

TST SERIES



CONTENTS

NITROGEN GAS SPRING



TST1000	54
TST2400	56
TST4200	58
TST6600	60
TST9500	62

STABLE XTRA HIGH POWER

■ 일반 제원

- 충전재
질소가스 (N₂)
- 최대 충전 압력
150 bar (at 20℃)
- 최소 충전 압력
25 bar (at 20℃)
- 작동 온도
0 to 80℃
- 온도에 따른 압력 증가량
±0.3% / ℃
- 분당 최대 스트로크 왕복
~50 to 100 (at 20℃)
- 피스톤 로드 속도
0 ~ 0.8 m/s
- 로드 표면처리
도금 열처리
- 실린더 표면처리
흑산화 피막

■ Model별 제원

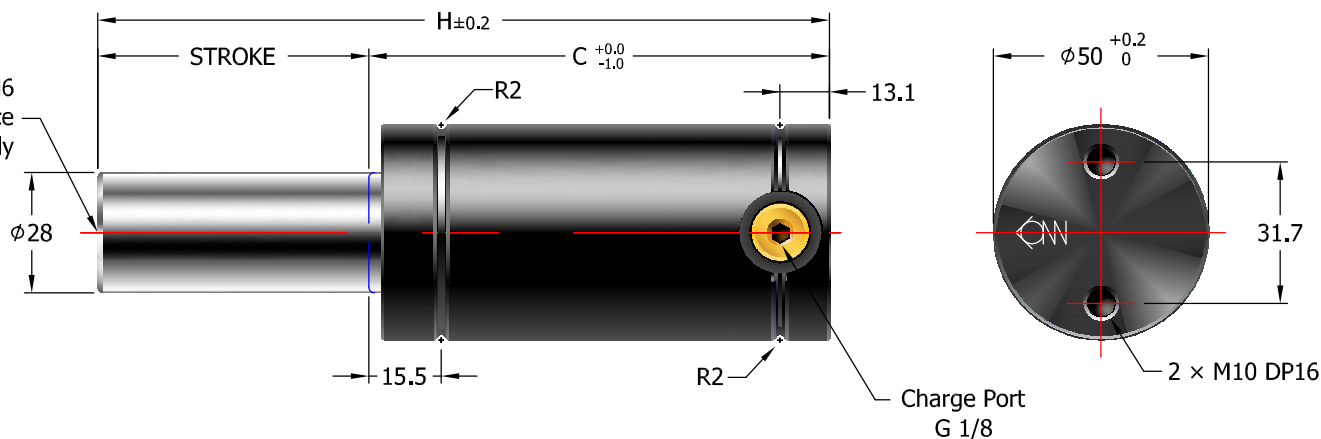
종류 TYPE	Stroke (mm)	실린더 외경 Φ(mm)	Rod 외경 Φ(mm)	초기하중 (N)	최대하중 (N)	최대충전압력
TST1000	13~125	50	28	9,200	14,600	150Bar
TST2400	16~125	75	45	23,800	38,100	150Bar
TST4200	16~125	95	60	42,200	69,200	150Bar
TST6600	16~125	120	75	66,000	105,600	150Bar
TST9500	20~125	150	90	95,000	149,100	150Bar

※ 상기 사양은 성능개선을 위해 예고없이 변경될 수 있습니다.





M6
Maintenance
only



규격 표기법

GAS SPRING

TST1000
MODEL

× 050
STROKE

S(F) —
단독형-S
배관형-F

(MSA) —
일체형 마운트
(선택사항)

150
충전압력
(Bar)

MOUNT

XT1000

REPAIR KIT

RCX1000

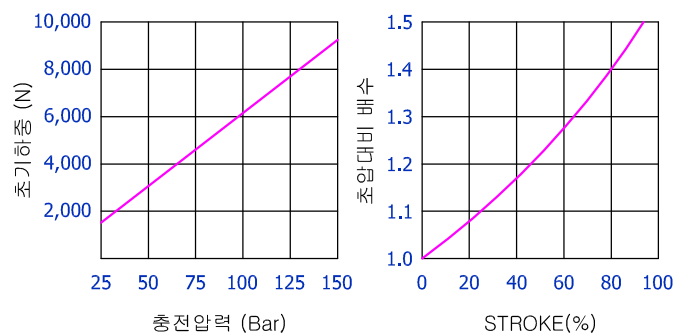
[주의!] TST1000은 충전 압력을 별도로 지정하지 않을 경우 표준충전압력(150Bar)으로 출고됩니다.

TST1000

Stroke		H	C	Force(N) (150 bar / +20 ℃)		Gas vol. (cm ³)	Weight (kg)
(mm)	(inch)			Initial	End force*		
13	0.51	78	65	9,200	12,200	32.7	0.71
16	0.63	84	68		12,500	37.4	0.74
20	0.79	92	72		12,800	43.7	0.77
25	0.98	102	77		13,200	51.6	0.81
30	1.18	112	82		13,400	59.4	0.65
35	1.38	122	87		13,600	67.3	0.89
38	1.50	128	90		13,700	72.0	0.91
40	1.57	132	92		13,700	75.1	0.93
45	1.77	142	97		13,900	83.0	0.97
50	1.97	152	102		14,000	90.8	1.02
60	2.36	172	112		14,100	106.5	1.09
63	2.48	178	115		14,200	111.2	1.11
70	2.76	192	122		14,300	122.2	1.17
75	2.95	202	127		14,300	130.1	1.22
80	3.15	212	132		14,400	137.9	1.25
90	3.54	232	142		14,400	153.6	1.34
100	3.94	252	152		14,500	169.2	1.42
125	4.92	302	177		14,600	208.6	1.62

* = at full stroke

■ 충전압력/압축량 대비 하중변화도표



■ TST1000의 충전 압력(Bar) 계산식

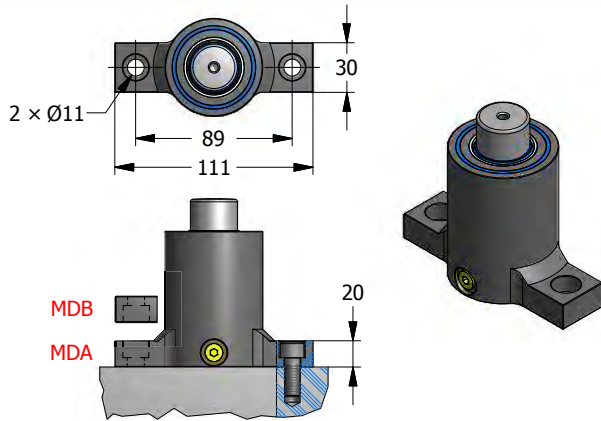
$$\text{충전압력(Bar)} = \frac{\text{초기하중(N)}}{61.5}$$

ex) 필요한 초기하중 8,500N인 GAS SPRING의 충전압력은?

$$138(\text{Bar}) = \frac{8,500(\text{N})}{61.5}$$

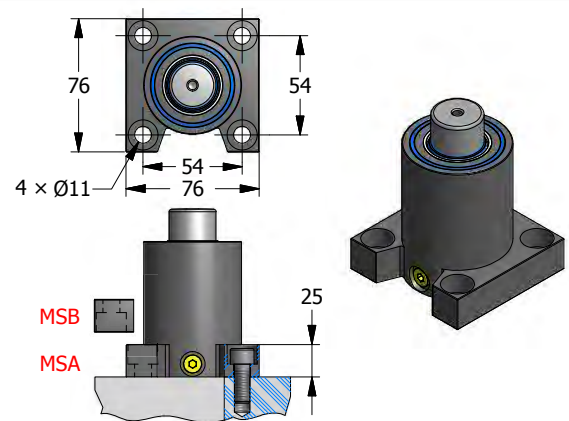
MD MOUNT

일체형



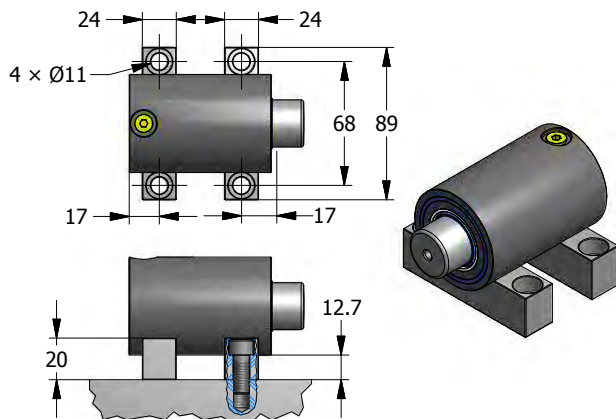
MS MOUNT

일체형

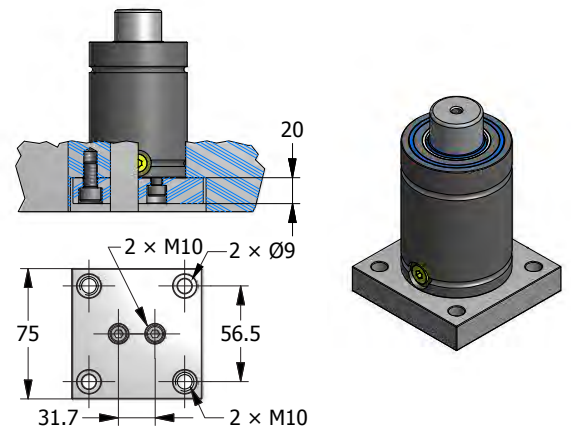


MK MOUNT

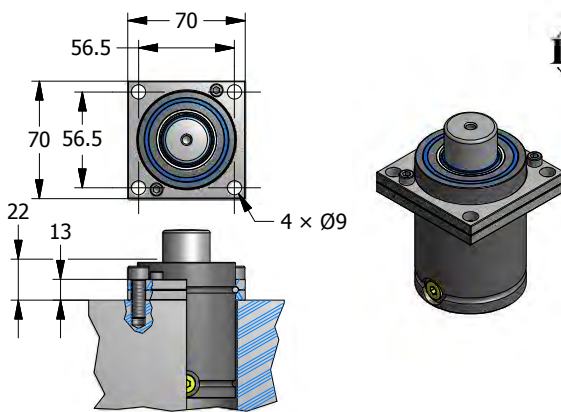
일체형



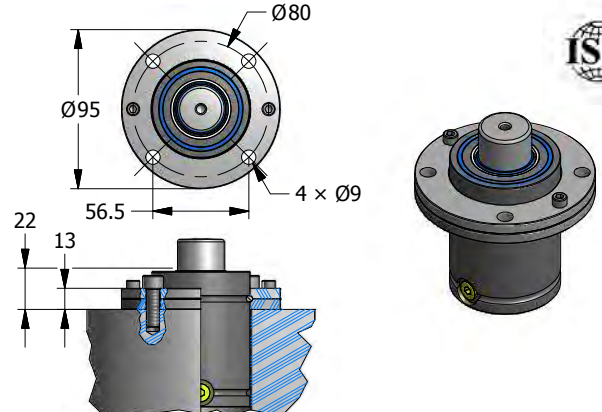
TB1000 MOUNT



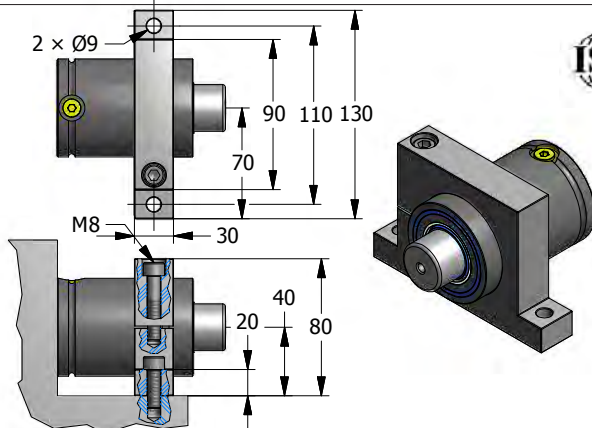
XT1000(ST0750) MOUNT



XR1000(SR0750) MOUNT

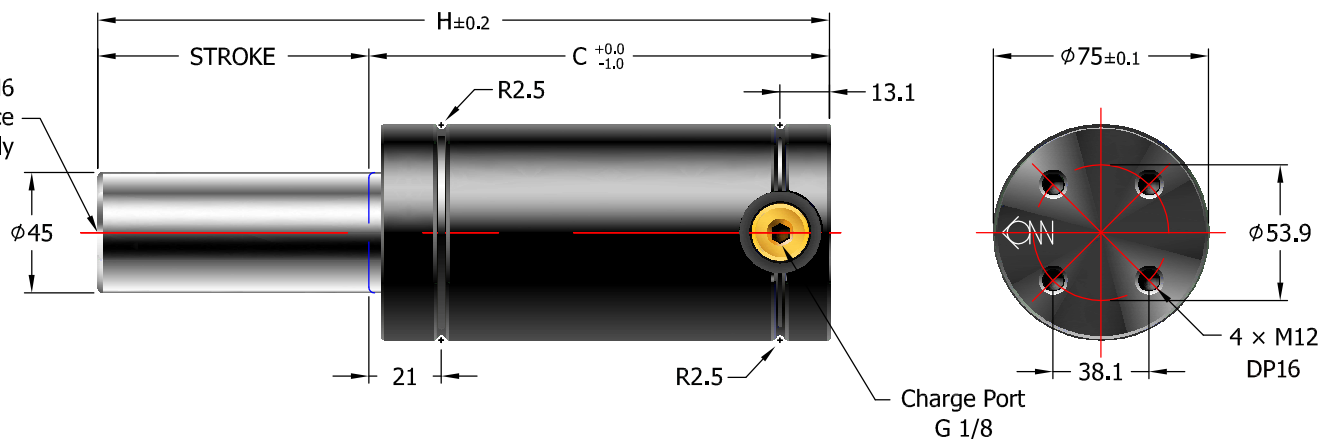


XC1000(SC0750) MOUNT





M6
Maintenance
only



규격 표기법

GAS SPRING

TST2400
MODEL

× 050
STROKE

S(F) —
단독형-S
배관형-F

(MSA) —
일체형 마운트
(선택사항)

150
충전압력
(Bar)

MOUNT

XT2400

REPAIR KIT

RCX2400

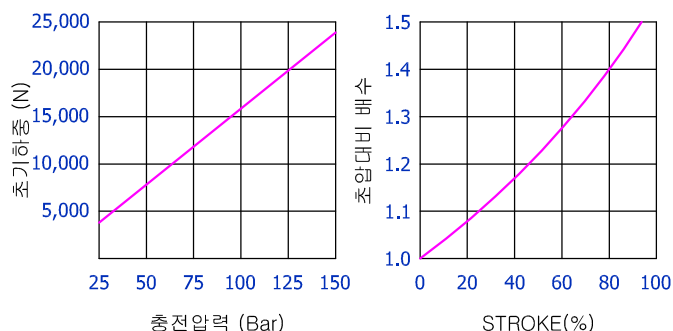
[주의!] TST2400은 충전 압력을 별도로 지정하지 않을 경우 표준충전압력(150Bar)으로 출고됩니다.

TST2400

Stroke		H	C	Force(N) (150 bar / +20 ℃)		Gas vol. (cm ³)	Weight (kg)
(mm)	(inch)			Initial	End force*		
16	0.63	91	75	23,800	33,000	91.5	1.96
20	0.79	99	79		33,800	107.6	2.03
25	0.98	109	84		34,600	127.7	2.11
30	1.18	119	89		35,100	147.8	2.19
35	1.38	129	94		35,600	167.9	2.27
38	1.50	135	97		35,800	180.0	2.32
40	1.57	139	99		36,000	188.0	2.35
45	1.77	149	104		36,300	208.2	2.43
50	1.97	159	109		36,500	228.3	2.51
60	2.36	179	119		36,900	268.5	2.68
63	2.48	185	122		37,000	280.6	2.72
70	2.76	199	129		37,200	308.7	2.85
75	2.95	209	134		37,300	328.8	2.93
80	3.15	219	139		37,400	349.0	3.01
90	3.54	239	149		37,600	389.2	3.17
100	3.94	259	159		37,800	429.4	3.33
125	4.92	309	184		38,100	530.0	3.75

* = at full stroke

■ 충전압력/압축량 대비 하중변화도표



■ TST2400의 충전 압력(Bar) 계산식

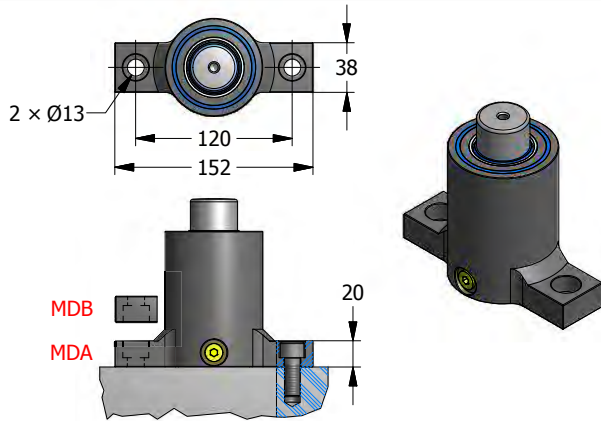
$$\text{충전압력(Bar)} = \frac{\text{초기하중(N)}}{159.0}$$

ex) 필요한 초기하중 20,000N인 GAS SPRING의 충전압력은?

$$126(\text{Bar}) = \frac{20,000(\text{N})}{159.0}$$

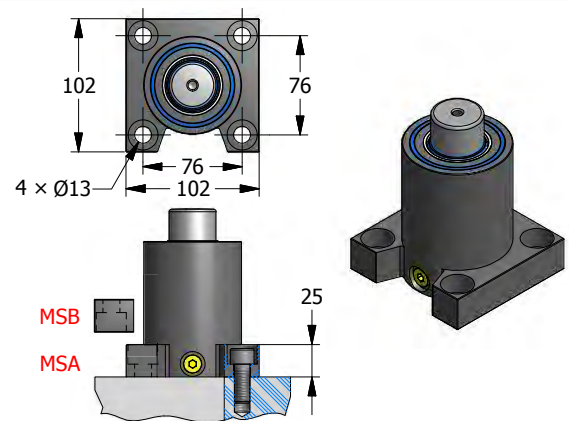
MD MOUNT

일체형



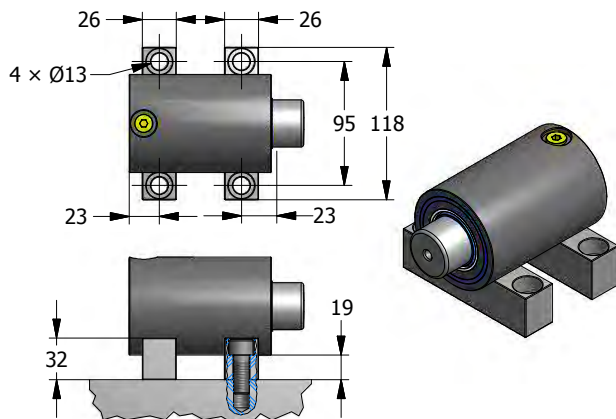
MS MOUNT

일체형

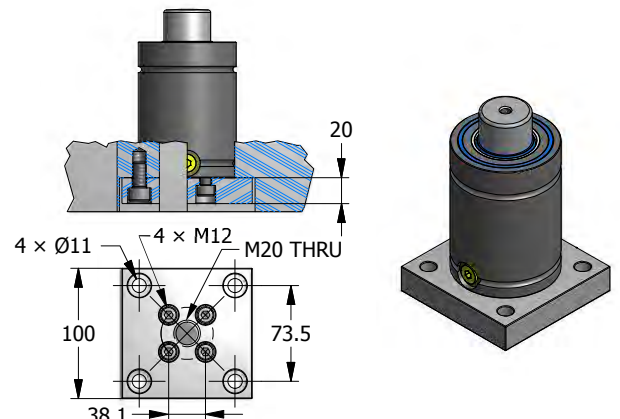


MK MOUNT

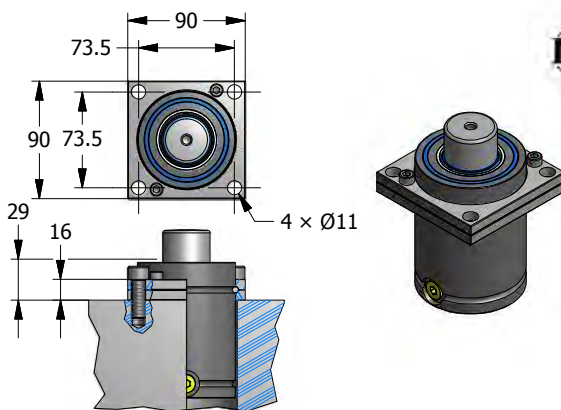
일체형



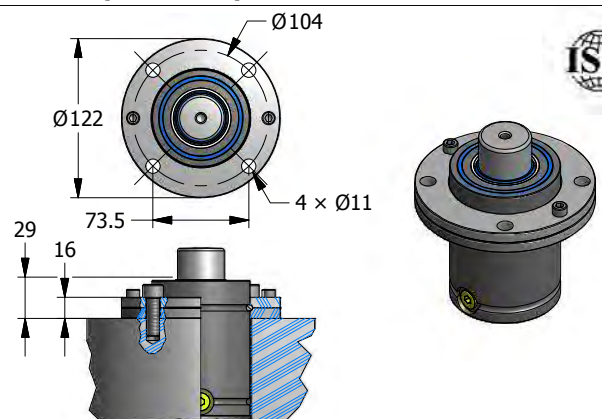
TB2400 MOUNT



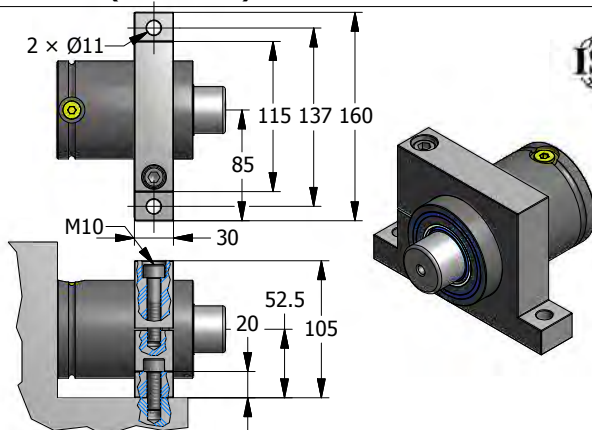
XT2400(ST1500) MOUNT



XR2400(SR1500) MOUNT

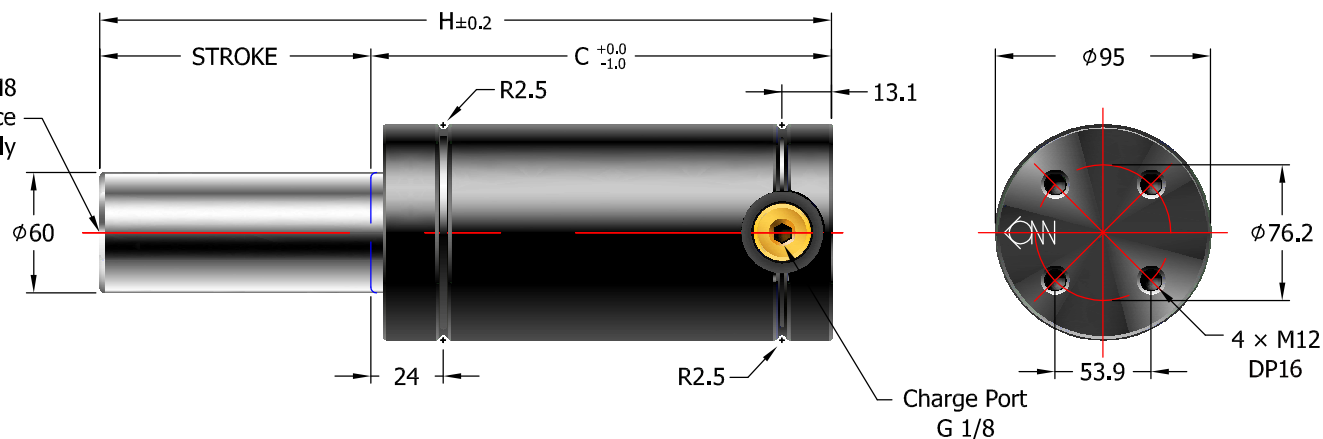


XC2400(SC1500) MOUNT





M8
Maintenance
only



규격 표기법

GAS SPRING

TST4200
MODEL

× 050
STROKE

$$\frac{S(F)}{\text{단독형}-S}$$

- (MSA)
일체형 마운트
(선택사항)

150
충전압력
(Bar)

MOUNT

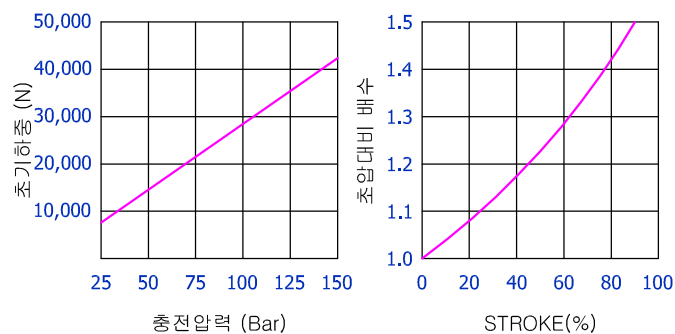
XT4200

REPAIR KIT

RCX4200

[주의!] TST4200은 충전 압력을 별도로 지정하지 않을 경우 표준충전압력(150Bar)으로 출고됩니다.

■ 충전압력/압축량 대비 하중변화도표



■ TST4200의 충전 압력(Bar) 계산식

$$\text{충전압력(Bar)} = \frac{\text{초기하중(N)}}{282.6}$$

ex) 필요한 초기하중 35,000N인 GAS SPRING의
충전압력은?

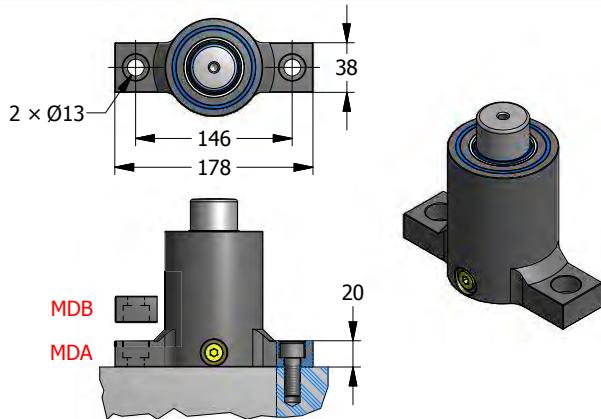
$$124(\text{Bar}) = \frac{35,000(\text{N})}{282.6}$$

TST4200							
Stroke		H	C	Force(N) (150 bar / +20 ℃)		Gas vol. (cm³)	Weight (kg)
(mm)	(inch)			Initial	End force*		
16	0.63	94	78	42,200	59,000	158.4	3.27
20	0.79	102	82		60,600	185.7	3.38
25	0.98	112	87		62,100	219.9	3.52
30	1.18	122	92		63,300	254.1	3.66
35	1.38	132	97		64,200	288.2	3.81
38	1.50	138	100		64,600	308.7	3.88
40	1.57	142	102		64,900	322.4	3.94
45	1.77	152	107		65,500	356.6	4.08
50	1.97	162	112		66,000	390.7	4.22
60	2.36	182	122		66,800	459.1	4.50
63	2.48	188	125		67,000	479.6	4.58
70	2.76	202	132		67,400	527.4	4.78
75	2.95	212	137		67,700	561.5	4.92
80	3.15	222	142		67,900	595.7	5.06
90	3.54	242	152		68,300	664.0	5.33
100	3.94	262	162		68,600	732.4	5.62
125	4.92	312	187	69,200	903.2	6.31	

* = at full stroke

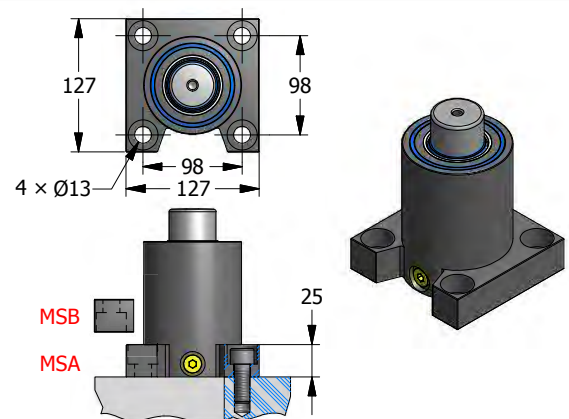
MD MOUNT

일체형



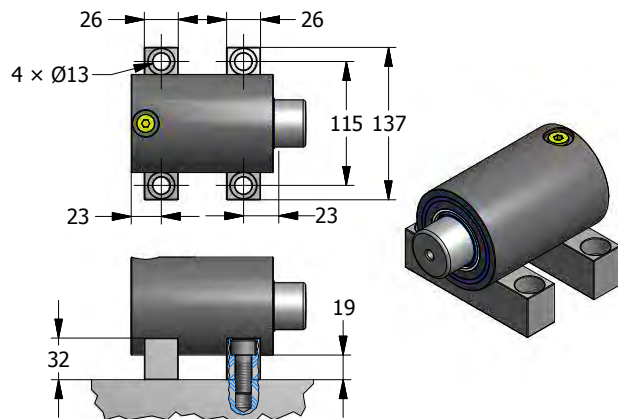
MS MOUNT

일체형

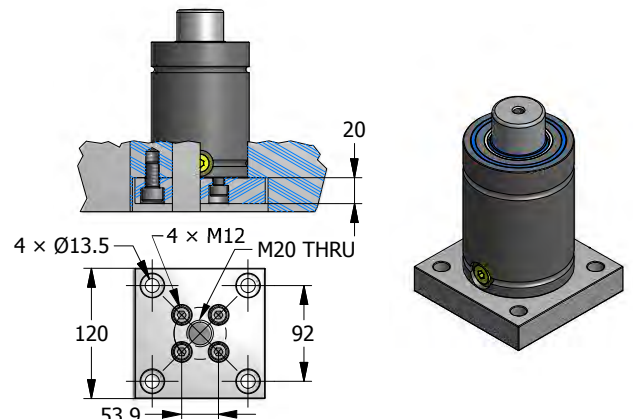


MK MOUNT

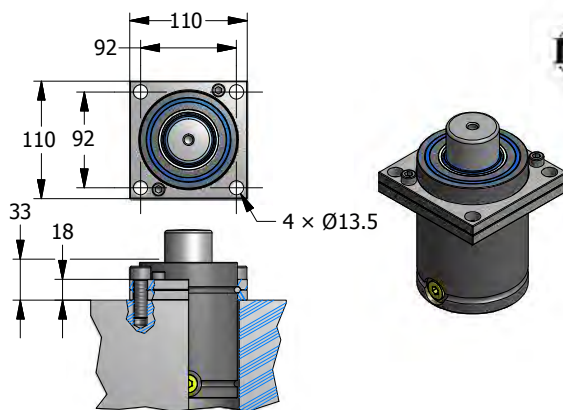
일체형



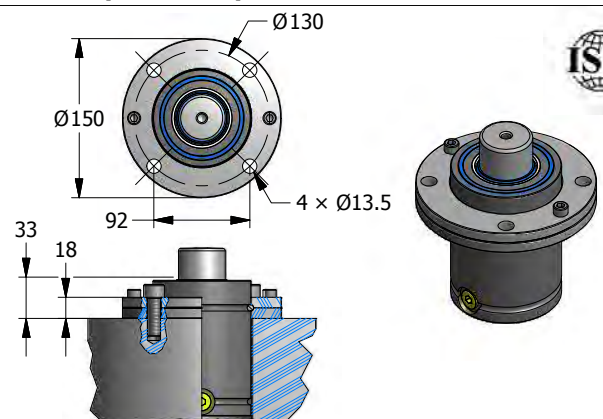
TB4200 MOUNT



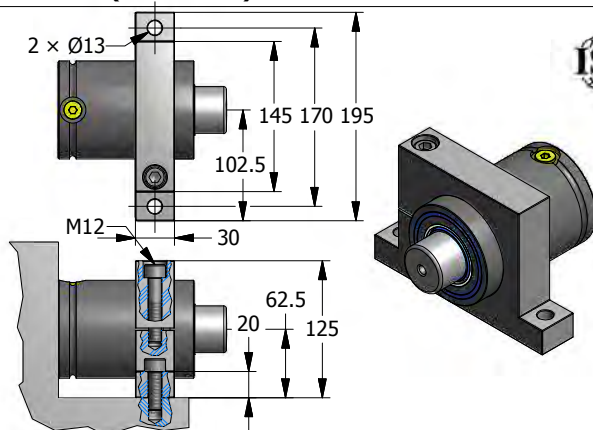
XT4200(ST3000) MOUNT



XR4200(SR3000) MOUNT

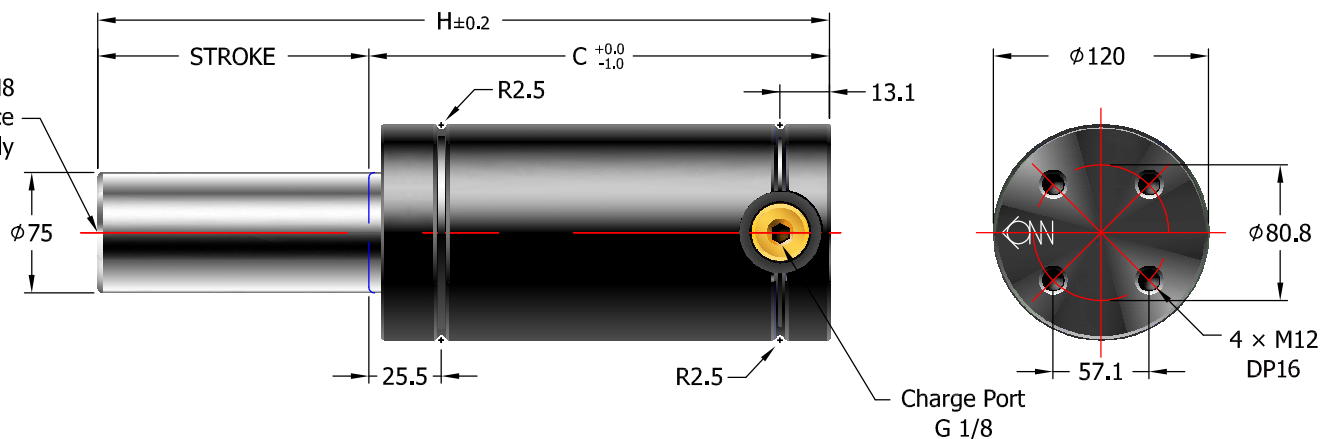


XC4200(SC3000) MOUNT





M8
Maintenance
only



규격 표기법

GAS SPRING

TST6600
MODEL

× 050
STROKE

S(F) —
단독형-S
배관형-F

(MSA) —
일체형 마운트
(선택사항)

150
충전압력
(Bar)

MOUNT

XT6600

REPAIR KIT

RCX6600

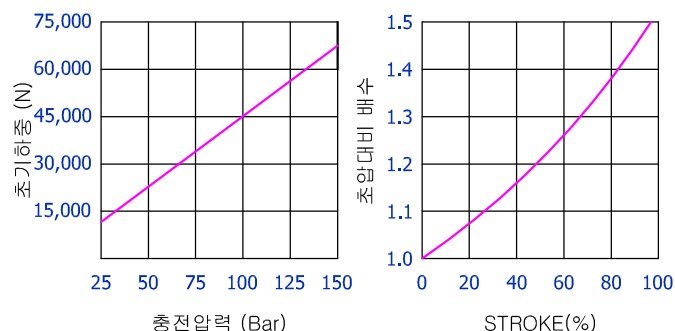
[주의!] TST6600은 충전 압력을 별도로 지정하지 않을 경우 표준충전압력(150Bar)으로 출고됩니다.

TST6600

Stroke		H	C	Force(N) (150 bar / +20 ℃)		Gas vol. (cm ³)	Weight (kg)
(mm)	(inch)			Initial	End force*		
16	0.63	104	88	66,000	87,600	285.7	3.27
20	0.79	112	92		90,200	329.1	3.38
25	0.98	122	97		92,600	383.5	3.52
30	1.18	132	102		94,600	437.8	3.66
35	1.38	142	107		96,200	492.1	3.81
38	1.50	148	110		97,000	524.7	3.88
40	1.57	152	112		97,500	546.5	3.94
45	1.77	162	117		98,600	600.8	4.08
50	1.97	172	122		99,500	655.2	4.22
60	2.36	192	132		101,000	763.8	4.50
63	2.48	198	135		101,400	796.4	4.58
70	2.76	212	142		102,100	872.5	4.78
75	2.95	222	147		102,600	926.8	4.92
80	3.15	232	152		103,100	981.2	5.06
90	3.54	252	162		103,800	1089.9	5.33
100	3.94	272	172		104,400	1198.5	5.62
125	4.92	322	197		105,600	1470.2	6.31

* = at full stroke

■ 충전압력/압축량 대비 하중변화도표



■ TST6600의 충전 압력(Bar) 계산식

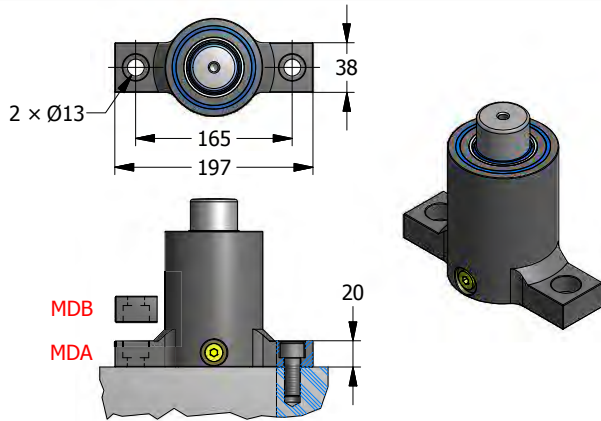
$$\text{충전압력(Bar)} = \frac{\text{초기하중(N)}}{441.6}$$

ex) 필요한 초기하중 60,000N인 GAS SPRING의 충전압력은?

$$136(\text{Bar}) = \frac{60,000(\text{N})}{441.6}$$

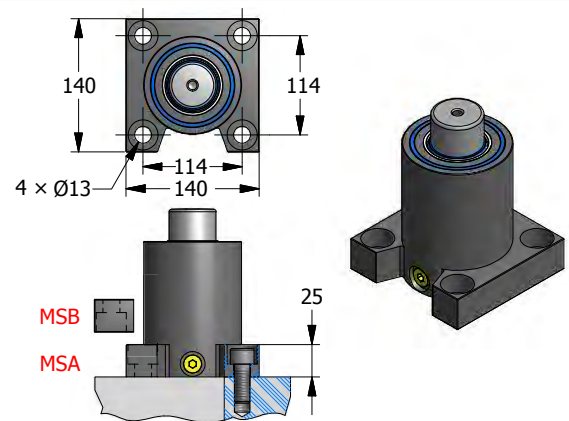
MD MOUNT

일체형



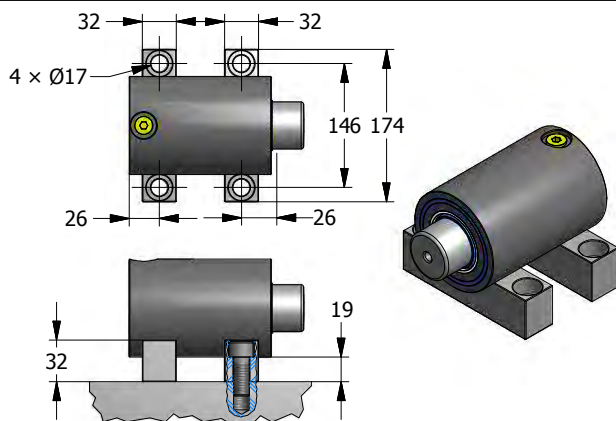
MS MOUNT

일체형

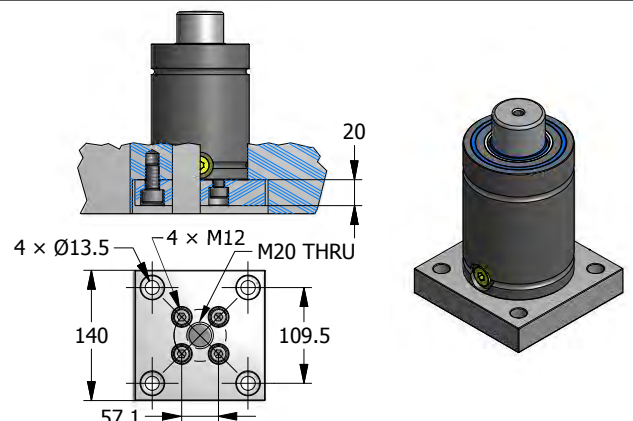


MK MOUNT

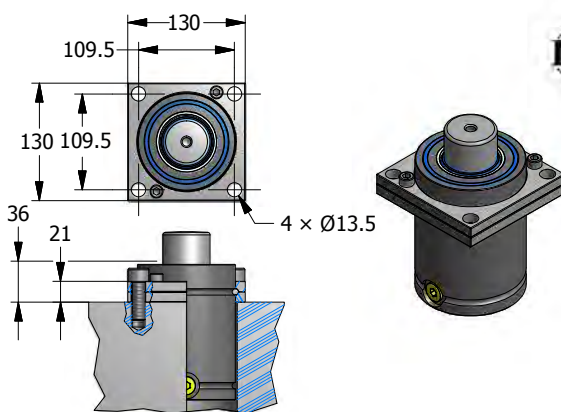
일체형



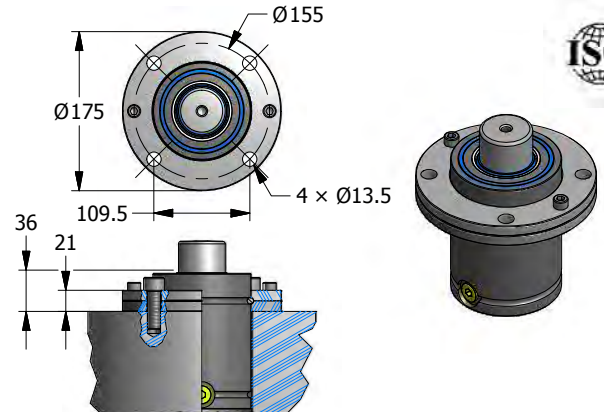
TB6600 MOUNT



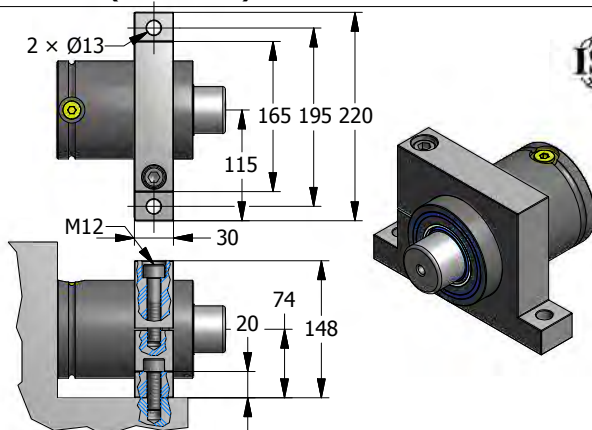
XT6600(ST5000) MOUNT



XR6600(SR5000) MOUNT

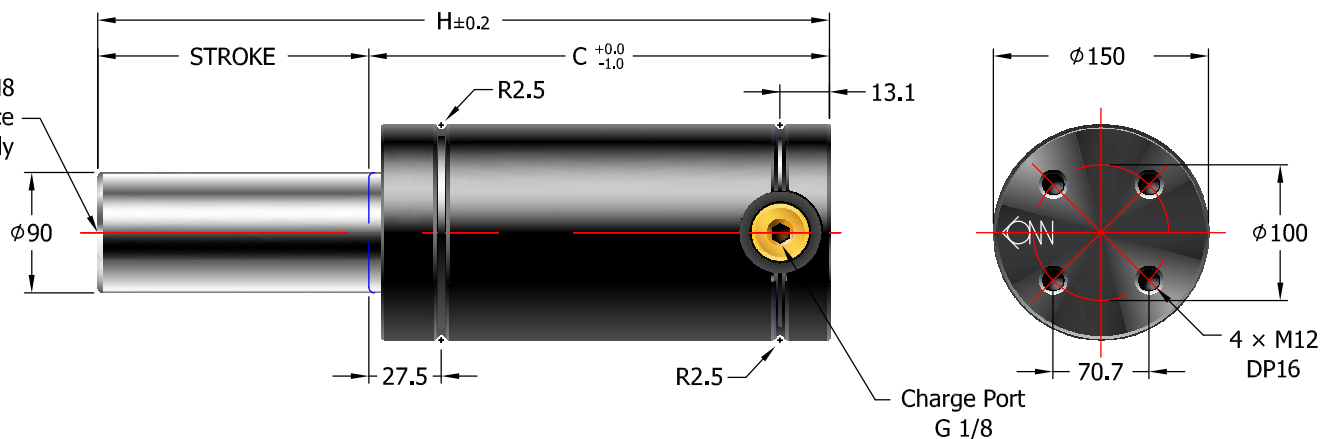


XC6600(SC5000) MOUNT





M8
Maintenance
only



규격 표기법

GAS SPRING

TST9500
MODEL

× 050
STROKE

S(F) —
단독형-S
배관형-F

(MSA) —
일체형 마운트
(선택사항)

150
충전압력
(Bar)

MOUNT

XT9500

REPAIR KIT

RCX9500

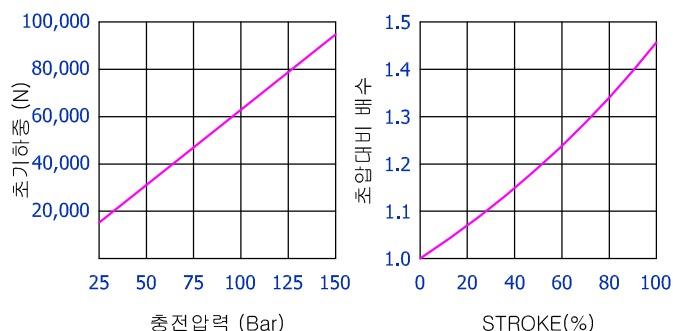
[주의!] TST9500은 충전 압력을 별도로 지정하지 않을 경우 표준충전압력(150Bar)으로 출고됩니다.

TST9500

Stroke		H	C	Force(N) (150 bar / +20 ℃)		Gas vol. (cm ³)	Weight (kg)
(mm)	(inch)			Initial	End force*		
20	0.79	118	98	95,000	127,600	509.9	10.78
25	0.98	128	103		131,000	591.6	11.10
30	1.18	138	108		133,700	673.3	11.60
35	1.38	148	113		135,900	755.0	12.84
38	1.50	154	116		137,000	804.0	13.18
40	1.57	158	118		137,700	836.6	13.24
45	1.77	168	123		139,200	918.3	14.48
50	1.97	178	128		140,500	1000.0	14.70
60	2.36	198	138		142,600	1163.3	15.50
63	2.48	204	141		143,100	1212.3	15.64
70	2.76	218	148		144,200	1326.7	16.20
75	2.95	228	153		144,900	1408.4	17.30
80	3.15	238	158		145,500	1490.0	18.10
90	3.54	258	168		146,500	1653.4	19.60
100	3.94	278	178		147,400	1816.7	20.44
125	4.92	328	203		149,100	2225.1	21.20

* = at full stroke

■ 충전압력/압축량 대비 하중변화도표



■ TST9500의 충전 압력(Bar) 계산식

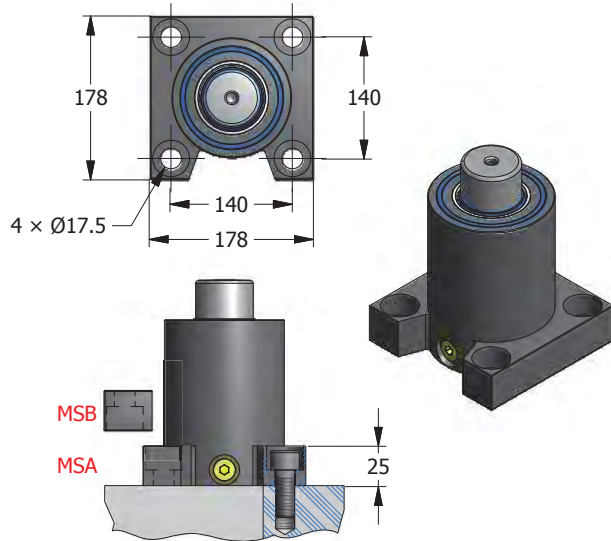
$$\text{충전압력(Bar)} = \frac{\text{초기하중(N)}}{635.9}$$

ex) 필요한 초기하중 85,000N인 GAS SPRING의 충전압력은?

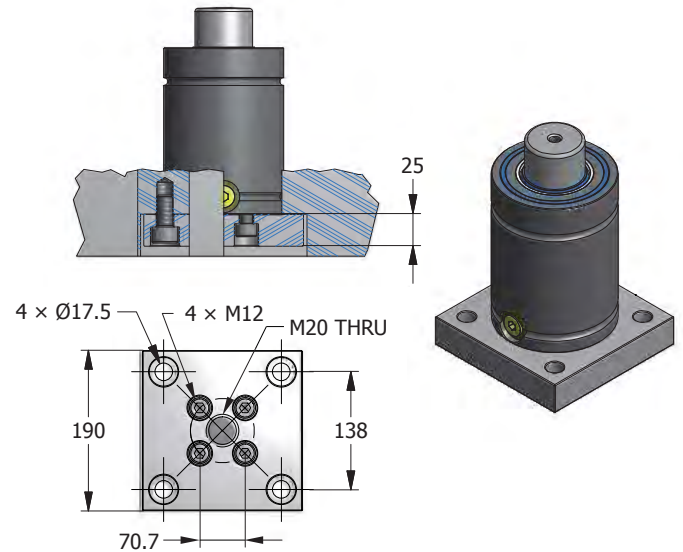
$$134(\text{Bar}) = \frac{85,000(\text{N})}{635.9}$$

MS MOUNT

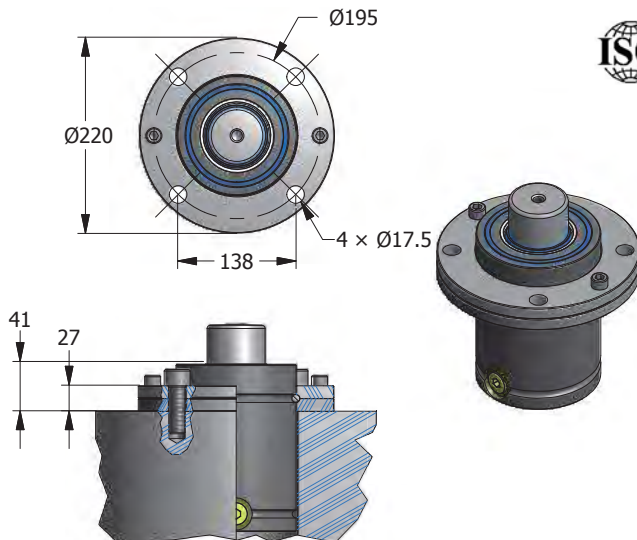
일체형



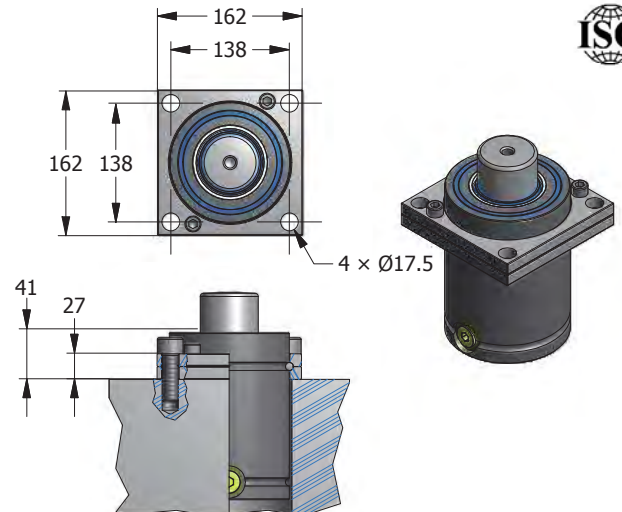
TB9500 MOUNT



XR9500(SR7500) MOUNT



XT9500(ST7500) MOUNT



XC9500(SC7500) MOUNT

