

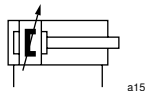
Piston rod cylinders ▶ Standard cylinders

Profile cylinder ISO 15552, Series PRA

▶ Ports: G 1/8 - G 1/2 ▶ double-acting ▶ with magnetic piston ▶ Cushioning: pneumatically, adjustable ▶ Piston rod: external thread ▶ silicone-free ▶ heat resistant



00134193



Standards

Compressed air connection

ISO 15552

Internal thread

Working pressure min./max.

2 bar / 10 bar

Ambient temperature min./max.

-10°C / +120°C

Medium temperature min./max.

-10°C / +120°C

Medium

Compressed air

Max. particle size

50 µm

Oil content of compressed air

0 mg/m³ - 5 mg/m³

Pressure for determining piston forces

6,3 bar

Materials:

Cylinder tube

Aluminum, anodized

Piston rod

Stainless steel

Front cover

Die-cast aluminum

End cover

Die-cast aluminum

Seal

Fluorocautchouc

Nut for piston rod

Steel, galvanized

Scraper

Fluorocautchouc

Technical Remarks

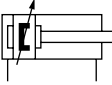
- The pressure dew point must be at least 15 °C under ambient and medium temperature and may not exceed 3 °C.
- The oil content of compressed air must remain constant during the life cycle.
- Use only the approved oils from AVENTICS, see chapter „Technical information“.

Piston Ø	[mm]	32	40	50	63	80
Retracting piston force	[N]	435	660	1035	1765	2855
Extracting piston force	[N]	505	790	1235	1960	3165
Cushioning length	[mm]	11.5	15	17	16.5	19.5
Cushioning energy	[J]	4.8	9	15	27	54
Weight	0 mm stroke	[kg]	0.5	0.65	1.06	1.42
	+10 mm stroke	[kg]	0.022	0.032	0.047	0.054
Stroke max.	[mm]	1600	1900	2100	2500	2800
Working pressure min./max.	[bar]	1.5 - 10	1.5 - 10	1.5 - 10	1.5 - 10	1.5 - 10

Piston Ø	[mm]	100	125			
Retracting piston force	[N]	4635	7220			
Extracting piston force	[N]	4945	7725			
Cushioning length	[mm]	19.5	22			
Cushioning energy	[J]	88	140			
Weight	0 mm stroke	[kg]	3.51	6.72		
	+10 mm stroke	[kg]	0.1	0.15		
Stroke max.	[mm]	2800	2750			
Working pressure min./max.	[bar]	1.5 - 10	1.5 - 10			

Profile cylinder ISO 15552, Series PRA

▶ Ports: G 1/8 - G 1/2 ▶ double-acting ▶ with magnetic piston ▶ Cushioning: pneumatically, adjustable ▶ Piston rod: external thread ▶ silicone-free ▶ heat resistant

	Piston Ø Piston rod thread Ports Piston rod Ø	32 M10x1,25 G 1/8 12	40 M12x1,25 G 1/4 16	50 M16x1,5 G 1/4 20	63 M16x1,5 G 3/8 20	80 M20x1,5 G 3/8 25
	Stroke 25	R412014229	R412014243	R412014257	R412014278	R412014304
	50	R412014230	R412014168	R412014258	R412014225	R412014305
	80	R412014231	R412014170	R412014162	R412014279	R412014306
	100	R412014232	R412014244	R412014259	R412014280	R412014307
	125	R412014182	R412014216	R412014260	R412014281	R412014308
	160	R412014233	R412014245	R412014261	R412014282	R412014309
	200	R412014234	R412014246	R412014262	R412014283	R412014210
	250	R412014235	R412014247	R412014263	R412014214	R412014219
	320	R412014236	R412014248	R412014183	R412014284	R412014310
	400	R412014237	R412013926	R412014264	R412014285	R412014206
	500	R412014238	R412014249	R412014265	R412014286	R412014311
	Piston Ø Piston rod thread Ports Piston rod Ø	100 M20x1,5 G 1/2 25	125 M27x2 G 1/2 32			
	Stroke 25	R412014327	R480605337			
	50	R412014328	R480605338			
	80	R412014329	R480605339			
	100	R412014330	R480605340			
	125	R412014331	R480605341			
	160	R412014332	R480605342			
	200	R412014333	R480605343			
	250	R412013911	R480605146			
	320	R412014334	R480605344			
	400	R412014335	R480605345			
	500	R412014336	R480605346			

Configurable product

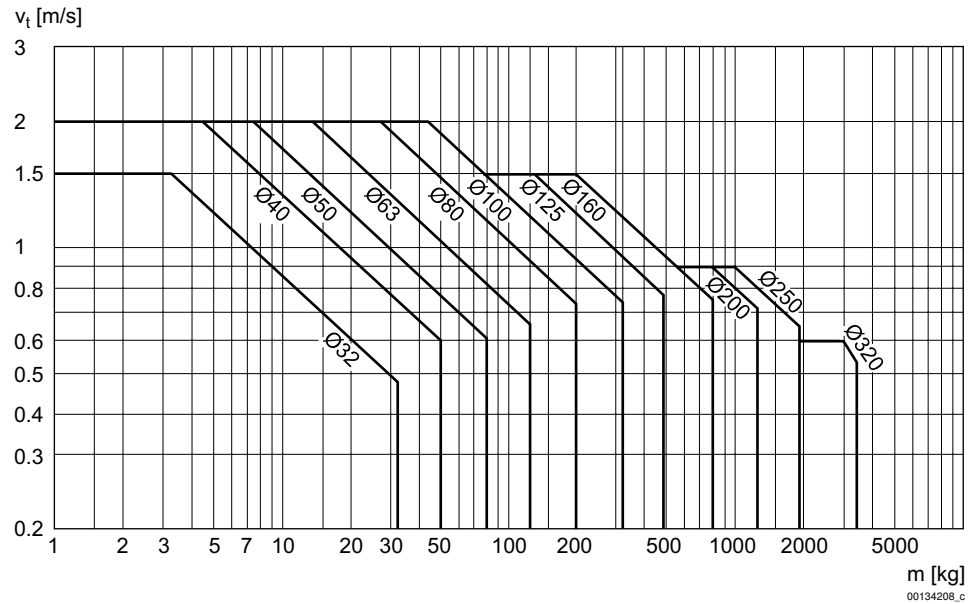

This product is configurable. Please use our Internet configurator at <http://www.aventics.com> or contact the nearest AVENTICS sales office.

Piston rod cylinders ▶ Standard cylinders

Profile cylinder ISO 15552, Series PRA

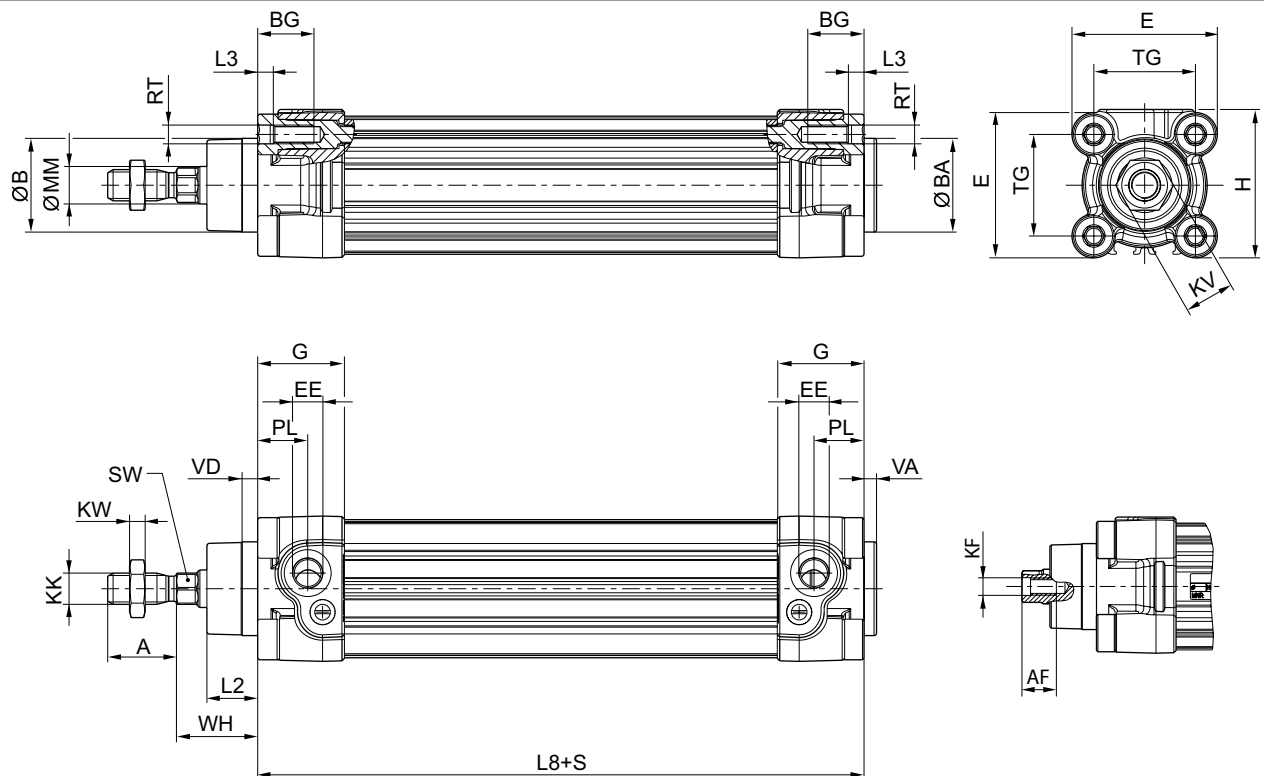
▶ Ports: G 1/8 - G 1/2 ▶ double-acting ▶ with magnetic piston ▶ Cushioning: pneumatically, adjustable ▶ Piston rod: external thread ▶ silicone-free ▶ heat resistant

Cushioning diagram



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

Dimensions



S = stroke

Part numbers marked in bold are available from the central warehouse in Germany, see the shopping basket for more detailed information

Pneumatics catalog, online PDF, as of 2017-05-02, ©AVENTICS S.à r.l., subject to change

Profile cylinder ISO 15552, Series PRA

▶ Ports: G 1/8 - G 1/2 ▶ double-acting ▶ with magnetic piston ▶ Cushioning: pneumatically, adjustable ▶ Piston rod: external thread ▶ silicone-free ▶ heat resistant

Piston Ø	A -2	AF+1	ØB d11	ØBA d11	BG min.	E	EE	G	H	KF	KK
32	22	12	30	30	16	46.5	G 1/8	27.75	47.5	M6	M10x1,25
40	24	13.5	35	35	16	53	G 1/4	33.25	53	M8	M12x1,25
50	32	17	40	40	16	65	G 1/4	31	65	M10	M16x1,5
63	32	17	45	45	16	75	G 3/8	38.25	75	M10	M16x1,5
80	40	21	45	45	17	95	G 3/8	38.25	95	M12	M20x1,5
100	40	21	55	55	17	115	G 1/2	42.25	115	M12	M20x1,5
125	54	28	60	60	20	140	G 1/2	53.85	140	M16	M27x2

Piston Ø	KV	KW	ØMM f8	PL	L2	L3 ±0,5	L8	RT	SW	TG	VA -1	VD
32	16	5	12	16	16.25	4.5	94±0,4	M6	10	32,5±0,5	4	5
40	18	6	16	20	18.25	4.5	105±0,7	M6	13	38±0,5	4	5
50	24	8	20	19	25	4.5	106±0,7	M8	17	46,5±0,6	4	5
63	24	8	20	24	25	4.5	121±0,8	M8	17	56,5±0,7	4	5
80	30	10	25	23.5	33	0	128±0,8	M10	22	72±0,7	4	5
100	30	10	25	25	36	0	138±1	M10	22	89±0,7	4	5
125	41	13.5	32	33	45	0	160±1	M12	27	110±1,1	6	7

Piston Ø	WH											
32	26±1,4											
40	30±1,4											
50	37±1,4											
63	37±1,8											
80	46±1,8											
100	51±1,8											
125	65±2,2											