

Construction characteristics

End covers	hard anodised aluminum				
Barrel	anodised aluminium (brass for Ø8 and Ø10)				
Piston rod	non magnetic piston : Ø8 - Ø10: stainless steel / Ø12 - Ø50: C43 chromed magnetic piston: Ø10 - 20: stainless steel / Ø25 - 50: C43 chromed				
Piston	aluminium				
Seals	Standard: NBR Oil resistant rubber, PUR Piston rod seals				
	(HNBR or FPM seals available upon request)				
Mounting	steel painted in cataphoresis				
Forks	cadmium plated steel				
Single-acting springs	steel for springs and stainless steel				
Cushioning length	ø 16 - 20 - 25 - 32 - 40 - 50 mm 15 - 18 - 18 - 22 - 22				

Technical characteristics

Fluid	filtered air, preferably lubricated
Max. pressure	10 bar
Working temperature	-5°C - +70°C with standard seals magnetic or non magnetic piston
	-5°C - +80°C with FPM seals magnetic piston
	-5°C - +80°C with HNBR seals magnetic piston
	-5°C - +120°C with HNBR seals non magnetic piston
	-5°C - +150°C with FPM seals non magnetic piston

Please follow the suggestions below to ensure a long life for these cylinders:

- •use clean and lubricated air
- correct alignment during assembly with regard to the applied load so as to avoid radial components or bending the rod.
- avoid high speeds together with long strokes and heavy loads: this would produce kinetic energy which the cylinder cannot absorb, especially if used as a limit stop (in this case use mechanical stop device)
- evaluate the environmental characteristics of cylinder used (high temperature, hard atmosphere, dust, humidity etc.)

Please note: air must be dried for applications with lower temperature.

Use hydraulic oils H class (ISO Vg32) for correct continued lubrication. Our Technical Department will be glad to help.

Standard strokes

Ø8 - Ø10 :

15 - 25 - 50 - 75 - 80 - 100 mm

Ø12 - Ø16 :

15 - 25 - 50 - 75 - 80 - 100 - 150 - 160 - 200 - 250 - 300 mm

Ø20 - Ø25 :

15 - 25 - 50 - 75 - 80 - 100 - 150 - 160 - 200 - 250 - 300 - 320 - 350 - 400 mm

Ø32 - Ø50 :

15 - 25 - 50 - 75 - 80 - 100 - 150 - 160 - 200 - 250 - 300 - 320 - 350 - 400 - 450 - 500 mm

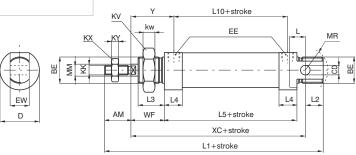
Minimum and maximum springs load

Bore	Ø12 - Ø20	Ø25	Ø32	Ø40 - Ø50
Min. load(N)	10	10	20	40
Max. load(N)	25	50	55	110

Basic version

Ordering code	Description
1260.Ø.stroke	Basic version
1271.Ø.stroke	Basic version front spring from Ø12 (max stroke 40 mm)
1272.Ø.stroke	Basic version rear spring from Ø12 (max stroke 40 mm)
12Ø.stroke.A	Adjustable cushioning (from Ø16)
12Ø.stroke.M	Magnetic piston (from Ø10)
12Ø.stroke.X	Stainless steel rod
12Ø.stroke.A.M	Cushioning with magnetic piston
12Ø.stroke.A.M.X	Cushioning, magnetic piston and stainless steel piston rod
12Ø.stroke T	HNBR seals version
12Ø.strokeV	FPM seals version

Standard execution, fully complying with ISO standards from \varnothing 8 to \varnothing 25. BOREs 32, 40 and 50 not included in the standard, comply with our own specifications. Can use all available mountings. For single acting type, the maximum stroke is 40 mm., after which overall dimensions increase in length to an extent not proportional to the stroke (and in any case not longer than stroke 100).

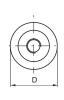


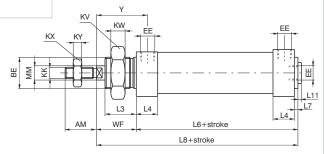
Without rear eye version

Ordering code	Description
1261.Ø.stroke	Without rear eye
1273.Ø.stroke	Without rear eye front spring from Ø12 (max stroke 40 mm)
1274.Ø.stroke	Without rear eye rear spring from Ø12 (max stroke 40 mm)
12Ø.stroke.A	Adjustable cushioning (from Ø16)
12Ø.stroke.M	Magnetic piston (from Ø10)
12Ø.stroke.X	Stainless steel rod
12Ø.stroke.A.M	Cushioning with magnetic piston
12Ø.stroke.A.M.X	Cushioning, magnetic piston and stainless steel piston rod
12Ø.strokeT	HNBR seals version
12Ø.stroke V	FPM seals

Version derived from standard execution 1260 and not included in ISO standard. Not having a rear eye it is shorter and the air inlet is from the rear or at 90° like it is on the front. The considerations made for the basic type 1260 apply for all single-acting types.

12--.Ø.stroke....L Air inlet at 90° version



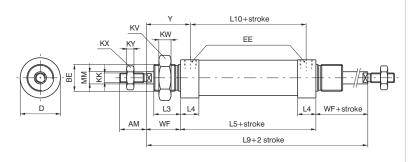


Push/Pull rod version

Ordering code	Description
9	ı
1262.Ø.stroke	Push/pull rod
1262.Ø.stroke.A	Adjustable cushioning (from Ø16)
1262.Ø.stroke.M	Magnetic piston (from Ø10)
1262.Ø.stroke.X	Stainless steel rod
1262.Ø.stroke.E	Hexagonal piston rod (from Ø12)
1262.Ø.stroke.A.M	Cushioning with magnetic piston
1262.Ø.stroke.A.M.X	Cushioning, magnetic piston and stainless steel piston rod
1262.Ø.stroke T	HNBR seals version ★
1262.Ø.stroke V	FPM seals version ★

★ Excludes hexagonal rod version

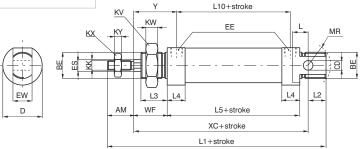
Execution by rod coming out from both end plates, with overall dimensions. except for the rod, equal to 1260 version. Not available with $\varnothing 8$ and 10).



Non rotating piston rod version

Ordering code	Description
1260.Ø.stroke.E 1271.Ø.stroke.E	Hexagonal piston rod (from Ø12) Hexagonal piston rod with front spring from Ø12 (max stroke 40 mm.)
1272.Ø.stroke.E	Hexagonal piston rod with rear spring from Ø12 (max stroke 40 mm.)
12Ø.stroke.E.M 12Ø.stroke.E.X	Hexagonal piston rod with magnetic piston (from Ø12) Hexagonal stainless steel piston rod

Similar overall dimensions as 1260 basic type, it differs because of the hexagonal rod (instead of circular) to avoid the rotation. It is particularly suitable when it is used as a guide and support to the linked element. Not for use with high frequencies and long strokes. For which, whenever possible use front spring.



Ten 1 1		4.5		
Table	e ot	dım	ensi	ons

Bore		8	10	12	16	20	25	32	40	50
AM (-0,2)		12	12	16	16	20	22	20	25	25
BE		M12x1,25	M12x1,25	M16x1,5	M16x1,5	M22x1,5	M22x1,5	M30x1,5	M40x1,5	M40x1,5
CD (H9)		4	4	6	4	8	8	12	14	14
D (-0,3)		16	17	19	24	28	33	40	48	58
EE		M5	M5	M5	M5	G1/8"	G1/8"	G1/8"	G1/4"	G1/4"
ES		-	-	6	6	8	10	12	12	12
EW (d13)		8	8	12	12	16	16	26	30	30
KK (6g)		M4x0,7	M4x0,7	M6x1	M6x1	M8x1,25	M10x1,25	M10x1,25	M12x1,75	
KV		17	17	22	22	30	30	42	52	52
KW		5,5	5,5	6	6	7	7	8	9	9
KX		7	7	10	10	13	17	17	19	19
KY		3	3	4	4	5	6	6	7	7
L		6	6	9	9	12	13	13	16	16
L1(±1)	*	85	85	105	111	130	141	139	164	167
L2		9	9	14	13	15	15	14	16	16
L3		11	11	17	17	18	22	22	25	25
L4		10	10	9,5	10,5	15	15	15	18	18
L5 (±1)	*	46	46	50	56	68	69	69	79	82
L6 (±1)	*	48	48	52	58	70,5	71,5	71,5	82	85
L7		2	2	2	2	2,5	2,5	2,5	3	3
L8 (±1)	*	64	64	74	80	94,5	99,5	99,5	117	120
L9 (±1,2)	*	78	78	94	100	116	125	125	149	152
L10 (±1)	*	35	35	40	45	52	53	53	60	63
L11		-	-	-	1,5	2	2	2	2	2
MM (f7)		4	4	6	6	8	10	12	14	14
MR (min.)		12	12	16	16	18	19	22	28	28
WF (±1,2)		16	16	22	22	24	28	28	35	35
XC (±1)	*	64	64	75	82	95	104	105	123	126
Y (±1,2)		21,5	21,5	27	27,5	32	36	36	44,5	44,5
	OLERANCE:	until stroke			+ 2 mm.					
Weight	stroke 0	55	60	80	100	175	240	365	610	790
gr.	every 10mm	6	7	5	5	8	11	15	19	21
Without rear	eve version									
Weight	stroke 0	50	55	75	95	170	230	345	570	750
gr.	every 10mm		7	5	5	8	11	15	19	21
gı. Push/pull roc	-	O	1	<u> </u>	J	0	11	13	19	۷۱
Weight	stroke 0	55	60	95	120	220	310	450	760	950
gr.	every 10mm	7	8	7	7	12	17	24	31	33
Hexagonal ro						I				
Weight	stroke 0	-	-	85	105	180	250	370	590	760
gr.	every 10mm	-	-	5	6	8	12	16	17	19

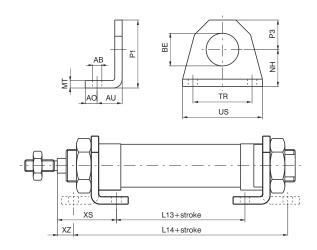
(★) These dimensions increase of 10 mm for microcylinders equipped with magnetic piston and spring return, and of 9 mm for microcylinders with 10 mm BORE magnetic piston

Foot

Ordering code

1200.Ø.01 (1 piece)





Used to mount the cylinder on the mounting plane with the rod parallel to said plane. Use one for short strokes and two for long strokes. It is made of stamped steel, made corrosion resistant by cataphoreses treatment. Attached to the end plates by means of nuts (or lock nuts) 05.

Attention: the dimensions of microcylinders with threaded end covers (*) increase of 10 mm. for microcylinders equipped with magnetic piston and spring return, and of 9 mm. for microcylinders with 10 mm. BORE magnetic piston.

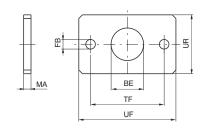
Bore	8	10	12	16	20	25	32	40	50
AB (H13)	4,5	4,5	5,5	5,5	6,5	6,5	6,5	8,5	8,5
AO	5	5	6	6	8	8	8	10	10
AU	11	11	14	14	17	17	17	20	20
BE	12	12	16	16	22	22	30	40	40
L13 (±1) *	30	30	30	36	44	45	45	49	52
L14 (±1) *	68	68	78	84	102	103	103	119	122
MT	3	3	4	4	5	5	5	5	5
NH (±0,3)	16	16	20	20	25	25	28	40	40
P1	26	26	33	33	45	45	50	70	70
P3	10	10	13	13	20	20	22	30	30
TR (JS14)	25	25	32	32	40	40	52	70	70
US	35	35	42	42	54	54	66	90	90
XS (±1,4)	24	24	32	32	36	40	40	50	50
XZ (±1,4)	5	5	8	8	7	11	11	15	15
Weight gr.	22	22	45	45	90	90	110	210	210

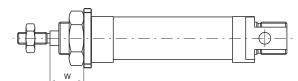
Flange

Ordering code

1200.Ø.02 (1 piece)







Used to mount the microcylinder at a right angle to the mounting plane. Attached to the front (or rear) endcap by a nut (or lock nut) 05. Made of extruded steel, made corrosion resistant by cataphoresis.

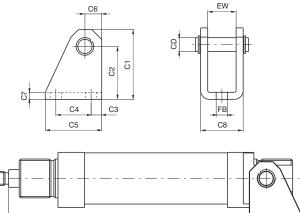
Bore	8	10	12	16	20	25	32	40	50
BE	12	12	16	16	22	22	30	40	40
FB (H13)	4,5	4,5	5,5	5,5	6,5	6,5	6,5	8,5	8,5
UF	40	40	53	53	66	66	68	90	90
UR	25	25	30	30	40	40	50	60	60
MA	3	3	4	4	5	5	5	5	5
TF (JS14)	30	30	40	40	50	50	52	70	70
W (±1,4)	13	13	18	18	19	23	23	30	30
Weight ar	20	20	40	40	85	85	100	150	150



Ordering code

1200.Ø.03 (1 piece)





C9+stroke

Use with the rear end cover to mount the cylinder either parallel or at a right-angle to the mounting plane. This allows the cylinder to oscillate and self-align with the linked element to the rod. This is necessary when the rod may be subject to lateral during travel.

Attention: the dimensions of microcylinders with threaded end covers (*) increase by 10mm for equipped with magnetic piston and spring return, and by 9mm for microcylinders with 10mm BORE magnetic piston.

Bore	8	10	12	16	20	25	32	40	50
CD	4	4	6	6	8	8	12	14	14
C1	28,5	28,5	33,5	33,5	39,5	39,5	44,5	53,5	53,5
C2 (±0,3)	24	24	27	27	30	30	33	40	40
C3	3,5	3,5	5	5	6	6	7	10	10
C4	12,5	12,5	15	15	20	20	24	28	28
C5	20	20	25	25	32	32	38	45	45
C6	4,5	4,5	6,5	6,5	9,5	9,5	11,5	13,5	13,5
C7	2,5	2,5	3	3	4	4	4	4	4
C8	13	13	18	18	24	24	34	38	38
C9 (±0,4) *	63	63	73,5	80,5	91,5	100,5	100,5	119,5	122,5
EW	8,1	8,1	12,1	12,1	16,1	16,1	26,1	30,1	30,1
FB (H13)	4,5	4,5	5,5	5,5	6,5	6,5	6,5	8,5	8,5
Weight gr.	20	20	35	35	75	75	135	180	180

Cylinder rod forks / Nut or lock nut for the endcaps

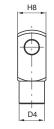
Ordering code

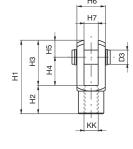
1200.Ø.04 * (with pin)

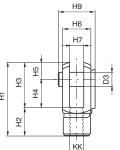
1200.Ø.04/1 (with clips)

★Available from bore Ø12





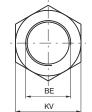






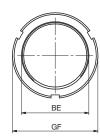
Ordering code











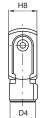
Forks:

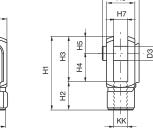
Similar to hinge 03, mounted on the rod thread, assures a regular operation even in the presence of significant forces to the linked element. Made of zinc plated steel.

Nut:

Used to fasten flanges or feet to the endcaps of the microcylinder. The nuts are mounted on BOREs that go from 8 to 25, the lock nuts on 32, 40 and 50. Both are supplied (one piece) with the microcylinders.







Bore	D3	D4	H1	H2	НЗ	H4	H5	H6	H7 (B12)	H8	H9	KK	BE	KV	GF	KW	Forks weight gr	Nut
									,									weigni
8	4	8	21	8	13	8	5	8	4	10	11	M4x0,7	M12x1,25	17	-	5,5	12	7
10	4	8	21	8	13	8	5	8	4	10	11	M4x0,7	M12x1,25	17	-	5,5	12	7
12	6	10	31	12	19	12	7	12	6	12	18	M6x1	M16x1,5	22	-	6	20	16
16	6	10	31	12	19	12	7	12	6	12	18	M6x1	M16x1,5	22	-	6	20	16
20	8	14	42	16	26	16	10	16	8	16	23	M8x1,25	M22x1,5	30	-	7	45	25
25	10	18	52	20	32	20	12	20	10	20	27	M10x1,25	M22x1,5	30	-	7	90	25
32	10	18	52	20	32	20	12	20	10	20	27	M10x1,25	M30x1,5	-	42	8	90	42
40	12	20	62	24	38	24	14	24	12	24	32	M12x1,75	M40x1,5	-	52	9	145	60
50	12	20	62	24	38	24	14	24	12	24	32	M12x1,75	M40x1,5	-	52	9	145	60

Foot

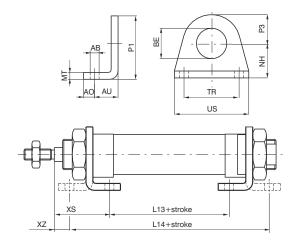
Ordering code

Series 1200

1200.Ø.01X (1 piece)



Used to mount the cylinder on the mounting plane with the rod parallel to said plane. Use one for short strokes and two for long strokes. It is made stamped stainless steel AISI 304. Attached to the end plates by means of nuts (or lock nuts) 05X.

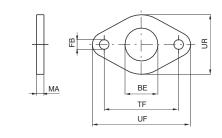


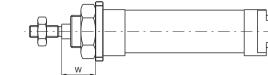
Bore	16	20	25	32
AB (H13)	5,5	6,5	6,5	6,5
AO	6	8	8	8
AU	14	17	17	17
BE	16	22	22	30
L13 (±1)	36	44	44	45
L14 (±1)	84	102	102	103
MT	4	5	5	5
NH (±0,3)	20	25	25	28
P1	33	45	45	50
P3	13	20	20	22
TR (Js14)	32	40	40	52
US	42	54	54	66
XS (±1,4)	32	36	40	40
XZ (±1,4)	8	7	11	11
Weight gr.	45	90	90	110

Flange

Ordering code

1200.Ø.02X







Use to mount the microcylinder at a right angle to the mounting plane. Attached to the front (or rear) endcap by a nut (or lock nut)05X. Made of stainless steel AISI 304.

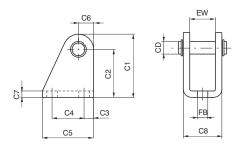
Bore	16	20	25	32
BE	16	22	22	30
FB (H13)	5,5	6,5	6,5	6,5
UF	53	66	66	68
UR	30	40	40	50
MA	4	5	5	5
TF (JS14)	40	50	50	52
W (±1,4)	18	19	23	23
Weight gr.	40	85	85	100

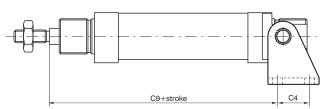
Rear eye

Ordering code

1200.Ø.03X (1 piece)







Used to mount by using the rear end cover to mount either parallel or at a right angle to the mounting plane. Allows the cylinder to oscillate and self-align with the linked element to the rod. Necessary to use when the rod may be subject to lateral forces during travel. Made of stamped stainless steel AISI 304.

Bore	16	20	25	32
CD	6	8	8	12
C1	33,5	39,5	39,5	44,5
C2 (±0,3)	27	30	30	33
C3	5	6	6	7
C4	15	20	20	24
C5	25	32	32	38
C6	6,5	9,5	9,5	11,5
C7	3	4	4	4
C8	18	24	24	34
C9 (±0,4)	80,5	91,5	100,5	100,5
EW	12,1	16,1	16,1	26,1
FB (H13)	5,5	6,5	6,5	6,5
Weight gr.	35	75	75	135

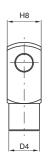
Cylinder rod fork / Nut or lock nut for the endcaps

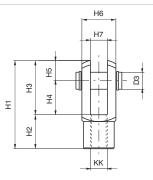
Ordering code

1200.Ø.04X (with pin)

1200.Ø.05X (1 piece)







Fork:

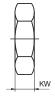
Similar to hinge 03X, mounted on the rod thread, assures a regular operation even in the presence of significant forces to the linked element. Made of stainless steel AISI 304.

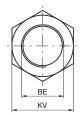
Nut:

Used to fasten flanges or feet to the endcaps of the microcylinder. The nuts are mounted on BOREs that go from 16 to 25, the lock nuts on 32. Both are supplied (one piece) with the microcylinders.

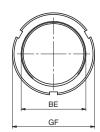












Bore	Weight gr.	Weight gr. nut	D3	D4	H1	H2	НЗ	H4	H5	H6	H7 (B12)	Н8	KK	BE	KV	GF	KW
16	20	16	6	10	31	12	19	12	7	12	6	12	M6X1	M16X1.5	22	-	6
20	45	25	8	14	42	16	26	16	10	16	8	16	M8X1.25	M22X1.5	30	-	7
25	90	25	10	18	52	20	32	20	12	20	10	20	M10X1.25	M22X1.5	30	-	7
32	90	42	10	18	52	20	32	20	12	20	10	20	M10X1.25	M30X1.5	-	42	8



Construction characteristics

Body	extruded shape anodized aluminium alloy 6060
Bushings	sintered bronze
Wiper	oil resitant NBR rubber
Rods	chromed C43 steel
Plate	plated zinc steel
Mounting block	plated zinc steel

Technical characteristics

Max. suggested strokes for 1200 series:

 Diameter
 20
 25

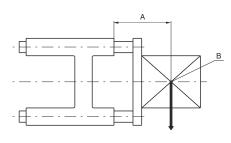
 Stroke mm
 200
 250

Max. suggested strokes for 1320 series:

 Diameter
 32
 40
 50
 63
 80

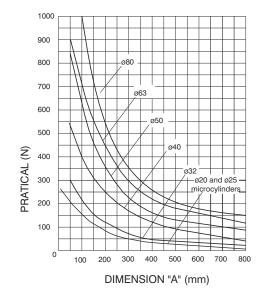
 Stroke mm
 300
 350
 450
 500
 550

Loading diagram based on dimension "A"



 $\mathsf{A} = \mathsf{Protusion}$

B = Load centre of gravity

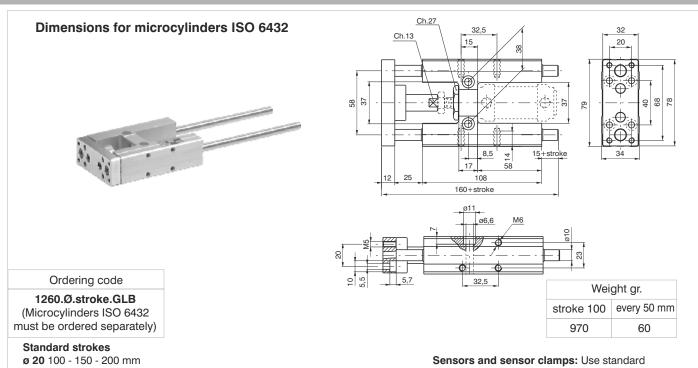


Use and maintenance

Follow the indication of the above diagram as far as loads are concerned. A large quantity of grease is placed between the two wipers during assembly, therefore the linear control units should not require special maintenance.

ø 25 100 - 150 - 200 - 250 mm





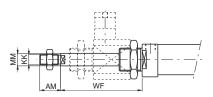
Overall dimensions and technical information are provided solely for informative purposes and may be modified without notice.

sensors and clamps.





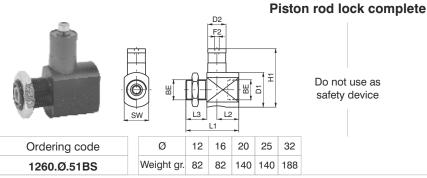
Threaded end covers version



Ordering code

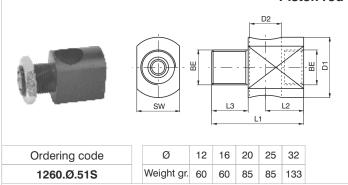
12__.Ø.stroke.B

Order piston rod lock separately. Do not use with stainless steel or hexagonal piston rod.



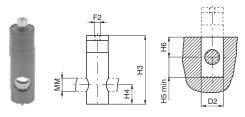
Piston rod lock bracket

Do not use as safety device



Piston rod lock and housing

Do not use as safety device



Ø 12 16 20 25 32 Weight gr. 22 22 55 55

Ordering code 1260.Ø.51B (Ø12-Ø25)

1320.32.51B (Ø32)

Table of dimensions (series 1200)

Bore	AM	BE	D1	D2	F2	H1	НЗ	H4	H5	H6	KK	L1	L2	L3	MM	SW	WF
12	16	M16x1.5	20	16	M5	35	35	10	11	10	M6x1	42	21	12	6	20	55
16	16	M16x1.5	20	16	M5	35	35	10	11	10	M6x1	42	21	12	6	20	55
20	20	M22x1.5	38	20	M5	64	62	17.5	19	18	M8x1.25	58	24	23	8	27	73
25	22	M22x1.5	38	20	M5	64	62	17.5	19	18	M10x1.25	58	24	23	10	27	77
32	20	M30x1.5	39.5	20	M5	64	62	17.5	18.5	18	M10x1.25	60	26	22	12	35	76.5



Sensor clamps for microcylinders with threaded end covers and Technopolymer

Sensor clamps - codes 1500, RS, HS	Sensor clamps - codes 1580, MRS, MHS
Ordering code	Ordering code
1260.Ø.F	1260.Ø.FS

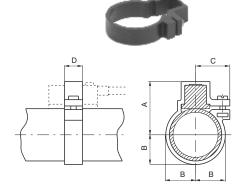


Table of dimensions

Bore	Ø10	Ø12	Ø16	Ø20	Ø25	Ø32	Ø40	Ø50
Α	23	23	25	27	29,5	33	37	42
В	10	10	12	14	16,5	20	24	29
С	15	15	16,5	17,5	19	20	22	24
D	10	10	10	10	10	10	10	10
Weight (gr)	2	2	3	5	7	10	14	16



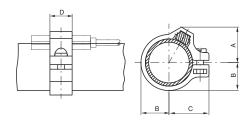
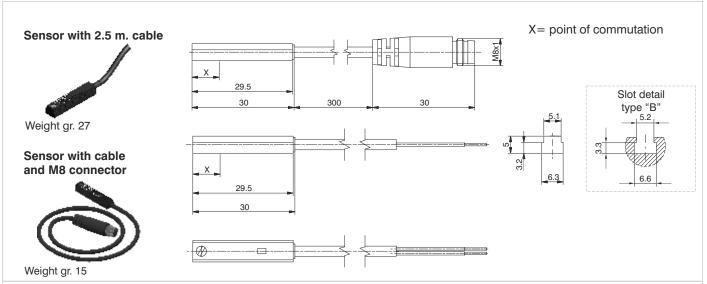


Table of dimensions

Bore	Ø10	Ø12	Ø16	Ø20	Ø25	Ø32	Ø40	Ø50
Α	13	14	15,4	17,2	19,3	20,5	22	29
В	9	10	12	14	16,5	20	24	29
С	16	16	18	19,5	22	26	30	35
D	10	10	10	10	10	10	10	10
Weight (gr)	2	2	3	5	7	8	10	11

Sensor for microcylinders

For technical characteristics and ordering codes see Chapter 6 (magnetic sensors)

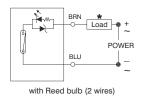


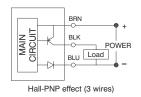
Sensor ordering codes

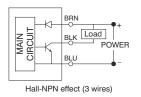
Ampulla Rec	X=point of commutation	
1580.U	(2 wires) cable 2.5 mt.	15 mm
MRS.U	(2 wires) cable 300 mm, M8 connector (use MC1 or MC2 connectors)	15 mm
1580.UAP	PNP (3 wires) cable 2.5 mt.	15 mm
MRS.UAP	PNP (3 wires) cable 300 mm, M8 connector (use MCH1 or MCH2 connectors)	15 mm

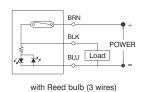
Hall effect se	X=point of commutation	
1580.HAP	PNP (3 wires) cable 2.5 mt.	8 mm
1580.HAN	NPN (3 wires) cable 2.5 mt.	8 mm
MHS.P	PNP (3 wires) cable 300 mm, M8 connector (use MCH1 or MCH2 connectors)	8 mm

Diagrams and connections









* The load (LOAD) can be connected either to negative or positive pole

Technical characteristics	1580.U	MRS.U	1580.UAP	MRS.UAP	1580.HAP	1580.HAN	MHS.P
Type of contact	N.O.						
Output type			PNP			NPN	PNP
Maximum current	100mA						
Maximum permanent power	14 VA - 10 W		4 VA - 3 W		3 W		
Voltage range	5 - 230V DC/AC	5 - 30V DC/AC	10 - 30 V DC/AC		10 - 30 V DC		
Working temperature	-10°C - +70°C						
Maximum voltage drop	3.5 V		0V * *		2 V		
Cable section (mm²)	2 x 0.14 Ø3.3mm PUR	2 x 0.14 Ø3.3mm PUR	3 x 0.14 Ø3.3 mm PUR		3 x 0.14 Ø3.3 mm PUR		
Degree of protection	tection IP 67						

^{**}Even if one sensor generates a voltage drop very close to 0 Volts, we suggest to connect no more than 30 sensors in series.

Cable ordering code

Connection 2 wires

MC1 cable 2 wires I=2.5m with M8 connector
MC2 cable 2 wires I=5m with M8 connector
MC3 cable 2 wires I=10m with M8 connector

MCH₁

MCH₂

МСН3

cable 3 wires I=2.5m with M8 connector cable 3 wires I=5m with M8 connector cable 3 wires I=10m with M8 connector



1 Brown (+) 4 Blue (-) 3 Not use

Connection 3 wires

onnector Sensor





1 Brown (+) 4 Black (signal) 3 Blue (-)