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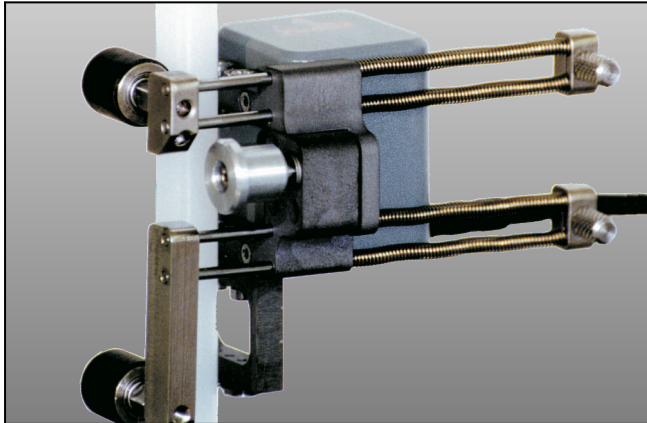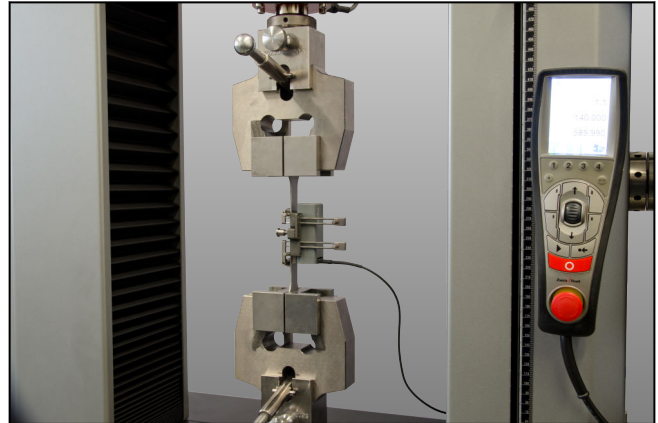
Product Information
digiClip

digiClip Short with extension piece

digiClip Long

Applications

The digiClip clip-on extensometer is ideal for precise modulus and yield-point determination to ISO 527-1 on rigid and semi-rigid plastics and for determining strain at maximum stress, plus in many cases strain at break on rigid plastics with low extension.

It can also be used for determining the compressive strength of plastics or determining Young's modulus for compression on metals.

Function description

The digiClip clip-on extensometer features very low overall height; only 36 mm up to an initial gauge length of 30 mm.

This enables strain measurement for very small clamping distances. Parallel alignment to the specimen minimizes transmission errors and increases reproducibility.

The measuring range can be changed from "Tensile only" to "Tensile and Compression", allowing fast, easy adjustment to suit test conditions. The tensile measuring range is from -0.2 to 13.5 mm, while the tensile and compression measuring range is from -5.2 to 8.5 mm.

Advantages and features

- Additional knife-edges for notch-sensitive specimens included in delivery
- Adjustable initial gauge lengths
- Initial gauge length automatically locked at attachment and unlocked at release
- Guaranteed high-resolution Young's modulus determination as per ISO 527-1
- Maximum error of ±1 μm in differential displacement measurement between two measurement points in a range from 20 μm to 200 μm, completely satisfying the additional requirement as per ISO 527-1 (2011)
- Approved for closed-loop strain-rate control as per ISO 6892-1 (2009) Method A (1) and ASTM E8 – 09 Method B
- Mounting bracket for attachment to load frame plus fall protection included in delivery.

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Technical data

digiClip clip-on extensometers for AllroundLine, zwickiLine and ProLine testing systems

Type Item No.	digiClip, short 078779	digiClip Long 078781	
Initial gauge length			
Convertible	20/25/25.4/30		mm
optional	45/50/50.8/55[1]/60/75/80/85 [1]		mm
Initial gauge length:			
Convertible		50/50,8 (2")/55[1]	
optional		65/70[1]/75/80/85[1]/100/105[1]	
Measurement displacement			
For tension	-0.2 ... 13.5		mm
For tension and compression	-5.2 ... 8.5		mm
Measurement travel:			
For tension		-0.2 ... 40	
For tension and compression		-5.2 ... 35	
Specimen dimensions			
Round specimens	Up to Ø 20	Up to Ø 20	mm
Flat specimens (d x w)	Up to 20 x 30	Up to 20 x 30	mm
Resolution	0.02	0.02	µm
Accuracy	Class 0.5	Class 0.5	To EN ISO 9513
Mounted height			
At L_0 20, 25, 30	36	-	mm
At L_0 50	60	77	mm
At L_0 80	90	90	mm
At L_0 100	-	110	mm
At $55 < L_0 \le 65$	-	$L_0 + 5$	mm
At $65 < L_0 \le 105$	-	$L_0 + 10$	mm
Weight, approx.	100	170	g
Securing device included	Yes	Yes	
Ambient temperature	+10 ... +35	+10 ... +35	°C
Housing color	RAL 7011	RAL 7011	

[1] Changing the measurement range: see values in the measurement range for tension and compression

Accessories required

Required module

Description	ArticleNumber
Incremental measurement module	046637

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Product Information
digiClip

Optional accessories

Extension pieces for digiClip Short

Description	ArticleNumber
Set of extension pieces for gauge length 50/50.8 mm (2 inches)	**353078**
Set of extension pieces for gauge length 60 mm	**353079**
Set of extension pieces for gauge length 45/60/75 mm	**027174**
Extension pieces for gauge length 80 mm (both sets required)	**353078, 353079**

Extension pieces for digiClip Long

Description	ArticleNumber
Set of extension pieces for gauge length 65 mm	**1022951**
Set of extension pieces for gauge length 70 mm	**318977**
Set of extension pieces for gauge length 75 mm	**027176**
Set of extension pieces for gauge length 80 mm / 85 mm	**318759**
Extension pieces for gauge length 100 mm / 105 mm	**324745**

Measuring plunger for clip-on 5025-1 and digiClip short

Description	ArticleNumber
Measuring plunger for determining deflection, e.g., on plastics, fiber-reinforced composites, wood. Installation in ZwickRoell flexure test kit. The clip-on/digiClip is attached directly to the appropriate retaining elements of the measuring plunger and does not have to be removed between tests. Maximum height from the upper edge of the flexure table 99 mm, maximum measurement travel 13/25 mm (digiClip/clip-on), temperature range -70 ... +200 °C. Additional information in PI 395.	**1094314**

Carbide knife-edge

Description	ArticleNumber
Carbide knife-edge, circular, sharp Knife-edge can be rotated for further use in the event of wear.	**085821**

All data at ambient temperature.   Subject to change in the course of further development.