# **AVENTICS Series BCP Bellow actuators**





The AVENTICS Series BCP cylinders are bellow actuators with firmly flanged steel covers and bellows made of natural rubber in the standard version. The heat-resistant version is distinguished by bellows made of epichlorohydrin rubber (ECO) and the corrosion-resistant version by stainless steel covers (V2A).

- Bellow cylinder with permanently crimped connecting plates
- Permit high forces in small installation space
- Enables angular movements and axial offset
- High corrosion and temperature resistance
- Tested safety up to 24 bar





Bellow actuator with cover single Single-acting, retracted without pressure

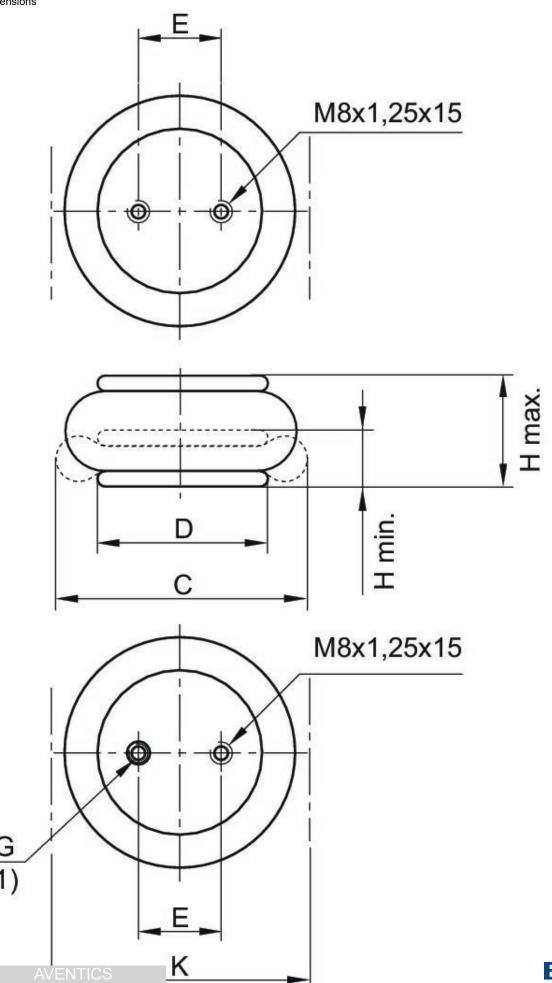




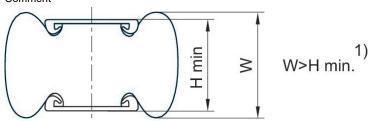
Cover diam [mm]	eter	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
	90	G 1/8	50	160	2500	5500	1.2	0822419001



Dimensions







Part No.	Compressed air con- nection G	H min mm	H max mm	C mm	D mm	E ±0,5 [mm]	K mm	Return force, min. N
0822419001	G 1/8	50	100	145	90	20	160	120



Bellow actuator with cover single Single-acting, retracted without pressure

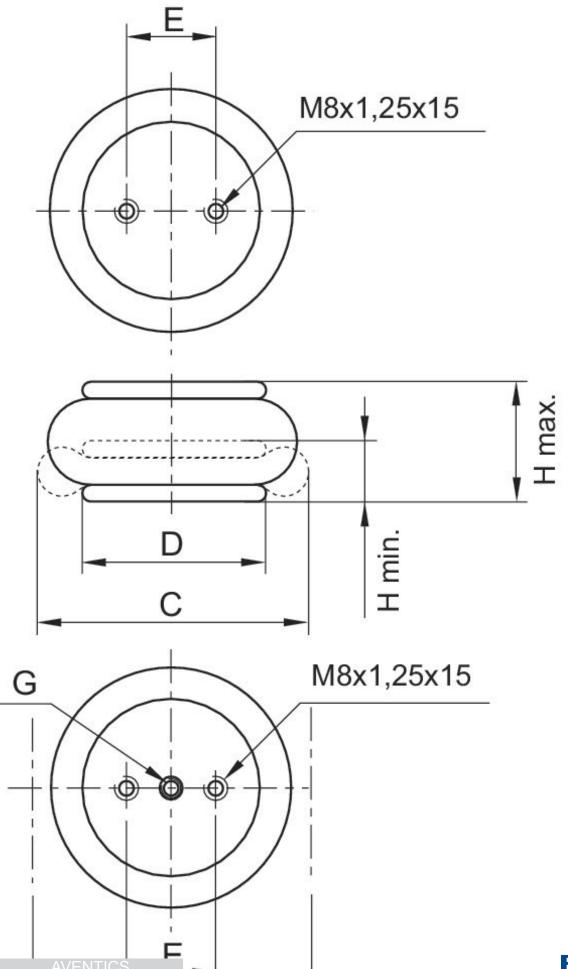




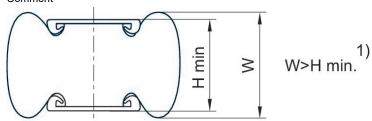
Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
108	G 1/4	34	165	3500	6900	1.2	R412010198
108	G 1/4	54	180	4500	7500	1.2	0822419002
114	G 1/4	79	225	4300	10900	1.4	R412010199
141	G 3/4	75	230	6100	13600	2	0822419003
141	G 3/4	79	245	6900	14700	1.9	1923061000
141	G 3/4	107	250	7000	14000	1.9	R412010197











Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	K mm	Return force, min. N
R412010198	G 1/4	51	85	150	108	44.5	165	250
0822419002	G 1/4	51	105	165	108	44.5	180	200
R412010199	G 1/4	51	130	210	114	44.5	225	45
0822419003	G 3/4	50	125	215	141	70	230	200
1923061000	G 3/4	51	130	231	141	70	245	200
R412010197	G 3/4	51	158	235	141	70	250	200



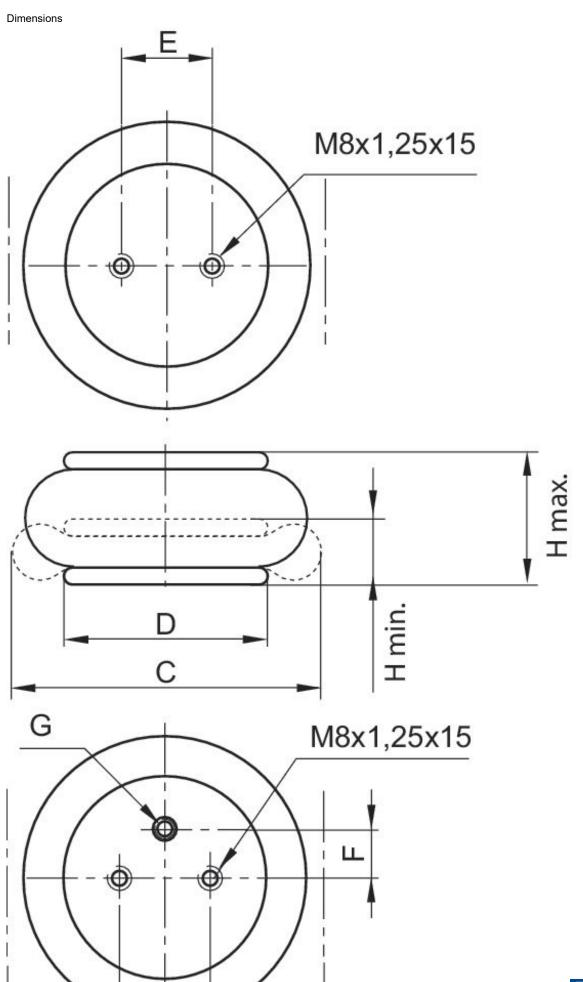
Bellow actuator with cover single Single-acting, retracted without pressure



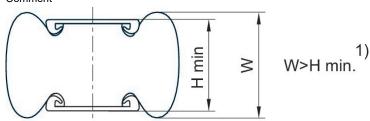


Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
161	G 3/4	74	265	9300	17300	2.3	0822419004
228	G 3/4	89	340	19400	33300	3.9	1933091000









Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	F ±0,5 [mm]	K mm	Return force, min. N
0822419004	G 3/4	51	125	250	161	89	38.1	265	200
1933091000	G 3/4	51	140	325	228	157.5	73	340	300



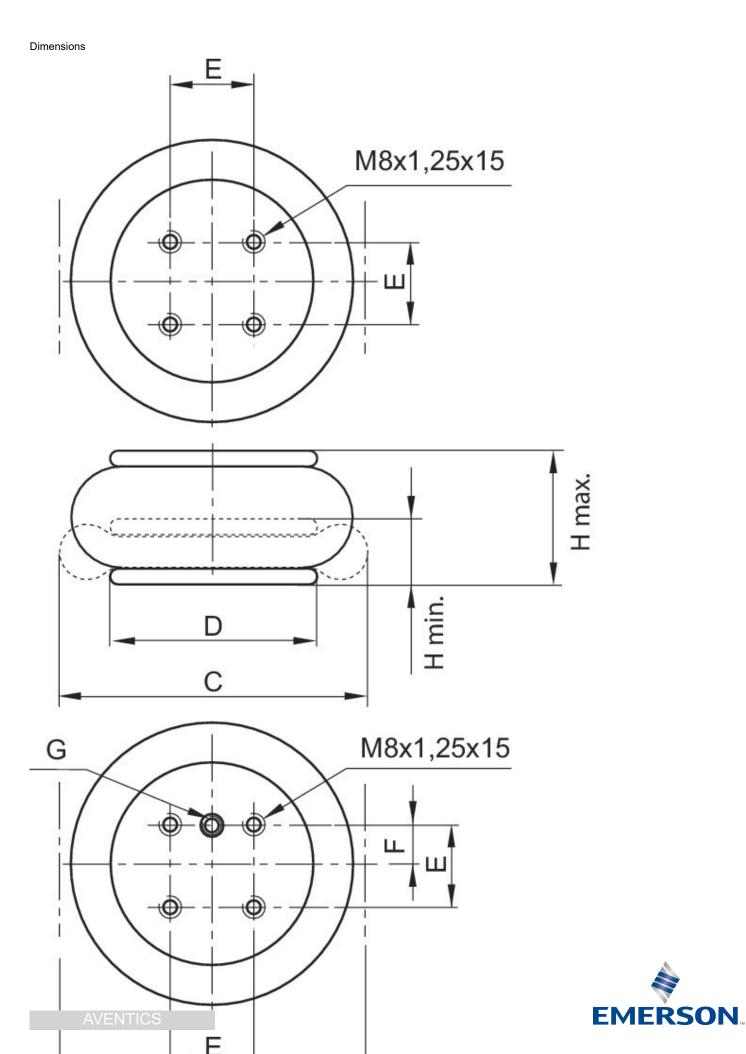
Bellow actuator with cover single Single-acting, retracted without pressure

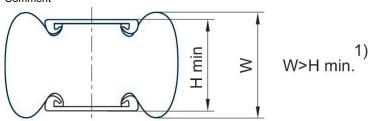




Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
287	G 3/4	104	400	26100	50000	5.9	1938091000
287	G 3/4	109	420	35200	52200	6.1	2999636900







Pa	rt No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	F ±0,5 [mm]	K mm	Return force, min. N
R412	010220	G 3/4	51	155	385	287	158.8	79.4	400	300



Bellow actuator with cover double Single-acting, retracted without pressure

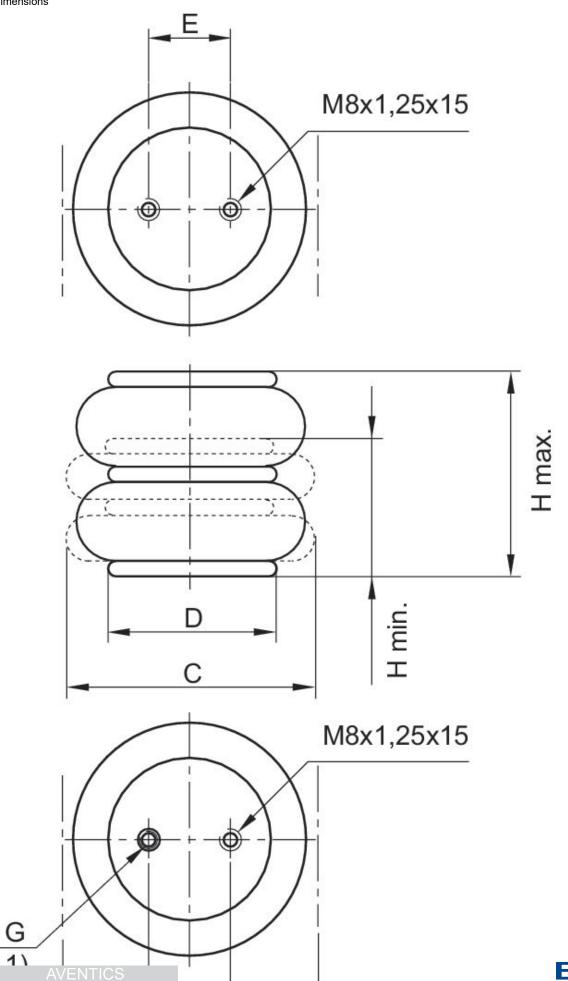




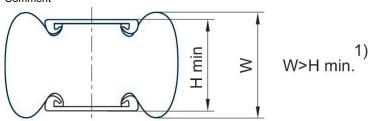
Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
90	G 1/8	95	160	2100	5600	1.3	0822419040



Dimensions







Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	K mm	Return force, min. N
0822419040	G 1/8	70	165	145	90	20	160	200



Bellow actuator with cover double Single-acting, retracted without pressure

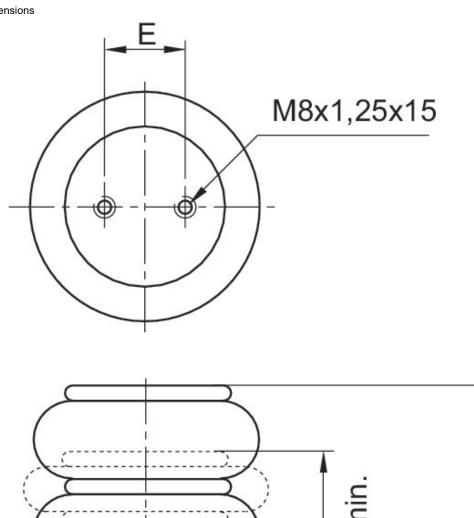


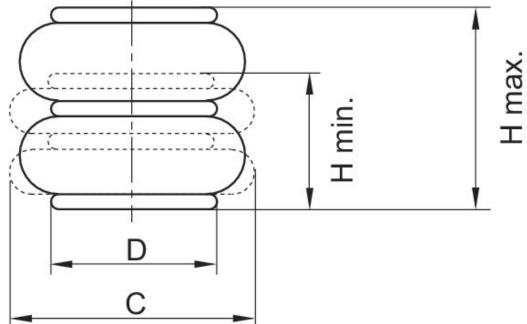


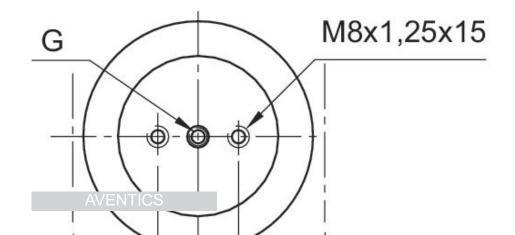
Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
108	G 1/4	108	180	3500	8700	1.5	0822419041
141	G 1/4	123	215	5000	12600	2.1	2999640000
141	G 3/4	130	230	7000	13000	2.3	0822419042
141	G 3/4	153	235	7700	14800	2.3	1922161000



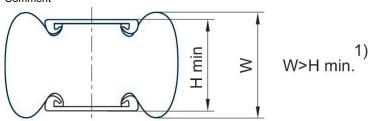












Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	K mm	Return force, min. N
0822419041	G 1/4	72	180	165	108	44.5	180	200
2999640000	G 1/4	72	195	203	141	70	215	200
0822419042	G 3/4	75	205	215	141	70	230	200
1922161000	G 3/4	77	230	218	141	70	235	200



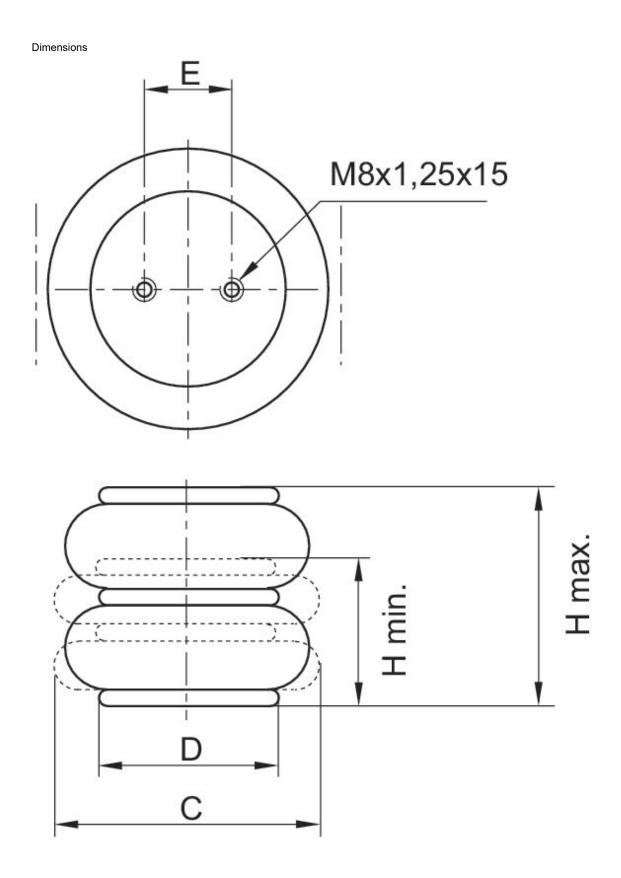
Bellow actuator with cover double Single-acting, retracted without pressure

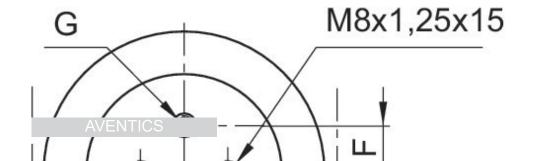




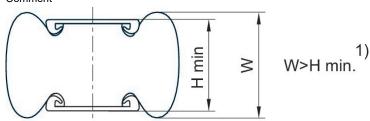
Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
161	G 3/4	165	250	7700	20000	3	0822419043
161	G 3/4	183	265	8700	20100	3.2	R412010042
161	G 3/4	223	275	8200	19500	3.5	2999619400
228	G 3/4	190	340	17000	35400	4.8	1933181000
228	G 3/4	223	355	20500	36800	5.1	2999638300











Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	F ±0,5 [mm]	K mm	Return force, min. N
0822419043	G 3/4	75	240	250	161	89	38.1	250	200
R412010042	G 3/4	77	260	255	161	89	38.1	265	200
2999619400	G 3/4	77	300	260	161	89	38.1	275	250
1933181000	G 3/4	75	265	325	228	157.5	73	340	300
2999638300	G 3/4	77	300	340	228	157.5	73	355	300



Bellow actuator with cover double Single-acting, retracted without pressure

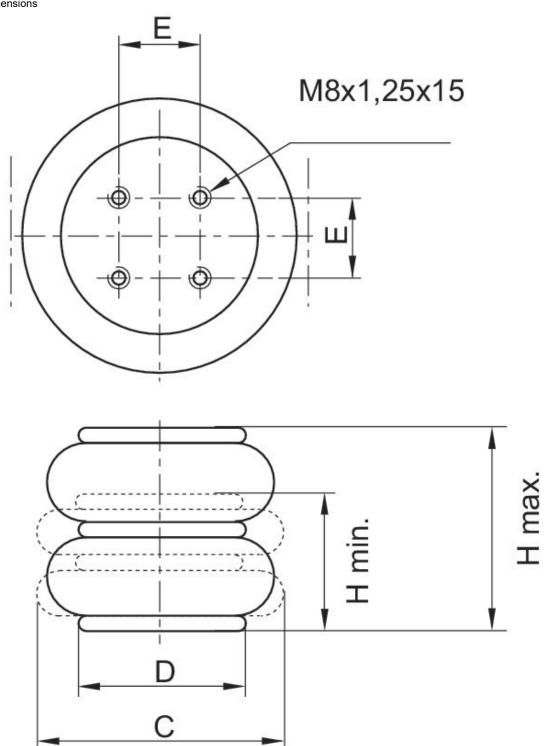


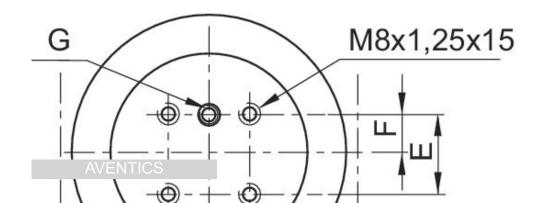


Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
287	G 3/4	193	400	27400	49600	6.9	1938191000
287	G 3/4	223	415	27800	52600	7.3	R412010200
287	G 3/4	253	420	30000	55000	7.7	2999610900

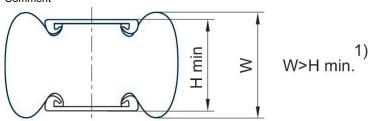












Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	F ±0,5 [mm]	K mm	Return force, min. N
1938191000	G 3/4	77	270	385	287	158.8	79.4	400	400
R412010200	G 3/4	77	300	400	287	158.8	79.4	415	400
2999610900	G 3/4	77	330	405	287	158.8	79.4	420	400



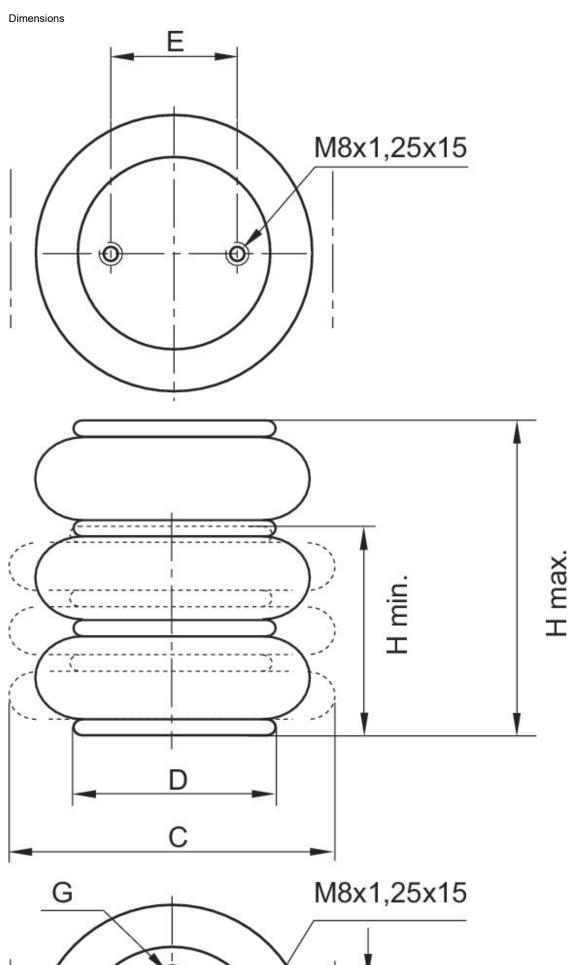
Bellow actuator with cover triple Single-acting, retracted without pressure





Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
228	G 3/4	285	345	17100	34500	5.9	2999612800







Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	F ±0,5 [mm]	K mm	Return force, min. N
2999612800	G 3/4	110	395	325	228	157.5	73	345	400



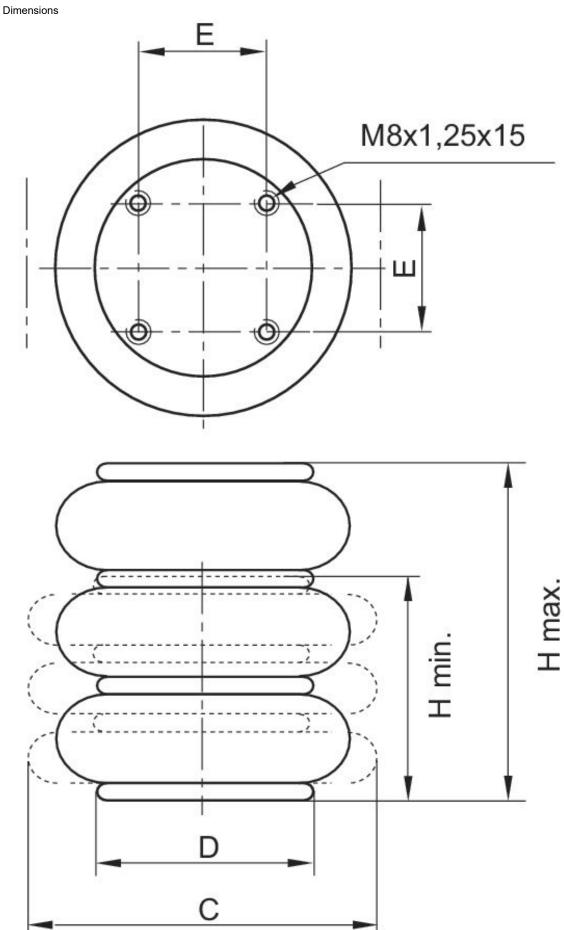
Bellow actuator with cover triple Single-acting, retracted without pressure





Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
287	G 3/4	275	410	28700	52600	8	1938281000







Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	F ±0,5 [mm]	K mm	Return force, min. N
1938281000	G 3/4	110	385	384	287	158.8	79.4	410	500



Heat resistant Internal thread Bellow actuator with cover single Single-acting, retracted without pressure

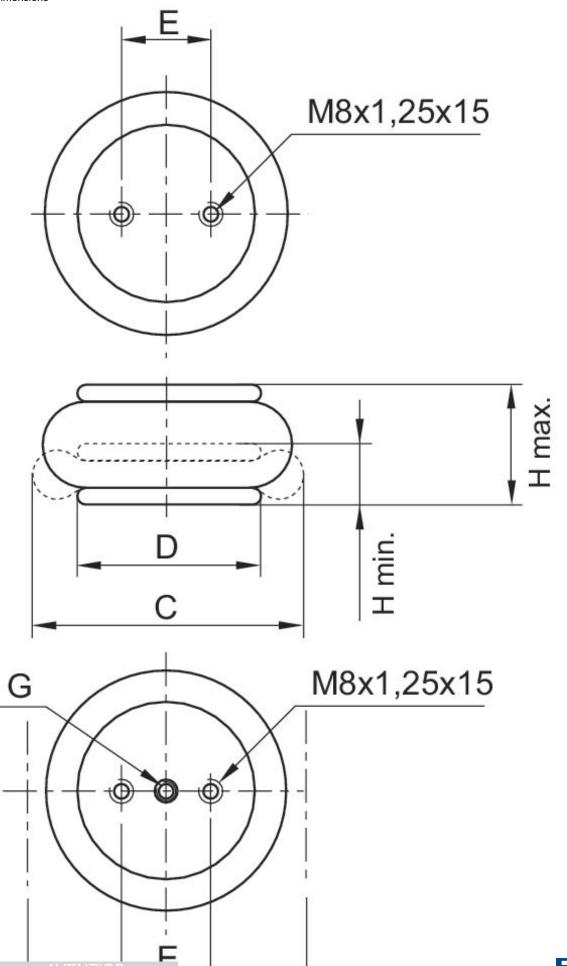




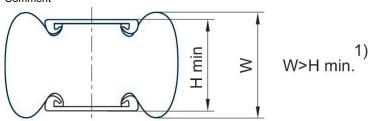
Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
108	G 1/4	31	165	3500	6900	1.4	R412010207
108	G 1/4	54	180	4500	7500	1.2	R412004943
114	G 1/4	76	225	4300	10900	1.4	R412010208
141	G 3/4	75	230	6100	13600	2	R412007812
141	G 3/4	107	250	7000	14000	1.9	R412010209











Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	K mm	Return force, min. N
R412010207	G 1/4	54	85	150	108	44.5	165	250
R412004943	G 1/4	51	105	165	108	44.5	180	200
R412010208	G 1/4	54	130	210	114	44.5	225	45
R412007812	G 3/4	50	125	215	141	44.5	230	200
R412010209	G 3/4	54	158	235	141	70	250	200



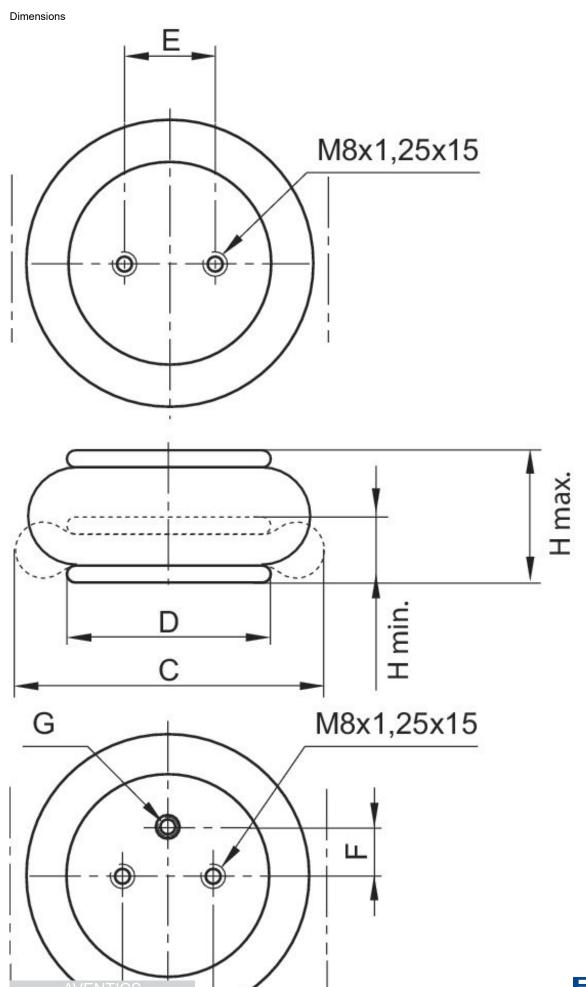
Heat resistant Internal thread Bellow actuator with cover single Single-acting, retracted without pressure



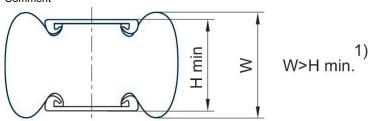


Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
161	G 3/4	74	265	9300	17300	2.3	R412010210
228	G 3/4	89	340	19400	33300	3.9	R412010211









Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	F ±0,5 [mm]	K mm	Return force, min. N
R412010210	G 3/4	54	125	250	161	89	38.1	265	200
R412010211	G 3/4	54	140	325	228	157.5	73	340	300



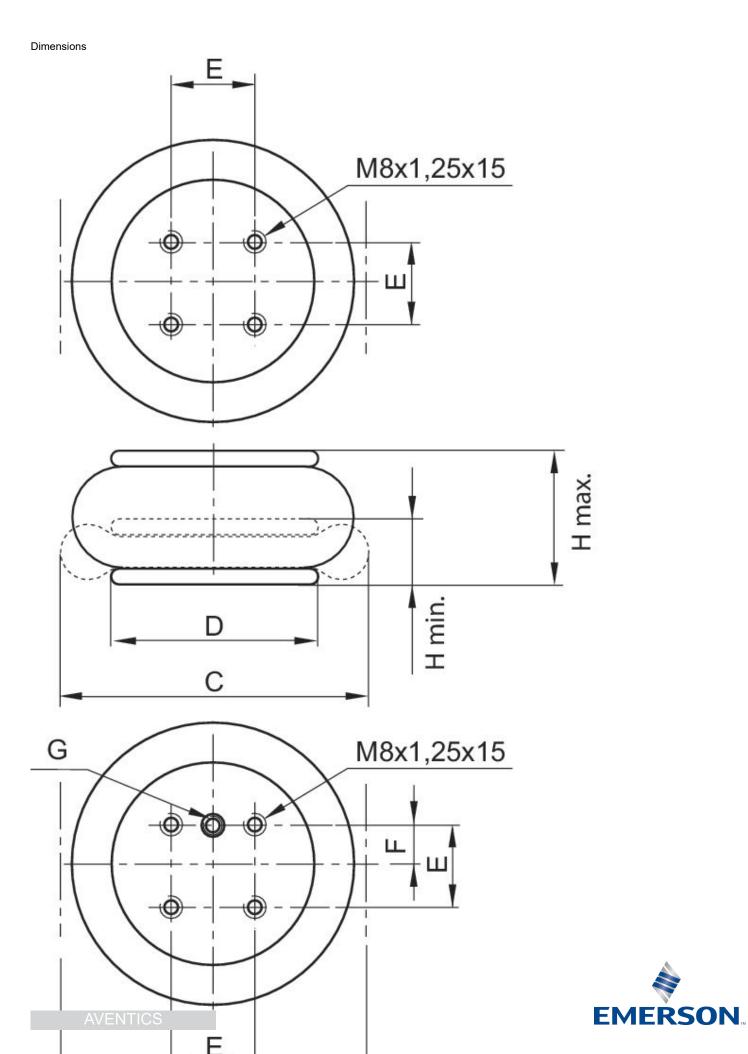
Heat resistant Internal thread Bellow actuator with cover single Single-acting, retracted without pressure

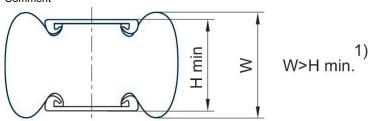




Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
287	G 3/4	104	400	26100	50000	5.9	R412010212







Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	F ±0,5 [mm]	K mm	Return force, min. N
R412010212	G 3/4	54	155	385	287	158.8	79.4	400	300



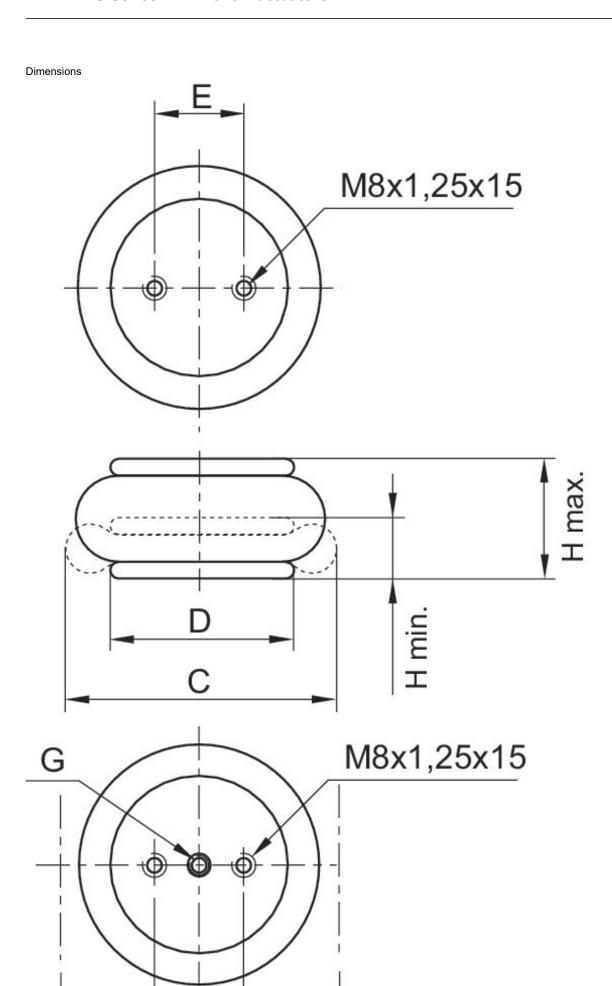
Heat resistant Internal thread Bellow actuator with cover double Single-acting, retracted without pressure



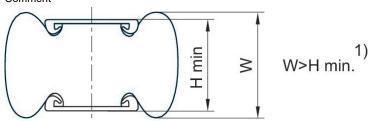


Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
108	G 1/4	108	180	3500	8700	1.5	R412010213
141	G 3/4	153	235	7700	14800	2.3	R412010214
228	G 3/4	190	340	17000	35400	4.8	R412010476









Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	K mm	Return force, min. N
R412010213	G 1/4	78	180	165	108	44.5	180	200
R412010214	G 3/4	83	230	218	141	70	235	200
R412010476	G 3/4	75	305	325	228	157,5	340	300



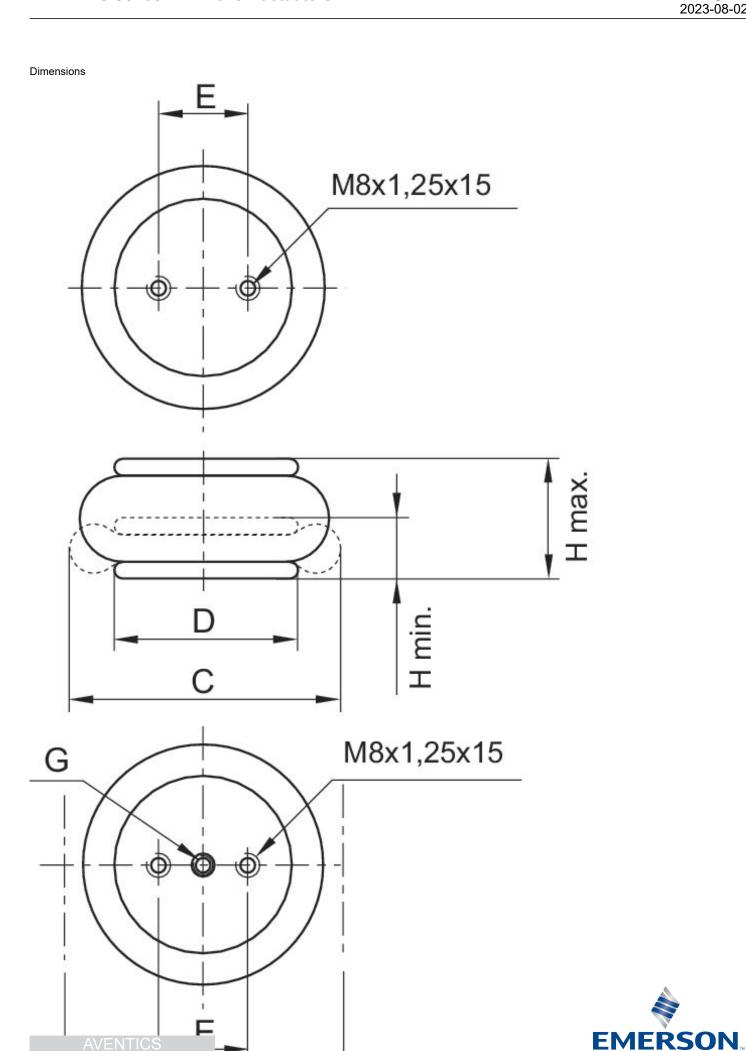
High corrosion Internal thread Bellow actuator with cover single Single-acting, retracted without pressure





Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
108	G 1/4	34	165	3500	6900	1.2	R412010215
114	G 1/4	79	225	4300	10900	1.4	R412010216
141	G 3/4	107	250	7000	14000	1.9	R412010217





Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	K mm	Return force, min. N
R412010215	G 1/4	51	85	150	108	44.5	165	250
R412010216	G 1/4	51	-	210	114	44.5	225	45
R412010217	G 1/4	51	-	235	141	70	250	200



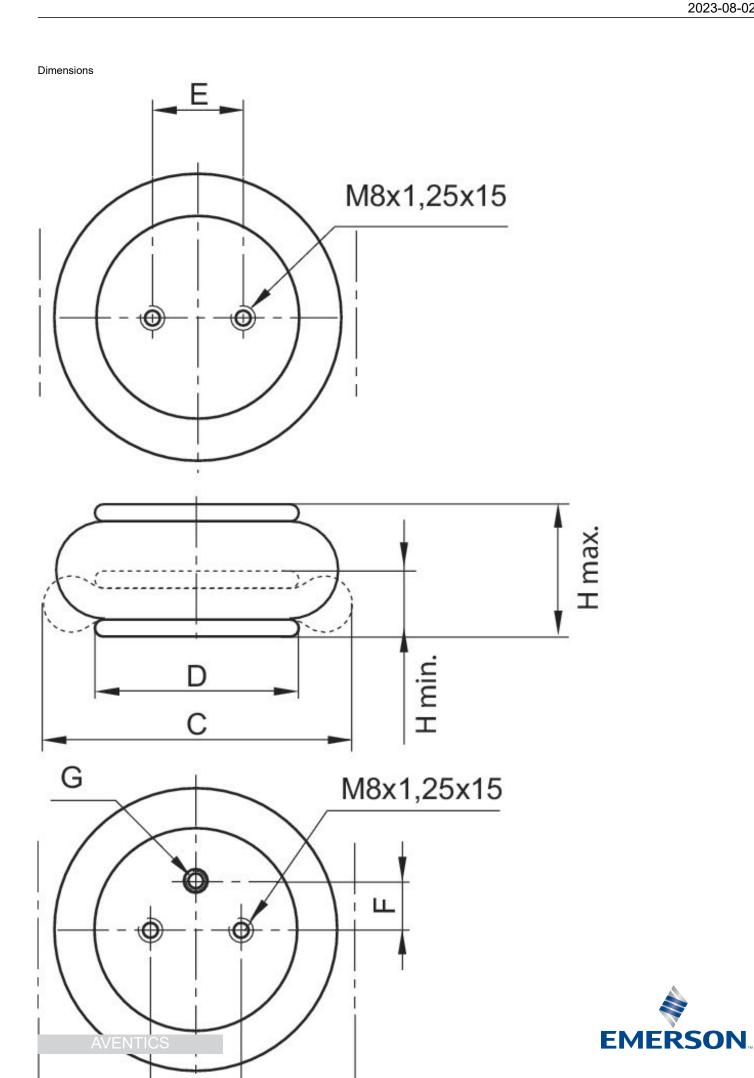
High corrosion Internal thread Bellow actuator with cover single Single-acting, retracted without pressure





Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
161	G 3/4	74	265	9300	17300	2.3	R412010218
228	G 3/4	89	340	19400	33300	3.9	R412010219





Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	F ±0,5 [mm]	K mm	Return force, min. N
R412010218	G 3/4	54	125	250	161	89	38.1	265	200
R412010219	G 3/4	54	140	325	228	157.5	73	340	300



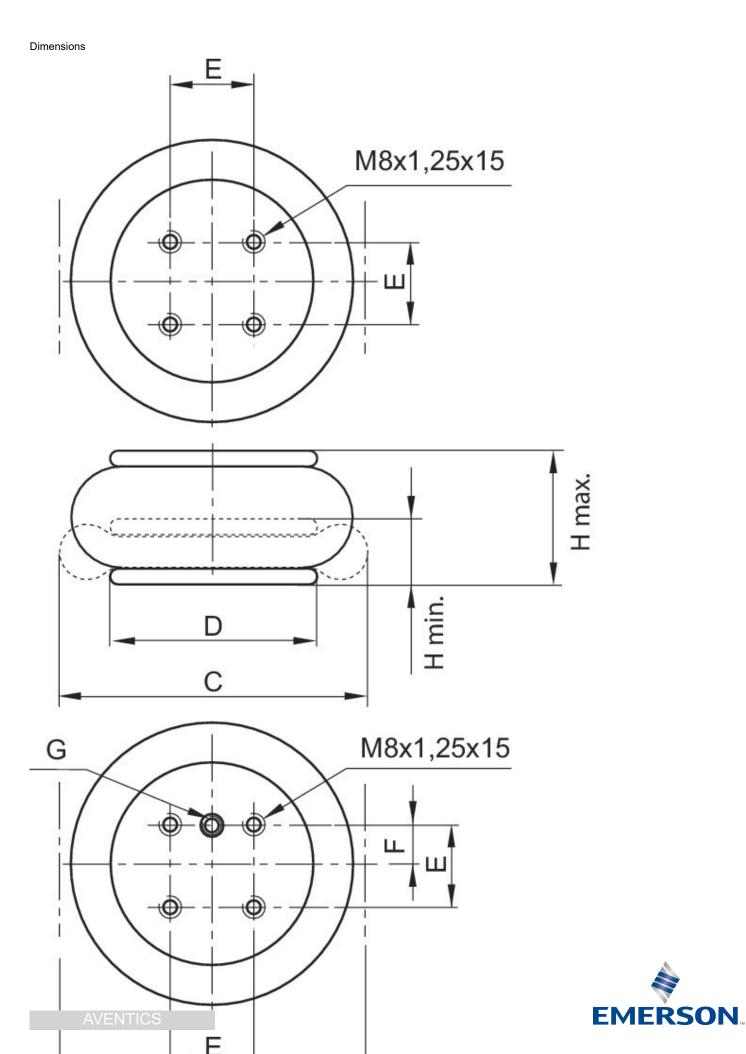
High corrosion Internal thread Bellow actuator with cover single Single-acting, retracted without pressure





diameter nm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
287	G 3/4	104	400	26100	50000	5.9	R412010220





Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	F ±0,5 [mm]	K mm	Return force, min. N
R412010220	G 3/4	51	155	385	287	158.8	79.4	400	300



High corrosion Internal thread Bellow actuator with cover double Single-acting, retracted without pressure

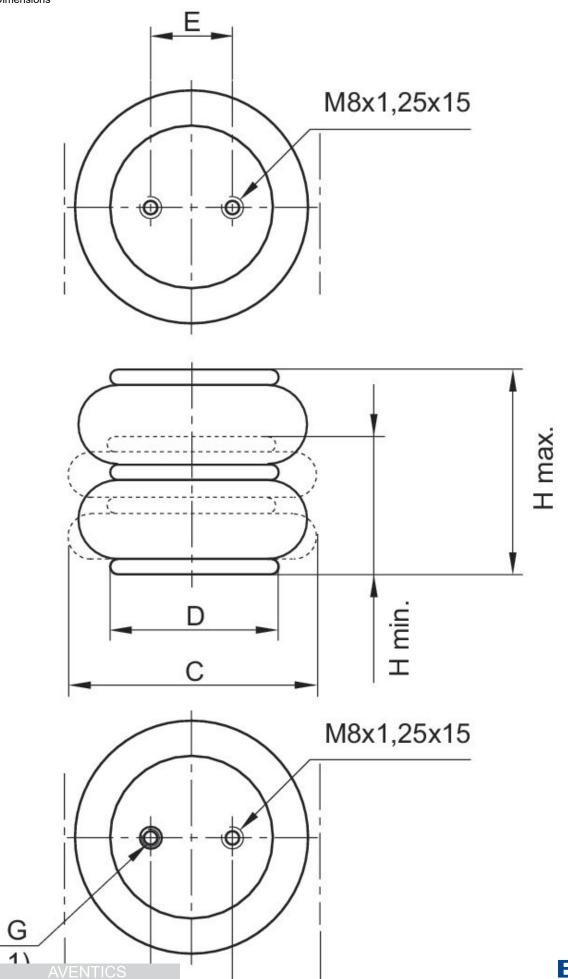




Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
108	G 1/4	108	180	3500	8700	1.5	R412010221
141	G 3/4	153	235	7700	14800	2.3	R412010222



Dimensions





Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	K mm	Return force, min. N
R412010221	G 1/4	72	108	165	108	44.5	180	200
R412010222	G 3/4	77	153	218	141	70	235	200



High corrosion Internal thread Bellow actuator with cover double Single-acting, retracted without pressure

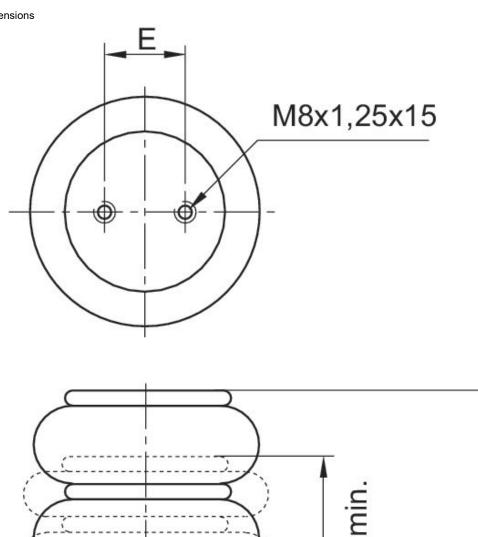


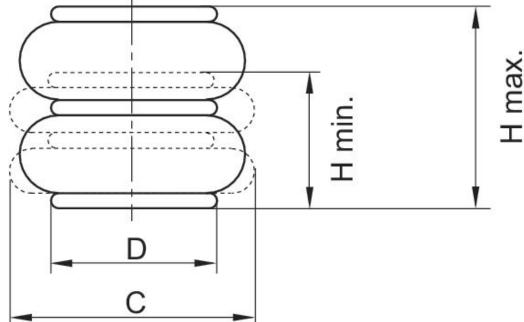


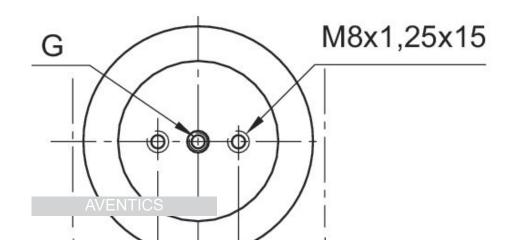
Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
161	G 3/4	223	275	8200	19500	3.5	R412010223
228	G 3/4	223	355	20500	36800	5.1	R412010224













Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	F ±0,5 [mm]	K mm	Return force, min. N
R412010223	G 3/4	77	223	260	161	89	38.1	275	250
R412010224	G 3/4	77	223	340	228	157.5	73	355	300



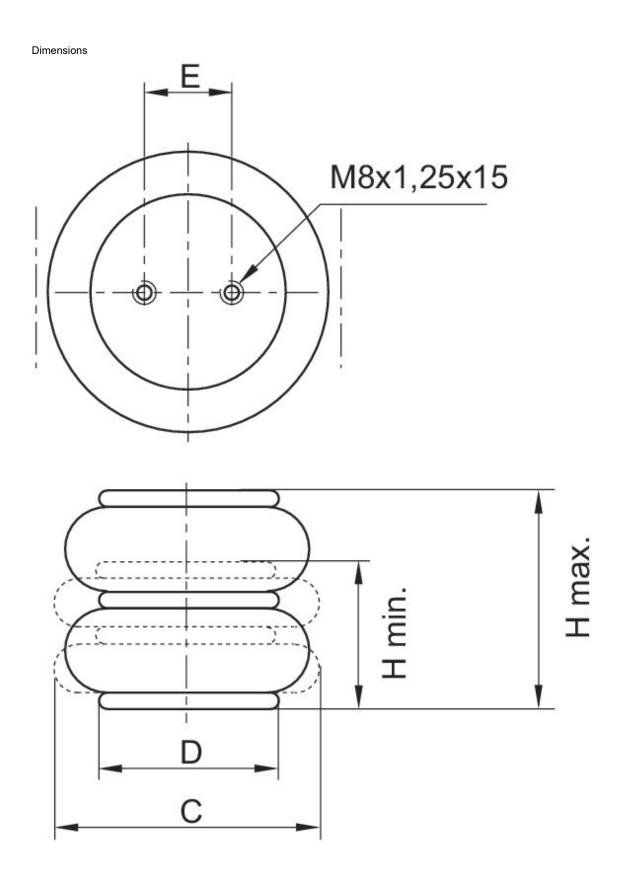
High corrosion Internal thread Bellow actuator with cover double Single-acting, retracted without pressure

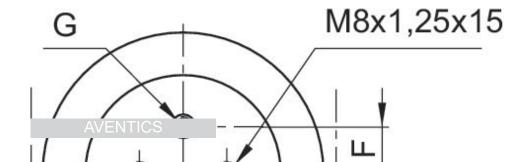




Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
287	G 3/4	223	415	27800	52600	7.3	R412010225









Part No.	Compressed air con- nection G	H min. mm	H max. mm	C mm	D mm	E ±0,5 [mm]	F ±0,5 [mm]	K mm	Return force, min. N
R412010225	G 3/4	77	223	400	287	158.8	79.4	415	400



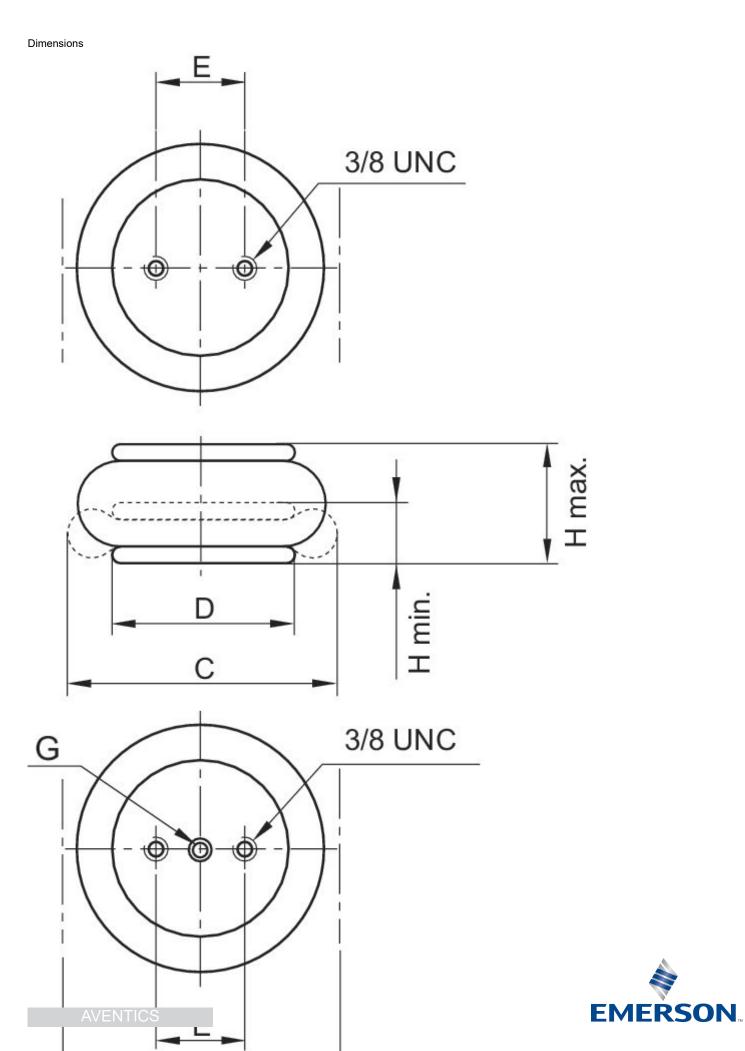
Bellow actuator with cover single Single-acting, retracted without pressure

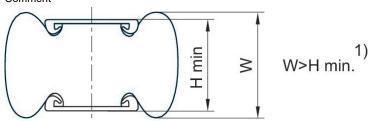




Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
90	1/8 NPT	50.8	160	2500	5500	1.2	R432039283







Part No.	Compressed air con- nection G	H min in	H max in	C in	D in	E ±0,5 in	K mm	Return force, min. lbf
R432039283	1/8 NPT	2.0	3.94	5.71	3.54	0.79	160	27



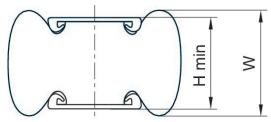
Bellow actuator with cover single Single-acting, retracted without pressure





Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
108	1/4 NPT	34.04	165	3500	6900	1.2	ASNS11-1-1
108	1/4 NPT	54.1	180	4500	7500	1.2	R432039286
114	1/4 NPT	78.99	225	4300	10900	1.4	ASNS15-3-1 LF
141	3/4 NPT	74.93	230	6100	13600	2	ASNS18-3-1

#### Comment



1 W>H min.

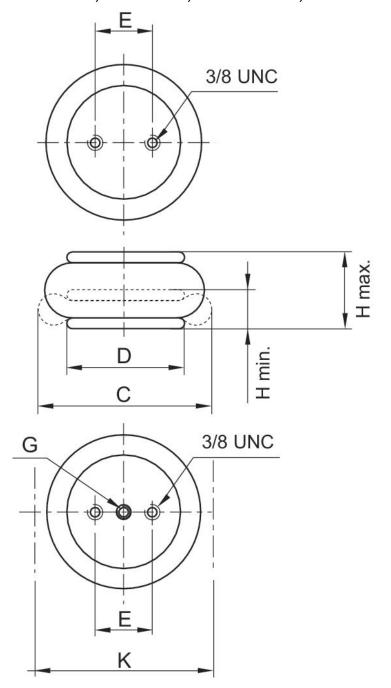
1) Once the minimum height H min. is reached, the bead height W can fall below the lower limit. If, for these products, level mounting surfaces greater than the cover diameter are selected, the return force and force output at the start of stroke increase. In the process, the rubber bellow is also compressed by the mounting surfaces. These products require more space upward, which can, in rare cases, present a hindrance. In any case, the specifications of the data sheets apply when using mounting surfaces in the size of the bellows actuator cover.

1 kN = 1000 N

Part No.	Compressed air con- nection G	H min. in	H max. in	C in	D in	E ±0,5 in	K in	Return force, min. lbf
ASNS11-1-1	1/4 NPT	2.0	3.35	5.91	4.25	1.75	6.50	56
R432039286	1/4 NPT	2.0	4.13	6.5	4.25	1.75	7.09	9
ASNS15-3-1 LF	1/4 NPT	2.0	5.12	8.27	4.49	1.75	8.86	9
ASNS18-3-1	3/4 NPT	2.0	4.92	8.46	5.55	2.76	9.06	45



ASNS11-1-1, R432039286, ASNS15-3-1 LF, ASNS18-3-1





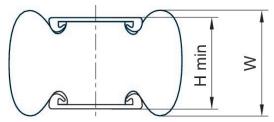
Bellow actuator with cover single Single-acting, retracted without pressure





Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
141	3/4 NPT	78.99	245	6900	14700	1.9	ASNS18-4-1
141	3/4 NPT	106.93	250	7000	14000	1.9	ASNS18-5-1
161	3/4 NPT	73.91	265	9300	17300	2.3	ASNS31-3-1
228	3/4 NPT	88.9	340	19400	33300	3.9	ASNS51-3-1

#### Comment



W>H min.

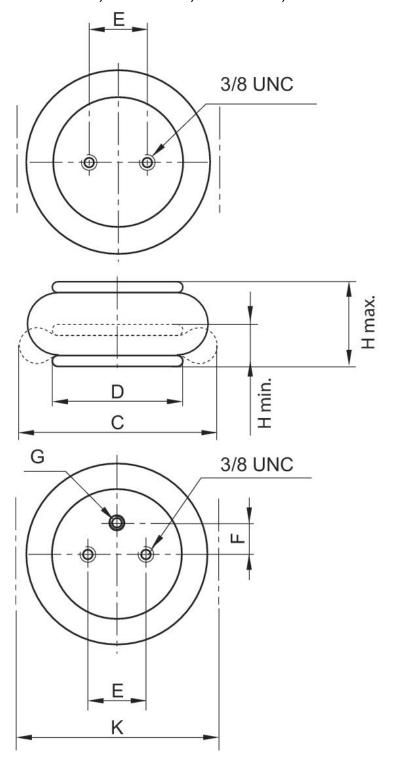
1) Once the minimum height H min. is reached, the bead height W can fall below the lower limit. If, for these products, level mounting surfaces greater than the cover diameter are selected, the return force and force output at the start of stroke increase. In the process, the rubber bellow is also compressed by the mounting surfaces. These products require more space upward, which can, in rare cases, present a hindrance. In any case, the specifications of the data sheets apply when using mounting surfaces in the size of the bellows actuator cover.

1 kN = 1000 N

Part No.	Compressed air connection	H min. in	H max. in	C in	D in	E ±0,5 in	F ±0,5 in	K in	Return force, min. lbf
ASNS18-4-1	3/4 NPT	2.0	5.12	9.09	5.55	2.76	0	9.65	45
ASNS18-5-1	3/4 NPT	2.0	6.22	9.25	5.55	2.76	0	9.84	45
ASNS31-3-1	3/4 NPT	2.0	4.92	9.84	6.34	3.5	1.5	10.43	45
ASNS51-3-1	3/4 NPT	2.0	5.51	12.80	8.98	6.2	2.87	13.39	67



# ASNS18-4-1, ASNS18-5-1, ASNS31-3-1, ASNS51-3-1





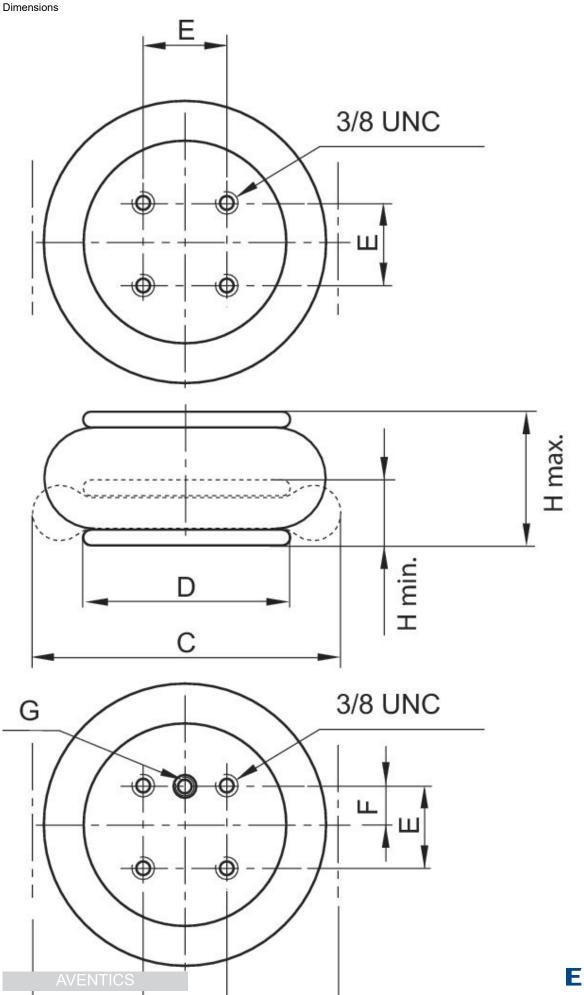
Bellow actuator with cover single Single-acting, retracted without pressure



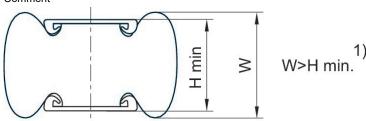


Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
287	3/4 NPT	103.89	400	26100	50000	5.9	R432039297
287	3/4 NPT	736.6	420	35200	52200	6.1	R432039300









Part No.	Compressed air connection	H min. in	H max. in	C in	D in	E ±0,5 in	F ±0,5 in	K in	Return force, min. lbf
R432039297	3/4 NPT	2.0	6.10	15.16	11.30	6.25	3.13	15.75	67
R432039300	3/4 NPT	2.0	6.30	15.94	11.30	6.25	3.13	16.54	67



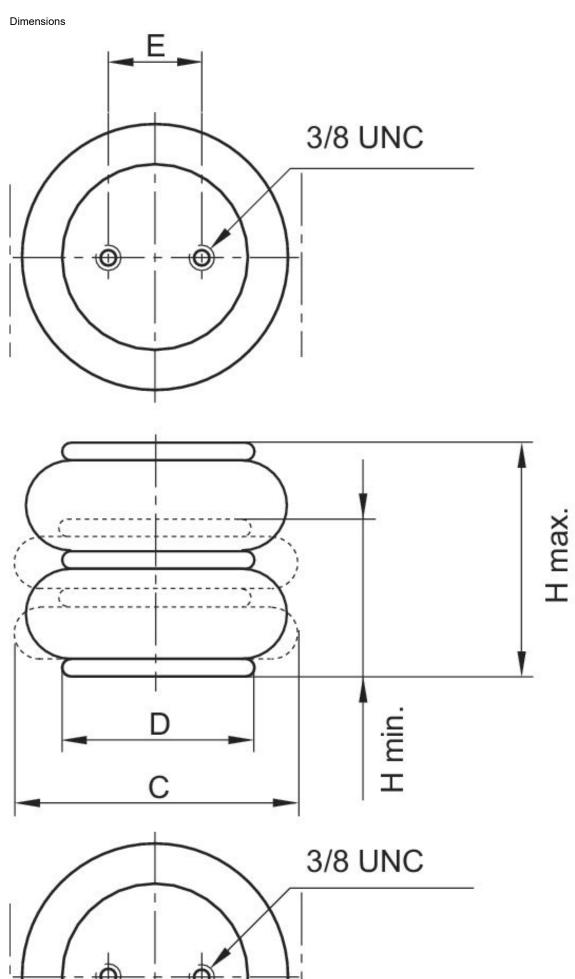
Bellow actuator with cover double Single-acting, retracted without pressure



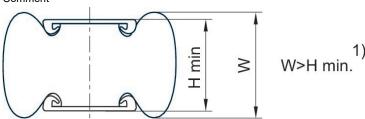


Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
90	1/8 NPT	95	160	2100	5600	1.3	R432039284









Part No.	Compressed air connection	H min. in	H max. in	C in	D in	E ±0,5 in	K mm	Return force, min. lbf
R432039284	1/8 NPT	2.8	6.50	5.71	3.54	0,79	6.30	45



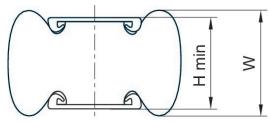
Bellow actuator with cover double Single-acting, retracted without pressure





Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
108	1/4 NPT	107.95	180	3500	8700	1.5	ASND11-4-1
141	1/4 NPT	122.94	215	5000	12600	2.1	R432039134
141	3/4 NPT	152.91	230	7000	13000	2.3	ASND18-5-1
141	3/4 NPT	152.91	235	7700	14800	2.3	ASND18-6-1

#### Comment



W>H min.

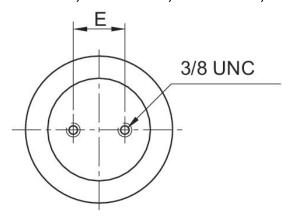
1) Once the minimum height H min. is reached, the bead height W can fall below the lower limit. If, for these products, level mounting surfaces greater than the cover diameter are selected, the return force and force output at the start of stroke increase. In the process, the rubber bellow is also compressed by the mounting surfaces. These products require more space upward, which can, in rare cases, present a hindrance. In any case, the specifications of the data sheets apply when using mounting surfaces in the size of the bellows actuator cover.

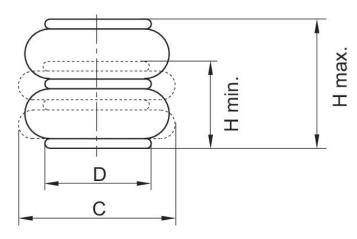
1 kN = 1000 N

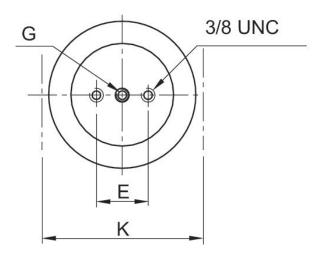
Part No.	Compressed air connection	H min. in	H max. in	C in	D in	E ±0,5 in	K in	Return force, min. lbf
ASND11-4-1	1/4 NPT	2.8	7.09	6.50	4.25	1.75	7.09	45
R432039134	1/4 NPT	2.8	7.68	7.99	5.55	2.76	8.46	45
ASND18-5-1	1/4 NPT	3.0	8.07	8.46	5.55	2.76	9.06	45
ASND18-6-1	1/4 NPT	3.0	9.06	8.58	5.55	2.76	9.25	45



# ASND11-4-1, R432039134, ASND18-5-1, ASND18-6-1









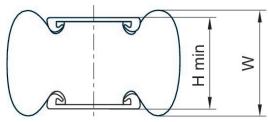
Bellow actuator with cover double Single-acting, retracted without pressure





Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
161	3/4 NPT	165.1	250	7700	20000	3	ASND31-6-1
161	3/4 NPT	223.01	275	8200	19500	3.5	ASND31-8-1
228	3/4 NPT	189.99	340	17000	35400	4.8	ASND51-7-1
228.09	3/4 NPT	223.01	355.6	20500	36800	5.08	ASND51-8-1

#### Comment



W>H min.

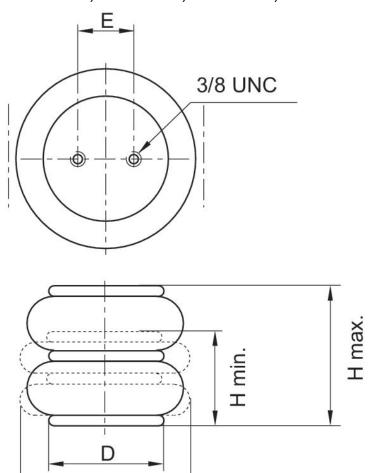
1) Once the minimum height H min. is reached, the bead height W can fall below the lower limit. If, for these products, level mounting surfaces greater than the cover diameter are selected, the return force and force output at the start of stroke increase. In the process, the rubber bellow is also compressed by the mounting surfaces. These products require more space upward, which can, in rare cases, present a hindrance. In any case, the specifications of the data sheets apply when using mounting surfaces in the size of the bellows actuator cover.

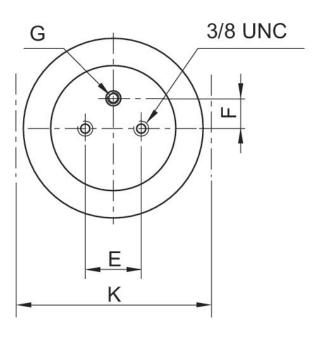
1 kN = 1000 N

Part No.	Compressed air connection	H min. in	H max. in	C in	D in	E ±0,5 in	F ±0,5 in	K in	Return force, min. lbf
ASND31-6-1	3/4 NPT	3.0	9.45	9.84	6.34	3.5	1.5	10.43	45
ASND31-8-1	3/4 NPT	3.0	11.80	10.24	6.34	3.5	1.5	10.83	56
ASND51-7-1	3/4 NPT	3.0	10.40	12.80	8.98	6.2	2.87	13.39	67
ASND51-8-1	3/4 NPT	3.0	11.80	13.39	8.98	6.2	2.87	13.98	67



# ASND31-6-1, ASND31-8-1, ASND51-7-1, ASND51-8-1







Bellow actuator with cover double Single-acting, retracted without pressure

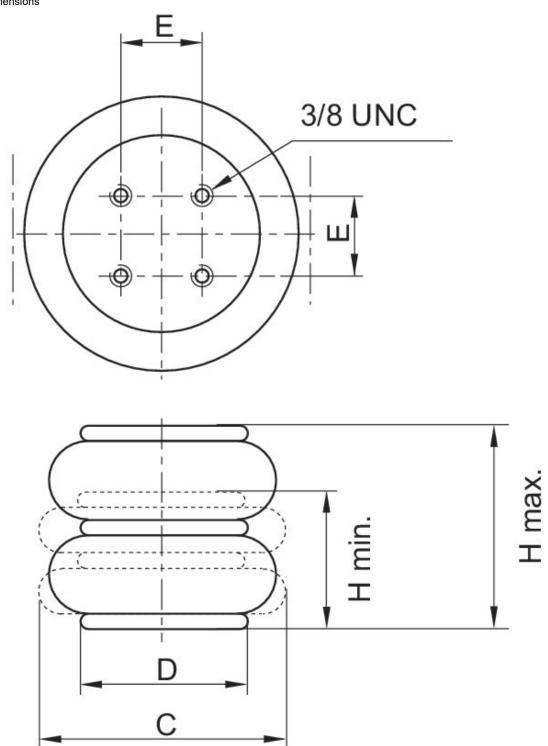


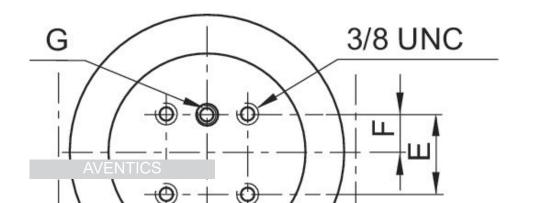


Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
287	3/4 NPT	193.04	400	27400	49600	6.9	R432039298
287	3/4 NPT	223.01	415	27800	52600	7.3	R432039299
287	3/4 NPT	252.98	420	30000	55000	7.7	R432039770

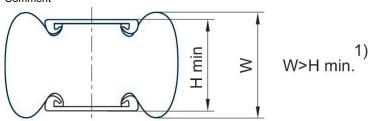












Part No.	Compressed air connection	H min. in	H max. in	C in	D in	E ±0,5 in	F ±0,5 in	K in	Return force, min. lbf
R432039298	3/4 NPT	3.0	10.60	15.16	11.30	6.25	3.13	15.75	90
R432039299	3/4 NPT	3.0	11.80	15.75	11.30	6.25	3.13	15.75	90
R432039770	3/4 NPT	3.0	13.00	15.94	11.30	6.25	3.13	16.54	90



Bellow actuator with cover triple Single-acting, retracted without pressure



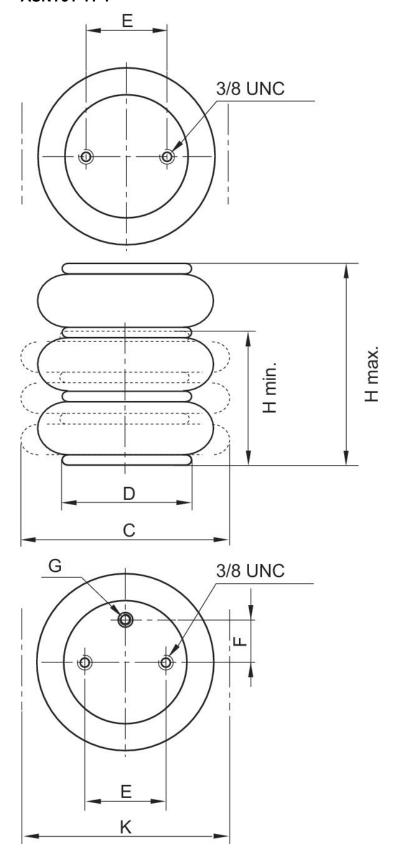


Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
228.09	3/4 NPT	284.99	345.44	17100	153469.75	5.9	ASNT51-11-1

Part No.	Compressed air connection	= 00110110	H max. in	C in	D in	E ±0,5 in	F ±0,5 in	K in	Return force, min. lbf
ASNT51-11-1	3/4 NPT	4.3	15.60	12.8	8.98	6.2	2.88	13.58	90



## **ASNT51-11-1**





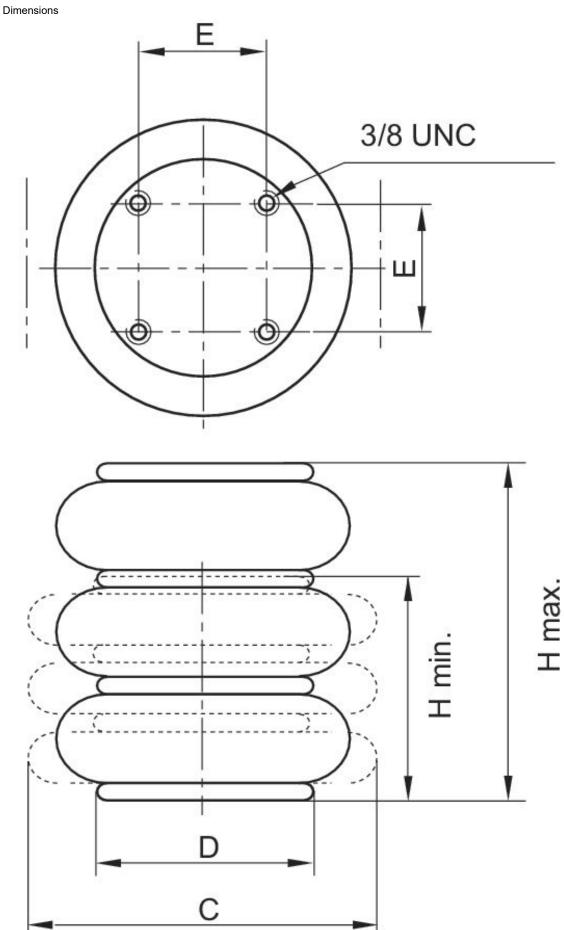
Bellow actuator with cover triple Single-acting, retracted without pressure





Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
287	3/4 NPT	275.08	410	28700	52600	8	R432039296







Part No.	Compressed air connection	H min. in	H max. in	C in	D in	E ±0,5 in	F ±0,5 in	K in	Return force, min. lbf
R432039296	3/4 NPT	4.3	15.20	15.12	11.30	6.25	3.13	16.14	112



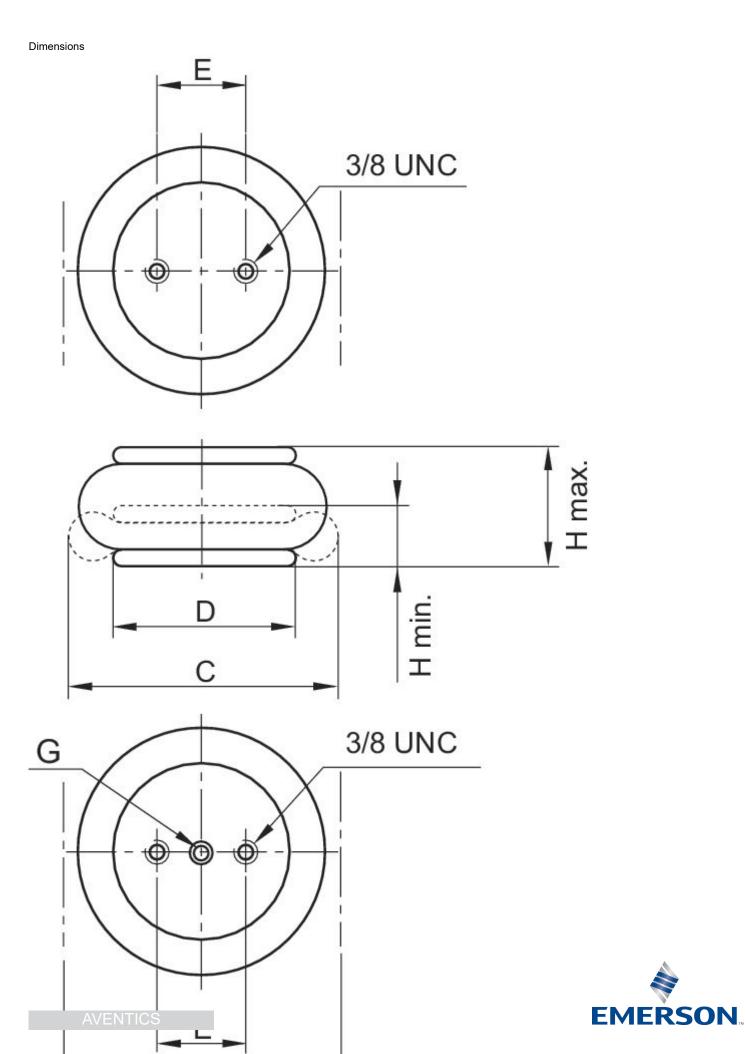
Heat resistant Internal thread Bellow actuator with cover single Single-acting, retracted without pressure

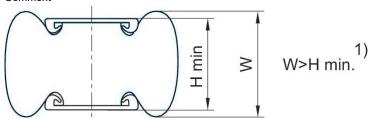




Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
108	1/4 NPT	43.18	165	3500	6900	1.4	R432039274
114	1/4 NPT	93.98	225	4300	10900	1.4	R432039276
141	3/4 NPT	119.38	250	7000	14000	1.9	R432039278







Part No.	Compressed air connection	H min. in	H max. in	C in	D in	E ±0,5 in	K in	Return force, min. lbf
R432039274	1/4 NPT	2.0	3.35	5.91	4.25	1.75	6.50	56
R432039276	1/4 NPT	2.0	5.12	8.27	4.49	1.75	8.86	9
R432039278	3/4 NPT	2.0	6.22	9.25	5.55	2.76	9.84	45



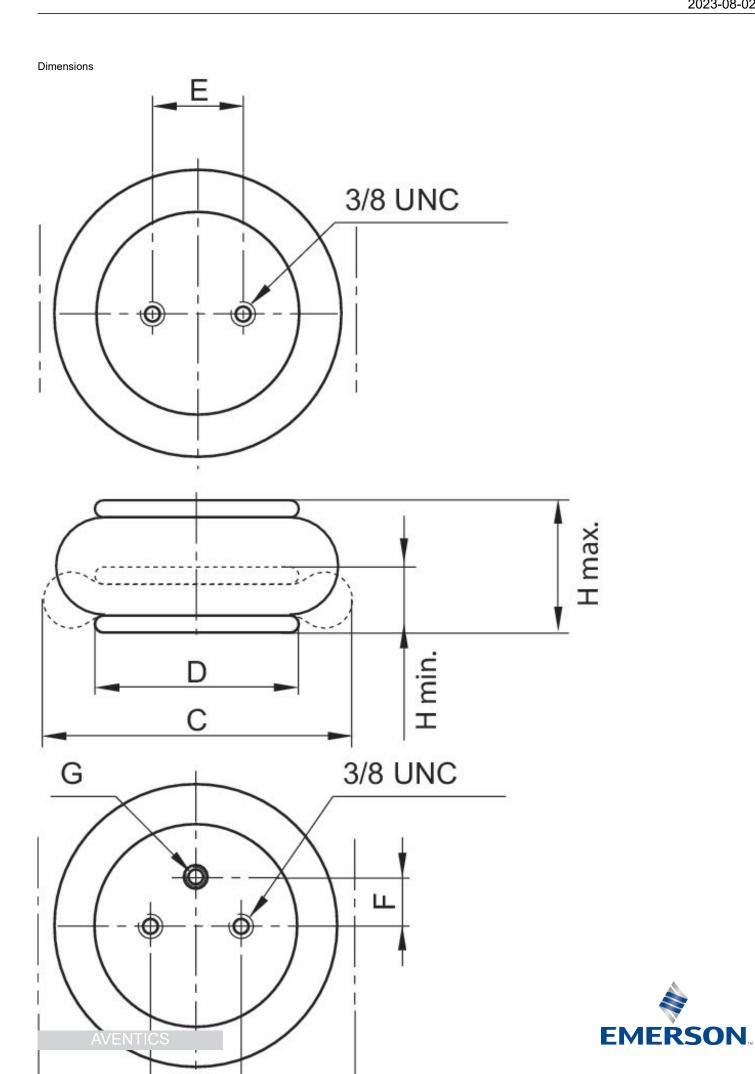
Heat resistant Internal thread Bellow actuator with cover single Single-acting, retracted without pressure

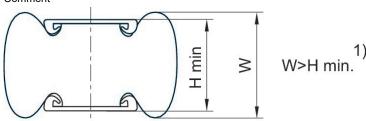




Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
161	3/4 NPT	91.44	265	9300	17300	2.3	R432039279
228	3/4 NPT	101.6	340	19400	33300	3.9	R432039280







Part No.	Compressed air connection	H min. in	H max. in	C in	D in	E ±0,5 in	F ±0,5 in	K in	Return force, min. lbf
R432039279	3/4 NPT	2.0	5.22	9.25	5.55	2.76	1.5	9.84	45
R432039280	3/4 NPT	2.0	5.51	13.39	8.98	6.20	2.87	13.39	67



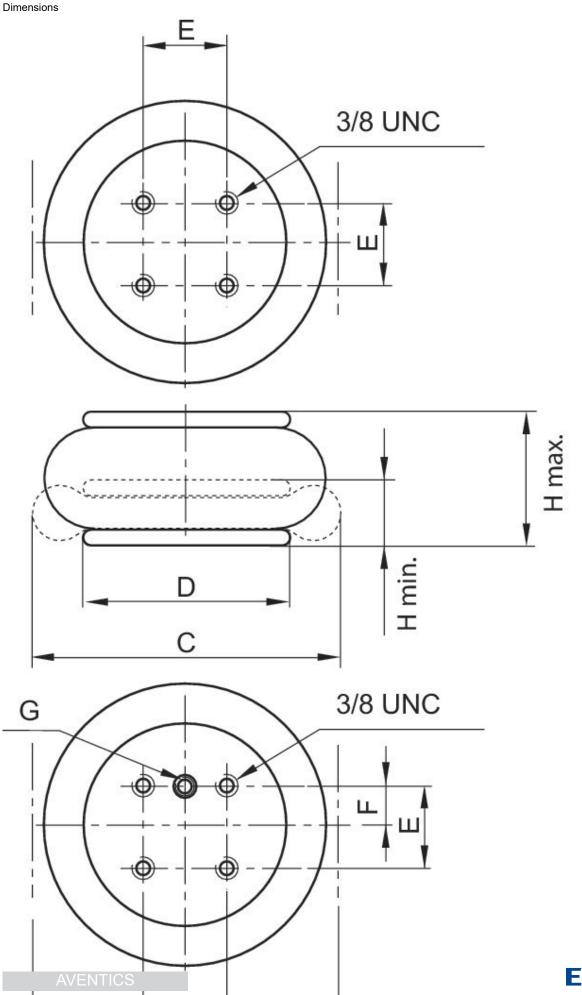
Heat resistant Internal thread Bellow actuator with cover single Single-acting, retracted without pressure



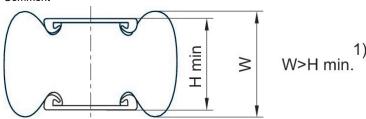


Cover diameter [mm]	Compressed air connection	Max. effec- tive stroke [mm]	Min. radi- al installa- tion space [mm]	Force min. [N]	Force max. [N]	Weight [kg]	Part No.
287	3/4 NPT	124.46	400	26100	50000	5.9	R432039281









Part No.	Compressed air connection	H min. in	H max. in	C in	D in	E ±0,5 in	F ±0,5 in	K in	Return force, min. lbf
R432039281	3/4 NPT	2.0	6.10	15.16	11.30	6.25	3.13	15.75	67



# Filler neck

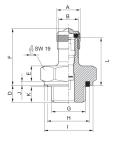


G	Part No.
G 1/8	R412007945
G 1/4	3900040040
1/4 - 18 NPTF	R412010046

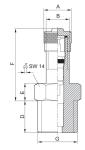
## R412007945



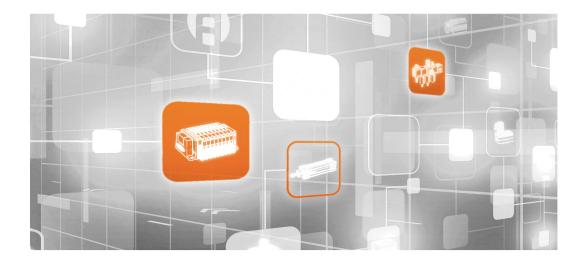
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# R412010046



Efficient pneumatic solutions, our program: cylinders and drives, valves and valve systems, air supply management



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