

[See all 14 Products in Family](#)

50mm Travel, Motorized Linear Actuator, Integrated Controller, Manual Control, Encoder

See More by [Zaber™](#)



Stock #25-177 **1 In Stock**

⊖ 1 ⊕ S\$2,219⁰⁰

ADD TO CART

Volume Pricing	
Qty 1+	S\$2,219.00 each
Need More?	Request Quote

Product Downloads

General

Metric **Type:**

Yes **Encoder:**

Yes **Manual Control/ LED Indicators:**

Zaber Technologies Inc. **Manufacturer:**

Stepper (2 Phase) **Type of Motor:**

Rotary Quadrature Encoder **Encoder Type:**

Physical & Mechanical Properties

Linear (X) **Type of Movement:**

50.8 **Travel (mm):**

55 (Unidirectional) **Accuracy (μm):**

<15 **Backlash (μm):**

162.5 L x 49.4 W x 20.0 H **Dimensions (mm):**

<1 **Repeatability (μm):**

0.000029 to 30 **Speed (mm/s):**

25 **Thrust (N):**

0.16 **Weight (kg):**

250 CPR **Encoder Resolution:**

Optical Properties

0.047625 **Resolution (μm):**

Electrical

180 **Maximum Operating Current (mA):**

Hardware & Interface Connectivity

Precision Lead Screw **Type of Drive:**

24-48 VDC **Power Supply:**

RS-232 **Computer Interface:**

Threading & Mounting

3/8-32 Nut, 3/8" Shank or M3 Screws **Mount:**

Environmental & Durability Factors

0 to 50 **Operating Temperature ($^{\circ}\text{C}$):**

Regulatory Compliance

[Compliant](#) **RoHS 2015:**

[View](#) **Certificate of Conformance:**

[Compliant](#) **Reach 247:**

Product Details

- Miniature, Robust Design
- Integrated Motor and Controller
- Controlled Manually or via RS-232 Serial Interface
- Available with Integrated, 250 Counts per Revolution (CPR) Motor Mounted Encoder

Zaber™ High Accuracy Linear Actuators feature 50nm resolution with up to 50mm travel distance. These computer-controlled, self-contained linear actuators include a stepper motor and a built-in controller that can connect directly to a computer's RS-232 port while requiring only the included 15V power supply. Encoder versions are available for all travel lengths and include 250 Counts per Revolution (CPR) rotary quadrature encoders integrated into the stepper motor. Zaber™ High Accuracy Linear Actuators also feature an industry standard 3/8" shank that fits most common stages. The actuator shaft does not rotate and will not transmit any torque to the translation stage. When used manually, the actuator can be monitored using a computer if needed.

Note: A 6ft. data cable, RS-232 adapter, and universal power supply are sold separately as accessories