						65	3	41	**537797**	**SNCL-25-R3**

1) More information www.festo.com/x/topic/crc

Clevis foot CRLBN, stainless steel

Material:
High-alloy steel



Dimensions and ordering data

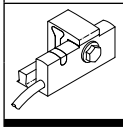
For Ø [mm]	CM	EK Ø	FL	GL	HB	LE	MR	RG	UX	CRC[1]	Weight [g]	Part no.	Type
20/25	16.1	8	30 +0.4/–0.2	16	6.6	26	10	20	32	4	82	**161863**	**CRLBN-20/25**

1) More information www.festo.com/x/topic/crc

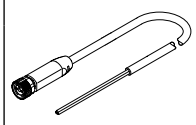
Accessories

Ordering data – Proximity switch for T-slot, magneto-resistive

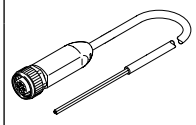
Datasheets → Internet: smt

	Type of mounting	Switching output	Electrical connection	Cable length [m]	Part no.	Type
N/O						
	Fitted on the mounting rail	PNP	Cable, 3-core	5.0	**571339**	**SMT-C1-PS-24V-K-5.0-OE**
			Plug M8x1, 3-pin	0.3	**571342**	**SMT-C1-PS-24V-K-0.3-M8D**
			Plug M12x1, 3-pin	0.3	**571341**	**SMT-C1-PS-24V-K-0.3-M12**

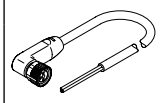
Connecting cables NEBA, straight, M8 connection

	Electrical connection 1, connection technology	Electrical connection 2, connection technology	Electrical connection 2, number of pins/cores	Cable length	Part no.	Type
	M8x1 A-coded to EN 61076-2-104	Open end	3	2.5 m	**8078223**	**NEBA-M8G3-U-2.5-N-LE3**
				5 m	**8078224**	**NEBA-M8G3-U-5-N-LE3**

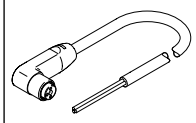
Connecting cables NEBA, straight, M12 connection

	Electrical connection 1, connection technology	Electrical connection 2, connection technology	Electrical connection 2, number of pins/cores	Cable length	Part no.	Type
	M12x1, A-coded to EN 61076-2-101	Open end	3	2.5 m	**8078236**	**NEBA-M12G5-U-2.5-N-LE3**
				5 m	**8078237**	**NEBA-M12G5-U-5-N-LE3**

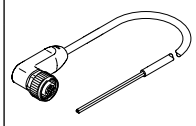
Connecting cables NEBA, angled, M8 connection

	Electrical connection 1, connection technology	Electrical connection 2, connection technology	Electrical connection 2, number of pins/cores	Cable length	Part no.	Type
	M8x1 A-coded to EN 61076-2-104	Open end	3	2.5 m	**8078230**	**NEBA-M8W3-U-2.5-N-LE3**
				5 m	**8078231**	**NEBA-M8W3-U-5-N-LE3**

Connection cables NEBA, angled, M8 connection – for integrated proximity switches

	Electrical connection 1, connection technology	Electrical connection 2, connection technology	Electrical connection 2, number of pins/cores	Cable length	Part no.	Type
	Diameter 8 mm, A-coded according to EN 61076-2-104	Open end	3	5 m	**8078267**	**NEBA-M8CW3-U-5-N-LE3**

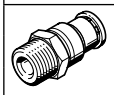
Connecting cables NEBA, angled, M12 connection

	Electrical connection 1, connection technology	Electrical connection 2, connection technology	Electrical connection 2, number of pins/cores	Cable length	Part no.	Type
	M12x1, A-coded to EN 61076-2-101	Open end	3	2.5 m	**8078245**	**NEBA-M12W5-U-2.5-N-LE3**
				5 m	**8078246**	**NEBA-M12W5-U-5-N-LE3**

Accessories

Ordering data – Push-in fittings

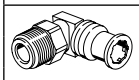
Datasheets → Internet: qs

	Connection		Material	Weight	Part no.	Type	PU[2]
	Thread	Tubing O.D.		[g]			
With external hex							
	M5	4	Nickel-plated brass, with sealing ring	–	**578334**	**NPQH-D-M5-Q4-P10**	10
		6		–	**578335**	**NPQH-D-M5-Q6-P10**	
	G1/8	4		6.1	**578338**	**NPQH-D-G18-Q4-P10**	
		6		9	**578339**	**NPQH-D-G18-Q6-P10**	
		8		11.4	**578340**	**NPQH-D-G18-Q8-P10**	
	M5	4	Stainless steel	6	**162860**	**CRQS-M5-4**[1]	1
		6		8.4	**162861**	**CRQS-M5-6**[1]	
	R1/8	6		9.9	**162862**	**CRQS-1/8-6**	
		8		12	**162863**	**CRQS-1/8-8**	
With internal hex							
	M5	4	Nickel-plated brass, with sealing ring	4.6	**578370**	**NPQH-DK-M5-Q4-P10**	10
		6		8.6	**578371**	**NPQH-DK-M5-Q6-P10**	
	G1/8	4		–	**578374**	**NPQH-DK-G18-Q4-P10**	
		6		–	**578375**	**NPQH-DK-G18-Q6-P10**	
		8		–	**578376**	**NPQH-DK-G18-Q8-P10**	

1) With sealing ring
2) Packaging unit

Ordering data – Push-in L-fittings

Datasheets → Internet: qs

	Connection		Material	Weight	Part no.	Type	PU[2]
	Thread	Tubing O.D.		[g]			
With external hex							
	M5	4	Nickel-plated brass, with sealing ring	8.8	**578276**	**NPQH-L-M5-Q4-P10**	10
		6		11.9	**578277**	**NPQH-L-M5-Q6-P10**	
	G1/8	4		15.7	**578280**	**NPQH-L-G18-Q4-P10**	
		6		18.5	**578281**	**NPQH-L-G18-Q6-P10**	
		8		22	**578282**	**NPQH-L-G18-Q8-P10**	
	M5	4	Stainless steel	12	**162870**	**CRQSL-M5-4**[1]	1
		6		18	**162871**	**CRQSL-M5-6**[1]	
	R1/8	6		19	**162872**	**CRQSL-1/8-6**	
		8		26	**162873**	**CRQSL-1/8-8**	

1) With sealing ring
2) Packaging unit

Accessories

Ordering data – Plastic tubing, standard O.D.

Datasheets → Internet: tubing

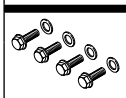
		Type
	Good resistance to chemicals and hydrolysis	**PLN**
	Pneumatic tubing with resistance to high temperatures and chemicals	**PFAN**
	Approved for use in the food zone and resistant to hydrolysis	**PUN-H**

Ordering data – One-way flow control valves

Datasheets → Internet: crgrla

	Connection		Material	Weight	Part no.	Type
	Thread	For push-in fitting		[g]		
	M5	CRQS/CRQSL/CRQST, QS	Electropolished stainless steel casting	10.2	**161403**	**CRGRLA-M5-B**
	G1/8			37.8	**161404**	**CRGRLA-1/8-B**

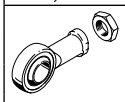
Ordering data – Cover screws, corrosion-resistant

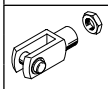
	For ø	Material	CRC[1]	Weight [g]	Part no.	Type	PU[3]
	20, 25	High-alloy steel	3	5.5	**543714**	**DAMD-P-M5-10-R1[2]**	4
	32, 40			9	**543715**	**DAMD-P-M6-12-R1[2]**	
	50, 63			17.5	**543716**	**DAMD-P-M8-16-R1[2]**	
	80			30	**543717**	**DAMD-P-M10-16-R1[2]**	

1) More information www.festo.com/x/topic/crc
2) With sealing ring
3) Packaging unit

Ordering data – Corrosion and acid-resistant piston rod attachments

Datasheets → Internet: crsg

Designation	For ø	Part no.	Type
Rod eye CRSGS			
	20, 25	**195581**	**CRSGS-M8**
	32, 40	**195582**	**CRSGS-M10x1.25**
	50, 63	**195583**	**CRSGS-M12x1.25**
	80	**195584**	**CRSGS-M16x1.5**

Designation	For ø	Part no.	Type
Rod clevis CRSG			
	20, 25	**13568**	**CRSG-M8**
	32, 40	**13569**	**CRSG-M10x1.25**
	50, 63	**13570**	**CRSG-M12x1.25**
	80	**13571**	**CRSG-M16x1.5**

Ordering data – Screws

	For ø	For accessories	Part no.		PU[1]
	80	HNA-R3, SNCB-R3	**372622**	**DIN 912-M10X30-A4-70**	1
		CRFNG	**8028230**	**DIN 6912-M10X30-A4-70**	
		CRZNG	**744814**	**DIN 912-M10X40-A4-70**	

1) Packaging unit