FLAT TABLE

FLAT TABLE®

FXTW Series

Registration of a Design

INDEX★

FLAT TABLE
FXTW Series

Slender Body With Multiple Features!

Linear Guide

High Accuracy, High Rigidity Linear Guide is built-in.

Stroke Adjustment Mechanism

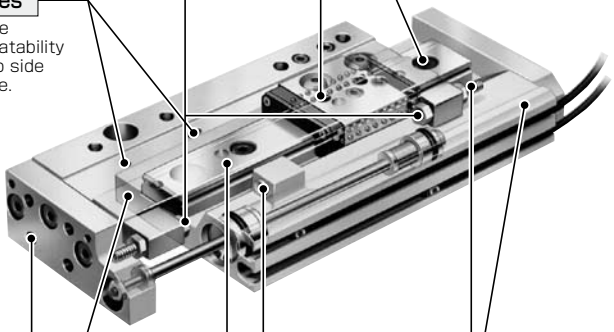
The stroke is adjustable by up to - 5 mm at each end (- 10 mm in total).
Replacement with a commercially-available hexagon head bolt allows an intermediate stroke. (Replacement may not be possible depending on the stroke.)

Positioning Pin Holes

Pin holes for ensuring the mounting/removing repeatability are made in the table top side and the body bottom side.

Linear Guide (light Preload)

(Circulating infinite linear motion type)
A high-accuracy, high-rigidity stainless steel linear guide is employed for the sliding part.



Rear Side Piping

Piping ports are gathered on the rear side.

Mounting Surface

10 to 12 threaded holes for mounting provided in each of the front and top sides of the table improve the degree of freedom of mounting.

Rubber Stopper

Absorbs the impact noise and minimizes the distance from the rod to reduce the moment.

Countermeasure for Copper Parts

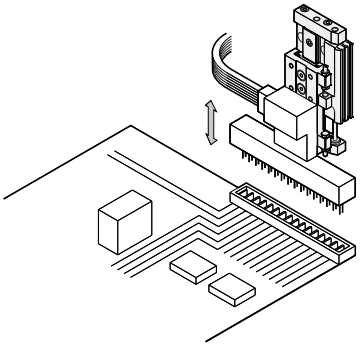
Copper parts are not used.

Summary of The FLAT TABLE

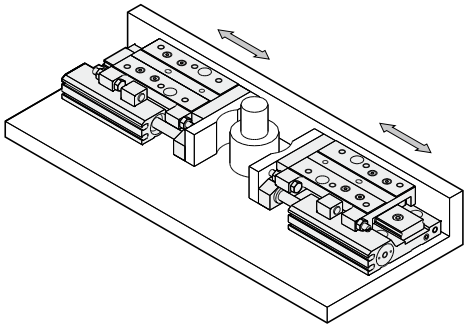
This FXTW Series integrates an air cylinder, linear guide and table into an ultimately thin and compact unit.
Generally, this type of actuator is subject to a large moment applied to the guide due to cylinder thrust.
With this taken into consideration, the actuator employs an ideal wide linear guide (circulating infinite linear motion type) capable of ensuring accuracy and rigidity.

■Application Examples : FLAT TABLE

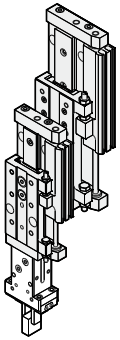
Inspection Terminal Movement



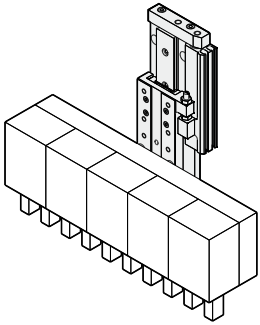
Centering of Parts



Application of Double Strokes



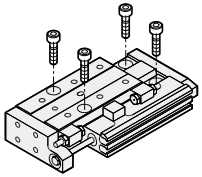
Up-Down Movement of Multiple Chucks



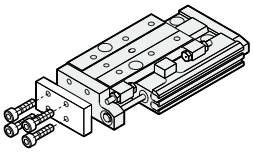
■MAIN BODY INSTALLATION

(Bolt as shown in the figure are not supplied with products)

Top Mounting
(Thru Hole used)



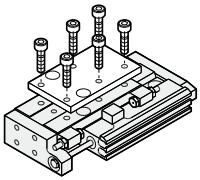
Front Mounting



■MOUNTING

(Bolt as shown in the figure are not supplied with products)

Top Mounting



Custom Made
Grease Converted Product
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Custom Made
With Helical Insert
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Rigidity Up
PSL, PSU Series
447, 479 Page

Model Code Example

FXTWS-SD10-30-RB12LA

Series Name●

●Cable Length

No Code	1m
LA	3m

Magnet●

No Code	None
S	With Magnet

The magnet will become necessary when you install the switch

Bore Size●

8	ϕ 8
10	ϕ10
15	ϕ15
20	ϕ20

●Number of Switches

1	1
2	2

Switch●

No Code	None			
RB1	Straight	DC12~24V	2 Wires Reed Rwitch	With Indicator Light
RC1	Angle			
RB2	Straight	DC12~24V	2 Wires Reed Rwitch	Without Indicator Light
RC2	Angle			
RB4	Straight	DC12~24V	2 Wires Solid State Switch	With Indicator Light
RC4	Angle			
RB5	Straight	DC5~24V	3 Wires Solid State Switch	With Indicator Light
RC5	Angle			

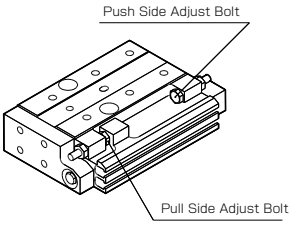
Direction Of Cable Outlet

RB····Straight Outlet Cable RC····Angle Outlet Cable

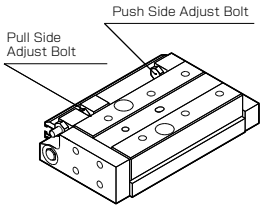
For details ☞Page 1066, 1067

Mounting●

SD Standard



GT Symmetric



●Stroke

Bore Size	Standard Stroke (㎜)				
	30	45	60	80	100
ϕ 8	●	●	●	—	—
ϕ10	●	●	●	—	—
ϕ15	●	●	●	●	●
ϕ20	●	●	●	●	●

Stroke Adjustment

The adjustable stroke range is 5mm on each end (10mm total) with the adjuster bolts as standard.

Intermediate Stroke

5mm step intermediate strokes can be set by lengthening the adjuster bolt on the push side of the standard stroke cylinder.
For ordering, every 5mm stroke can be specified.
The total length of the cylinder is the same as that of the longer stroke cylinder for standard strokes.

■Changes in FXTW from FXT

Changes: Color of the end plate, table and piping block changed from black to white.
Chamfer added and height change made to the adjustment bolt side of the piping block.
Chamfer added to the adjustment bolt side of the end plate.
The appearance and dimensions other than the above are the same, which offers interchangeability in terms of mounting of the actuator body and load.

SPECIFICATIONS

Bore Size	φ8mm	φ10mm	φ15mm	φ20mm
Rod Diameter	φ3mm	φ4mm	φ8mm	φ10mm
Maximum Service Stroke	60mm	60mm	100mm	100mm
＊ Maximum Load Mass	1.5kg	2kg	4kg	8kg
Piping Diameter	M5×0.8			
Guide Mechanism	Miniature Linear Guide			
Type of Operation	Double Acting			
Fluid	Air			
Maximum Operating Pressure	0.7 MPa			
Minimum Operating Pressure	0.2 MPa			
Pressure	1.05MPa			
Operating Temperature	5～60℃			
Operating Speed	100～300mm/s	80～300mm/s	50～300mm/s	
Lubrication	Not required			
Cushioning	Rubber Stopper			
Range of Adjustable Stroke	−5mm at both ends			

＊at 200mm/sec speed

THE TYPE OF LINEAR GUIDE

Model	Type
FXTW 8	Wide Type Rail Size 7
FXTW10	Wide Type Rail Size 9
FXTW15	Wide Type Rail Size 12
FXTW20	Wide Type Rail Size 15

OPTIONAL PARTS CODES

Name

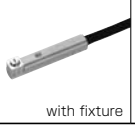
PARTS CODE
Note
PARTS CODE
Note
Content

Switch Fixture

BE(FXTW)
Screw, Nut

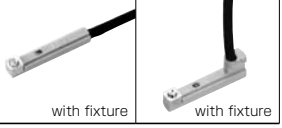
Solid State Switch(2 Wires, with Indicator Light)

Straight Outlet Cable	Angle Outlet Cable
RB1(FXTW) Cable Length:1m	RC1(FXTW) Cable Length:1m
RB1LA(FXTW) Cable Length:3m	RC1LA(FXTW) Cable Length:3m



Solid State Switch(3 Wires, with Indicator Light)

Straight Outlet Cable	Angle Outlet Cable
RB2(FXTW) Cable Length:1m	RC2(FXTW) Cable Length:1m
RB2LA(FXTW) Cable Length:3m	RC2LA(FXTW) Cable Length:3m



●RB, RC Switch

Conventional RG1,RG2 switch can be replaced to RB,RC switch.

Comparison with old type

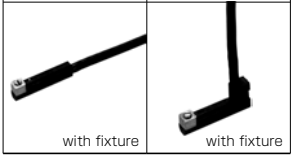
Old type	Equivalent Current Type
RG1	RB1, RC1
	RB2, RC2
RG2	RB4, RC4
	RB5, RC5

Solid State Switch(2 Wires, with Indicator Light)

Straight Outlet Cable	Angle Outlet Cable
RB4(FXTW) Cable Length:1m	RC4(FXTW) Cable Length:1m
RB4LA(FXTW) Cable Length:3m	RC4LA(FXTW) Cable Length:3m

Solid State Switch(3 Wires, with Indicator Light)

Straight Outlet Cable	Angle Outlet Cable
RB5(FXTW) Cable Length:1m	RC5(FXTW) Cable Length:1m
RB5LA(FXTW) Cable Length:3m	RC5LA(FXTW) Cable Length:3m



PRODUCT MASS

●Cylinder

Unit: g

Model	Stroke (mm)					Magnet Additional Mass (FXTWS)
	30	45	60	80	100	
FXTW 8	196	231	266	—	—	2
FXTW10	390	405	420	—	—	3
FXTW15	857	880	903	933	963	6
FXTW20	1230	1378	1533	1736	1939	7

NOTE: SD, GT are both the same mass.

●Switch

Unit: g

Switch Type	Mass
RB1, RB2, RB4, RB5	15
RC1, RC2, RC4, RC5	
RB1LA, RB2LA, RB4LA, RB5LA	35
RC1LA, RC2LA, RC4LA, RC5LA	

METHOD TO CALCULATE THE MASS

Ex. FXTWS−SD8−30−RB12LA

Basic Mass····· 196g
Additional Mass····· 2g
Switch····· 35×2=70g

196+2+35×2=268g

THEORETICAL THRUST

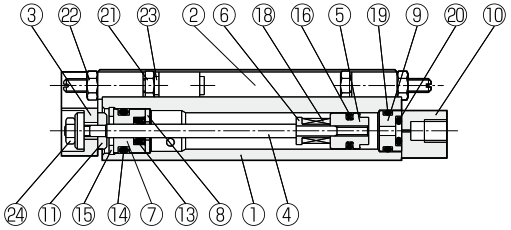
Unit: N

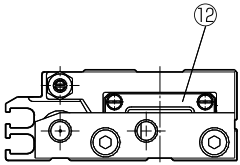
Bore Size (mm)	Working Direction	Operating Pressure MPa					
		0.2	0.3	0.4	0.5	0.6	0.7
φ 8	Push	10	15	20	25	30	35
	Pull	8.5	13	17	22	26	30
φ10	Push	16	24	31	39	47	55
	Pull	13	20	26	33	40	46
φ15	Push	35	53	71	88	106	123
	Pull	25	38	51	63	76	88
φ20	Push	63	94	126	157	188	220
	Pull	47	71	94	118	141	165

1MPa=10.2kgf/cm²
1N=0.102kgf

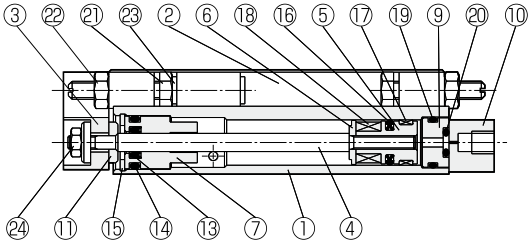
STRUCTURE AND PRINCIPAL COMPONENTS

FXTW8

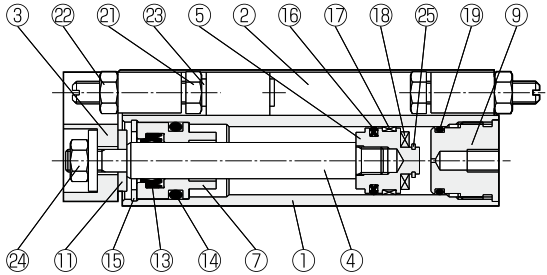




FXTW10



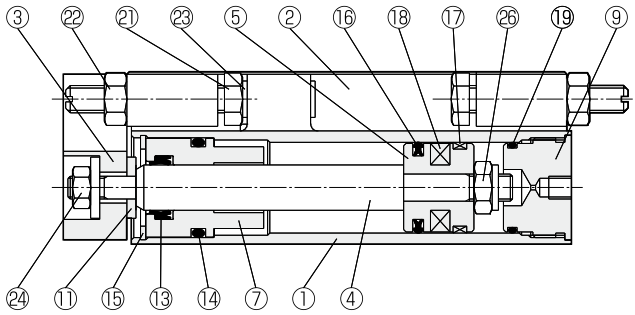
FXTW15



No.	Name	Material	Remarks
1	Body	Aluminum Alloy	Alumite
2	Table	Aluminum Alloy	Alumite
3	End Plate	Aluminum Alloy	Alumite
4	Rod	Stainless Steel	Gabon Steel for φ15
5	Piston	Aluminum Alloy	
6	Piston B	Stainless Steel	
7	Rod Cover	Aluminum Alloy	
8	Rod Seal Bush	Aluminum Alloy	
9	End Cover	Aluminum Alloy	Alumite
10	Piping Block	Aluminum Alloy	Alumite
11	Plate Washer	Stainless Steel	
12	Linear Guide	Stainless Steel	
13	Rod Seal	NBR	
14	O-ring	NBR	
15	Circlip	Steel	Nickel Plating
16	Piston Seal	NBR	
17	Wear Ring	Resin	
18	Magnet	Magnetic Material	
19	O-ring	NBR	
20	O-ring	NBR	
21	Adjust Bolt	Stainless Steel	
22	Lock Nut	Steel	Nickel Plating
23	Cushoning Rubber	Urethane Rubber	
24	Nut	Steel	Nickel Plating
25	Snap Ring	Steel	
26	U Nut	Steel	

Note: Part of copper type is not used.

FXTW20



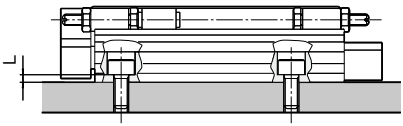
These components cannot be disassembled.

⚠ Caution

Conventional function will be lost if disassembled.

BODY INSTALLATION

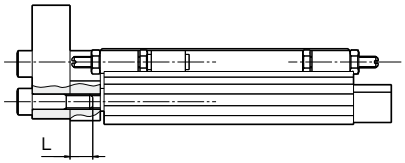
Top Mounting(Thru Hole used)



Model	Bolt Size	Thru Hole Length L(mm)	Fastening Torque N·m
FXTW 8	M4	2	2.5
FXTW10	M4	4	2.5
FXTW15	M5	6.5	5.1
FXTW20	M6	5	8.6

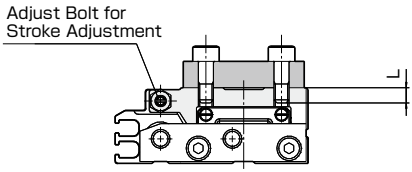
MOUNTING ON TABLE

Front Mounting



Model	Bolt Size	Screw Depth L(mm)	Fastening Torque N·m
FXTW 8	M4×0.7	6	2.5
FXTW10	M4×0.7	8	2.5
FXTW15	M5×0.8	10	5.1
FXTW20	M6×1	12	8.6

Top Mounting



Model	Bolt Size	Screw Depth L(mm)	Fastening Torque N·m
FXTW 8	M4×0.7	4	2.5
FXTW10	M4×0.7	4	2.5
FXTW15	M5×0.8	6	5.1
FXTW20	M6×1	10	8.6

Note: Mounting the load in such a way that the adjustment bolt is covered may make it difficult to adjust the stroke. Ensure that it is not covered.

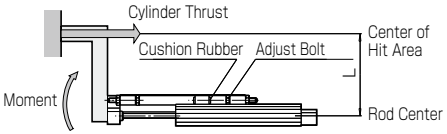
PRECAUTIONS FOR DESIGN AND USE

⚠ Caution

Moment due to Cylinder Thrust in Offset Pushing

If the mounted load or workpiece is pushed with its center offset from the linear guide in the middle of a stroke as shown in the figure below, a large moment is generated due to the thrust of the cylinder itself.
Stationary Moment Value ☞page 703

●Pitching Moment



Moment = Cylinder Thrust x L (Offset)

Accuracy of Assembly Dimensions

When high accuracy of assembly dimensions of the product is required, use the following products.
PICO TABLE(PPT) ☞39 page
PICO UNIT(PPU) ☞313 page
PICO SLIDER(PSL, PSU) ☞447, 479 page

Rigidity of Mounting (Securing Part)

Insufficient rigidity of the body securing method and mounting may hinder realization of the high rigidity and high accuracy of the flat table.
When designing, give sufficient consideration to the rigidity of equipment such as the mounting plate.

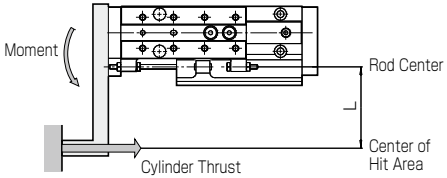
External Force

If any external force is applied to the table, ensure that it is applied to the center of the linear guide as much as possible. If the external force is applied at an offset point, check the allowable moment value.
Center of Linear Guide ☞page 702
Allowable Moment ☞page 702

Linear Guide Lubrication

Lubricant is enclosed in the linear guide in advance but the performance will be deteriorated by a long operating time, operating conditions, environment, etc. Regular lubrication is necessary. Using without lubrication may accelerate wear of the rolling part or cause earlier end of the service life. The timing of regreasing depends on the operating conditions and environment. As a rule, regrease at intervals of travel of 100 km or one month. After wiping the old grease off, supply lithium soap-based grease to the linear guide. Supplying a different type of grease may cause malfunction or failure due to lubrication performance degradation or chemical change. Turbine oil can be applied or drop-fed for use. Do not use spindle oil or machine oil because they adversely affect the packing.

●Yawing Moment



Mounting Surface Accuracy

Ensure that the mating mounting surface of a machine, equipment, jig, etc. is a flat surface machined to high precision without unevenness or projections and mounting is correct in order to achieve stable, high-accuracy linear motion.
Low mounting surface accuracy or incorrect mounting may cause looseness, increase the rolling resistance or adversely affect the service life.

Mounting of Load on Table Top Side

Mounting the load in such a way that the adjustment bolt integrated in the table is covered makes it difficult to adjust the stroke. Ensure that the adjustment bolt is not covered. ☞page 700

Positioning Holes

The positioning holes are intended for ensuring the repeatability of the mounting positions. Accordingly, the positioning holes in the table top side and the body bottom side do not necessarily share the same centers.

Rolling Feel in Linear Guide

When the table is moved by hand, rolling of balls inside the linear guide may cause slight feel of operation discontinuity or difference in the rolling resistance between products. This is due to preload of the linear guide and does not affect the performance.

Positioning Pin Holes in Table and Body

Press-fitting a pin into a positioning pin hole may cause failure due to deformation of or damage to the rolling surface of the linear guide or excessive load applied during press-fitting. Ensure that the fit allows for a clearance between the hole and the pin (clearance fit: tolerance class position g max.).

■ALLOWABLE LOAD MASS AND ALLOWABLE LOAD AND ALLOWABLE MOMENT

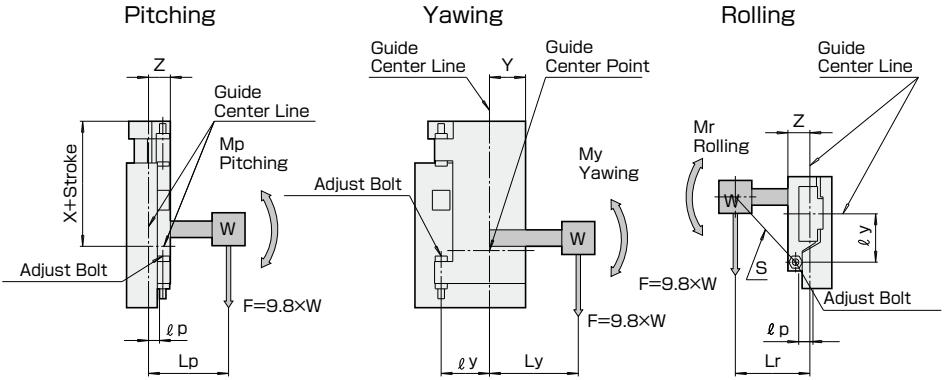
⚠ Caution

Make sure that the load applied is within the allowable range before use.
Use in operating conditions beyond the allowable values may adversely affect operation, accuracy and/or service life, possibly leading to breakdown.

Types of Load	Situation of Actuator	Situation of Load	Item to be confirmed
Mounted Load(W)	Operating	Continuously Acting	Basic Static Rated Load, Static Rated Moment, Allowable Inertia Mass
External Force	Stopping	Temporarily Acting	Basic Static-load Rating, Allowable Static Moment

■Directions of the Moment and the Positions of the Guide Center Line and the Adjust Bolt

The moment directions are classified into three types in accordance with the mounting condition of a load to the actuator.



POSITION OF THE GUIDE AND ADJUST BOLT Unit: m

Model	Guide Center Line Positions			Distance Between the Center Line of The Guide and that of A Adjust Bolt	
	X	Y	Z	ℓp	ℓy
FXTW 8	0.027	0.017	0.010	0.007	0.022
FXTW10	0.034	0.020	0.011	0.007	0.027
FXTW15	0.039	0.025	0.015	0.010	0.033
FXTW20	0.051	0.037	0.021	0.015	0.048

W(kg):Mounted load mass
F(N):Gravity applied on load
Lp,Ly,Lr(m):Distance between guide center line and center of gravity of mounted load
ℓp,ℓy(m):Distance between the center line of the guide and adjust bolt
S(m):Distance between center line of a loaded work and adjust bolt

■Allowable mass and Allowable moment in case of a loaded work, Allowable inertia mass

When the actuator is operated with a load mounted. confirm that the following three values are respectively within the allowable range.

①Allowable Load Mass

Unit: kg

Model	FXTW8	FXTW10	FXTW15	FXTW20
Allowable Load Mass	1.5	2.0	4.0	8.0

②Allowable Loaded Work Moment

The moment in each direction generated by the gravity acting on a loaded work is calculated by the formulas below. These calculated values shall not exceed the allowable looded work moment.

(Mounted load moment)
=(Gravity applied on load:F)×(Distance between guide center line and center of gravity of mounted load:L)
=9.8×(Mounted load mass:W)×(Distance between guide center line and center of gravity of mounted load:L)

(Gravity applied on load: F)=9.8×(Mounted load mass: W)

Pitching···Mp(N·m)=9.8×W(kg)×Lp(m)
Yawning···My(N·m)=9.8×W(kg)×Ly(m)
Rolling···Mr(N·m)=9.8×W(kg)×Lr(m)

Allowable Loaded Work Moment Unit: N·m

Model	Allowable Loaded Work Moment (N·m)		
	Mp	My	Mr
FXTW 8	0.45	0.45	1.3
FXTW10	0.79	0.88	2.1
FXTW15	1.6	1.7	4.5
FXTW20	3.6	3.4	13

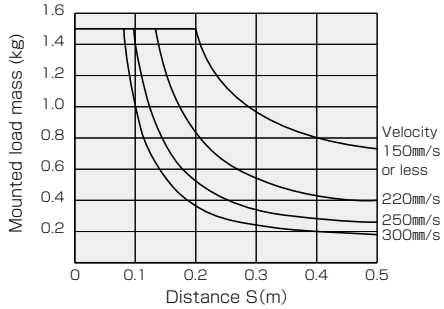
1N·m=0.102kgf·m

③Allowable Inertia Mass

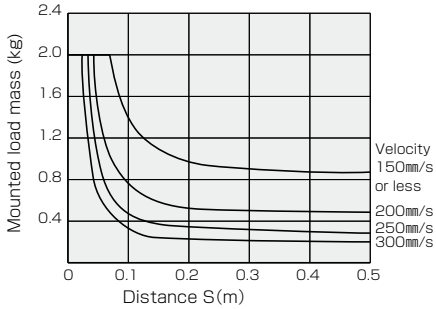
When the adjust bolt runs against the stopper support of the body and the actuator stops, a force is generated due to the inertia of the loaded work. The value of the force varies depnding on the shape of loaded work. mounting method. mounting position. working pressure. and various other conditions. It is, therefore. very difficult to obtain uniform allowable values.

Here, the relation among "collision speed contact with a adjust bolt". "mass of loaded work" and "distance between the center of gravity of loaded work and adjust bolt position" are theoretically calculated as shown in the graph below. Refer to this as a criterion for judging the allowable values of a loaded work. The distance S is the distance between the center of gravity of the loaded work and the adjust bolt. Refer to the figure of rolling under the title of "Direction of moment and center line position of guide and adjust bolt" on previous page.

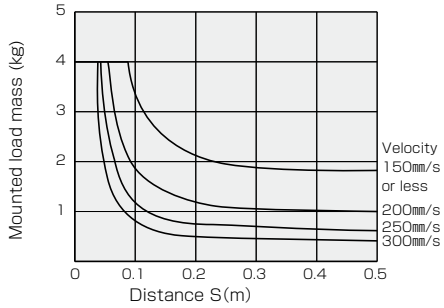
FXTW8



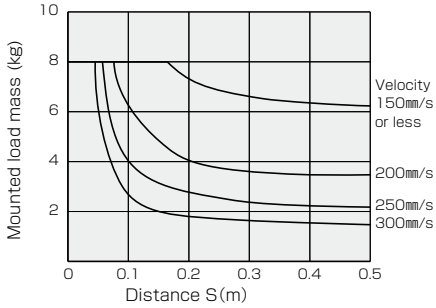
FXTW10



FXTW15



FXTW20



NOTE: When stopping the actuator using a external metal stopper a very large shock force is generated.
Determine allowable load mass to be a value of about 1/5～1/10 of the loaded mass shown in the above graphs.

■Allowable Load and Allowable Moment in case of an External Force(While not Operating)

When an external force is applied temporarily with the actuator stopped at the stroke end and the like, confirm that the following two values are respectively within the allowable range.

①Exernal Force Value (basic static rated load)

Note: The arm length of a monent shall be obtained as a distance from the guide center and the point where an external force is applied.

If an external force is frequently applied,apply the external force to the guide senter point.
If an external force is frequently applied to positions other than the guide center point or the actuator is operated with an external force applied, refer to the section "Allowable mass and allowable moment in case of a loaded work" on the previous page to determine the load mass.

②External Force Moment (static rated moment)

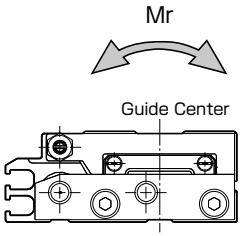
Basic Static Rated Lood, Static Rated Moment

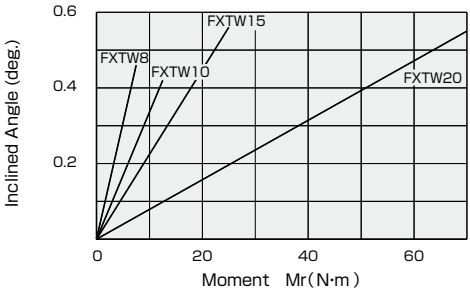
Model	Basic Static Rated load N	Static Rated Moment N·m		
		Mp_o	My_o	Mr_o
FXTW 8	220	2.7	2.7	7.6
FXTW10	270	4.4	4.8	11.6
FXTW15	430	8.6	9.3	23.8
FXTW20	690	17.7	19.1	68.6

1N=0.102kgf
1N·m=0.102kgf·m

INCLINATION OF TABLE BY MOMENT

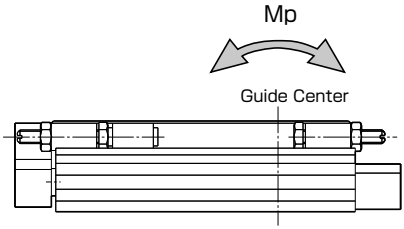
■Rolling



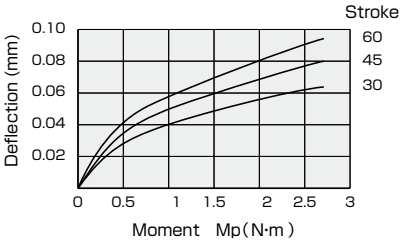


DEFLECTION AT THE TABLE END BY MOMENT

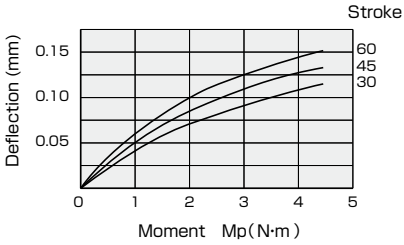
■Pitching



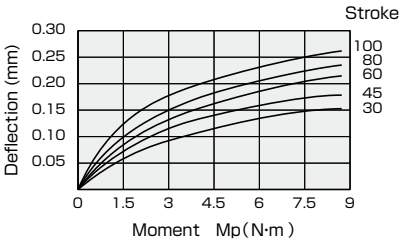
FXTW8



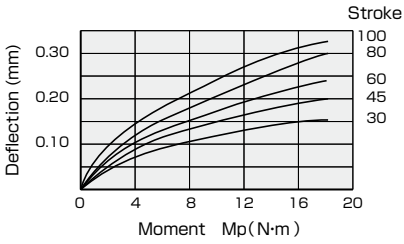
FXTW10



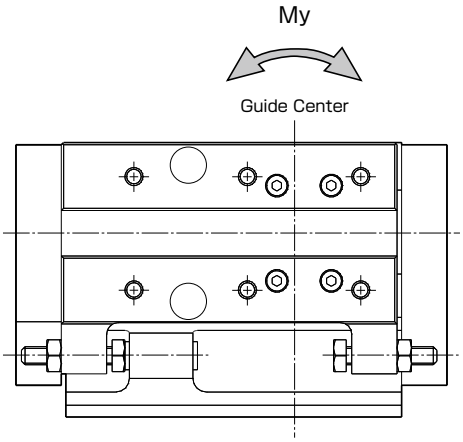
FXTW15



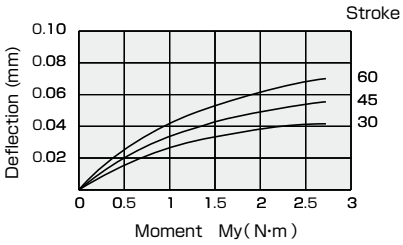
FXTW20



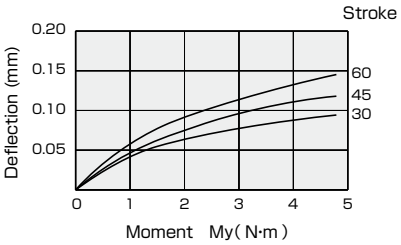
■Yawing



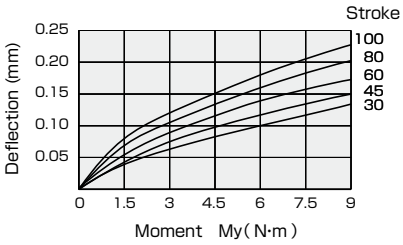
FXTW8



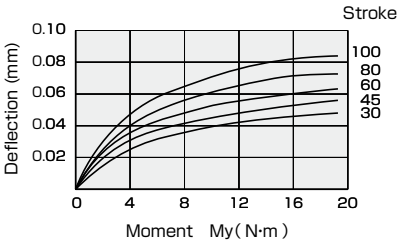
FXTW10



FXTW15



FXTW20



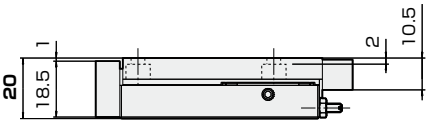
DIMENSIONS(mm) FXTW8−30 BASIC

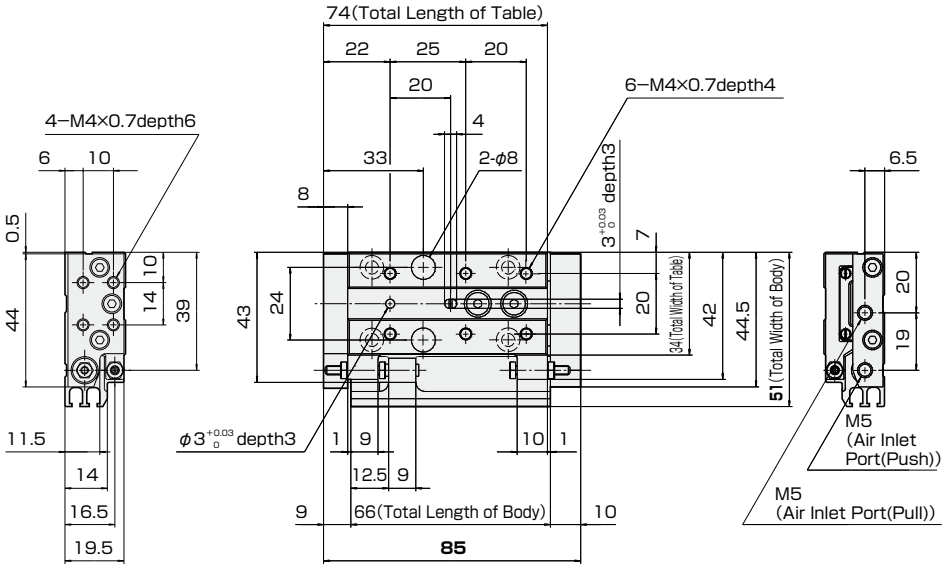
FXTW(S)−SD8−30

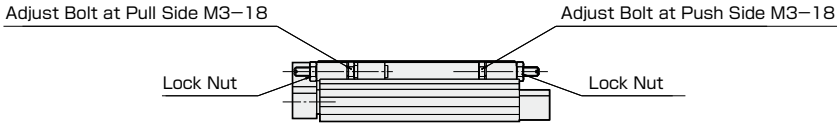
Basic | Stroke

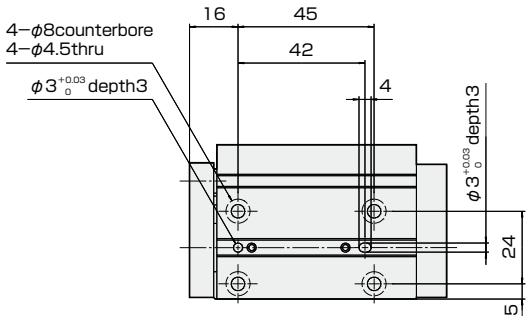
Bore Size

Stroke Adjustment Range
Pull Side·····5mm
Push Side····5mm









FXTW

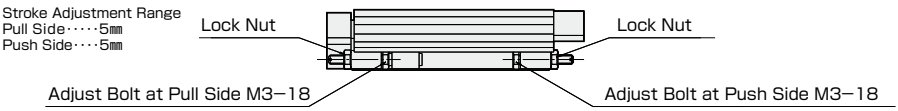
FLAT TABLE

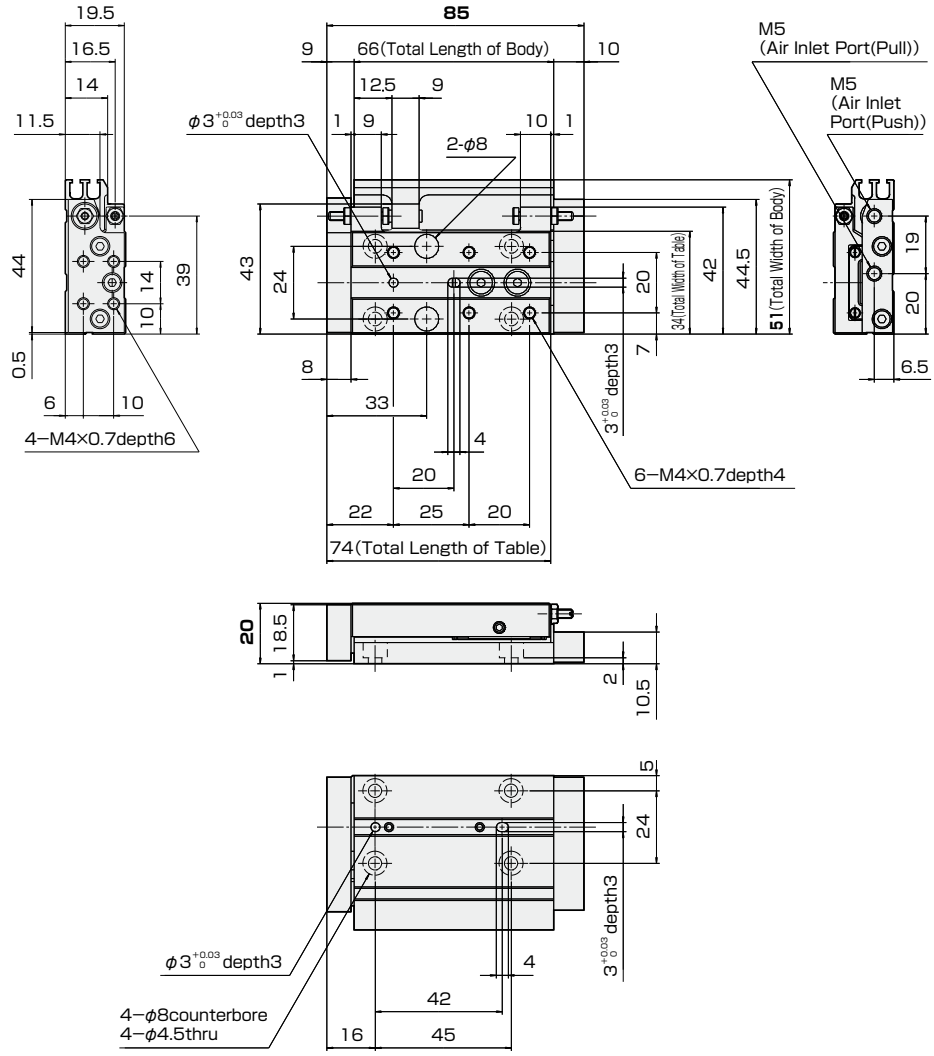
DIMENSIONS(mm) FXTW8−30 SYMMETRIC

FXTW(S)−GT8−30

Symmetric | Stroke

Bore Size





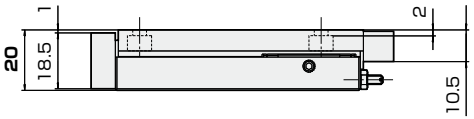
DIMENSIONS(mm) FXTW8−45, 60 BASIC

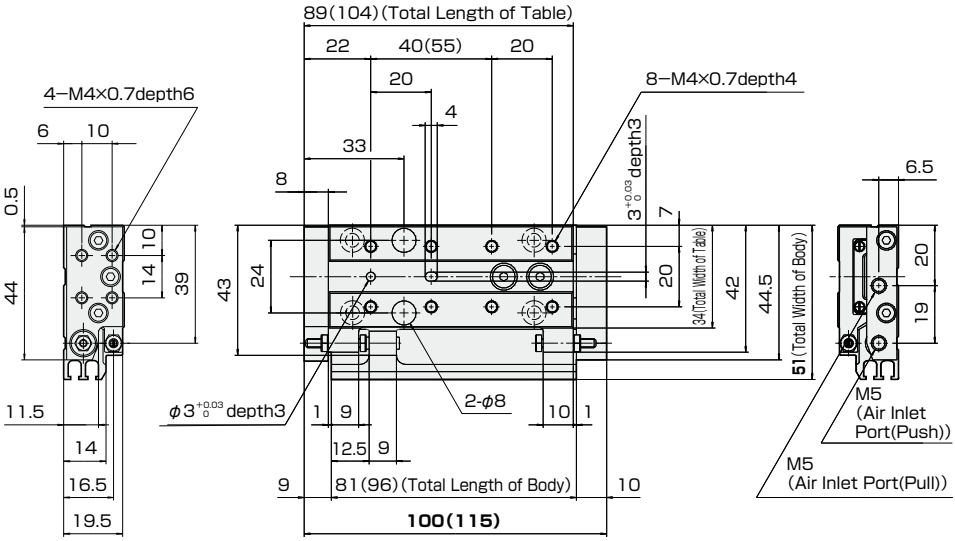
FXTW(S)−SD8−$\frac{45}{60}$

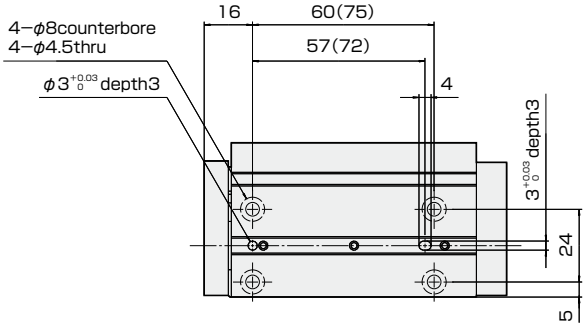
Basic / Bore Size / Stroke

Length in the ( ) is 60 stroke case.

Stroke Adjustment Range
Pull Side·····5㎜
Push Side····5㎜







FXTW

FLAT TABLE

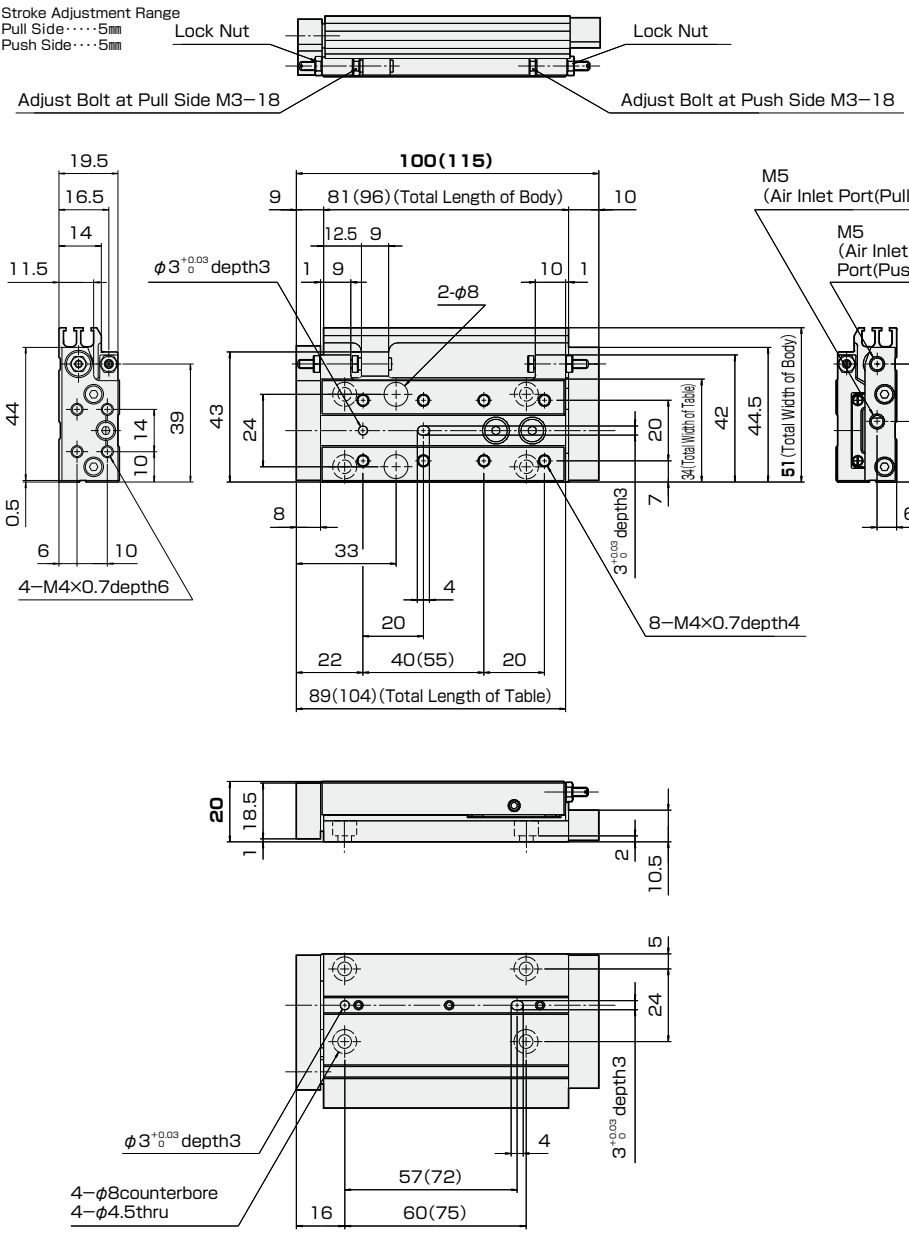
DIMENSIONS(mm) FXTW8−45, 60 SYMMETRIC

FXTW(S)−GT8−$\frac{45}{60}$

Symmetric | Stroke

Bore Size

Length in the ( ) is 60 stroke case.

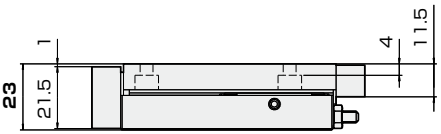


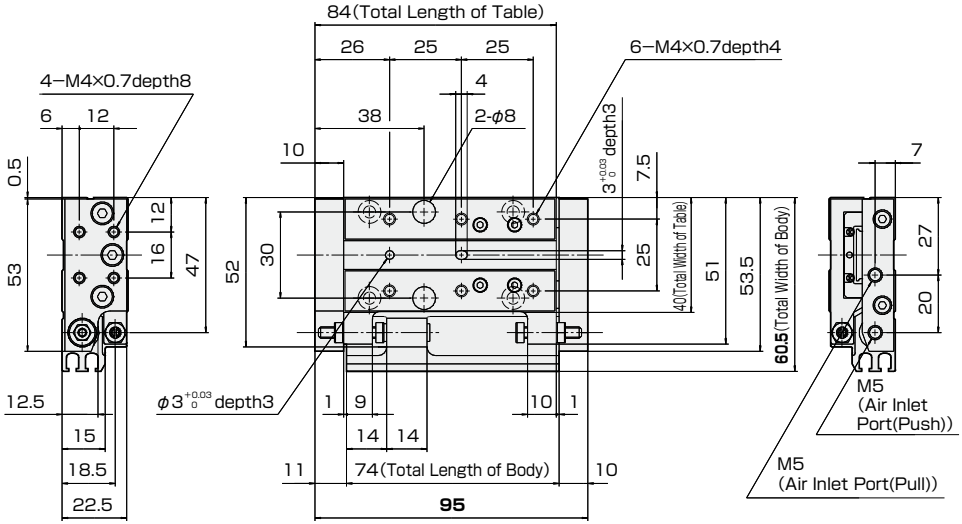
DIMENSIONS(mm) FXTW10–30 BASIC

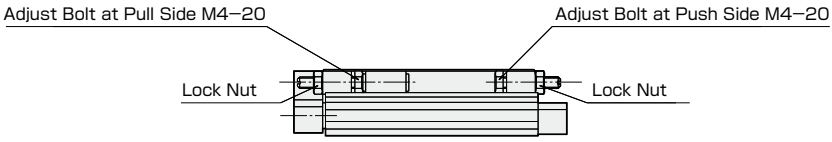
FXTW(S)–SD10–30

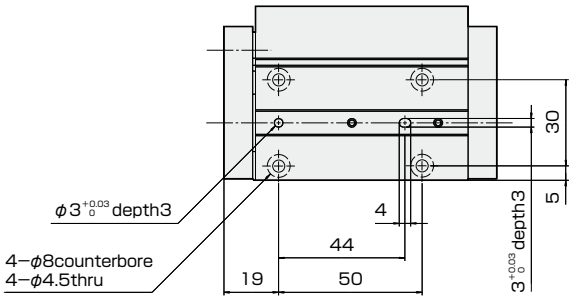
Basic | Bore Size | Stroke

Stroke Adjustment Range
Pull Side·····5㎜
Push Side····5㎜









FXTW

FLAT TABLE

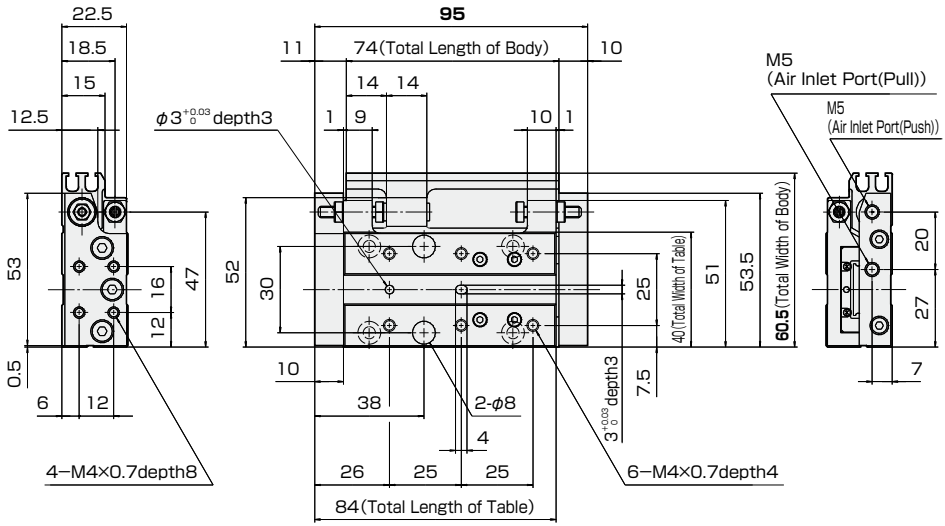
DIMENSIONS(mm) FXTW10−30 SYMMETRIC

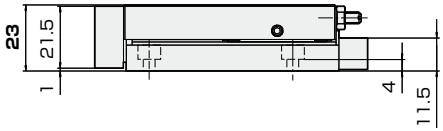
FXTW(S)−GT10−30

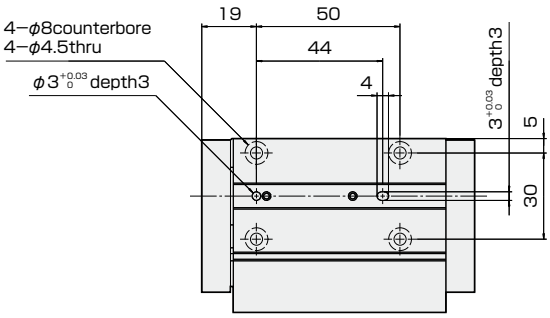
Symmetric | Stroke

Bore Size

Stroke Adjustment Range
Pull Side·····5mm
Push Side····5mm







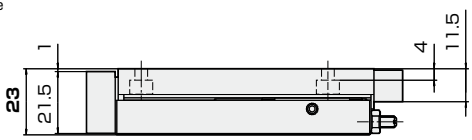
DIMENSIONS (mm)　FXTW10–45, 60　BASIC

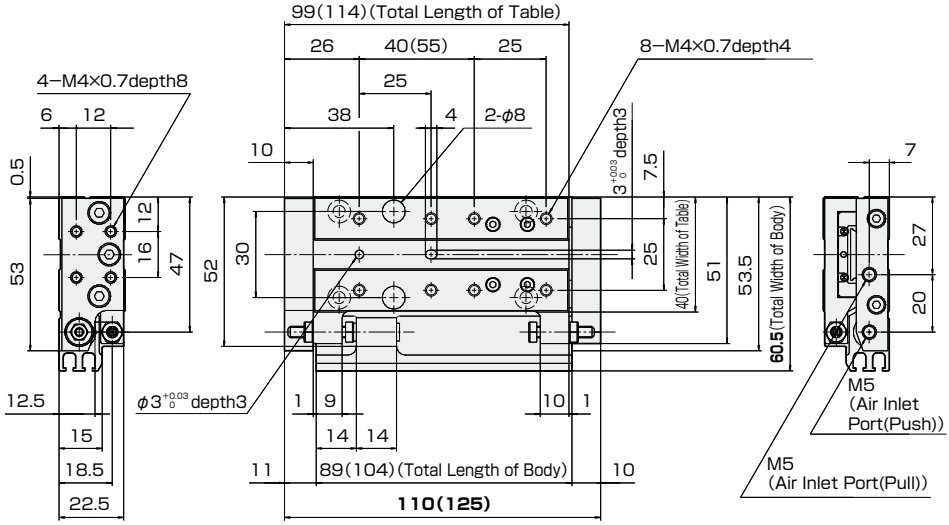
FXTW(S)–SD10–$\frac{45}{60}$

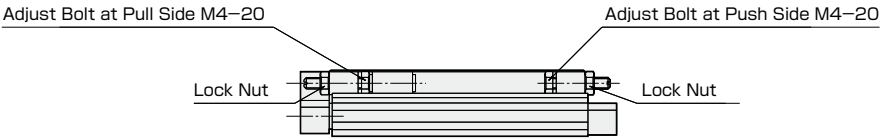
Basic　Bore Size　Stroke

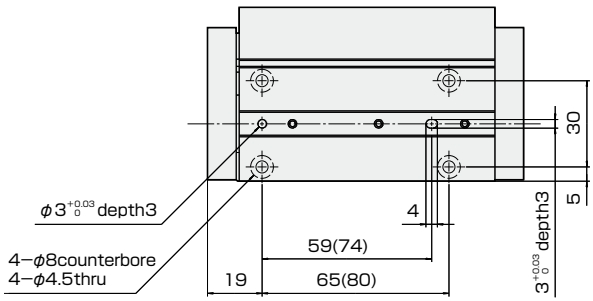
Length in the ( ) is 60 stroke case.

Stroke Adjustment Range
Pull Side·····5mm
Push Side····5mm









FXTW

FLAT TABLE

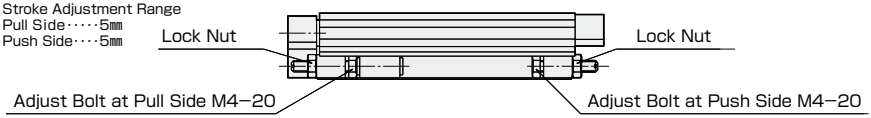
DIMENSIONS(mm) FXTW10−45, 60 SYMMETRIC

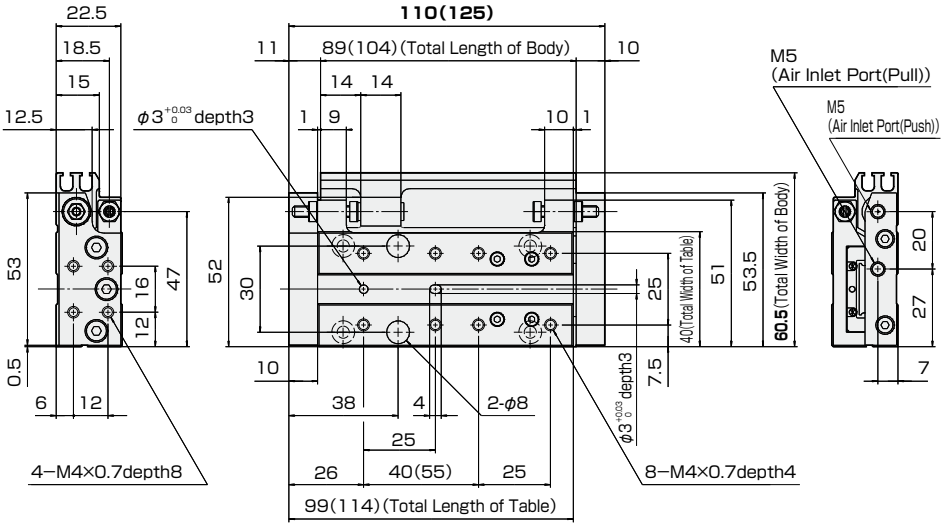
FXTW(S)−GT10−45/60

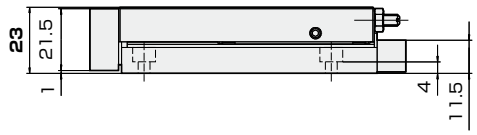
Symmetric | Bore Size | Stroke

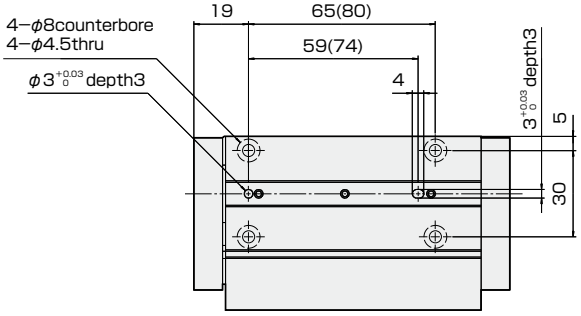
Length in the ( ) is 60 stroke case.

Stroke Adjustment Range
Pull Side·····5mm
Push Side····5mm









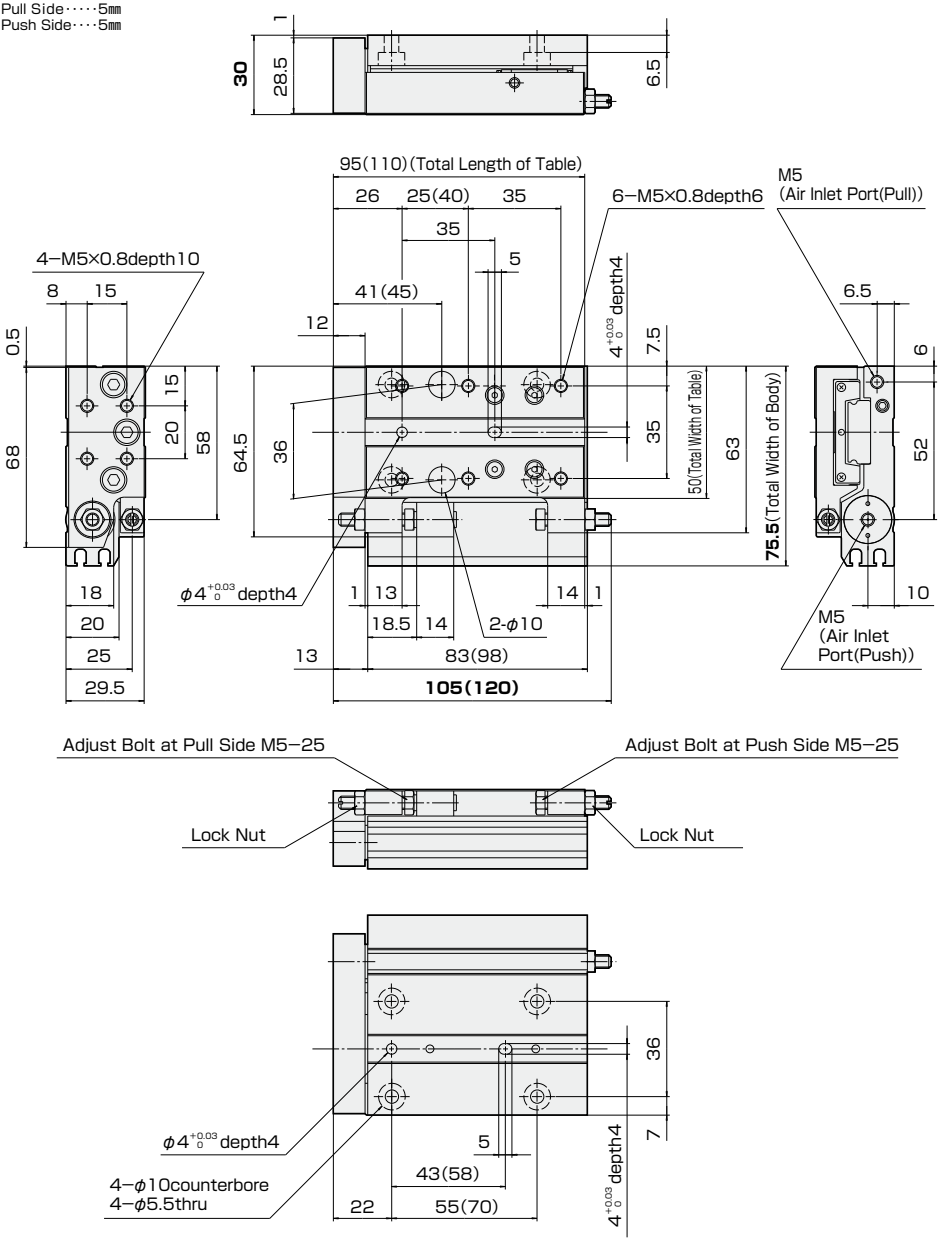
DIMENSIONS (mm)　FXTW15–30, 45　BASIC

FXTW(S)–SD15–$\begin{matrix}30\\45\end{matrix}$

Basic　Bore Size　Stroke

Length in the ( ) is 45 stroke case.

Stroke Adjustment Range
Pull Side·····5mm
Push Side····5mm



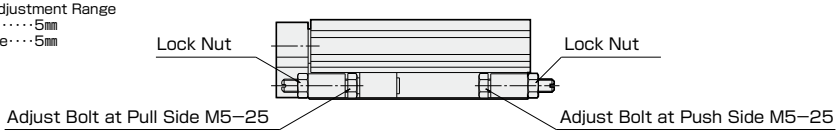
DIMENSIONS(mm) FXTW15−30, 45 SYMMETRIC

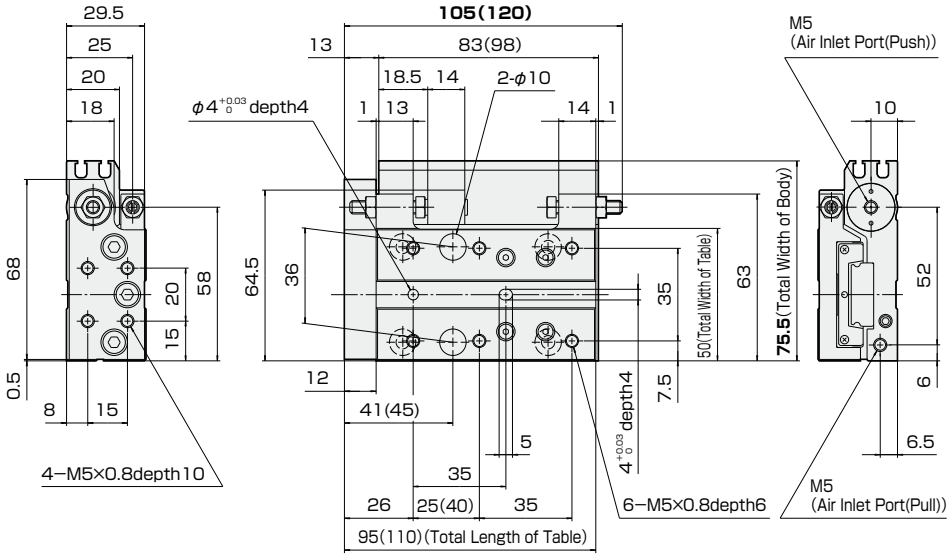
FXTW(S)−GT15−$\begin{matrix}30\\45\end{matrix}$

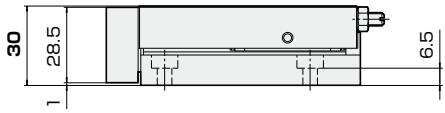
Symmetric / Bore Size / Stroke

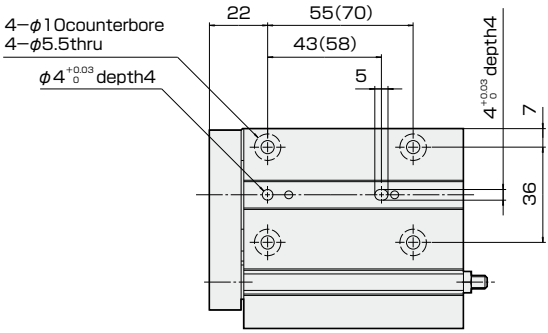
Length in the ( ) is 45 stroke case.

Stroke Adjustment Range
Pull Side·····5㎜
Push Side····5㎜







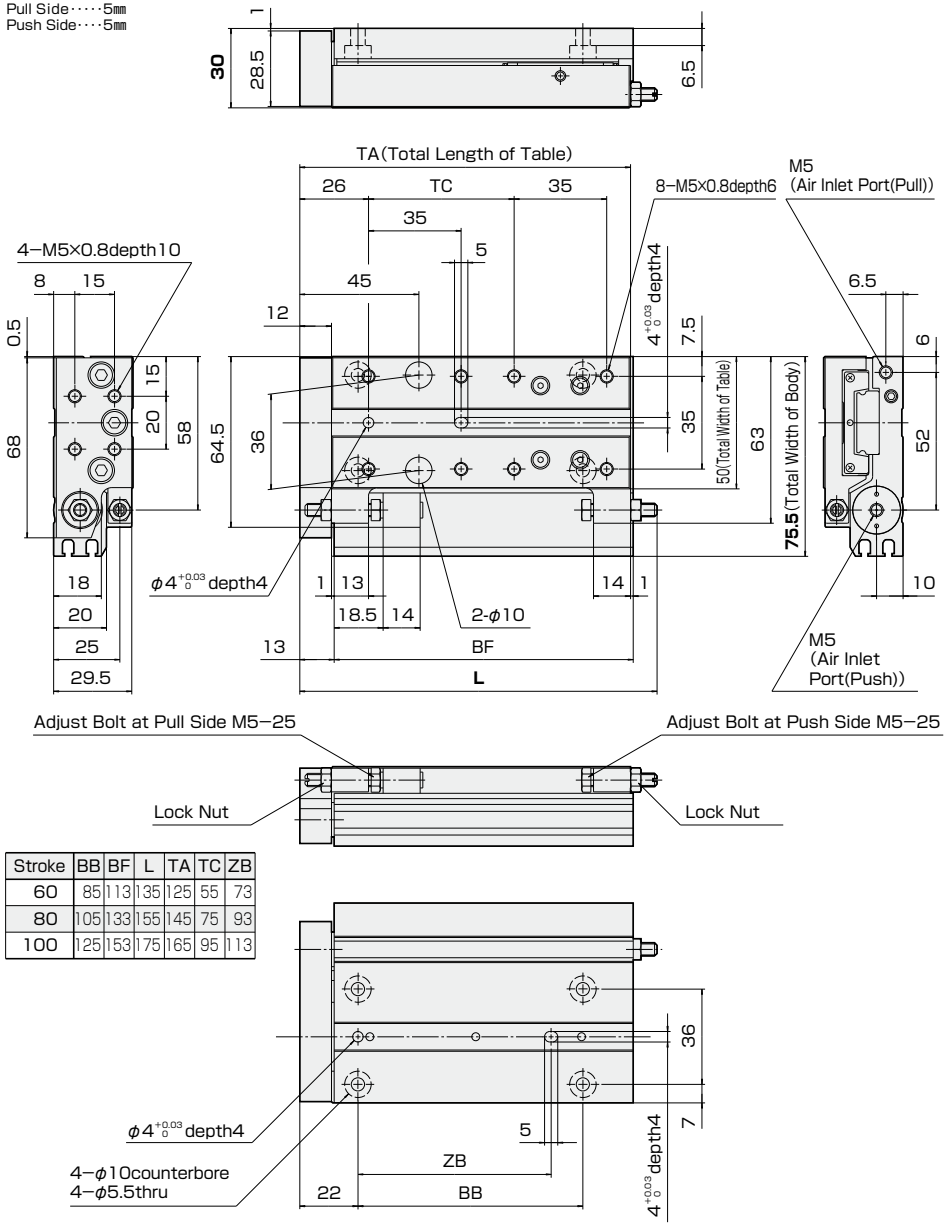


DIMENSIONS(mm)　FXTW15−60, 80, 100　BASIC

FXTW(S)−SD15−
60
80
100

Basic　Bore Size　Stroke

Stroke Adjustment Range
Pull Side·····5mm
Push Side····5mm

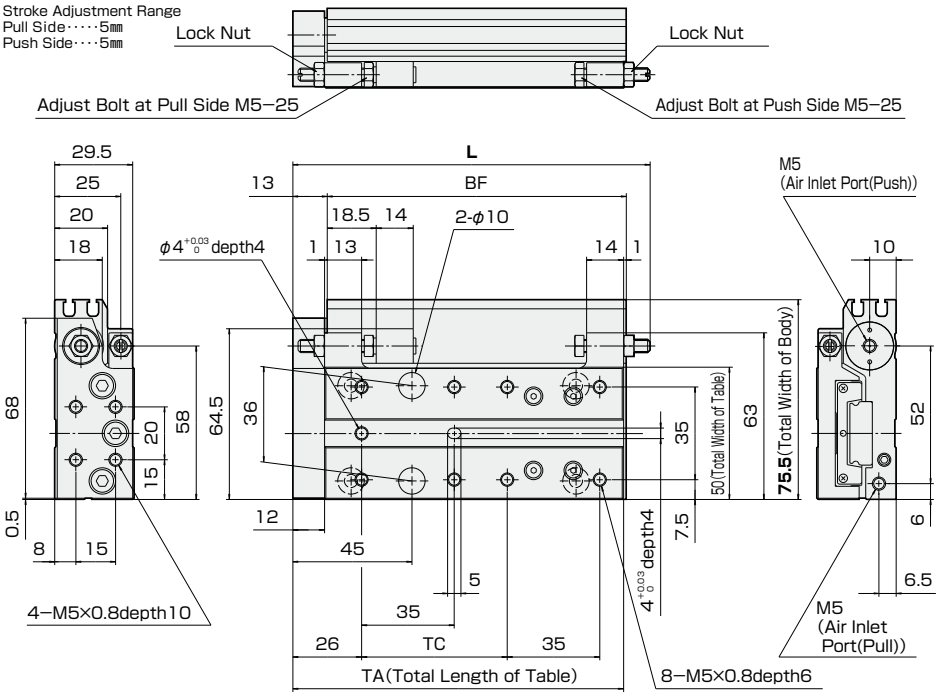


Stroke	BB	BF	L	TA	TC	ZB
60	85	113	135	125	55	73
80	105	133	155	145	75	93
100	125	153	175	165	95	113

DIMENSIONS(mm) FXTW15−60, 80, 100 SYMMETRIC

FXTW(S)−GT15− 60 / 80 / 100

Symmetric — Bore Size — Stroke



Stroke	BB	BF	L	TA	TC	ZB
60	85	113	135	125	55	73
80	105	133	155	145	75	93
100	125	153	175	165	95	113

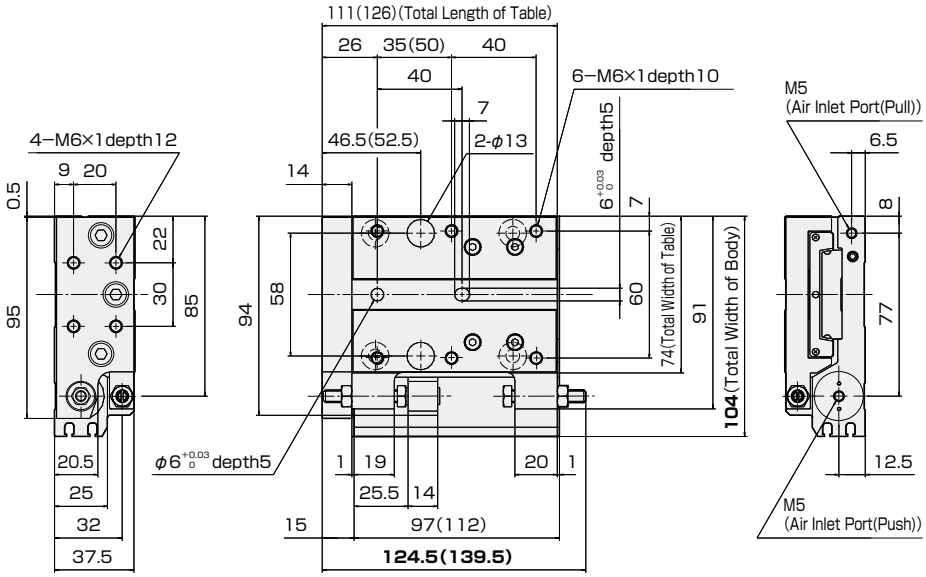
DIMENSIONS (mm) FXTW20–30, 45 BASIC

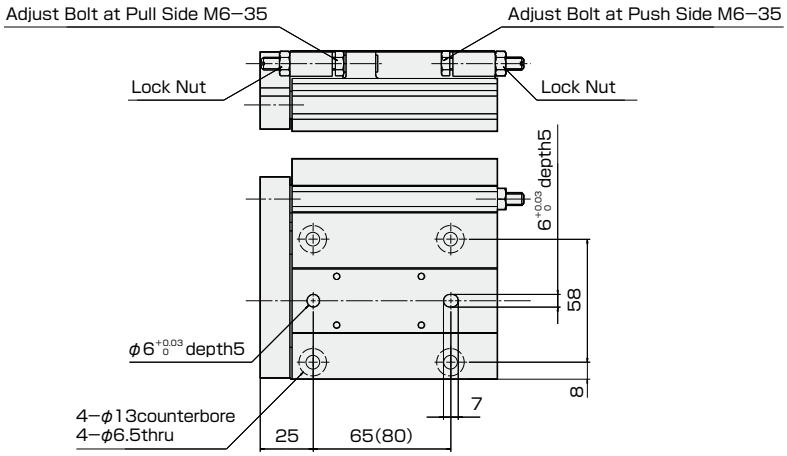
FXTW(S)–SD20–$\frac{30}{45}$

Basic / Bore Size / Stroke

Length in the ( ) is 45 stroke case.

Stroke Adjustment Range
Pull Side·····5mm
Push Side····5mm





FXTW

FLAT TABLE

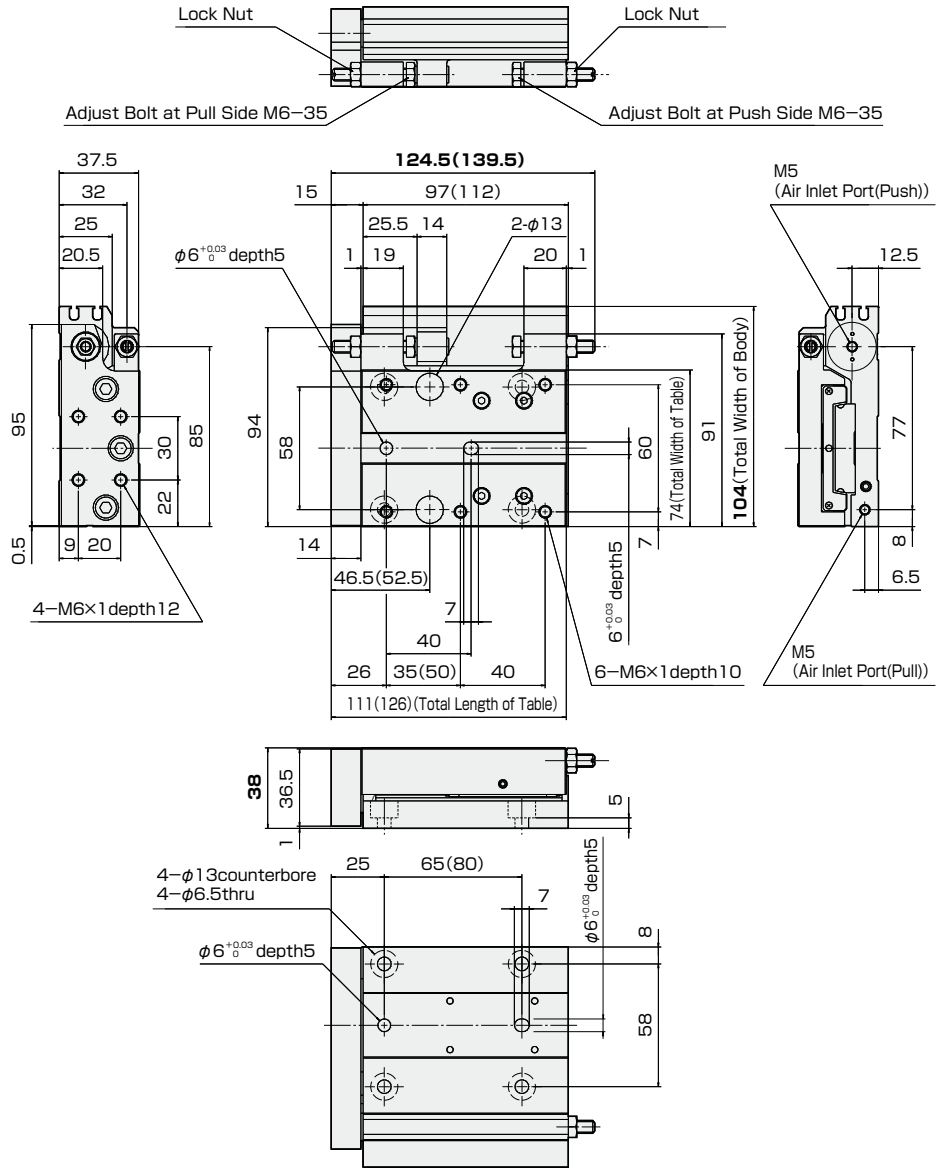
DIMENSIONS(mm) FXTW20−30, 45 SYMMETRIC

FXTW(S)−GT20−$\frac{30}{45}$

Symmetric / Bore Size / Stroke

Length in the ( ) is 45 stroke case.

Stroke Adjustment Range
Pull Side·····5㎜
Push Side····5㎜

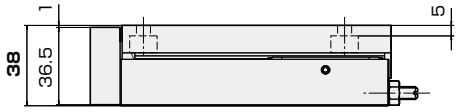


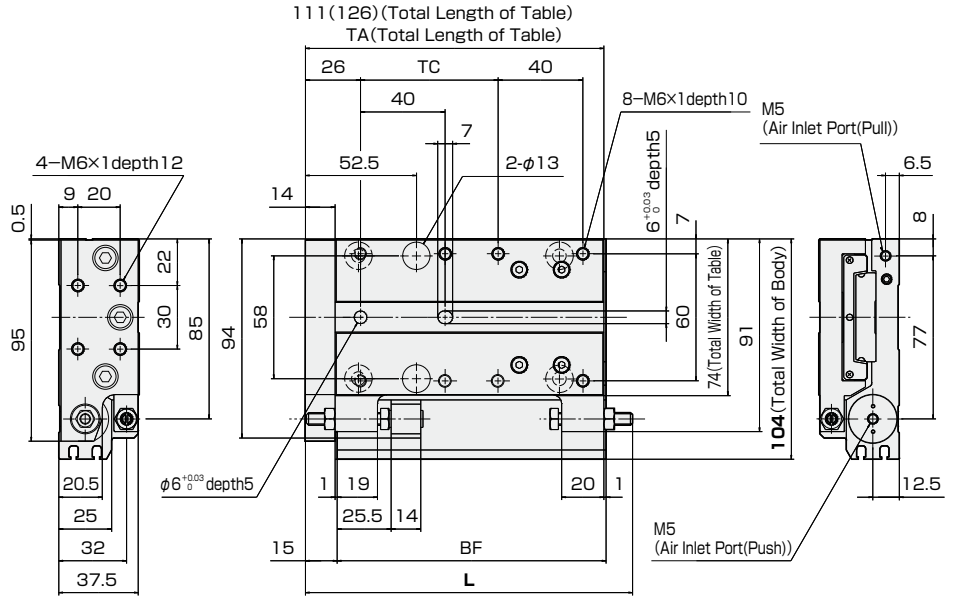
DIMENSIONS(mm)　FXTW20−60, 80, 100　BASIC

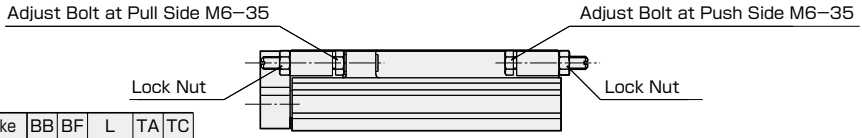
FXTW(S)−SD20− 60 / 80 / 100

Basic　Bore Size　Stroke

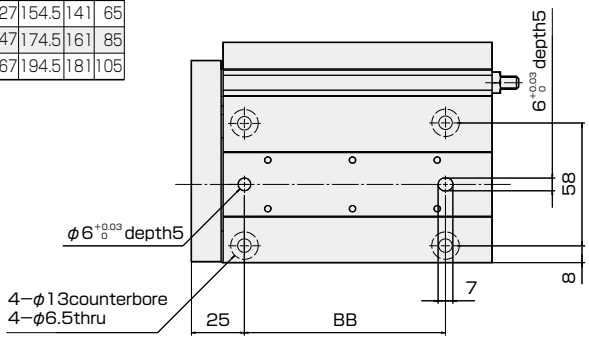
Stroke Adjustment Range
Pull Side·····5㎜
Push Side····5㎜







Stroke	BB	BF	L	TA	TC
60	95	127	154.5	141	65
80	115	147	174.5	161	85
100	135	167	194.5	181	105



DIMENSIONS(mm) FXTW20−60, 80, 100 SYMMETRIC

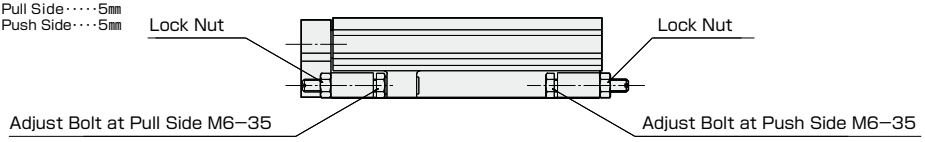
FXTW(S)−GT20− 60 / 80 / 100

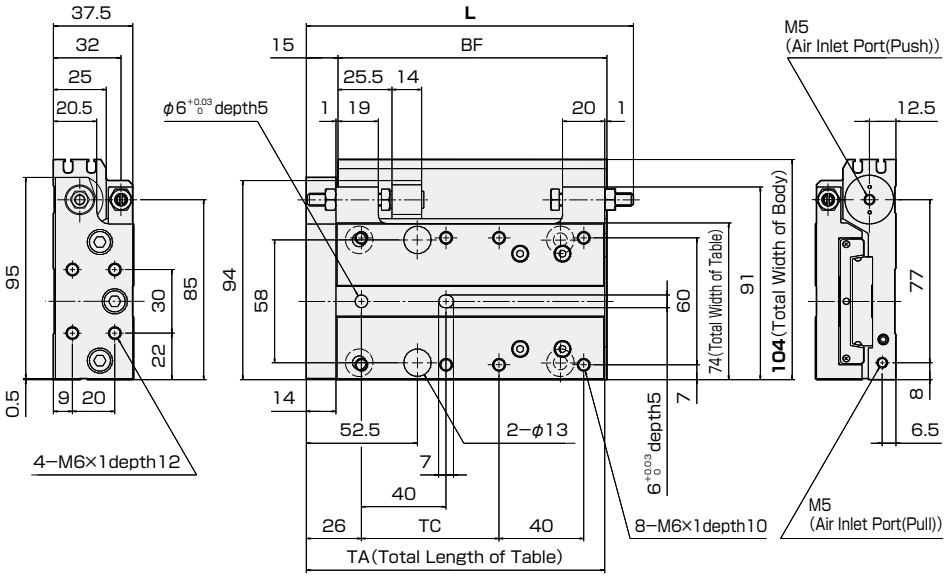
Symmetric

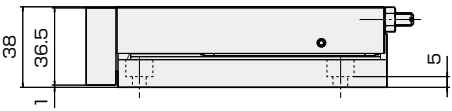
Bore Size

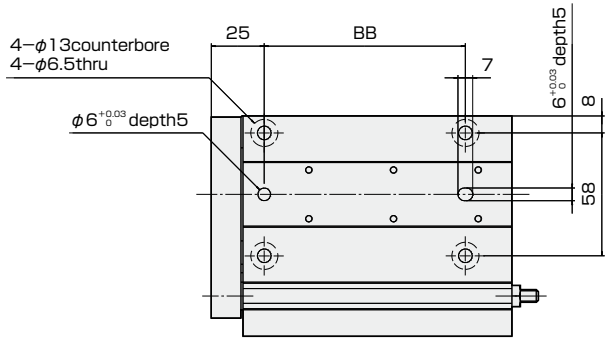
Stroke

Stroke Adjustment Range
Pull Side·····5mm
Push Side····5mm





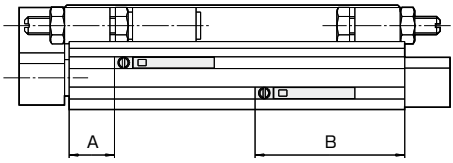




Stroke	BB	BF	L	TA	TC
60	95	127	154.5	141	65
80	115	147	174.5	161	85
100	135	167	194.5	181	105

SWITCH SETTING POSITION

■Setting Position



RB(RC)1, 2 Switch

Unit: mm

Model	Switch Setting Position		On Hold Distance (ℓ)	Hysteresis (c)
	A	B		
FXTW 8	4	31	9	1
FXTW10	12	31	10	
FXTW15	19	32	13	
FXTW20	32	33	12	

RB(RC)4, 5 Switch

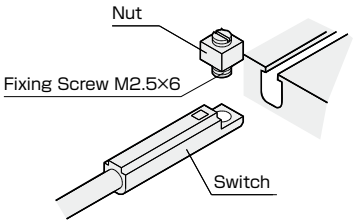
Unit: mm

Model	Switch Setting Position		On Hold Distance (ℓ)	Hysteresis (c)
	A	B		
FXTW 8	6	29	3	1
FXTW10	14	29	3.5	
FXTW15	21	30	4	
FXTW20	34	31	4	

Explanation of hysteresis and on hold distance. ☞see Switch Catalogue

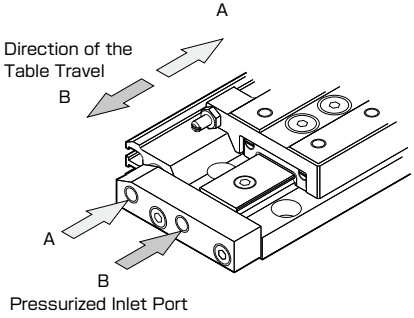
■Switch Installation

Loosen the fixing screw to move the switch along the axis. Adjust the switch to the appropriate position while checking the switch operation using the indicator. Then tighten the screw with 0.3N·m of torque.

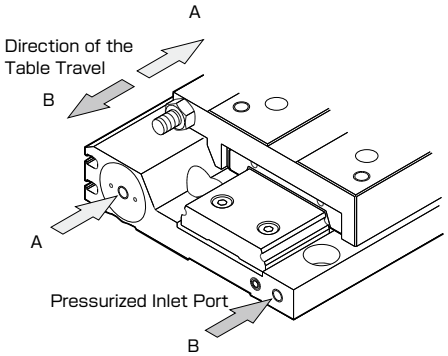


DIRECTION OF MOVEMENT BY PRESSURE PORT

FXTW 8
FXTW10



FXTW15
FXTW20



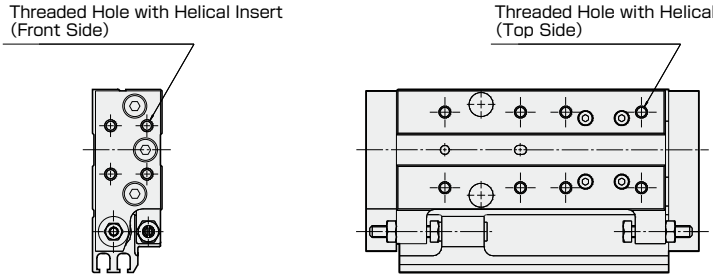
Costom made

Contact us for how to order, time to delivery and detailed specification.

Threaded Hole with Helical Insert·····Model with the threaded holes for mounting a load in the table top side provided with helical inserts.

Note: It is not possible to add helical inserts to an already purchased product.

Helical Insert Material: Stainless Steel



Size of Threaded Hole with Helical Insert

Model	Threaded Hole with Helical Insert	
	Front Side	Top Side
FXTW 8	M4 depth 6	M4 depth4
FXTW10	M4 depth18	M4 depth4
FXTW15	M5 depth10	M5 depth5
FXTW20	M6 depth12	M6 depth9

■To change grease

- ●Change the grease of bearing part to the other grease.
- ●There is a case might not be handled depends on kind of grease or request.
- ●Cylinder part is lithium soap grease or fluorine grease.
- ●Grease of purchased item can not be exchanged.

Please ask us for more detailed infomation.

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