

SR03 Rod type

CE compliance Origin on the non-motor side is selectable



Ordering method

SR03

Model	Lead	Model	Brake	Origin position	Bracket plate	Stroke	Cable length
	12: 12mm 06: 6mm	S: Straight model R: Space-saving model (motor installed on right) L: Space-saving model (motor installed on left) U: Space-saving model (motor installed on top)	N: With no brake B: With brake	N: Standard Z: Non-motor side	N: No plate H: With plate V: With flange	50 to 200 (50mm pitch)	1K: 1m 3K: 3m 5K: 5m 10K: 10m

S2

Robot positioner	I/O
S2: TS-S2	NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board

SH

Robot positioner	I/O	Battery
SH: TS-SH	NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board	B: With battery (Absolute) N: None (Incremental)

SD

Robot driver	I/O cable
SD: TS-SD	1: 1m

Note 1. See P.337 for grease gun nozzles.

Note 2. If changing from the origin position at the time of purchase, the machine reference amount must be reset. For details, refer to the manual.

Note 3. The robot cable is flexible and resists bending.

Note 4. See P.600 for DIN rail mounting bracket.

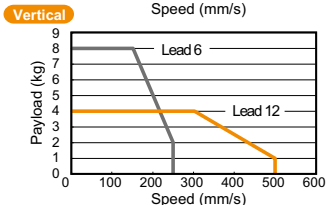
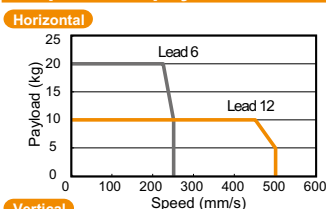
Note 5. Select this selection when using the gateway function.

Basic specifications

Motor	42 □ Step motor
Resolution (Pulse/rotation)	20480
Repeatability (mm)	+/-0.02
Deceleration mechanism	Ball screw $\phi 8$
Ball screw lead (mm)	12 6
Maximum speed (mm/sec)	500 250
Maximum payload (kg)	Horizontal 10 20 Vertical 4 8
Max. pressing force (N)	75 100
Stroke (mm)	50 to 200 (50pitch)
Lost motion	0.1mm or less
Rotating backlash (°)	+/-1.0
Overall length (mm)	Horizontal Stroke+236.5 Vertical Stroke+276.5
Maximum outside dimension of body cross-section (mm)	W48 x H56.5
Cable length (m)	Standard: 1 / Option: 3, 5, 10

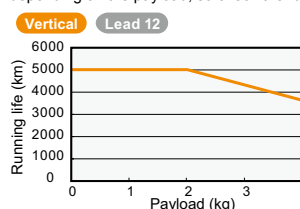
Note 1. The maximum speed needs to be changed in accordance with the payload. See the "Speed vs. payload" graph shown on the right. For details, see P. 336.

Speed vs. payload



Running life

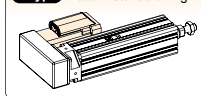
5000 km on models other than shown below. Running life of only the model shown below becomes shorter than 5000 km depending on the payload, so check the running life curve.



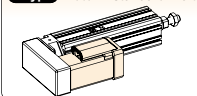
Note. See P.337 for running life distance to life time conversion example.

Motor installation (Space-saving model)

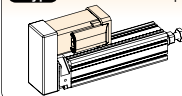
R type Motor installed on right



L type Motor installed on left



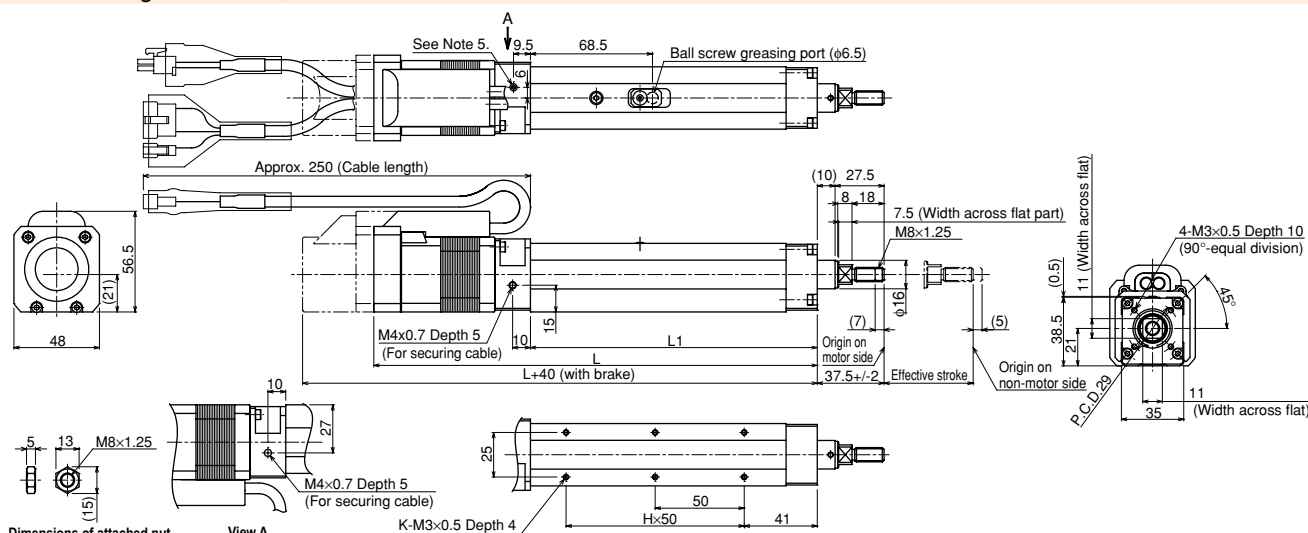
U type Motor installed on top



Controller

Controller	Operation method	Controller	Operation method
TS-S2	I/O point trace / Remote command	TS-SD	Pulse train control
TS-SH			

SR03 Straight model S



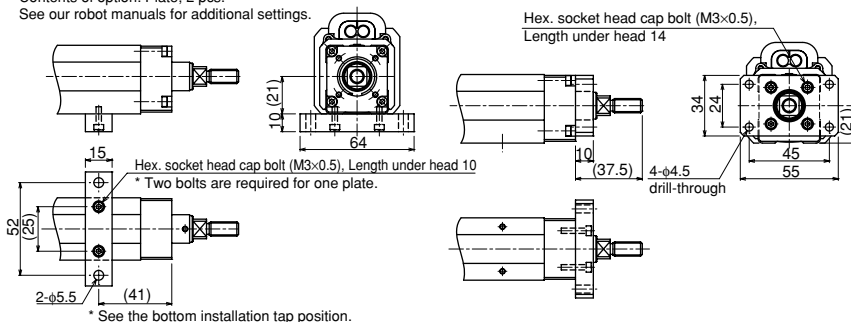
Dimensions of attached nut

View A

Option: Horizontal installation plate (foot)

* Contents of option: Plate, 2 pcs. See our robot manuals for additional settings.

Option: Vertical installation plate (flange)



Effective stroke	50	100	150	200
L1	161	211	261	311
L	249	299	349	399
H	2	3	4	5
K	6	8	10	12
Weight (kg)	1.1	1.3	1.4	1.6

Note 1. It is possible to apply only the axial load. Use the external guide together so that any radial load is not applied to the rod.
Note 2. The orientation of the width across flat part is undefined to the base surface.
Note 3. Use the support guide together to maintain the straightness.
Note 4. When running the cables, secure cables so that any load is not applied to them.
Note 5. Remove the M4 hex. socket head cap set bolts and use them to secure the cables. (Effective screw thread depth 5)
Note 6. The cable's minimum bend radius is R30.
Note 7. Models with a brake will be 0.2kg heavier.
Note 8. Distance to mechanical stopper.