

MPI MicroPositioner

MPI offers a huge variety of backlash-free MicroPositioners to address every operational and measurement condition, varying from small footprint to micrometer driven high-resolution positioners for RF and mmW applications.

Unified Z-direction, ergonomic operation, and a strong magnetic base enable fine probe placement for high contact quality, producing unsurpassed measurement results. MPI MicroPositioners are designed with universal interface compatible to all probe arms for ease of application specific adaptations.

Design varieties allow operators to choose MicroPositioners which fit their operational familiarity, thus providing immediate proficiency.

The MPI self-developed MicroPositioners are designed without compromise. The full carbon-steel structure enables stable contact over long periods of time and superior positioning accuracy.

MP25 MicroPositioner: The Small One

Feature resolution:	<5 μm
Travel range (X/Y/Z):	10 / 10 / 10 mm
Screw resolution (X/Y/Z):	500 / 500 / 500μm
Mounting:	Magnetic
Base stage size:	25 mm
Footprint:	55 mm x 40 mm
Versions:	Right or left
Application:	IV/CV coaxial and ultra-low current triaxial measurements



MP40 MicroPositioner: The Universal One

Feature resolution:	<3 µm
Travel range (X/Y/Z):	13 / 13 / 13 mm
Screw resolution (X/Y/Z):	500 / 500 / 500 μm
Mounting:	Magnetic
Base stage size:	40 mm
Footprint:	65 x 40 mm
Versions:	Unidirectional
Application:	Accurate IV/CV coaxial, ultra-low current triaxial and RF measurements



Versions:



MP50 MicroPositioner: The Kelvin One

Feature resolution: <2 µm

Travel range (X/Y/Z): 13 / 13 / 13 mm

250 / 250 / 250 μm or 500 / 500 / 500 μm Screw resolution (X/Y/Z):

Mounting: Magnetic Base stage size: 50 mm 86 x 60 mm Footprint:

Application: Extreme accurate IV/CV coaxial, ultra-low current

Right and left

triaxial measurements, internal node probing



MP60 MicroPositioner: The RF One

Feature resolution: <2 µm

Travel range (X/Y/Z): 10 / 10 / 10 mm

250 / 250 / 250 μm or 500 / 500 / 250 μm Screw resolution (X/Y/Z):

Mounting: Magnetic Base stage size: 60 mm Footprint: 89 x 60 mm Versions: Right and left

Accurate and stable RF measurements Application:



MP60-MR MicroPositioner: The Micrometer One

Feature resolution: <2 µm

Travel range (X/Y/Z): 13 / 13 / 13 mm Screw resolution (X/Y/Z): $500 / 500 / 250 \, \mu m$

Mounting: Magnetic 50 mm Base stage size: Footprint: 89 x 60 mm Versions: Right and left

Accurate and stable RF measurements Application:



MP80 MicroPositioner: The mmW One

Feature resolution: <2 µm

Travel range (X/Y/Z): 25 / 25 / 25 mm Screw resolution (X/Y/Z): 500 / 500 / 250 μm

Mounting: Bolt-down Base stage size: 80 mm Footprint: 100 x 80 mm Versions: Right and left

Accurate and stable RF measurements, Application:

broadband and mmW measurements





MicroPositioner – Application Matrix

Application / Positioners	Stage (mm)	TPI	IV / CV Coax	Low-level, IV, Triax	V/CV/PIV Kelvin	RF	Broadband mmW	High Power HC / HV
MP25	25	50	•	•				
MP40	40	50	•	•	•	•		-/•
MP50 MP50-HR	50	50 100	•	•	•			- / 0
MP60 MP60-HR	60	50 100	0	0		•		•/•
MP60-MR	60	50	0	0		•		• / •
MP80	80	50				•	•	

MicroPositioner – Probe System Platform Matrix

Platform / Positioners	TS50	TS150	TS150-mmW	TS200	TS200-SE/HP	TS300
MP25	•	•	0	•		•
MP40	•	•	•	•	•	•
MP50 MP50-HR	•	•	•	•	•	•
MP60 MP60-HR	•	•	•	•	•	•
MP60-MR	0	•	•	•	•	•
MP80			•		•	

^{* • =} recommended • = available



MPI Accessories

MPI offers a complete portfolio of accessories including coaxial, triaxial, RF probe arms, high-temperature Kelvin and high-current probes up to 400 A.

Kelvin Arms

The MPI Kelvin probe holder has a unique vertical self-leveling probe tip which is isolated as close as possible to the DUT up to 300 °C. They are the new benchmark for accurate ultra-low noise, impedance or pulsed-IV measurements. Making a novice user able to perform fast and accurate measurements, Kelvin probes provide easy reconfiguration for 4TP-connection or/and splitting the ground for pulsed-IV tests. Clear labeling for Force/Sense or High/Low potentials is available.

RF Arms

RF probe arms enable easy and very convenient probe leveling. The fast and toolless vertical height adjustments with built-in mm-scale is a small example of great usability by working with different RF probe technologies.

Accessories

Extensive selection and dedicated design of vibration isolation platforms, tables with integrated racks for computer, keyboard tray, a dual monitor stand, EMI-shielded DarkBoxes, probe cards and PCB test holders, vacuum pumps and air compressors are a few examples for the variety of accessories completing the common MPI Test Solution Systems.

Probe Arms - MicroPositioner - Probe Platform Matrix

Application / Positioners	Coax	Coax 10kV	Triax	Triax 3kV	Kelvin open	Kelvin Manual	Kelvin Auto	RF (HC)	RF (HC)	Dedicated mmW
MP25	•			0						
MP40	•	•	•	•	•	•	•	•	•	
MP50 MP50-HR	•	•	•	•	•	•	•	0	•	
MP60 MP60-HR	0	0	0	0				•	•	
MP60-MR	0	0	0	0				•	•	
MP80										•
Probe Systems	All open	All HP	All open	All HP	All open	SE Manual	SE Auto	All open	All SE/TS200-HP	TS150- mmW



Asia region: ast-asia@mpi-corporation.com
EMEA region: ast-europe@mpi-corporation.com
Amercia region: ast-americas@mpi-corporation.com

For local support please visit our homepage: www.mpi-corporation.com



E-Mail: info@mpi-corporation.com • Web: www.mpi-coporation.com