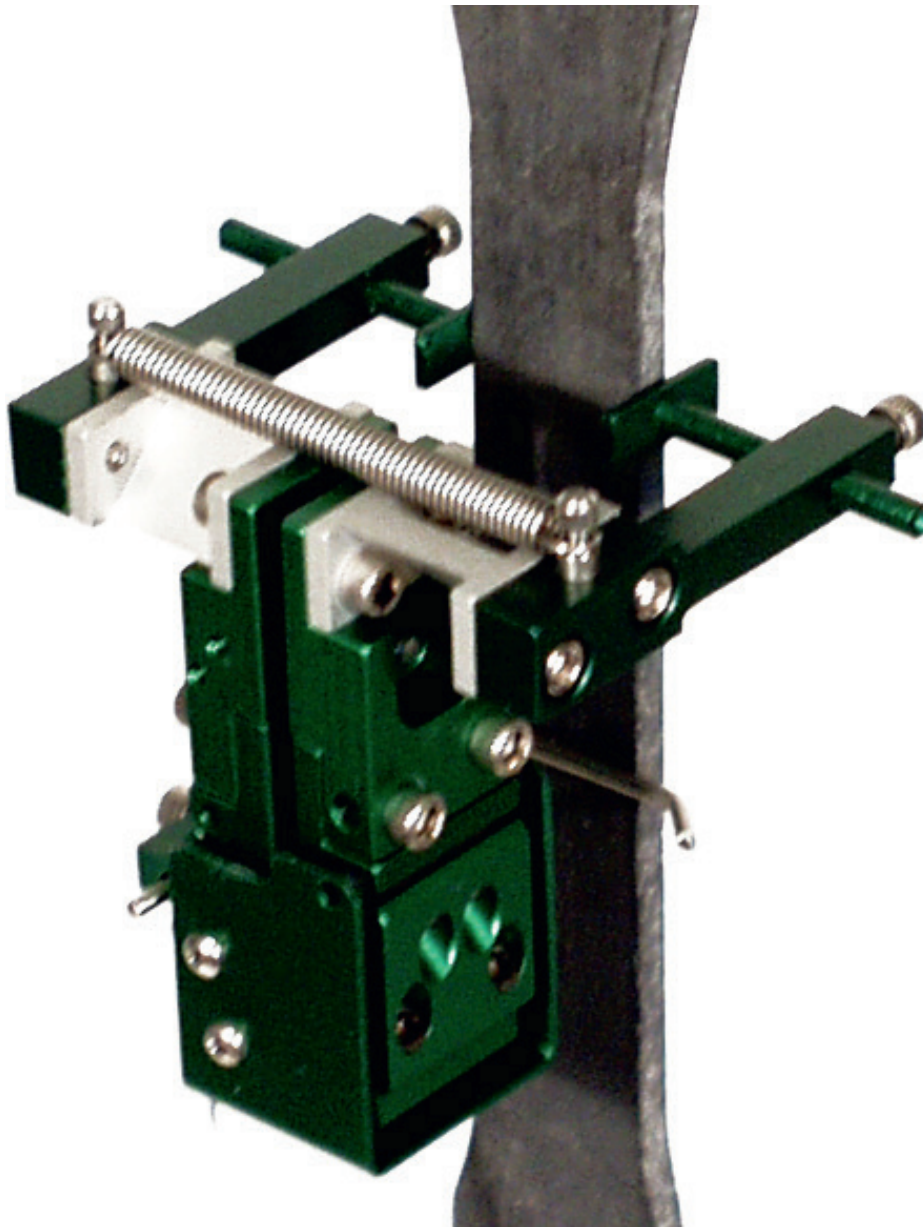


Miniature Transversal Extensometer Series 3475

These miniature transverse extensometers are designed for general purpose transverse or diametral strain measurements on small or thin specimens.

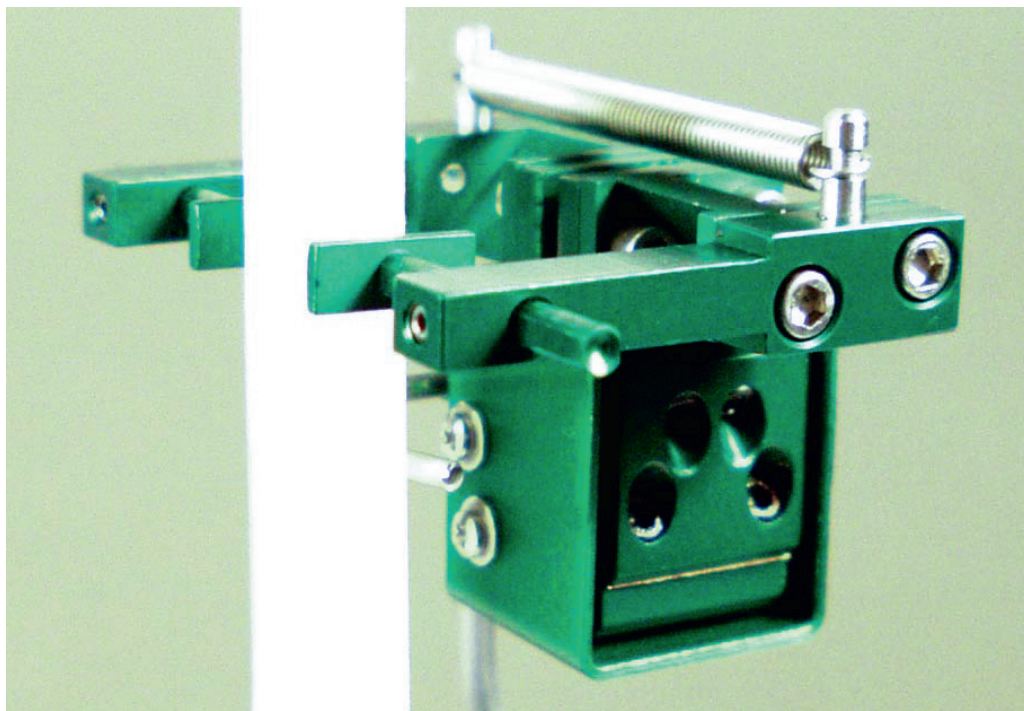
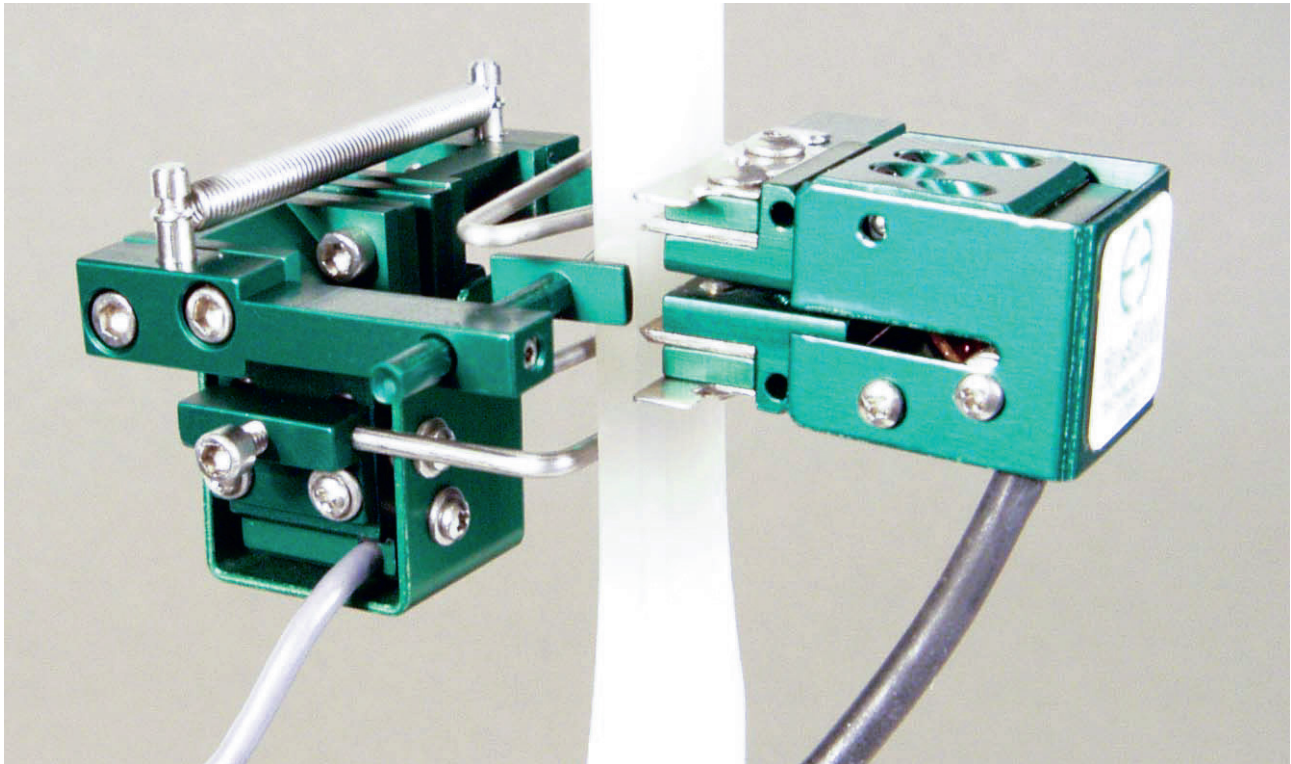


These very lightweight extensometers are self-supporting on the test sample. They are used for measuring transverse or diametral strain. Often, they are used simultaneously with an axial extensometer, and together these extensometers are suitable for measuring Poisson's ratio per ASTM E132 with most materials and specimens. They are also used for characterizing materials with anisotropic properties, such as with many composite materials. This model clips easily onto the sample with an integral spring to hold the unit in place. It can be adjusted to work on any size sample from 0 to 25 mm (0-1 inch) width or diameter. The Model 3475 has an arm thickness of only 3.81 mm (0.15 inches), and will work simultaneously with any axial extensometer having sufficient clearance between arms (not all versions of the 3442 miniature extensometer can be used). Large radius contacts prevent the unit from digging into the samples. This model utilizes dual flexure design, allowing use in dynamic applications. All units have measuring ranges in both directions.

The Model 3475 extensometers are strain gaged devices, making them compatible with any electronics designed for strain gaged transducers.

Features

- May be left on through specimen failure.
- Full bridge, 350 ohm strain gaged design for compatibility with nearly any test system.
- All models will measure both positive and negative displacements.
- Easy to mount, with integral springs to keep the extensometer on the sample.
- Self-supporting on the specimen.
- All standard units have linearity readings of 0.20% or better.
- Rugged, dual flexure design for strength and improved performance. Much stronger than single flexure designs, this also allows cyclic testing at higher frequencies.
- Includes high quality foam lined case.



Specification:

Excitation: 5 to 10 VDC recommended, 12 VDC or VAC max.
 Output: 2 to 4 mV/V, nominal, depending on model
 Linearity: $\leq 0.20\%$ of full scale measuring range
 Temperature Range: Standard (-ST) is $-40\text{ }^{\circ}\text{C}$ to $+100\text{ }^{\circ}\text{C}$ ($-40\text{ }^{\circ}\text{F}$ to $210\text{ }^{\circ}\text{F}$)
 Optional (-LHT) is $-270\text{ }^{\circ}\text{C}$ to $+200\text{ }^{\circ}\text{C}$ ($-454\text{ }^{\circ}\text{F}$ to $400\text{ }^{\circ}\text{F}$)
 Cable: Integral, ultra-flexible cable, 2.5 m (8 ft) standard
 Specimen Size: Works with samples up to 25 mm (1 inch) width or diameter

Note

This extensometer can be used with 3442 miniature axial clip-on extensometer.

Technical Data

Model 3475 Available Versions: Any combination of measuring range and temperature range listed below is available.
 Other configurations may be available with special order; please contact us to discuss your requirements.

Model Number 3475 - [] - []

Measuring Range:	
-025M	$\pm 0.25\text{ mm}$
-050M	$\pm 0.50\text{ mm}$
-100M	$\pm 1.00\text{ mm}$
-125M	$\pm 1.25\text{ mm}$

Also available in inches

Temperature Range	
-LT	$-270\text{ }^{\circ}\text{C}$ to $100\text{ }^{\circ}\text{C}$ ($-454\text{ }^{\circ}\text{F}$ to $210\text{ }^{\circ}\text{F}$)
-ST	$-40\text{ }^{\circ}\text{C}$ to $100\text{ }^{\circ}\text{C}$ ($-40\text{ }^{\circ}\text{F}$ to $210\text{ }^{\circ}\text{F}$)
-HT1	$-40\text{ }^{\circ}\text{C}$ to $150\text{ }^{\circ}\text{C}$ ($-40\text{ }^{\circ}\text{F}$ to $300\text{ }^{\circ}\text{F}$)
-HT2	$-40\text{ }^{\circ}\text{C}$ to $200\text{ }^{\circ}\text{C}$ ($-40\text{ }^{\circ}\text{F}$ to $400\text{ }^{\circ}\text{F}$)
-LHT	$-270\text{ }^{\circ}\text{C}$ to $200\text{ }^{\circ}\text{C}$ ($-454\text{ }^{\circ}\text{F}$ to $400\text{ }^{\circ}\text{F}$)

Example: 3475-050M-LT: $\pm 0.50\text{ mm}$ measuring range, low temperature option ($-270\text{ }^{\circ}\text{C}$ to $100\text{ }^{\circ}\text{C}$)

Example: Model 3475-100M-__

Dimensions: [mm] inch

