



## **MacroZoom Unit 1.3**

**Sample inspection system for Crimp Cross Section Analysis**

QUALITY ASSURANCE

# MacroZoom Unit 1.3

## Concept

With the MicroGraph System (MGS), crimp cross-sectional images can be created in a fraction of the time compared to conventional methods. The system includes modular components that can be combined according to individual needs.

The MacroZoom Unit (MZU) 1.3 allows the user to quickly and accurately analyze a pre-cut cross section sample using precision optics and powerful software. The 1.3 megapixel optic unit includes 9 incremental zoom positions that can be calibrated for repeatable and accurate measurements.

An optional auxiliary lens can be added to expand the field of vision for larger samples. Sample illumination can be adjusted as necessary with the LED light ring for best picture clarity. The CrimpLab software included with the MZU is specifically designed for crimp cross section analysis. It is a powerful yet simple software for capturing all of the critical measurements. Basic functions for measuring height, width, area and radius values are included as well as others such as strand counter and a crimp area reduction calculator. Images can be stored in multiple formats either with or without measurements and measurement masks can be created for comparison between sample sets.

Once all measurements are captured, the information can be easily transferred to a PDF report. Although the CrimpLab software was created specifically for crimp cross sectional analysis, it is extremely useful for many other quality analysis applications as well.

## Special Features

- 2.0 USB camera with 1.3 Megapixel resolution for clear picture quality
- 9 incremental zoom positions can be calibrated for measurement repeatability and accuracy
- Optional auxiliary lens for expanded field of vision for larger samples
- CrimpLab software for capturing all key measurements and reporting

## Applications

- All crimp analysis applications
- Ultrasonic and resistance welding
- Tool analysis and other quality assurance applications

Technical Specifications	
Lens Coverage	1.0 x 0.8 mm up to 6.8 x 5.1 mm (0.04 x 0.03" up to 0.26 x 0.2") MZU for SPU 6 2.6 x 2.0 mm up to 17.1 x 12.8 mm (0.10 x 0.08" up to 0.67 x 0.5") MZU for SPU 60
Lighting	LED ring light
Lens and Zoom	MacroZoom lens with 9 incremental zoom steps
Camera	USB 2.0 camera
Resolution	1.3 Megapixel
Software	CrimpLab®
PC	IPM-compatible PC
Processor	Pentium 3 or higher
Memory Capacity	Min. 512 MB RAM
Graphics Card	Min. 32 MB
Operating System	Microsoft Windows® 2000, SP4 Microsoft Windows® XP, SP2 Microsoft Windows® Vista Microsoft Windows® 7
Safety	IP20
Interfaces	USB 2.0
Dimensions (W x D x H)	200 x 255 x 400 mm (7.9" x 10.0" x 15.74")
Weight	1.7 kg (3.74 lbs.)
CE-Conformity	The MacroZoom Unit 1.3 fully complies with all CE and EMC equipment guidelines relative to mechanical and electrical safety and electromagnetic compatibility.

## To Be Precise.