

[Medium Accuracy] Single Axis Actuators LS10

Ball Screw Driven



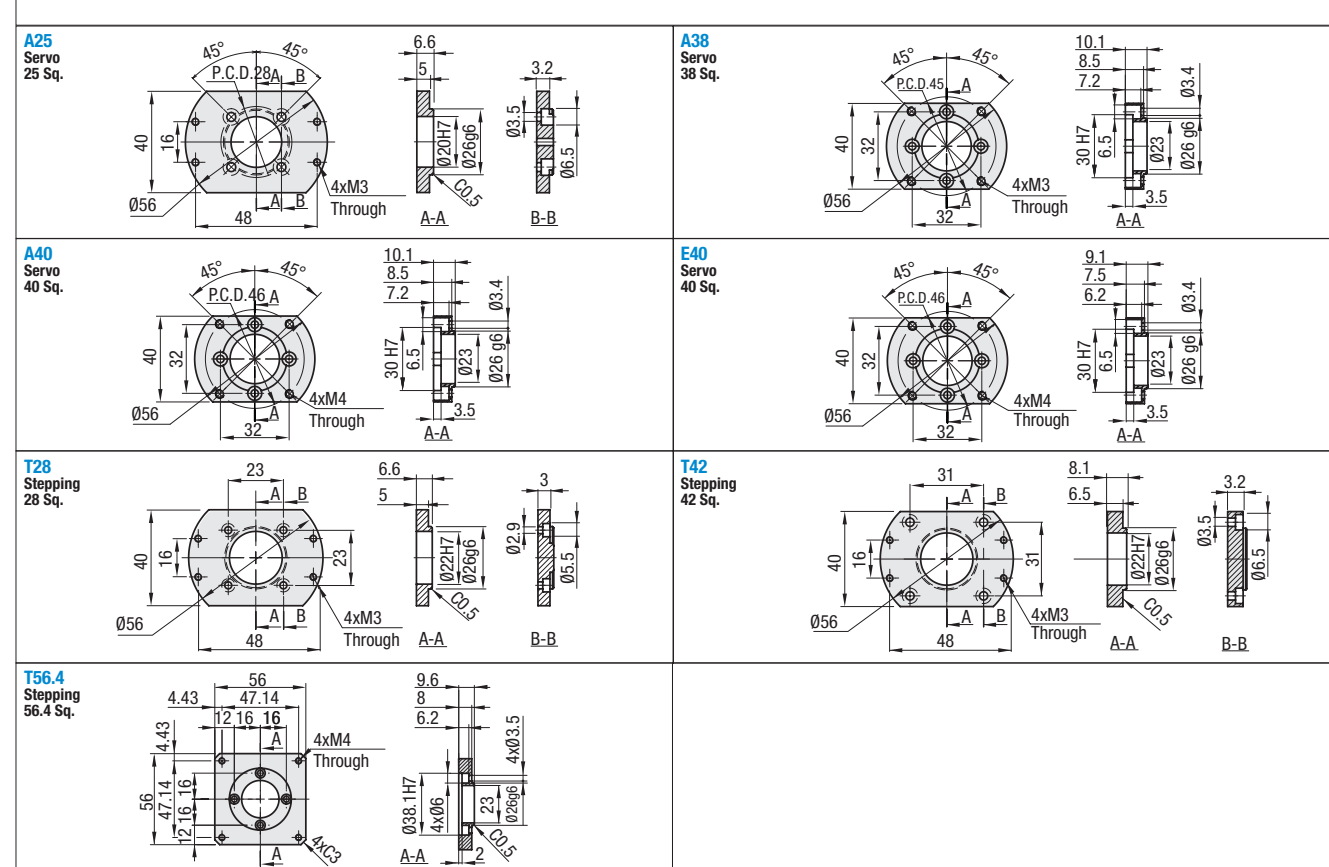
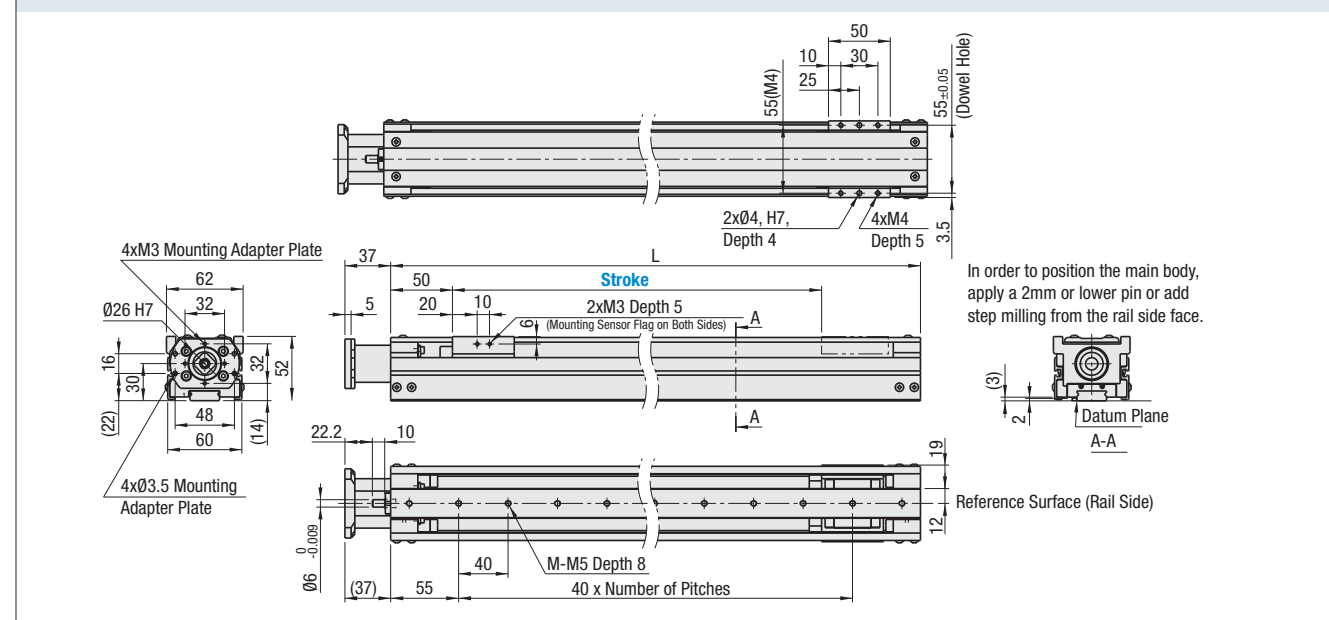
Linear Actuators



Accessory	Material	Surface Treatment	Qty	Note
Adapter Plate	Aluminum Alloy	Black Anodize	1	—
Hex Socket Head Cap Screw M3 x 8	Steel	Black Oxide	4	For fixing Adapter Plate

Ⓢ No accessory is included with No Adapter Plate Type.
Ⓢ The Adapter Plate is not installed yet when being shipped from the factory.

RoHS 10



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Ball Screw Driven, *continued*



Linear Actuators

Part Number	Lead	Stroke (mm)	Motor Adapter Plates	L	Mass (kg)	Number of Holes (N)	Number of Pitches	Base Mounting
LS10	02 04	60	Servo Motor A25 A38 A40 E40	190	1.20	3	2	From the Bottom of Base Rail (Tapped Hole)
		100	Stepping Motor T28, T42, T56.4 No Adapter Plate N	230	1.33	4	3	
		140		270	1.47	5	4	
		220		350	1.73	7	6	
		300		430	2.00	9	8	

Accuracy Standards

Accuracy Standards	Standard Value
Positioning Repeatability (mm)	±0.02
Running Parallelism (mm)	±0.02
Starting Torque (N/cm)	2

Ⓢ The standard values are measured after the rail is mounted. (It is not the value measured before the rails are bolted down.)

Stepping Motor Application Table

Part Number	Flange Size	Manufacturer	Product Number	Type	Recommended Coupling
T28	28 Sq.	Oriental Motor	CSK22	2-Phase	SCXW21 SCPW21 CPDW19
			CSK52	5-Phase	
			ASC3	α-Step	
T42	42 Sq.	Oriental Motor	PK24	2-Phase	
			CSK24	2-Phase	
			RK54	5-Phase	
			RKS54 / PK54	5-Phase	
T56.4	56.4 Sq.	NEMA Standards	NEMA23	α-Step	CPDW19

Ⓢ The NEMA standard is standardized by National Electrical Manufacturers Association in U.S.

Ⓢ Part Number Example: **LS1002 - 300 - A25**

Servo Motor Application Table

Part Number	Flange Size	Manufacturer	Product Number	Wattage	Recommended Coupling
A25	25 Sq.	Yasukawa Electric Corporation	SGMMJ-A1	10 W	SCXW21 SCPW21 CPDW19
			SGMMJ-A2	20 W	
			SGMMJ-A3	30 W	
A38	38 Sq.	Panasonic	MSMD5A	50 W	
			MSME5A	50 W	
			MSMD01	100 W	
A40	40 Sq.	Yasukawa Electric Corporation	SGMJV-A5	50 W	
			SGMAH-A5		
			SGMAS-A5		
		Mitsubishi Electric Corporation	HG-MR053		
			HG-KR053		
			HF-KP053		
Sanyo Denki Co., Ltd.	Q1AA04003D	30 W			
	Q1AA04005D	50 W			
Omron Corporation	R88M-K05030	50 W			
	MV-M05	50 W			
Keyence Corporation	SV-M005	50 W			
	SV-M005	50 W			
E40	40 Sq.	SIEMENS	1FK7011-5	50 W	
			1FK7015-5	100 W	

Ⓢ Product numbers and specifications of motors are subject to change. Please check the manufacturers' information.

Ⓢ Applicable motors and couplings are not limited to the above listed products. Please confirm each mounting dimension.

Ⓢ Part Number Alterations: **LS1002 - 300 - A25 - MP3**

Photo Sensor Types – Set Part Specification

Code	Sensor Type	Sensor	Sensor Type/Qty. Configurable to turn ON or OFF when Light is blocked.	Sensor Flag Mounting		Sensor Mounting		Sensor Bracket Mounting		Note
				Sensor Flag	Sensor Flag Mounting Screw	Sensor Mounting Screw	Bracket	Bracket Mounting Screw	Bracket Mounting Nut	
MP_	Photomicro Sensor	FPMY45	-pc(s)	Dedicated	Hex Socket Head Cap Screw M3 x 6, 2 pcs.	Hex Socket Head Cap Screw M3 x 6, 2 pcs.	Dedicated	Hex Socket Head Cap Screw M3 x 6, 2 pcs.	Hex Nut, 2 pcs.	1 m Cable

Ⓢ The Sensor Qty. is inserted in the "" part (within the range of 1-3 pc(s)). When the stroke amount is 100 or less, however, the upper limit for the Sensor Qty. is 2 pcs.

Proximity Sensor Types – Set Part Specification

Code	Sensor Type	Sensor	Sensor Type/Qty.		Sensor Flag Mounting		Sensor Mounting		Note
			ON When Near	ON When Away	Sensor Flag	Sensor Flag Mounting Screw	Sensor Mounting Screw	Sensor Mounting Nut	
PR_	Proximity Sensor – Two-Wire Type	EX4-T12	-pc(s)	—	Dedicated	Hex Socket Head Cap Screw M3 x 6, 2 pcs.	Pan Head Screw M3 x 10	Hex Nut 1 pc.	1 m Cable
PRO_	Proximity Sensor – Three-Wire Type with N.O. Output	EMX4-T12	-pc(s)	—					
PRC_	Proximity Sensor – Three-Wire Type with N.C. Output	EMX4-T12C	-pc(s)	—					
PRW1_ PRW2_ PRW3_	Proximity Sensor – Three-Wire, Combination Type	—	1 pc.	2 pcs.	1 pc.	1 pc.	1 pc.	1 pc.	1 pc.

Ⓢ The Sensor Qty. is inserted in the "" part (within the range of 1-3 pc(s)). When the stroke amount is 100 or less, however, the upper limit for the Sensor Qty. is 2 pcs.

