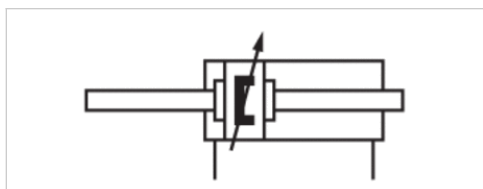


Tie rod cylinder, CNOMO NFE 49-001, Series C12P

- Ø 32-200 mm
- Ports G 1/8 G 1/4 G 3/8 G 1/2 G 3/4
- double-acting
- with magnetic piston
- Cushioning Pneumatically adjustable
- Piston rod External thread
- Piston rod through
- Optionally heat-resistant



Standards	CNOMO / NFE 49-001
Compressed air connection	Internal thread
Working pressure min./max.	2 ... 10 bar
Ambient temperature min./max.	-20 ... 80 °C
Medium temperature min./max.	-20 ... 80 °C
Medium	Compressed air
Max. particle size	50 µm
Oil content of compressed air	0 ... 5 mg/m³
Pressure for determining piston forces	6.3 bar

Technical data

Piston Ø Piston rod thread Ports Piston rod Ø	32 mm M10x1,5 G 1/8 12 mm	40 mm M16x1,5 G 1/4 18 mm	50 mm M16x1,5 G 1/4 18 mm	63 mm M16x1,5 G 1/4 22 mm	80 mm M20x1,5 G 3/8 22 mm	100 mm M27x2 G 1/2 30 mm
Stroke 25	7472402181	7472023529	R422703905	-	-	-
50	7472021550	7472022041	7471324420	7471326289	7472406150	R422708943
75	7471317888	7472022042	7471310083	-	-	7471324896
80	7472023405	7472023994	-	-	-	-
100	7471312799	7472022040	7471317521	7472023562	-	7471311782
125	R422702965	-	R422700407	7471325319	-	-
150	-	7471317115	7471324774	7471321341	7471317054	7471323790
200	R422710055	7472025980	7471322385	7472023563	7471315154	7472022039
250	R422711629	-	7471320419	-	7471314450	7471326059
300	-	R422703040	7471321031	-	R422710174	-
350	-	-	R422703927	-	7472414071	-
400	-	7471325091	7471318216	R422705208	7471323908	7472411264

Piston Ø Piston rod thread Ports Piston rod Ø	32 mm M10x1,5 G 1/8 12 mm	40 mm M16x1,5 G 1/4 18 mm	50 mm M16x1,5 G 1/4 18 mm	63 mm M16x1,5 G 1/4 22 mm	80 mm M20x1,5 G 3/8 22 mm	100 mm M27x2 G 1/2 30 mm
450	7472020401	-	-	7471326742	-	-
500	-	-	R422709680	7471321871	7472024901	-

Piston Ø Piston rod thread Ports Piston rod Ø	125 mm M27x2 G 1/2 30 mm	160 mm M36x2 G 3/4 40 mm	200 mm M36x2 G 3/4 40 mm
Stroke 25	-	-	-
50	-	R422715098	R422715100
75	-	-	-
80	-	-	-
100	7471326797	R422715099	R422715101
125	-	-	-
150	7471326351	-	-
200	7472020130	-	-
250	R422702924	-	-
300	7471313096	-	-
350	-	-	-
400	-	-	-
450	-	-	-
500	-	-	-

Other versions can be ordered from AVENTICS sales offices.

Technical data

Piston Ø	32 mm	40 mm	50 mm	63 mm	80 mm	100 mm	125 mm
Retracting piston force	435 N	600 N	1077 N	1724 N	2927 N	4503 N	7286 N
Extracting piston force	435 N	600 N	1077 N	1724 N	2927 N	4503 N	7286 N
Weight 0 mm stroke	0,45 kg	1 kg	1,35 kg	2,37 kg	2,47 kg	5,2 kg	6,05 kg
Weight +10 mm stroke	0,035 kg	0,055 kg	0,068 kg	0,086 kg	0,137 kg	0,183 kg	0,202 kg
Stroke max.	1600 mm	1900 mm	2100 mm	2500 mm	2600 mm	2600 mm	2600 mm

Piston Ø	160 mm	200 mm
Retracting piston force	11875 N	19000 N
Extracting piston force	11875 N	19000 N
Weight 0 mm stroke	12,9 kg	16,3 kg
Weight +10 mm stroke	0,352 kg	0,54 kg
Stroke max.	2600 mm	2600 mm

Technical information

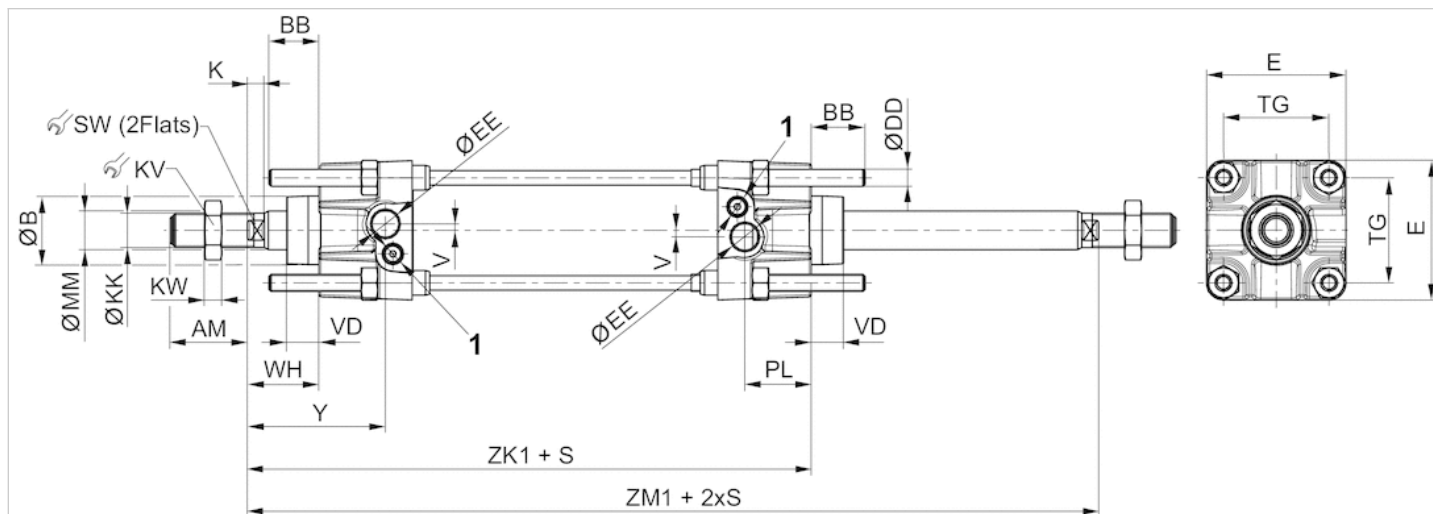
The pressure dew point must be at least 15 °C under ambient and medium temperature and may not exceed 3 °C .
The oil content of compressed air must remain constant during the life cycle.
Use only the approved oils from AVENTICS. Further information can be found in the "Technical information" document (available in the MediaCentre).
Optional heat-resistant variants are suitable for applications at temperatures up to 120 °C and do not have a magnetic piston.
You will find the order key and all valid configurations (customer information) in the Media Centre.

Technical information

Material	
Cylinder tube	Aluminum, anodized
Piston rod	Stainless steel
Front cover	Aluminum
End cover	Aluminum
Seal	Polyurethane
Nut for piston rod	Steel, galvanized
Tie-rods	Stainless steel

Dimensions

Dimensions



1) Flow control screw
S=stroke

Dimensions

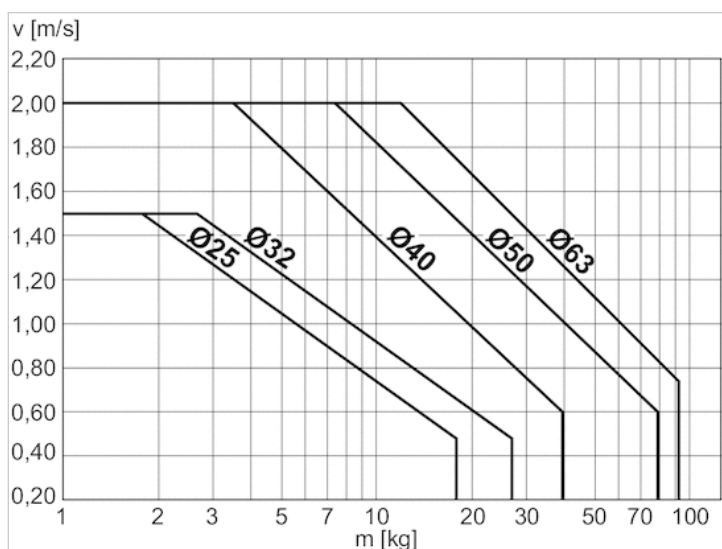
Piston Ø	AM	BB	Ø B e9	Ø DD	E	Ø EE	K	Ø KK	KV	KW	Ø MM	PL	SW	TG	V	VD	WH	Y
32 mm	20	17	25	M6	45	G1/8	6	M10x1,5	17	5	12	15	8	33	-	15	25	44
40 mm	36	17	32	M6	52	G1/4	8	M16x1,5	24	8	18	31	13	40	3	15	34	65
50 mm	36	23	32	M8	65	G1/4	8	M16x1,5	24	8	18	31	13	49	3	15	34	65
63 mm	46	23	45	M8	75	G3/8	10	M20x1,5	30	10	22	32	17	59	5	20	39	71
80 mm	46	28	45	M10	95	G3/8	10	M20x1,5	30	10	22	32	17	75	9	20	39	71
100 mm	63	28	55	M10	115	G1/2	16	M27x2	41	13.5	30	37	22	90	-	20	47	84

Piston Ø	AM	BB	Ø B e9	Ø DD	E	Ø EE	K	Ø KK	KV	KW	Ø MM	PL	SW	TG	V	VD	WH	Y
125 mm	63	34	55	M12	140	G1/2	16	M27x2	41	13.5	30	37	22	110	-	20	47	84
160 mm	85	42	65	M16	180	G3/4	16	M36x2	55	18	40	45	32	140	-	25	50	95
200 mm	85	42	65	M16	220	G3/4	16	M36x2	55	18	40	45	32	175	-	25	50	95

Piston Ø	ZK1	ZM1
32 mm	115	140
40 mm	163	197
50 mm	163	197
63 mm	182	221
80 mm	182	221
100 mm	211	258
125 mm	211	258
160 mm	250	300
200 mm	250	300

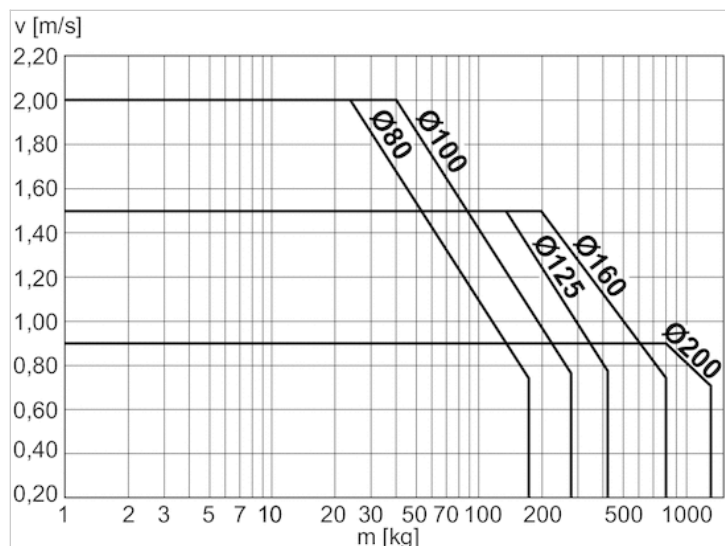
Diagrams

Cushioning diagram



v = Piston velocity [m/s]
 m = Cushionable mass [kg]

Cushioning diagram



v = Piston velocity [m/s]
m = Cushionable mass [kg]