

Order example

MCHU – 12 M

MODEL

TUBE I.D.

M: Magnet

12
16
20

* Magnetic as standard.

Features

- Compact design, low weight with rugged construction.
- Jaws mounted to wear resistant bush guides.
- Proximity and reed switches can be used with this unit.
- Magnetic as standard.

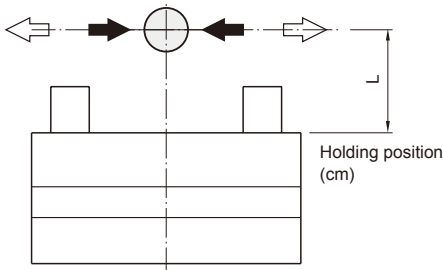
Specification

Model	MCHU		
Acting type	Double acting		
Tube I.D. (mm)	12	16	20
Stroke	15	20	25
Fluid	Air 0.2~0.7 MPa		
Ambient temperature	-10~+60°C (No freezing)		
Lubrication (*1)	Not required		
Repeatability	±0.03 mm		
Sensor switch (*2)	RDF(V), RNF(V): NPN, RPF(V): PNP		
Weight (kg)	0.16	0.29	0.58

*1. Maintenance: Re-Lubrication after appr. 1.5 million cycles recommended.

*2. RDF specification, please refer to page 5-10.

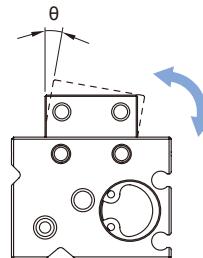
Capacity



Inside holding force

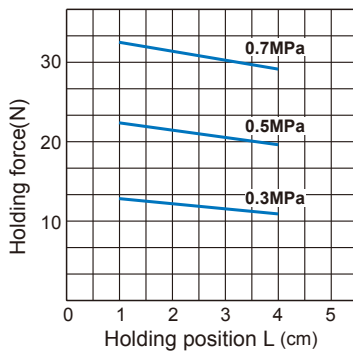
Outside holding force

Non-rotating accuracy

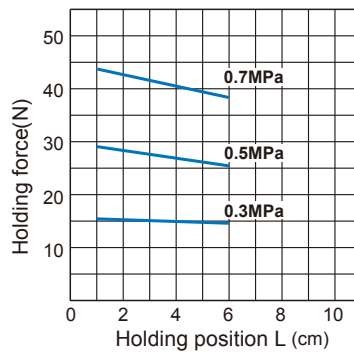


Tube I.D.	(θ)
ø12	±0.25°
ø16	±0.2°
ø20	±0.15°

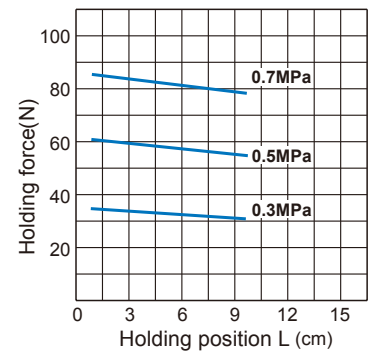
MCHU-12



MCHU-16



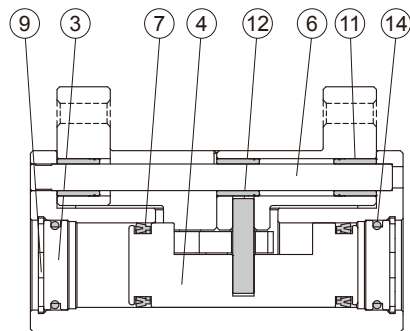
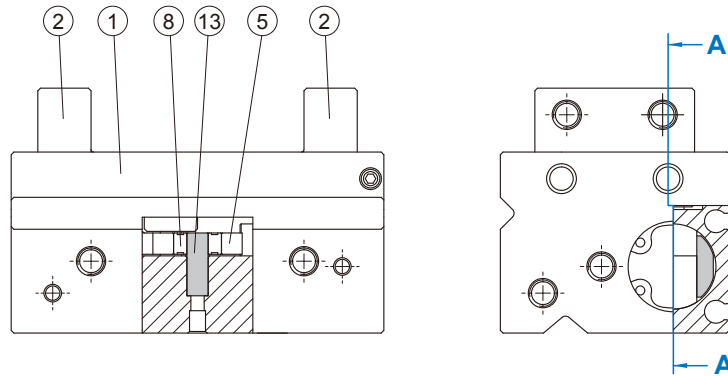
MCHU-20



Model selection suggestions

* Finger selection please refer to page 3-2.

1. For normal gripping and carrying usage, the recommended safe factor (a) is 4.
2. The value of gripping force of single finger can be found at the gripping force table.
3. The safe factor (a) have to be higher if the gripper is using with a great accelerated velocity or impaction condition.

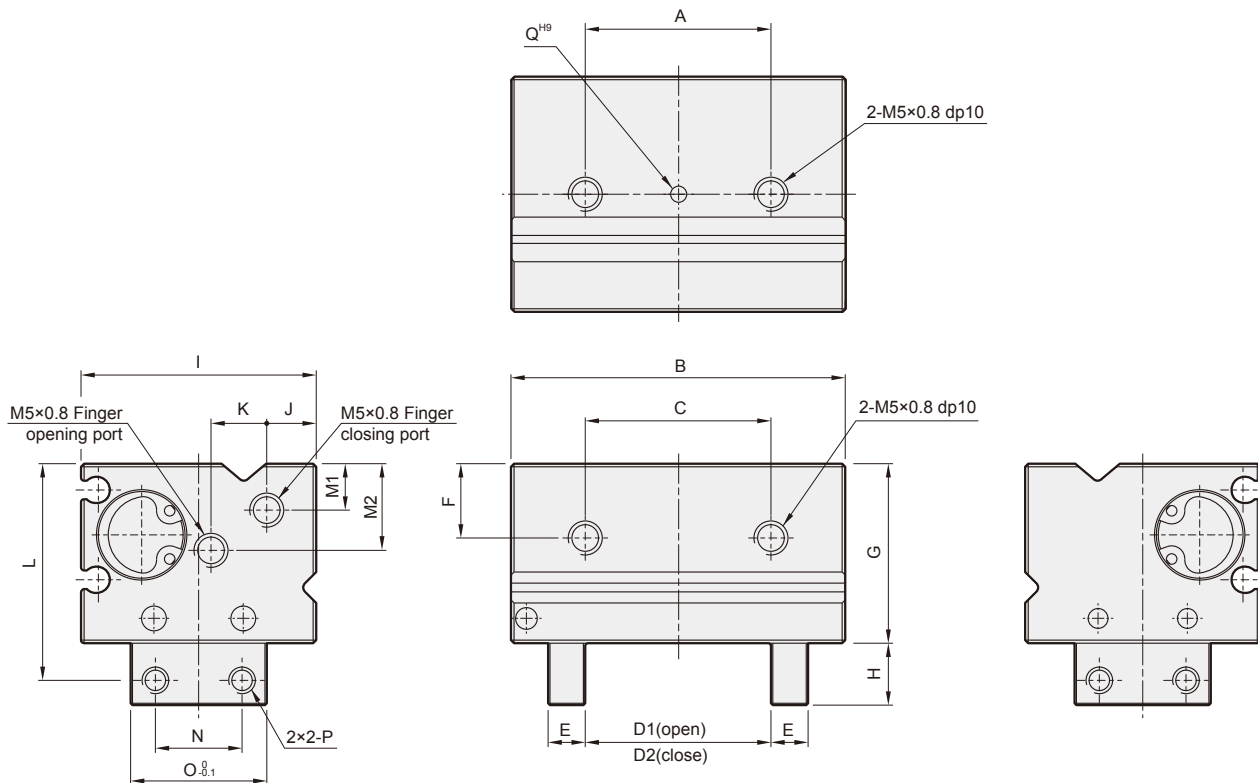


A-A

Material

No.	Tube I.D. Part name	12	16	20	Q'y
1	Body	Aluminum alloy			1
2	Finger	Aluminum alloy			2
3	Cover	Aluminum alloy			2
4	Piston	Stainless steel			1
5	Cam	SCM			1
6	Guide rod	Carbon steel			2
7	Piston packing	NBR			2
8	Bearing	Bearing steel			1
9	Snap ring	Spring steel			2
10	Magnet	Magnet material			1
11	Bush	Copper			6
12	Pin	High carbon steel			2
13	Pin	High carbon steel			1
14	O-ring	NBR			2

PARALLEL GRIPPER (2-Finger)



Code Tube I.D.	A	B	C	D1	D2	E	F	G	H	I	J	K	L	M1	M2	N	O	P	Q ^{H9}
12	30	54	30	30	15	6	12	29	10	38	8	9	35	7.5	14	14	22	M4x0.7	$\varnothing 2^{+0.025}_0 \times 2dp$
16	40	70	40	40	20	10	13.5	34	12	43	8	11	41	7.5	12.5	18	30	M5x0.8	$\varnothing 3^{+0.025}_0 \times 4dp$
20	60	82	60	50	25	10	15	43	22	56	10	15	59	9	20	20	35	M5x0.8	$\varnothing 3^{+0.025}_0 \times 6dp$