

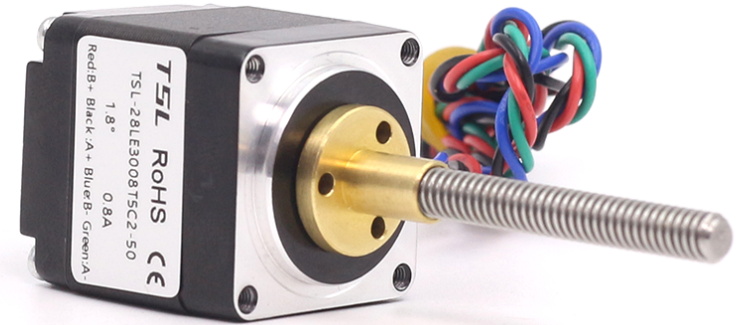
NEMA 11 (28 mm) External Nut Hybrid Linear Stepper Motor

TSL-28LE Series

The TSL-28LE Series combines a 28 mm hybrid stepper motor with an external-nut linear screw mechanism. Standard configurations cover multiple motor lengths, screw diameters, screw leads and screw lengths to support different thrust, speed and travel requirements.

Series Highlights

Frame Size	28.2 x 28.2 mm
Motor Length Options	32 / 40 / 52 mm
Screw Diameter Options	5 / 8 mm
Screw Lead Options	1 / 2 / 4 / 8 / 12 mm
Holding Torque Range	60 - 100 mNm
Rated Current Range	0.67 - 0.95 A
Rated Thrust Range	16 - 90 N



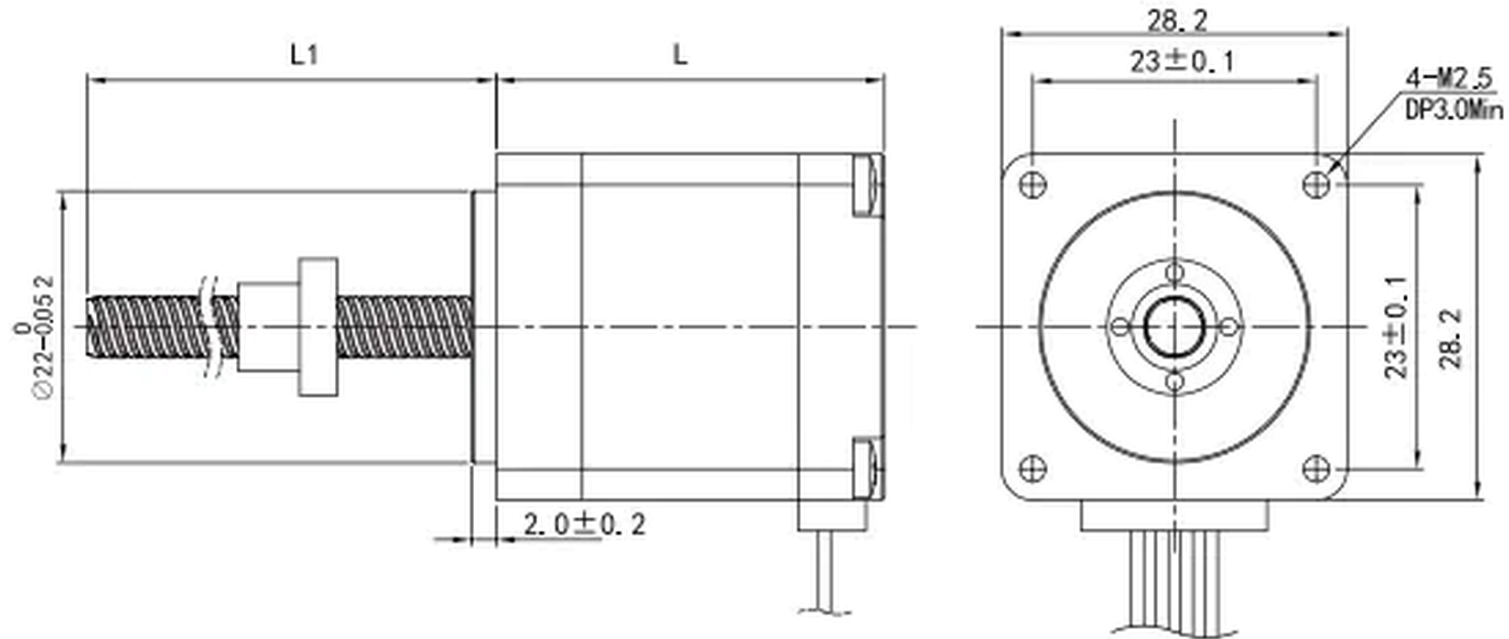
External Nut Linear Stepper Motor

Performance Parameters

Motor Model	Holding Torque mNm	Rated Current A	Motor Length mm	Screw Length mm	Screw Diameter mm	Screw Lead mm	Rated Thrust N	Horizontal Max. Load kg	Vertical Max. Load kg
TSL-28LE3209T8C1-360	65	0.95	32	360	8	1	70	8.0	1.9
TSL-28LE3206T8C2-150	60	0.67	32	150	8	2	40	6.0	1.6
TSL-28LE3209T8C2-360	65	0.95	32	360	8	2	40	6.0	1.6
TSL-28LE3209T8C4-360	65	0.95	32	360	8	4	30	5.5	1.4
TSL-28LE3209T8C8-360	65	0.95	32	360	8	8	20	4.0	0.8
TSL-28LE3209T8C8-410	65	0.95	32	410	8	8	20	4.0	0.8
TSL-28LE3209T8C12-360	65	0.95	32	360	8	12	16	3.0	0.4
TSL-28LE3209T8C12-460	65	0.95	32	460	8	12	16	3.0	0.4
TSL-28LE4007T5C2-65	90	0.7	40	65	5	2	80	8.0	2.0
TSL-28LE4007T5C2-250	90	0.7	40	250	5	2	80	8.0	2.0
TSL-28LE5206T5C2-120	100	0.67	52	120	5	2	90	8.0	2.8
TSL-28LE5209T8C4-150	100	0.9	52	150	8	4	70	7.0	1.8
TSL-28LE5209T8C8-320	100	0.9	52	320	8	8	40	5.0	1.6

Performance parameters are for reference only and can be customized according to customer requirements.

Mechanical Dimensions



Drawing Notes

- L = motor body length.
- $L1$ = screw length.
- Nominal frame size: 28.2×28.2 mm.
- Mounting holes: 4-M2.5, minimum depth 3.0 mm.

Customization Options

The drawing is for reference only. Ball-screw versions, encoder options, and integrated encoder-and-driver solutions are available according to customer requirements.