

# EPS150TRIAX

A dedicated 150 mm manual probing solution for low-noise measurements



## BENEFITS

### **Make everyone a low-noise measurement expert**

Best-known methods for low-level I-V/C-V test

### **Enable I-V measurements at fA level**

Full triaxial design and high-quality cables

### **Ensure contact stability over time**

Compact and rigid mechanical design

### **Protect your investment for the future**

Re-configure and upgrade as requirements grow, including C-V at fF levels

### **Minimize training efforts**

Designed for convenience and ease of use

The EPS150TRIAX is a dedicated probing solution that comes with everything you need to achieve accurate measurement results in the shortest time, with maximum confidence. The system incorporates best-known methods for low-level I-V/C-V measurements.

The EPS150TRIAX allows you to achieve accuracy through a very stable system platform design with a vibration-isolation solution to protect contact quality over measurement time. Optimized optics and backlash-free X-Y-Z movement of industry-standard positioners, and a contact separation drive with 1  $\mu\text{m}$  repeatability, enable precise probe placement comparable to semi-automatic systems. High-quality cables and a full triaxial signal path down to the device under test allow you to characterize down to femtoampere (fA) levels. The low-noise thermal and non-thermal chucks with Kelvin connections allow you to measure devices with a high degree of confidence.

An intuitive operation workflow with pull-out chuck, single-handed chuck adjustment, and a highly-planar chuck surface and movement, ensures ease of operation for both the novice and the expert user.

Designed for upgradability and extendable with multiple options such as advanced impedance measurement down to femtofarad (fF) levels, the EPS150TRIAX system can be easily reconfigured to meet your future project requirements.

# EPS150TRIAX

## Modular design for upgradability

- Dedicated upgrade path for lower signal levels

## Four industry-standard positioners

- Designed for accurate and stable probe positioning
- Magnetic base for safe operation

## High-performance triaxial probe arms with integrated cables

- Optimized for measurements down to fA levels
- Optimized signal path for best accuracy
- Compatible with PTT probes (included)

## Universal probe platen

- Rigid and stable design
- Compatible with probe card

## 40 mm platen drive

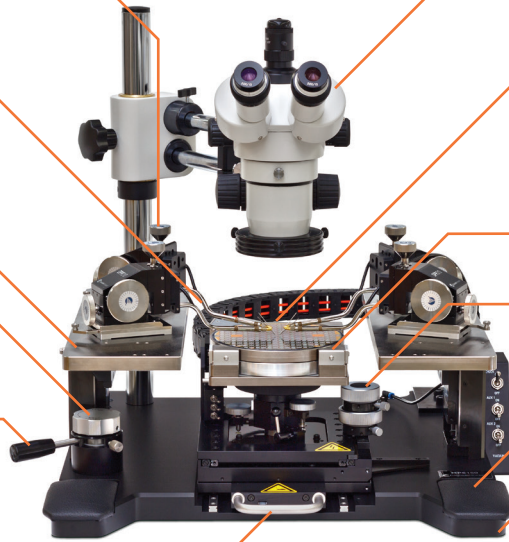
- Flexibility for wafer-level and package test

## Unique 200 $\mu\text{m}$ platen contact / separation stroke

- $< \pm 1 \mu\text{m}$  accuracy for repeatable contact quality
- Convenient and easy to use

## Chuck stage with 90 mm roll out

- Quick, risk-free and convenient wafer loading



## Trinocular 6.7x stereo zoom microscope with 100x magnification

- Accurate probe placement on small pads
- C-mount included
- LED illumination for excellent image contrast and long lifetime

## Dedicated triaxial chuck

- $< \pm 5 \mu\text{m}$  planarity
- Supports single chip and wafers
- Triaxial-isolated design for fA-level measurements
- Integrated Force-Sense terminals

## Integrated AUX chuck

- Ready for C-V calibration and verification

## Chuck X/Y movement

- Precise X/Y positioning with  $< 5 \mu\text{m}$  resolution
- Independent axis locks for easy linear navigation

## Compact base with arm rest

- Small footprint (490 mm x 490 mm)
- Convenient operation

## Vibration-isolation solution

- Ensures accurate contact and minimizes pad damage

## ORDERING INFORMATION

Part Number	Description
EPS150TRIAX	150 mm manual probing solution* for low-noise measurements
EPS-ACC-SE750-TRIAX	SE750 shield enclosure option including 6x triaxial feedthroughs
157-450	Advanced TRIAX option for EPS150 for pulsed I-V/C-V measurements (shield enclosure required)
EPS-ACC-150-PCA	Probe card adapter option
EPS-ACC-HDTV	Digital high-definition TV option for EPS packages containing C-mount HDTV camera, cables, power supply and 22" monitor, with crosshair overlay
EPS-ACC-TV	Analog TV option for EPS packages containing C-mount PAL TV camera, cables, power supply and 19" TV monitor
49210	VIB600 enhanced vibration isolation platform
157-842	PCB DUT board holder

\* The EPS150TRIAX manual probing solution includes: MPS150 probe station with a 150mm chuck stage, universal platen (40 mm height adjustment), boom stand (with shortened rod), camera-ready stereo zoom microscope with 15x - 100x magnification and LED illumination, vibration-isolation solution, triaxial chuck with three AUX chucks (two with vacuum), maximum theta range +/- 8°, chuck triaxial cables (force/sense), four DPP210-M-S positioners, four triaxial probe arms with 2 m triaxial cable, a box of 25 PTT probe tips with 6  $\mu\text{m}$  tip radius, tweezers, and all tools for setup and operation.

For more information contact us at 1-800-550-3279 (1-503-601-1000) or email [sales\\_support@cmicro.com](mailto:sales_support@cmicro.com)