

DOUBLE ACTING PNEUMATIC CYLINDERS TANDEM VDMA 24562, NF E 49003.1



Tandem cylinder is built-up from two or three cylinders, has common piston rod and almost double or triple thrust and return force. Cylinders are designed to meet the specifications of international standard ISO 6431, VDMA 24562 a NF E 49003.1 for mounting. The cylinders can work in higher temperatures by request. Fully adjustable cushioning at end of stroke is available.

Working pressure	0.6 MPa
Min. pressure	0.15 MPa
Max. pressure	1.0 MPa
Temp. range	-20°C to +80°C *
Working medium	modified compressed air

*) values are valid for standard gaskets

Piston diameter [mm]	63	80	100	125	160	200	250	320
Thrust at 0.6 MPa [N] for double tandem	3552	5737	9130	14243	23373	36945	57726	94639
Return force at 0.6 MPa [N] for double tandem	3363	5442	8835	13761	22618	36192	56548	92769
Thrust at 0.6 MPa [N] for triple tandem	5234	8458	13548	21124	34682	55041	86002	141023
Return force at 0.6 MPa [N] for triple tandem	5045	8164	13253	20641	33927	54288	84823	139153
Connection	G3/8"	G3/8"	G1/2"	G1/2"	G3/4"	G3/4"	G1"	G1"
Length of adjustable cushioning [mm]	16	20	25	25	32	32	36	48
Max. stroke [mm] *	500*	1000*	1000*	1000*	1000*	1000*	1000*	1000*
Weight 0 mm stroke [kg] for double tandem	2.83	5.5	7.2	12.7	26.1	37.3	52.5	105.0
Weight add. per 1 mm stroke [kg] for double tandem	0.010	0.014	0.020	0.026	0.044	0.054	0.060	0.120
Weight 0 mm stroke [kg] for triple tandem	4.00	8.2	10.2	17.8	38.9	54.1	76.0	140.0
Weight add. per 1 mm stroke [kg] for triple tandem	0.014	0.019	0.029	0.036	0.060	0.078	0.086	0.175

*) Stroke of cylinder may be longer after agreement with our technical dept.

Order codes

10122 60 00 160 0100

Type	Equipment	Options	Piston diameter	Stroke / Repair kit
10122 double tandem, double acting	00 w/o cushioning, w/o magnet	00 without options	063 63 mm	xxxx mm of stroke e.g.: 0100 = stroke 100 mm
10123 triple tandem, double acting	05 double ended piston rod, w/o cushioning, w/o magnet	10 Viton® piston rod sealing	080 80 mm	9999 repair kit
	10 w/o cushioning, with magnet	11 Viton® gaskets (up to 180°C)	100 100 mm	
	15 double ended piston rod, w/o cushioning, with magnet	13* tie rod version	125 125 mm	
	50 with cushioning, w/o magnet	14 1.4301 stainless steel piston rod	160 160 mm	
	55 double ended piston rod, with cushioning, w/o magnet	16 steel parts from stainless 1.4301 piston rod stainless 1.4401	200 200 mm	
	60 with cushioning, with magnet	37 composite round tube+opt. 10 and 16	250 250 mm	
	65 double ended piston rod, with cushioning, with magnet		320 320 mm	

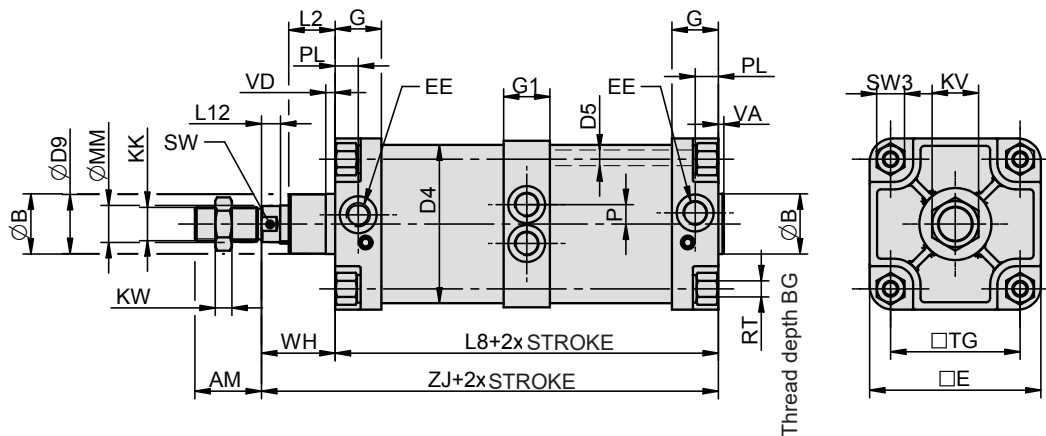
For more options regarding materials or dimensions, please contact our technical dept.

*) For piston dia. 63 to 100 incl.

Construction / materials

- caps: drawn dural profile, anodised, piston dia. 100 and more: aluminium casting, anodised
- centre part: drawn dural profile, anodized
- body: drawn dural profile, anodized, piston dia. 125 and more: drawn dural tube, anodized
- piston rod: grounded round steel bar CK45 with hard chrome plated surface

Dimensions

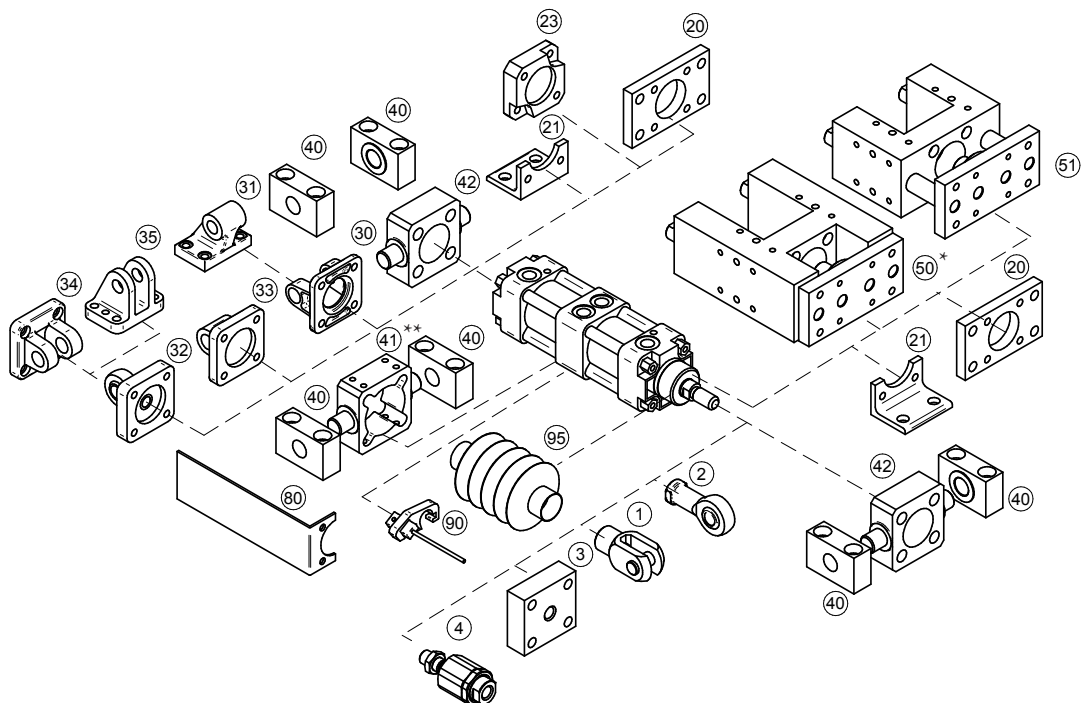


∅	AM	B	BG	D4	D5	D9	E	EE	G	G1	KK	KV	KW	L2	L8*	L8**	L12	MM	P	PL	RT	SW	SW3	TG	VA	VD	WH	ZJ*	ZJ**
63	32	45	17	68	8	44	75	G3/8"	30	26	M16x1,5	24	8	23	208*	295**	10	20	6	16	M8	16	14	56.5	4	5	37	245*	332**
80	40	45	19	86	10	44	95	G3/8"	30	30	M20x1,5	30	9	31	226*	324**	10	25	16	16	M10	21	17	72	4	5	46	272*	370**
100	40	55	19	106	10	54	115	G1/2"	36	36	M20x1,5	30	9	34	240*	342**	10	25	16	18	M10	21	17	89	4	17	51	291*	393**
125	54	60	20	132	12	58	140	G1/2"	40	32	M27x2	41	12	50	272*	384**	14	32	16	22	M12	27	22	110	6	6	65	337*	449**
160	72	65	24	171	16	64	185	G3/4"	50	50	M36x2	50	14	50	314*	446**	20	40	21	25	M16	36	30	140	6	10	80	394*	526**
200	72	75	24	210	16	74	235	G3/4"	50	50	M36x2	50	14	55	310*	440**	20	40	25	25	M16	36	30	175	6	20	95	405*	535**
250	84	90	30	262	20	84	270	G1"	54	54	M42x2	65	21	76	346*	492**	22	50	32	32	M20	46	36	220	10	10	105	451*	597**
320	96	110	30	340	24	100	350	G1"	57	57	M48x2	75	24	85	383*	546**	27	63	23	32	M24	55	41	270	10	35	120	503*	666**

*) Values are valid for double tandem

***) Values are valid for triple tandem

Mounting accessories



Mounting accessories	... see page
1 Piston rod clevis	... 4-2
2 Piston rod eye	... 4-3
3 Flanged piston rod coupling	... 4-2
4 Self-aligning piston rod coupling	... 4-3
20 Flange mounting	... 4-6
21 Foot mounting	... 4-4
23 Boxer flange mounting	... 4-22
30 Swivel flange	... 4-8
31 Clevis foot mounting	... 4-8
32 Swivel flange with spherical bearing	... 4-10
33 Swivel flange	... 4-7
34 Narrow swivel flange	... 4-9
35 Rectangular swivel flange	... 4-9
40 Trunnion mounting	... 4-12
41 Pivot pin**	... 4-11
42 Pivot pin to front/end cap	... 4-12
50 Guide unit H with ball bearings*	... 4-18
51 Guide unit with slide bearings*	... 4-20
80 Valve bracket	... 4-22
90 Prox. switch	... 3-2, 3-4, 3-7
95 Piston rod protective cover	... 4-23

*) When guide unit H or U is used on cylinder with magnetic piston, it is necessary to use cylinder with tie rod version (option No. 13).

There is no free space to mount switch bracket near the front cap when the profile tube is used (position for extend piston rod).

***) Type of pivot pin should be selected accordingly to the cylinder profile/tube - with cutout for profile or for round tube.