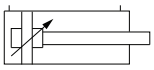
ISO Pneumatic Cylinders (Series S)

Features

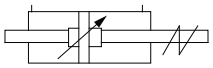
- Cylinders with aluminum casting end covers, aluminum casting piston and 'Square' profile aluminum tube
- High performance cylinders for modern demands
- Polyurethane seal ensures long life and high speed
- Dimensions as per ISO 15552, VDMA 24562
- Modern type injection moulded reed switch
- 3 psi minimum pressure to move cylinder
- Options: Bellows, viton seals, hollow shaft, rod extension and rod threading
- Specials: Reed switch, single-acting, stroke adjustable, double-ended and duplex

Available types

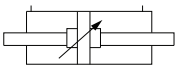
Cushion



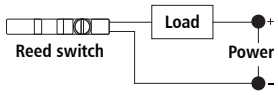
Stroke Adjustable



Double-Ended



Reed Switch Connect Diagram



Specifications

Bore sizes	32, 40, 50, 63, 80, 100, 125 mm
Medium	Compressed air (filtered and lubricated)
Design	Piston cylinder with magnetic and non magnetic version
Pressure range	7 to 150 psi (0.5 to 10 bar)
Temperature range	-10 °C to 60 °C, up to 150 °C with viton seals
Construction	End covers- aluminium, Tube- 'Square' profile aluminium semi-hard anodised, Piston rod- EN-8 hard chrome plated, stainless steel (optional), Piston- aluminium, Mountings- mild steel/cast iron, Seals- NBR, polyurethane

Ordering code

FPC	N	A	C	1	80	G	0125	X	X	M

Stroke

N	ISO New

Pressure

A	150 psi

Mountings

A	Front flange	G	Foot
B	Rear flange	I	Stud
C	Rear eye	J	Neck
D	Rear clevis	K	Basic
E	Intermediate trunnion		
F	Centre trunnion		

1	Cushion

Bore size

32	125
40	
50	
63	
80	
100	

Ram size

C	12
D	16
F	20
G	25
P	32

Type 1

X	Standard
1	Stroke adjustable
2	Double ended
4	Duplex
5	Single acting

Type 2

X	Std. (metric)
3	Female metric
4	Hollow male
5	Hollow female
6	Viton Seal

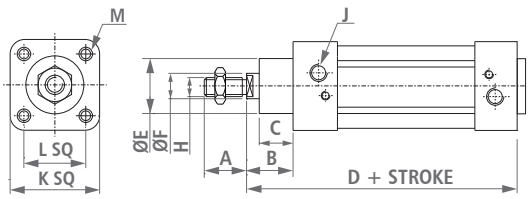
Type 3

M	Standard with magnet
9	Rod extension
0	Special

- Reed switch to be order separately, Part no. EP-39R-25M

Dimensions

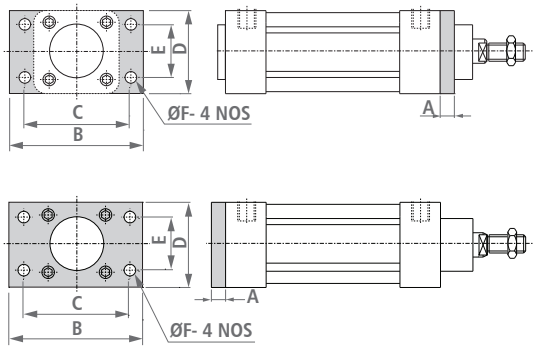
(All dimensions in mm)



Basic

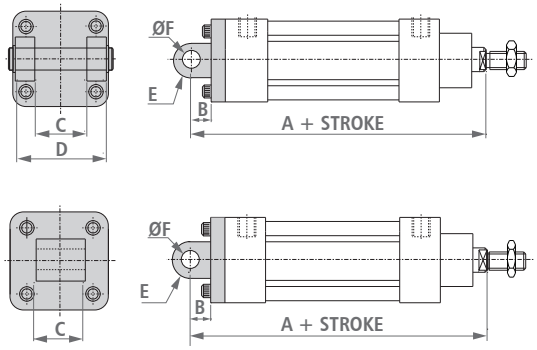
Bore	32	40	50	63	80	100	125
A	22	24	32	32	40	40	54
B	26	30	37	37	48	51	65
C	16	20	27	27	32	33	45
*D	120	135	143	158	174	189	225
E	30	35	40	45	45	55	60
F	12	16	20	20	25	25	32
H	M10X1.25	M12X1.25	M16X1.5	M16X1.5	M20X1.5	M20X1.5	M27X2
J	G 1/8	G 1/4	G 1/4	G 3/8	G 3/8	G 1/2	G 1/2
K	47	53.5	63.5	75	95	113	140
L	32.5	38	46.5	56.5	72	89	110
M	M6X1	M6X1	M8X1.25	M8X1.25	M10X1.5	M10X1.5	M12X1.75

* Stroke length above 1000 mm offered with stop tube



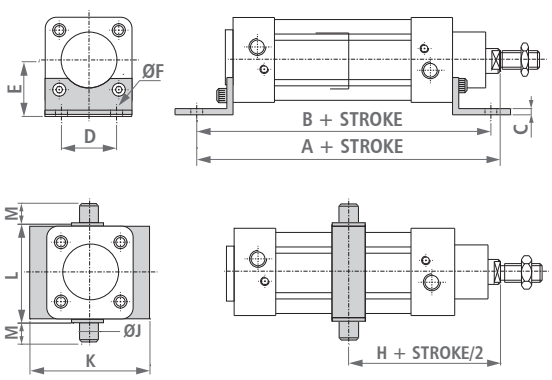
Front and rear flange mounting

Bore	32	40	50	63	80	100	125
A	10	10	12	12	16	16	20
B	80	90	110	120	150	170	224
C	64	72	90	100	126	150	180
D	46	54	64	75	95	112	140
E	32	36	45	50	63	75	90
F	7	9	9	9	12	14	16



Rear clevis and rear eye mounting

Bore	32	40	50	63	80	100	125
A	142	160	170	190	210	230	275
B	14	15	16	20	22	27	31
C	26	28	32	40	50	60	70
D	45	52	60	70	90	110	130
E	R 10	R 13	R 13	R 17	R 17	R 20	R 25
F	10	12	12	16	16	20	25

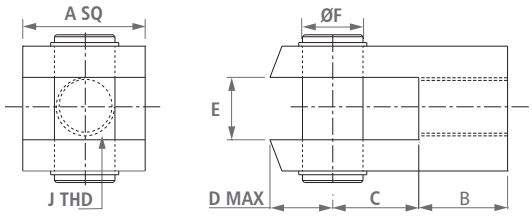


Foot and centre trunnion mounting

Bore	32	40	50	63	80	100	125
A	144	163	175	190	215	230	270
B	142	161	170	185	210	220	250
C	3	3.5	3.5	5	7	7	7
D	32	36	45	50	63	75	90
E	32	36	45	50	63	71	90
F	7	9	9	9	12	14	16
H	73	82.5	90	97.5	110	120	-
J	12	16	16	20	20	25	-
K	65	75	95	105	130	145	-
L	50	63	75	90	110	132	-
M	12	16	16	20	20	25	-

• For complete details, refer Product Data Sheet.

Rod fork

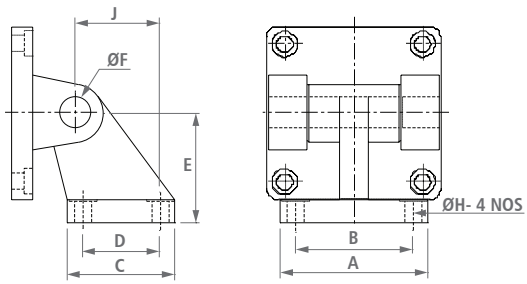


ISO Pneumatic Cylinders (Series M, R and S)

Bore	A	B	C	D	E	F	J
32	20	20	20	16	10.2	10	M10X1.25
40	24	24	24	19	12.2	12	M12X1.25
50, 63	30	34	32	25	16.2	16	M16X1.5
80, 100	38	40	40	32	20.2	20	M20X1.5
125	55	55	55	45	30	30	M27X2
160,200	70	72	72	53	35	35	M36X2

* Rod yoke type, rod end aligner and rod end spherical eye is also available

Hinge mounting



ISO Pneumatic Cylinders (Series M, R and S)

Bore	A	B	C	D	E	F	J	H
32	51	38	31	18	32	10	6.6	21
40	54	41	45	22	36	12	6.6	24
50	65	50	45	30	45	12	9	33
63	67	52	50	35	50	16	9	37
80	86	66	60	40	63	16	11	47
100	96	76	70	50	71	20	11	55
125	124	94	90	60	90	25	14	70

Thrust chart

Bore size (mm)		Air Pressure									Free Air Consumption in l/25 mm stroke @ 7 bar
		2 bar	3 bar	4 bar	5 bar	6 bar	7 bar	8 bar	9 bar	10 bar	
		Thrust (kgf)									
32	PUSH	13	19	26	32	39	45	52	58	64	0.16
	PULL	10	17	22	28	33	39	44	50	55	0.14
40	PUSH	20	30	40	50	60	70	80	90	100	0.25
	PULL	17	26	35	44	52	61	70	76	87	0.22
50	PUSH	32	47	63	78	94	110	125	141	157	0.39
	PULL	27	41	54	68	82	96	109	123	137	0.33
63	PUSH	50	75	100	124	149	174	199	224	249	0.62
	PULL	44	66	87	109	131	153	175	197	218	0.56
80	PUSH	88	121	161	201	241	281	321	361	402	1.00
	PULL	74	111	149	185	223	260	297	334	371	0.91
100	PUSH	126	188	251	314	377	440	502	565	628	1.57
	PULL	113	169	232	288	345	401	464	526	590	1.40
125	PUSH	210	330	435	545	650	770	870	990	1100	2.5
	PULL	200	310	410	500	600	720	820	920	1000	2.3
160	PUSH	350	530	720	900	1025	1250	1430	1600	1800	4.0
	PULL	330	508	675	840	950	1175	1350	1500	1700	3.8
200	PUSH	550	840	1120	1400	1600	1950	2250	2500	2800	6.4
	PULL	535	810	1000	1345	1525	1900	2150	2400	2700	6.0

NOTE
- The above thrust chart determines practical thrusts.
- Select force required by reading down from selected working pressure.
- Select working pressure on top of chart.
- Read out cylinder bore size on left of the chart.

- For complete details, refer Product Data Sheet.