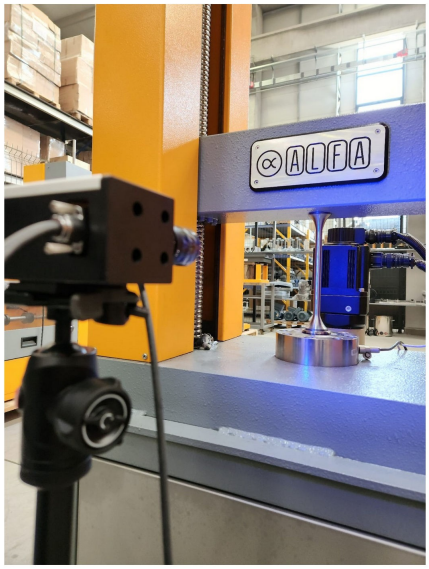
VIDEO EXTENSOMETER

Code : E023



- Video extensometers are advanced, non-contact measurement devices designed to accurately determine the deformation and strain characteristics of materials during mechanical testing. Utilizing high-resolution digital cameras and sophisticated image processing algorithms, these instruments track the displacement of specific markers or the natural texture on a specimen's surface throughout testing. This non-invasive approach ensures precise strain measurements without influencing the specimen's behavior, making video extensometers particularly suitable for testing delicate, soft, or high-elongation materials.
- These devices are versatile and can be employed in various testing scenarios, including tensile, compression, bending, and torsion tests. Their adaptability extends to different environmental conditions, as they can be integrated with temperature chambers and fluid baths to assess material performance under diverse circumstances.
- Ability to analyze 4 points on the specimen and measure the axial strain between the given points
- High accuracy confirming to the international standards
- Does not need to be clipped, glued or connected to the specimen

- Wide range of specimen (cubes, cylinder, rods, flat, strips, irregular shpes … etc)
- Used to measure: strain, deformation, elongation, deflection, modulus of elasticity … etc combined with ALFA Equipment and ALFA State-of-the-art software series

STANDARDS

ASTM E83 • ISO 9513 • ISO 527-2 • ASTM D638 • ISO 6892-1 • ASTM E8 • ASTM D412 • ASTM D3039

TECHNICAL SPECIFICATIONS

- Measurement Range: Capable of measuring small strains required for modulus determination to high elongations exceeding 1000%, depending on the model and configuration.
- Resolution: Up to 0.05 µm, facilitating precise strain measurements.
- Accuracy: Conforms to ASTM E83 Class B-1 and ISO 9513 Class 0.5 standards, ensuring high measurement fidelity.
- Gauge Lengths: Interchangeable measurement heads supporting various gauge lengths, offering flexibility across different specimen sizes and test requirements.
- Mounting Options: Designed for compatibility with various testing machines, featuring support arms or mounting systems that facilitate easy integration and precise alignment.

EQUIPPED WITH

- High-resolution digital cameras for accurate image capture.
- Advanced image processing software capable of real-time strain computation.
- Laser-assisted alignment systems to expedite and enhance the accuracy of specimen setup.
- Integrated lighting systems to ensure consistent and optimal illumination of the specimen during testing.

SUPPLIED WITH

- Calibration verification tools and software wizards to maintain compliance with ASTM and ISO accuracy standards.
- Durable carrying cases for secure storage and transport of the extensometer and its accessories.

ORDERING INFORMATION

Item	Code
VIDEO EXTENSOMETER	E023X001X