Motorized Actuators, DC Servo-Motor

Specifications
- Models: Z606, Z612, Z612B, Z625B
- Travel Ranges: 6, 12, & 25mm
- Minimum Incremental Motion: < 0.03µm
- Motor Type: 12V DC Servo-Motor
- Encoder:
  - Motor-mounted Rotary Encoder
  - 12,288 Counts/Rev. of Lead Screw
- Limit Switches: Electro-mechanical
- Backlash: < 8µm
- Speed Range: 50-425µm/s
- Gear Reduction: 256:1
- Lead Screw Pitch: 0.5mm
- Axial Load Capacity: 45N

- 6mm, 12mm & 25mm Versions Available
- High Precision Rotary Encoder
- 12V DC Servo-motor
- Precision Limit Switches to Prevent Damage
- Compatible with Most Standard Controllers/Drivers

Z-SERIES

Our new Z-series motorized actuators provide reliable motion control in a lightweight, durable, and compact package. Three travel options: 6mm, 12mm, and 25mm allow the Z-Series actuators to serve as drop-in replacements for manual actuators in many of our popular opto-mechanical mounts and positioners. The Z-Series motorized actuators utilize a 12V DC servo-motor and gear head for the drive elements. These features, along with a high resolution optical encoder (12,288 counts/rev), ensure extremely small incremental movements (approximately 0.05µm). Vacuum versions are available (See page 376).

NEW OptoDC MOTOR DRIVER

For More Details See Page 333

1" Motorized Translation Stages

The PT3-Z6 and the PT1-Z6 motorized stages provide a 1" total travel range. The motorized actuators allow sub-micron control and provide position feedback via an optical encoder. A 12V DC servo motor and gear head rotate the 0.5mm pitch lead screw that drives the stage, and built-in limit switches provide overdrive protection. Thorlabs motorized actuators are one of the smallest commercially available; combining these actuators with our compact high precision translation stages results in an extremely compact sub-micron translator.

- Maximum Stage Travel: 1" Per Axis
- Angular Deviation: <200µrad Per Axis
- Optical Encoder with 12,288 Pulses/Rev. & 256:1 Gear Head for High Torque
- Built-In Limit Switches
- Right-handed Configuration, Field Changeable to Left Handed
- Horizontal Load: 90 lbs (40.9kg)
- Vertical Load: 20 lbs (9.1kg)

ITEM# METRIC ITEM# $ £ € ¥ DESCRIPTION
PT1-Z6 PT1/M-Z6 $ 565.00 £ 423.75 € 593.25 ¥ 96,050 Single Axis Motorized Translation Stage, 1" Travel
PT3-Z6 PT3/M-Z6 $ 1,738.00 £ 1,303.50 € 1,824.90 ¥ 295,460 Three Axis Motorized XYZ Translation Stage, 1" Travel

Universal Design-Imperial and Metric Compatible