



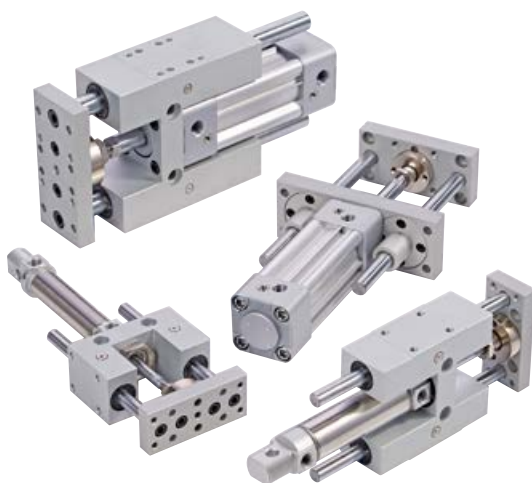
Special spec



Technical data



Caution for safety
(Read before installing)

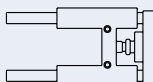


MGTK Light duty type

MGTX Light duty flange type

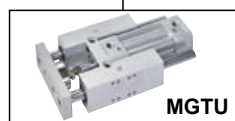
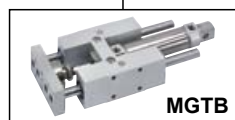
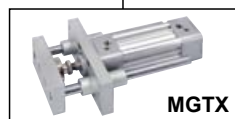
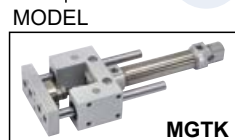
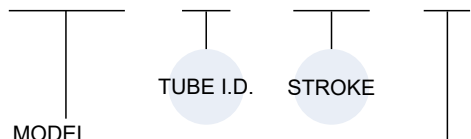
MGTB Heavy duty (bush) type

MGTU Heavy duty (linear bearing) type



Order example

MGTB — 40 — 100 — RP



REAR FLANGE
COUPLING



RP: With rear flange coupling

Features

- The guide rod cylinder is a combination of ISO 6432 / ISO 15552 cylinders with guide accessories. It has excellent resistance to rotation, torque and lateral load.
- Four self-lubricating bushes or linear bearings enable high loading and precise movement.
- Simplified structure, save a lot of time when designing mechanism/application, generating new drawing and installing.
- The MGT* have longer stroke and a larger bore size than the MCG* cylinder.
- $\phi 32 \sim \phi 63$ With four grooves on the tube, reed sensors can be easily inserted into any position.
- Adjustable cushion as standard.
- Magnetic as standard.

Specification

Model	MGTB, MGTU					
	MGTK		MGTX			
Tube I.D. (mm)	20	25	32	40	50	63
Port size	G1/8		G1/8	G1/4		G3/8
Medium	Air					
Operating pressure range	0.2~0.7 MPa					
Ambient temperature	-5~+60℃ (No freezing)					
Lubrication	Cylinder	Not required				
	Guide (*1)	Lubricating grease				
Available speed range	50~750		50~500 mm/sec			
Sensor switch	RDC, RQC  RDT, RQT  RCM 		RDT, RQT  RCI 			
Sensor switch holder	R* <i>C</i>	BKC-1 (*2)		—		
	R* <i>T</i>	BKT-1		—		
	RCM	BM20	BM25	—		

*1. Periodically refill with the lubricating grease is required to enhance the lubricative grade and lifetime.

Inject an appropriate amount of lubricating grease and the cylinder moves back and forth several times to confirm that the movement is smooth.

*2. Not for R*CV angle cable.

Table for standard stroke

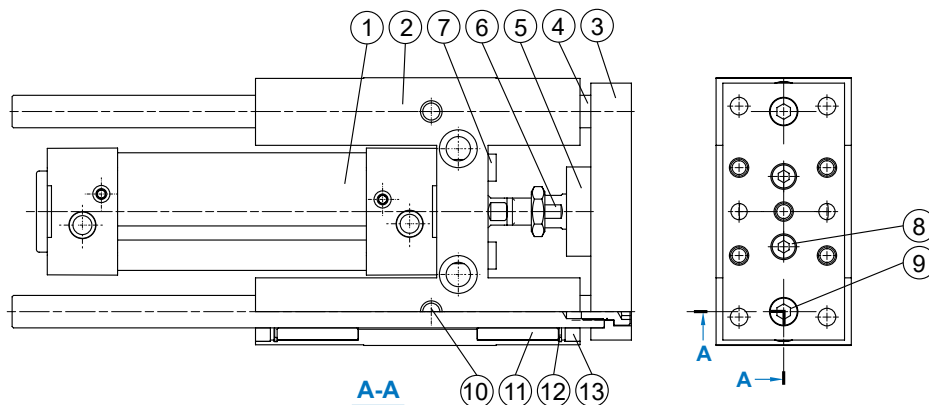
Tube I.D.	Stroke (mm)	Max. stroke (mm)
$\phi 20, 25$	10, 25, 50, 75, 100, 125, 150, 200, 300, 400, 500	1000
$\phi 32, 40$	50, 75, 100, 125, 150, 175, 200, 250, 300, 350, 400, 450, 500, 600, 700, 800	1800
$\phi 50, 63$		2000

* Please contact us if the stroke is out of specification.

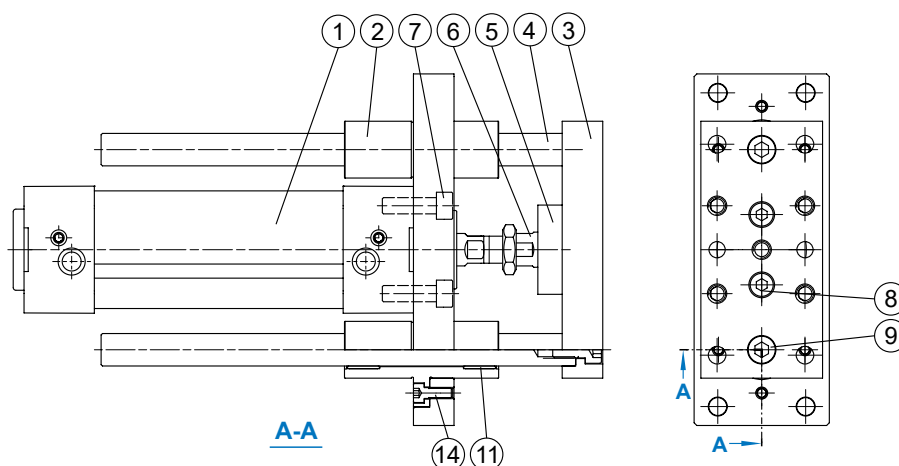
MGT* Inside structure & Parts list

TWIN-GUIDE CYLINDER

MGTB,MGTU,MGTK



MGTX

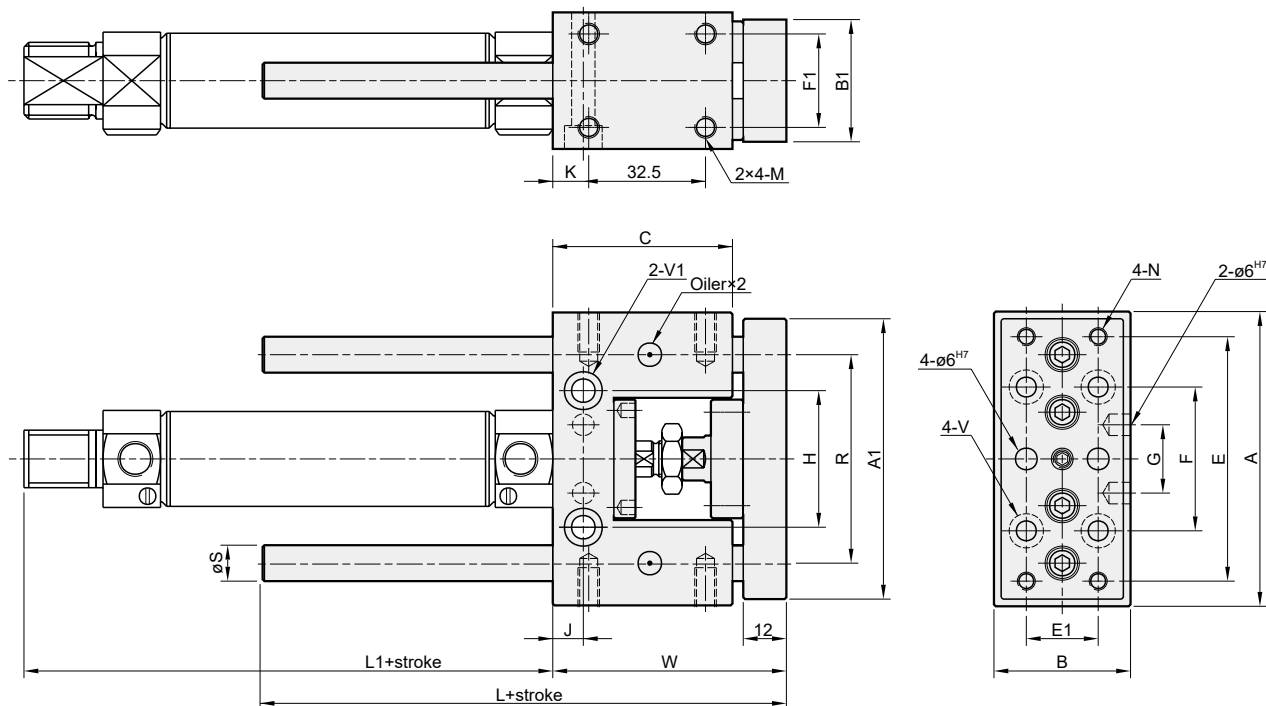


Material

No.	Part name	Material	Note
1	Cylinder	—	ø20, ø25: MCMI series
			ø32~ø63: MCQI3 series
2	Guide holder	Aluminum alloy	
3	Plate	Aluminum alloy	
4	Guide rod	Medium carbon steel	for MGTB, MGTK, MGTX series
		Bearing steel	for MGTU series
5	Piston rod holder	Carbon steel	
6	Floating connector	Carbon steel	
7	Bolt	SCM	
8	Bolt	SCM	
9	Bolt	SCM	
10	Oiler	Copper	
11	Rod bush	Copper	for MGTB, MGTK, MGTX series
	Linear bearing	—	for MGTU series
12	Snap ring	Spring steel	
13	Wiper seal	NBR	
14	Bolt	SCM	

MGTK (Oilless bush guide)

$\varnothing 20$, $\varnothing 25$

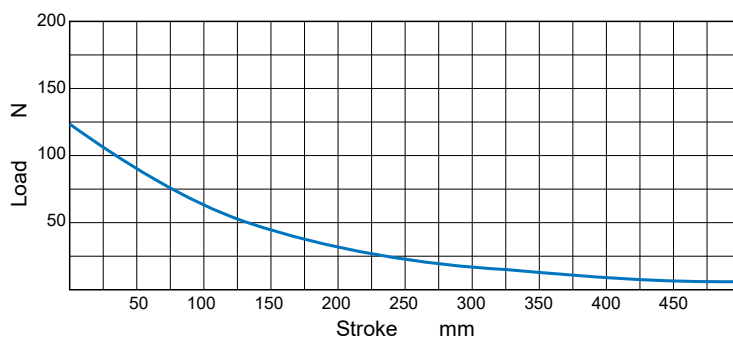
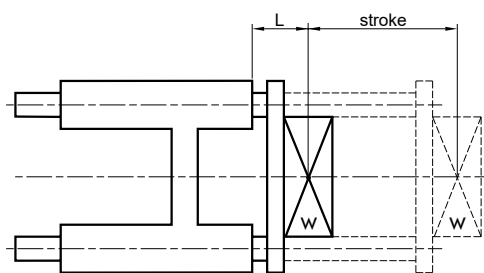


Code Tube I.D.	A	A1	B	B1	C	E	E1	F	F1	G	H	J	K	L	L1	M	N	R	S	V	V1	W
20	82	78	38	34	50	68	20	40	26	19	38	8.5	5	85	88	M6,(D)11	M5×0.8 thru	58	10	ø5.5,ø9.5(D)5.4	ø6.5,ø10.5(D)6.5	65
25	82	78	38	34	50	68	20	40	26	19	38	8.5	5	85	89	M6,(D)11	M5×0.8 thru	58	10	ø5.5,ø9.5(D)5.4	ø6.5,ø10.5(D)6.5	65

Maximum allowable torque moment

Max. allowable load

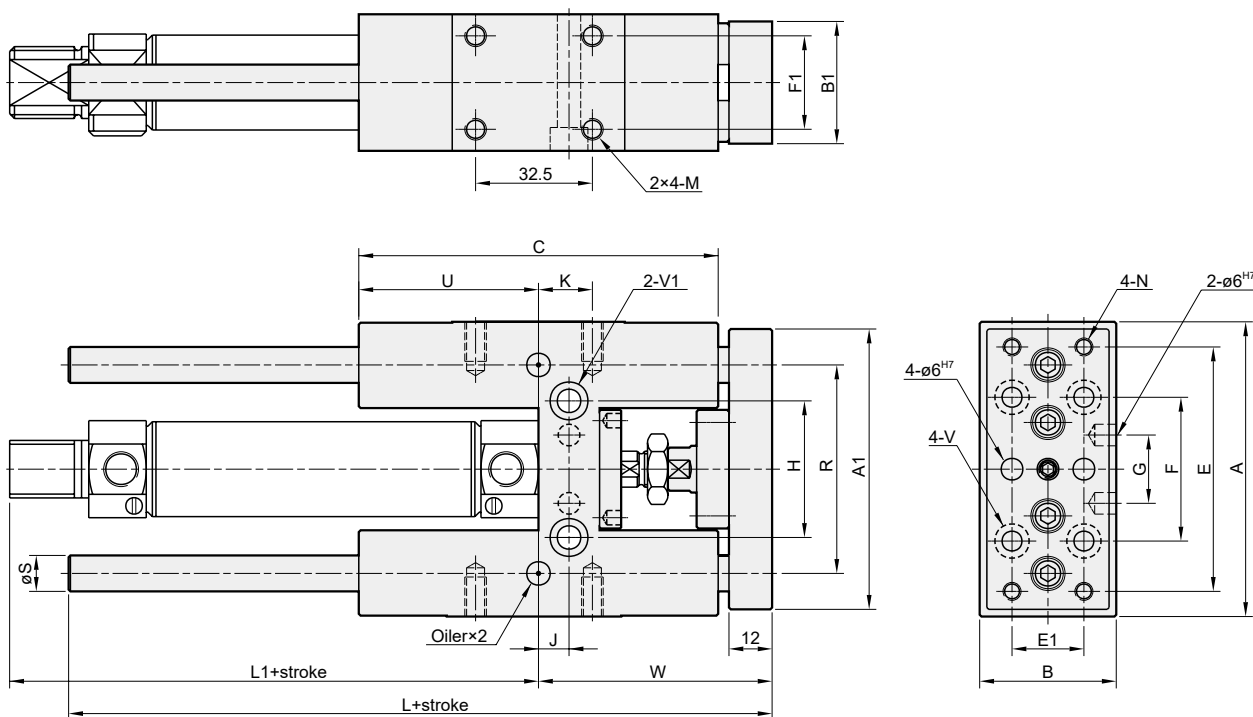
MGTK $\varnothing 20$, $\varnothing 25$



(Brass bush guide)

MGTU (Linear bearing guide)

$\varnothing 20$, $\varnothing 25$

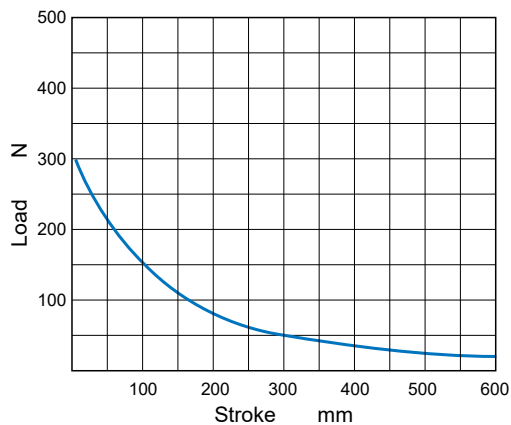
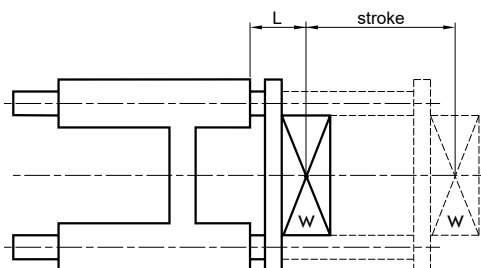


Code Tube I.D.	A	A1	B	B1	C	E	E1	F	F1	G	H	J	K	L	L1	M	N	R	S	U	V	V1	W
20	82	78	38	34	100	68	20	40	26	19	38	8.5	15	135	88	M6,(D)11	M5×0.8 thru	58	10	50	ø5.5,ø9.5(D)5.4	ø6.5,ø10.5(D)6.5	65
25	82	78	38	34	100	68	20	40	26	19	38	8.5	15	135	89	M6,(D)11	M5×0.8 thru	58	10	50	ø5.5,ø9.5(D)5.4	ø6.5,ø10.5(D)6.5	65

Maximum allowable torque moment

Max. allowable load

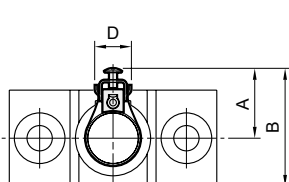
MGTB / MGTU $\varnothing 20$, $\varnothing 25$



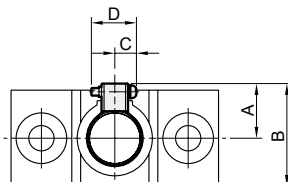
■ Installation of sensor switch $\varnothing 20, \varnothing 25$

MGTB

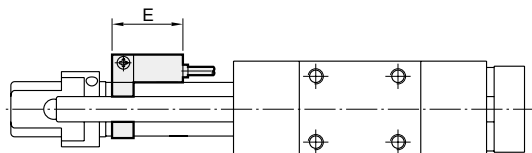
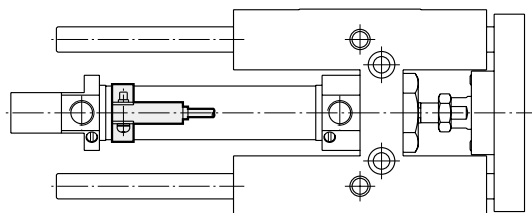
MGTU



Sensor switch: R*C, R*T
Band: BKC-1, BKT-1

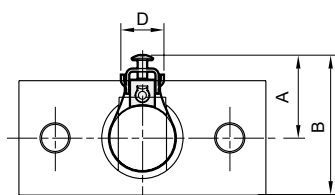


Sensor switch: RCM
Band: BM**

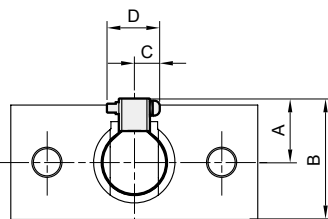


Code Band Tube I.D.	A			B			C	D			E		
	BKC-1	BKT-1	BM*	BKC-1	BKT-1	BM*	BM*	BKC-1	BKT-1	BM*	BKC-1	BKT-1	BM*
20	27	28.5	22	46	47.5	41	10	13.5	13.5	16	27	30	28
25	29.5	31	25	48.5	50	44	10	13.5	13.5	16	27	30	28

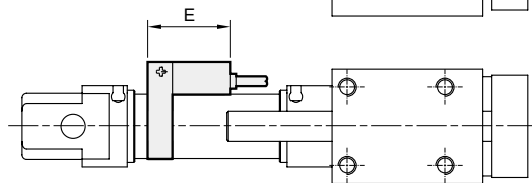
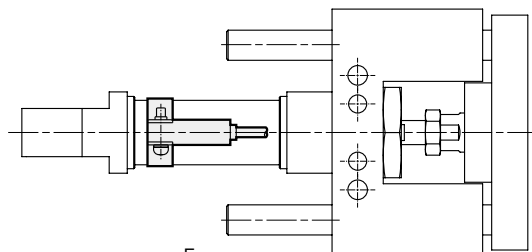
MGTK



Sensor switch: R*C, R*T
Band: BKC-1, BKT-1



Sensor switch: RCM
Band: BM**

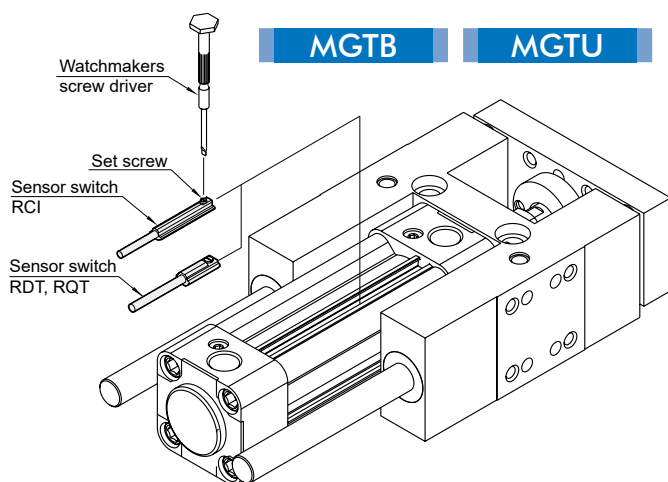


■ Installation of sensor switch $\varnothing 32 \sim \varnothing 63$

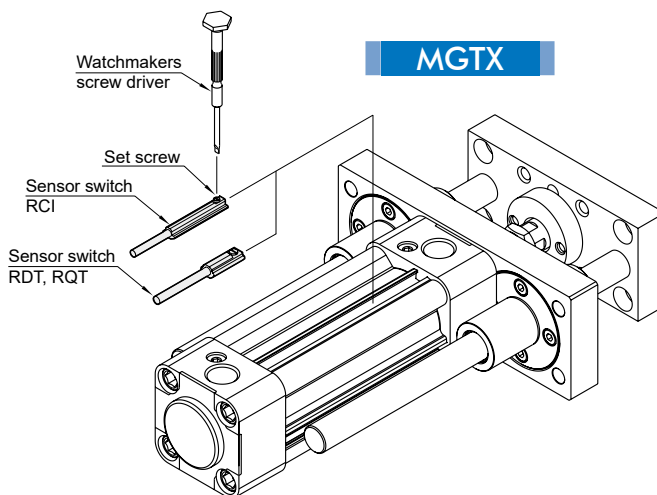
Sensor switch: RDT, RQT, RCI

MGTB

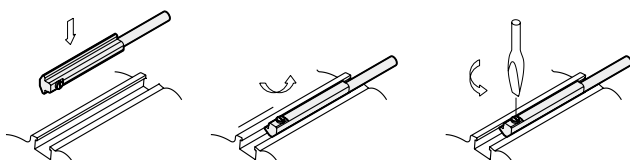
MGTU



MGTX

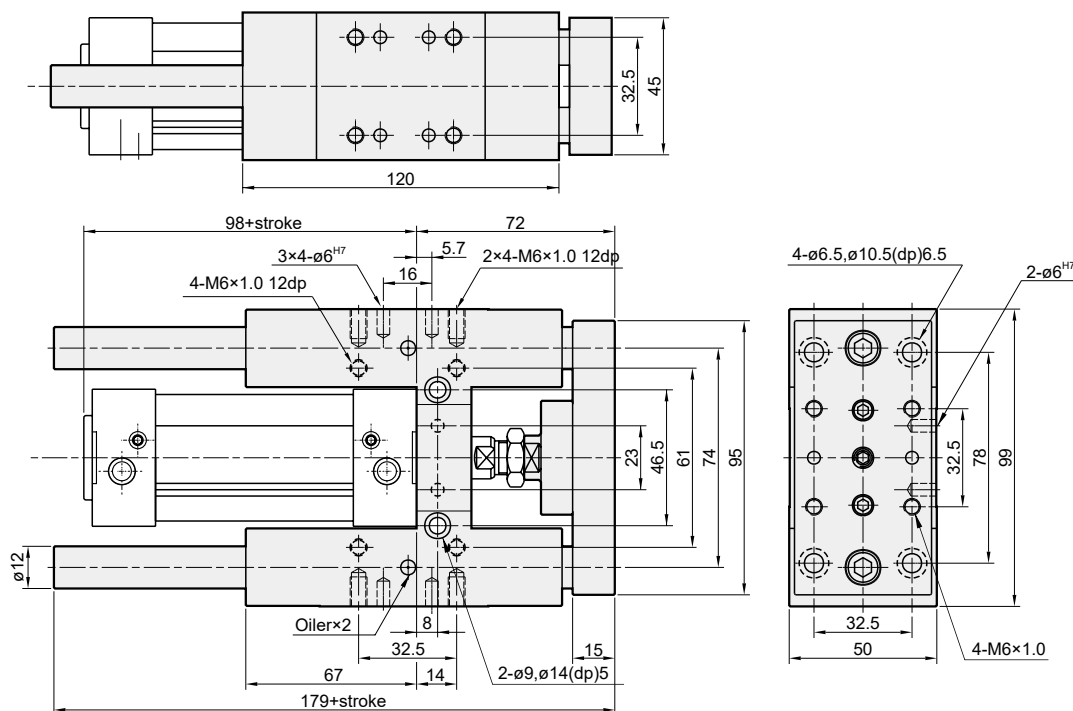


Mounting



MGTB (Brass bush guide) $\varnothing 32$

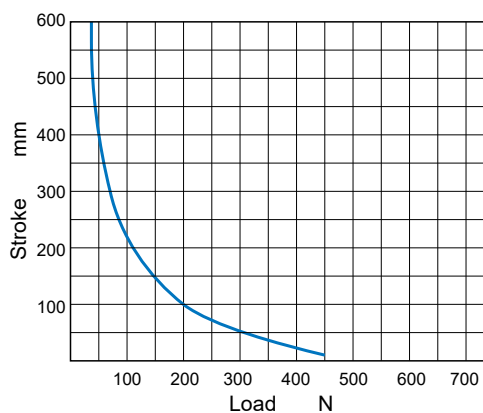
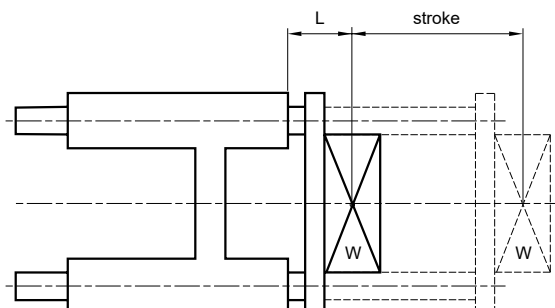
MGTU (Linear bearing guide) $\varnothing 32$



Maximum allowable torque moment

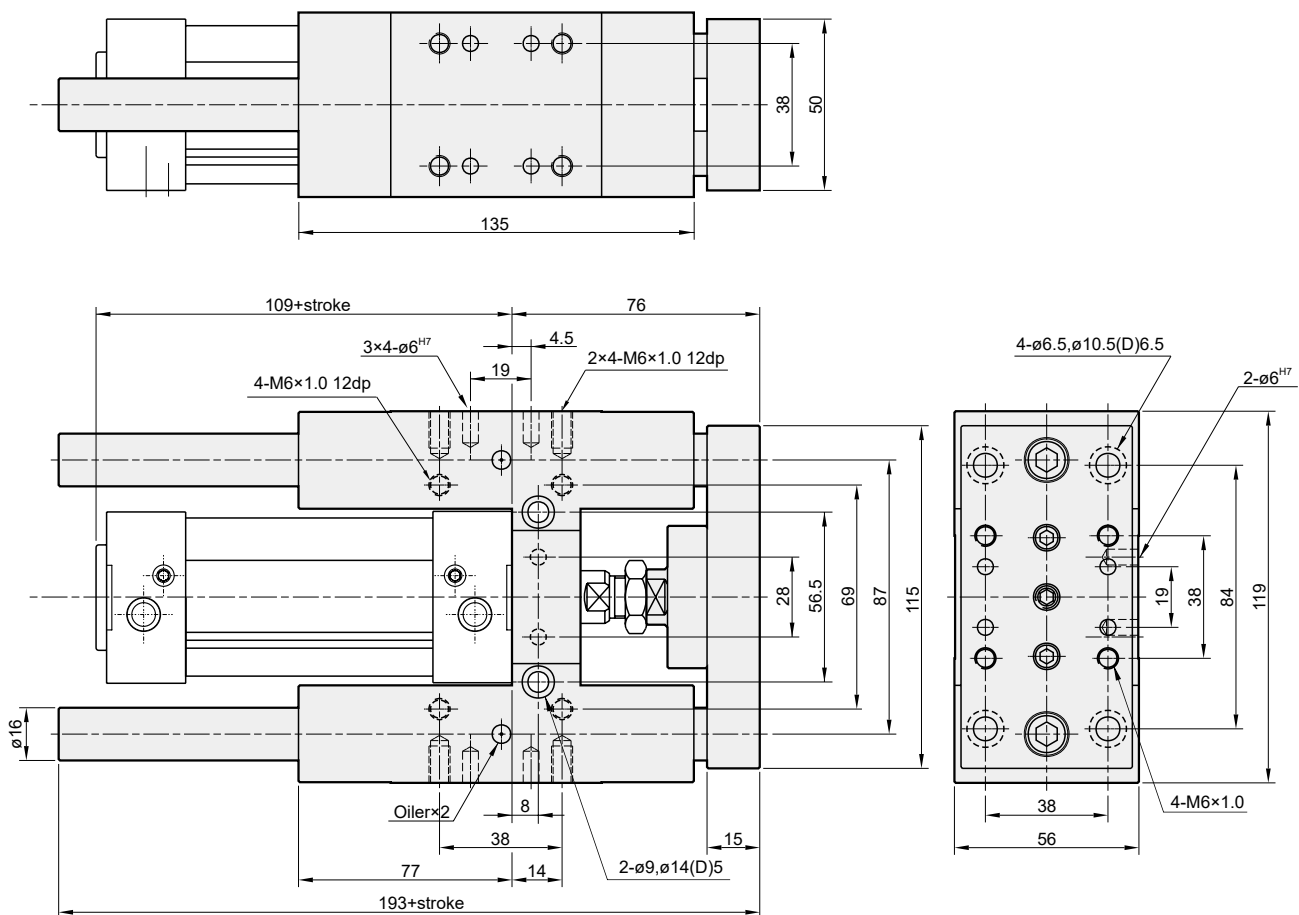
Max. allowable load

MGTB / MGTU $\varnothing 32$



MGTB (Brass bush guide)
(Linear bearing guide)

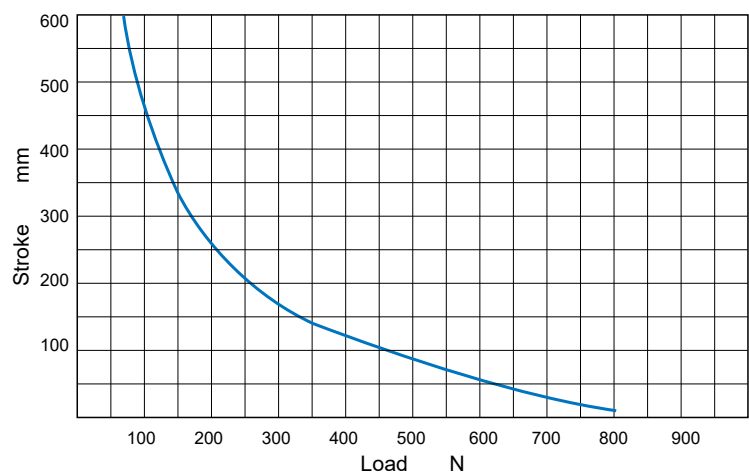
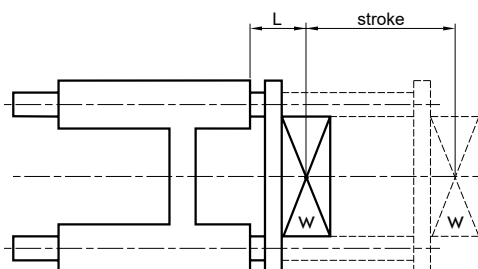
$\varnothing 40$



Maximum allowable torque moment

Max. allowable load

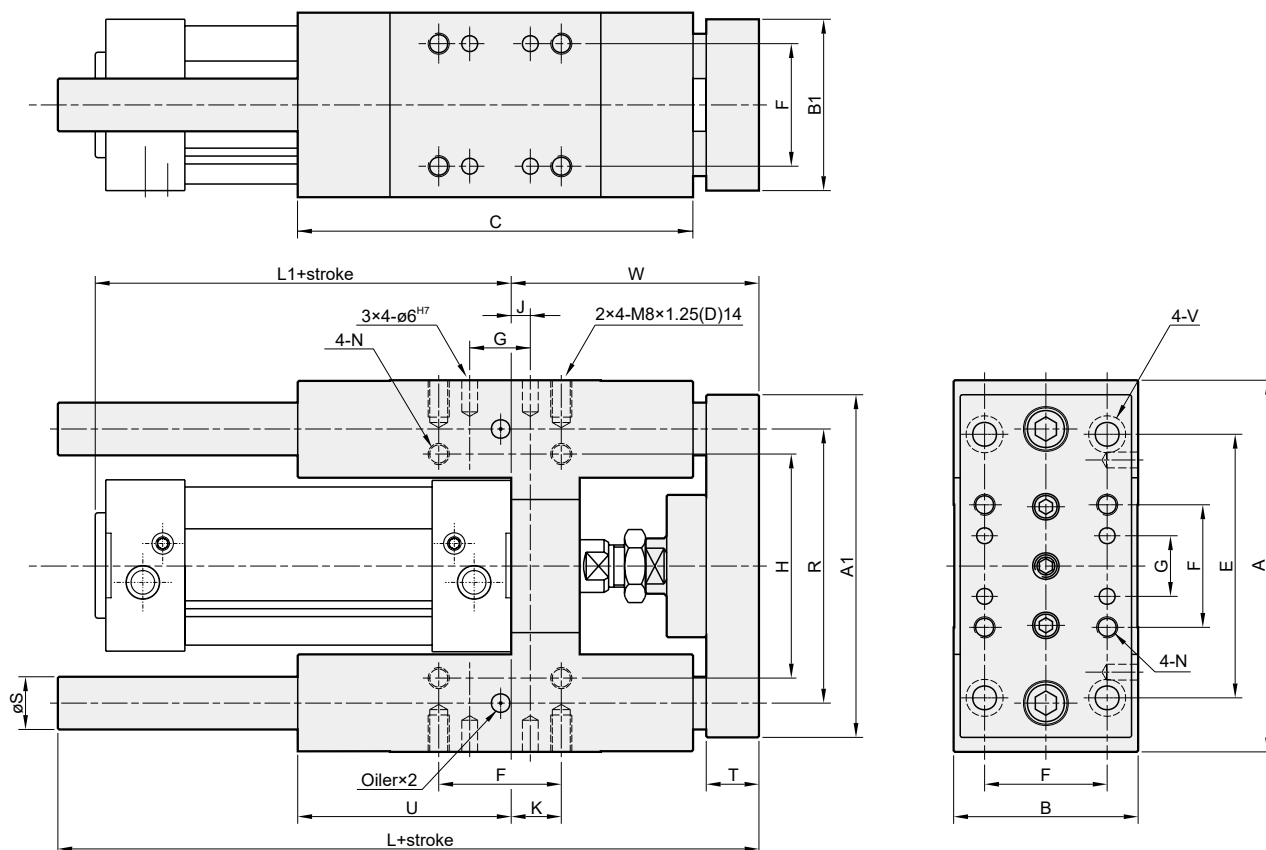
MGTB / MGTU $\varnothing 40$



MGTB (Brass bush guide)

MGTU (Linear bearing guide)

$\varnothing 50$, $\varnothing 63$

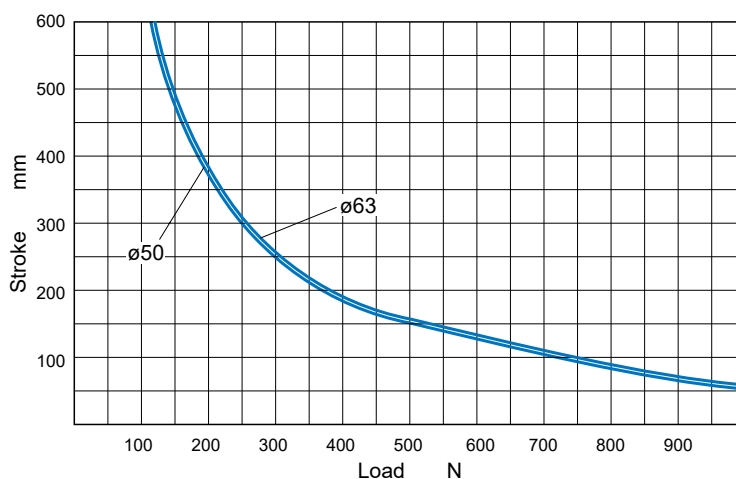
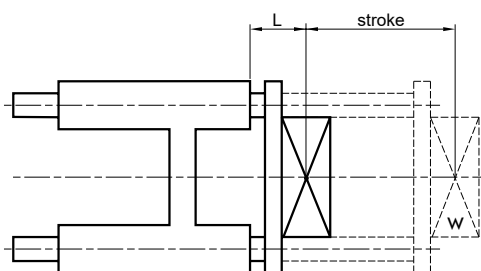


Code Tube I.D.	A	A1	B	B1	C	E	F	G	H	J	K	L	L1	N	R	S	T	U	V	W
50	141	135	70	65	150	100	46.5	23	85	7.5	19	216	110	M8x1.25 thru	104	20	20	81	$\varnothing 9$, $\varnothing 14$ (D)8.5	94
63	156	150	80	75	165	105	56.5	28	100	5	19	230	125	M8x1.25 thru	119	20	20	96	$\varnothing 9$, $\varnothing 14$ (D)8.5	94

Maximum allowable torque moment

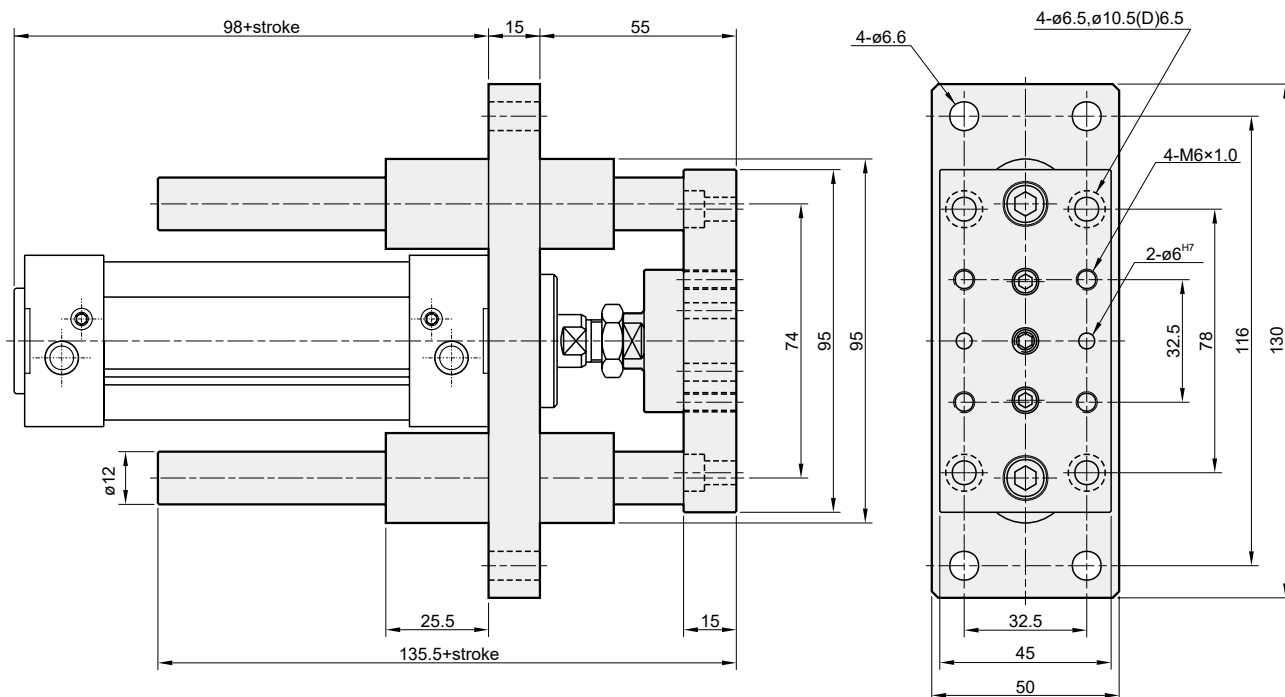
Max. allowable load

MGTB / MGTU $\varnothing 50$, $\varnothing 63$



MGTX (Flange type)

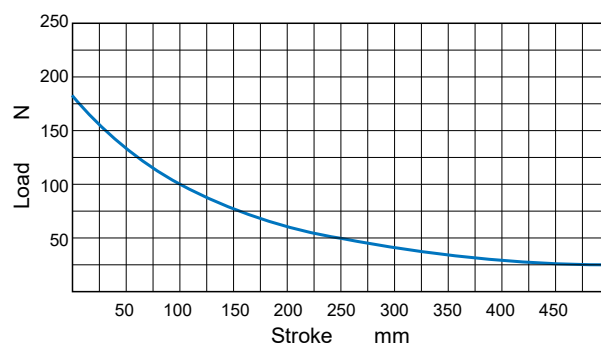
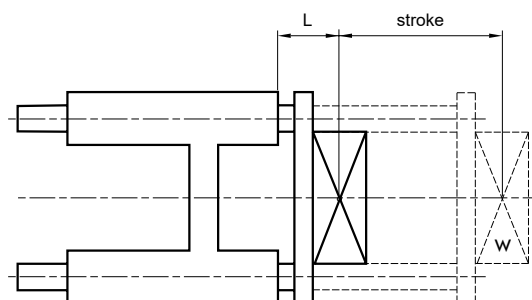
$\phi 32$



Maximum allowable torque moment

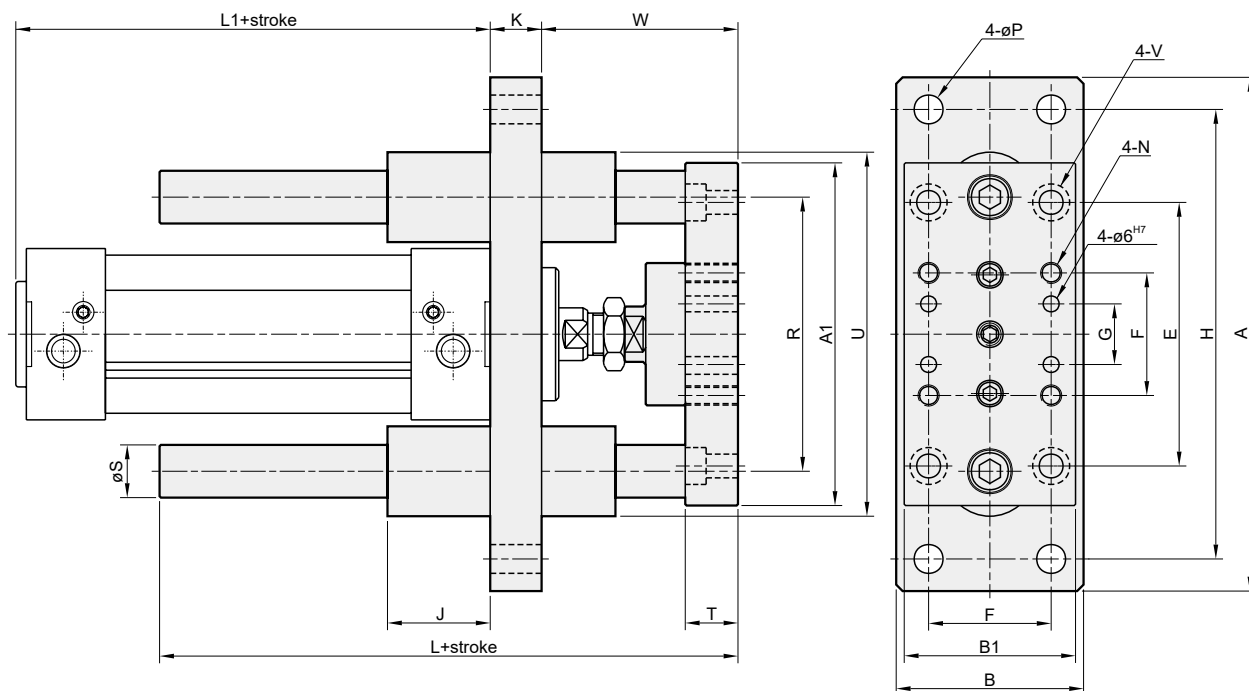
Max. allowable load

MGTX $\phi 32$



MGTX (Flange type)

$\phi 40 \sim \phi 63$

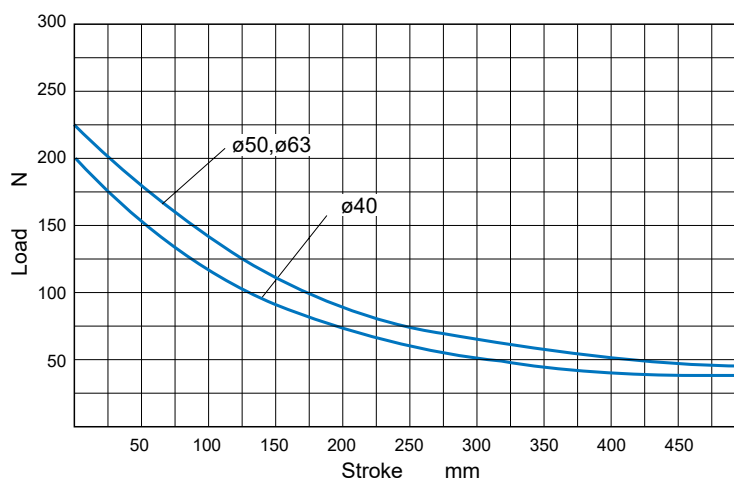
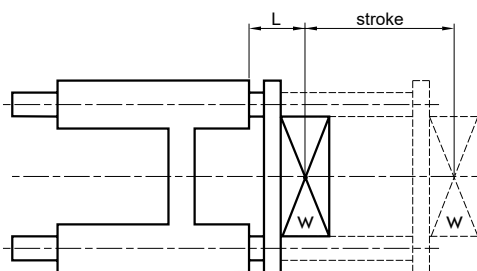


Code Tube I.D.	A	A1	B	B1	E	F	G	H	J	K	L	L1	N	P	R	S	T	U	V	W
40	160	115	55	50	84	38	19	140	32	15	148	109	M6×1.0 thru	$\phi 9$	87	16	15	115	$\phi 6.5, \phi 10.5(D)6.5$	61
50	180	135	70	65	100	46.5	23	160	36	20	170	110	M8×1.25 thru	$\phi 9$	104	20	20	136	$\phi 9, \phi 14(D)8.5$	74
63	195	150	80	75	105	56.5	28	175	36	20	170	125	M8×1.25 thru	$\phi 9$	119	20	20	151	$\phi 9, \phi 14(D)8.5$	74

Maximum allowable torque moment

Max. allowable load

MGTX $\phi 40 \sim \phi 63$



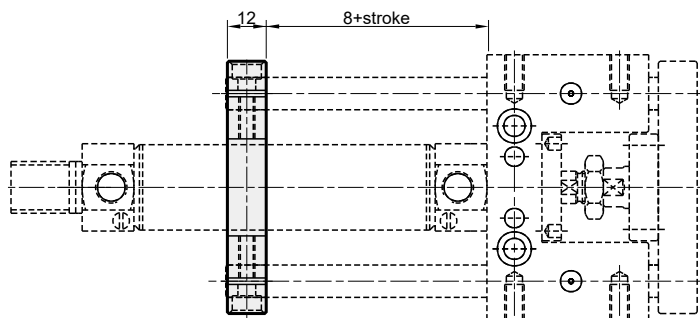
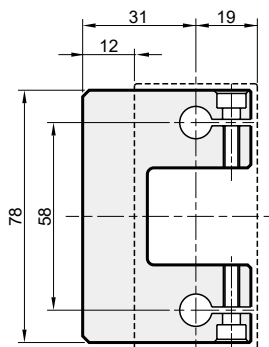
MGT* Rear flange coupling ø20, ø25

TWIN-GUIDE CYLINDER



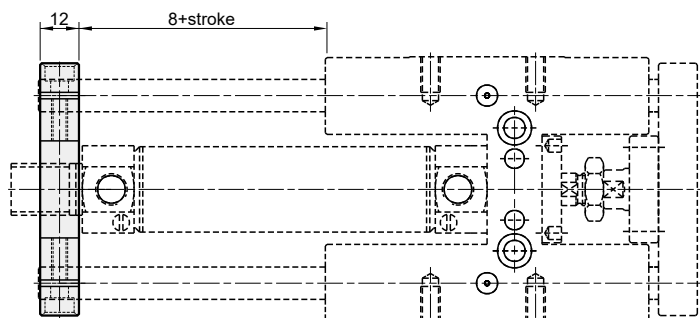
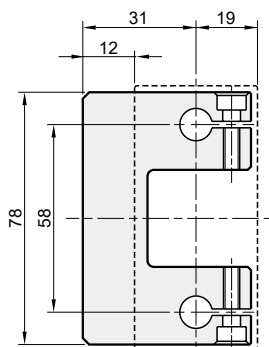
MGTK

ø20, ø25



MGTB

ø20, ø25



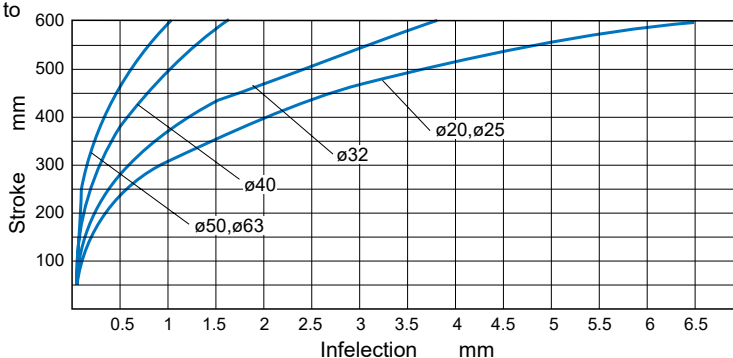
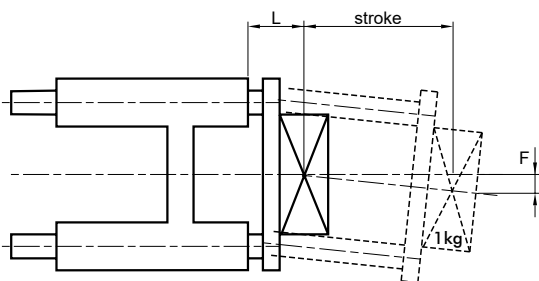
Building material: aluminum alloy
2 Clamps screws are included in the supply

Maximum allowable torque moment

Max. allowable load

MGTB / MGTU

Inflection of guide stems is due to their weight summed to the load of 1Kg.related to the stroke.



Weight

Unit: kg

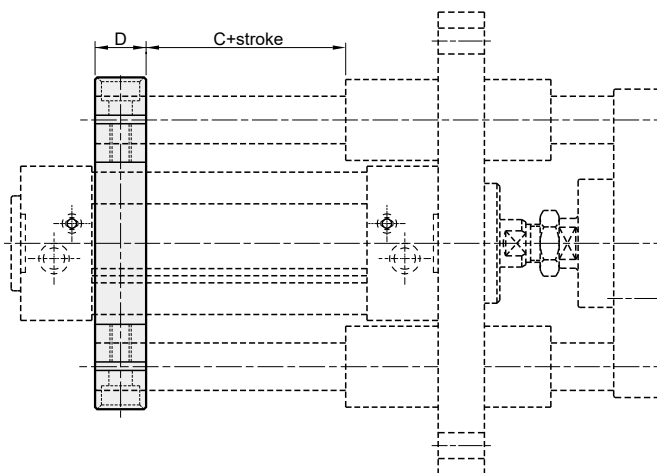
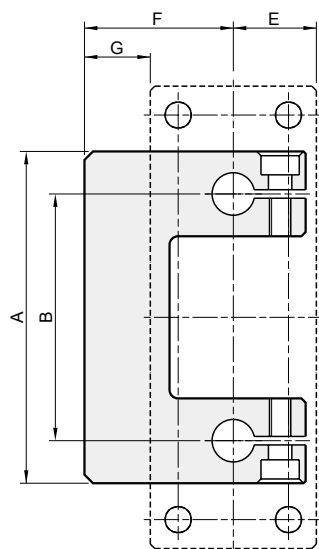
Tube I.D.	Basic weight	Stroke 25 mm	Basic weight	Stroke 25 mm	Basic weight	Stroke 25 mm
	MGTK (Oilless bush guide)		MGTB (Brass bush guide)		MGTU (Linear bushing guide)	
20	0.690	0.050	1.090	0.050	0.967	0.050
25	0.716	0.058	1.137	0.058	1.015	0.058

MGT* Rear flange coupling $\varnothing 32 \sim \varnothing 63$

TWIN-GUIDE CYLINDER



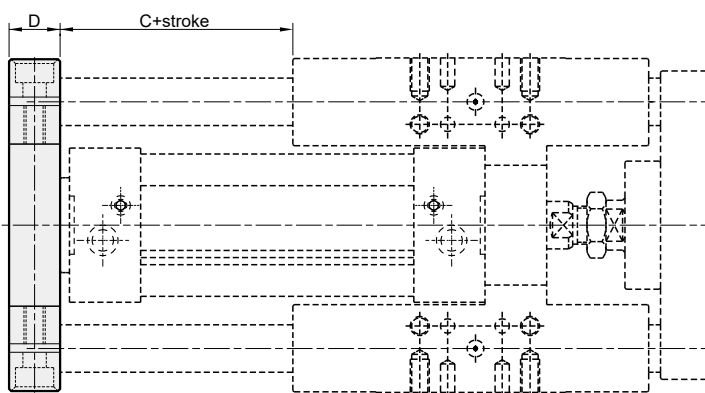
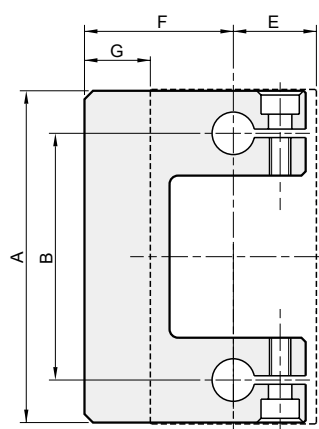
MGTX $\varnothing 32 \sim \varnothing 63$



MGTB

MGTU

$\varnothing 32 \sim \varnothing 63$



Building material: aluminum alloy
2 Clamps screws are included in the supply

Code Tube I.D.	A	B	C	D	E	F	G
32	95	74	25	15	25	47	22
40	115	87	20	20	28	52.5	24.5
50	135	104	20	20	35	67.5	32.5
63	150	119	20	20	40	78	38

* MGTX $\varnothing 40$: E=27.5, G=25

Weight

Unit: kg

Tube I.D.	Basic weight	Stroke 25 mm	Basic weight	Stroke 25 mm	Basic weight	Stroke 25 mm
	MGTB (Brass bush guide)		MGTU (Linear bushing guide)		MGTX (Brass bush guide)	
32	2.060	0.100	1.918	0.100	1.274	0.100
40	3.423	0.159	3.113	0.159	2.082	0.159
50	5.584	0.240	5.162	0.240	3.440	0.240
63	6.816	0.250	6.390	0.250	4.221	0.250