

## ➤ Probe Station Accessory Catalog

The FormFactor Complete Set of Accessories for your Probe Station



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# CM300xi



## NOTE

Compatible accessories described in this section and throughout this catalog can be configured with the FormFactor CM300xi or CM300 probe systems.

## CM300xi with TopHat

### CONNECTION PANELS

#### 167-117 — Connection Panel

##### Features

- Complete kit of cable connection panels and accessories
- Optimized for CM300xi and Elite 300 universal accessory mounting rail system
- All accessories can be mounted on the platen simultaneously, in any location (left, right and back sides of the probe station platen).

##### Kit Contents

- 2 Triax connection panels
  - Each panel features 8 Triax (3-lug) feed through connectors (f), and 2 BNC (2-lug) connectors (f).
  - Panel connections support single triax cables and Keysight dual triax SMU cable assemblies
  - (For Keysight Quadrax SMU connections, please contact the factory).

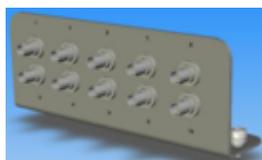


Triax connection panel  
(front view)



Triax connection panel  
(top view)

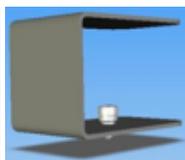
- 1 coaxial connection panel – each panel features 10 BNC (2-lug) connectors (f).
- 2 vacuum manifolds – each manifold features 5 vacuum inlets with integrated on/off pull switches
- 2 positioner mounts – used for holding DPP2xx/DPP3xx positioners above the platen while changing probe tips



Coaxial connection  
panel



Vacuum manifold



Positioner  
mount

##### Compatibility

- CM300xi

#### 780-00937 — Triax Connection Panel

##### Features

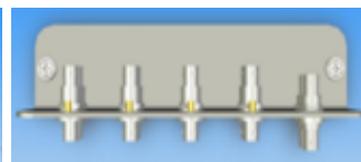
- Optimized for CM300xi and Elite 300 universal accessory mounting rail system
- Panels can be mounted on the platen in any location (left, right and back sides of the probe station platen)

##### Kit Contents

- 2 Triax connection panels:
  - Each panel features 8 Triax (3-lug) feed through connectors (f), and 2 BNC (2-lug) connectors (f)
  - Panel connections support single triax cables and Keysight dual triax SMU cable assemblies
  - For Keysight Quadrax SMU connections, please contact the factory)



Triax connection panel  
(front view)



Triax connection panel  
(top view)

##### Compatibility

- CM300xi

## MOUNTING KITS, PLATES, AND MISCELLANEOUS ACCESSORIES

### 143-428 — Keysight 42941A Mounting Kit

#### Features

- Mounting bracket to hold Keysight 42941A probe
- Compatible with CM300xi and Elite 300 RPP305 positioners

#### Kit Contents

- 2 cables:
  - SMA (m) to SMA (m)
  - 120 mm (4.7 in)
- Mounting bracket for RPP305-EL positioner

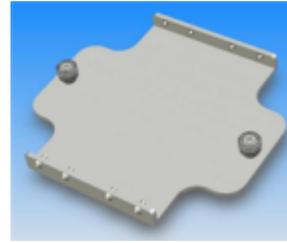
#### Compatibility

- CM300xi, Elite 300



Mounting bracket shown on RPP305 positioner with Keysight high impedance probe

### 144-422 — Mounting Plate for B1500A ASU, E5288A Atto Sense Unit



Mounted plate



Keysight ASU mounted to plate

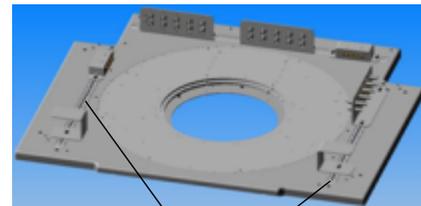
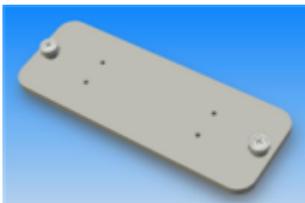


Plate mounts on universal accessory mounting rails

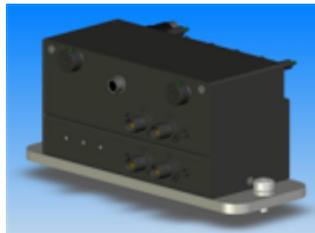
#### Compatibility

- CM300xi, Elite 300

### 143-429 — Mounting Plate for B1500A SCUU



Mounted plate



Keysight SCUU mounted to plate

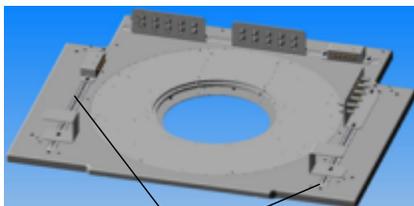


Plate mounts on universal accessory mounting rails

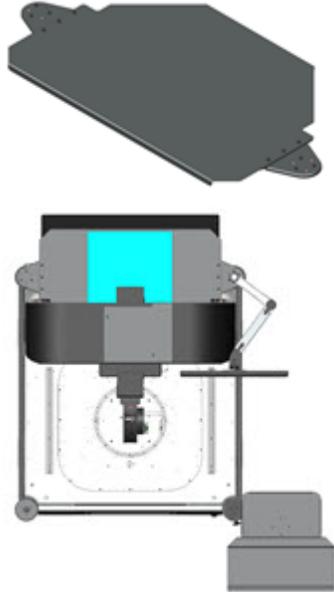
#### Compatibility

- CM300xi, Elite 300

## 161-695 — Instrument Shelf

### Features

- Shelf system easily attaches to the CM300xi system frame
- Instruments and accessories can be conveniently placed at the rear of the CM300xi
- Instrument shelf is positioned forward over the CM300xi platen surface, allowing test instruments to be located close to probes for shortest cable interconnects



### Specifications

- Minimum clearance under the HTS transport: 3HU (133.4 mm [5.25 in])
- Maximum supported instrument load: 50 kg (110 lb)
- Dimensions (WxDxH): 1140 x 590 x 25 mm (44.9 x 23.2 x 1 in)
- Weight: 15 kg (33 lb)

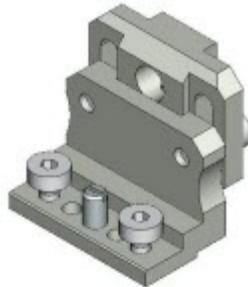
### Compatibility

- CM300xi

## 163-753 — Adjustable RF Probe Mount

### Features

- Adjustable height probe mount compensates for different RF probe depth without compromising positioner Z-travel range
- Adapter converts existing Elite 300 RF probe mounts for use with CM300xi
- Compatible with RPP305 positioners
- Compatible with MicroChamber TopHat



### Compatibility

- CM300xi, Elite 300

## 163-755 — DPP2xx 43mm Probe Mount Adapter

### Features

- Adapter converts existing Elite 300 DCP probes and needle probe mounts for use with CM300xi
- Compatible with DPP2xx positioners
- Compatible with MicroChamber TopHat
- Constructed with high-stability thermal materials



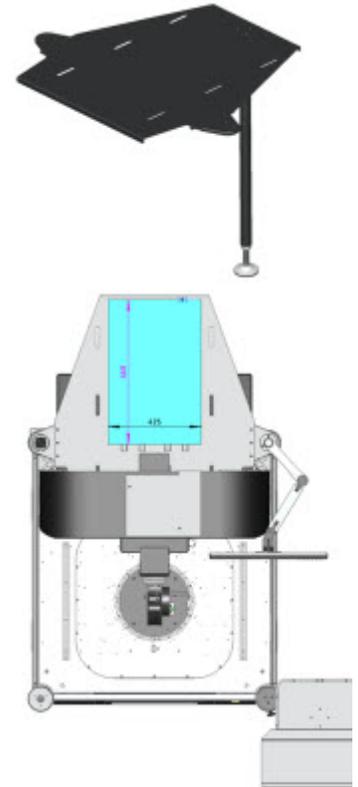
### Compatibility

- CM300xi, Elite 300

## 176-613 — Large Instrument Shelf

### Features

- Large shelf for measurement equipment
- Centered at the rear side of the table, behind the microscope bridge, to allow for large equipment height
- Enables placement of instruments up to 680 mm deep behind the microscope bridge
- For use with the shortest noise and RF application measurement cables
- Includes post



### Specifications

- Maximum supported instrument load: 150 kg (330 lb)
- Maximum depth for instrument: 680 mm (26.7 in)
- Maximum width between lead-through for straps: 520 mm (20.4 in)
- Weight (including post): 36 kg (80 lb)

### Compatibility

- CM300xi

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## 176-911 — Left Side Instrument Shelf

### Features

- Tray assembly mounts on both CM300 left side posts
- Well suited for applications requiring short cabling (e.g., low-noise and RF applications)

### Specifications

- Maximum load: 50 kg (110 lb)
- Shelf area (WxD): 488 x 600 mm (19.2 x 23.6 in), adapted for Keysight B1505 footprint
- Height above probe platen: 225 mm (8.9 in)

### Compatibility

- CM300 semi-automated probe stations only
- Compatible with rear shelves 161-695 and 176-613



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## 177-560 — Top Hat Assembly, 4 Port, 300 mm

### Features

- Enables the use of single or dual Keysight N5291 modules with Infinity and ACP probes on CM300xi and Elite 300 stations with MicroChamber
- Enables full thermal capability



### Configuration

- Intended for use with positioner assemblies RPP404-EW-120, RPP404-W-120, RPP304-NS-67, RPP304-NS-67

### Compatibility

- CM300xi, Elite300

# CM300xi with Top Chamber

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## SIGMA Kits

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### 127312 — SIGMA for Keysight 42941A, HF

#### Features

- SIGMA Integration of the impedance probe Keysight 42941A into MicroAlign Advanced systems for capacitance measurements by IV method, including:
- On-wafer integration of Keysight 42941A close to the DUT to optimize measurement performance
- Optimized cable length reduces systematic measurement error
- Appropriate feed-through and ultra-short SMA cable for RF pad design
- Requires RPP305-S positioner with arm East/West/4PH or arm East/West/4PH/Mirrored plus |Z|Probe GS or SG and an instrument shelf for optimum instrument connection

#### Compatibility

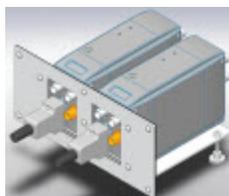
- CM300xi, PA300 MicroAlign, PM300PS

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### 131467 — SIGMA for Keysight E5288A ASU

#### Features

- SIGMA Integration of Keysight E5288A ATTO Sense and Switch Units (ASU) to MicroAlign Advanced systems, including:
- On-wafer integration of one or two ASUs close to the DUT to optimize measurement performance
- For use with any standard triax or triax/Kelvin probe arm and probe arm for DCP probes
- Providing automated I-V and C-V measurements
- Optimized cable length reduces cable capacitance
- For use with DPP2xx/DPP3xx positioners with Triax probe arm and probe arm for DCP probes



#### Compatibility

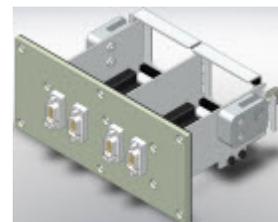
- CM300xi, PA300 MicroAlign, PM300PS

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### 138183 — SIGMA for PreAmp Keithley 4200/6430 (up to 4)

#### Features

- SIGMA Integration of up to 4 Keithley PreAmps for 4200 and 6430 into MicroAlign Advanced systems, includes:
- Optimal integration of up to 4 PreAmps on a single Test Equipment Interface placed close to the DUT
- For use with any standard triax or triax/Kelvin probe arm and probe arm for DCP probes
- High power cabling outside the MicroAlign (provided by Keithley) eliminates tribo-electric effects



#### Compatibility

- CM300xi, PA300 MicroAlign, PM300PS

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### 145265 — SIGMA for IV/CV

#### Features

- SIGMA Integration of Parameter Test Instruments for I-V and C-V measurements into the MicroAlign Advanced systems, includes:
- 2 panels with 4 triax-triax-dual connectors (Force & Sense), and 4 coax-triax connectors (type E1)
- Kelvin connectors (Force & Sense) fit to Keysight 4155/4156/4157, and any other single Triax cable with 3-lug plug
- 4 coax cables with BNC plug for total cable length of 2 m (6.5 ft) for CV measurements
- CommonRing technology for shortest virtual ground close to the DUT
- For use with DPP2xx/DPP3xx positioners with Triax probe arm and probe arm for DCP probes



#### Compatibility

- CM300xi, PA300 MicroAlign, PM300PS

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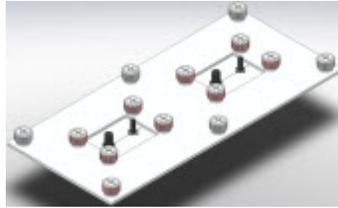
## TEST EQUIPMENT INTERFACES

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### 144987 — Test Equipment Interface, Pico Probe (up to 2)

#### Features

- To connect up to 2 active pico probes to the MicroAlign Advanced
- Includes 1 panel with 2 feedthroughs with integrated cable strain relief



#### Compatibility

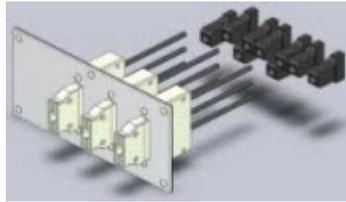
- CM300xi, PA300 MicroAlign, PM300PS

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### 145044 — Test Equipment Interface, PH510 (up to 3)

#### Features

- Feedthrough plate for control lines of up to 3 PH510 for use in a MicroAlign system with Top Chambers
- Not used control lines are covered by a blank plate



#### Compatibility

- CM300xi, PA300 MicroAlign, PM300PS

# Cryogenic and Vacuum

## Miscellaneous Cryogenic and Vacuum System Accessories

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### 49827 — LN<sub>2</sub> Transport Dewar, 120l

#### Features

- Tank head with safety valve, fill level gauge, central ball valve with 12 mm (0.5 in) quick lock fitting
- Fill level gauge
- Internal pressure build-up system

#### Specifications

- Transfer tube DN10/1.5m
- Maximum positive operating pressure: 1.5 bar

#### Compatibility

- Cryogenic systems only



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### 51113 — LHe Transport Dewar 120l

#### Features

- Specified for transportation of liquid helium (LHe) on public roads
- Made of stainless steel
- Connection flange DN 50 KF
- With casters, safety valve, vibration damper and pressure gauge
- Head with safety neck tube, central ball cock and 12 mm (0.5 in) quick lock fitting
- Two side-gated ball valves for pressure relief and bypass valve

#### Specifications

- Maximum overpressure 1.2 bar gauge pressure

#### Compatibility

- Cryogenic systems only



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### 49906 — HF Precision Cable, PC-2.4 50GHz/0.8m with Right Angle Plug Male/Male

#### Features

- Flexible
- Male-right angle male
- Cable length: 0.8 m (32 in)

#### Compatibility

- PMC200, PMV200, PLV50



# PMC200 Wafer Carriers

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## 128027 — Wafer Carrier, 200 mm, PMC200

### Features

- For mounting, fixing and handling of SEMI standard 200 mm (8 in) wafers with FormFactor cryogenic probe stations
- Mounting outside vacuum chamber recommended
- Patented mechanical wafer clamping: mechanical clamping from top by a ring shaped leaf spring (top-side wafer contact only at the edge)
- Contact plate made of nickel/gold coated OFHC copper for best heat contact between wafer and chuck
- Includes holder for 2 RF calibration substrates



### Compatibility

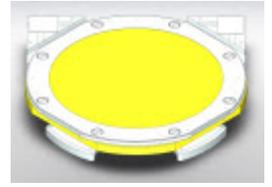
- PMC200

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## 130476 — Wafer Carrier, 100 mm, PMC200

### Features

- For mounting, fixing and handling of SEMI standard 100 mm (4 in) wafers with FormFactor cryogenic probe stations
- Mounting outside vacuum chamber recommended
- Patented mechanical wafer clamping: mechanical clamping from top by a ring shaped leaf spring (top-side wafer contact only at the edge)
- Contact plate made of nickel/gold coated OFHC copper for best heat contact between wafer and chuck
- Includes holder for 2 RF calibration substrates



### Compatibility

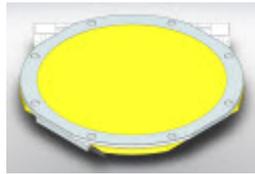
- PMC200

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## 130474 — Wafer Carrier, 150 mm, PMC200

### Features

- For mounting, fixing and handling of SEMI standard 150 mm (6 in) wafers with FormFactor cryogenic probe stations
- Mounting outside vacuum chamber recommended
- Patented mechanical wafer clamping: mechanical clamping from top by a ring shaped leaf spring (top-side wafer contact only at the edge)
- Contact plate made of nickel/gold coated OFHC copper for best heat contact between wafer and chuck
- Includes holder for 2 RF calibration substrates



### Compatibility

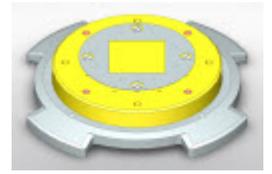
- PMC200

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## 133758 — Substrate Holder, 4K, PMC200

### Features

- For mounting, fixing and handling of small substrates, maximum size 25 x 25 mm (1 x 1 in), with FormFactor cryogenic probe stations. Size and shape of the substrate needs to be specified with the order.
- Includes additional cold shield for achieving lowest sample temperature
- Mounting outside vacuum chamber recommended
- Patented mechanical wafer clamping: mechanical clamping from top by a clamping mask (top-side substrate contact only at the edge)
- Contact plate made of nickel/gold coated OFHC copper for best heat contact between wafer and chuck



### Compatibility

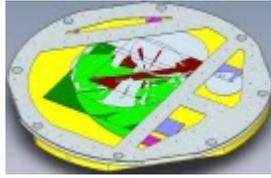
- PMC200

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## 136397 — Universal Carrier, PMC200

### Features

- For mounting, fixing and handling of substrates of different shapes or wafers up to 75 mm (3 in) with FormFactor cryogenic probe stations
- Mounting outside vacuum chamber recommended
- Patented mechanical substrate/wafer clamping: mechanical clamping from top by a universal clamping mask (top-side substrate/wafer contact only at the edge)
- Contact plate made of nickel/gold coated OFHC copper for best heat contact between wafer and chuck



### Specifications

- Maximum substrate dimensions:
  - 76.2 mm (3 in) (full wafer)
  - 150 mm (6 in) (quartered wafer)
  - 76.2 x 76.2 mm (3 x 3 in) or 50 x 110 mm (2 x 4.3 in)

### Compatibility

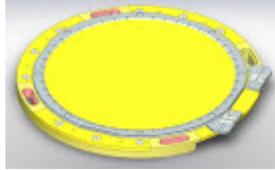
- PMC200

# PMV200 Wafer Carriers

## 142361 — Wafer Carrier, 200 mm, HF-Ready, PMV200

### Features

- For fixing and handling of wafer, wafer fragments and single chips
- Mounting outside vacuum chamber recommended
- Patented mechanical clamping system: mechanical clamping from top by leaf springs (top-side substrate/wafer contact only at the edge)
- Contact plate made of nickel/gold coated OFHC copper for good thermal contact between wafer and chuck
- Includes holder for 2 RF calibration substrates



### Specifications

- Maximum substrate dimensions:
  - 76.2 mm (3 in) (full wafer)
  - 150 mm (6 in) (quartered wafer)
  - 76.2 x 76.2 mm (3 x 3 in) or 50 x 110 mm (2 x 4.3 in)
- Temperature range: -60° to +200°C (-76° to +392°F)

### Compatibility

- PMV200

## 144072 — Universal Carrier, PMV200

### Features

- For fixing and handling of wafer, wafer fragments, and single chips
- Mounting outside vacuum chamber recommended
- Patented mechanical clamping system: mechanical clamping from top by leaf springs (top-side substrate/wafer contact only at the edge)
- Contact plate made of nickel/gold coated OFHC copper for good thermal contact between wafer and chuck
- Includes holder for 2 RF calibration substrates



### Specifications

- Maximum substrate dimensions:
  - 76.2 mm (3 in) (full wafer)
  - 150 mm (6 in) (quartered wafer)
  - 76.2 x 76.2 mm (3 x 3 in) or 50 x 110 mm (2 x 4.3 in)
- Temperature range: -60° to +200°C (-76° to +392°F)

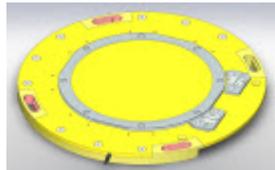
### Compatibility

- PMV200

## 142365 — Wafer Carrier, 150 mm, HF-Ready, PMV200

### Features

- For mounting, fixing and handling of SEMI standard 150 mm wafers
- Mounting outside vacuum chamber recommended
- Patented mechanical clamping system: mechanical clamping from top by a ring shaped leaf spring (top-side wafer contact only at the edge)
- Contact plate made of nickel/gold coated OFHC copper for good thermal contact between wafer and chuck
- Includes holder for 2 HF calibration substrates



### Specifications

- Temperature range: -60° to +200°C (-76° to +392°F)

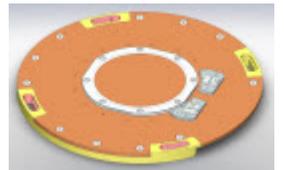
### Compatibility

- PMV200

## 144078 — Wafer Carrier, 100 mm, HF-Ready, PMV200

### Features

- For mounting, fixing and handling of SEMI standard 100 mm wafers
- Mounting outside vacuum chamber recommended
- Patented mechanical clamping system: mechanical clamping from top by a ring shaped leaf spring (top-side wafer contact only at the edge)
- Contact plate made of nickel/gold coated OFHC copper for good thermal contact between wafer and chuck
- Includes holder for 2 HF calibration substrates



### Specifications

- Temperature range: -60° to +200°C (-76° to +392°F)

### Compatibility

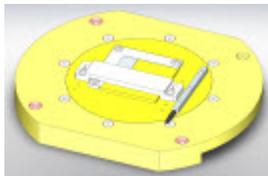
- PMV200

# PLV50 Wafer Carriers

## 140971 — Universal Carrier, PLV50

### Features

- For fixing and handling of wafer, wafer fragments, and single chips
- Mounting outside vacuum chamber recommended
- Patented mechanical clamping system: mechanical clamping from top by leaf springs (top-side substrate/wafer contact only at the edge)
- Clamping on three substrate sides with simple adjustment to the device size by slidable third side piece
- Contact plate made of gold-coated copper for good thermal contact between wafer and chuck



### Specifications

- Maximum substrate dimensions:
  - 50.8 mm (2 in) (full wafer)
  - 100 mm (4 in) (quartered wafer)
  - 50.8 x 50.8 mm (2 x 2 in)
- Temperature range: -60° to +200°C (-76° to +392°F)

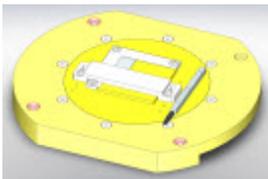
### Compatibility

- PLV50

## 155-905 — Universal Carrier, PLV50, 300°

### Features

- For fixing and handling of wafer, wafer fragments, and single chips
- Mounting outside vacuum chamber recommended
- Patented mechanical clamping system: mechanical clamping from top by leaf springs (top-side substrate/wafer contact only at the edge)
- Clamping on three substrate sides with simple adjustment to the device size by slidable third side piece
- Contact plate made of gold-coated copper for good thermal contact between wafer and chuck



### Specifications

- Maximum substrate dimensions:
  - 50.8 mm (2 in) (full wafer)
  - 100 mm (4 in) (quartered wafer)
  - 50.8 x 50.8 mm (2 x 2 in)
- Temperature range: -60° to +200°C (-76° to +392°F)

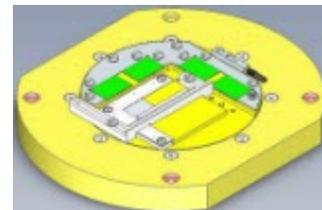
### Compatibility

- PLV50

## 141246 — Universal Carrier, HF-Ready, PLV50

### Features

- For fixing and handling of wafer, wafer fragments, single chips, and up to four (4) HF calibration substrates
- Mounting outside vacuum chamber recommended
- Patented mechanical clamping system: mechanical clamping from top by leaf springs (top-side substrate/wafer contact only at the edge)
- Clamping on three substrate sides with simple adjustment to the device size by slidable third side piece
- Contact plate made of gold-coated copper for good thermal contact between wafer and chuck



### Specifications

- Maximum substrate dimensions:
  - 50.8 mm (2 in) (full wafer)
  - 100 mm (4 in) (quartered wafer)
  - 50.8 x 50.8 mm (2 x 2 in)
- Temperature range: -60° to +200°C (-76° to +392°F)

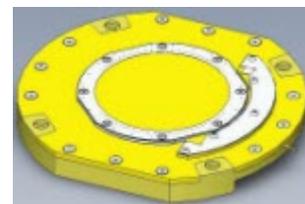
### Compatibility

- PLV50

## 147917 — Wafer Carrier, 100 mm, PLV50

### Features

- For mounting, fixing and handling of SEMI standard 100 mm wafers with Vacuum probe stations
- For use with temperature controlled chuck systems up to 200°C
- Mounting outside vacuum chamber recommended
- Patented mechanical wafer clamping: mechanical clamping from top by a ring shaped leaf spring (top-side wafer contact only at the edge)
- Contact plate made of nickel/gold coated OFHC copper for best heat contact between wafer and chuck



### Specifications

- Temperature range: -60° to +200°C (-76° to +392°F)

### Compatibility

- PLV50

# Test Interface Feedthroughs

## 137196 — Triax High-Vacuum Feedthrough, DN100 ISO-K

### Features

- 4 pcs. hermetically sealed bulk feedthrough type W.W. Fischer WDE103 on 100 mm flange
- 4 pcs. low-noise triax cable 2 m (6.5 ft)

### Compatibility

- PMC200, PMV200, PLV50



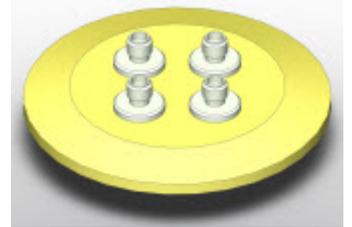
## 141182 — SMA 50 Ohm Feedthrough, DN50 KF

### Features

- Flange plate made from plastics for individually electrically isolated feedthroughs
- Female - female

### Compatibility

- PMC200, PMV200, PLV50

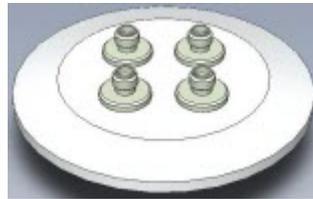


## 137495 — High-Vacuum 4x-HF Feedthrough, DN50KF 40GHz 2.92

### Features

- Four pcs. hermetically sealed electrical bulkhead feedthroughs on a DN50-KF flange for DC to 40 GHz 2.92 connector

### Compatibility



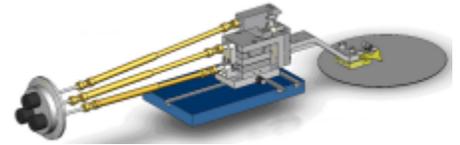
## 141257 — Vacuum Rotary Feedthrough for VCP110

### Features

- Manipulation of one VCP110 from outside vacuum chamber
- Consists of mechanical feedthrough drive and adaptation to VCP110

### Compatibility

- PMC200, PMV200, PLV50



## 137998 — Two SUB-D (50 PIN) Electrical Feedthrough on DN100 HV Flange

### Features

- High vacuum electrical feedthrough of 100 pins, grouped to two 50-pin Sub-D female - female connectors integrated into DN100 flange
- Includes wire harnesses of 2x 40 high vacuum proof cables for connection to probe card

### Compatibility

- PMC200, PMV200, PLV50
- PMC200, PMV200, PLV50



# Replaceable Probe Tips, DC Cables, and Adapters

## Replaceable Probe Tips

### 138-020 — Edge Sense Single Blade Ceramic Needle

#### Features

- Edge Sense
- Single blade ceramic needle

#### Specifications

- For DCP-HTR probe body

#### Kit Contents

- Box of 5

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi

### DCP Replacement Tips

#### Features

- High performance probe tips for modeling and characterization work
- Easily replaceable
- Durable



#### Specifications

- Tip material for DCP-1xxR DC coaxial probes: tungsten
- Tip diameters shown below

#### Kit Contents

- 10 tips per set

#### Compatibility

- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, M150, S300, Alessi

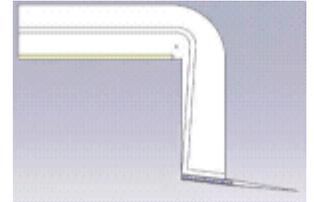
#### Ordering Information

Part Number	Size	Compatibility
107-157	1.5 µm (0.06 mils)	DCP-115R
107-158	5.0 µm (0.2 mils)	DCP-150R
107-159	0.5 µm (0.02 mils)	DCP-105R

### DCP-HTR Replacement Tips

#### Features

- Standard ceramic probe blade
- 7 degree angle
- For use with AttoGuard



#### Specifications

- For DCP-HTR probe body: 19 µm (0.75 mils) diameter
- 10 µm (0.39 mils) diameter

#### Kit Contents

- Box of 10

#### Compatibility

- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, M150, S300, Alessi

#### Ordering Information

Part Number	Tip Radius
154-001	19 µm (0.75 mils)
154-003	10 µm (0.39 mils)

### PTC-12-25 — Specialty Probe Tip, Tungsten Carbide

#### Features

- Tungsten carbide tip

#### Specifications

- 1.2 µm (0.05 mils)
- Straight

#### Kit Contents

- 25 tips per set

#### Compatibility

- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, M150, S300, Alessi



## PTS 24-25 — Specialty Probe Tip, Osmium

### Features

- Osmium tip

### Specifications

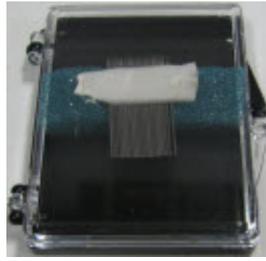
- 2.4  $\mu\text{m}$  (0.09 mils)

### Kit Contents

- 25 tips per set
- Straight

### Compatibility

- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, M150, S300, Alessi



## PTS 24/4-25 — Specialty Probe Tip, Osmium, 45 degree

### Features

- Osmium tip

### Specifications

- 2.4  $\mu\text{m}$  (0.09 mils)
- 45 degree bend

### Kit Contents

- 25 tips per set

### Compatibility

- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, M150, S300, Alessi

## PTT Probe Tips

### Features

- Low cost
- Easily replaceable
- Durable

### Specifications

- Tip material: Tungsten
- Tip diameters shown below
- Shaft diameter: 0.5 mm (0.020 in)

### Kit Contents

- 25 tips per set

### Compatibility

- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, M150, S300, Alessi

### Ordering Information

Part Number	Type	Size
PTT-06-25	Straight	0.6 $\mu\text{m}$ (0.002 mils)
PTT-12-25	Straight	1.2 $\mu\text{m}$ (0.05 mils)
PTT-24-25	Straight	2.4 $\mu\text{m}$ (0.09 mils)
PTT-120-25	Straight	12 $\mu\text{m}$ (0.47 mils)
PTT-250-25	Straight	25 $\mu\text{m}$ (0.98 mils)
PTT 1200-25	Straight	120 $\mu\text{m}$ (4.7 mils)
PTT 1500-25	Straight	150 $\mu\text{m}$ (5.9 mils)
PTT-06/4-25	45° Bend	0.6 $\mu\text{m}$ (0.02 mils)
PTT-12/4-25	45° Bend	1.2 $\mu\text{m}$ (0.05 mils)
PTT-24/4-25	45° Bend	2.4 $\mu\text{m}$ (0.09 mils)
PTT-120/4-25	45° Bend	12 $\mu\text{m}$ (0.47 mils)
PTT-250/4-25	45° Bend	25 $\mu\text{m}$ (0.98 mils)
PTT-70-25	Catwhisker	0.07 $\mu\text{m}$ (0.003 mils)



# DC/CV Triax/BNC Cables

## 100652 — Adapter DC RPP305-S

### Features

- Adapter plate to use standard DPP2xx-S / DPP3xx-S DC arms with RPP305-S

### Compatibility

- RPP305-S



## 100697 — Probe Arm Extension, 70mm

### Features

- 70 mm (2.8 in) extension for all standard DPP2xx-S / DPP3xx-S arms
- Recommended for backside probing setups
- Can be connect in series (recommended maximum of 2)

### Compatibility

- DPP2xx-S, DPP3xx-S



## 100751 — 50 Ohm Coax Cable for DPP105-x-AI 1.5m

### Features

- 50 Ohm coax cable, length 1500 mm (59 in)
- One miniature female HF plug (to positioner)
- One standard male BNC plug
- Also compatible with DC-tip holder (157-451).

### Compatibility

- DPP105-x-AI, 157-451



## 100805 — 50 Ohm Coax Cable for DPP105-x-AI 0.5m

### Features

- 50 Ohm coax cable, length 500 mm (19.7 in)
- One miniature female HF plug (to positioner)
- One standard male BNC plug
- Also compatible with DC-tip holder (157-451)

### Compatibility

- DPP105-x-AI, 157-451



## 103-775 — Parametric Cable, SSMC to DCP-HTR, 2 m

### Features

- Low noise cable kit for current or capacitance parametric test

### Specifications

- Cable length: 2 m (6.5 ft)

### Kit Contents

- Four 104-330-LC triax cables with large to small connector, 60 cm (24 in) length
- Four 104-365 coaxial cable with BNC connector, 140 cm (55 in) length
- Four 104-341 triax to BNC adapter (guard shorted)

### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



## 104-330-LC — Triax Cable, Large to Small Triax Connector, Low Noise, 60 cm

### Features

- Provides a low noise connection between large and small triax connectors

### Specifications

- Cable length: 60 cm (23.5 in)
- Large to small triax (male to male)

### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi

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### 104-334 — Triax Extension Cable, 53 cm

#### Features

- Extends existing triax cables

#### Specifications

- Cable length: 53 cm (21 in)
- Triax to triax (male to male)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



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### 105-148 — Interlock Cable for Keysight 4155-4156

#### Features

- Safety interlock cable for Keysight 4155-4156
- Connects the probe station and the Keysight 4155-4156

#### Specifications

- Cable length: 1.8 m (6-feet) (male to male)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



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### 104-365 — Coaxial Cable with BNC Connector

#### Features

- Connects BNC connectors

#### Specifications

- Cable length: 1.4 m (4.6-feet)
- Coaxial
- BNC to BNC (male to male)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



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### 105-540 — BNC to SSMC Cable, 1 m

#### Features

- Connects the BNC and SSMC connectors

#### Specifications

- Cable length: 1 m (3.3-feet)
- BNC to SSMC (male to male)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



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### 105-001 — Bias Cable, 1.2 m, BNC to SMB Female

#### Features

- Connects BNC and SMB connectors

#### Specifications

- Cable length: 1.2 m (4-feet)
- BNC to SMB (male to female)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



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### 108-138 — Triax Cable Large to Small Triax Connector, Low Noise, 1.8 m

#### Features

- Provides a low noise connection between large and small triax connectors

#### Specifications

- Cable length: 1.8 m (6-feet)
- Large to small triax (male to male)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



### 124-082 — Cable, Eye Pass, 1.2 m, Molex to BNC

#### Features

- Provides single channel connections between the EyePass probe and BNC connector



#### Specifications

- Cable length: 1.2 m (4 ft)
- BNC male to 2-pin Molex (female) connector cable



#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi

### 124-084-B — RF cable 40GHz 2.92 (f)-2.92 (m), 1.2m

#### Features

- Connects 40GHz probes with VNA

#### Specifications

- For signals DC to 40GHz
- Connectors straight 2.92/K (f) to straight 2.92/K (m)
- Length: ~120 cm (48 in)

#### Compatibility

- Most configurations. Ensure close position of VNA.

### 124-085-B — RF cable 50GHz 2.4 (f)-2.4 (m), 1.2m

#### Features

- Connects 50GHz probes with VNA

#### Specifications:

- For signals DC to 50GHz
- Connectors straight 2.4 (f) to straight 2.4 (m)
- Length: ~120 cm (48 in)
- Connector mechanically compatible with 1.85 type

#### Compatibility

- Most configurations. Ensure close position of VNA.

### 124-562 — BNC to SSMC Cable, 2 m

#### Features

- Connects BNC and SSMC connectors

#### Specifications

- Cable length: 2 m (6.5-feet)
- BNC to SSMC (male to male)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



### 127-911 — 42941 Holder and Cable

#### Features

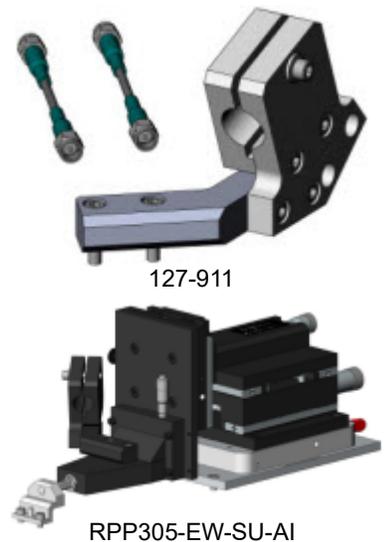
- Holds the 42941 capacitance meter impedance positioner

#### Specifications

- Includes two SMA male to male cables, 7.6 cm (3 in)

#### Compatibility

- Summit
- RPP305-EW-EL-AI, RPP305-EW-SU-AI



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### 132-909 — Triax Cable, large to Small Connector, PureLine, 60 cm

#### Features

- Connects large and small triax connectors

#### Specifications

- Cable length: 60 cm (23.5 in)
- Large to small triax (male to male)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



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### 138-019 — Cable, Edge Sense, SSMC to DCP-HTR, 2 m

#### Features

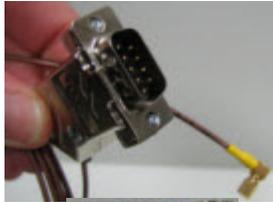
- Connects the SSMC and DCP-HTR probe

#### Specifications

- Cable length: 2 m (6.5-feet)
- SSMC to DCP-HTR probe (male to male)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



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### 146-214 — Coax Cable, SMA to BNC, 61 cm

#### Features

- Connects the SMA and BNC connector

#### Specifications

- Cable length: 61 cm (24 in)
- SMA to BNC (male to male)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi

# DC/CV Adapters

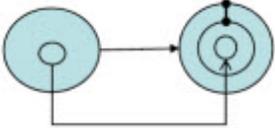
## 104-341 — Triax to BNC Adapter, Guard Shorted

### Features

- Adapts triax to BNC connection

### Specifications

- Guard shorted (male to female)



### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



## 104-372 — Ground Unit Adapter Kit

### Features

- For use with the SMU ground unit

### Kit Contents

- Two triax to triax cables, 25 cm (9.8 in)
- Ground unit bulkhead adapter

### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



## 104-342 — Triax Feed-Thru for Summit Triax Panel

### Features

- Bulkhead adapter for triax connector
- For use with Summit triax panel

### Specifications

- Triax to triax (female to female)

### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



## 104-740 — Triax Shorting Plug

### Features

- Used to terminate the triax chuck

### Specifications

- Triax connector (male) with shorted end

### Compatibility

- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, M150, S300, Alessi



## 104-357 — BNC Feed-Thru for Summit Triax Panel

### Features

- Bulkhead adapter for BNC connector
- For use with Summit triax panel

### Specifications

- BNC (female) to BNC (female)

### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



## 104-743 — Triax EMI Cap

### Features

- Used to cap the end of the triax connector to reduce EMI

### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



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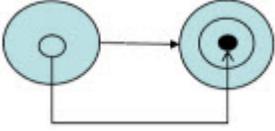
### 104-803 — Triax to BNC Adapter, Guard Floated

#### Features

- Adapts triax to BNC connection

#### Specifications

- Guard floated (male to female)



#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi

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### 104-806 — Triax Tee, Single Male to Dual Female

#### Features

- Splits a single triax input to a dual triax output

#### Specifications

- Triax (male) to dual triax (female)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



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### 104-810 — DCP Mounting Block Kit

#### Features

- Drop down part
- Adapts RPP positioner for use with use DCP probes
- Mounts onto RPP305 positioner
- For use with DCP/SSCM cable

#### Kit Contents

- Four DCP mounting blocks

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi
- All arms for RPP positioners



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### 105-931 — EMI Cover for Triax Adapter Block

#### Features

- Used to cap the end of the triax adapter block to reduce EMI

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



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### 106-510 — BNC Shorting Plug

#### Features

- Used to terminate the coax chuck

#### Specifications

- Coax connector (male) with shorted end

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



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### 106-560 — Triax Adapter, Female to Female

#### Features

- Used to adapt cable end gender or connect triax cables

#### Specifications

- Triax to triax (female to female)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



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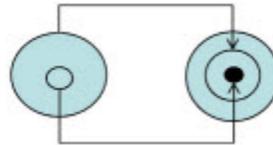
### 106-837 — Triax to BNC Adapter, Guard Thru, No Shield

#### Features

- Adapts triax to BNC connector

#### Specifications

- Guard thru, no shield
- Triax (male) to BNC (female)



#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



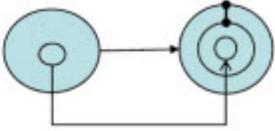
### 108-714 — Adapter BNC Female to Triax Female, Guard Short

#### Features

Adapts triax to BNC connector

#### Specifications

- Guard short
- Triax (female) to BNC (female)



#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



### 108-718 — Adapter, BNC Tee, Female-Male-Female

#### Features

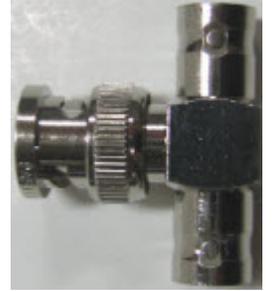
- Adapts BNC to BNC connectors

#### Specifications

- BNC tee
- BNC (female-male-female)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



### 108-715 — Adapter, BNC to BNC Coupler

#### Features

- Adapts BNC to BNC connectors

#### Specifications

- BNC to BNC (female to female)

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



### 123-625 — DCP to DCP Guard Connection Strap

#### Features

- DCP to DCP connection wire for LCR meter

#### Specifications

- Cable length: 7.6 cm (3 in), with DCP/DCP clip

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



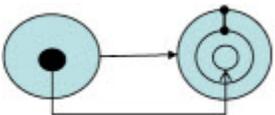
### 108-716 — Adapter, BNC Male to Triax Female, Guard Short

#### Features

- Adapts triax to BNC connector

#### Specifications

- Guard short
- Triax (female) to BNC (male)



#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



### 126-985 — Kit, DCP to DCP Connection Strap

#### Features

- DCP to DCP connection wire kit for LCR meter

#### Kit Contents

- 4 straps (PN 123-625)
- DCP strap tech note

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi



# Cable/Pin Jack Wires for MMP and MPC Probe Holders/Mounts

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## Cable/Pin Jack Wires for MMP and MPC Probe Holders/Mounts

### Features

- Electrical jumper wire for MMP and MPC Probe Holders/Mounts
- Pin jack style connection



### Specifications

#### Compatibility

- CM300xi, Elite 300, Summit, M150, S300, Alessi

#### Ordering Information

- Part Number: See specifications table for cable length selection

PN	Cable length
MAE-44/6	152 mm (6 in)
MAE-44/12	305 mm (12 in)
MAE-44/18	457 mm (18 in)
MAE-44/24	610 mm (24 in)

# Elite 300

## Station Accessories

### CONNECTION PANELS

#### 141-790 — Connection Panel

##### Features

- Complete kit of cable connection panels and accessories
- Optimized for CM300xi and Elite 300 universal accessory mounting rail system
- All accessories can be mounted on the platen simultaneously, in any location (left, right and back sides of the probe station platen).

##### Kit Contents

- 2 Triax connection panels
  - Each panel features 8 Triax (3-lug) feed through connectors (f), and 2 BNC (2-lug) connectors (f).
  - Panel connections support single triax cables and Keysight dual triax SMU cable assemblies
  - (For Keysight Quadrax SMU connections, please contact the factory).

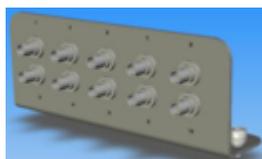


Triax connection panel  
(front view)



Triax connection panel  
(top view)

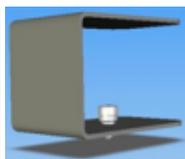
- 1 coaxial connection panel – each panel features 10 BNC (2-lug) connectors (f).
- 2 vacuum manifolds – each manifold features 5 vacuum inlets with integrated on/off pull switches
- 2 positioner mounts – used for holding DPP2xx/DPP3xx positioners above the platen while changing probe tips



Coaxial connection  
panel



Vacuum manifold



Positioner  
mount

##### Compatibility

- Elite 300

### MONITORS

#### 177-398 — Dual LCD Monitor

##### Features

- Adds second LCD screen (20 in) for dual monitor configuration with Elite 300.
- Includes ergonomic dual LCD VESA monitor mounting kit
- Articulated arm for free floating placement of second LCD monitor
- Universal design can mount in multiple different configurations

##### Specifications

- Supports LCD monitor with VESA mount (weight range 5-13 kg [12-29 lb])
- Monitor arm has 406 mm (16 in) height range and tilt/swivel adjustment
- VESA mounting plates (70/100 mm [2.8/3.9 in])
- Second LCD monitor can be mounted in two locations:
  - To the existing Elite 300 LCD monitor mount (both on one side)
  - Alone on the Elite 300 system frame (opposite side to existing LCD monitor)



##### Compatibility

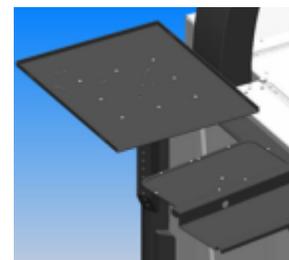
- Elite 300

### ACCESSORY SHELVES

#### 144-340 — Side Accessory Shelf Kit

##### Features

- Side accessory shelf kit easily attaches to the Elite 300 system frame
- Instruments and accessories can be conveniently placed at the side of the Elite 300
- Keyboard/mouse accessory tray allows easy front panel control of test instruments
- Height adjustable
- Adjustable instrument tray can be positioned over the Elite 300



platen surface, allowing test instruments to be located close to probes for short cable interconnects

- Seismic restraint straps and attachment points on swiveling platform

### Specifications

- Maximum load supported by platform: 68 kg (150 lb)
- Dimensions
  - Platform (W x D): 43 x 53 cm (21 x 17 in), Adjustment height: 30.5 cm (12 in)
  - Keyboard/mouse tray (W x D): 50.8 x 44.45 cm (20 x 17.5 in)
  - Adjustment height: None
- Weight
  - Platform and mounting arm: 13.166 kg (29 lb)
  - Keyboard/mouse tray: 9.988 kg (22 lb)

### Kit Contents

- Swiveling instrument/accessory platform
- Mounting hardware
- Keyboard/mouse tray
- Removable/adjustable lower shelf instrument tray
- Removable/adjustable upper shelf
- Seismic restraint straps

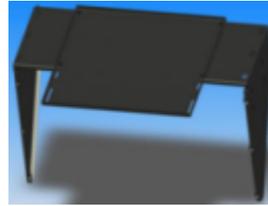
### Compatibility

- Elite 300

- forward: 29 cm (11.41 in)
- Upper shelf (WxD): 120.6 x 47.9 cm (47.48 x 18.86 in), Adjustment height: 24.4 cm (9.60 in)

### Weight

- Lower shelf and tray: 14.98 kg (33 lb)
- Upper shelf: 12.26 kg (27 lb)



Bottom shelf and adjustable instrument tray (forward position)



Bottom shelf

### Kit Contents

- Lower shelf and mounting hardware
- Removable/adjustable lower shelf instrument tray
- Removable/adjustable upper shelf
- Seismic restraint straps

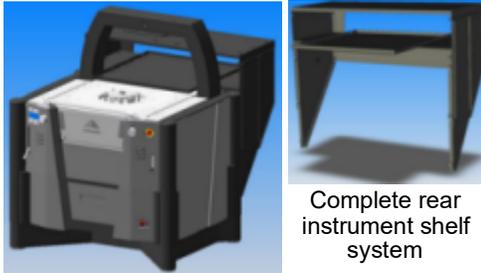
### Compatibility

- Elite 300

## 143-420 — Rear Instrument Shelf System

### Features

- Shelf system easily attaches to the Elite 300 system frame
- Instruments and accessories can be conveniently placed at the rear of the Elite 300
- Seismic restraint straps and attachment points on shelving
- Height adjustable upper shelf
- Adjustable instrument tray can be positioned forward over the Elite 300 platen surface, allowing test instruments to be located close to probes for short cable interconnects



Complete rear instrument shelf system

### Specifications

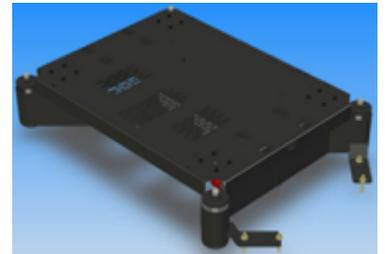
- Maximum supported instrument load
  - Lower shelf and tray: 90.8 kg (200 lb)
  - Upper shelf: 45.4 kg (100 lb)
- Dimensions
  - Lower shelf (WxDxH): 120 x 46 x 76.8 cm (47.24 x 18.11 x 30.23 in)
  - Lower tray (WxD): 75 x 75 cm (29.52 x 29.52 in), Adjustment

## SEISMIC RESTRAINTS

### 143-418 — Seismic Restraints

#### Features

- Provides seismic restraint for Elite 300 station platform
- Installation at time of station facilities setup
- Compatible with Elite standard and low profile height kits



#### Kit Contents

- 4 restraint brackets
- Installation guide and bolt mounting recommendations

#### Compatibility

- Elite 300



Floor restraint bracket

## MOUNTING KITS, PLATES, AND MISCELLANEOUS ACCESSORIES

### 143-428 — Keysight 42941A Mounting Kit

#### Features

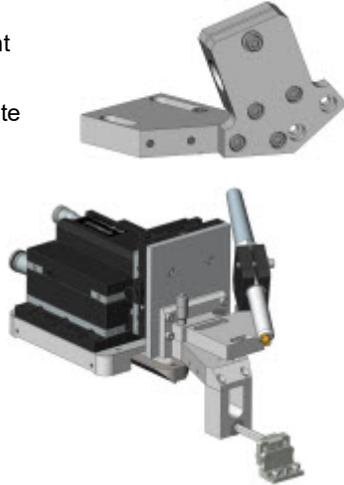
- Mounting bracket to hold Keysight 42941A probe
- Compatible with CM300xi and Elite 300 RPP305 positioners

#### Kit Contents

- 2 cables:
  - SMA (m) to SMA (m)
  - 120 mm (4.7 in)
- Mounting bracket for RPP305-EL positioner

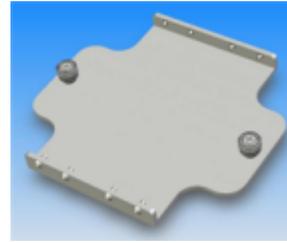
#### Compatibility

- CM300xi, Elite 300



Mounting bracket shown on RPP305 positioner with Keysight high impedance probe

### 144-422 — Mounting Plate for B1500A ASU, E5288A Atto Sense Unit



Mounted plate



Keysight ASU mounted to plate

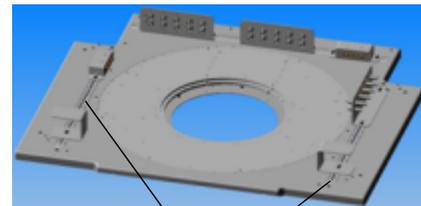
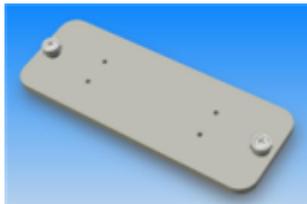


Plate mounts on universal accessory mounting rails

#### Compatibility

- CM300xi, Elite 300

### 143-429 — Mounting Plate for B1500A SCUU



Mounted plate



Keysight SCUU mounted to plate

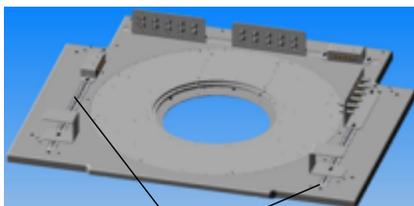


Plate mounts on universal accessory mounting rails

#### Compatibility

- CM300xi, Elite 300

### 177-560 — Top Hat Assembly, 4 Port, 300 mm

#### Features

- Enables the use of single or dual Keysight N5291 modules with Infinity and ACP probes on CM300xi and Elite 300 stations with MicroChamber
- Enables full thermal capability



#### Configuration

- Intended for use with positioner assemblies RPP404-EW-120 and RPP404-W-120, RPP304-NS-67

#### Compatibility

- CM300xi, Elite300

# Lab Accessories and Miscellaneous

## Tables

### 115405 — Vibration Isolation Table, VIT801

#### Features

- 1 pressure input regulator with gauge
- Storage shelf 550 x 320 mm (21.6 x 12.6) at rear bottom
- Support arm systems optionally available



#### Specifications

- W x D x H = 800 x 800 x 750 mm (31.5 x 31.5 x 29.5 in)
- Adjustable two-chamber air damping system with resonance frequency of 2.5Hz
- Automatic load leveling
- Max. load capacity: 360 kg (794 lb)
- Air pressure required: ~1.5 to 4 bar, depending on load
- Normal working pressure: 2 to 3.5 bar

#### Compatibility

- PA200, PM8, MPS150, EPS150

### 117931 — SE1200 EMC Adapter for VIT951/PA300

#### Features

- Connects the SE1200EMC to the PA300 vibration isolating table
- Impacts to the ShieldEnclosure are isolated from the probe station
- Electromagnetically shielding



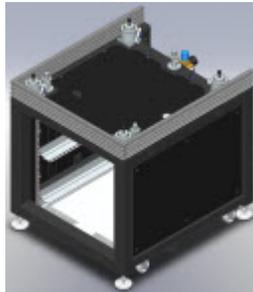
#### Compatibility

- PA300

### 135100 — Vibration Isolation Table, VIT701

#### Features

- For BlueRay and APS/SPS200TESLA use
- Prepared for 483 mm (19 in) devices
- Equipped with docking points for upgrade with BlueRay Loader Module to fully automatic probe station
- Requires compressed air (min. 6 bar, 8 mm [0.31 in] hose).
- Measurement shelf and monitor/keyboard arm optionally available



#### Specifications

- W x D x H = 700 x 700 x 750 mm (27.5 x 27.5 x 29.5 in)
- Adjustable two-chamber air damping system with resonance frequency of 2.5Hz

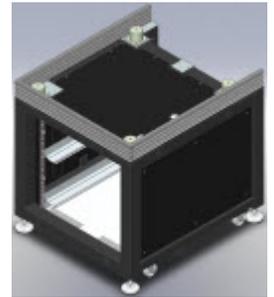
#### Compatibility

- PA200 BlueRay, PA200 DS BlueRay, APS/SPS200TESLA

### 138815 — Probe Station Table 700

#### Features

- For BlueRay and APS/SPS200TESLA use
- Prepared for 483 mm (19 in) devices
- Equipped with docking points for upgrade with BlueRay Loader Module to fully automatic probe station
- Measurement shelf and monitor/keyboard arm optionally available



#### Specifications

- W x D x H = 700 x 700 x 750 mm (27.5 x 27.5 x 29.5 in)

#### Compatibility

- PA200 BlueRay, PA200 DS BlueRay, APS/SPS200TESLA

### 142-032 — Vibration Isolation Table, STANDARD for 200 mm Stations, 40 in x 40 in

#### Features

- Heavy duty frame and steel tabletop
- Integrated rolling casters
- Seismic restraint kit
- Storage shelf below tabletop
- Ergonomic front support bar
- Optional side instrument shelves and accessories available



#### Specifications

- Dimensions:
  - Steel tabletop (W x D): 1016 x 1016 mm (40 x 40 in)
  - Table operating height: 813 mm (32 in)
- Weights:
  - Steel tabletop: 104 kg (230 lb)
  - Complete system (including tabletop): ~218 kg (~480 lb)
- Operation:
  - Optimum air pressure: 25 - 60 psi
  - Input air pressure: min 20 psi (approx.) - max 80 psi
  - Max weight capacity 703 kg (1,150 lb) (@ 80 psi)

- Optimum load on the tabletop is 90-363 kg (200-800 lb)(since the pressure is directly related to the mass sitting on the tabletop, the operating pressure determines this range)
- Vibration isolation: typical performance better than 0db at 6 Hz, with –6 dB per octave roll-off to 48 Hz and >–18 dB attenuation above 48 Hz (with a Summit 12000 series probe station or equivalent load)

### Compatibility

- Summit, M150, BTS

## 177-396 — Vibration Isolation Table, DELUX Package for 200 mm Stations

### Features

- Heavy duty frame and steel tabletop
- Integrated rolling casters
- Seismic restraint kit
- Storage shelf below tabletop
- Ergonomic front support bar
- Optional side instrument shelves and accessories available
- Computer accessory mounting kit for keyboard, mouse, joystick
- Multi-directional LCD monitor support arm (VESA).
- Enclosed system (side walls and front access door).



### Specifications

- Dimensions:
  - Steel tabletop (W x D): 1016 x 1016 mm (40 x 40 in)
  - Table operating height: 813 mm (32 in)
- Weights:
  - Steel tabletop: 104 kg (230 lb)
  - Complete system (including tabletop): ~218 kg (~480 lb)
- Operation:
  - Optimum air pressure: 25 - 60 psi
  - Input air pressure: min 20 psi (approx.) - max 80 psi
  - Max weight capacity 703 kg (1,550 lb) (@ 80 psi)
  - Optimum load on the tabletop is 90-363 kg (200-800 lb) (since the pressure is directly related to the mass sitting on the tabletop, the operating pressure determines this range)
  - Vibration isolation: typical performance better than 0 db at 6 Hz, with –6 dB per octave roll-off to 48 Hz and >–18 dB attenuation above 48 Hz (with a Summit 12000 series probe station or equivalent load)

### Compatibility

- Summit

## 143-567 — Side Instrument Shelf for Table

### Features

- Universal design can mount on left or right side of table
- Heavy duty design can hold multiple instruments
- Easy mounting enables quick reconfiguration



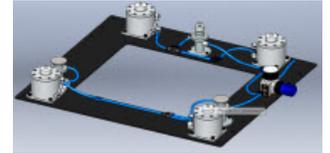
### Specifications

- Dimensions:
  - Side shelf (W x D): 533 x 1016 mm (21 x 40 in), positioned with a 25.4 mm (1 in) space between the side shelf and main steel tabletop
  - Table width (with 2 side shelves installed, left and right): 2184.4 mm (86 in)

## 169-130 — Vibration Isolation Platform VIP601

### Features

- Compact, vibration dampening platform
- Suitable for MPS150 and EPS150 probe stations



### Specifications

- Dimensions (WxDxH): 598 x 530 x 87 mm (23.5 x 20.9 x 3.4 in)
- Max. load at 4 bar: 530N per damper
- Max load capacity at nominal pressure (4 bar): 200 kg
- Internal frequency: 2.5 Hz (vert.), 2.5 Hz (hor.), depending on load

### Compatibility

- MPS150, EPS150 and also with SE750

## 171-512 — Optional Cover and Earthquake Kit for VIP601

### Features

- Cover for VIP601
- Earthquake protection



### Specifications

- Fixed link between probe station and platform provides seismic stability
- Enables probe station movement together with the platform in case of relocation or a seismic event

### Compatibility

- VIP601
- Not configurable with EPS-ACC-SE750-COAX and EPS-ACC-SE750-TRX (earthquake protection already included)

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## 146117 — Table for SE750

### *Features*

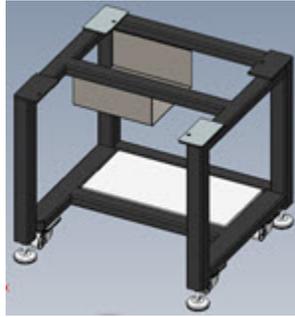
- Table for SE750 Shield Enclosure
- Heavy duty frame
- Integrated rolling casters

### *Specifications*

- Dimensions (WxDxH): 720 x 668 x 653 mm (28.3 x 26.3 x 25.7 in)

### *Compatibility*

- Shield Enclosure SE750 is required
- Configuration with VIP601 requires SE750
- Configuration with station requires SE750

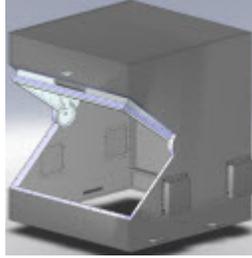


# Shield Enclosures/Dark Boxes

## 111650 — Shield Enclosure, SE1200 EMC

### Features

- For standard probe systems PM300 and PA300 (others on request).
- Light-tight, electrically grounded and optimized design for EMC shielding
- Vizor opening
- Requires additional feed-throughs and table adaptation
- Requires EMO option in combination with (semiautomatic) PA300.
- Inside light and interlock switch optional
- Clean room compliant field upgrades are not possible
- Four people are required to complete field upgrade installation



### Specifications

Required floor space:

- Width = 1.5 m (59 in)
- Depth = 1.3 m (51.2 in)
- Height (with table): 2.1 m (82.7 in)

### Compatibility

- PA300, PM300

- Adaptation to VIT70x (PN 138390)
- VIT700 (PN 138815) or VIT701 (PN 135100) for BlueRay
- Adaptation SE1000EMC to VIT801 (PN 119585)
- Vibration isolation table VIT801 (PN 115405)

### Options:

- 100689 EMC light-tight feed-through
- 112392 EMC test equipment interface, standard
- 112391 EMC test equipment interface, Kelvin

### Compatibility

- PA200, PA200 BlueRay, PM8, MPS150, EPS150

## 100689 — EMC Light-Tight Feedthrough

### Features

- For SE750EMC, SE1000EMC and SE1200EMC.
- Electromagnetically shielded
- For probe station, thermal chuck and video wiring



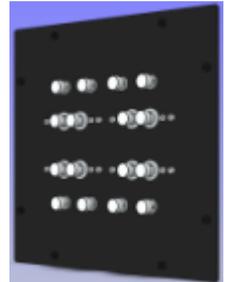
### Compatibility

- Shield enclosures: SE750, SE1000, SE1200

## 112391 — EMC Test Equipment Interface, Kelvin

### Features

- For test equipment adaptation (e.g., HP4142/4156B)
- 4 triax-triax-dual (Kelvin) and 8 coax-coax feedthroughs



### Compatibility

- Shield enclosures: SE750, SE1000, SE1200

## 112392 — EMC Test Equipment Interface, Standard

### Features

- For adapting test equipment
- One plate with 8 triax-triax and 8 coax-coax feedthroughs



### Compatibility

- Shield enclosures: SE750, SE1000, SE1200

## 138121 — Shield Enclosure, SE1000 EMC with Interlock and Illumination

### Features

- For standard probe systems PM5 (with laser cutter), PM8 and PA200 (others on request).
- Light-tight, electrically grounded and optimized design for EMC shielding
- With lamps inside and interlock switch at front door
- Requires additional feed-throughs and table adaptation
- Requires EMO option in combination with (semiautomatic) PA200
- Clean room compliant field upgrades are not possible
- Four people are required to complete field upgrade installation



### Specifications

Required floor space:

- Width = 1.3 m (51.2 in)
- Depth (with front lid opened) = 2 m (78.7 in)
- Height (with table and front lid opened): 2.5 m (98.4 in)
- Requires:

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## EPS-ACC-SE750-COAX — Shield Enclosure

### Features

- Light-tight and EMI-shielded environment
- Stable table required as base
- Includes media feedthrough, test equipment interface with 5 coax-coax measurement feedthroughs, and opening for one additional test equipment interface



### Specifications

- Width: 750 mm (29.5 in)
- Depth: 750 mm (29.5 in)
- Height: 820 mm (32.3 in) (door closed), 1620 mm (63.8 in) (door open)
- DC-noise reduction (1 Sigma) between -20dB and -40dB depending on measurement environment
- Depending on measurement environment up to 100 femtoampere (fA) will be possible

### Compatibility

- EPS150, MPS150 (without laser cutter)

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## EPS-ACC-SE750-TRX — Shield Enclosure

### Features

- Light-tight and EMI-shielded environment
- Stable table required as base
- Includes media feedthrough, test equipment interface with 1x12 mm RF and 6x triax-triax measurement feedthroughs, and opening for one additional test equipment interface



### Specifications

- Width: 750 mm (29.5 in)
- Depth: 750 mm (29.5 in)
- Height: 820 mm (32.3 in) (door closed), 1620 mm (63.8 in) (door open)
- Depending on measurement environment up to 100 femtoampere (fA) will be possible

### Compatibility

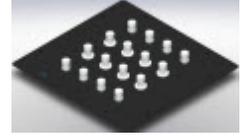
- EPS150, MPS150 (without laser cutter)

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## 112392 — EMC Test Equipment Interface, Standard

### Features

- For test equipment adaptation
- Includes 8 triax-triax and 8 coax-coax feedthroughs



### Compatibility

- Shield Enclosures

# Mounting Accessories

## 138600 — Single Monitor Arm

### Features

- Single arm for a flat panel display (up to 24 in)
- Compact design frees up space
- Lift: 33 cm (13 in)
- Tilt/Pan: 80°/180°, rotation: 90°

### Compatibility

- PA300, PA300PS-MA, PA200 BlueRay, VIT801



## 148858 — Dual Monitor Arm

### Features

- Two single arms for flat panel displays (up to 24 in)
- Compact design frees up space, monitor position beside and above each other possible
- Lift: 33 cm (13 in)
- Tilt/Pan: 80°/180°, rotation: 90°
- Dual DVI-card for control PC included

### Compatibility

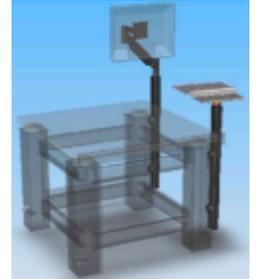
- PA300, PA300PS-MA, PA200 BlueRay, VIT801



## 177-395 — LCD, Keyboard, Joystick and Mouse Mounting Kit for Vibration Isolation Table

### Features

- Ergonomic platform for computer keyboard, mouse, joystick
- LCD monitor support (VESA) with articulated arm for free floating placement
- Universal design can mount on left or right side of table
- Easy mounting allows for quick reconfiguration



### Specifications

- Supports LCD monitor with VESA mount (weight range 5-13 kg [12-29 lb])
- Monitor arm has 406 mm (16 in) height range, and tilt/swivel adjustment
- VESA mounting plates (70/100 mm)
- Accessory mounting posts (2) are height adjustable

### Compatibility

- 142-032

## 138846 — Control Console

### Features

- For mouse, joystick control panel and compact size keyboard
- Compatible with VIT801, PA300, and MicroAlign systems
- Can be installed on front left or right side

### Compatibility

- PA300, PA200, PA200 BlueRay, VIT801



# Miscellaneous Accessories

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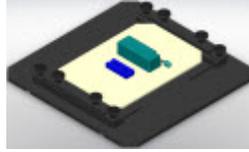
## 100422 — Textool Socket Adapter

### Features

- For holding of PC boards with 50-130 mm width
- Adapter is vacuum clamped onto chuck

### Compatibility

- Vacuum chucks



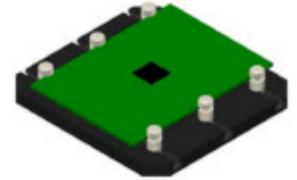
- Pack of 10

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## 157-842 — Universal DUT Board Holder

### Features

- For isolated holding of PC boards with up to 150 mm (6 in) width
- Adapter is vacuum clamped onto chuck



### Specifications

- Max. board thickness up to 2.5 mm (0.09 in)

### Compatibility

- MPS150, PM8, PA200, PM300

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## 100539 — Vacuum Switches for HF Chuck

### Features

- Block with two vacuum switches for HF chucks
- Controls vacuum for calibration substrates and burnishing pads



### Specifications

- Contained in HF Kit for PA200, PM8 III, PA300 and PM300

### Compatibility

- PA300, PM300, PA200, PM8, PM300PS

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## 100605 — Inker, DPP2xx/DPP3xx

### Features

- Fits positioners DPP2xx-S, DPP3xx-S.
- Can be used in combination with probe cards
- Can be used with software inker output, or a driver unit when used with manual systems
- Includes cartridge holder



### Compatibility

- DPP2xx-S, DPP3xx-S

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## 145530 — Inker Cartridge, Markem 6990

### Features

- Markem ink type 6990, color: black
- Alcohol soluble, relatively thin, flows very consistently, requires heat curing
- After opening, the cartridge can be used for about 5 days

### Specifications

- Order requires one of the following configurations to be specified:
  - DM-1 5,8,10,15,20,25,30 mil
  - DM-1.25 10,15,20,25 mil
  - DM-S 10,15 mil
- Shelf life: 4 months

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## 161-096 — Analogue Separation Drive Display for MPS150 Universal Platen

### Features

- Displays positioner platen z-height
- For use with MPS150/EPS150 universal platen
- Enables exact overtravel adjustment



### Specification

- 10 µm (0.39 mils) division marks
- 1 turn = 1 mm (0.04 in)
- Adjustable 0 position

### Compatibility

- MPS150 / EPS150 (universal platen)

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## 164-486 — Analogue Separation Drive Display for MPS150 MMWPlaten

### Features

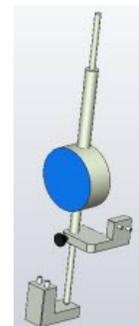
- Displays positioner platen z-height
- For use with MPS150 MMW platen
- Enables exact overtravel adjustment

### Specification

- 10 µm (0.39 mils) division marks
- 1 turn = 1 mm (0.04 in)
- Adjustable 0 position

### Compatibility

- MPS150 (MMW platen)



## 164-917— Air Drying Unit

### Features

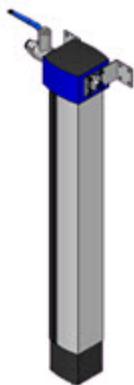
- Membrane air dryer (internal purge air consumption 120 l/min [4.2 CFM])
- Integrated nano filter
- No electric power required
- Designed for wall mounting

### Specifications

- Dimensions (HxWxD): 805 x 100 x 81 mm (31.7 x 3.9 x 3.2 in.)
- Input CDA requirements
  - Minimum inlet pressure 7 bar/0.7 MPa/101.5 psi
  - Oil-free, particle-free (<1 µm), pressure dew point < +3°C (37.4°F)
- Outlet pressure dew point depending on inlet pressure, inlet pressure dew point and flow rate
- Purge air 120 l/min (4.2 CFM)
- Requires yearly exchange of filter unit

### Application Example

- Inlet pressure 7 bar/0.7 MPa/101.5 psi, inlet pressure dew point +3°C (37.4°F), inlet air flow 570 l/min (20.1 CFM)
- Outlet pressure dew point < -20°C (-4°F)
- Outlet air flow 450 l/min (15.9 CFM)



### System Compatibility

- BTS 1000, BTS 2000, BTS-VERT
- PM5/EPS150, PM8/EPS200, PM300, Summit, PA200/PA200BR, SUMMIT200-SA, T200/TESLA200

## 183-838 — Vacuum Pump Kit Including Vacuum Buffer Reservoir

### Features

- Portable vacuum system for semi- and fully-automated probe stations (e.g., one CM300 with one MHU301)
- Intended for facilities without house vacuum system
- For standard use cases only. In case of non-standard use cases, an additional pump kit (PN 183-000) can be added in parallel

### Specifications

- Oil-less design, noise level typ. 45 dBA
- Rated power 40 W, safety class IP40, 5 kg
- Air flow 11.3/14.2 l/min (0.4/0.5 CFM) (50/60Hz) @ vacuum 75 torr
- Air flow 11.7/14.2 l/min (0.41/0.5 CFM) (50/60Hz) @ vacuum 100 mbar
- Rated for 100% continuous duty
- Switchable 100-120 V or 200-230 V @ 50&60 Hz (IEC 60320/C15 socket)
- Connector cable purchased separately
- Includes silencer
- Includes 3 m (10 ft) connection tube with 8 mm (0.3 in) diameter
- Includes 10 l vacuum buffer reservoir
- Dimensions (L x W x H):
  - Pump = 247 x 121 x 145 mm
  - Buffer reservoir = 558 x 162 x 195 mm

### Compatibility

- CM300, TESLA300, SUMMIT200-FA, TESLA200-FA

## 183-000 — Portable Vacuum System

### Features

- Medium capacity portable vacuum system for manual and semiautomatic probe stations and vacuum based accessories
- Intended for facilities without house vacuum system



### Specifications

- Oil-less design, noise level typ. 45dBA
- Rated power 40W, safety class IP40, 5 kg (11 pounds)
- Air flow 11.3/14.2 l/min (0.4/0.5 CFM) (50/60Hz) @ vacuum 75 torr
- Air flow 11.7/14.2 l/min (0.4/0.5 CFM) (50/60Hz) @ vacuum 100 mbar
- Rated for 100% continuous duty
- Switchable 100-120V or 200-230V @ 50&60Hz (IEC 60320/C15 socket)
- Connector cable purchased separately
- Includes silencer
- Includes 3 m (9.8 ft) connection tube with 8 mm (0.3 in) diameter
- Pump dimensions (L x W x H): 247 x 121 x 145 mm

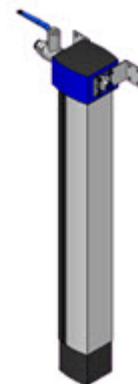
## 192-085 — Air Drying Unit

### Features

- Membrane air dryer (internal purge air consumption 150 l/min [5.3 CFM])
- Integrated nano filter
- No electric power required
- Designed for wall mounting

### Specifications

- Dimensions (HxWxD): 805 x 100 x 81 mm (31.7 x 3.9 x 3.2 in.)
- Input CDA requirements:
  - Minimum inlet pressure 7 bar/0.7 MPa/101.5 psi
  - Oil-free, particle-free (<1 µm), pressure dew point < +3°C (37.4°F)



- Purge air 150 l/min (5.3 CFM)
- Outlet pressure dew point depending on inlet pressure, inlet pressure dew point and flow rate
- Requires yearly exchange of filter unit

### Application Example

- Inlet pressure 7 bar/0.7 MPa/101.5 psi, inlet pressure dew point +3°C (37.4°F), inlet air flow 390 l/min (13.8 CFM)
- Outlet pressure dew point -45 °C (-49 °F)
- Outlet air flow 240 l/min (8.5 CFM)

## M150-ACC-13 — Vacuum Manifold, Magnetic Base

### Features

- 5 port vacuum manifold
- Magnet base mounts at the most convenient location (e.g., on platen)
- For use with vacuum based positioners or other vacuum based accessories
- Easy push-pull on/off controls



### Specifications

- Input connection: 3 mm (1/8 in) ID push on connector
- Output connections: 1.5 mm (1/16 in) ID

### Compatibility

- CM300xi, TESLA300, Elite 300, SUMMIT200, TESLA200, Summit, T200, M150, Alessi

## M150-ACC-16 — Magnetic Cable Clamp Kit

### Features

- Magnetic base cable clamp
- Enables easy cable routing
- Helps to minimize cable vibration that can affect measurements
- Groove in base holds cable securely



### Kit Contents

- Each kit includes the necessary hardware for one cable
- Maximum cable diameter = 3 mm (1/8-inch)
- Must be used with steel base

### Compatibility

- CM300xi, TESLA300, Elite 300, PM300, SUMMIT200, TESLA200, Summit, T200, M150, Alessi

## M150-ACC-18 — Pin to Banana Interface Kit

### Features

- Six port pin jack to banana jack interface with magnetic base
- Used with unshielded probes (e.g., MMP-01 or 139-332) to convert to a banana style output
- Magnet base enables convenient placement based on your positioner locations



### Kit Contents

- One 6 port interface

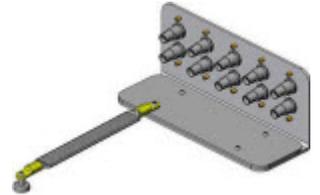
### Compatibility

- CM300xi, TESLA300, Elite 300, PM300, SUMMIT200, TESLA200, Summit, T200, M150, Alessi

## M150-ACC-19 — Triax Panel, Magnetic Base

### Features

- Triax connection panel for convenient cable management
- Magnet base enables convenient placement based on your positioner location
- 10 Triax (3-lug) feed through connectors (female)
- Panel connections support single triax cables and Keysight dual triax SMU cable assemblies. For Keysight Quadrx SMU connections, please contact the factory.



### Kit Contents

- Magnet base connection panel
- Ground strap

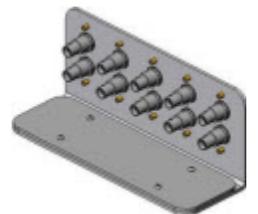
### Compatibility

- CM300xi, TESLA300, Elite 300, PM300, SUMMIT200, TESLA200, Summit, T200, M150, Alessi

## M150-ACC-28 — Coax Panel, Magnetic Base

### Features

- Coaxial connection panel for convenient cable management
- Magnet base allows for convenient placement based on your positioner location
- 10 Coaxial feed through connectors (female)



### Kit Contents

- Magnet base connection panel
- Ground strap

### ***Compatibility***

- CM300xi, TESLA300, Elite 300, PM300, SUMMIT200, TESLA200, Summit, T200, M150, Alessi

# Manual Stations

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## PM8

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### 100507 — Supply Kit for Vacuum Adapter

#### Features

- For vacuum clamping of positioners on magnetic or HF platen

#### Compatibility

- PM8

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### 190-243 — ATT Auxiliary Chuck 160/200 mm for ISS up to 22.2mm

#### Features

- Additional chuck for one calibration Substrate, custom ISS and/or burnishing pad up to 22.2mm\*22.2mm, for 160mm or 200mm ATT thermal chuck
- Up to two additional chucks can be mounted at front-left and front-right position
- Requires vacuum switches for HF chuck:
  - PN 100539 for PA200/PM8



#### Compatibility:

- PA200, PA200 BlueRay, PM8 with 160 mm (6 in) / 200 mm (8 in) ATT thermal chuck

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## PM300

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### 133270 — Additional Chuck for Two Substrates

#### Features

- Additional chuck for 2 calibration substrates and/or burnishing pads

#### Compatibility

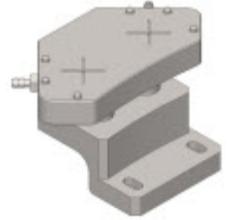
- PM300

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### 190-244 — ATT Auxiliary Chuck 300 mm dual for ISS up to 22.2mm

#### Features

- Additional chuck for two calibration substrates, custom ISS and/or burnishing pad up to 22.2mm\*22.2mm, for 300mm ATT thermal chuck
- Can be mounted at front-left position
- Requires vacuum switches for HF chuck (PN 100539)



#### Compatibility:

- PA300, PM300 with 300 mm ATT thermal chuck, PM300PS

# Microscopes

## eVue IV

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### 181-123 — eVue IV Digital Imaging System, 10X, Remote Focus, Pro Package, for CM300 (no focus block, for motorized transport)

#### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



#### Specifications

- 2 optical paths
- 4 mm fine focus Z drive range
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- Auto focus
- Multi view with two screens
- 45.5 fps video frame rates (1024 x 768)
- 13.1 fps video frame rates (2048 x 1536)
- 0.5 - 5.0X zoom range

#### Kit Contents

- Integrated LED illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module

#### Compatibility

- CM300xi

#### Requirements

- Velox probe station control software
- Velox 2.4 or later

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### 181-124 — eVue IV Digital Imaging System, 10X, Remote Focus, for CM300 (no focus block, for motorized transport)

#### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical damage between lens and probes
  - Stops all system motion and warns of unobserved contact



#### Specifications

- 2 optical paths
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- 45.5 fps video frame rates (1024 x 768)
- 0.5 - 5.0X zoom range
- 4 mm fine focus range

#### Kit Contents

- Integrated LED Illumination system
- USB remote control box
- Digital video PC interface card

- Video processing software
- Probe station software integration module

### Compatibility

- CM300xi

### Requirements

- Velox probe station control software
- Velox 2.4 or later

---

## 181-133 — eVue IV Digital Imaging System, 40X, Remote Focus, Pro Package, for CM300 (no focus block, for motorized transport)

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 3 optical paths
- 4 mm fine focus Z drive range
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- Auto focus
- Multi view with three screens
- 45.5 fps video frame rates (1024 x 768)
- 13.1 fps video frame rates (2048 x 1536)
- 0.5 - 20.0X zoom range

### Kit Contents

- Integrated LED Illumination system
- USB remote control box

- Digital video PC interface card
- Video processing software
- Probe station software integration module

### Compatibility

- CM300xi

### Requirements

- Velox probe station control software
- Velox 2.4 or later

---

## 181-134 — eVue IV Digital Imaging System, 40X, Remote Focus, for CM300 (no focus block, for motorized transport)

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 3 optical paths
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- 45.5 fps video frame rates (1024 x 768)
- 0.5 - 20.0X zoom range

### Kit Contents

- Integrated LED Illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module

### Compatibility

- CM300xi

### Requirements

- Velox probe station control software
- Velox 2.4 or later

---

## 181-121 — eVue IV Digital Imaging System, 10X, Remote Focus, for Elite 300 (no focus block)

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 2 optical paths
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- 45.5 fps video frame rates (1024 x 768)
- 0.5 - 5.0X zoom range

### Kit Contents

- Integrated LED Illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module

### Compatibility

- Elite 300, T300

### Requirements

- Velox Probe station control software
- Velox 2.4 or later

---

## 181-131 — eVue IV Digital Imaging System, 40X, Remote Focus, for Elite 300 (no focus block)

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 3 optical paths
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- 45.5 fps video frame rates (1024 x 768)
- 0.5 - 20.0X zoom range

### Kit Contents

- Integrated LED Illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module

### Compatibility

- Elite 300, T300

### Requirements

- Velox Probe station control software
- Velox 2.4 or later

---

## 181-122 — eVue IV Digital Imaging System, 10X, Remote Focus, Pro Package, for Elite 300 (no focus block)

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 2 optical paths
- 4 mm fine focus Z drive range
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- Auto focus
- Multi view with two screens
- 45.5 fps video frame rates (1024 x 768)
- 13.1 fps video frame rates (2048 x 1536)
- 0.5 - 5.0X zoom range

### Kit Contents

- Integrated LED illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module

### Compatibility

- Elite 300, T300

### Requirements

- Velox Probe station control software
- Velox 2.4 or later

---

## 181-132 - eVue IV Digital Imaging System, 40X, Remote Focus, Pro Package, for Elite 300 (no focus block)

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 3 optical paths
- 4 mm fine focus Z drive range
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- Auto focus
- Multi view with three screens
- 45.5 fps video frame rates (1024 x 768)
- 13.1 fps video frame rates (2048 x 1536)
- 0.5 - 20.0X zoom range

### Kit Contents

- Integrated LED illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module

### Compatibility

- Elite 300, T300

### Requirements

- Velox Probe station control software
- Velox 2.4 or later

---

## 181-125 — eVue IV Digital Imaging System, 10X, Remote Focus

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 2 optical paths
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- 45.5 fps video frame rates (1024 x 768)
- 0.5 - 5.0X zoom range

### Kit Contents

- Integrated LED Illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module

### Compatibility

- SUMMIT200, TESLA200, Summit 12000

### Requirements

- Velox Probe station control software
- Velox 2.4 or later

---

## 181-135 — eVue IV Digital Imaging System, 40X, Remote Focus

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 3 optical paths
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- 45.5 fps video frame rates (1024 x 768)
- 0.5 - 20.0X zoom range

### Kit Contents

- Integrated LED Illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module

### Compatibility

- SUMMIT200, TESLA200, Summit 12000

### Requirements

- Velox Probe station control software
- Velox 2.4 or later

---

## 181-126 — eVue IV Digital Imaging System, 10X, Remote Focus, Pro Package

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 2 optical paths
- 4 mm fine focus Z drive range
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- Auto focus
- Multi view with two screens
- 45.5 fps video frame rates (1024 x 768)
- 13.1 fps video frame rates (2048 x 1536)
- 0.5 - 5.0X zoom range

### Kit Contents

- Integrated LED illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module

### Compatibility

- SUMMIT200, TESLA200, Summit 12000

### Requirements

- Velox Probe station control software
- Velox 2.4 or later

---

## 181-136 — eVue IV Digital Imaging System, 40X, Remote Focus, Pro Package

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 3 optical paths
- 4 mm fine focus Z drive range
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- Auto focus
- Multi view with three screens
- 45.5 fps video frame rates (1024 x 768)
- 13.1 fps video frame rates (2048 x 1536)
- 0.5 - 20.0X zoom range

### Kit Contents

- Integrated LED illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module

### Compatibility

- SUMMIT200, TESLA200, Summit 12000

### Requirements

- Velox Probe station control software
- Velox 2.4 or later

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## 181-127 — eVue IV Digital Imaging System, 10X, R-focus for manual stations (Velox, Ctrl, LCD), Standalone

Complete eVue IV Digital Imaging System for standalone use with manual probe stations and package/board test systems (upgradeable to Pro version)

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 2 optical paths
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- 45.5 fps video frame rates (1024 x 768)
- 0.5 - 5.0X zoom range

### Kit Contents

- Integrated LED Illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module
- Windows 10 - High performance computer
- Latest Velox Probe station control software
- 24 inch LCD monitor
- 2 inch Heavy duty focus block

### Compatibility

- Manual probe stations and package/board test systems

### Requirements

- Velox Probe station control software

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## 181-128 — eVue IV Digital Imaging System, 10X, R-focus, Pro package for manual stations (Velox, Ctrl, LCD)

Complete eVue IV Digital Imaging System for standalone use with manual probe stations and package/board test systems (upgradeable to Pro version)

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 2 optical paths
- 4 mm fine focus Z drive range
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- Auto focus
- Multi view with two screens
- 45.5 fps video frame rates (1024 x 768)
- 13.1 fps video frame rates (2048 x 1536)
- 0.5 - 5.0X zoom range

### Kit Contents

- Integrated LED Illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module

- Windows 10 - High performance computer
- Latest Velox Probe station control software
- 24 inch LCD monitor
- 2 inch Heavy duty focus block

### Compatibility

- Manual probe stations and package/board test systems

### Requirements

- Velox Probe station control software

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## 181-137 — eVue IV Digital Imaging System, 40X, R-focus for manual stations (Velox, Ctrl, LCD)

Complete eVue IV Digital Imaging System for standalone use with manual probe stations and package/board test systems (upgradeable to Pro version)

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 3 optical paths
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- 45.5 fps video frame rates (1024 x 768)
- 0.5 - 20.0X zoom range

### Kit Contents

- Integrated LED Illumination system
- USB remote control box
- Digital video PC interface card

- Video processing software
- Probe station software integration module
- Windows 10 - High performance computer
- Latest Velox Probe station control software
- 24 inch LCD monitor
- 2 inch Heavy duty focus block

### Compatibility

- Manual probe stations and package/board test systems

### Requirements

- Velox probe station control software

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## 181-138 — eVue IV Digital Imaging System, 40X, R-focus, Pro package for manual stations (Velox, Ctrl, LCD)

Complete eVue IV Digital Imaging System for standalone use with manual probe stations and package/board test systems (upgradeable to Pro version)

### Features

- Multi lens design
  - Quick and easy probe tip navigation
  - Maximizes field-of-view
  - High magnification
- Longer focus range
  - Z drive can work in the same range as the chuck
  - Shadow-free view of the corresponding features
- Intelligent objective lens mount
  - Automatically configure and optimize performance
  - Easy lens exchange
- Advanced design
  - cTUVus certified and CE
  - Compatible with TopHat for perfect shielding
  - Compatible with high-voltage measurements
- Extended lifetime
  - 24/7 operating, increased MTBF
  - No internal maintenance required
- Intelligent collision detection system
  - Protects the measurement setup
  - Prevents involuntary mechanical contact between lens and probes
  - Stops all system motion and warns of unobserved contact



### Specifications

- 3 optical paths
- 4 mm fine focus Z drive range
- 0.2  $\mu\text{m}$  (0.008 mils) Z drive resolution
- Auto focus
- Multi view with three screens
- 45.5 fps video frame rates (1024 x 768)

- 13.1 fps video frame rates (2048 x 1536)
- 0.5 - 20.0X zoom range

### ***Kit Contents***

- Integrated LED Illumination system
- USB remote control box
- Digital video PC interface card
- Video processing software
- Probe station software integration module
- Windows 10 - High performance computer
- Latest Velox probe station control software
- 24 inch LCD monitor
- 2 inch Heavy duty focus block

### ***Compatibility***

- Manual probe stations and package/board test systems

### ***Requirements***

- Velox probe station control software

# eVue Pro Package Upgrade Kit

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## 131-964 — Pro Package Upgrade Kit for eVue generation I, II and III

Upgrades the basic eVue (generation I, II and III) to include all the features of the PRO features of the PRO.

### *Features*

- High Performance Pro Package upgrade for eVue Digital Imaging Systems
- Valid for basic 10X and 40X systems

### *Specifications*

- Multi-Z (optical Z-contact system, autofocus)
- Multi-Cam (wafer-probe navigation, picture-in picture)
- Multi-View (hi-res video, probe card alignment, multi-needle views)

### *Kit Contents*

- Pricing includes on-site installation

### *Compatibility*

- eVue I, eVue II, eVue III

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## 183-923 — Pro Package Upgrade Kit for eVue IV

Upgrades the basic eVue IV to include all the features of the PRO features of the PRO.

### *Features*

- High Performance Pro Package upgrade for eVue digital Imaging Systems
- Valid for basic 10X and 40X systems

### *Specifications*

- Multi-Z (optical Z-contact system, autofocus)
- Multi-Cam (wafer-probe navigation, picture-in picture)
- Multi-View (hi-res video, probe card alignment, multi-needle views)

### *Kit Contents*

- Pricing includes on-site installation

### *Compatibility*

- eVue IV

# SlimVue

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## 157-459 — SlimVue Microscope

### Features

- Unique slim scope design for minimum scope footprint
- Ergonomic design
- Recommended for mmW applications
- High resolution and robust optical design
- Easy operation
- Maintenance free adjustable coaxial LED illumination
- Focus block included
- Quick lens exchange mechanism
- Supports Mitutoyo MPlan Apo or compatible objective lenses (not included)



### Specifications

- Zoom ratio: 3.3x
- Zooming type: Manual rotation with detent
- 10x eyepiece magnification
- 100x-330x magnification with 10x objective lens
- Interpupillary Distance: 55mm~75mm
- Working Distance: Depends on used objective lens
- Image Formation: Erect Image
- Illumination: Built-in White LED
- Illumination type: Coaxial
- Compatible with Mitutoyo MPlan or similar objective lenses
- Trinocular photo tube with standard camera c-mount (switchable) for up to 13 mm (0.5 in) CCD cameras
- Optical path change-over: Manual Type 100?0/0?100
- Focus unit range:  $\pm 25\text{mm}$  (1 in)(4mm [0.2 in]/100 $\mu\text{m}$  per turn of coarse/fine focus knob)
- Power adapter 100V-240 V AC 1.6 A with IEC 60320-1-C14 connector
- Approx 5.5 kg (12 lb)

### Kit Contents

- SlimVue Microscope body
- 10x wide field eyepieces
- 50mm (2 in) heavy duty manual focus block
- 2 objective adapters (no objective lens)
- Power supply and light control unit

### Compatibility

- MPS150, PM8, PM300, PA200, PA300, Summit 11000/12000, PA200 BlueRay, SUMMIT200

# Seiwa 888

## VMSS-888L — Seiwa Microscope for IR Lasers with Manual Focus and Accessory Kit

### Features

- Seiwa PS-888L Series Super Scope for 355-1064nm laser cutters
- Cost effective and robust optical design
- High resolution at high magnification
- Eye piece viewing
- Selectable wavelength ranges through tube lens turret
- Coaxial illumination



### Specifications

- Zoom 1X wavelength range 355-532 nm
- Zoom 1X wavelength range 532-1064 nm
- Zoom 2X wavelength range 486-656 nm (laser cannot be used on in this position)
- Brightfield Kohler illumination with field and aperture stop
- Color filter and polarizer/analyzer slots
- Weight: ~ 6.8 kg (15 lb)
- Dimensions (HxWxD): ~ 460 x 192 x 360 mm (18.1 x 7.5 x 14.2 in)

### Kit Contents

- Microscope body with 1X-2X zoom
- 4 objective manual turret
- Eyepieces: 10X wide field
- Objectives: 2.5X, 10X, 20X long working distance
- IR/1064nm - Green/532nm compatible (M Plan APO)
- 2 in heavy duty manual focus block
- F3000 LED light source
- C-mount camera adapter (126-260)

### Compatibility

- Elite 300/S, Summit, M150, Tesla\*, S300. Alessi
- \*Objectives with >10x magnification may not be compatible with T200 High Voltage testing.

## VMSS-888 — Seiwa Microscope with Manual Focus and Accessory Kit

### Features

- Seiwa (Super Scope) microscope with accessory kit

### Features

- Seiwa PS-888 Series Super Scope
- Cost effective and robust optical design
- High resolution at high magnification
- Eyepiece viewing with port for optional camera
- Coaxial illumination

### Specifications

- Zoom 1X wavelength range 486-656 nm
- Zoom 2X wavelength range 486-656 nm
- Brightfield Kohler illumination with field and aperture stop
- Color filter and polarizer/analyzer slots
- Weight: ~ 6.8 kg (15 lb)
- Dimensions (HxWxD): ~ 460 x 192 x 360 mm (18.1 x 7.5 x 14.2 in)

### Kit Contents

- Microscope body with 1X-2X zoom
- 4 objective manual turret
- Eyepieces: 10X wide field
- Objectives: 2.5X, 10X, 20X long working distance
- IR/1064nm - Green/532nm compatible (M Plan APO)
- 2 in heavy duty manual focus block
- F3000 LED light source
- C-mount video adapter (126-260)

### Compatibility

- Elite 300/S, Summit, M150, Tesla\*, S300. Alessi
- \*Objectives with >10x magnification may not be compatible with T200 High Voltage testing.



# Mitutoyo FS70

## VMSS-70L — Mitutoyo Finescope FS-70 for IR Lasers, Obj., 10X Eyepcs, Fiber Optic Illuminator

### Features

- Mitutoyo Finescope FS70L series
- 1X magnification
- Selectable eye piece or laser port viewing
- Coaxial illumination



### Specifications

- 1X magnification
- For 355 -1064 nm laser cutters
- Brightfield Kohler illumination with field and aperture stop
- Weight: ~ 6.4 kg (14.1 lb)
- Dimensions (HxWxD): ~ 360 x 229 x 324 mm (14.2 x 9 x 12.8 in)

### Kit Contents

- Microscope body
- 4 objective manual turret
- Eyepieces: 10X wide field
- Objectives: 2X, 10X, 20X long working distance
- 51 mm (2 in) heavy duty manual focus block
- F3000 high power light source
- C-mount video adapter

### Compatibility

- Elite 300/S, Summit, M150, Tesla\*, S300. Alessi
- \*Objectives with >10x magnification may not be compatible with T200 High Voltage testing.

## VMSS-70Z — Mitutoyo Finescope FS-70, Objectives, 10X Eyepcs, Fiber Optic Illuminator

### Features

- Mitutoyo Finescope FS70Z series
- 2:1 continuous zoom
- Eyepiece viewing
- Camera port
- Coaxial illumination



### Specifications

- 1X-2X magnification
- Brightfield Kohler illumination with field and aperture stop
- Weight: ~ 6.6 kg (14.5 lb)
- Dimensions (HxWxD): ~ 360 x 229 x 324 mm (14.2 x 9 x 12.8 in)

### Kit Contents

- Microscope body
- 4 objective manual turret
- Eyepieces: 10X wide field
- Objectives: 2X, 10X, 20X long working distance
- 51 mm (2 in) heavy duty manual focus block
- F3000 high power light source
- C-mount video adapter

### Compatibility

- Elite 300/S, Summit, M150, Tesla\*, S300. Alessi
- \*Objectives with >10x magnification may not be compatible with T200 High Voltage testing.

# Motic PSM1000

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## 141763 — Motic PSM-1000 Microscope

### *Features*

- Microscope body
- Trinocular photo tube
- 1x and 2x VIS body lens
- Objective revolver, rotary type (with 4 mounts)
- Coaxial LED light source
- Two eyepieces: 10x
- Objectives: 2x, 10x, 20x
- Optional polarizer/analyzer capability
- 50mm Focus Block
- Laser ready for 1064, 532, and 355 nm (exchangeable body lenses included)



### *Compatibility*

- Summit, EPS150, PA300, PM300, PA200, PM8, PM5, DSP, BEP

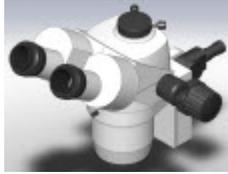
# SMZ171

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## 775-00190 — Motic Stereozoom Microscope, SMZ-171

### Features

- Light source for optical fiber with control unit (100-240 V/50-60 Hz)
- Ring light with 1m optical fiber
- 2x widefield eyepieces 20x/F.N23
- Trinocular - TV option possible
- Microscope fixation ring with manual focus drive



### Specifications

- Zoom Range 6.7:1
- Working distance 113 mm (4.4 in)
- Magnification 0.75x - 5.0x
- Eyepiece magnification 15x - 100x
- FOV (diameter) 17.3 - 2.6 mm (0.7 - 0.1 in)
- Option: 775-00197, C-mount adapter for Motic SMZ-171 (Remark: 0.65x)

### Compatibility

- SUMMIT200, PA200 BlueRay, PA200, PA300, PM300, PM8, PM5, DSP, BEP

# Leica

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## 132-770 — Leica S8 APO StereoZm Microscope Kit, Wide FOV, MTS Stations, Video Ready

### Features

- Wide field of view for probing larger features
- Excellent resolution for low power microscopy
- Continuously variable zoom
- Video ready optical port
- Long life LED ring light
- High value choice for many probing needs



### Specifications

- 8:1 zoom
- 600 line pairs/mm resolution
- Apochromatic optical design
- 100 mm (3.9 in) working distance with 0.63X objective installed
- 75 mm (3.0 in) working distance without 0.63X objective installed
- Variable illuminator output with auxiliary control

### Kit Contents

- Leica S8 APO StereoZoom microscope, with 1.0 to 8.0 zoom
- 10X eyepieces (pair)
- Wide FOV objective (0.63X)
- Mounting arm with focus control
- Video adapter 1.0X
- Long working distance solid state LED ring illuminator
- Illumination control box and cables
- Universal power supply (100-240 VAC, 50/60 Hz)

### Compatibility

- MTS

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## 131-780 — Leica S8 Stereo Zoom Microscope Kit, 1.0 - 8.0 X Zoom, Video-Ready

### Features

- Wide field of view for probing larger features
- Excellent resolution for low power microscopy
- Continuously variable zoom
- Video ready optical port
- Long life LED ring light
- High value choice for many probing needs



### Specifications

- 8:1 zoom
- 600 line pairs/mm resolution
- Apochromatic optical design
- 75 mm (3.0 in) working distance
- Variable illuminator output with auxiliary control

### Kit Contents

- Leica S8 APO StereoZoom microscope, with 1.0 to 8.0 zoom
- 20X eyepieces (pair)
- Mounting arm with focus control
- Video adapter 0.63X
- Long working distance solid state LED ring illuminator
- Illumination control box and cables
- Universal power supply (100-240 VAC, 50/60 Hz)

### Compatibility

- Summit, M150, Alessi
- T200 High Voltage testing

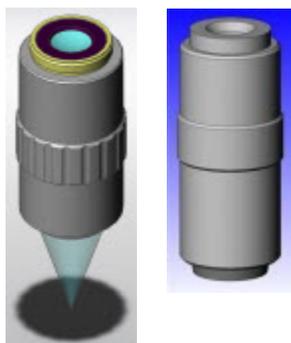
# Objectives/Eye Pieces

## Key to Terms

Mag = magnification	BF = bright field
WD = working distance	LWD = long working distance
N.A. = numerical aperture	SLWD = super-long working distance
f = focal length	Laser = laser cutting
R = resolving power	HR = high resolution
DOF = depth of field	NUV = near-ultraviolet
FOV = field of view	<sup>1</sup> using Ø = 24 mm eyepiece

## MITUTOYO OBJECTIVES

- Compatible with FS70, eVue, iVista, Seiwa, A-Zoom microscopes



Part #	Description	Application	Mag (x)	N.A.	WD (mm)	f (mm)	R (µm)	± DOF (µm)	FOV <sup>1</sup> (mm)	Mass (g)	λ Correction
102-516	M Plan Apo 2x	BF, LWD	2	0.055	34	100	5	91	12	220	436-656 nm
106-762	M Plan Apo 5x	BF, LWD	5	0.14	34	40	2	14	4.8	230	436-656 nm
102-517	M Plan Apo 10x	BF, LWD	10	0.28	34	20	1	3.5	2.4	240	436-656 nm
102-518	M Plan Apo 20x	BF, LWD	20	0.42	20	10	0.7	1.6	1.2	270	436-656 nm
VMA-60-50	M Plan Apo 50x	BF, LWD	50	0.55	13	4	0.5	0.9	0.48	290	436-656 nm
VMA-60-99	M Plan Apo 100x	BF, LWD	100	0.7	6	2	0.4	0.6	0.24	320	436-656 nm
VMA-60-96	M Plan Apo HR 100x	BF, LWD, HR	100	0.9	1.3	2	0.3	0.34	0.24	410	436-656 nm
17980	M Plan Apo SL20x	BF, SLWD	20	0.28	30.5	10	1	3.5	1.2	240	436-656 nm
102-293	M Plan Apo SL50x	BF, SLWD	50	0.42	20.5	4	0.7	1.6	0.48	280	436-656 nm
VMA-60-80	M Plan Apo SL80x	BF, SLWD	80	0.5	15	2.5	0.6	1.1	0.3	280	436-656 nm
VMA-60-98	M Plan Apo SL100x	BF, SLWD	100	0.55	13	2	0.5	0.9	0.24	290	436-656 nm
115-246	M Plan Apo SL200x	BF, SLWD	200	0.62	13	1	0.4	0.7	0.12	490	436-656 nm
VMA-60-52	M Plan Apo NIR 50x	BF, Laser	50	0.42	17	4	0.7	1.6	0.48	315	480-1800 nm
VMA-60-97	M Plan Apo NIR 100x	BF, Laser	100	0.5	12	2	0.6	1.1	0.24	335	480-1800 nm
VMA-60-54	M Plan Apo NUV 50x	BF, Laser, NUV	50	0.42	15	4	0.7	1.6	0.48	350	355-620 nm
VMA-60-95	M Plan Apo NUV 100x	BF, Laser, NUV	100	0.5	11	2	0.6	1.1	0.24	380	355-620 nm

## OPTEM OBJECTIVES

- M Plan apochromatic
- Compatible with A-Zoom2 microscopes;  
TopHat-compatible



Part #	Description	Application	Mag (x)	N.A.	WD (mm)	f (mm)	R (μm)	± DOF (μm)	FOV <sup>1</sup> (mm)	Mass (g)	λ Correction
120-875	High-Res 5x	BF, LWD	5	0.225	34	40	1.5	5.45	no spec	210	436-656 nm
120-873	High-Res 10x	BF, LWD	10	0.45	19	20	0.74	1.35	no spec	190	436-656 nm
132-509	High-Res 20x	BF, LWD	20	0.6	13	10	0.56	0.75	no spec	290	436-656 nm

## SEIWA OBJECTIVES

- M Plan apochromatic
- Compatible with A-Zoom2 microscopes;  
TopHat-compatible



Part #	Description	Application	Mag (x)	N.A.	WD (mm)	f (mm)	R (μm)	± DOF (μm)	FOV <sup>1</sup> (mm)	Mass (g)	λ Correction
126-255	M.Plan APO2.5x	BF, LWD	2.5	0.06	32.5	80	5.6	76.4	no spec	232	436-656 nm
126-256	M.Plan APO5x	BF, LWD	5	0.15	35.1	40	2.1	10.7	no spec	238	436-656 nm
126-257	M.Plan APO10x	BF, LWD	10	0.25	36.9	20	1.5	5.2	no spec	215	436-656 nm
126-258	M.Plan APO20x	BF, LWD	20	0.35	22.2	10	1	2.2	no spec	289	436-656 nm

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## LEICA OBJECTIVES

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### 131-788 — Leica 25 X Eye Pieces, High Performance, Extended Relief for Leica Microscopes

#### Features

- Wide-field eyepieces compatible with eyeglasses

#### Specifications

- 25X magnification



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### 131-789 — 30x Eyepieces for Leica S6/S8 Microscopes

#### Features

- Wide field eye-pieces

#### Specifications

- 30X magnification



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### 132-109 — Leica 0.63 Auxiliary Lens for S8 Leica Microscope

#### Features

- Objective for Leica S8 StereoZoom microscope
- Increases field of view
- Increases working distance



#### Specifications

- 0.63X magnification
- 100 mm (3.9 in) working distance
- Apochromatic optical design

# Microscope Adapters, Mounting Plates, and Accessories

## ADAPTERS

### 111486 — Microscope Adapter, A-Zoom and Motic PSM-1000/229

#### Features

- For microscope movement ranges larger than XY 50 x 50 mm (2 x 2 in)
- Used with PA300, PM300 and IceShield PS200

#### Compatibility

- PA300, PM300, PA200, PM8, PM5, DSP, BEP



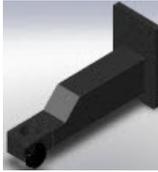
### 120103 — Microscope Adapter, Optem/229

#### Features

- For microscope movement ranges larger than XY 50 x 50 mm (2 x 2 in)

#### Compatibility

- PA300, PM300, PA200, PM8, PM5, DSP, BEP



### 120586 — Microscope Adapter, Mitutoyo FS70x-S/229

#### Features

- For microscope movement ranges XY 50 x 50 mm (2 x 2 in) and larger
- Compatible with FS70 with original Mitutoyo focus rack 378-062 only
- Used with PA300 and PM300

#### Compatibility

- PA300, PM300, PA200, PM8, PM5, DSP, BEP



### 132712 — Microscope Adapter, Optem

#### Features

- Required for use with OPTEM Zoom 70 video microscope

#### Compatibility

- PA200 BlueRay, PA200 DS BlueRay

### 133915 — Microscope Adapter, Olympus SZ2-STP/229

#### Features

- For adapter Olympus SZ2-STP

#### Compatibility

- PA300, PM300, PA200, PM8, PM5, DSP, BEP



### 142730 — Microscope Adapter, Motic SMZ-168/229

#### Features

- For microscope movement ranges of 50 x 50 mm (2 x 2 in) and 100 x 100 mm (3.9 x 3.9 in)
- Adapts Motic SMZ168 for microscope movement

#### Compatibility

- PA300, PM300, PA200, PM8, PM5, DSP, BEP



## MOUNTING PLATES

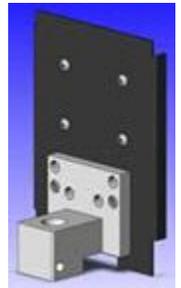
### 158-064 — Microscope Mounting Kit, Leica, Manual Transport

#### Features

- Dovetail mounting block for Leica S6 and S8
- Adapts standard dovetail to bonder pin common to stereo zoom microscopes
- Universal design for Summit 11000B, 12000B, S300 and legacy probe stations

#### Compatibility

- Summit, S300, Alessi, MTS



## ACCESSORIES

### 102-363 — Mitutoyo Video Adapter, 1.0X Magnification

#### Features

- Connect video camera to microscope for remote viewing

#### Specifications

- 1X magnification



# Cameras and Video Packages

## 67120 — Moticam 2300 CMOS Camera

### Features

- Compatible with CS-mount camera ports and C-mount camera ports (by using included CS mount adapter)
- Three megapixel live resolution
- Software image enhancements include noise-reduction, live filtering, and settings memory
- Software included:
  - Motic Images Plus 2.0ML for Windows
  - Motic Images Plus 2.0 for Macintosh OSX
- Accessories included:
  - 16 mm (0.6 in) focusable lens
  - 28, 30, 34, and 35 mm (1.1, 1.2, 1.3, and 1.4 in) eyepiece couplers
  - B&S adapter for microscope's eyetube
  - Macro tube
  - Calibration slide for accurate measurements
  - CS mount adapter



### Specifications

- Minimum specifications:

Windows 2000 or XP	Macintosh
<ul style="list-style-type: none"><li>• 256 MB RAM</li><li>• P4</li><li>• Built-in USB2.0</li></ul>	<ul style="list-style-type: none"><li>• OS X or higher</li><li>• 256 MB RAM</li><li>• G4</li><li>• Built-in USB2.0</li></ul>

- Chip configuration: 12.7 mm (0.5 in) live 3.0 megapixels imaging chip in portable casing
- Data output: USB2.0
- Power supply: USB cable from computer

## 155-499 — 3M Pixel 1/2 in CMOS Camera C Mount USB

### Features

- 13 mm (1/2 in) CMOS camera with C-mount and mounting thread
- 3.0 Megapixels (2048x1536) with USB 2.0
- Pixel size 3.2um x 3.2um
- Includes image processing software "TSView" for Windows XP/Vista/7

### Specifications

- Windows XP/Vista/7

## EPS-ACC-HDTV — Digital TV Package

## 169-080 — Velox Digital Camera Kit

### Features

Velox digital camera package for FormFactor probe stations using C-mount microscopes. This camera is supported with SPECTRUM Vision System. Velox Probe Station Control Software is required.

### Specifications

- Digital video camera, 780x582 pixel, 1/2 inch CCD sensor, IEEE1394A connector
- IEEE1394A (firewire) interface board and cable
- White light LED fitting into microscope illumination port

### Compatibility

- PA200, PA200 BlueRay, Summit12000, SUMMIT200, TESLA200, T300

## 173-278 — Moticam 1080 Sales Package, 2M, 1/2.8 in, USB/HDMI/SD, 16GB SD-card, USB Mouse

### Features

- 1/2.8 in CMOS with C-mount and mounting thread
- Capture resolution on SD-card:
  - Still image: 8.0 MP (3840 x 2160)
  - Video: Full HD 1920 x 1080
- Live display mode through output:
  - USB: 1920 x 1080 (Full HD) @ 30 frames per second or
  - HDMI: 1920 x 1080 (Full HD) @ 60 frames per second
- Pixel size: 2.8 x 2.8 microns
- Data transfer: HDMI (1080p) and USB 2.0
- SD card slot (maximal: 32 GB)

### Kit Contents

- CS Ring Adapter
- HDMI and USB cable
- Computer mouse (USB)
- SD card 16 GB SDHC
- Motic Images Plus 3.0 application software for PC and Mac

## Features

- Digital TV kit for C-mount microscopes with 720p resolution

## Specifications

- Camera:
  - 8.5 mm (0.33 in) color CCD digital camera (HDMI, 720p, 16:9), with C-mount
  - Wired remote control unit for camera setup (detachable)
  - HDMI cable
  - Power supply (100-220 VAC 50/60 HZ CE, UL)
- 22 in TFT monitor:
  - TFT active matrix, 22 in diagonal viewing area with 16:9 ratio
  - Max/native resolution: 1920 x1080
  - High brightness 250 cd/m & contrast ratio: 1.000.000:1 (DCR)
  - Wide viewing angle: 170/160 (H/V deg)
  - Video inputs: analog DB15, HDMI, 29-pin DVI-D
  - VESA mount and stand
  - Built-in power (100/240 VAC 50/60 Hz, UL/CE)
  - Crosshair overlay



## Compatibility

- All EPS complete packages and C-mount video ready microscopes

## EPS-ACC-HDTV+ — Digital TV Package

### Features

- Video recording and live view, without a computer
- Integrated menu system driven by a mouse for low overhead
- Saves stills and video direct to a memory card and outputs to an HDMI monitor



### Specifications

- Moticom 1080
  - 12.7 mm (0.5 in) CMOS with C-mount and mounting thread
  - 2.0 mega pixels, SD card slot, HDMI frame rate: 60 fps
  - Simultaneous HDMI 1080 (60P), USB 1080 (30P), and PC output
  - Moticom Images Plus 3.0 application software for PC and Mac
  - Still and live image capture function
- 24 in wide screen monitor
  - HDMI, DisplayPort and VGA inputs
  - 178° wide-angle viewing
- SD-Card

- RAM size 16 GB
- Data rate 80 MB/s
- Form factor SDHC
- USB computer
  - USB plug for connection to MOTICAM 1080
  - 1.80 m (6 ft) cable for convenient and ergonomic operation

### Compatibility

- MPS150, EPS150, PM8, EPS200

## EPS-ACC-TV — Analogue TV package

### Features

- Analogue TV kit for C-mount microscopes

### Specifications

- Camera:
  - 12.7 mm (0.5 in) in color CCD analogue camera (NTSC, 480 TV lines, 4:3) with C-mount
  - 4.6 m (15 ft) combination cable (YC Svideo + Power)
  - Power supply (100-220VAC 50/60HZ CE, UL)
- 483 m (19 in) TFT monitor:
  - TFT active matrix, 483 m (19 in) diagonal viewing area with 4:3 ratio
  - Max/native resolution: 1280 x1024
  - High brightness 300 cd/m & contrast ratio: 700:1
  - Wide viewing angle: 150/130 (H/V deg)
  - Video inputs: analog DB15, S-video, CVBS jack, 29-pin DVI-D
  - VESA mount and stand
  - Built-in power (100/240 VAC 50/60 Hz, UL/TVU/CE)



### Compatibility

- All EPS complete packages and C-mount video ready microscopes

# Optical

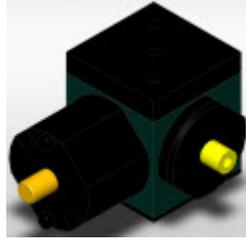
## Integrating Sphere and Mounts

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### 53541 — Integrating Sphere, Zenith

#### Features

- Diffuse, high reflective coating, recommended for UV-VIS-NIR wavelength
- Maximum temperature: 150°C (302°F)
- Input port 6 mm (1/4 in) (cutting edge in design)
- One detector port 6 mm (1/4 in) with baffles and blind plug
- SMA connector fiber optic cable



#### Compatibility

- Required for 134826, 139086

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### 139086 — Integrating Sphere Mount, RPP305

#### Features

- Positioner arm with pneumatic cylinder, 40 mm (1.5 in) stroke, for moving sphere out of microscope field of view
- Mounting for Integrating Sphere 1 in, OptoWhite/Zenith

#### Compatibility

- PA200, PA200 BlueRay, PM8, PM5 + RPP305-S (and former PH250)

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### 134826 — Integrating Sphere Mount, Mitutoyo FS70

#### Features

- Mounting of 1 in integrating sphere into manual objective turret

#### Compatibility

- FS70



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### 139085 — Optical Fiber Mount, RPP305

#### Features

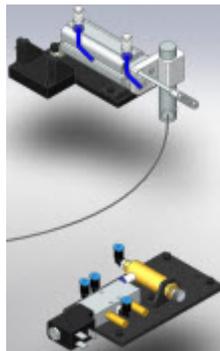
- Mounting for Instrument Systems EKT-fiber

#### Specifications

- Positioner arm with pneumatic cylinder, 40 mm (1.5 in) stroke, for moving optical fiber out of microscope field of view

#### Compatibility

- PA200, PA200 BlueRay, PM8, PM5 + RPP305-S (and former PH250)



# PA200

## PA200 BlueRay

### CHUCKS AND THERMAL CHUCK ADAPTERS

#### 53551 — ATT Chuck System, A200HS, +15°C to +150°C

##### Features

- RS232 Interface
- Air used for cooling
- Operated via the interfaces on the controller or through the probe station control software
- Complete system consists of 200 mm (8 in) chuck, controller, cooling unit
- Requires additional thermal chuck adapter for BlueRay, with or without lift pins (138722 or 138723)



##### Specifications

- Temperature range: +15 to +150°C (59° to 302°F)
- Temperature resolution: 0.01°C (32°F)
- Temperature accuracy: +/- 0.2°C (32.4°F)
- Heating rate:
  - 25 → 150°C (77 → 302°F): < 8 min
  - 15 → 25°C (59 → 77°F): < 2 min
- Cooling rates:
  - 25° → 15°C (77° → 59°F): < 6 min
  - 150° → 25°C (302° → 77°F): < 18 min
- Temperature uniformity:
  - 15...100°C (59°...212°F): < +/- 1K
  - >100°C (212°F): +/- 1%
- Flatness: < +/-12 µm (0.5 mils)
- Power supply: 100-127/208-240 V 50/60 Hz AC 800 VA
- Air supply: 200 l/min at 6 bar dewpoint <-10°C (50°F) oil free

##### Compatibility

- PA200 BlueRay

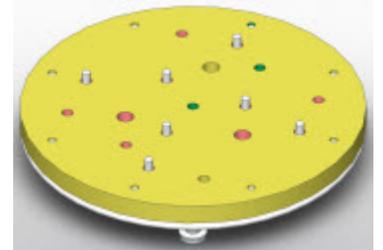
#### 138722 — Thermal Chuck Adapter

##### Features

- Adapter for ATT chuck system A200HS+15
- Thermal and electrical insulation of chuck to machine

##### Compatibility

- PA200 BlueRay



#### 138723 — Thermal Chuck Adapter for Chuck with Lift Pins

##### Features

- Adapter for ATT chuck system A200HS+15
- Thermal and electrical insulation of chuck to machine
- With lift pins for loader application

##### Compatibility

- PA200 BlueRay

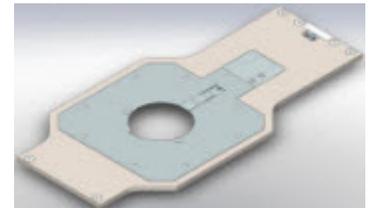
#### 139873 — Double Side Chuck Plate

##### Features

- Top plate for double side chuck
- To be used on PA200 DS BlueRay
- For 76 mm (3 in) wafer, held by clamping mechanism
- 1 mm (0.04 in) circumferential support
- Front cutout for vacuum wand
- Other chucks on request

##### Compatibility

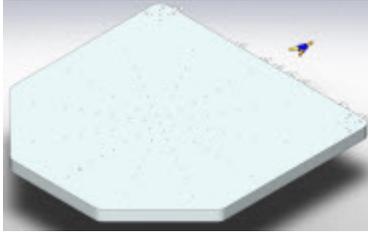
- PA200 DS BlueRay



## 143820 — Chuck, 200 mm, HF, PA200A

### Features

- Chuck insulated from machine
- Vacuum fixture for two calibration substrates or probe cleaning pads
- Vacuum zones for 50 mm (2 in), 100 mm (4 in), 150 mm (6 in), and 200 mm (8 in) wafers
- Single die vacuum location
- Material: stainless steel (others available on request)
- Flat surface with vacuum holes (0.8 mm [0.03 in] Ø)



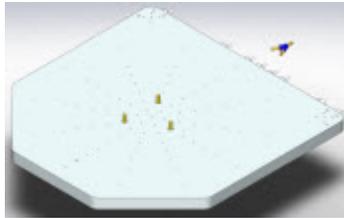
### Compatibility

- PA200A BlueRay

## 143821 — Chuck, 200 mm, HF, AP200

### Features

- Chuck insulated from machine
- Vacuum fixture for two calibration substrates or probe cleaning pads
- Vacuum zones for 50 mm (2 in), 100 mm (4 in), 150 mm (6 in), and 200 mm (8 in) wafers
- Single die vacuum location
- Material: stainless steel (others available on request)
- Flat surface with vacuum holes (0.8 mm [0.03 in] Ø)



### Compatibility

- AP200 BlueRay

## MISCELLANEOUS ACCESSORIES

## 133371 — Operation Lamp 3 Colors

### Features

- Colors: red, yellow, green
- Programmable through probe station control software
- Red light can be programmed static or blinking
- 800 mm (31.5 in) pole (when combined with the instrument measurement shelf [136687], the mounting pole is reduced to 400 mm [15.7 in])



### Compatibility

- PA200 BlueRay, PA200 DS BlueRay

## 133667 — Mount Arm for Monitor, Keyboard, Mouse, and Joystick

### Features

- Mount arm for flat panel monitor, mouse and joystick or Expert Control Panel
- Includes compact computer keyboard (US English)
- High quality pneumatic springs and two revolving joints
- Swing, tilt and rotate for optimum ergonomic positioning
- Dynamically adjustable to any working height
- Requires a machine table 700 or VIT701/800/801 for mounting



### Compatibility

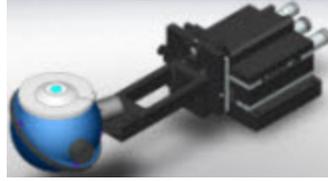
- PA200 BlueRay, PA200 DS BlueRay

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## 135080 — Adaptation Integrating Sphere 4 in Manual

### Features

- Integrating sphere holder for PA200 BlueRay DS
- Manual sphere adjustment
- Mount for integrating sphere 102 mm (4 in) LabSphere (sphere not part of this item)
- Other spheres can be adapted on request
- Cannot be combined with automatic loader



### Specifications

- Movement Range X/Y: 25 mm (1 in)
- Movement Range Z: 10 mm (0.4 in)

### Compatibility

- PA200 BlueRay

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## 136687 — Measuring Instrument Shelf for BlueRay

### Features

- Two planes for measurement equipment

### Specifications

- Dimensions (W x D): 350 x 380 mm (13.8 x 15 in) each
- Max. load: 30 kg (66 lb)

### Compatibility

- PA200 BlueRay, PA200 DS BlueRay
- Cannot be combined with shield enclosures



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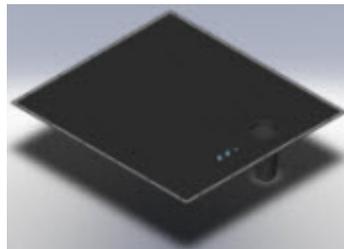
## 138390 — SE1000 to VIT700/701 Adapter

### Features

- Connects the SE1000 to the 700 series probe station tables
- By using the VIT701, vibrations of the ShieldEnclosure are isolated from the probe station

### Compatibility

- PA200 BlueRay, PA200 DS BlueRay
- Not compatible with BlueRay loader module



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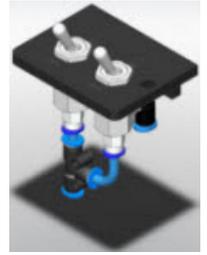
## 138651 — Pneumatic Switch Terminal

### Features

- Terminal is mounted to BlueRay platen
- Used for switching cal-site vacuum supply

### Compatibility

- PA200 BlueRay (not compatible with the BlueRay DS)



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## 139985 — Adaptation Integrating Sphere 4 in Motorized

### Features

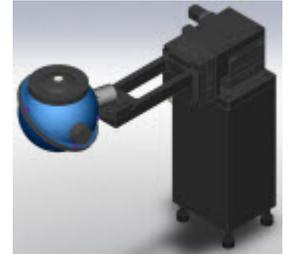
- Integrating sphere holder for PA200 BlueRay DS
- Motorized/programmable sphere adjustment
- Mount for integrating sphere 102 mm (4 in) LabSphere (sphere not part of this item)
- Other spheres can be adapted on request
- Can be combined with automatic loader

### Specifications

- Movement range X/Y: 25 mm (1 in)
- Movement range Z: 25 mm (1 in)

### Compatibility

- PA200 BlueRay



# Positioners and Positioner Accessories

## DC Positioners



### NOTE

Positioner movement ranges specified here may be further limited by specific application setups.

### ENTRY LEVEL

DPP105-M-AI-S	133346
DPP105-V-AI-S	100298

### DPP105-M/V-AI-S

#### Features

- Used for basic IV probing
- Ideal for applications that require more than eight positioners
- Used with PTT DC probe needles
- Low cost probing
- Extremely small footprint
- Probe-tip pressure adjustment
- Single arm with gold-plated clamping included
- Suitable for probing pads down to 100 x 100  $\mu\text{m}$  (3.9 x 3.9 mils)



#### Specifications

- Travel range:
  - X: 8 mm (0.3 in)
  - Y: 6 mm (0.2 in)
  - Z: 25 mm (1 in) (z-axis control: cw=down, ccw=up)
- Feature resolution: 5  $\mu\text{m}$  (0.2 mils)
- Screw resolution:
  - X: 350  $\mu\text{m}$  (13.8 mils)/rev (70 TPI)
  - Y: 500  $\mu\text{m}$  (19.7 mils)/rev (50 TPI)
  - Z: 70  $\mu\text{m}$  (2.8 mils)/rev (350 TPI)
- Base: magnetic or vacuum
- Footprint: 60 x 20 mm (2.4 x 0.8 in)
- The temperature of the cable containing arm must not exceed 200°C. Usually, this is suitable for a 300°C wafer temperature in an open setup with an arm at least 10 mm above the wafer.

#### Compatibility

##### Open Platform Bundles

PM5	PA300
PM8	EPS150
PM300	MPS150
PA200	

#### Ordering Information

Standard (z-axis: cw=down, ccw=up)	Legacy (z-axis: cw=up, ccw=down)
---------------------------------------	-------------------------------------

### DPP105-M/V-PTH

#### Features

- Used for basic IV probing
- Ideal for applications that require more than eight positioners
- Used with PTT DC probe needles
- Low cost probing
- Extremely small footprint
- Probe-tip pressure adjustment
- Compatible with PTT needle holders
- Suitable for probing pads down to 100 x 100  $\mu\text{m}$  (3.9 x 3.9 mils)



#### Specifications

- Travel range:
  - X: 8 mm (0.3 in)
  - Y: 6 mm (0.2 in)
  - Z: 25 mm (1 in) (z-axis control: cw=down, ccw=up)
- Feature resolution: 5  $\mu\text{m}$  (0.2 mils)
- Screw resolution:
  - X: 350  $\mu\text{m}$  (13.8 mils)/rev (70 TPI)
  - Y: 500  $\mu\text{m}$  (19.7 mils)/rev (50 TPI)
  - Z: 70  $\mu\text{m}$  (2.8 mils)/rev (350 TPI)
- Base: magnetic or vacuum
- Footprint: 60 x 20 mm (2.4 x 0.8 in)

#### Compatibility

Open Platform +  
PTH Arms

Summit 11000/12000

#### Ordering Information

- DPP105-M-PTH
- DPP105-V-PTH

## STANDARD

### DPP205-M/V-L/R; DPP205-M/V-L/R-S

#### Features

- Used for IV/CV probing and failure analysis
- Used with PTT and DCP high performance DC probes
- Accurate X and Y placement and precise probe over travel with easily adjusted knobs
- Adjustable probe arm mounting plate
- Optimized for FormFactor's triaxial probing accessories and MicroChamber
- With probe and triaxial accessories, micropositioner configures to state-of-the-art, guarded, low-noise triaxial probing in minutes
- Captive stages with leadscrew design
- High precision cross-roller bearings
- Configured for use on left/right side of platen



DPP205-V-R



DPP205-M-L-S

#### Specifications

- Feature resolution: <2 μm (0.08 mils)
- Fine screw: 0.5 mm (0.02 in) pitch (50 TPI)
- Travel range: 12.5 mm (0.5 in) in X, Y and Z (z-axis control: cw=down, ccw=up)
- Base: magnetic or vacuum
- Footprint (WxD): 90 x 60 mm (3.5 x 2.4 in)

#### Compatibility

Platforms + Dedicated Arms*	Open Platforms + DC Arms**
CM300xi	PM5
Elite 300	PM8
PA300MA	PM300
PM300PS	PA200
Summit 11000/12000	PA200 BlueRay
Tesla	PA300
SUMMIT200	EPS150
TESLA200	MPS150
Power	

\* Platforms + Dedicated Arms require the non-S versions of the positioner.

\*\* Open Platforms + DC Arms require the -S version of the positioner.

#### Ordering Information

Standard (z-axis: cw=down, ccw=up)	Legacy (z-axis: cw=up, ccw=down)
DPP205-M-L	–

Standard  
(z-axis: cw=down, ccw=up)

Legacy  
(z-axis: cw=up, ccw=down)

DPP205-M-R

–

DPP205-V-L

–

DPP205-V-R

–

DPP205-M-L-S

DPP205-M-L-S-I\*

DPP205-M-R-S

DPP205-M-R-S-I\*

DPP205-V-L-S

DPP205-V-L-S-I\*

DPP205-V-R-S

DPP205-V-R-S-I\*

\* Available by special request. Contact your FormFactor representative.

NOTE: Legacy PH120-complete (107870) replaced by DPP205-V-L/R-S with 100561 coax arm

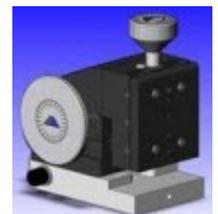
### DPP210-M/V-L/R; DPP210-M/V-L/R-S

#### Features

- Used for IV/CV probing and failure analysis
- Used with PTT and DCP high performance DC probes
- Accurate X and Y placement and precise probe overtravel with easily adjusted knobs
- Adjustable probe arm mounting plate
- Optimized for FormFactor's triaxial probing accessories and MicroChamber
- With probe and triaxial accessories, micropositioner configures to state-of-the-art, guarded, low-noise triaxial probing in minutes
- Captive stages with leadscrew design
- High precision cross-roller bearings
- Configured for use on left/right hand side of platen



DPP210, magnetic base, right-hand x-axis control



DPP210, vacuum base, left-hand x-axis control

#### Specifications

- Feature resolution: <1 μm (0.04 mils)
- Fine screw: 0.25mm (0.02 in) pitch (100 TPI)
- Travel range: 12.5 mm (0.5 in) in X, Y and Z (z-axis control: cw=down, ccw=up)
- Base: magnetic or vacuum
- Footprint (WxD): 90 x 60 mm (3.5 x 2.4 in)

## Compatibility

Platforms + Dedicated Arms*	Open Platforms + DC Arms**
CM300xi	PM5
Elite 300	PM8
PA300MA	PM300
PM300PS	PA200
Summit 11000/12000	PA200 BlueRay
Tesla	PA300
SUMMIT200	EPS150
TESLA200	MPS150
Power	

\* Platforms + Dedicated Arms require the non-S versions of the positioner.

\*\* Open Platforms + DC Arms require the -S version of the positioner.

## Ordering Information

Standard (z-axis: cw=down, ccw=up)	Legacy (z-axis: cw=up, ccw=down)
DPP210-M-L	–
DPP210-M-R	–
DPP210-V-L	–
DPP210-V-R	–
DPP210-M-L-S	DPP210-V-L-S-I*
DPP210-M-R-S	DPP210-V-R-S-I*
DPP210-V-L-S	DPP210-M-L-S-I*
DPP210-V-R-S	DPP210-M-R-S-I*

\* Available by special request. Contact your FormFactor representative.

- High precision cross-roller bearings
- Configured for use on left/right hand side of platen

## Specifications

- Feature resolution: 0.5  $\mu\text{m}$  (0.02 mils)
- Fine screw: 0.125 mm (0.005 in) pitch (200 TPI)
- Travel range: 12.5 mm (0.5 in) in X, Y and Z (z-axis control: cw=down, ccw=up)
- Base: magnetic or vacuum
- Footprint (WxD): 90 x 60 mm (3.5 x 2.4 in)

## Compatibility

Platforms + Dedicated Arms	Open Platforms + DC Arms
CM300xi	PM5
Elite 300	PM8
PA300MA	PM300
PM300PS	PA200
Summit 11000/12000	PA200 BlueRay
Tesla	PA300
SUMMIT200	EPS150
TESLA200	MPS150
Power	

## Ordering Information

- DPP220-M-L
- DPP220-M-R
- DPP220-V-L
- DPP220-V-R
- DPP220-M-L-S
- DPP220-M-R-S
- DPP220-V-L-S
- DPP220-V-R-S

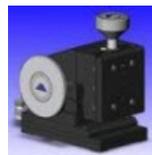
## DPP220-M/V-L/R; DPP220-M/V-L/R-S

### Features

- Used for IV/CV probing and failure analysis
- Used with PTT and DCP high performance DC probes
- Accurate X and Y placement and precise probe over travel with easily adjusted knobs
- Adjustable probe arm mounting plate
- Optimized for FormFactor's triaxial probing accessories and MicroChamber
- With probe and triaxial accessories, micropositioner configures to state-of-the-art, guarded, low-noise triaxial probing in minutes
- Captive stages with leadscrew design



DPP220, vacuum base, right-hand x-axis control



DPP220, magnetic base, left-hand x-axis control

# High-End Failure Analysis (FA) Positioners

## DPP305-M/V-S; DPP305-M/V-PTH

### Features

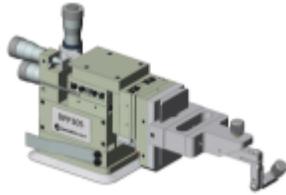
- Used for high-precision and high-resolution probing, high-performance IV/CV probing and failure analysis, and internal node probing
- Used with PTT and DCP high performance DC probes
- Precision ball bearings



DPP305 compatible with DC arms, and dedicated arms

### Specifications

- Feature resolution: 0.5  $\mu\text{m}$  (0.02 mils)
- Travel range:
  - X/Y: 10 mm (0.4 in)
  - Z: 8 mm (0.3 in) (z-axis control: cw=down, ccw=up)
- Z coarse adjustment range: 15 mm (0.6 in)
- Micrometer screws: 500  $\mu\text{m}$  (19.7 mils) pitch (50 TPI)
- Footprint (WxD): 75 x 50 mm (3 x 2 in)
- Base: magnetic or vacuum



DPP305 compatible with PTH arms

### Compatibility

Platforms + PTH Arms	Open Platforms + DC Arms*	Platforms + Dedicated Arms**
CM300xi	PM5	CM300xi
Elite 300	PM8	PA300MA
PA300MA	PM300	PM300PS
Summit 11000/12000	PA200	
SUMMIT200	PA200 BlueRay	
Tesla	PA300	
Power	EPS150	
	MPS150	

\* Open Platforms + DC Arms require the -S version of the positioner.

\*\* Platforms + Dedicated Arms require the non-S versions of the positioner.

### Ordering Information

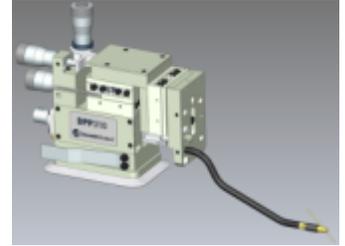
Standard (z-axis: cw=down, ccw=up)	Legacy (z-axis: cw=up, ccw=down)
DPP305-M-S	900286+130364
DPP305-V-S	900286+100508
DPP305-M-PTH	–

DPP305-V-PTH –

## DPP310-M/V-S; DPP310-M/V-PTH

### Features

- Used for high-precision and high-resolution probing, high-performance IV/CV probing and failure analysis, and internal node probing
- Used with PTT and DCP high performance DC probes
- Precision ball bearings



### Specifications

- Feature resolution: 0.5  $\mu\text{m}$  (0.02 mils)
- Travel range:
  - X/Y: 10 mm (0.4 in)
  - Z: 8 mm (0.3 in) (z-axis control: cw=down, ccw=up)
- Z coarse adjustment range: 15 mm (0.6 in)
- Micrometer screws: 250  $\mu\text{m}$  (9.8 mils) pitch (100 TPI)
- Footprint (WxD): 75 x 50 mm (3 x 2 in)
- Base: magnetic or vacuum

### Compatibility

Platforms + PTH Arms	Open Platforms + DC Arms*	Platforms + Dedicated Arms**
CM300xi	PM5	CM300xi
Elite 300	PM8	PA300MA
PA300MA	PM300	PM300PS
Summit 11000/12000	PA200	
Tesla	PA200 BlueRay	
Power	PA300	
	EPS150	
	MPS150	

\* Open Platforms + DC Arms require the -S version of the positioner.

\*\* Platforms + Dedicated Arms require the non-S versions of the positioner.

### Ordering Information

Standard (z-axis: cw=down, ccw=up)	Legacy (z-axis: cw=up, ccw=down)
DPP310-M-S	900315+130364
DPP310-V-S	900315+100508
DPP310-M-PTH	–
DPP310-V-PTH	–

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## DPP450-M/V-S; DPP450-M/V-PTH

### Features

- Used for high-resolution probing, high-performance IV/CV probing and failure analysis, and high-performance internal node probing
- Used with PTT and DCP high performance DC probes and respective DPP3xx arms
- Precision ball bearings
- Remote control block for fine movement



### Specifications

- Feature resolution: 0.2  $\mu\text{m}$  (0.008 mils)
- Travel range:
  - X/Y: 10 mm (0.4 in)
  - Z: 8 mm (0.3 in) (z-axis control: cw=down, ccw=up)
  - Micrometer screws: 500  $\mu\text{m}$  (19.7 mils) pitch (50 TPI)
- Fine movement: 300  $\mu\text{m}$  (11.8 mils) in each axis
- Z coarse adjustment range: 15 mm (0.6 in)
- Footprint (WxD): 75 x 50 mm (3 x 2 in)
- Base: magnetic or vacuum

### Compatibility

Platforms + PTH Arms	Open Platforms + DC Arms	Platforms + Dedicated Arms
CM300xi	PM5	PA300MA
PA300MA	PM8	
Summit 11000/12000	PM300	
SUMMIT200	PA200	
Tesla	PA200 BlueRay	
Power	PA300	
	EPS150	
	MPS150	

### Ordering Information

Standard (z-axis: cw=down, ccw=up)	Legacy (z-axis: cw=up, ccw=down)
DPP450-M-S	100312+130364
DPP450-V-S	100312+100508
DPP450-M-PTH	–
DPP450-V-PTH	–

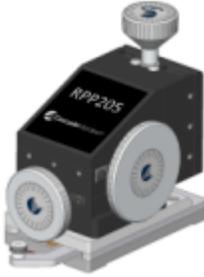
# RF Positioners

## STANDARD

### RPP210-M/V-L/R-S

#### Features

- RF and multi-contact/mixed-signal probing and wafer-level reliability probing
- Used with Infinity / ACP / |Z| Probe high performance RF probes
- 3 linear axes with precision ball bearings
- Enables use of HF probes or probe wedges
- Magnetic mount on HF platen or alternative with vacuum mount



#### Specifications

- Feature resolution: <math><1\ \mu\text{m}</math> (0.04 mils)
- Travel range: 12.5 mm (0.5 in) in X, Y and Z (z-axis control: cw=down, ccw=up)
- Fine screws: 0.25 mm (0.01 in) pitch (100 TPI)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- Mount: vacuum or magnetic
- Footprint (WxD): 90 x 60 mm (3.5 x 2.4 in)

#### Compatibility

##### Platforms + RF Arms

PM5	PA200 BlueRay
PM8	PA300
PM300	PA300-MA
PM300PS	EPS150
PA200	MPS150

#### Ordering Information

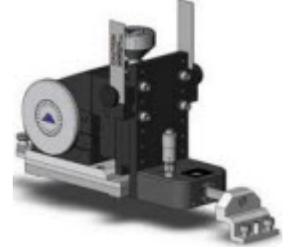
Standard (z-axis: cw=down, ccw=up)	Legacy (z-axis: cw=up, ccw=down)
RPP210-M-L-S	RPP210-M-L-S-I*
RPP210-M-R-S	RPP210-M-R-S-I*
RPP210-V-L-S	RPP210-V-L-S-I*
RPP210-V-R-S	RPP210-V-R-S-I*
RPP210-B-L-S	–
RPP210-B-R-S	–

\* Available by special request. Contact your FormFactor representative.

### RPP210-M/V/B-L/R-AI

#### Features

- RF and multi-contact/mixed-signal probing and wafer-level reliability probing
- Used with Infinity / ACP / |Z| Probe high performance RF probes
- Rigid probe platform yields repeatable measurements at microwave frequencies
- Economical conversion for probe stations originally configured for needle probing
- Accurate X and Y placement and precise probe overtravel with easily adjusted knobs
- Micrometer set planarity adjustment
- Captive stages with leadscrew design
- High precision cross-roller bearings
- Configured for use on left/right hand side of platen
- Can be ordered with either:
  - Switch type magnetic base with residual holding force
  - Vacuum base
  - Bolt-down base



#### Specifications

- Feature resolution: <math><1\ \mu\text{m}</math> (0.04 mils)
- Travel range: 12.5 mm (0.5 in) in X, Y and Z (z-axis control: cw=down, ccw=up)
- Fine screws: 0.25 mm (0.01 in) pitch (100 TPI)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- Mount: vacuum or magnetic
- Footprint (WxD): 90 x 60 mm (3.5 x 2.4 in)

#### Configurations

- Use on platen left location as West positioner
- Use on platen front location as South positioner
- Use on platen right location as East positioner
- Use on platen rear location as North positioner

#### Compatibility

- Summit 11000/12000

#### Ordering Information

- RPP210-M-L-AI
- RPP210-M-R-AI

- RPP210-V-L-AI
- RPP210-V-R-AI
- RPP210-B-L-AI
- RPP210-B-R-AI

## RPP210-B-SP-AI

### Features

- RF and multi-contact/mixed-signal probing and wafer-level reliability probing
- Used with Infinity / ACP / |Z| Probe high performance RF probes
- Rigid probe platform yields repeatable measurements at microwave frequencies
- Economical conversion for probe stations originally configured for needle probing
- Use with mmWave positioners for 4-port applications
- Accurate X and Y placement and precise probe over travel with easily adjusted knobs
- Micrometer set planarity adjustment
- Optimized for FormFactor's MicroChamber
- Captive stages with leadscrew design
- High precision cross-roller bearings
- Bolt-down base



### Specifications

- Feature resolution: <math><1 \mu\text{m}</math> (0.04 mils)
- Travel range: 12.5 mm (0.5 in) in X, Y and Z (z-axis control: cw=down, ccw=up)
- Fine screws: 0.25 mm (0.01 in) pitch (100 TPI)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- Mount: vacuum or magnetic
- Footprint (WxD): 90 x 60 mm (3.5 x 2.4 in)

### Configurations

- Use on platen in South position only

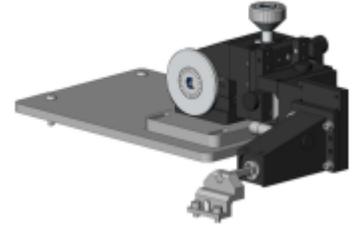
### Compatibility

- Summit 11000/12000

## RPP210-B-NP-AI

### Features

- RF and multi-contact/mixed-signal probing and wafer-level reliability probing
- Used with Infinity / ACP / |Z| Probe high performance RF probes
- Rigid probe platform yields repeatable measurements at microwave frequencies
- Economical conversion for probe stations originally configured for needle probing
- Use with mmWave positioners for 4-port applications
- Accurate X and Y placement and precise probe over travel with easily adjusted knobs
- Micrometer set planarity adjustment
- Optimized for FormFactor's MicroChamber
- Captive stages with leadscrew design
- High precision cross-roller bearings
- Bolt-down base



### Specifications

- Feature resolution: <math><1 \mu\text{m}</math> (0.04 mils)
- Travel range: 12.5 mm (0.5 in) in X, Y and Z (z-axis control: cw=down, ccw=up)
- Fine screws: 0.25 mm (0.01 in) pitch (100 TPI)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- Mount: vacuum or magnetic
- Footprint (WxD): 90 x 60 mm (3.5 x 2.4 in)

### Configurations

- Use on platen in North position only

### Compatibility

- Summit 11000/12000

## RPP210-L/R-EW-CMC-AI — RF Probe Positioner Left/Right Magnetic East-West

### Features

- RF and multi-contact/mixed-signal probing and wafer-level reliability probing
- Used with Infinity / ACP / |Z| Probe high performance RF probes
- 3 linear axes with precision ball bearings
- Used to adapt HF probes or probe wedges



### Specifications

- Feature resolution: <1 µm (0.04 mils)
- Travel range: 12.5 mm (0.5 in) in X, Y and Z (z-axis control: cw=down, ccw=up)
- Fine screws: 0.25 mm (0.01 in) pitch (100 TPI)
- Micrometer set planarity adjust: ±5°
- Mount: vacuum or magnetic
- Footprint (WxD): 90 x 60 mm (3.5 x 2.4 in)
- Positions the probe at the right side of DUT
- Horizontal probe mounting plate can be leveled
- East-West orientation
- Used with HF platen and MicroAlign

### Compatibility

- CM300xi with top chambers

## RPP210-L/R-NS-CMC-AI — RF Probe Positioner Left/Right Magnetic North-South

### Features

- RF and multi-contact/mixed-signal probing and wafer-level reliability probing
- Used with Infinity / ACP / |Z| Probe high performance RF probes
- 3 linear axes with precision ball bearings
- For adaptation of HF probes or probe wedges
- Magnetic fixation on HF platen or alternative with vacuum



### Specifications

- Feature resolution: <1 µm (0.04 mils)
- Travel range: 12.5 mm (0.5 in) in X, Y and Z (z-axis control: cw=down, ccw=up)
- Fine screws: 0.25 mm (0.01 in) pitch (100 TPI)
- Micrometer set planarity adjust: ±5°
- Mount: vacuum or magnetic
- Footprint (WxD): 90 x 60 mm (3.5 x 2.4 in)
- Positions the probe at the right side of DUT
- Horizontal probe mounting plate can be leveled
- East-West orientation
- Used with HF platen and MicroAlign

### Compatibility

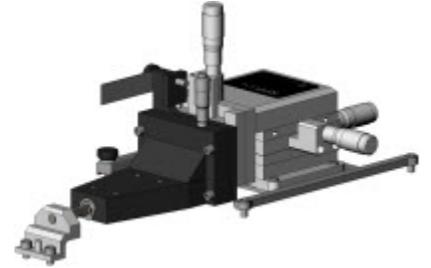
- CM300xi with top chambers

## ADVANCED

## RPP304-EW/NS/W-SU-AI

### Features

- Precision 4-axis probe positioner for RF/microwave probes
- Optimized for Summit 11000/12000-B station platform
- Rigid design for best probe placement
- New 1-click positioner quick release control allows fast setup and effortless gross positioning of RF probes
- Smooth glide micrometer controls for accurate probe placement
- Best probe-to-probe separation
- Multi position RF cable clamp and offset probe mounting arm for optimized RF cable connection
- Micrometer set planarity adjustment
- EMI grounding strap
- Industry standard RF probe mount



### Specifications

- Feature resolution: <1 µm (0.04 mils)
- Travel range:
  - X/Y: 12 mm (0.47 in)
  - Z: 12mm (0.47 in) (z-axis control: cw=down, ccw=up)
- Micrometer screws: 1000 µm (3.9 mils) pitch (25 TPI)
- Micrometer set planarity adjust: ±5°
- Gross X travel:
  - 26 mm (1 in) with TopHat
  - 68 mm (2.7 in) with no TopHat/insert
- 2-port probe tip separation
  - With MicroChamber TopHat: 40 mm (1.6 in)
  - Without MicroChamber TopHat: 93 mm (3.7 in)
- Probe mount interface: 3 hole FormFactor standard design, with locating pin

### Configurations

- Use on platen right/left location as East/West positioner (4-port)
- Use on platen top/bottom location as North/South positioners (4-port)

### Compatibility

- Summit 11000/12000, Tesla200

### Ordering Information

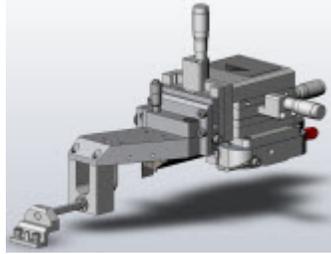
- RPP304-NS-SU-AI
- RPP304-EW-SU-AI

- RPP304-W-SU-AI

## RPP304-EW/NS-EL-AI

### Features

- Precision 4-axis probe positioner for RF/microwave probes
- Optimized for Elite MicroChamber platform
- Rigid design for optimal probe placement
- One-click positioner quick release control enables fast setup and effortless gross positioning of RF probes
- Smooth glide micrometer controls enable accurate probe placement
- Multi position RF cable clamp and offset probe mounting arm optimize RF cable connection
- Micrometer set planarity adjustment
- EMI grounding strap
- Industry standard RF probe mount



### Specifications

- Feature resolution: <math><1\ \mu\text{m}</math> (0.04 mils)
- Travel range:
  - X/Y: 12 mm (0.47 in)
  - Z: 12 mm (0.47 in) (z-axis control: cw=down, ccw=up)
- Micrometer screws: 1000  $\mu\text{m}$  (39.4 mils) pitch (25 TPI)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- Gross X travel: 26 mm (1 in) with TopHat; 68 mm (2.7 in) with no TopHat/insert
- 2-port probe tip separation
  - With MicroChamber TopHat: 40 mm (1.6 in)
  - Without MicroChamber TopHat: 93 mm (3.7 in)
- Probe mount interface: 3 hole FormFactor standard design, with locating pin

### Configurations

- Use on platen right/left location as East/West positioner (4-port)
- Use on platen top/bottom location as North/South positioners (4-port)

### Compatibility

- Elite300

### Ordering Information

- RPP304-NS-EL-AI
- RPP304-EW-EL-AI
- RPP304-W-EL-AI

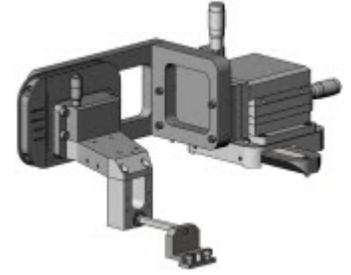
## RPP304-EW/NS/W-67 — Positioner (North/South)

### Features

- Enables probes in north/south position
- Supplied with Chamber/EMI seal

### Specifications

- Compatible with 67 GHz and lower RF probes, or DCQ probes
- Feature resolution: <math><1\ \mu\text{m}</math> (0.04 mils)
- Travel range:
  - X/Y: 12 mm (0.47 in)
  - Z: 12 mm (0.47 in) (z-axis control: cw=down, ccw=up)
- Micrometer screws: 1000  $\mu\text{m}$  (39.4 mils) pitch (25 TPI)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- Probe mount interface: 3 hole FormFactor standard design, with locating pin



### Compatibility

- CM300xi, SUMMIT200, TESLA200, Elite300

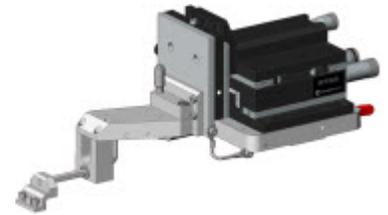
### Ordering Information

- RPP304-EW-67
- RPP304-W-67
- RPP304-NS-67

## RPP305-EW/NS-EL/SU-AI

### Features

- Used for high-performance RF, multi-contact/mixed signal probing, high-performance wafer-level reliability probing, and single-ended broadband/mm-Wave, THz, source/load-pull, RF noise probing
- Used with Infinity / ACP / |Z| Probe / T-Wave high performance RF probes
- Precision 4 axis probe positioner for RF/microwave probes
- Optimized for Elite 300/Summit 12000-B station platform
- Ultra rigid design for best probe placement
- New one-click positioner quick release control allows fast setup and effortless gross positioning of RF probes
- Smooth glide micrometer controls enable accurate probe placement
- Best probe-to-probe separation
- Multi position RF cable clamp and offset probe mounting arm for optimized RF cable connection



- Micrometer set planarity adjustment
- EMI grounding strap
- Industry standard RF probe mount

### Specifications

- Feature resolution: <1 µm (0.04 mils)
- Travel range:
  - X/Y: 25 mm (1 in),
  - Z: 10 mm (0.4 in) (z-axis control: cw=down, ccw=up)
- Micrometer set planarity adjust: ±5°
- Micrometer screws: 500µm pitch (50 TPI)
- 2-port probe tip separation
  - With TopHat: 40 mm (1.6 in)
  - Without TopHat: 93 mm (3.7 in)
- Mount: bolt-down
- Footprint (W x D): 124 x 124 mm (4.9 x 4.9 in)

### Configurations

- Use on platen right/left location as East/West positioner (4-port)
- Use on platen top/bottom location as North/South positioners (4-port)

### Compatibility

Open Platforms + EL Arms	Open Platforms + SU Arms
Elite 300	Summit 12000 Tesla200

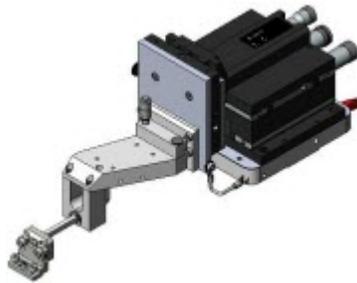
### Ordering Information

Elite 300	Summit 12000
RPP305-NS-EL-AI	RPP305-NS-SU-AI
RPP305-EW-EL-AI	RPP305-EW-SU-AI

## RPP305-EW/NS-CM-AI

### Features

- Used for high-performance RF, multi-contact/mixed signal probing, high-performance wafer-level reliability probing, and single-ended broadband/mm-Wave, THz, source/load-pull, RF noise probing
- Used with Infinity / ACP / |Z| Probe / T-Wave high performance RF probes
- Precision 4 axis probe positioner for RF/microwave probes
- Optimized for CM300xi station platform
- Ultra rigid design for best probe placement
- New one-click positioner quick release control enables fast setup and effortless gross positioning of RF probes



- Smooth glide micrometer controls for accurate probe placement
- Best probe-to-probe separation
- Multi position RF cable clamp and offset probe mounting arm for optimized RF cable connection
- Micrometer set planarity adjustment
- EMI grounding strap
- Industry standard RF probe mount

### Specifications

- Feature resolution: <1 µm (0.04 mils)
- Travel range:
  - X/Y: 25 mm (1 in),
  - Z: 10 mm (0.4 in) (z-axis control: cw=down, ccw=up)
- Micrometer set planarity adjust: ±5°
- Micrometer screws: 500µm pitch (50 TPI)
- 2-port probe tip separation
  - With TopHat: 40 mm (1.6 in)
  - Without TopHat: 93 mm (3.7 in)
- Mount: bolt-down
- Footprint (W x D): 124 x 124 mm (4.9 x 4.9 in)
- Use on platen right/left location as East/West positioner (4-port)
- Use on platen top/bottom location as North/South positioners (4-port)

### Compatibility

- CM300xi with Top Hat, Elite 300

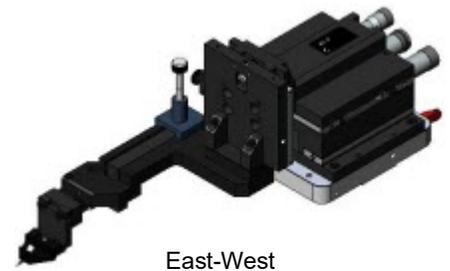
### Ordering Information:

- RPP305-EW-CM-AI
- RPP305-NS-CM-AI

## RPP305-EW/NS-CMC-AI — High Performance RF Probe Positioner 50 TPI Bolt Down East-West or North-South

### Features

- Used for high-performance RF, multi-contact/mixed signal probing, high-performance wafer-level reliability probing, and single-ended broadband/mm-Wave, THz, source/load-pull, RF noise probing
- Used with Infinity / ACP / |Z| Probe / T-Wave high performance RF probes
- Precision 4 axis probe positioner for RF/microwave probes
- Optimized for CM300xi station platform
- Ultra rigid design for best probe placement



- New one-click positioner quick release control allows fast setup and effortless gross positioning of RF probes
- Smooth glide micrometer controls for accurate probe placement
- Best probe-to-probe separation
- Multi position RF cable clamp and offset probe mounting arm for optimized RF cable connection
- Micrometer set planarity adjustment
- Industry standard RF probe mount



North-South

### Specifications

- Feature resolution: <math><1\ \mu\text{m}</math> (0.04 mils)
- Travel range:
  - X/Y: 25 mm (1 in),
  - Z: 10 mm (0.4 in) (z-axis control: cw=down, ccw=up)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- Micrometer screws: 500 $\mu\text{m}$  pitch (50 TPI)
- 2-port probe tip separation
  - With TopHat: 40 mm (1.6 in)
  - Without TopHat: 93 mm (3.7 in)
- Mount: bolt-down
- Footprint (W x D): 124 x 124 mm (4.9 x 4.9 in)

### Configurations

- Use on platen right/left location as East/West positioner (4-port)
- Use on platen top/bottom location as North/South positioners (4-port)

### Compatibility

- CM300xi with top chambers

### Ordering Information

- RPP305-NS-CMC-AI
- RPP305-EW-CMC-AI

## RPP305-EW/NS-HT-AI

### Features

- Used for high-performance RF, multi-contact/mixed signal probing, high-performance wafer-level reliability probing, and single-ended broadband/mm-Wave, THz, source/load-pull, RF noise probing



- Used with Infinity / ACP / |Z| Probe / T-Wave high performance RF probes
- Precision 4-axis probe positioner for RF/microwave probes
- High temperature stability
- Recommended for testing at high temperatures or multiple temperatures
- Optimized for CM300xi station platform
- Ultra rigid design for best probe placement
- New one-click positioner quick release control enables fast setup and effortless gross positioning of RF probes
- Smooth glide micrometer controls for accurate probe placement
- Best probe-to-probe separation
- Multi position RF cable clamp and offset probe mounting arm for optimized RF cable connection
- Micrometer set planarity adjustment
- EMI grounding strap
- Industry standard RF probe mount

### Specifications

- Feature resolution: <math><1\ \mu\text{m}</math> (0.04 mils)
- Travel range:
  - X/Y: 25 mm (1 in),
  - Z: 10 mm (0.4 in) (z-axis control: cw=down, ccw=up)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- Micrometer screws: 500 $\mu\text{m}$  pitch (50 TPI)
- 2-port probe tip separation
  - With TopHat: 40 mm (1.6 in)
  - Without TopHat: 93 mm (3.7 in)
- Mount: bolt-down
- Footprint (W x D): 124 x 124 mm (4.9 x 4.9 in)

- Use on platen right/left location as East/West positioner (4-port)
- Use on platen top/bottom location as North/South positioners (4-port)

### Compatibility

- CM300xi with Top Hat, Elite 300

### Ordering Information

- RPP305-EW-HT-AI
- RPP305-NS-HT-AI

## RPP305-EWM-CMC- AI — High Performance RF Probe Positioner 50 TPI Bolt Down East-West or Mirrored

### Features

- Used for high-performance RF, multi-contact/mixed signal probing, high-performance wafer-level reliability probing, and single-ended broadband/mm-Wave, THz, source/load-pull, RF noise probing
- Used with Infinity / ACP / |Z| Probe / T-Wave high performance RF probes
- Precision 4 axis probe positioner for RF/microwave probes
- Optimized for CM300xi station platform
- Ultra rigid design for best probe placement
- New one-click positioner quick release control allows fast setup and effortless gross positioning of RF probes
- Smooth glide micrometer controls for accurate probe placement
- Best probe-to-probe separation
- Multi position RF cable clamp and offset probe mounting arm for optimized RF cable connection
- Micrometer set planarity adjustment
- Industry standard RF probe mount



### Specifications

- Feature resolution: <math><1 \mu\text{m}</math> (0.04 mils)
- Travel range:
  - X/Y: 25 mm (1 in),
  - Z: 10 mm (0.4 in) (z-axis control: cw=down, ccw=up)
- Micrometer screws: 500 $\mu\text{m}$  pitch (50 TPI)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- 2-port probe tip separation
  - With TopHat: 40 mm (1.6 in)
  - Without TopHat: 93 mm (3.7 in)
- Mount: bolt-down
- Footprint (W x D): 124 x 124 mm (4.9 x 4.9 in)

### Configurations

- Use on platen right/left location as East/West positioner (4-port)

### Compatibility

- CM300xi with top chambers

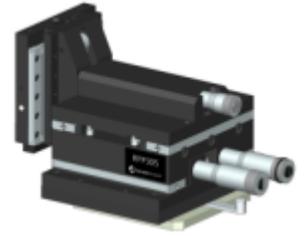
### Ordering Information

- RPP305-EWM-CMC-AI

## RPP305-M/V/B-S

### Features

- Used for high-performance RF, multi-contact/mixed signal probing, high-performance wafer-level reliability probing, and single-ended broadband/mm-Wave, THz, source/load-pull, RF noise probing
- Used with Infinity / ACP / |Z| Probe / T-Wave high performance RF probes
- Precision 4 axis probe positioner for RF/microwave probes
- 3 linear axes with precision ball bearings
- For adaptation of HF probes
- Bolt down, magnetic, or vacuum fixation to HF platen



### Specifications

- Feature resolution: <math><1 \mu\text{m}</math> (0.04 mils)
- Travel range:
  - X/Y: 25 mm (1 in),
  - Z: 10 mm (0.4 in) (z-axis control: cw=down, ccw=up)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- Mount: magnetic, vacuum, bolt-down
- Footprint (W x D): 124 x 124 mm (4.9 x 4.9 in)

### Compatibility

#### Platforms + RF Arms

PM8	PA300
PM300	PA300-MA
PM300PS	EPS150
PA200	MPS150
PA200 BlueRay	

### Ordering Information

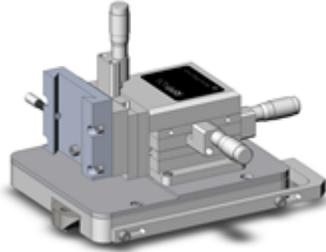
Standard (z-axis: cw=down, ccw=up)	Legacy (z-axis: cw=up, ccw=down)
RPP305-M-S	100382+131808
RPP305-V-S	100382+112953
RPP305-B-S	100382

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## RPP404 / RPP404-W

### Features

- Used for high-performance RF, multi-contact/mixed signal probing, high-performance wafer-level reliability probing, and single-ended broadband/mm-Wave, THz, source/load-pull, RF noise probing
- Used with Infinity / ACP / |Z| Probe / T-Wave high performance RF probes
- Version for East and West



### Specifications

- Compatible with RFA probe arms
- Feature resolution: <math><1\ \mu\text{m}</math> (0.04 mils)
- Travel range: 12 mm (0.47 in) in X, Y, and Z (z-axis control: cw=down, ccw=up)
- Micrometer screws: 1000  $\mu\text{m}$  (39.4 mils) pitch (25 TPI)
- Mount: bolt-down (large base)
- Footprint (WxD): 124 x 149.5 mm (4.9 x 5.9 in)

### Configuration

- Use adapter (174-889) for mounting to Summit 11000/12000 stations
- Use adapter (174-973) for mounting to EPS stations

### Compatibility

- CM300xi, SUMMIT200, Elite
- EPS150, EPS200, Summit 11000/12000 with dedicated adapter

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## 191-446 — Micrometer Screw for RPP404 X-axis

### Features

- Digital micrometer screw for RPP404 X-axis to support precise multiline TRL calibrations
- Replaces the manual X-axis micrometer with a micrometer with digital LCD readout
- For RPP404 and RPP304 positioners
- Preset, inch/mm conversion



### Specifications

- Resolution: 0.001mm (.00005 in)
- Repeatability: <math>< \pm 0.6\ \mu\text{m}</math> (0.24 mils)
- Accuracy: <math>< \pm 1\ \mu\text{m}</math> (0.04 mils) (within  $\pm 2$  mm travel range)

### Compatibility

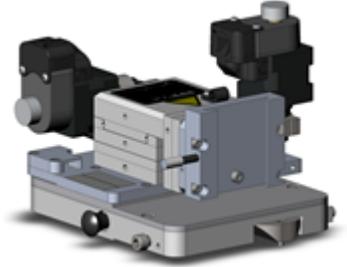
- For RPP404 and RPP304 positioners
- Can be mounted on all axes

---

## RPP504

### Features

- Used for autonomous RF, multi-contact/mixed signal probing, high-performance wafer-level reliability probing, and single-ended broadband/mm-Wave, THz, source/load-pull, RF noise probing
- Used with Infinity / ACP / |Z| Probe / T-Wave high performance RF probes
- Universal version for East and West



### Specifications

- Compatible with RFA probe arms
- Feature resolution: <math><1\ \mu\text{m}</math> (0.04 mils)
- Travel range: 12 mm (0.47 in) in X, Y, and Z (z-axis control: cw=down, ccw=up)
- Minimum step size 0.3  $\mu\text{m}$  / 0.1  $\mu\text{m}$  resolution
- Mount: bolt-down (large base)
- Footprint (WxD): 124 x 149.5 mm (4.9 x 5.9 in)

### Configuration

- Requires MPX controller (178-511 for up to 4 positioners, 181-170 for up to 2 positioners, 183-111 for single positioner)
- Requires station adapter kit (178-517 for CM300xi, 183-825 for SUMMIT200, 178-920 for EPS)
- For use with ECX box on 12KB/E300, one interface 174-544 per positioner required
- Use adapter (174-973) for mounting to EPS stations
- Use adapter (174-889) for mounting to Summit 11000/12000 stations

### Compatibility

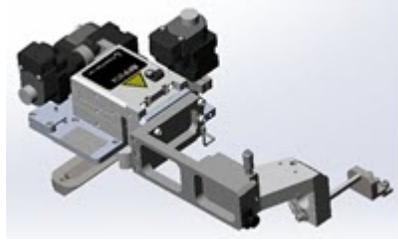
- CM300xi, SUMMIT200, Elite
- EPS150, EPS200, Summit 11000/12000 with dedicated adapter

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## RPP504-NS-67

### Features

- Used for autonomous RF, multi-contact/mixed signal probing, high-performance wafer-level reliability probing, and single-ended broadband/ mm-Wave, THz, source/load-pull, RF noise probing
- Used with Infinity / ACP / |Z| Probe / T-Wave high performance RF probes
- Universal version for East and West



### Specifications

- Compatible with RFA probe arms
- Feature resolution: <math><1\ \mu\text{m}</math> (0.04 mils)
- Travel range: 12 mm (0.47 in) in X, Y, and Z (z-axis control: cw=down, ccw=up)
- Minimum step size 0.3  $\mu\text{m}$  / 0.1  $\mu\text{m}$  resolution
- Mount: bolt-down (large base)
- Footprint (WxD): 124 x 149.5 mm (4.9 x 5.9 in)

### Configuration

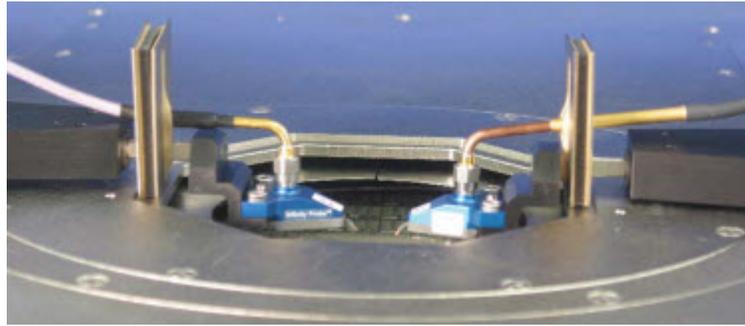
- Requires MPX controller (178-511 for up to 4 positioners, 181-170 for up to 2 positioners, 183-111 for single positioner)
- Requires station adapter kit (178-517 for CM300xi, 183-825 for SUMMIT200, 178-920 for EPS)
- For use with ECX box on 12KB/E300, one interface 174-544 per positioner required
- Use adapter (174-973) for mounting to EPS stations
- Use adapter (174-889) for mounting to Summit 11000/12000 stations

### Compatibility

- CM300xi, SUMMIT200, Elite
- EPS150, EPS200, Summit 11000/12000 with dedicated adapter

## RF and Microwave Cables

Infinity probe shown with TopHat incompatible cable (left)



Infinity probe with Top Hat compatible cable (right). An extended ferrule shorts the coax shield to the EMI gasketed TopHat for local ground reference.

### Cables for unshielded environments

GORE P/N	Junkosha P/N	Freq	Style	Length	Probe station
101-162-B‡	180-801	40 GHz	vertical probe	~120 cm (48 in)	EPS with SlimVue
103-202-B†	180-805	50 GHz	vertical probe	~120 cm (48 in)	EPS with SlimVue
124-084-B	180-800	40 GHz	angled probe	~120 cm (48 in)	EPS with SMZ168
124-085-B	180-804	50 GHz	angled probe	~120 cm (48 in)	EPS with SMZ168
124-605-B†	180-809	67 GHz	vertical probe	~90 cm (36 in)	EPS with SlimVue*
124-606-B	180-808	67 GHz	angled probe	~90 cm (36 in)	EPS with SMZ168*
132-458	180-812	110 GHz	angled probe	18 cm (7.1 in)	EPS with SlimVue*

\* Rear mounted instrument rack recommended.

† Item on limited supply. If possible, convert to alternative from Junkosha.

‡ Item is obsolete, listed for reference only.

### Cables for shielded environments with TopHat

GORE P/N	Junkosha P/N	Freq	Style	Length	Probe station
132-420‡	180-803	40 GHz	vertical probe	~120 cm (48 in)	CM300, Elite, SUMMIT200, Summit 11000/12000
132-421†	180-807	50 GHz	vertical probe	~120 cm (48 in)	CM300, Elite, SUMMIT200, Summit 11000/12000
132-422†	180-811	67 GHz	vertical probe	~90 cm (36 in)	CM300, Elite, SUMMIT200, Summit 11000/12000*
132-423†	180-802	40 GHz	angled probe	~120 cm (48 in)	CM300, Elite, SUMMIT200, Summit 11000/12000
132-424†	180-806	50 GHz	angled probe	~120 cm (48 in)	CM300, Elite, SUMMIT200, Summit 11000/12000
132-425†	180-810	67 GHz	angled probe	~90 cm (36 in)	CM300, Elite, SUMMIT200, Summit 11000/12000*
132-458	180-812	110 GHz	angled probe	18 cm (7.1 in)	Summit 11000/12000 single port*
147-316	180-813	110 GHz	angled probe	24 cm (9.4 in)	CM300, Elite, Summit 11000/12000*,**
178-383	—	110 GHz	angled probe	10 cm (3.9 in)	EPS150, EPS200, SUMMIT200, Elite, and CM300xi*
178-387	—	110 GHz	angled probe	13 cm (5.1 in)	EPS150, EPS200, SUMMIT200, Elite, and CM300xi*

\* Rear mounted instrument rack recommended.

\*\* For Summit 11000/12000 multiport set-up.

† Item on limited supply. If possible, convert to alternative from Junkosha.

‡ Item is obsolete, listed for reference only.

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## SHIELDED ENVIRONMENTS WITH TOPHAT

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### 180-803 — Cable, 40 GHz, m/f, Flexible, Vertical Style Probe Body, 48 in for MicroChamber

#### Features

- Connects 40 GHz probes with VNA

#### Specifications

- For signals DC to 40 GHz
- Connectors straight K (f) to elbow K (m)
- Length: ~120 cm (48 in)

#### Compatibility

- For vertical probe bodies and use in MicroChamber/TopHat applications

---

### 180-807 — Cable, 50 GHz, m/f, Flexible, Vertical Style Probe Body, 48 in for MicroChamber

#### Features

- Connects 50 GHz probes with VNA

#### Specifications

- For signals DC to 50 GHz
- Connectors straight 2.4 (f) to elbow 2.4 (m)
- Length: ~120 cm (48 in)

#### Compatibility

- For vertical probe bodies and use in MicroChamber/TopHat applications

---

### 180-811 — Cable, 67 GHz, m/f, Flexible, Vertical Style Probe Body, 36 in for MicroChamber

#### Features

- Connects 67 GHz probes with VNA

#### Specifications

- For signals DC to 67 GHz
- Connectors straight 2.4 (f) to elbow 2.4 (m)
- Length: ~90 cm (36 in)

#### Compatibility

- For vertical probe bodies and use in MicroChamber/TopHat applications

---

### 180-802 — Cable, 40 GHz, m/f, Flexible, Angled Style Probe Body, 48 in for MicroChamber

#### Features

- Connects 40 GHz probes with VNA

#### Specifications

- For signals DC to 40 GHz
- Connectors straight K (f) to straight K (m)
- Length: ~120 cm (48 in)

#### Compatibility

- For angled probe bodies and use in MicroChamber/TopHat applications

---

### 180-806 — Cable, 50 GHz, m/f, Flexible, Angled Style Probe Body, 48 in for MicroChamber

#### Features

- Connects 50 GHz probes with VNA

#### Specifications

- For signals DC to 50 GHz
- Connectors straight 2.4 (f) to straight 2.4 (m)
- Length: ~120 cm (48 in)

#### Compatibility

- For angled probe bodies and use in MicroChamber/TopHat applications

---

### 180-810 — Cable, 67 GHz, m/f, Flexible, Angled Style Probe Body, 36 in for MicroChamber

#### Features

- Connects 67 GHz probes with VNA

#### Specifications

- For signals DC to 67 GHz
- Connectors straight 1.85 (f) to straight 1.85 (m)
- Length: ~90 cm (36 in)
- Connector mechanically compatible with 2.4 type

#### Compatibility

- For angled probe bodies and use in MicroChamber/TopHat applications

---

### 180-812 — Cable, Test Port, 1mm, m/f, 110 GHz, 18 cm for MicroChamber

#### Features

- Connects 110 GHz probes with test head

#### Specifications

- For signals DC to 110 GHz
- Connectors straight 1.00 (f) to straight 1.00 (m)
- Length: 18 cm (7 in)

#### Compatibility

- For angled probe bodies and use in MicroChamber/TopHat applications

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**180-813 — Cable, Test Port, 1mm m/f, 110 GHz, 24 cm for Elite 300**

**Features**

- Connects 110 GHz probes with test head

**Specifications**

- For signals DC to 110 GHz
- Connectors straight 1.00 (f) to straight 1.00 (m)
- Length: 24 cm (9 in)

**Compatibility**

- For angled probe bodies and use in MicroChamber/TopHat applications on Elite 300

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**178-383 — RF Cable, 110 GHz, m/f, 100 mm**

**Features**

- Connects 110 GHz probes with Keysight M4 test head



**Specifications**

- For signals DC to 110 GHz
- Connectors straight 1.00 (f) to straight 1.00 (m)
- Length: 10 cm (4 in)

**Compatibility**

- For angled probe bodies and use in MicroChamber/TopHat applications in M4 single port set-up

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**178-387 — RF Cable, 110 GHz, m/f, 130 mm**

**Features**

- Connects 110 GHz probes with Keysight M4 test head



**Specifications**

- For signals DC to 110 GHz
- Connectors straight 1.00 (f) to straight 1.00 (m)
- Length: 13 cm (5 in)

**Compatibility**

- For angled probe bodies and use in MicroChamber/TopHat applications in M4 multiport set-up

---

**132-421 — Cable, 50 GHz, m/f, Flexible, Vertical Style Probe Body, 48 in for MicroChamber**

**Features**

- Connects 50 GHz probes with VNA

**Specifications**

- For signals DC to 50 GHz
- Connectors straight 2.4 (f) to straight 2.4 (m)
- Length: ~120 cm (48 in)

**Compatibility**

- For vertical probe bodies and use in MicroChamber/TopHat applications

---

**132-422 — Cable, 67 GHz, m/f, Flexible, Vertical Style Probe Body, 36 in for MicroChamber**

**Features**

- Connects 67 GHz probes with VNA

**Specifications**

- For signals DC to 67 GHz
- Connectors straight 2.4 (f) to elbow 2.4 (m)
- Length: ~90 cm (36 in)

**Compatibility**

- For vertical probe bodies and use in MicroChamber/TopHat applications

---

**132-423 — Cable, 40 GHz, m/f, Flexible, Angled Style Probe Body, 48 in for MicroChamber**

**Features**

- Connects 40 GHz probes with VNA

**Specifications**

- For signals DC to 40 GHz
- Connectors straight K (f) to straight K (m)
- Length: ~120 cm (48 in)

**Compatibility**

- For angled probe bodies and use in MicroChamber/TopHat applications

---

**132-424 — Cable, 50 GHz, m/f, Flexible, Angled Style Probe Body, 48 in for MicroChamber**

**Features**

- Connects 50 GHz probes with VNA

**Specifications**

- For signals DC to 50 GHz

- Connectors straight 2.4 (f) to straight 2.4 (m)
- Length: ~120 cm (48 in)

#### **Compatibility**

- For angled probe bodies and use in MicroChamber/TopHat applications

---

### **132-425 — Cable, 67 GHz, m/f, Flexible, Angled Style Probe Body, 36 in for MicroChamber**

#### **Features**

- Connects 67 GHz probes with VNA

#### **Specifications**

- For signals DC to 67 GHz
- Connectors straight 1.85 (f) to straight 1.85 (m)
- Length: ~90 cm (36 in)
- Connector mechanically compatible with 2.4 type

#### **Compatibility**

- For angled probe bodies and use in MicroChamber/TopHat applications

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### **147-316 — Cable, Test Port, 1mm m/f, 110 GHz, 24 cm for Elite 300**

#### **Features**

- Connects 110 GHz probes with test head

#### **Specifications**

- For signals DC to 110 GHz
- Connectors straight 1.00 (f) to straight 1.00 (m)
- Length: 24 cm (9 in)

#### **Compatibility**

- For angled probe bodies and use in MicroChamber/TopHat applications on Elite 300

---

### **132-458 — Cable, Test Port, 1mm, m/f, 110 GHz, 18 cm for MicroChamber**

#### **Features**

- Connects 110 GHz probes with test head

#### **Specifications**

- For signals DC to 110 GHz
- Connectors straight 1.00 (f) to straight 1.00 (m)
- Length: 18 cm (7 in)

#### **Compatibility**

- For angled probe bodies and use in MicroChamber/TopHat applications

---

## **UNSHIELDED ENVIRONMENTS**

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### **180-801 — Cable, 40 GHz 2.92mm (f), 2.92 mm (m) Integrated Elbow, 48 inch**

#### **Features**

- Connects 40 GHz probes with VNA

#### **Specifications**

- For signals DC to 40 GHz
- Connectors straight K (f) to elbow K (m)
- Length: ~120 cm (48 in)

#### **Compatibility**

- For vertical probe bodies and non-microchambered applications

---

### **180-805 — Cable, 50 GHz 2.4mm (f), 2.4mm (m) Integrated Elbow, 48 inch**

#### **Features**

- Connects 50 GHz probes with VNA

#### **Specifications**

- For signals DC to 50 GHz
- Connectors straight 2.4 (f) to elbow 2.4 (m)
- Length: ~120 cm (48 in)

#### **Compatibility**

- For vertical probe bodies and non-microchambered applications

---

### **180-800 — Cable, 40 GHz, K (f) Straight, K (m) Straight, 48 in**

#### **Features**

- Connects 40 GHz probes with VNA

#### **Specifications**

- For signals DC to 40 GHz
- Connectors straight K (f) to straight K (m)
- Length: ~120 cm (48 in)

#### **Compatibility**

- For angled probe bodies for non-microchambered applications

---

### **180-804 — Cable, 50 GHz 2.4 (f) Straight, 2.4 (m) Straight, 48 in**

#### **Features**

- Connects 50 GHz probes with VNA

#### **Specifications**

- For signals DC to 50 GHz

- Connectors straight 2.4 (f) to straight 2.4 (m)
- Length: ~120 cm (48 in)

#### **Compatibility**

- For angled probe bodies for non-microchambered applications

---

### **180-808 — Cable, 67 GHz 1.85mm (f), 1.85mm (m) Straight, 36 in**

#### **Features**

- Connects 67GHz probes with VNA

#### **Specifications**

- For signals DC to 67 GHz
- Connectors straight 1.85 (f) to straight 1.85 (m)
- Length: ~90 cm (36 in)
- Connector mechanically compatible with 2.4 type

#### **Compatibility**

- For angled probe bodies for non-microchambered applications

---

### **180-809 — Cable, 67 GHz 1.85mm (f), 1.85mm (m) Integrated Elbow, 36 in**

#### **Features**

- Connects 67 GHz probes with VNA

#### **Specifications**

- For signals DC to 67 GHz
- Connectors straight 1.85 (f) to elbow 1.85 (m)
- Length: ~90 cm (36 in)
- Connector mechanically compatible with 2.4 type

#### **Compatibility**

- For vertical probe bodies and non-microchambered applications

---

### **103-202-B — Cable, 50 GHz Flexible 2.4 mm Connector Cable/Integrated Elbow, 4-feet, m/f**

#### **Features**

- Connects 50 GHz probes with VNA

#### **Specifications**

- For signals DC to 50 GHz
- Connectors straight 2.4 (f) to elbow 2.4 (m)
- Length: ~120 cm (48 in)

#### **Compatibility**

- For vertical probe bodies and non-microchambered applications

---

### **124-084-B — Cable, 40 GHz, K (f) Straight, K (m) Straight, 48 in**

#### **Features**

- Connects 40 GHz probes with VNA

#### **Specifications**

- For signals DC to 40 GHz
- Connectors straight K (f) to straight K (m)
- Length: ~120 cm (48 in)

#### **Compatibility**

- For angled probe bodies for non-microchambered applications

---

### **124-085-B — Cable, 50 GHz 2.4 (f) Straight, 2.4 (m) Straight, 48 in**

#### **Features**

- Connects 50 GHz probes with VNA

#### **Specifications**

- For signals DC to 50 GHz
- Connectors straight 2.4 (f) to straight 2.4 (m)
- Length: ~120 cm (48 in)

#### **Compatibility**

- For angled probe bodies for non-microchambered applications

---

### **124-605-B — Cable, 67 GHz 1.85mm (f), 1.85mm (m) Integrated Elbow, 36 in**

#### **Features**

- Connects 67 GHz probes with VNA

#### **Specifications**

- For signals DC to 67 GHz
- Connectors straight 1.85 (f) to elbow 1.85 (m)
- Length: ~90 cm (36 in)
- Connector mechanically compatible with 2.4 type

#### **Compatibility**

- For vertical probe bodies and non-microchambered applications

---

### **124-606-B — Cable, 67 GHz 1.85mm (f), 1.85mm (m) Straight, 36 in**

#### **Features**

- Connects 67GHz probes with VNA

#### **Specifications**

- For signals DC to 67 GHz
- Connectors straight 1.85 (f) to straight 1.85 (m)
- Length: ~90 cm (36 in)
- Connector mechanically compatible with 2.4 type

#### **Compatibility**

- For angled probe bodies for non-microchambered applications

---

## 132-458 — Cable, Test Port, 1mm, m/f, 110 GHz, 18 cm for MicroChamber

### *Features*

- Connects 110 GHz probes with test head

### *Specifications*

- For signals DC to 110 GHz
- Connectors straight 1.00 (f) to straight 1.00 (m)
- Length: 18 cm (7 in)

### *Compatibility*

- For angled probe bodies and use in MicroChamber/TopHat applications

# RF Adapters

## 100-934 — 2.92 mm (K connector) 90° Elbow, (m) to (f)

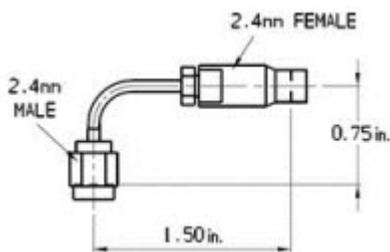


- Connectors straight SMA (f) to straight S-G square pin (f)
- Length: ~30 cm (12 in)

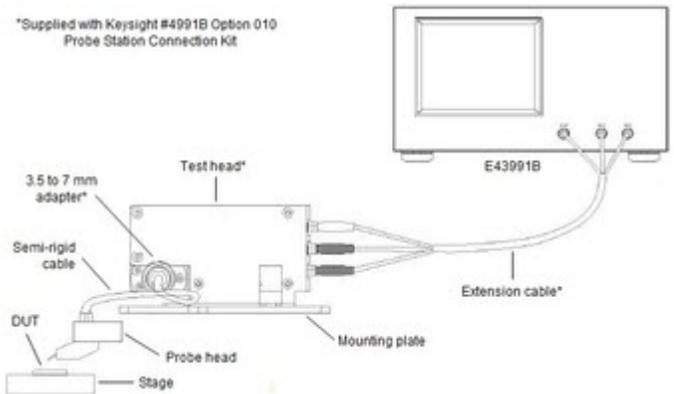
### Compatibility

- For |Z| Probe wedges with square S-G pins

## 105-010 — 2.4 mm 90° Elbow, (m) to (f)



## 123-724 — Adapter Kit for Interface Between Summit 11000/12000 and Agilent E4991A Module



### Features

- Connects a Keysight E4991A module to an ACP probe

### Specifications

- For signals DC to 110 GHz
- Connectors straight 1.00 (f) to straight 1.00 (m)
- Length: 24 cm (9.5 in)

### Compatibility

- Summit 11000/12000

## 105-097 — 2.4 mm (f) to 2.92 mm (m) Adapter

### Features

- Connects 40 GHz cables to 40 GHz or 50 GHz Keysight VNA, or 40 GHz probes to 50 GHz cables



## 164-500 — 2.4 mm (m) to 2.92 mm (f) Adapter

### Features

- Connects 50 GHz probes to 40 GHz cables

## 122-237 — SMA (f) to S-G Square Pin Header, 12 in (30 cm) Flexible Cable

### Features

- Connects |Z| Probe wedges with VNA



### Specifications

- For signals DC to 18 GHz

# mmW and Motorized Positioners

## OPEN PLATFORM RF AND MICROWAVE POSITIONERS

### 129227 — PH350HF (2)

#### Features

- Set of two PH350HF includes probe arms for fixing standard HF probes from all vendors
- For adaptation of the 1 mm 110GHz modules Keysight N5250A or Anritsu 3742A-EW fixed with screws on the PH350
- For adaptation of all Rohde & Schwarz converter with 1 mm cable, requires additional adapter platen depending from type (on request)
- Special flat design to minimize the HF cable length for highest measurement dynamic range
- Mounting of other tuners is possible with leveling feet and/or adapter platen (on request)
- Fixed by screws onto the HF platen



#### Specifications

- Travel range:
  - X/Y: 25 mm (1 in)
  - Z: 10 mm (0.4 in) (z-axis control: cw=down, ccw=up)
- With 75 mm (3 in) fast X-coarse movement for coaxial measurements
- Micrometer pitch: 500µm pitch (50 TPI)

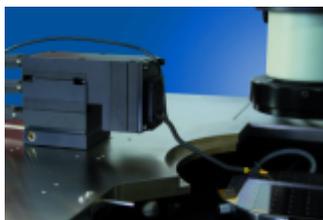
#### Compatibility

- All PA/PM stations with dedicated platen (except BlueRay and MicroAlign)

### 138230 — PH510 Motorized Positioner

#### Features

- IV/CV, RF motorized probing
- Multi-contact/mixed signal probing
- Versatile wafer level reliability probing



#### Specifications

- Feature resolution: 3 µm (0.12 mils)
- Travel range: 25 mm (1 in) in X, Y, and Z
- Encoder resolution: (X / Y / Z) 0.02/ 0.02/ 0.02 µm (0.0008 mils)
- Mount: vacuum, magnetic, bolt down
- Footprint: 64 x 122 mm (2.5 x 4.8 in)

#### Configuration

- Use adapter 138610, 142480 or 143098 for mounting to PM5, PM8, PM300, PA200, PA300, PA200 BlueRay, PA300 MicroAlign

#### Compatibility

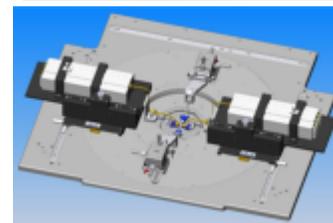
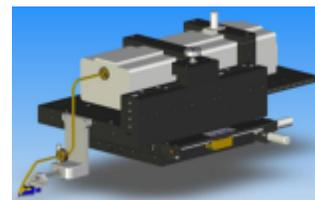
- PM5, PM8, PM300, PM300PS, PA200, PA200 BlueRay, PA300, PA300 MicroAlign

## CM300xi & ELITE 300 RF AND MICROWAVE POSITIONERS

### 141-778 — mmW Large Area Positioner (E)

#### Features

- Used for high-performance single-ended/differential broadband/ mm-Wave, sub-THz S-parameters, and source/load-pull, RF noise probing
- Used with Infinity / ACP / T-Wave high performance RF probes
- Precision 3 axis large area positioner for mmWave probes
- Optimized for CM300xi and Elite 300 Station Platforms
- Micrometer set planarity adjustment



4-port configuration using East mmWave positioner, West mmWave positioner, and 2 E/W RF positioners placed in N/S positions

#### Specifications

- Feature resolution: 3 µm (0.12 mils)
- Travel range:
  - X/Y: 150 mm (5.9 in)
  - Z: 12.5 mm (0.5 in) (z-axis control: cw=down, ccw=up)
- Micrometer set planarity adjust: ±5°
- 2-port probe tip separation
- Adjustable for MicroChamber TopHat: 40 mm (1.6 in for Elite) and 43 mm (1.7 in for CM300xi)
- Without MicroChamber TopHat: TBD mm (y in)
- Mount: bolt-down
- Footprint: 204 x 204 mm (8 in)
- Weight = approx. 11 kg (23 pounds)

#### Configurations

- Use on platen right location as East positioner (2-port)

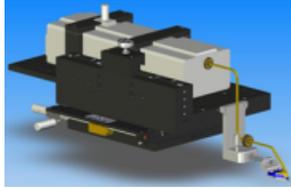
## Compatibility

- SUMMIT200, CM300xi, Elite 300

## 141-779 — mmW Large Area Positioner (W)

### Features

- Used for high-performance single-ended/differential broadband/ mm-Wave, sub-THz S-parameters, and source/load-pull, RF noise probing
- Used with Infinity / ACP / T-Wave high performance RF probes
- 3 axis large area positioner for mmWave probes
- Optimized for CM300xi and Elite 300 Station Platforms
- Micrometer set planarity adjustment
- Industry standard RF probe mount



### Specifications

- Feature resolution: 3  $\mu\text{m}$  (0.12 mils)
- Travel range:
  - X/Y: 150 mm (5.9 in)
  - Z: 12.5 mm (0.5 in) (z-axis control: cw=down, ccw=up)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- 2-port probe tip separation
- Adjustable for MicroChamber TopHat: 40 mm (1.6 in for Elite) and 43 mm (1.7 in for CM300xi)
- Without MicroChamber TopHat: TBD mm (y in)
- Mount: bolt-down
- Footprint: 204 x 204 mm (8 in)
- Weight = approx. 11 kg (23 pounds)

### Configurations

- Use on platen left location as West positioner (2-port)

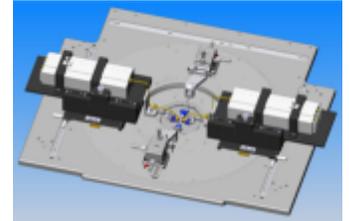
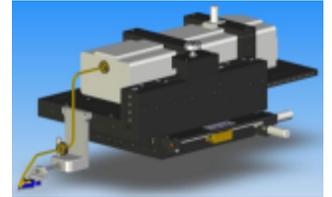
### Compatibility

- SUMMIT200, CM300xi, Elite 300

## 181-895 — mmW Large Area Positioner HTS (E)

### Features

- Used for high-performance single-ended/differential broadband/ mm-Wave, sub-THz S-parameters, and source/load-pull, RF noise probing
- Used with Infinity / ACP / T-Wave high performance RF probes
- Precision 3 axis large area positioner for mmWave probes
- Optimized for CM300xi and Elite 300 Station Platforms
- Micrometer set planarity adjustment
- High temperature stability (HTS)
- Recommended for testing at high temperatures or multiple temperatures



4-port configuration using East mmWave positioner, West mmWave positioner, and 2 E/W RF positioners placed in N/S positions

### Specifications

- Feature resolution: 3  $\mu\text{m}$  (0.12 mils)
- Travel range:
  - X/Y: 150 mm (5.9 in)
  - Z: 12.5 mm (0.5 in) (z-axis control: cw=down, ccw=up)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- 2-port probe tip separation
- Adjustable for MicroChamber TopHat: 40 mm (1.6 in for Elite) and 43 mm (1.7 in for CM300xi)
- Without MicroChamber TopHat: TBD mm (y in)
- Mount: bolt-down
- Footprint: 204 x 204 mm (8 in)
- Weight = approx. 11 kg (23 pounds)

### Configurations

- Use on platen right location as East positioner (2-port)

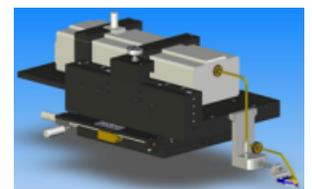
### Compatibility

- CM300xi with Top Hat, Elite 300

## 181-896 — mmW Large Area Positioner HTS (W)

### Features

- Used for high-performance single-ended/differential broadband/ mm-Wave, sub-THz S-parameters, and source/load-pull, RF noise probing
- Used with Infinity / ACP / T-Wave high performance RF probes
- Precision 3 axis large area positioner for mmWave probes



- Optimized for CM300xi and Elite 300 Station Platforms
- Micrometer set planarity adjustment
- High temperature stability (HTS)
- Recommended for testing at high temperatures or multiple temperatures

### Specifications

- Feature resolution: 3  $\mu\text{m}$  (0.12 mils)
- Travel range:
  - X/Y: 150 mm (5.9 in)
  - Z: 12.5 mm (0.5 in) (z-axis control: cw=down, ccw=up)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- 2-port probe tip separation
- Adjustable for MicroChamber TopHat: 40 mm (1.6 in for Elite) and 43 mm (1.7 in for CM300xi)
- Without MicroChamber TopHat: TBD mm (y in)
- Mount: bolt-down
- Footprint: 204 x 204 mm (8 in)
- Weight = approx. 11 kg (23 pounds)

### Configurations

- Use on platen left location as West positioner (2-port)

### Compatibility

- CM300xi with TopHat, Elite 300

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## SUMMIT 11000/12000 RF AND MICROWAVE POSITIONERS

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### 133-525 — mmW Positioner, Manual, West Positioner

#### Features

- Precision 3 axis large area positioner for Waveguide and 1.0 mm coaxial probes
- True vertical Z-axis avoids probe damage when probes are in close proximity to each other (thru measurements) and easy to view initial contact for accurate probe placement
- Quick release mechanism on X and Y axes for rapid test set-up
- Micrometer set planarity adjustment
- Industry standard RF probe mount
- Includes brackets to secure common test heads



#### Specifications

- X travel: 132 mm (5.2 in)
- Y travel: 143 mm (5.6 in)
- Z travel: 12.5 mm (0.5 in) (z-axis control: cw=down, ccw=up)
- Micrometer set planarity adjust:  $\pm 5^\circ$

- Probe mount interface: 3 hole FormFactor standard design, with locating pin

### Configurations

- Use on platen right location as West positioner

### Compatibility

- Summit 11000/12000, S300

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### 133-528 — mmW Positioner, Manual, East Position

#### Features

- Precision 3 axis large area positioner for Waveguide and 1.0 mm coaxial probes
- True vertical Z-axis avoids probe damage when probes are in close proximity to each other (thru measurements) and easy to view initial contact for accurate probe placement
- Quick release mechanism on X and Y axes for rapid test set-up
- Micrometer set planarity adjustment
- Industry standard RF probe mount
- Includes brackets to secure common test heads



#### Specifications

- X travel: 132 mm (5.2 in)
- Y travel: 143 mm (5.6 in)
- Z travel: 12.5 mm (0.5 in) (z-axis control: cw=down, ccw=up)
- Micrometer set planarity adjust:  $\pm 5^\circ$
- Probe mount interface: 3 hole FormFactor standard design, with locating pin

### Configurations

- Use on platen left location as East positioner

### Compatibility

- Summit 11000/12000, S300

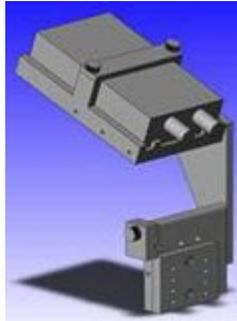
# Positioner Accessories

## DCM POSITIONER ACCESSORIES

### 138-023 — Bracket for Keithley 4200-PA-1 for DPP2xx Positioner

#### Features

- Positions the Preamp close to the wafer/ device under test
- Isolated from the thermal environment of the wafer and station platen for highly stable measurements
- Mounts to Z axis to minimize cable flexure between the Amp and probe



#### Kit Contents

- Mounting bracket
- Mounting hardware

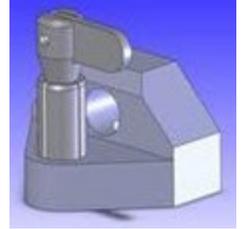
#### Compatibility

- Elite 300, Summit 11000/12000, S300, M150, Alessi

### 141-858 — FPC Mount for RF Positioners

#### Features

- Adapts from standard FormFactor 3-hole mount to FPC style mount
- Enables the FPC probe to swing to reach probing target



#### Specifications

- Compatible with standard 40 mm chuck below platen configurations
- Compatible with POS-RF positioners

### 157-451 — DC Tip Holder

#### Features

- Mounts a DC needle to any RF probe mount
- Requires 100805 (50 cm / 20 in) or 100751 (150 cm / 60 in) coaxial cable arm



#### Specifications

- Leakage: <5fA
- Capacitance: <4pF

## RF POSITIONER ACCESSORIES

### 107-088 — Bracket Mount for Bias Tee/Keysight E4991A Module, for RF Positioners

#### Features

- Accessory mounting kit for RF positioners
- Used for bias tees
- Used for test head modules such as Keysight E4991 test heads
- Slotted mounting holes for easy multiple use adaptation



#### Kit Contents

- Mounting plate
- Plate mounting hardware

#### Compatibility

- Elite 300, Summit 11000/12000, S300, M150, Alessi

### 174-889 — Summit 11000/12000 Platen Adapter

#### Features

- Adapts the Summit 11000/12000 station platen to enable mounting of RPP404/ RPP504 positioners
- Requires one adapter per side



#### Compatibility

- Summit 11000/12000 11000/12000

### 174-973 — EPS Platen Adapter

#### Features

- Adapts the EPS station platen to enable mounting of RPP404/ RPP504 positioners
- Requires one adapter per positioner



#### Compatibility

- EPS150, EPS200

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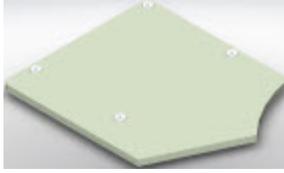
## POSITIONER ACCESSORIES FOR OPEN PLATFORMS

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### 115604 — Quarter Ring on HF Platen for DC Probes

#### Features

- One quarter ring which instead of a [RPP305-M-S] can be bolted down to each of the 4 corners of an HF platen
- All DC probes can be used with standard arm length
- Fits all HF platens except MicroAlign



#### Compatibility

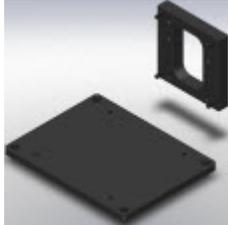
- PA300, PM300, PA200, PM8 + HF platen

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### 143098 — PH510 Positioner Adapter for HF Platen and RPP305-S Probe Arm

#### Features

- Mechanical adaptation of PH510 to layout of RF platen
- Adaptation for use of RF probe arms RPP305-S



#### Compatibility

- PH510

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### 18129 — Plug, Female, HF-3 mm, Subminiature

#### Features

- Fits 3 mm (0.12) male HF plug (18130) used with DPP105



#### Compatibility

- DPP105

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## MOTORIZED POSITIONER ACCESSORIES

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### 178-511 — MPX Controller for 4 Motorized Positioners

#### Features

- Controller box for up to 4 motorized RPP504 or DPP504-B positioners



#### Compatibility

- CM300xi, SUMMIT200, EPS150/200

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### 178-517 — Adapter Kit for MPX Controller on CM300xi

#### Features

- Used for mounting the MPX controller on a CM300xi station
- Mounts at the rear side of the station



#### Compatibility

- CM300xi

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### 178-924 — Adapter Kit for MPX Controller on SUMMIT200

#### Features

- Used for mounting the MPX controller on a SUMMIT200 station
- Mounts at the rear side of the station



#### Compatibility

- SUMMIT200

---

### 178-920 — Adapter Kit for MPX Controller on EPS

#### Features

- Used for mounting the MPX controller as a stand-alone unit



### ***Compatibility***

- EPS150/200, Summit 11000/12000 12000, Elite 300

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## **181-170 — MPX Controller for 2 Motorized Positioners**

### ***Features***

- Controller box for up to 2 motorized RPP504 or DPP504-B positioners

### ***Compatibility***

- CM300xi, SUMMIT200, EPS150/200



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## **183-111 — MPX Controller for 1 Motorized Positioners**

### ***Features***

- Controller box for 1 motorized RPP504 or DPP504-B positioner

### ***Compatibility***

- CM300xi, SUMMIT200, EPS150/200



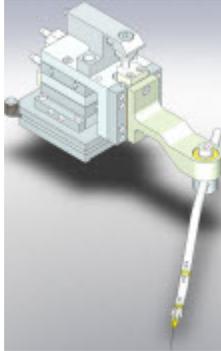
# Cryogenic & Vacuum Positioners

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## 137197 — VCP110, DC Triax, Cryo, PMC200/PAC200

### Features

- Used for IV/CV probing and failure analysis in vacuum/cryogenic environments
- Used with PTT probes
- VCP110 high vacuum probe positioner
- Stainless steel main body
- Magnetic foot adapter
- 3 linear axes with 12 mm movement range
- Probe arm DC triax with vacuum proof triax cable with connector to electrical feedthrough flange



### Specifications

- Feature resolution: 3  $\mu\text{m}$  (0.12 mils)
- Travel range: 12 mm (0.5 in) in X, Y, and Z
- Mount: magnetic
- Footprint (WxD): 65 x 65 mm (0.24 x 0.24 in)

### Compatibility

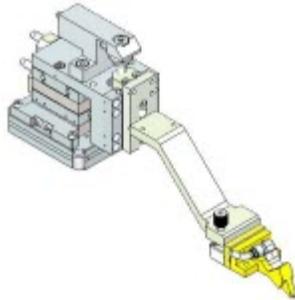
- PAC200, PMC200

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## 137198 — VCP110, HF East-West, Cryo, PMC200/PAC200

### Features

- Used for RF probing in vacuum/cryogenic environments
- Used with high performance RF probes
- VCP110 high vacuum probe positioner
- Stainless steel main body
- Magnetic foot adapter
- Probe arm HF straight



### Specifications

- Feature resolution: 3  $\mu\text{m}$  (0.12 mils)
- Travel range: 12 mm (0.5 in) in X, Y, and Z
- Mount: magnetic
- Footprint (WxD): 65 x 65 mm (0.24 x 0.24 in)

### Compatibility

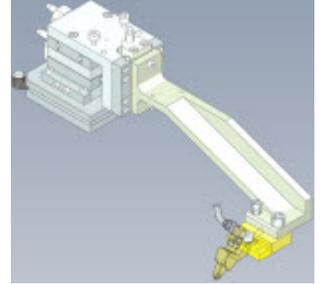
- PAC200, PMC200

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## 137199 — VCP110, North-South, Cryo, PMC200/PAC200

### Features

- Used for RF probing in vacuum/cryogenic environments
- Used with high performance RF probes
- VCP110 high vacuum positioner
- Stainless steel main body
- Magnetic foot adapter
- Probe arm HF right-angled



### Specifications

- Feature resolution: 3  $\mu\text{m}$  (0.12 mils)
- Travel range: 12 mm (0.5 in) in X, Y, and Z
- Mount: magnetic
- Footprint (WxD): 65 x 65 mm (0.24 x 0.24 in)

### Compatibility

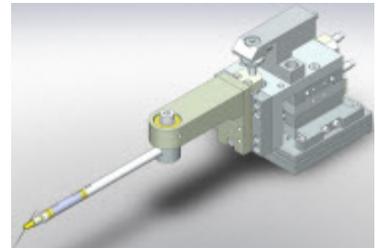
- PAC200, PMC200

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## 140967 — VCP110, High Vacuum, DC Triax, PLV50

### Features

- Used for IV/CV probing and failure analysis in vacuum/cryogenic environments
- Used with PTT probes
- VCP110 high vacuum probe positioner
- Stainless steel main body
- Magnetic foot adapter
- Probe arm DC triax with vacuum proof triax cable with connector to electrical feedthrough flange



### Specifications

- Feature resolution: 3  $\mu\text{m}$  (0.12 mils)
- Travel range: 12 mm (0.5 in) in X, Y, and Z
- Mount: magnetic
- Footprint (WxD): 65 x 65 mm (0.24 x 0.24 in)

### Compatibility

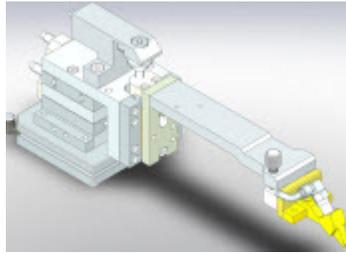
- PLV50

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## 140968 — VCP110, High Vacuum, HF East-West, PLV50

### Features

- Used for RF probing in vacuum/ cryogenic environments
- Used with high performance RF probes
- VCP110 high vacuum probe positioner
- Stainless steel main body
- Magnetic foot adapter
- Probe arm HF straight



### Specifications

- Feature resolution: 3  $\mu\text{m}$  (0.12 mils)
- Travel range: 12 mm (0.5 in) in X, Y, and Z
- Mount: magnetic
- Footprint (WxD): 65 x 65 mm (0.24 x 0.24 in)

### Compatibility

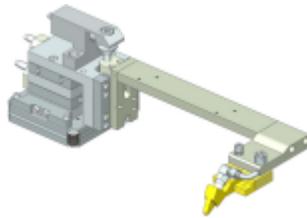
- PLV50

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## 140969 — VCP110, High Vacuum, HF Arm, North-South, PLV50

### Features

- Used for RF probing in vacuum/ cryogenic environments
- Used with high performance RF probes
- VCP110 high vacuum probe positioner
- Stainless steel main body
- Magnetic foot adapter
- Probe arm HF right-angled



### Specifications

- Feature resolution: 3  $\mu\text{m}$  (0.12 mils)
- Travel range: 12 mm (0.5 in) in X, Y, and Z
- Mount: magnetic
- Footprint (WxD): 65 x 65 mm (0.24 x 0.24 in)

### Compatibility

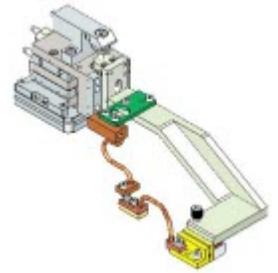
- PLV50

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## 147161 — VCP110, HF North-South, Cryo, PMC200/ PAC200

### Features

- Used for RF probing in vacuum/ cryogenic environments
- Used with high performance RF probes
- VCP110 high vacuum probe positioner
- Stainless steel main body
- Magnetic foot adapter
- Right-angled HF arm includes thermal contacts for cooling Cryo |Z|Probe



### Specifications

- Feature resolution: 3  $\mu\text{m}$  (0.12 mils)
- Travel range: 12 mm (0.5 in) in X, Y, and Z
- Mount: magnetic
- Footprint (WxD): 65 x 65 mm (0.24 x 0.24 in)

### Compatibility

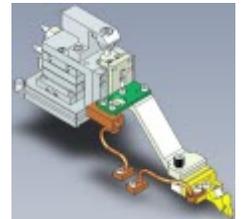
- PAC200, PMC200

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## 147160 — VCP110, HF East-West, Cryo, PMC200/PAC200

### Features

- Used for RF probing in vacuum/ cryogenic environments
- Used with high performance RF probes
- VCP110 high vacuum probe positioner
- Stainless steel main body
- Magnetic foot adapter
- HF arm straight includes thermal contacts for cooling Cryo |Z| probe



### Specifications

- Feature resolution: 3  $\mu\text{m}$  (0.12 mils)
- Travel range: 12 mm (0.5 in) in X, Y, and Z
- Mount: magnetic
- Footprint (WxD): 65 x 65 mm (0.24 x 0.24 in)

### Compatibility

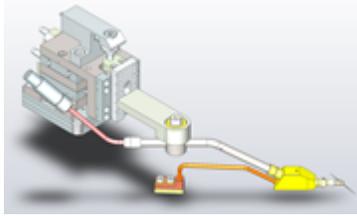
- PAC200, PMC200

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## 148722 — VCP110, DC Triax, Cryo, PMC200/PAC200

### Features

- Used for IV/CV/RF probing and failure analysis in vacuum/cryogenic environments
- Used with high performance DC or RF probes
- VCP110 high vacuum probe positioner
- Stainless steel main body
- Magnetic foot adapter
- Probe arm DC triax with vacuum proof triax cable with connector to electrical feedthrough flange
- Thermal contacts for probe cooling



### Specifications

- Feature resolution: 3  $\mu\text{m}$  (0.12 mils)
- Travel range: 12 mm (0.5 in) in X, Y, and Z
- Mount: magnetic
- Footprint (WxD): 65 x 65 mm (0.24 x 0.24 in)

### Compatibility

- PAC200, PMC200

# Probe Card Holders

## Probe Card Holders and Accessories

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### PA, PM, DSP

---

#### 100529 — Probe Card Holder, 6x7 in

##### Features

- Accepts 150 mm (6 in) wide probe card
- Probe card located below platen
- Flexible probe arms recommended if DPP3xx is used
- Low profile probe card holder with bridge mounted 5° Theta and planarity adjustment



##### Compatibility

- PA300, PM300, PA200, PM8, PM5, all DSP stations

---

#### 129912 — Probe Card Holder, 4.5 x 7 in to 4.5 x 11 in

##### Features

- Top loader/front loader functionality
- Maximum probe card thickness: 23 mm (0.9 in), front loading
- Very stiff design
- Requires Platen Insert Ring PH/PC for use in PM300BEP (132521)



##### Specifications

- For standard formats:
  - Width: 114 mm (4.5 in)
  - Length: 178- 279 mm (7-11 in)
- Theta adjustment range: 5°
- Minimum tip drop: 2 mm (0.08 in)

##### Compatibility

- PA300, PM300, PA200 and PA200 BlueRay, PM8, PM5, all DSP stations

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### PROBE CARD HOLDER ACCESSORIES

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#### 51127 — Celadon Cable Harness

##### Features

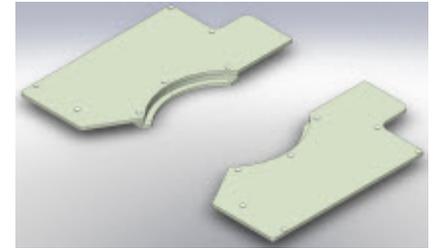
- 25 triaxial cable harness for Celadon probe cards (single site, multi site), MiniTiles or VersaTiles, length 2 meter (6.6 ft)  
Note: The double number of cables in the harness or even several harnesses are required for Kelvin Connections (two cables to each probe)
- Cable end to the prober: 26 pole microcoax connector AMP (1 Ground)
- Cable end to test meter: 25 3-lug triax plugs

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#### 100651 — Insert for Probe Card Holder

##### Features

- Used with probe cards with probe card holder and HF platen
- When DPP positioners are used, RPP305-B must be removed



##### Compatibility

- MPS150, EPS150, PM8, PM300, PA200, PA300 with RF platen,

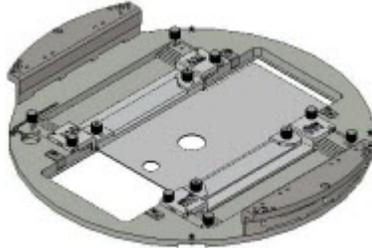
# Probe Card Holders and Accessories

## CM300xi

### 171-226 — Probe Card Holder 4.5 in for shielded CM300xi with Top Chambers

#### Features

- Used with 114 mm (4.5 in) width probe cards with the CM300xi Advanced and probe card
- Integrated ProtecPlate for optimal low-level accuracy
- Frost-free probing
- Simultaneous usage with positioners
- Simple and fast installation
- Easy compensation for different tip drop
- Check probe card for mechanical compatibility (electric connectors, tip drop, wire harness, etc.)



#### Specifications

- Probe card support:
  - Max. probe card length = 284 mm (11.2 in) (max. 142 mm [5.6 in] from probe center to front/rear)
  - Tip drop adjustable for 3.0 to 5.0 mm (in 0.5 mm steps)

#### Compatibility

- CM300xi

### 171-976 — Probe Card Holder 4.5 in for shielded CM300xi with Cover

#### Features

- Used with 114 mm (4.5 in) width probe cards inside the EMI/RFI shielded and



- light-tight CM300xi environment
- Integrated AttoGuard for optimal low-level accuracy
- Frost-free probing
- Use positioners in conjunction with the probe card by removing the PCH cover (open environment)
- Simple and fast installation
- Easy compensation for different tip drop
- Check probe card for mechanical compatibility (electric connectors, tip drop, wire harness, etc.)

#### Specifications

- Probe card support:
  - Max. probe card length = 284 mm (11.2 in) (max. 142 mm [5.6 in] from probe center to front/rear)
  - Tip drop adjustable for 3.0 to 5.0 mm (in 0.5 mm steps)

#### Compatibility

- CM300xi

### 171-977 — Probe Card Holder 4.5 in for shielded CM300xi with Cover and Celadon Probe Cards

#### Features

- Used with 114 mm (4.5 in) width probe cards inside the EMI/RFI shielded and light-tight CM300xi environment
- Integrated AttoGuard for optimal low-level accuracy
- Frost-free probing
- Use positioners in conjunction with the probe card by removing the PCH cover (open environment)
- Simple and fast installation
- Easy compensation of different tip drop
- Check probe card for mechanical compatibility (electric connectors, tip drop, wire harness, etc.)



#### Specifications

- Probe card support:
  - Max. probe card length = 284 mm (11.2 in) (max. 142 mm [5.6 in] from probe center to front/rear)
  - Tip drop adjustable for 3.0 to 5.0 mm (in 0.5 mm steps)

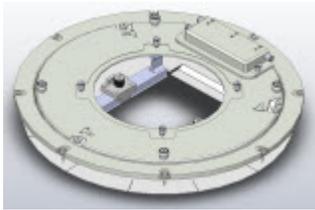
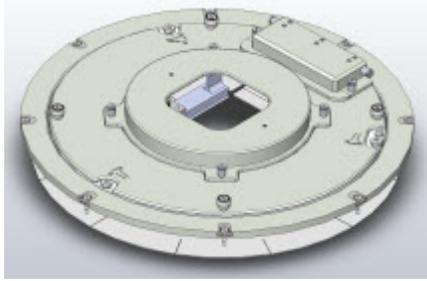
#### Compatibility

- CM300xi

## 173-020 — 4.5 in Probe Card Holder, HTS, for Shielded CM300xi

### Features

- Probe card holder for 114 mm (4.5 in) rectangular probe cards
- Maintains dark, dry, EMI/RFI shielded environment (CM300xi shielded and fully-shielded)
- Can be oriented E/W/ S/N for short cables to test equipment
- Easy 3-point probe card planarization
- Simple and fast installation, quick changeover from positioners to probe card



Shown with quick access cover removed

- High thermal stability design and materials
- Check probe card for mechanical compatibility (electric connectors, nominal tip drop 4.7 mm [0.185 in], etc.)

### Specifications

- Temperature range supported: -60°C (-76°F) to 300°C (572°F)
- For unattended testing of pads down to 30 x 30 µm (1.12 x 1.12 mils) at temperatures between -55°C to +175°C (-67°F to +347°F)
- Probe card support:
  - For Celadon T40 probe cards or compatible
  - Max. probe card length = 160 mm (6.3 in) (max. 80 mm [3.1 in] from probe center to front/rear)
- Height adjustability:
  - For nominal tip drop of 4.7 mm (0.185 in)
  - ProbeHorizon tolerates +/-0.5 mm (0.02 in) of nominal tip drop
- Max planarization height range: up to 40 mils compression at each planarization point (3)
- Max probe card force: 20 kg (44 lb)

### Compatibility

- CM300xi

## ELITE 300/SUMMIT200/TESLA200

## 177-600/X2-PIPCH — Probe Card Holder

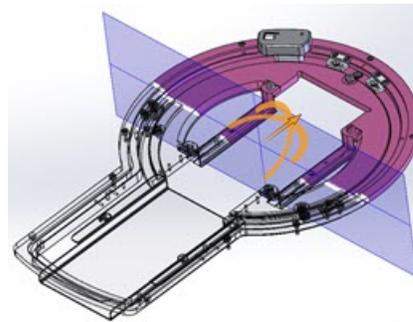
### Features

- Universal probe card holder for 114 mm (4.5 in) rectangular probe cards
- PCH can be oriented E/W/S/N for short cables run to test equipment
- Low profile design allows simultaneous probe card and internal node needle probes
- Quick changeover from positioners to probe card
- Supports multiple probe card needle drafts with height adjustment
- Easy 3-point probe card planarization

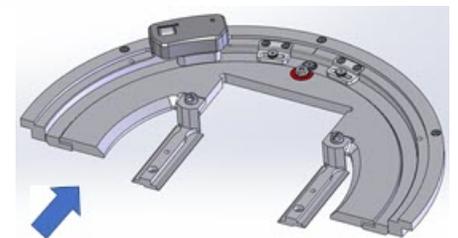


### Specifications

- Temperature range supported: -60°C to 300°C (-76°F to 572°F)
- Probe card support:
  - 114 mm (4.5 in) wide rectangular cards
  - Max. probe card length with edge connector: 11.375
  - Needles for 216 mm (8.5 in) long cards can be up to 64 mm (2.5 in) off center
- Probe card draft (distance between bottom of probe card and probe tip):

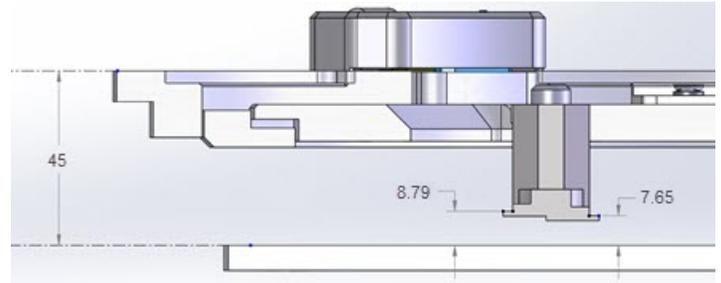
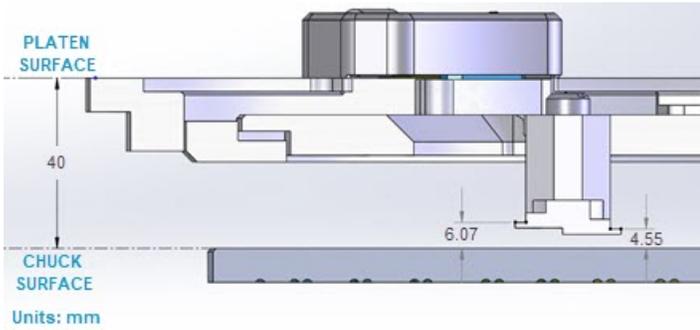


- Front view of this section is shown in [Standard PCH rail assembly \(PN 162-000\)](#) and [Optional deep PCH rail assembly \(PN 162-001\)](#) images below
- All units are in mm



– Standard PCH rail assembly (PN 162-000)

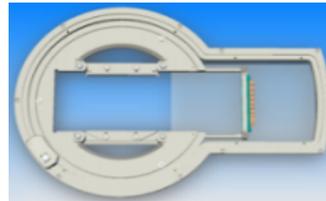
Overall probe card draft = 4.55 mm – 11.07 mm



- Theta rotation:  $\pm 7.5^\circ$
- Max planarization height range: up to 40 mils compression at each planarization point (3)
- Max probe card force: 20 kg (44 lb)

**Kit Contents**

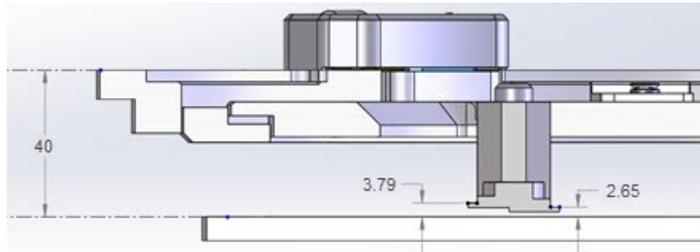
- Probe card holder
- Edge connector kit with 48 and 70 pin connectors (f)
- Rear cable heat shield/support
- Probe card height adjustment kit (4 height settings)
- Standard PCH rail assembly (PN 162-000)



Probe Card Holder (top view) with edge connector and cable heat shield installed

– Optional deep PCH rail assembly (PN 162-001)

Overall probe card draft = 2.65 mm – 8.79 mm



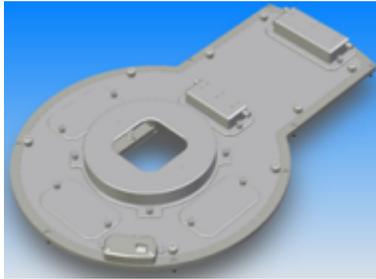
**Compatibility**

- Elite 300/AP, Elite 300/M, SUMMIT200-S, SUMMIT200-AP, SUMMIT200-M (with performance limitations)

## 177-610/X2-PIPCHM — MicroChamber Probe Card Holder

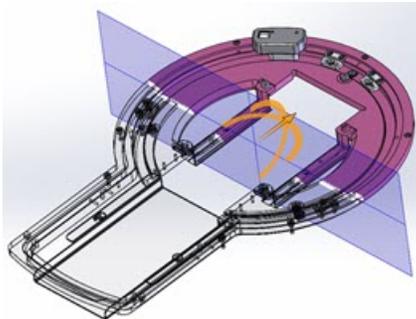
### Features

- Universal probe card holder for 114 mm (4.5 in) rectangular probe cards
- Maintains dark, dry, EMI-RFI shielded environment (Elite 300 with MicroChamber)
- PCH can be oriented E/W/S/N for short cables run to test equipment
- Low profile design allows simultaneous probe card and internal node needle probes
- Quick changeover from positioners to probe card
- Supports multiple probing configurations with removable access covers
- Supports multiple probe card needle drafts with height adjustment
- Easy 3-point probe card planarization

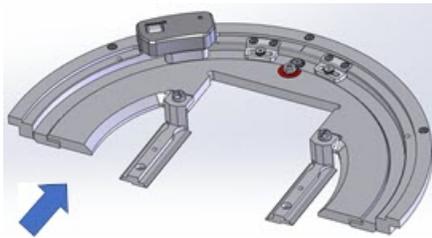


### Specifications

- Temperature range supported: -60°C to 300°C (-76°F to 572°F)
- Probe card support:
  - 114 mm (4.5 in) wide rectangular cards
  - Max. probe card length with edge connector: 11.375
  - Needles for 216 mm (8.5 in) long cards can be up to 64 mm (2.5 in) off center
- Probe card draft (distance between bottom of probe card and probe tip):

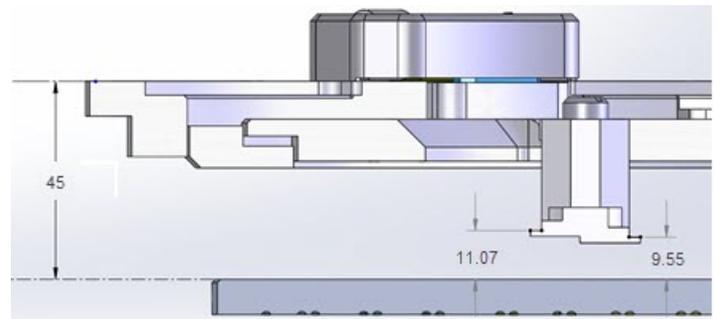
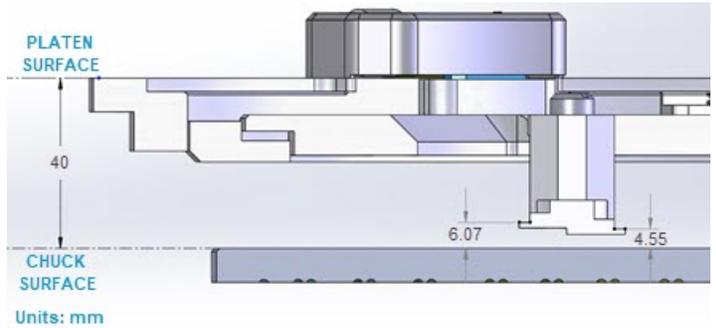


- Front view of this section is shown in [Standard PCH rail assembly \(PN 162-000\)](#) and [Optional deep PCH rail assembly \(PN 162-001\)](#) images below
- All units are in mm



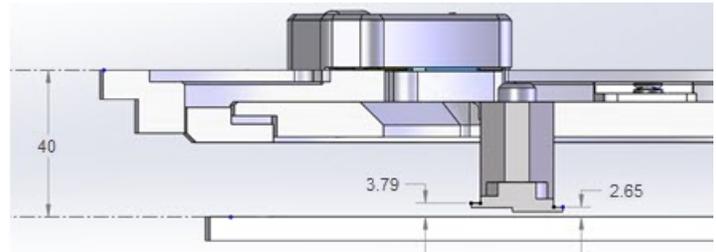
– Standard PCH rail (PN 162-000)

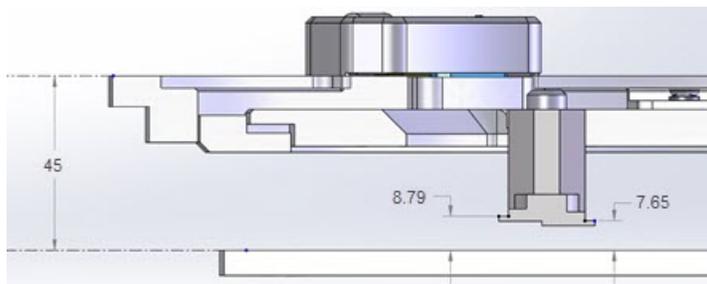
Overall probe card draft = 4.55 mm – 11.07 mm



– Optional deep PCH rail (PN 162-001)

Overall probe card draft = 2.65 mm – 8.79 mm





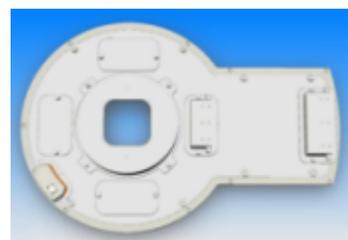
- Theta rotation:  $\pm 7.5^\circ$
- Max planarization height range: up to 40 mils compression at each planarization point (3)
- Max probe card force: 20 kg (44 lb)

#### Kit Contents

- Probe card holder
- MicroChamber cover (supports TopHat microscope objective seal)
- Edge connector kit with 48 and 70 pin connectors (f)
- Rear cable heat shield/support
- Probe card height adjustment kit (4 height settings)
- Cable access/exit kit (2)
- Quick access covers (4)
- Standard PCH rail assembly (PN 162-000)



Shown with all quick access covers, exit panels and TopHat cover removed



Shown with all quick access covers in place



Shown with TopHat cover removed

#### Compatibility

- Elite 300/AP, Elite 300/M, SUMMIT200-AP, SUMMIT200-M, TESLA200-AP, TESLA200-M ( $\leq 3\text{ kV}$ )

#### Ordering Information

- For HTS compatible probe card holder, order 177-620

## 177-620/X2-PIPCHMH — MicroChamber Probe Card Holder, HTS, 40 mm, Universal

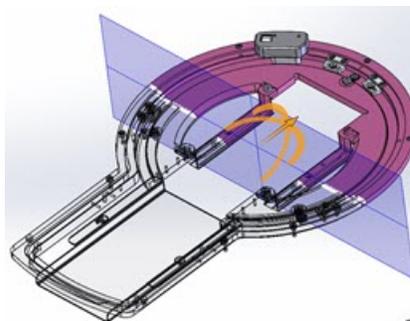
#### Features

- Universal probe card holder for 114 mm (4.5 in) rectangular probe cards
- Maintains dark, dry, EMI-RFI shielded environment (Elite with MicroChamber)
- PCH can be oriented E/W/S/N for short cables run to test equipment
- Low profile design allows simultaneous probe card and internal node needle probes
- Quick changeover from positioners to probe card
- Supports multiple probing configurations with removable access covers
- Supports multiple probe card needle drafts with height adjustment
- Easy 3-point probe card planarization
- Constructed with high-stability thermal materials

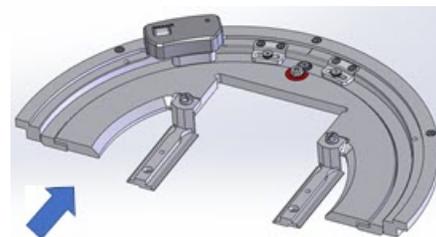


#### Specifications

- Temperature range supported:  $-60^\circ\text{C}$  to  $300^\circ\text{C}$  ( $-76^\circ\text{F}$  to  $572^\circ\text{F}$ )
- Probe card support:
  - 114 mm (4.5 in) wide rectangular cards
  - Max. probe card length with edge connector: 11.375
  - Needles for 216 mm (8.5 in) long cards can be up to 64 mm (2.5 in) off center
- Probe card draft (distance between bottom of probe card and probe tip):

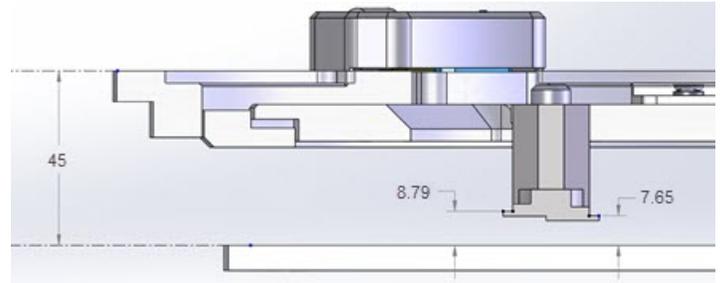
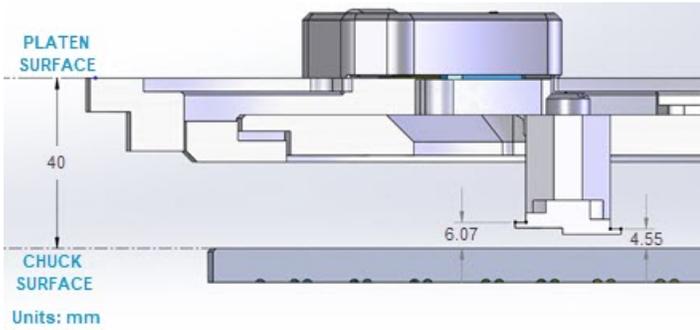


- Front view of this section is shown in [Standard HTS PCH rail assembly \(PN 162-002\)](#) and [Optional HTS PCH deep rail assembly \(PN 162-003\)](#) images below
- All units are in mm



– Standard HTS PCH rail assembly (PN 162-002)

Overall probe card draft = 4.55 mm – 11.07 mm



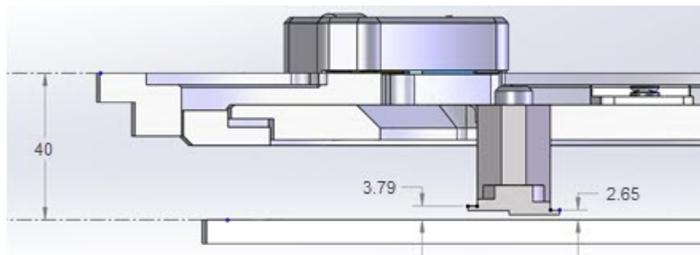
- Theta rotation:  $\pm 7.5^\circ$
- Max planarization height range: up to 40 mils compression at each planarization point (3)
- Max probe card force: 20 kg (44 lb)

**Kit Contents**

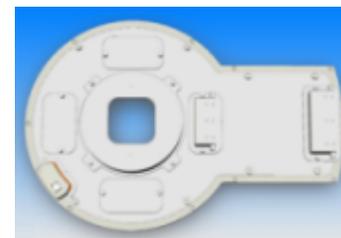
- Probe card holder
- MicroChamber cover (supports TopHat microscope objective seal)
- Edge connector kit with 48 and 70 pin connectors (f)
- Rear cable heat shield/support
- Probe card height adjustment kit (4 height settings)
- Cable access/exit kit (2)
- Quick access covers (4)
- Standard HTS PCH rail assembly (PN 162-002)

– Optional HTS PCH deep rail assembly (PN 162-003)

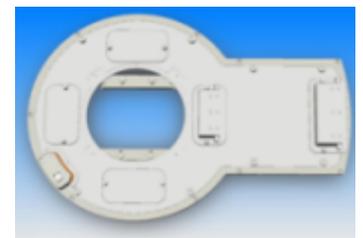
Overall probe card draft = 2.65 mm – 8.79 mm



Shown with all quick access covers, exit panels and TopHat cover removed



Shown with all quick access covers in place



Shown with TopHat cover removed

**Compatibility**

- Elite 300/AP, Elite 300/M, Summit with HTS platen, SUMMIT200-AP, SUMMIT200-M, TESLA200-AP, TESLA200-M ( $\leq 3\text{kV}$ )

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## SUMMIT/S300

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### 110-367 — Probe Card Holder for 6 in Round Cards

#### Features

- Probe card holder for 152 mm (6 in) round cards
- Mounts on Summit 12000 and S300



#### Specifications

- 152 mm (6 in) round probe card holder (for Pyramid probe cards)
- Theta adjustment
- No Z (height) adjustment (probe station Z is required)

#### Compatibility

- Summit, S300

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### 114-338 — High Force Probe Card Holder

#### Features

- Easy to use probe card clamp
- Screw removal is not required to change similar types of probe cards
- No tools required to clamp the probe card in place
- Back pivoting edge connector for easy mating of edge card connector
- Support for 114 mm (4.5 in) rectangular probe cards up to 289 mm (11.375 in) long
- Stable 3-point planarization adjustment
- Easy probe card height setting (three incremental settings)
- Probe card height adjustment accommodates FormFactor low leakage probe cards and other probe cards
- Theta micrometer control located in front of the HF-PCH
- Includes 48 pin and 70 pin edge connectors



#### Specifications

- Maximum probe needle force: 20 kg (44 lb) (2,000 needles)
- Temperature range:
  - System with MicroChamber -55°C to 300°C (-67°F to 572°F)
  - System without MicroChamber ambient to 300°C (572°F)
- Theta range:  $\pm 3^\circ$
- Maximum planarization height compensation: 1.27 mm (0.050 in)
- Probe card maximums:
  - W = 11.4 cm  $\pm 3$  mm (4.5 in  $\pm 0.12$  in)
  - L = 15.25 cm 28.9 cm (6 in 11.375 in)

- Thickness = 0.15 cm 0.32 cm (0.060 in 0.125 in)

#### Compatibility

- Summit, S300

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### 115-418 — High Force Probe Card Holder for MicroChamber

#### Features

- Easy to use probe card clamp
- Screw removal is not required to change similar types of probe cards
- No tools required to clamp the probe card in place
- Back pivoting edge connector for easy mating of edge card connector
- Support for 114 mm (4.5 in) rectangular probe cards up to 289 mm (11.375 in) long
- Maintains a dark and dry EMI-RFI shielded environment (MicroChamber version only)
- Stable 3-point planarization adjustment
- Easy probe card height setting (three incremental settings)
- Probe card height adjustment accommodates FormFactor low leakage probe cards and other probe cards
- Theta micrometer control located in front of the HF-PCH
- Includes 48 pin and 70 pin edge connectors



#### Specifications

- Maximum probe needle force: 20 kg (44 lb) (2,000 needles)
- Temperature range:
  - System with MicroChamber -55°C to 300°C (-67°F to 572°F)
  - System without MicroChamber ambient to 300°C (572°F)
- Theta range:  $\pm 3^\circ$
- Maximum planarization height compensation: 1.27 mm (0.050 in)
- Probe card maximums:
  - W = 11.4 cm  $\pm 3$  mm (4.5 in  $\pm 0.12$  in)
  - L = 15.25 cm 28.9 cm (6 in 11.375 in)
  - Thickness = 0.15 cm 0.32 cm (0.060 in 0.125 in)

#### Compatibility

- Summit

## 122-437 — Edge Connector Kit Probe Card Holders

### Features

- Edge connector kit for Summit 114 mm (4.5 in) probe card holders
- Support both 48 and 70 pin standard edge connectors
- Pivots for easy loading of probe card



### Kit Contents

- Edge connector mount
- 48 pin edge connector
- 70 pin edge connector

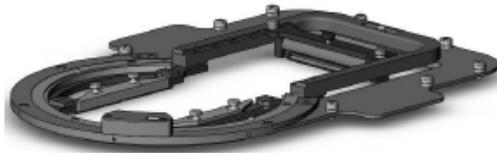
### Compatibility

- Summit, S300

## 120-935 — Low-Profile Probe Card Holder for Summit (Non-MicroChamber)

### Features

- Support for 114 mm (4.5 in) rectangular probe cards up to 289 mm (11.375 in) long
- Simultaneous use of a probe card and multiple positioners/DC probe needles
- DC probe needles can be used with the LP-PCH left in place
- Easy to use probe card clamp
- Screw removal is not required to change similar types of probe cards
- No tools required to clamp the probe card in place
- Back pivoting edge connector for easy mating of edge card connector
- Adjustable edge connector mounting brackets to support long probe cards
- Enables use of DCP probes without probe card in place
- Accurate, front-located theta adjustment wheel
- Stable 3-point planarization adjustment
- Probe card height adjustment accommodates variability in probe card needle depth
- Probe card height adjustment accommodates FormFactor low leakage probe cards and other probe cards
- Includes 48 pin and 70 pin edge connectors



### Specifications

- Maximum probe needle force: 1 kg (2.2 lb) (100 needles)

- Theta range  $\pm 3^\circ$
- Maximum planarization height compensation: 0.762 mm (0.030 in)
- Probe card maximums:
  - W = 11.4 cm  $\pm 3$  mm (4.5 in  $\pm 0.012$  in)
  - L = 15.25 cm 28.9 cm (6 in 11.375 in)
  - Thickness = 0.15 cm 0.32 cm (0.060 in 0.125 in)

### Compatibility

- Summit

## 124-118 — Low-Profile Probe Card Holder for Summit Stations with MicroChamber

### Features

- Support for 114 mm (4.5 in) rectangular probe cards up to 289 mm (11.375 in) long
- Simultaneous use of a probe card and multiple positioners/DC probe needles
- DC probe needles can be used with the LP-PCH left in place
- Easy to use probe card clamp
- Screw removal is not required to change similar types of probe cards
- No tools required to clamp the probe card in place
- Back pivoting edge connector for easy mating of edge card connector
- Adjustable edge connector mounting brackets to support long probe cards
- Enables use of DCP probes without probe card in place
- Quick switch-over between the TopHat cover and the LP-PCH
- Maintains a dark and dry EMI-RFI shielded environment (MicroChamber version only)
- Accurate, front-located theta adjustment wheel
- Stable 3-point planarization adjustment
- Probe card height adjustment accommodates FormFactor low leakage probe cards and other probe cards
- Includes 48 pin and 70 pin edge connectors

With cover



Cover removed



### Specifications

- Maximum probe needle force: 1 kg (2.2 lb) (100 needles)
- Temperature range:
  - System with MicroChamber  $-55^\circ\text{C}$  to  $200^\circ\text{C}$  ( $-67^\circ$  to  $F392^\circ\text{F}$ )

- System without MicroChamber ambient to 200°C (392°F)
- Theta range  $\pm 3^\circ$
- Maximum planarization height compensation: 0.762 mm (0.030 in)
- Probe card maximums:
  - W = 11.4 cm  $\pm 3$  mm (4.5 in  $\pm 0.12$  in)
  - L = 15.25 cm 28.9 cm (6 in 11.375 in)
  - Thickness = 0.15 cm 0.32 cm (0.060 in 0.125 in)

### **Compatibility**

- Summit

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## **138-022 — Clamp Kit for LLPC, in Low Profile Card Holder**

### **Features**

- Option to allow use of shallow draft probe cards
- For use on Low Profile Probe Card Holder (120-935) and Low-Profile Probe Card Holder for Summit Stations with MicroChamber (124-118)



### **Specifications**

- Increases the draft from 2.03 to 4.57 mm (0.08 to 0.18 in)

### **Compatibility**

- Summit

# Probe Mounts/ Holders and Probes

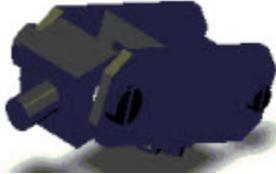
## Probe Arms and Probes (S-Positioner Compatible)

### DC PROBE ARMS, DPP2xx/DPP3xx

#### 100489 — Adapter Picoprobe 10-34A/DPP2xx/DPP3xx

##### Features

- Holding fixture for active picoprobes from GGB picoprobe 10...34 (picoprobe not included)
- Integrates existing picoprobe with DPP2XX or DPP3xx
- Adapter is included with FormFactor standard picoprobes



##### Compatibility

- MPS150, PM8, PM300, PA200, PA300

#### 100524 — Probe Arm, DPP2xx/DPP3xx, Edge Sensor

##### Features

- Includes edge sensor tip
- With connector matching to all semiautomatic standard probe stations (check compatibility to all other probe stations)



##### Compatibility

- All PA/PM stations (except MicroAlign) + DPP2xx-S, DPP3xx-S, DPP450-S (and former PH110, PH120, PH150, PH400)

#### 100525 — Probe Arm, DPP2xx/DPP3xx, Triax

##### Features

- 1.5 m (5 ft) 50 Ohm low noise triax cable and triax plug BNC
- Highly isolated and gold plated needle clamping



##### Specifications

- Max. operation temperature: 300°C (572°F)
- Resistance\*:

R_F-G @10V	1 Ω	≥100
R_G-S @10V	1 Ω	≥50
R_F-S @10V	1 Ω	≥300

- Leakage\*:

F-G @10V@1min	fA	≤500
G-S @10V@1min	fA	≤2000
F-S @10V@1min	fA	≤500

- Capacitance\*:

C_F-G @300pA	pF	≤300
C_G-S @300pA	pF	≤500
C_F-S @300pA	pF	≤200

\* Spec test conditions for all cases: 25% humidity, shielded chamber, ambient

##### Compatibility

- MPS150, EPS150, all PA/PM stations (except MicroAlign) + DPP2xx-S, DPP3xx-S, DPP450-S (and former PH110, PH120, PH150, PH400)

#### 100560 — Probe Arm, DPP3xx, Coax, BNC

##### Features

- Short 50 Ohm coaxial cable and female BNC connector mounted in DPP3xx positioner base
- Requires additional coaxial cable (BNC male connector)
- Isolated and gold plated needle clamping



##### Compatibility

- MPS150, EPS150, all PA/PM stations (except MicroAlign) + DPP3xx-S, DPP450-S (and former PH150, PH400)

#### 100561 — Probe Arm, DPP2xx/DPP3xx, Coax, BNC

##### Features

- 2 m (6.5 ft) 50 Ohm coaxial cable with BNC connector
- Gold plated needle clamp

##### Specifications

- Resistance: >100 TOhm
- Leakage: <120 fA
- Capacitance: <300 pF

##### Compatibility

- MPS150, EPS150, all PA/PM stations (except MicroAlign) + DPP2xx-S, DPP3xx-S, DPP450-S (and former PH110, PH120, PH150, PH400)



## 100696 — Probe Arm, DPP2xx/DPP3xx, Kelvin, 1 Tip

### Features

- (2) 2 m (6.5 ft) coaxial cables, 50 Ohm and BNC connector
- Double arm design for improved stiffness, with single tip clamping (gold plated)
- Shield connection can be changed
- Connected for LCR measurements as standard



### Compatibility

- MPS150, EPS150, all PA/PM stations (except MicroAlign) + DPP2xx-S, DPP3xx-S, DPP450-S (and former PH110, PH120, PH150, PH400)

## 100715 — Probe Arm, DPP2xx/DPP3xx, Adjustable, Coax, BNC

### Features

- 2 m (6.5 ft) 50 Ohm coaxial cable and BNC plug
- Four hinges for individual arm profiling
- Gold plated needle clamping



### Specifications

- Resistance: >100TOhm
- Leakage: <120fA
- Capacitance: <300pF

### Compatibility

- MPS150, EPS150, all PA/PM stations (except MicroAlign) + DPP2xx-S, DPP3xx-S, DPP450-S (and former PH110, PH120, PH150, PH400)

## 131844 — Probe Arm, DPP2xx/DPP3xx, Coax, High Temperature

### Features

- For long term tests at temperatures higher than 100°C and always with temperature chucks up to 300°C



### Specifications

- 1.5 m (6 ft) 50 Ohm cable with coaxial plug BNC

### Compatibility

- MPS150, EPS150, all PA/PM stations (except MicroAlign) + DPP2xx-S, DPP3xx-S, DPP450-S (and former PH110, PH120, PH150, PH400)

## 133838 — Front Plate for DC Arms on RPP2xx Positioners

### Features

- Used for mounting DC Arms for open systems on RPP2xx RF positioners
- RF arm must be disassembled from the RPP2xx positioner



### Specifications

- Used to mount 1 (each) of 100489/100524/100525/100560/100561/100696/100715/131844
- Not for use with 144139

### Compatibility

- EPS150/200, PM8, PA200, PM300 + RPP2xx

## 144139 — Probe Arm, DPP2xx/DPP3xx, Flex, DCP Probes

### Features

- High rigidity
- Stainless steel design for high rigidity and minimum thermal drift
- Requires adaptation unit 138697 for use with DPP3xx/DPP450
- DCP probes, cables and connectors not included base



### Compatibility

- MPS150, EPS150, all PA/PM open systems (except MicroAlign) + DPP2xx-S, DPP3xx-S, DPP450-S (and former PH110, PH150, PH400)

*Note: DPP3xx-S and DPP450-S (and former PH150, PH400) require 138697 in order to mount this arm.*

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## RF PROBE ARMS, RPP210-S

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### 146041 — Probe Arm, RPP210-S, North-South, for Vacuum/Magnetic Platen

#### Features

- For use with HF probes (e.g., |Z| Probe)
- Positions the probe at the front or rear side of DUT
- Horizontal probe mounting platen can be leveled
- For use with vacuum and magnetic platen



#### Compatibility

- MPS150, EPS150, all PA/PM stations (except MicroAlign) + RPP210-S (and former PH110)
- Arms are not compatible with EPS200RF, EPS200MMW, or PM8 with RF or MMW platen. For these systems, the platen adapter (PN 100651) is required, or you may consult a FormFactor representative for custom arms.

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### 146042 — Probe Arm, RPP210-S, East-West, for Vacuum/Magnetic Plate

#### Features

- For use with HF probes (e.g., |Z| Probe)
- Positions the probe at the left or right side of DUT
- Horizontal probe mounting platen can be leveled
- For use with vacuum and magnetic platen



#### Compatibility

- MPS150, EPS150, all PA/PM stations (except MicroAlign) + RPP210-S (and former PH110)
- Arms are not compatible with EPS200RF, EPS200MMW, or PM8 with RF or MMW platen. For these systems, the platen adapter (PN 100651) is required, or you may consult a FormFactor representative for custom arms.

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## RF PROBE ARMS, RPP305

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### 100624 — Probe Arm, RPP305, East-West, Mirrored

#### Features

- For use with HF probes (e.g., |Z| Probe)
- For positioning the probe on the left or right side of DUT
- Probe mounting platen can be leveled
- Mirror image of 100648 (only for 2 port configuration in combination with 100648)



#### Compatibility

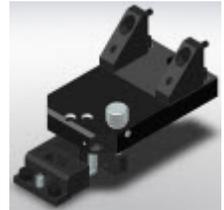
- MPS150, EPS150, all PA/PM stations (except MicroAlign) + RPP305-S (and former PH250)

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### 100647 — Probe Arm, RPP305, East

#### Features

- For use with HF probes (e.g., |Z| Probe)
- For positioning the probe on the right side of DUT
- Probe mounting platen can be leveled (not compatible with 4-port configuration)



#### Compatibility

- All PA/PM stations (except MicroAlign) + RPP305-S (and former PH250)

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### 100648 — Probe Arm, RPP305, East-West

#### Features

- For use with HF probes (e.g., |Z| Probe)
- For positioning the probe on the left or right side of DUT
- Probe mounting platen can be leveled
- Mirror image of 100624 (for 4-port configuration, for 2-port configuration with 100624)



#### Compatibility

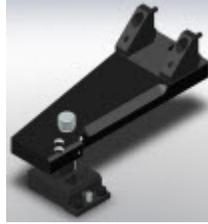
- MPS150, EPS150, all PA/PM stations (except MicroAlign) + RPP305-S (and former PH250)

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## 100649 — Probe Arm, RPP305, North-South

### Features

- For use with HF probes (e.g., |Z| Probe)
- For positioning the probe at the front or rear of DUT
- Probe mounting platen can be leveled (for 4-port configuration)



### Compatibility

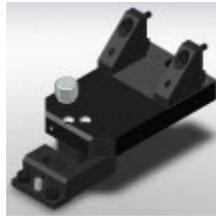
- MPS150, EPS150, all PA/PM stations (except MicroAlign) + RPP305-S (and former PH250)

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## 118160 — Probe Arm, RPP305, West

### Features

- For use with HF probes (e.g., |Z| Probe)
- For positioning the probe on the left side of DUT
- Probe mounting platen can be leveled (not compatible with 4-port configuration)



### Compatibility

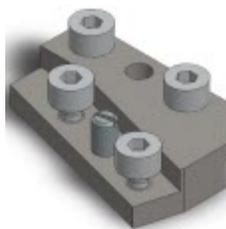
- All PA/PM stations (except MicroAlign) + RPP305-S (and former PH250)

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## 169-672— RF Probe Arm Mounting Platen

### Features

- Enables mounting of Lightwave probes on RF arms



### Compatibility

- Probe stations: MPS150, PM8, PA200, PM300 +
- RF probe arms: RPP2xx (146041, 146042), RPP305 +
- Lightwave probes: LWP-CLV-SM, LWP-CLV-MM, LWP-LEN-SM, LWP-LEN-MM

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## RFA PROBE ARMS, RPP404/RPP404-W/RPP504

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## (COAX UP TO 67 GHz)

### RFA-67-EW

#### Features

- East/West probe arm enables mounting of probe only (no frequency extender)
- Compatible with 8-sided MicroChamber TopHat or open (non-TopHat) configurations

#### Compatibility

- RPP404, RPP404-W, RPP504 positioners



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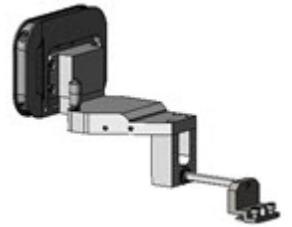
### RFA-67-EW-TH

#### Features

- East/West probe arm enables mounting of probe only (no frequency extender)
- Compatible with 8-sided MicroChamber TopHat (includes boot/FlexShield) or open (non-TopHat) configurations

#### Compatibility

- RPP404, RPP404-W, RPP504 positioners



Boot/FlexShield

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## RFA PROBE ARMS, RPP404/RPP404-W/RPP504

## (COAX UP TO 130 GHz WITH KEYSIGHT N5291A)

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### RFA-K120-EW

#### Features

- East/West probe arm enables mounting of Keysight N5291 frequency extender
- Compatible with open (non-TopHat) configurations

#### Compatibility

- RPP404, RPP404-W, RPP504 positioners



### RFA-K120-EW-TH

#### Features

- East/West probe arm enables mounting of Keysight N5291 frequency extender
- Compatible with RF MicroChamber TopHat (includes boot/FlexShield) or open (non-TopHat) configurations

#### Compatibility

- RPP404, RPP404-W, RPP504 positioners



Boot/FlexShield

## RFA PROBE ARMS, RPP404/RPP404-W/RPP504 (MMWAVE AND THZ WITH VDI MINI EXTENDERS)

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### RFA-VDI-EW

#### Features

- East/West probe arm enables mounting of VDI Mini frequency extender
- Compatible with open (non-TopHat) configurations



#### Compatibility

- RPP404, RPP404-W, RPP504 positioners

### RFA-VDI-EW-TH

#### Features

- East/West arm enables mounting of VDI Mini frequency extender
- Compatible with RF MicroChamber TopHat (includes boot/FlexShield) or open (non-TopHat) configurations
- Non-TopHat plates (for closer coupling) and TopHat adapter included



#### Compatibility

- RPP404, RPP404-W, RPP504 positioners

## RFA PROBE ARMS, RPP404/RPP404-W/RPP504 (LOAD-PULL WITH FOCUS MICROWAVES DELTA TUNERS)

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### RFA-F67-E

#### Features

- East probe arm enables mounting of Focus Microwaves Delta Tuner
- 67 GHz, fundamental (C-672xx) / harmonic (M-67100), load
- Compatible with open (non-TopHat) configurations

#### Compatibility

- RPP404, RPP404-W, RPP504 positioners



### RFA-F67-W

#### Features

- West probe arm enables mounting of Focus Microwaves Delta Tuner
- 67 GHz, fundamental (C-672xx) / harmonic (M-67100), source
- Compatible with open (non-TopHat) configurations

#### Compatibility

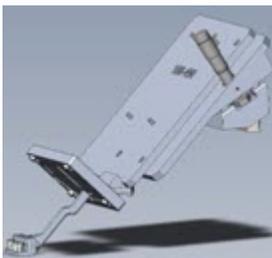
- RPP404, RPP404-W, RPP504 positioners



## RFA-F67-E-TH

### Features

- East probe arm enables mounting of Focus Microwaves Delta Tuner
- 67 GHz, fundamental (C-672xx) / harmonic (M-67100), load
- Compatible with RF MicroChamber TopHat (includes boot/FlexShield) or open (non-TopHat) configurations
- Non-Tophat plates (for closer coupling) and TopHat adapter included



### Compatibility

- RPP404, RPP404-W, RPP504 positioners

## RFA-F67-W-TH

### Features

- East probe arm enables mounting of Focus Microwaves Delta Tuner
- 67 GHz, fundamental (C-672xx) / harmonic (M-67100), source
- Compatible with RF MicroChamber TopHat (includes boot/FlexShield) or open (non-TopHat) configurations
- Non-Tophat plates (for closer coupling) and TopHat adapter included



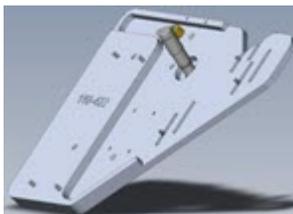
### Compatibility

- RPP404, RPP404-W, RPP504 positioners

## RFA-F110-EH

### Features

- East probe arm enables mounting of Focus Microwaves Delta Tuner
- 110 GHz, harmonic, (M-1102XX / M-1105XX), load
- Compatible with open (non-TopHat) configurations
- Requires one of the following:
  - PN 188-768 Nikon Objective Kit for eVue, 10X (contains spacer and lens)
  - PN 188-769 Nikon Objective Kit for eVue, 20X (contains spacer and lens)



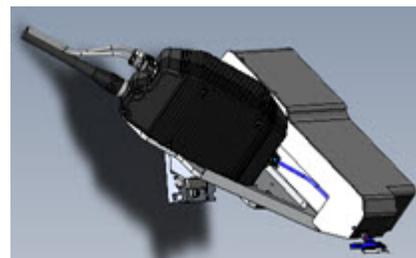
### Compatibility

- RPP404, RPP404-W, RPP504 positioners

## RFA-F110-WH

### Features

- West probe arm enables mounting of Focus Microwaves Delta Tuner
- 110 GHz, harmonic, (M-1102XX / M-1105XX), source
- Compatible with open (non-TopHat) configurations
- Requires one of the following:
  - PN 188-768 Nikon Objective Kit for eVue, 10X (contains spacer and lens)
  - PN 188-769 Nikon Objective Kit for eVue, 20X (contains spacer and lens)



RFA-F110-WH with tuner

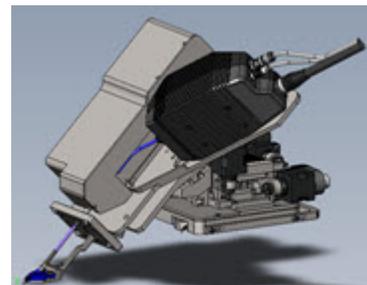
### Compatibility

- RPP404, RPP404-W, RPP504 positioners

## RFA-F110-EH-TH

### Features

- East probe arm enables mounting of Focus Microwaves Delta Tuner
- 110 GHz, harmonic, (M-1102XX / M-1105XX), load
- Compatible with RF MicroChamber TopHat (includes boot/FlexShield) or open (non-TopHat) configurations
- Non-Tophat plates (for closer coupling) and TopHat adapter included



RFA-F110-EH-TH with tuner (positioner shown, not included)

### Compatibility

- RPP404, RPP404-W, RPP504 positioners



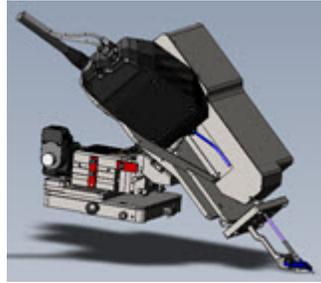
RFA-F110-EH-TH assembled on system

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## RFA-F110-WH-TH

### Features

- West probe arm enables mounting of Focus Microwaves Delta Tuner
- 110 GHz, harmonic, (M-1102XX / M-1105XX), source
- Compatible with RF MicroChamber TopHat (includes boot/FlexShield) or open (non-TopHat) configurations
- Non-TopHat plates (for closer coupling) and TopHat adapter included



RFA-F110-WH-TH with tuner (positioner shown, not included)

### Compatibility

- RPP404, RPP404-W, RPP504 positioners

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## RFA PROBE ARMS, RPP404/RPP404-W/RPP504 (SINGLE SWEEP BROADBAND MEASUREMENTS FROM DC TO 220GHz)

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## RFA-K220-E

### Features

- East probe arm enables mounting of N5291/VDI with T-Wave BB probe
- Compatible with open (non-TopHat) configurations

### Compatibility

- RPP404, RPP404-W, RPP504 positioners



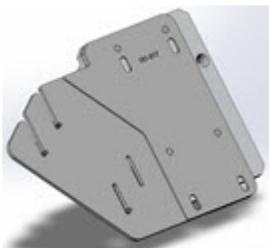
## RFA-K220-W

### Features

- West probe arm enables mounting of N5291/VDI with T-Wave BB probe
- Compatible with open (non-TopHat) configurations

### Compatibility

- RPP404, RPP404-W, RPP504 positioners



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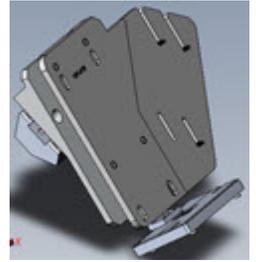
## RFA-K220-E-TH

### Features

- East probe arm enables mounting of N5291/VDI with T-Wave BB probe
- Compatible with RF MicroChamber TopHat (includes boot/FlexShield) or open (non-TopHat) configurations

### Compatibility

- RPP404, RPP404-W, RPP504 positioners



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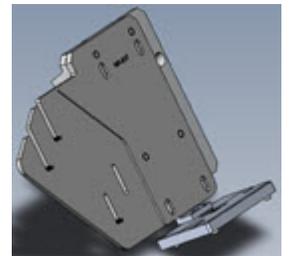
## RFA-K220-W-TH

### Features

- West probe arm enables mounting of N5291/VDI with T-Wave BB probe
- Compatible with RF MicroChamber TopHat (includes boot/FlexShield) or open (non-TopHat) configurations

### Compatibility

- RPP404, RPP404-W, RPP504 positioners



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## RFA PROBE ARMS, MAURY NANO5G

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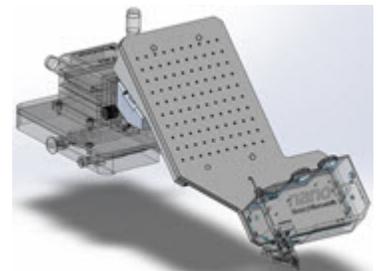
## RFA-MN5G-EW

### Features

- East/West arm enables mounting of Maury Nano5G frequency extender
- Compatible with open (non-TopHat) configurations

### Compatibility

- RPP404, RPP404-W, RPP504 positioners



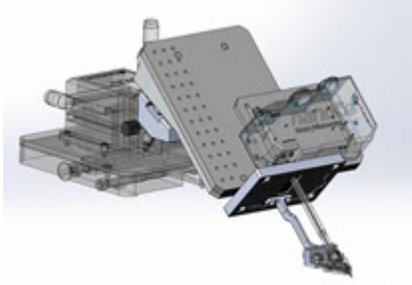
Arm, positioner, and probe assembly shown (transparent parts not included)

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## RFA-MN5G-EW-TH

### Features

- East/West arm enables mounting of Maury Nano5G frequency extender
- Compatible with RF MicroChamber TopHat (includes boot/FlexShield) or open (non-TopHat) configurations



Arm, positioner, and probe assembly shown  
(transparent parts not included)

### Compatibility

- RPP404, RPP404-W, RPP504 positioners

- Each pod stores one populated probe arm
- Storage pod can be placed on the prober platen during band swaps on the CM300 and Summit 12k / Summit 200 probe stations (depending on configuration)

### Specifications

- Dimensions (L x W x H): 350 x 175 x 175 mm (or larger, depending on stored parts [e.g., RFA-K220])

### Compatibility

(\* Denotes all variants)

- Compatible with, but not limited to, TopHat and non-TopHat configurations with the following arms:
  - RFA-67\* - Coaxial sub 67 GHz probes
  - RFA-K120\* - Keysight Coaxial N5295AX03, used as part of N5291A extenders up to 130 GHz
  - RFA-K220\* - N5291/VDI with T-Wave BB probe
  - RFA-VDI\* - VDI Waveguide Mini models and S geometry Waveguide probes to 500 GHz, for both TopHat and non-TopHat
  - RFA-F\* - Focus delta tuner arms
- Compatible with both FM4910 and UL94-V0 industry standards for safety against combustion and smoke generation

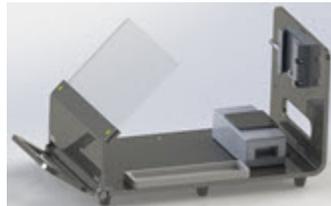
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## RFA PROBE ARMS STORAGE POD

### 780-00169 — RFA Series Probe Arms Storage Pod

#### Features

- Enables safe storage of populated RFA arms
- Stores RFA probe arms while configured with probes, VNA frequency extenders and/or tuners, and associated port savers and flex-shields.
- Enables safe and efficient RFA arm changes and band swapping
- Reduces the risk of damage to the probe during arm changes
- Fitting hardware enables placement of the VDI Mini VNAX power supply to keep the extender warm between band swaps, minimizing drift and maximizing prober utilization
- Integrated trays enable storage of probing accessories
- Enables probe assembly from a sitting position, away from the prober
- A hinged, anti-static, cleanroom-safe window protects probes from accidental damage and prevents accidental probe tip contact, while allowing safe, ergonomic probe arm loading
- Ergonomic hand grips ensure safe and secure handling of valuable test equipment



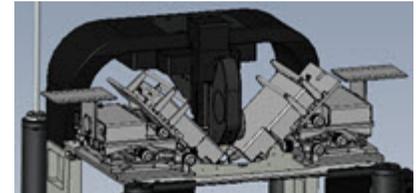
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## TUNER INTEGRATION KITS

### 780-00612 — Integration Kit for Focus Microwave Tuner M-4030 or L-4030 on CM300

#### Features

- Enables integration of the Focus Microwave Tuner M-4030 and L-4030 on the CM300
- Positioner and tuner are supplied by Focus Microwave



#### Specifications

- eVue cover is required and included

#### Configuration

- Qty one required for each side
- Configurable with both East and West tuners

#### Compatibility

- CM300, Non-TopHat solution only

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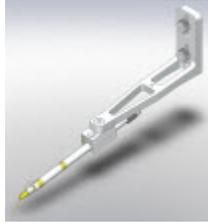
## DC PROBE ARMS, MICROALIGN

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### 138687 — Probe Arm, DPP2xx/DPP3xx, Triax

#### Features

- For use with MicroAlign systems
- Highly isolated needle clamp for standard single tips like PTT needles
- Stainless steel design for high rigidity and minimum thermal drift
- Requires adaptation unit 138697 for use with DPP3xx-S/DPP450-S



#### Specifications

- 0.75 m (2.5 ft) 50 Ohm low noise triax cable and 3 lug Triax plug
- DC leakage <10 fA at ambient temperature
- For use with temperature chucks up to 300°C (572°F)

#### Compatibility

- PA300 MicroAlign + DPP2xx, DPP3xx-S, DPP450-S (and former PH110, PH150, PH400)

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### 138690 — Probe Arm, DPP2xx/DPP3xx, Triax, Kelvin 1Tip

#### Features

- For use with MicroAlign systems
- For triaxial I/V-, Kelvin- and C/V (with CX-TRX adapter) tests
- Stainless steel design for high rigidity and minimum thermal drift
- Highly isolated needle clamp for single tips like PTT needles (signal from force and sense already connected inside chassis)
- Connector sockets for CommonRing cables (C/V-Test, 1 cable included), guard potentials from force and sense are connected to these sockets
- Requires adaptation unit 138697 for use with DPP3xx-S/DPP450-S



#### Specifications

- 2 x 0.75 m (2.5 ft) 50 Ohm low-noise triax cable and 3 lug Triax plug
- For use with temperature chucks up to 300°C (572°F)

#### Compatibility

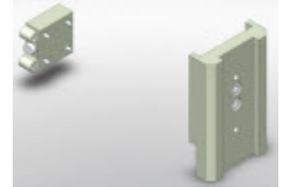
- PA300 MicroAlign + DPP2xx, DPP3xx-S, DPP450-S (and former PH110, PH150, PH400)

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### 138697 — Adapter for Probe Arms DPP2xx/DPP3xx to Positioner DPP3xx

#### Features

- Converts DPP3xx-S/DPP450-S front plate for use with DPP2xx/DPP3xx probe arms for DC and RF applications on MicroAlign systems



#### Compatibility

- MPS150, EPS150, CM300xi stations, PM/PA stations + DPP3xx-S, DPP450-S (and former PH150)

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### 138700 — Probe Arm, DPP2xx/DPP3xx, Pico Probe

#### Features

- For MicroAlign systems
- Holding fixture for Active Pico probes from GGB Pico probe 10...34 (Pico probe not included)
- Stainless steel design for high rigidity and minimum thermal drift
- Requires Test Equipment Interface 144987 for use at MicroAlign Advanced systems
- Requires adaptation unit 138697 for use with DPP3xx-S/DPP450-S



#### Compatibility

- PA300 MicroAlign + DPP2xx, DPP3xx-S, DPP450-S (and former PH110, PH150, PH400)

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### 144866 — Probe Arm, DPP2xx/DPP3xx for DCP Probe

#### Features

- For MicroAlign systems
- For triaxial I/V-, Kelvin-, C/V (with CX-TRX adapter) and 1/f applications
- Holding fixture for advanced DC coaxial probes like AP&T Probes, DCP and DCP-HTR probes
- Stainless steel design for high rigidity and minimum thermal drift
- Requires adaptation unit 138697 for use with DPP3xx-S/DPP450-S
- Includes (2) 0.7 m (2.3 ft) cables, 3-lug Triax-SSMC for IV and Kelvin measurements



#### Specifications

- DC leakage <10 fA at ambient temperature

#### Compatibility

- PA300 MicroAlign + DPP2xx, DPP3xx-S, DPP450-S (and former PH110, PH150, PH400)

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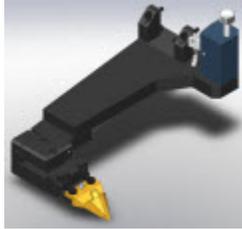
## RF PROBE ARMS, MICROALIGN

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### 133302 — Probe Arm, RPP305, North-South

#### Features

- For MicroAlign systems
- 4 probe setup
- For adaptation of HF probes or probe wedges
- For positioning the probe at front or rear side of DUT
- Probe mounting plate can be levelled, adjustment drive screw located at positioner end of the arm for easier operation
- Requires HF add-on platen or RPP305-M
- For use with RPP305 positioners



#### Compatibility

- PM300PS, PA300 MicroAlign + RPP305 (and former PH250)

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### 133303 — Probe Arm, RPP305, East-West

#### Features

- For MicroAlign systems
- 4 probe setup
- For adaptation of HF probes or probe wedges
- For positioning the probe at left or right side of DUT
- Probe mounting plate can be levelled, adjustment drive screw located at positioner end of the arm for easier operation
- Requires HF add-on platen or RPP305-M
- For use with RPP305 positioners



#### Compatibility

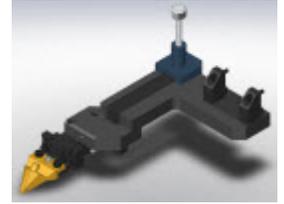
- PM300PS, PA300 MicroAlign + RPP305 (and former PH250)

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### 134006 — Probe Arm, RPP305, East-West

#### Features

- For MicroAlign systems
- To accompany 133303 to place two RPP305 (left and right) together in front of the operator
- For adaptation of HF probes or probe wedges
- For positioning the probe at left or right side of DUT
- Probe mounting plate can be levelled, adjustment drive screw located at end of the arm for easier operation
- Requires HF add-on platen on probe platen or RPP305-M
- For use with RPP305 positioners



#### Compatibility

- PM300PS, PA300 MicroAlign + RPP305 (and former PH250)

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### 144777 — Probe Arm, RPP210-S, East-West

#### Features

- For use with HF probes or wedges
- Positions the probe at the left or right side of DUT
- Horizontal probe mounting plate can be levelled
- For use with HF platen and MicroAlign
- For use with RPP210-S (and former PH110) positioners



#### Compatibility

- All PM/PA stations with RF platen, CM300 and PA300 MicroAlign, RPP210-S (and former PH110)

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### 144778 — Probe Arm, RPP210-S, North-South, MicroAlign

#### Features

- For MicroAlign systems
- For use with HF probes or wedges
- Positions the probe at the front or rear side of DUT
- Horizontal probe mounting plate can be levelled
- For use with HF platen and MicroAlign
- For use with RPP210-S positioners



#### Compatibility

- All PM/PA stations with RF platen, CM300xi and PA300 MicroAlign, RPP210-S (and former PH110)

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## RF PROBE ARMS, PA200 BLUERAY

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### 142139 — Probe Arm, RPP305-S East, Right, 2 Positioners, BlueRay

#### Features

- For positioning the probe on the right side of DUT
- With integrated probe planarization

#### Compatibility

- RPP305-B-S, RPP305-M-S



### 142140 — Probe Arm, RPP305-S West, Left, 2 Positioners, BlueRay

#### Features

- For positioning the probe on the left side of DUT
- With integrated probe planarization

#### Compatibility

- RPP305-B-S, RPP305-M-S



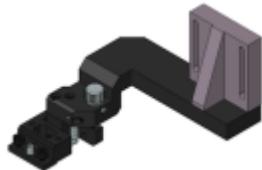
### 142143 — Probe Arm, RPP305-S East-West, 4 Positioners, BlueRay

#### Features

- For positioning the probe on the left or right side of DUT
- With integrated probe planarization

#### Compatibility

- RPP305-B-S, RPP305-M-S



### 142148 — Probe Arm, RPP305-S North-South, 4 Positioners, BlueRay

#### Features

- For positioning the probe at the front or rear of DUT
- With integrated probe planarization

#### Compatibility

- RPP305-B-S, RPP305-M-S



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## PROBE ARM, OPTICAL FIBER

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### 145533 — Probe Arm, Optical Fiber 125 $\mu$ m, DPP2xx

#### Features

- Allows placement of glass fiber over the wafer
- Mount to DPP2xx
- Fiber tip visible in microscope image
- Front part of arm can be horizontally rotated
- Other fiber adaptations on request



#### Specifications

- Ferrule diameter 250  $\mu$ m (9.8 mils) for 125  $\mu$ m (4.9 mils) fiber cores and jacket
- Fiber angle vertical adjustable 80°-90°

#### Compatibility

- DPP2xx (and former PH110)

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## PROBE ARMS, PM5 POWER SYSTEMS

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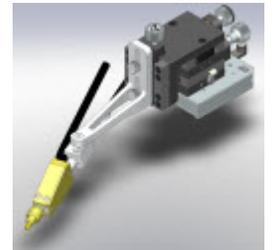
### 145303 — Probe Holder Short

#### Features

- Stainless steel design for high rigidity and minimum thermal drift
- To connect any individual probe to a RPP210 positioner for use with PM5 Power system

#### Compatibility

- PM5 Power



### 144777 — Probe Arm, RPP210-S, East-West

#### Features

- For use with HF probes or wedges
- Positions the probe at the left or right side of DUT
- Horizontal probe mounting plate can be levelled
- For use with HF platen and MicroAlign
- For use with RPP210-S (and former PH110) positioners



#### Compatibility

- All PM/PA stations with RF platen, CM300 and PA300 MicroAlign, RPP210-S (and former PH110)

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## PROBES, PM5 POWER SYSTEMS

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### 142693 — Probe 10 kV



**DANGER**

To use this probe safely, your station must be configured with a Tesla specific light curtain or approved safety interlocks. Failure to employ these safety measures can result in serious injury or death.

#### Features

- Highly isolated needle clamp for standard single tips
- Stainless steel design for high rigidity and minimum thermal drift
- For use with temperature chucks up to 300°C (572°F)
- Requires arm holder for RPP210



#### Specifications

- 1.2 m (4 ft) coax cable with 10 kV plug
- Operating voltage up to 10 kV

#### Compatibility

- PM5 Power

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### 145297 — Probe HV Triax / 3 kV



**DANGER**

To use this probe safely, your station must be configured with a Tesla specific light curtain or approved safety interlocks. Failure to employ these safety measures can result in serious injury or death.

#### Features

- Highly isolated needle clamp for standard single tips like PTT needles
- For use with temperature chucks up to 300°C (572°F)
- Stainless steel design for high rigidity and minimum thermal drift
- Requires arm holder for RPP210



#### Specifications

- 1.2 m (4 ft) coax cable with HV triax plug
- Operating voltage up to 3 kV with lowest leakage

#### Compatibility

- PM5 Power

---

### 145298 — Probe HV Coax / 3 kV



**DANGER**

To use this probe safely, your station must be configured with a Tesla specific light curtain or approved safety interlocks. Failure to employ these safety measures can result in serious injury or death.

#### Features

- Highly isolated needle clamp for standard single tips
- Stainless steel design for high rigidity and minimum thermal drift
- For use with temperature chucks up to 300°C (572°F)
- Requires arm holder for RPP210



#### Specifications

- 0.75 m (2.5 ft) coax cable with SHV plug
- Operating voltage up to 3 kV

#### Compatibility

- PM5 Power

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## 145300 — Probe HV Triax / Kelvin / 3 kV

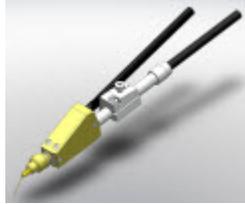


**DANGER**

To use this probe safely, your station must be configured with a Tesla specific light curtain or approved safety interlocks. Failure to employ these safety measures can result in serious injury or death.

### Features

- For triaxial I/V and Kelvin measurements
- Highly isolated needle clamp for standard single tips
- Stainless steel design for high rigidity and minimum thermal drift
- For use with temperature chucks up to 300°C (572°F)
- Connector sockets for CommonRing cables
- Requires arm holder for RPP210



### Specifications

- 2 x 1.2 m (4 ft) 50 Ohm triaxial cable with HV Triax plug
- Operating voltage up to 3 kV

### Compatibility

- PM5 Power

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## 145301 — Probe HV Coax / Kelvin / 3 kV

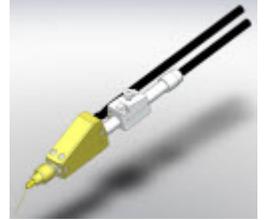


**DANGER**

To use this probe safely, your station must be configured with a Tesla specific light curtain or approved safety interlocks. Failure to employ these safety measures can result in serious injury or death.

### Features

- For coaxial I/V-, Kelvin- and C/V tests
- Highly isolated needle clamp for standard single tips
- Stainless steel design for high rigidity and minimum thermal drift
- For use with temperature chucks up to 300°C (572°F)
- Connector sockets for CommonRing cables
- Requires arm holder for RPP210



### Specifications

- 2 x 1.2 m (4 ft) 50 Ohm coaxial cable with SHV plug
- Operating voltage up to 3 kV

### Compatibility

- PM5 Power

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## 145302 — Probe Coax / Kelvin

### Features

- For coaxial I/V-, Kelvin- and C/V tests
- Highly isolated needle clamp for single tips (inner conductor of both cables already connected inside chassis)
- Stainless steel design for high rigidity and minimum thermal drift
- For use with temperature chucks up to 300°C (572°F)
- Connector sockets for CommonRing cables
- Requires arm holder for RPP210



### Specifications

- 2 x 1.2 m (4 ft) 50 Ohm coaxial cable with BNC connector

### Compatibility

- PM5 Power

## 146083 — Sigma for B1505A/SE



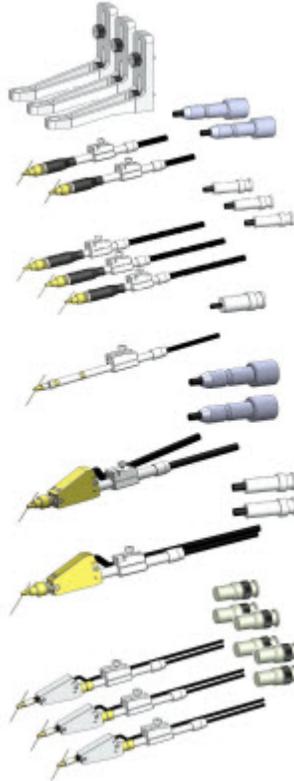
**DANGER**

To use this probe safely, your station must be configured with a Tesla specific light curtain or approved safety interlocks. Failure to employ these safety measures can result in serious injury or death.

### Features

SIGMA Integration of Keysight B1505A Parameter System into the ShieldEnclosure/POWER, including:

- On-wafer integration of Keysight B1505A Parameter Analyzer System for high voltage measurements up to 3 kV and for high current measurements up to 20 A pulsed
- Optimal integration by EMI and light shielded environment
- Dedicated probe arm set of 11 probe arms (triax, coax, Kelvin/triax, Kelvin/coax) for measuring with highest accuracy of:
  - Lateral and vertical devices
  - IV like device break down /I leak
  - CV like Cds and Cgd
- All appropriate feedthroughs, internal system wiring, measurement adapter and supports to accommodate Keysight protection adapters and HV-bias-T according to the Application Overview for B1505A by Keysight
- Keysight-verified configuration and probe accessories
- Also requires:
  - 3 DPP2xx-M positioners with MAG base
  - Standard probe needles suitable for desired voltage/ current range



### Compatibility

- PM5 Power System

## 146151 — Mounting B1505A/Module Selector/SE



**DANGER**

To use this probe safely, your station must be configured with a Tesla specific light curtain or approved safety interlocks. Failure to employ these safety measures can result in serious injury or death.

### Features

- Feed-through for an Keysight N1258A Module Selector into a ShieldEnclosure for a Power probe system
- Minimum additional space outside the SE required
- Mounting in the rear side of the SE.

### Compatibility

- PM5 Power System



# CM300xi DC Probe Mounts and Holders

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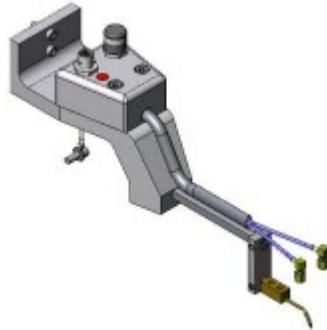
## TOPHAT CONFIGURATION

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### 163-593 — DCP Probe Mount, 43mm, Dual Triax, DPP2xx DPP2xx

#### Features

- Probe mount for DCP probes (DCP-1xx, DCP-HTR)
- Compatible with DPP2xx positioners and MicroChamber TopHat
- Constructed with high stability thermal materials



#### Specifications

- Usable from -60° to 300°C (-140° to 572°F, above 250°C [482°F]: 8 hours max. operation)
- Precision industry standard SSMC connectors
- 50 Ohm characteristic impedance
- Breakdown voltage: >500Volts
- Max Current = 1Amp

#### Kit Contents

- Probe to positioner mount
- Dual triaxial adapter (Kelvin), mini triax (jack) to SSMC (m)
- EMI shielding cap
- EMI grounding strap

#### Compatibility

- CM300xi with TopHat, Elite 300

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### 163-595 — DCP Probe Mount, 43 mm, HTS, DPP2xx

#### Features

- Probe mount for DCP probes (DCP-1xx, DCP-HTR)
- Direct probe/cable connection (SSMC)
- Compatible with DPP2xx positioners and MicroChamber TopHat
- Constructed with high stability thermal materials



#### Kit Contents

- Probe to positioner mount
- EMI grounding strap

#### Compatibility

- CM300xi with TopHat, Elite 300

---

### 163-597 — Needle Probe Mount, 43mm, Enhanced Jack Lock Holder, DPP2xx

#### Features

- Probe mount for DCP probes (DCP-1xx, DCP-HTR)
- Direct probe/cable connection (SSMC)
- Compatible with DPP2xx positioners and MicroChamber TopHat
- Constructed with high stability thermal materials



#### Kit Contents

- Probe to positioner mount
- EMI grounding strap

#### Compatibility

- CM300xi with TopHat, Elite 300

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## TOP CHAMBER CONFIGURATION

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### 163-307 — Probe Arm, DPP2xx/DPP3xx for DCP Probe

#### Features

- For CM300xi MicroAlign systems
- For triaxial I/V-, Kelvin-, C/V (with CX-TRX adapter) and 1/f applications
- Holding fixture for advanced DC coaxial probes like AP&T Probes, DCP and DCP-HTR probes
- Stainless steel design for high rigidity and minimum thermal drift
- Requires adaptation unit 138697 for use with DPP3xx-S/DPP450-S
- Includes two cables 0.7 m (2.3 ft) long 3-lug Triax-SSMC for IV and Kelvin measurements



#### Specifications

- DC leakage <10 fA at ambient temperature

#### Compatibility

- CM300xi MicroAlign with top chambers + DPP2xx, DPP3xx-S, DPP450-S (and former PH110, PH150, PH400)

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## 163-309 — Probe Arm, DPP2xx/DPP3xx, Triax

### Features

- For use with CM300xi MicroAlign systems
- Highly isolated needle clamp for standard single tips like PTT needles
- Stainless steel design for high rigidity and minimum thermal drift
- Requires adaptation unit 138697 for use with DPP3xx-S/DPP450-S



### Specifications

- 0.75 m (2.3 ft) 50 Ohm low noise triax cable and 3 lug Triax plug
- DC leakage <10 fA at ambient temperature
- For use with temperature chucks up to 300°C (572°F)

### Compatibility

- CM300xi MicroAlign with top chambers + DPP2xx, DPP3xx-S, DPP450-S (and former PH110, PH150, PH400)

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## 163-313 — Probe Arm, DPP2xx/DPP3xx, Pico Probe

### Features

- For CM300xi MicroAlign systems
- Holding fixture for Active Pico probes from GGB Pico probe 10...34 (Pico probe not included)
- Stainless steel design for high rigidity and minimum thermal drift
- Requires Test Equipment Interface 144987 for use at MicroAlign Advanced systems
- Requires adaptation unit 138697 for use with DPP3xx-S/DPP450-S



### Compatibility

- CM300xi MicroAlign + DPP2xx, DPP3xx-S, DPP450-S (and former PH110, PH150, PH400)

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## 163-311 — Probe Arm, DPP2xx/DPP3xx, Triax, Kelvin 1Tip

### Features

- For use with CM300xi MicroAlign systems
- For triaxial I/V-, Kelvin- and C/V (with CX-TRX adapter) tests
- Stainless steel design for high rigidity and minimum thermal drift
- Highly isolated needle clamp for single tips like PTT needles (signal from force and sense already connected inside chassis)
- Connector sockets for CommonRing cables (C/V-Test, 1 cable included), guard potentials from force and sense are connected to these sockets
- Requires adaptation unit 138697 for use with DPP3xx-S/DPP450-S



### Specifications

- 2 x 0.75 m (2.3 ft) 50 Ohm low-noise triax cable and 3 lug Triax plug
- For use with temperature chucks up to 300°C (572°F)

### Compatibility

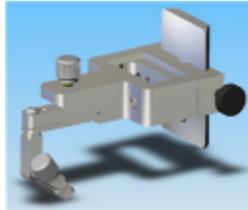
- CM300xi MicroAlign + DPP2xx, DPP3xx-S, DPP450-S (and former PH110, PH150, PH400)

# Elite 300 and Summit DC Probe Mounts and Holders

## 144-388 — Universal Probe Holder with Dovetail Adapter Kit

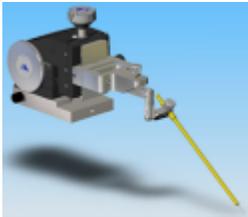
### Features

- Universal probe holder for DPP series positioners (not TopHat compatible)
- Locking universal swivel in joint for quick probe setup
- Gross Z height adjustment for easy probe tip replacement
- Standard probe interface supports multiple probes (coax, triax, unshielded, picoprobe)

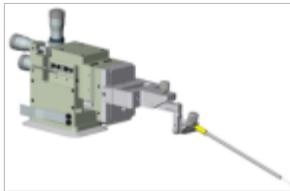


### Kit Contents

- Universal probe holder
- Cable clamp
- Mounting screws



Universal probe holder shown mounted on a DPP2xx positioner, with a straight coaxial probe and PTT needle combination



Universal probe holder shown mounted on a DPP3xx/DPP450 positioner, with a straight coaxial probe and PTT needle combination

### Compatibility

- Elite 300/AP, Elite 300/M, Summit, SUMMIT200

## 144-389 — Universal Probe Holder with MS1 Adapter

### Features

- Universal probe holder for MS1-44 programmable positioners (not compatible with TopHat)
- Locking universal swivel in joint for quick probe setup
- Gross Z height adjustment for easy probe tip replacement
- Standard probe interface supports multiple probes (coax, triax, unshielded, pico probe)
- Side cable clamp for minimizing cable vibration to the probe



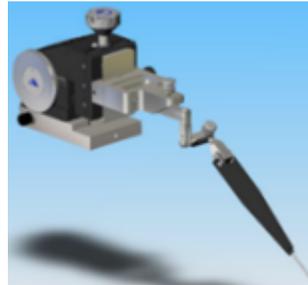
### Kit Contents

- Universal probe holder
- Cable clamp
- Mounting screws

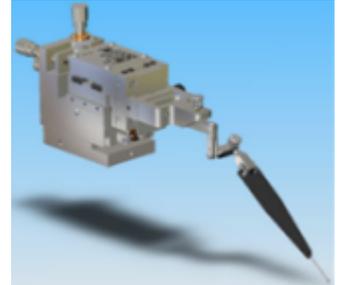
### Compatibility

- Elite 300, Summit

## 144-887 — Mount, Pico Probe, Stud Grip



Picoprobe high impedance probe on DPP2xx-PTH positioner



Picoprobe high impedance probe on DPP3xx-PTH or DPP450-PTH positioner

### Features

- Adapts pico probe high impedance probes to the universal probe holder

### Compatibility

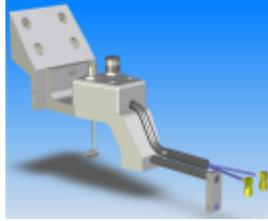
- Elite 300, Summit, SUMMIT200

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## 151-286 — DCP Probe Mount, 40 mm, HTS, Triax, MS1 Series

### Features

- Probe mount for DCP probes (DCP-1xx, DCP-HTR)
- For use on Elite 300
- Compatible with MS1 programmable positioners
- Compatible with MicroChamber TopHat
- Constructed with high-stability thermal materials



### Specifications

- Usable from -60°C to +300°C (-140° to +572°F, above +250°C [+482°F]: 8 hours max. operation)
- Precision Industry Standard SSMC connectors
- 50 Ohm characteristic impedance
- Breakdown voltage: >500Volts
- Max Current = 1Amp

### Kit Contents

- Probe to positioner mount
- Dual triaxial adapter (Kelvin), mini triax (jack) to SSMC (m)
- EMI shielding cap
- EMI grounding strap

### Compatibility

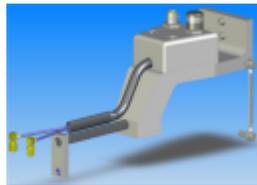
- Elite 300/AP, Elite 300/M

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## 151-287 — DCP Probe Mount, 40 mm, HTS, Triax, DPP2xx

### Features

- Probe mount for DCP probes (DCP-1xx, DCP-HTR)
- For use on Elite 300
- Compatible with DPP2xx positioners
- Compatible with MicroChamber TopHat
- Constructed with high-stability thermal materials



### Specifications

- Usable from -60°C to +300°C (-140° to +572°F, above +250°C [+482°F]: 8 hours max. operation)
- Precision Industry Standard SSMC connectors
- 50 Ohm characteristic impedance
- Breakdown voltage: >500Volts
- Max Current = 1Amp

### Kit Contents

- Probe to positioner mount

- Dual triaxial adapter (Kelvin), mini triax (jack) to SSMC (m)
- EMI shielding cap
- EMI grounding strap

### Compatibility

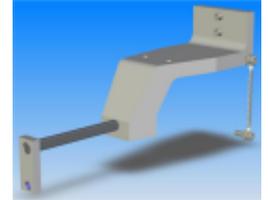
- Elite 300/AP, Elite 300/M, Summit (with HTS platen upgrade), SUMMIT200, TESLA200

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## 151-288 — DCP Probe Mount, 40 mm, HTS, DPP2xx

### Features

- Probe mount for DCP probes (DCP-1xx, DCP-HTR)
- For use on Elite 300
- Direct probe/cable connection (SSMC)
- Compatible with DPP2xx positioners
- Compatible with MicroChamber TopHat
- Constructed with high-stability thermal materials



### Kit Contents

- Probe to positioner mount
- EMI grounding strap

### Compatibility

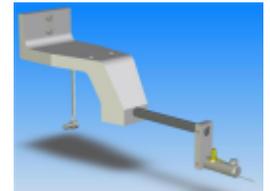
- Elite 300/AP, Elite 300/M, Summit (with HTS platen upgrade), SUMMIT200, TESLA200

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## 151-289 — Needle Probe Mount and Enhanced Jack Lock Holder for DPP2xx Positioners

### Features

- Enhanced probe mount for PTT needle probes (45°)
- Easy probe needle replacement without tools
- Constructed with high-stability thermal materials
- For use on Elite 300
- Compatible with MicroChamber TopHat
- Compatible with DPP2xx positioners
- Compatible with all 45° PTT series probe needles



### Kit Contents

- Probe to positioner mount
- Jack lock holder with SSMC (f) and pin jack (f) connectors
- 1 m (3.3 ft) coax (m) to SSMC (m)
- 46 cm (18 in) cable with pin jack (m) to (m)
- EMI grounding strap

### Compatibility

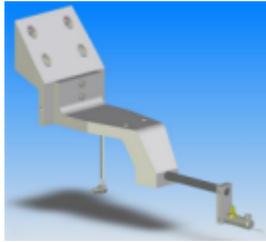
- Elite 300/AP, Elite 300/M, Summit (with HTS platen upgrade), SUMMIT200, TESLA200

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## 151-290 — PTT Needle Probe Mount, 40 mm, HTS, Enhanced Jack Lock Holder, MS1 Series

### Features

- Enhanced probe mount for PTT needle probes (45°)
- For use on Elite 300
- Compatible with MicroChamber TopHat
- Easy probe needle replacement without tools
- Compatible with all 45° PTT series probe needles
- Compatible with MS1 programmable positioners



### Kit Contents

- Probe to positioner mount
- Jack lock holder with SSMC (f) and pin jack (f) connectors
- 1 m (3.3 ft) coax (m) to SSMC (m)
- 46 cm (18 in) cable with pin jack (m) to (m)
- EMI grounding strap

### Compatibility

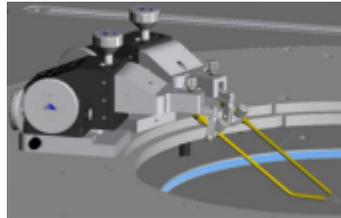
- Elite 300/AP, Elite 300/M, Summit (with HTS platen upgrade)

# Elite 300 and Summit DC Probes

## 139-331 — Coaxial Probe (Straight)

### Features

- Shielded DC measurements with coaxial probe
- Straight configuration for multiple probing applications when using straight or 45° needles for steep access
- Easy probe needle replacement without tools
- Compatible with all PTT series probe needles
- Replaceable SMA cable
- Easy connection to Elite 300 coax connection panel on platen
- The temperature of the cable containing arm must not exceed 200°C. Usually this is suitable for 300°C wafer temperature in an open setup with an arm at least 10mm above the wafer.



Two (2) DPP2xx positioners and universal probe mounts, one using the straight coax probe with straight needle, and the other using a bent coax probe with 45° bent PTT needle

### Kit Contents

- Straight shielded probe
- Integrated SMA (f) connector
- Shielded coaxial cable, 76 cm (30 in) with SMA (m) to BNC plug

### Compatibility

- Elite 300, Summit, SUMMIT200

## 139-870 — Coaxial Probe (Bent)

### Features

- Shielded DC measurements with coaxial probe
- Bent configuration for increased microscope objective clearance with high magnification/low working distance objective lenses
- Easy probe needle replacement without tools
- Compatible with all bent PTT series probe needles



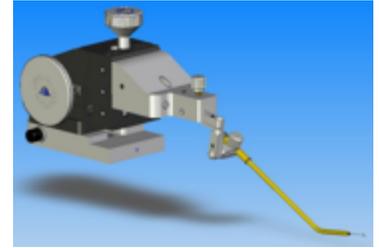
- Replaceable SMA cable
- Easy connection to Elite 300 coax connection panel on platen
- The temperature of the cable containing arm must not exceed 200°C. Usually this is suitable for 300°C wafer temperature in an open setup with an arm at least 10mm above the wafer.

### Kit Contents

- Bent 35° shielded probe
- Integrated SMA (f) connector
- Shielded coaxial cable, 76 cm (30 in) with SMA (m) to BNC plug

### Compatibility

- Elite 300, Summit, SUMMIT200



Coaxial probe (bent) with 45° PTT needle, shown attached to universal probe holder and DPP2xx positioner.

## 144-390 — Triaxial Probe (Straight)

### Features

- Guarded DC measurements with triaxial probe
- Integrated triaxial cable for low-noise measurements
- Easy connection to Elite 300 triaxial connection panel on platen
- Straight configuration for multiple probing applications when using straight or 45° needles for steep access
- Easy probe needle replacement without tools
- Compatible with all PTT series probe needles
- The temperature of the cable containing arm must not exceed 200°C. Usually this is suitable for 300°C wafer temperature in an open setup with an arm at least 10mm above the wafer.



### Kit Contents

- Straight triax probe
- Integrated triaxial low-noise cable, 76 cm (30 in) with triax (m) connector

### Compatibility

- Elite 300, Summit, SUMMIT200

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## 144-391 — Triaxial Probe (Bent)

### Features

- Guarded DC measurements with triaxial probe
- Integrated triaxial cable for low-noise measurements
- Easy connection to Elite 300 triaxial connection panel on platen
- Bent configuration for increased microscope objective clearance with high magnification/low working distance objective lenses
- Easy probe needle replacement without tools
- Compatible with all 45° PTT series probe needles
- The temperature of the cable containing arm must not exceed 200°C. Usually this is suitable for 300°C wafer temperature in an open setup with an arm at least 10mm above the wafer.



### Kit Contents

- Bent 35° triax probe
- Integrated triaxial low-noise cable, 76 cm (30 in) with triax (m) connector

### Compatibility

- Elite 300, Summit, SUMMIT200

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## 144-392 — Unshielded Probe Kit

### Features

- Interchangeable probe arms (unshielded)
- Easy probe needle replacement without tools
- Pin jack for DC electrical connection
- Compatible with all PTT series probe needles



### Kit Contents

- Collet adapter with pin lock connector (f)
- Straight unshielded probe arm with jack lock
- 35° bent unshielded probe arm with jack lock
- 46 cm (18 in) cable with pin jack (m) to (m)



Unshielded probe (straight) and collet shown attached to universal probe holder and DPP2xx positioner

### Compatibility

- Elite 300, Summit, SUMMIT200

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## PHQ — Quick Lock Probe Holder

### Features

- Replacement probe tip holder for MMP probes
- Quick lock needle holding mechanism (spring-loaded Collette style)
- Constructed of nickel plated brass that can be user-formed as needed



### Specifications

- 114 mm (4.5 in) in length
- Nickel plated brass
- Quick lock mechanism

### Kit Contents

- Probe tip holder
- MAE-44/18 cable 46 cm (18 in)

### Compatibility

- Summit

---

## PHW — Wrench Lock Probe Holder

### Features

- Replacement probe tip holder for MMP probes
- Wrench lock needle holding mechanism (set screw hold)
- Constructed of nickel plated brass that can be user-formed as needed



### Specifications

- 114 mm (4.5 in) in length
- Nickel plated brass
- Wrench lock mechanism

### Kit Contents

- Probe tip holder
- MAE-44/18 cable 46 cm (18 in)
- Allen wrench

### Compatibility

- Summit

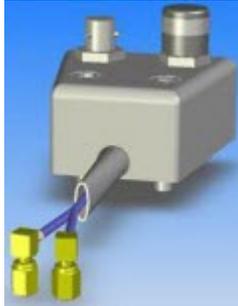
# Summit DC Probe Arms and Mounts

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## 104-030K — DCP Probe Mount, Dual Triax Adapter (Kelvin) for RPP305-EW-SU positioner

### Features

- Enables Kelvin connection to DCP style probes on East/West RPP305 positioners
- Supports Summit 11/12K and S300 systems



### Specifications

- Instrument connections are female mini-triax connectors
- Probe connections are cables with SSMC male for use with DCP style probes
- Usable from -60°C to +300°C (-140° to +572°F, above +250°C [+482°F]: 8 hours max. operation)
- 50 Ohm characteristic impedance
- Breakdown voltage: >500Volts
- Max current = 1Amp

### Kit Contents

- Mounting hardware

### Compatibility

- Summit, S300, Alessi

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## 104-856K — DCP Probe Mount, Dual Triax Adapter (Kelvin) for RPP305-NS-SU Positioner

### Features

- Enables Kelvin connection to DCP style probes on North/South RF positioners
- Supports Summit 11/12K and S300 systems

### Specifications

- Instrument connections are female mini-triax connectors
- Probe connections are cables with SSMC male for use with DCP style probes
- Usable from -60°C to +300°C (-140° to +572°F, above +250°C [+482°F]: 8 hours max. operation)
- 50 Ohm characteristic impedance
- Breakdown voltage: >500Volts
- Max current = 1Amp

### Kit Contents

- Mounting hardware

### Compatibility

- Summit, S300, Alessi

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## 114-818 — DCP Probe Mount, Dual Triax Adapter (Kelvin) for DPP2xx

### Features

- Enables Kelvin connection to DCP style probes on DPP2xx positioners
- Supports Summit 11/12K and S300 systems

### Specifications

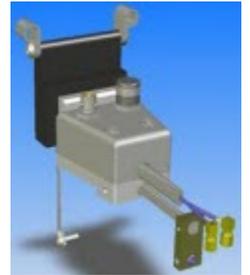
- Instrument connections are female mini-triax connectors
- Probe connections are cables with SSMC male for use with DCP style probes
- Usable from -60°C to +300°C (-140° to +572°F, above +250°C [+482°F]: 8 hours max. operation)
- 50 Ohm characteristic impedance
- Breakdown voltage: >500Volts
- Max current = 1Amp

### Kit Contents

- Mounting hardware

### Compatibility

- Summit, S300, Alessi

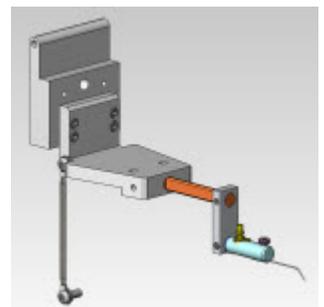


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## 114-842 — Needle Probe Mount and Jack Lock Holder for DPP2xx

### Product Features

- Enhanced probe mount for PTT needle probes (45°)
- Easy probe needle replacement without any tools
- Top hat compatible
- Will work on positioners equipped for DCP probes
- Uses mini pin jack style or SSMC cable connection



### Kit Contents

- Includes arm and mounting hardware
- Recommended for use with PTT-XX/4-25 (45°) style needles (not included)

### Station Compatibility

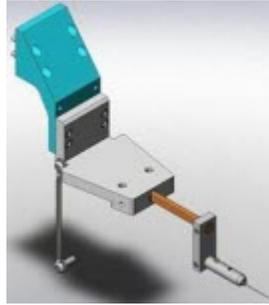
- Summit, S300, Alessi

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## 114-843 — Needle Probe Mount and Jack Lock Holder for MS1 Series Positioners

### Features

- Needle probe holder (PTT style needles) for MS1 series programmable positioners
- Jack lock style holding mechanism
- Top hat compatible
- Will work on positioners equipped for DCP probes
- Uses mini pin jack style cable connection



### Kit Contents

- Includes arm and mounting hardware
- Recommended for use with PTT-XX/4-25 (45degree) style needles (not included)

### Compatibility

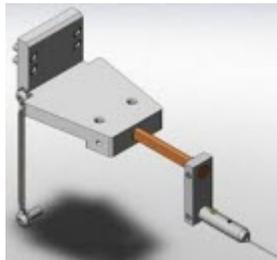
- Summit, S300, Alessi

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## 114-847 — Needle Probe Mount and Jack Lock Holder for MH2 Positioners

### Features

- Needle probe holder (PTT style needles) for MH2 series positioners
- Jack lock style holding mechanism
- Top hat compatible
- Will work on positioners equipped for DCP probes
- Uses mini pin jack style cable connection



### Kit Contents

- Includes arm and mounting hardware
- Recommended for use with PTT-XX/4-25 (45degree) style needles (not included)

### Compatibility

- Summit, S300, Alessi

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## 115-596 — DCP Probe Mount, Dual Triax Adapter (Kelvin) for MS1 Series Positioners

### Features

- Enables Kelvin connection to DCP style probes on MS1 series programmable positioners

### Specifications

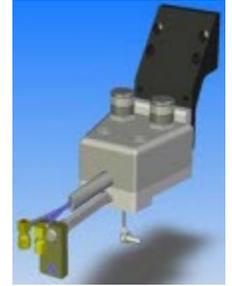
- Instrument connection are female mini-triax connectors
- Probe connections are cables with SSMC male for use with DCP style probes
- Usable from -60°C to +300°C (-140° to +572°F, above +250°C [+482°F]: 8 hours max. operation)
- 50 Ohm characteristic impedance
- Breakdown voltage: >500Volts
- Max current = 1Amp

### Kit Contents

- Mounting hardware

### Compatibility

- Summit, S300, Alessi



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## 116-031 — DCP Probe Mount for DPP2xx, Direct Probe/Cable Conn (SSMC)

### Features

- Mounting bracket for DCP probes, for use on DPP2xx positioners
- To be used with direct cable from instrument to DCP probe (e.g., 105-540 or 124-562 BNC to SSMC cables)
- Top Hat compatible

### Kit Contents

- Mounting hardware

### Compatibility

- Summit, S300, Alessi

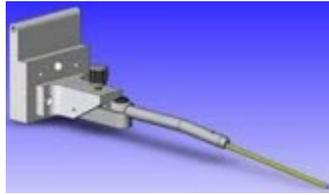


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## 129-116 — PTT Probe Mount (MMP-01/J) and Adapter Kit for DPP2xx

### *Features*

- For use with DPP2xx positioners
- Brass needle holder can be user-formed as needed
- Uses pin jack style connection (e.g., MAE cables), one included
- Has gross Z adjustment via thumb screw on holder arm
- Holder also pivots
- Not recommended for Top Hat use



### *Kit Contents*

- Mounting hardware
- Mounting bracket
- Probe holder arm
- MAE-44/18 cable 46 cm (18 in)

### *Compatibility*

- Summit, S300 (non TopHat), Alessi

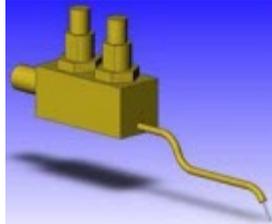
# DC Probes, Coax and Triax, DCP and PE5 Style Probe Holders

## DCP-105R — DC Coaxial Probe, Single Line, 0.5 $\mu\text{m}$ Radius, Replaceable Tip

(Packages of 4 available by ordering DCP-105R-4)

### Features

- High-quality construction with low-noise electrical performance
- Ultra-low, fA and fF measurements from  $-65^{\circ}$  to  $150^{\circ}\text{C}$  ( $-149^{\circ}$  to  $302^{\circ}\text{F}$ )
- Fully guarded measurements to fA and fF levels
- Great for modeling and characterization work
- Dual Precision SSMC 50 ohm connections allow for Kelvin configuration to the probe body
- Individual connectors for force sense connections
- Integrally designed as part of FormFactor's complete measurement solution
- Configurable for triax usage
- Replaceable coax probe tips (Not included)



### Specifications

- Breakdown voltage:  $>500\text{ V}$
- Isolation resistance:  $> 1 \times 10^{13}\text{ ohms}$
- Frequency response (3 dB): 150 MHz
- Temperature range:  $-65^{\circ}$  to  $+150^{\circ}\text{C}$  ( $-149^{\circ}$  to  $+302^{\circ}\text{F}$ )
- Characteristic impedance: 50 ohms
- Tip material: Tungsten
- Body material: Gold plated
- Connector type: SSMC
- 0.5  $\mu\text{m}$  (0.2 mils) radius probe tip

### Compatibility

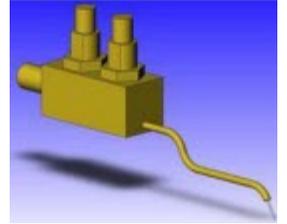
- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, S300, M150, Alessi
- See Replaceable Probe Tips on page 13 for compatible replacement probes

## DCP-115R — DC Coaxial Probe, Single Line, 1.5 $\mu\text{m}$ Radius, Replaceable Tip

(Packages of 4 available by ordering DCP-115R-4)

### Features

- High-quality construction with low-noise electrical performance
- Ultra-low, fA and fF measurements from  $-65^{\circ}$  to  $150^{\circ}\text{C}$  ( $-149^{\circ}$  to  $302^{\circ}\text{F}$ )
- Fully guarded measurement to fA and fF levels
- Great for modeling and characterization work
- Dual Precision SSMC 50 ohm connections allow for Kelvin configuration to the probe body
- Individual connectors for force sense connections
- Integrally designed as part of FormFactor's complete measurement solution
- Configurable for triax usage
- Replaceable coax probe tips (Not included)



### Specifications

- Breakdown voltage:  $>500\text{ V}$
- Isolation resistance:  $> 1 \times 10^{13}\text{ ohms}$
- Frequency response (3 dB): 150 MHz
- Temperature range:  $-65^{\circ}$  to  $+150^{\circ}\text{C}$  ( $-149^{\circ}$  to  $+302^{\circ}\text{F}$ )
- Characteristic impedance: 50 ohms
- Tip material: Tungsten
- Body material: Gold plated
- Connector type: SSMC
- 1.5  $\mu\text{m}$  (0.06 mils) radius probe tip

### Compatibility

- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, S300, M150, Alessi
- See Replaceable Probe Tips on page 13 for compatible replacement probes

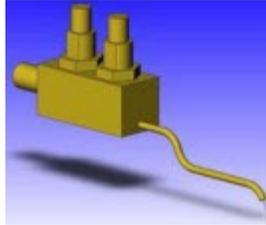
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## DCP-150R — DC Coaxial Probe, Single Line, 5.0 $\mu\text{m}$ , Replaceable Tip

(Packages of 4 available by ordering DCP-150R-4)

### Features

- High-quality construction with low-noise electrical performance
- Ultra-low, fA and fF measurements from  $-65^{\circ}$  to  $+150^{\circ}\text{C}$  ( $-149^{\circ}$  to  $+302^{\circ}\text{F}$ )
- Fully guarded measurements to fA and fF levels
- Great for modeling and characterization work
- Dual Precision SSMC 50 ohm connections allow for Kelvin configuration to the probe body
- Individual connectors for force sense connections
- Integrally designed as part of FormFactor's complete measurement solution
- Configurable for triax usage
- Replaceable coax probe tips (Not included)



### Specifications

- Breakdown voltage:  $>500\text{ V}$
- Isolation resistance:  $> 1 \times 10^{13}\text{ ohms}$
- Frequency response (3 dB): 150 MHz
- Temperature range:  $-65^{\circ}$  to  $+150^{\circ}\text{C}$  ( $-149^{\circ}$  to  $+302^{\circ}\text{F}$ )
- Characteristic impedance: 50 ohms
- Tip material: Tungsten
- Body material: Gold plated
- Connector type: SSMC
- 5  $\mu\text{m}$  (0.2 mils) radius probe tip

### Compatibility

- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, S300, M150, Alessi
- See Replaceable Probe Tips on page 13 for compatible replacement probes

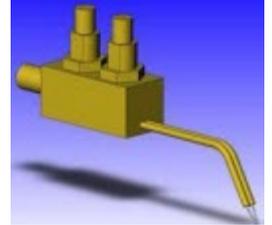
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## DCP-150K-25 — DC Coaxial Probe, Kelvin, 25 $\mu\text{m}$ Pitch, 5.0 $\mu\text{m}$ Tip Radius

(Packages of 4 available by ordering DCP-150K-25-4)

### Features

- True Kelvin Probe, two 5  $\mu\text{m}$  (0.2 mils) radius tips separated by 25  $\mu\text{m}$  (0.98 mils)
- High-quality construction with low-noise electrical performance
- Ultra-low, fA and fF measurements from  $-65^{\circ}$  to  $+150^{\circ}\text{C}$  ( $-149^{\circ}$  to  $+302^{\circ}\text{F}$ )
- Fully guarded measurements to fA and fF levels
- Great for modeling and characterization work
- Dual Precision SSMC 50 ohm connections, one for each tip
- Individual connectors for each tip
- Integrally designed as part of FormFactor's complete measurement solution
- Configurable for triax usage



### Specifications

- Breakdown voltage:  $>500\text{ V}$
- Isolation resistance:  $> 1 \times 10^{13}\text{ ohms}$
- Frequency response (3 dB): 150 MHz
- Temperature range:  $-65^{\circ}$  to  $+150^{\circ}\text{C}$  ( $-149^{\circ}$  to  $+302^{\circ}\text{F}$ )
- Characteristic impedance: 50 ohms
- Probe Tip separation: 25 Microns
- Tip material: Tungsten
- Body material: Gold plated
- Connector type: SSMC
- 5  $\mu\text{m}$  (0.2 mils) radius probe tip

### Compatibility

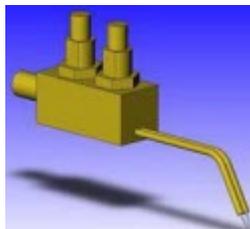
- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, S300, M150, Alessi

## DCP-150K-50 — DC Coaxial Probe, Kelvin, 50 $\mu\text{m}$ Pitch, 5.0 $\mu\text{m}$ Tip

(Packages of 4 available by ordering DCP-150K-50-4)

### Features

- True Kelvin Probe, two 5  $\mu\text{m}$  (0.2 mils) radius tips separated by 50  $\mu\text{m}$  (2.0 mils)
- High-quality construction with low-noise electrical performance
- Ultra-low, fA and fF measurements from -65° to +150°C (-149° to +302°F)
- Fully guarded measurements to fA and fF levels
- Great for Modeling and Characterization work
- Dual Precision SSMC 50 ohm connections, one for each tip
- Individual connectors for each tip
- Integrally designed as part of FormFactor's complete measurement solution
- Configurable for triax usage



### Specifications

- Breakdown voltage: >500 V
- Isolation resistance: > 1 x 10<sup>13</sup> ohms
- Frequency response (3 dB): 150 MHz
- Temperature range: -65° to +150°C (-149° to +302°F)
- Characteristic impedance: 50 ohms
- Probe Tip separation: 50 Microns
- Tip material: Tungsten
- Body material: Gold plated
- Connector type: SSMC
- 5  $\mu\text{m}$  (0.2 mils) radius probe tip

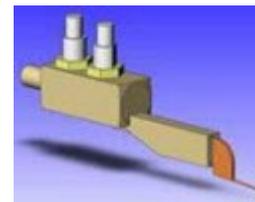
### Compatibility

- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, S300, M150, Alessi

## DCP-HTR — High Performance DC Probe Holder

### Features

- High-quality construction with low-noise electrical performance
- Fully guarded measurements to fA and fF levels
- Great for modeling and characterization work
- Configurable for triax usage
- Full temperature range coverage
- Dual Precision SSMC 50 connection allow for Kelvin configuration to the probe body
- Individual connectors for force sense connections
- Replaceable microstrip probe tips (Not included)



### Specifications

- Frequency range: dc - 100 MHz
- 500 V breakdown voltage, isolation resistance 1E13 ohms
- Temperature range -65° to +300°C (-149° to +572°F)
- Leakage noise:  $\pm 10\text{fA}@-65$  to +200°C,  $\pm 20\text{fA}@200$  to 300°C
- Does not include replaceable tip

### Compatibility

- CM300xi, PA/PM, MicroAlign, Elite 300, Summit, S300, M150, Alessi
- See Replaceable Probe Tips on page 13 for compatible replacement probes

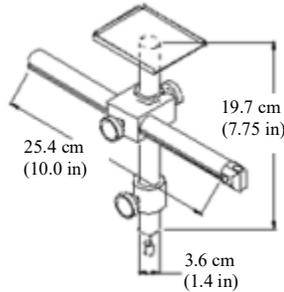
# Summit

## Optical Bridge Mounts and Transports

### 115-416 — Low Power Optics Boom Stand

#### Features

- Microscope boom stand for low power microscopes/optic
- Includes illuminator mounting tray
- Provides for a wide range of movement
- Enables movement of the microscope fully out of the probing area
- Fits Summit 11000/12000 systems
- Uses standard bonder arm mounts
- Not compatible with eVue, Mitutoyo, Seiwa, or A-Zoom microscopes



#### Compatibility

- Summit

### 131-923 — Motorized Theta Upgrade Kit (with 80 Pin Interconnect)

#### Features

- Kit supports automatic wafer alignment and productivity tools in probe station control software packages
- Installation must be ordered with kit (p/n SRV-STATION-UP)
- Must be used with PC48 OR PC38, not compatible with PCI motor card



#### Specifications

- Travel  $\pm 5.5^\circ$
- Resolution  $0.65 \mu\text{m}$  (0.03 mils)\*
- Repeatability  $\pm 2 \mu\text{m}$  (0.08 mils)\*
- Accuracy  $\pm 2 \mu\text{m}$  (0.08 mils)\* standard moves,  $\pm 3 \mu\text{m}$  (0.12 mils)\* large moves

\* Measured at edge of 200 mm (8 in) chuck

#### Kit Contents

- New motorized Theta/Z-stage assembly
- Interconnect board electronics for 80-pin motor controller
- Motor driver and complete accessories

#### Compatibility

- Summit 12000

### 131-924 — Motorized Theta Upgrade Kit for Summit 12000 Stations (with 68 Pin Interconnect)

#### Features

- Kit supports automatic wafer alignment and productivity tools in probe station control software packages
- Installation must be ordered with kit (p/n SRV-STATION-UP)



#### Specifications

- Travel  $\pm 5.5^\circ$
- Resolution  $0.65 \mu\text{m}$  (0.03 mils)\*
- Repeatability  $\pm 2 \mu\text{m}$  (0.08 mils)\*
- Accuracy  $\pm 2 \mu\text{m}$  (0.08 mils)\* standard moves,  $\pm 3 \mu\text{m}$  (0.12 mils)\* large moves

\*Measured at edge of 200 mm (8 in) chuck

#### Kit Contents

- New motorized Theta/Z-stage assembly
- Interconnect board electronics for 68-pin motor controller
- Motor driver and complete accessories

#### Compatibility

- Summit 12000

### 158-073 — Large Area Optics Bridge Mount

#### Features

- Larger area 152 x 203 mm (6 x 8 in) XY movement range
- Linear Z lift
- Manual lead screw driven XY movement
- Compatible with most common microscopes used on probing systems
- A microscope mounting plate matching the selected microscope and microscope transport is required
- Fine Z range/focus control is managed using the microscope focus mechanism. Select microscope models offer optional programmability for this feature.



#### Specifications

- 152 mm (6 in) X axis movement range ( $\pm 76$  mm [3 in] from center of travel)

- 203 mm (8 in) Y axis movement range ( $\pm 102$  mm [4 in] from center of travel)
- 76 mm (3 in) linear manual Z lift

### Compatibility

- Summit

---

## 162-160 — High Stability Optics Bridge Mount (Manual 2x2)

### Features

- High stability 51 x 51 mm (2 x 2 in) XY microscope transport
- Easy coaxial manual XY drive controls
- Pneumatic vertical z-lift (102 mm [4 in] of travel)
- Supports laser and very small structure work
- A microscope mounting plate matching the selected microscope and microscope transport is required
- Fine Z range/focus control is managed using the microscope focus mechanism. Select microscope models offer optional programmability for this feature.



### Specifications

- 51 mm (2 in) X axis movement range ( $\pm 25$  mm [1 in] from center of travel)
- 51 mm (2 in) Y axis movement range ( $\pm 25$  mm [1 in] from center of travel)

### Compatibility

- Summit

---

## 162-165 — High Stability Optics Bridge Mount (Motorized 2x2)

### Features

- Programmable high stability 51 x 51 mm (2 x 2 in) XY microscope transport
- Pneumatic vertical z-lift (102 mm [4 in] of travel)
- Motorized XY control with rotary encoders for precision positioning
- Knobs for manual control provided
- Supports laser and very small structure work
- ECA-53 drive card included
- An ECX-56 equipped system is required
- Fine Z range/focus control is managed using the microscope focus mechanism. Select microscope models offer optional programmability for this feature.



### Specifications

- 51 mm (2 in) X axis movement range ( $\pm 25$  mm [1 in] from center of travel)
- 51 mm (2 in) Y axis movement range ( $\pm 25$  mm [1 in] from center of travel)
- Encoder resolution is 0.4  $\mu$ m (0.02 mils)

### Compatibility

- Summit 12000

# Connection Panels (Coax, Triax, Pin jack, Banana Vacuum)

## 105-626 — Triax Connection Panel, Side Mount

### Features

- Optional Triax connection panel for convenient cable management
- Designed to mount to the side of the Summit series platen
- 8 Triax (3-lug) feed through connectors (female)
- Panel connections support single triax cables and Keysight dual triax SMU cable assemblies. For Keysight Quadrax SMU connections, please contact the factory.



### Kit Contents

- Panel with triax feed-throughs mounted
- Mounting hardware
- Cables are not included

### Compatibility

- Summit

## 106-171 — Triax Connection Panel, Large Area Optical Bridge/Boom Stand Config

### Features

- Connection/vacuum panel
- 6 vacuum ports with on/off toggle switches
- Supports triax, BNC, pin-to-banana style connects
- Triax connections support single triax cables and Keysight dual triax SMU cable assemblies. Contact the factory for Keysight quadrax SMU connections.



### Specifications

- 12 Triax (3-lug) feed through connectors (f)
- 2 BNC (2-lug) feed through connectors (f)
- 4 BNC to pin jack feed through connections
- Shorting bar to set the plane float or grounding setting
- Six 1/8 in barb output vacuum manifold for vacuum base positioner support

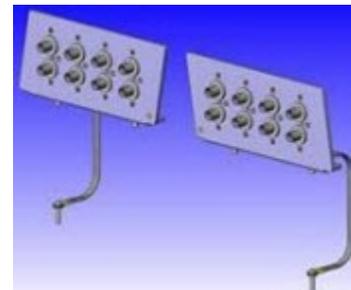
### Compatibility

- Summit

## 118-640 — Triax Connection Panel, High Stability Bridge Config, S300

### Features

- Set of Triax connection panels for convenient cable management
- Designed to mount to the high stability optical bridge mount
- Panel connections support single triax cables and Keysight dual triax SMU cable assemblies. Contact the factory for Keysight quadrax SMU connections.



### Specifications

- 16 total Triax (3-lug) feed through connectors (female), 8 on each side
- Ground straps for each panel

### Compatibility

- S300

## 134-710 — Triax Connection Panel, High Stability Bridge Config, Summit

### Features

- Set of Triax connection panels for convenient cable management
- Designed to mount to the high stability optical bridge mount
- Panel connections support single triax cables and Keysight dual triax SMU cable assemblies. For Keysight quadrax SMU connections, please contact the factory.



### Specifications

- 10 Triax (3-lug) feed through connectors (female)
- 4 BNC connectors
- 2 banana connectors
- Ground strap on each side

### Compatibility

- Summit

---

## 162-200 — Vacuum Manifold Kit, High Stability Optics Bridge

### Features

- One set of 5 port vacuum manifolds (10 total output ports) mounted on each side of the high stability microscope bridge
- Easy push on hose connection
- Easy push/pull, on and off flow toggle



### Specifications

- 5 ports per manifold
- 2 manifolds
- Outputs supports 3 mm (1/8 in) vacuum hose

### Compatibility

- Summit, S300

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## RAC-92 — Pin Jack to Banana Interface Panel, High Stability Optical Bridge

### Features

- Includes two brackets, with six each Pin Jack to Banana connection interfaces
- Mounts at rear of station onto the high stability bridge mount



### Compatibility

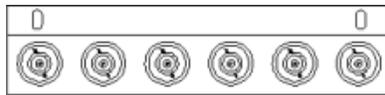
- Summit, S300

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## RAC-96 — Pin Jack to Coax Interface Panel, High Stability Optical

### Features

- Includes two brackets, with six each pin jack to coax interface connections
- Mounts at rear of station onto the high stability bridge mount



### Compatibility

- Summit, S300

# Mounting Kits and Miscellaneous Accessories

## 105-588 — Thermal Flow Meter Kit

### Features

- Provide dry air/nitrogen flow control to Summit MicroChamber
- Allow for optimization of the air flow to achieve stable measurement conditions at various set temperatures



### Specifications

- Input/output ports are 13 mm (0.5 in) OD quick connect style
- Scale resolution is 14 l/min (0.5 SCFM)

### Compatibility

- Summit

## 106-889 — Dust Cover for Summit Systems

### Features

- Semi-transparent vinyl dust cover for Summit 11000/12000 system
- Provides protection for periods when the system is not in use

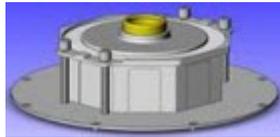
### Compatibility

- Summit

## 116-441 — Enhanced RF Shielded MicroChamber TopHat Kit

### Features

- Provides for an additional 20db of RF shielding
- Upgrades older Summit systems to the current style and size of TopHat
- Enables compatibility with newer accessories and system options
- Provides for compatibility with Current Wave Guide and Unity-MW probes



### Compatibility

- Summit, S300

## 116-511 — MicroChamber Large TopHat Upgrade Kit

### Features

- Upgrades older Summit systems to the current style and size of TopHat
- Enables compatibility with newer accessories and system options
- Provides for compatibility with Current Wave Guide and Unity-MW probes



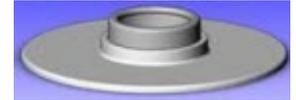
### Compatibility

- Summit

## 116-512 — MicroChamber Large TopHat Objective Ring/ Cover

### Features

- Provides for objective light/ environmental seal when used with Summit TopHat
- Collapsible seal prevent damage to microscope or objective



### Compatibility

- Summit

## 133-492 — High Stability Bridge Mounting Bracket for Keysight E5288A Atto Sense Unit

### Features

- Mounts Keysight B1500 Atto sense unit in a thermally isolated position close to the probing environment
- Keeps cables lengths short for optimal performance
- Triax feed through direct connection paths support single triax cables and Keysight dual triax SMU cable assemblies. For Keysight Quadrx SMU connections, please contact the factory.



### Specifications

- Mount for two Keysight B1500 Atto Sense units
- 4 Triax (3-lug) feed through connectors (female)

### Compatibility

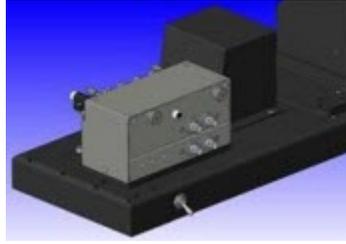
- Summit, S300

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## 135-038 — Mounting plate for B1500A SCUU (SMU-CMU Unit), High Stability Bridge Config

### Features

- Mounts Keysight B1500 SCUU (SMU-CMU unify unit) in a thermally isolated position close to the probing environment
- Keeps cables lengths short for optimal performance
- For use on Summit 11000/12000 and S300 systems with high stability optics bridge



### Kit Contents

- Mounting bracket
- Mounting hardware

### Compatibility

- Summit, S300

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## 165-210 — Xandex Inker, 12V, with Ink Cartridges and DPP2XX Positioner Mount

### Features

- Inker kit for DPP2XX positioner
- Enables marking/binning of selected dies
- Controlled by FormFactor's probe station control software or external software
- Solenoid controlled inker

### Specifications

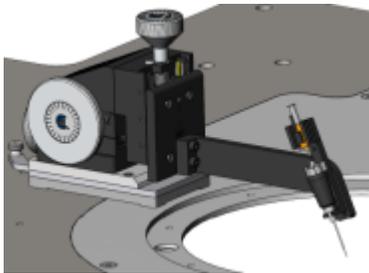
- 12 volt Xandex inker system

### Kit Contents

- Cartridge, Xandex die mark ink, 32 mm (1.25 in) needle
- Cartridge, Xandex die mark ink, S-bend needle

### Compatibility

- Summit, S300



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## 174-889 — Summit Platen Adapter

### Features

- Adapter plate enables the use of E300/CM300 positioners (e.g., RPP404-EW-120, RPP404-W-120, RPP304-NS-67)



### Compatibility

- Summit

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## 177-561— Top Hat Assembly, 4 Port, Summit

### Features

- Enables the use of single or dual Keysight N5291 modules with Infinity and ACP probes on Summit stations with MicroChamber
- Enables full thermal capability



### Configuration

- Intended for use with positioner assemblies RPP404-EW-120, RPP404-W-120, RPP304-NS-67

### Compatibility

- Summit

# Microscope Mounting Plates

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## 122-246 — Microscope Mounting Kit, Manual Transport, Large Area

### Features

- Dovetail mounting block for Seiwa VMSS-888 family and Mitutoyo VMSS-70
- Select when ordering a manual large area microscope transport system

### Compatibility

- Summit, S300, Alessi, MTS



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## 162-150 — Microscope Mounting Kit, eVue/A-Zoom2/Seiwa/Mitutoyo/Manual Transport, HS

### Features

- Dovetail mounting block for eVue, A-Zoom2, Seiwa and Mitutoyo
- Select when ordering a manual, high stability microscope transport system

### Compatibility

- Summit, S300



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## 122-248 — Microscope Mounting Kit, eVue/A-Zoom2, Manual Transport, Large Area

### Features

- Dovetail mounting block for eVue and A-Zoom2
- Select when ordering a manual, large area microscope transport system

### Compatibility

- Summit, S300



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## 158-064 — Microscope Mounting Kit, Leica, Manual Transport

### Features

- Dovetail mounting block for Leica S6 and S8
- Adapts standard dovetail to bonder pin common to stereo zoom microscopes
- Universal design for Summit 11000B, 12000B, S300 and legacy probe stations

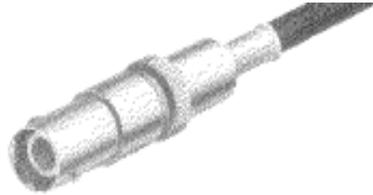
### Compatibility

- Summit, S300, Alessi, MTS



# Tesla

## Keysight Configuration



SHV (jack)



SHV (plug)

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## KEYSIGHT ACCESSORIES

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### 148-651 — HV Adapter Box, 2 SHV (Jack) to 2 BNC (Jack)

#### Features

- Provides connection between Keysight B1505A module selector and HVP-5C probes (and older HVP-3C models)
- Adapts SHV to BNC connection
- Magnetic base mounts on platen



#### Specifications

- Maximum voltage: 500V DC
- Maximum current (DC): 3A
- Maximum current (Pulse): 40A, ( $PW \leq 1ms$ , Duty ratio  $\leq 1\%$ )
- Connector type: 2 SHV (jack), 2 BNC (jack)

#### Compatibility

- Tesla

---

### 148-657 — BNC Tee, 1 BNC (Plug) to 2 BNC (Jack)

#### Features

- Provides the connection between Keysight B1505A HCSMU adapter and HCP-BNC or DCP-HTR probes
- Adapts single BNC connection to dual



#### Specifications

- Maximum voltage: 500V DC
- Maximum current (DC): 5A
- Maximum current (Pulse): 40A, ( $PW \leq 1ms$ , Duty ratio  $\leq 1\%$ )
- Connector type: 1 BNC (plug), 2 BNC (jack)

#### Compatibility

- Tesla

---

### 148-658 — Keysight HV Triax Cable, (Plug - Plug)

#### Features

- Provides triax HV connection between Keysight B1505A and Tesla probe station



#### Specifications

- Maximum voltage (triax connection): 3000V DC
- Connector type: Keysight HV triax (plug-plug)
- Cable length: 1.5 m (5 ft)

#### Compatibility

- Tesla

---

### 148-659 — BNC Cable, 61 cm, (Plug - Plug)

#### Features

- Provides the connection between Keysight B1505A HCSMU accessories and HCP-BNC probes



#### Specifications

- Maximum voltage: 500V DC
- Maximum current (DC): 5A
- Maximum current (Pulse): 40A, ( $PW \leq 1\text{ms}$ , Duty ratio  $\leq 1\%$ )
- Connector type: BNC (plug - plug)
- Cable length: 61 cm (24 in)

#### Compatibility

- Tesla

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### 148-665 — HC BNC Cable, 61 cm (Plug - Plug)

#### Features

- Provides the high current, low-resistance connection between Keysight B1505A HCSMU accessories and HCP-BNC probes



#### Specifications

- Maximum voltage: 500V DC
- Maximum current (DC): 5A
- Maximum current (Pulse): 40A, ( $PW \leq 1\text{ms}$ , Duty ratio  $\leq 1\%$ )
- Connector type: BNC (plug - plug)
- Cable length: 61 cm (24 in)

#### Compatibility

- Tesla

---

### 148-668 — Mini Triax (Plug) to BNC (Plug) Cable, 60 cm

#### Features

- Provides the connection between Keysight B1505A HCSMU adapter and DCP-HTR probes

#### Specifications

- Maximum voltage: 500V DC
- Maximum current (DC): 1A
- Connector type: Mini triax (plug), BNC (plug)
- Cable length: 60 cm (23.5 in)

#### Compatibility

- Tesla

---

### 148-669 — Keysight HV Triax (Plug) – SHV (Plug), 60 cm

#### Features

- Provides the HV triax to coaxial adaptation between Keysight B1505A and Tesla probe station

#### Specifications

- Maximum voltage: 3000V DC
- Connector type: Keysight HV triax (plug), SHV (plug)
- Cable length: 60 cm (23.5 in)
- Guard of Keysight HV triax connects to cable shield

#### Compatibility

- Tesla

---

### 148-670 — HC BNC Cable, 1.5 m (Plug - Plug)

#### Features

- Provides the high current, low-resistance connection between Keysight B1505A HCSMU module selector and HVP-5C probes (and older HVP-3C models) through the SHV to BNC adapter (148-651)

#### Specifications

- Maximum voltage: 500V DC
- Max current (DC): 5A
- Maximum current (Pulse): 40A, ( $PW \leq 1\text{ms}$ , Duty ratio  $\leq 1\%$ )
- Connector type: BNC (plug - plug)
- Cable length: 1.5 m (5 ft)

#### Compatibility

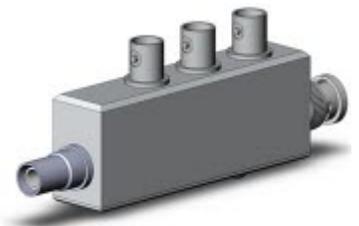
- Tesla

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### 148-724 — SHV to 4-BNC Adapter Box 1 SHV (Jack), 1 BNC (Plug), 3 BNC (Jack)

#### Features

- Provides the interconnections between the Keysight B1505A HCSMU adapter, GNDU protection adapter and HVP-5C probes (and older HVP-3C models)



#### Specifications

- Maximum voltage: 500V DC
- Maximum current (DC): 5A
- Connector type: SHV (jack), BNC (plug), 3 BNC (jack)

#### Compatibility

- Tesla

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### 149-396 — Resistor Box, HV, 100 K $\Omega$ – HV Triax (Jack), SHV (Jack)

#### Features

- 100K $\Omega$  Keysight resistor box
- Provides connection between Keysight B1505A HVSMU and HVP-5C probes (and older HVP-3C models)



#### Specifications

- Resistance: 100K $\Omega$
- Maximum voltage: 3000V DC
- Connector type: Keysight HV triax (jack), SHV (jack)

#### Compatibility

- Tesla

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### 149-397 — Resistor Box, HV, 1 K $\Omega$ – Triax (Jack-Jack)

#### Features

- 1K $\Omega$  Keysight resistor bot
- Provides connection between Keysight B1505A HPSMU protection adapter and DCP-HTR probes



#### Specifications

- Resistance: 1K $\Omega$
- Maximum voltage: 500V DC
- Connector type: Standard triax (plug - plug)

#### Compatibility

- Tesla

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### 149-398 — Resistor Box, HV, 1 KW – HV Triax (Jack), SHV (Jack)

#### Features

- 1K $\Omega$  Keysight resistor bot
- Provides connection between Keysight B1505A HPSMU protection adapter box and HVP-5C probes (and older HVP-3C models)



#### Specifications

- Resistance: 1K $\Omega$
- Maximum voltage: 3000V DC
- Connector type: Keysight HV triax (jack), SHV (jack)

#### Compatibility

- Tesla

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### 149-445 — Test Head Plate Assembly

#### Features

- Adapter plate for mounting instrument accessories on the Tesla station bridge



#### Specifications

- Dimensions (WxDxH): 21.59 x 21.28 x 2.54 cm (8.5 x 8.38 x 1.0 in)

#### Compatibility

- Tesla

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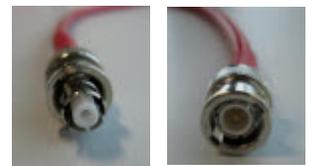
### 149-947 — SHV (Plug) to BNC (Plug) Cable, 60 cm

#### Features

- Provides SHV to BNC connection

#### Specifications

- Maximum voltage: 500V DC
- Maximum current (DC): 5A
- Maximum current (Pulse): 40A, (PW $\leq$ 1ms, Duty ratio  $\leq$ 1%)
- Connector type: BNC (plug), SHV (plug)
- Cable length: 60 cm (23.5 in)



#### Compatibility

- Tesla

---

## 149-958 — Keysight HV Triax (Plug) to Std Triax Cable (Plug), 1.5 m

### Features

- Provides the HV triax to standard triax connection for Keysight B1505A

### Specifications

- Maximum voltage: 500V DC
- Connector type: Keysight HV triax (plug), standard (plug)
- Cable length: 1.5 m (5 ft)

### Compatibility

- Tesla

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## 149-976 — High Voltage Chuck Floating Plug

### Product Features

- Provides the floating chuck connection for the Tesla high-power chuck
- Safety interlock connection



### Specifications

- Dual triax connection
- Maximum voltage: 10,000V

### Station Compatibility

- Tesla

### Ordering Information

- Chuck Guard terminal connects to Chuck Shield terminal.

---

## 149-977 — High Voltage Chuck Shorting Plug

### Product Features

- Provides the shorting chuck connection for the Tesla high-power chuck
- Safety interlock connection



### Specifications

- Dual triax connection
- Maximum current (DC): 10A
- Maximum current (Pulse): 100A, (PW<=1ms, Duty ratio <=1%)

### Station Compatibility

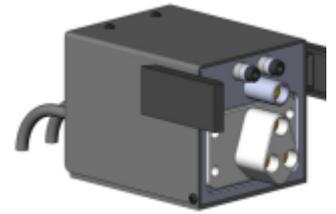
- Tesla

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## 149-978 — Chuck Cable, HV Chuck to Agilent HV (Plug), 1.5 m

### Product Features

- Provides dual triax connection between the high voltage Tesla chuck and Agilent B1505A HVSMU
- Low-leakage
- Low resistance, high voltage, high-current cable



### Specifications

- Maximum voltage: 3000V DC
- Connector type: Cascade Microtech HV chuck, Agilent high voltage (plug)
- Cable length: 1.5 m (4.92 ft)

### Station Compatibility

- Tesla

---

## 149-981 — Chuck Cable, HV Chuck to SHV (Jack), 1.5 m

### Product Features

- Provides force and sense connection between the high voltage Tesla chuck and Agilent B1505A
- Low resistance, high voltage, high-current cable

### Specifications

- Maximum voltage: 5000V DC
- Connector type: Cascade Microtech HV chuck, SHV (jack)
- Cable length: 1.5 m (4.92 ft)

### Station Compatibility

- Tesla

---

## 151-196 — SHV (Jack) to SHV (Jack) Adapter

### Features

- Adapts SHV to SHV connection

### Specifications

- Maximum voltage: 5000V
- Connector type: SHV (jack) to SHV (jack)



### Compatibility

- Tesla

---

## 151-207 — SHV (Plug) to SHV (Plug) Cable, 60 cm

### Features

- Provides the high voltage SHV to SHV coaxial connection for Keysight B1505A and Tesla probe station

### Specifications

- Maximum voltage: 5000V DC
- Connector type: SHV (plug)
- Cable length: ~0.75m (30 in)

### Compatibility

- Tesla

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## 151-256 — Chuck Cable, HV Chuck Connector to BNC (Plug), 1.5 m

### Product Features

- Provides force and sense connection between the high voltage Tesla chuck and Agilent B1505A
- Low resistance, high voltage, high-current cable

### Specifications

- Maximum voltage: 500V DC
- Maximum current (DC): 5A
- Maximum current (Pulse): 40A, (PW<=1ms, Duty ratio <=1%)
- Connector type: Cascade Microtech HV chuck, BNC (plug)
- Cable length: 1.5 m (4.92 ft)

### Station Compatibility

- Tesla

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## 151-280 — HV Bulkhead Interconnect Panel

### Features

- Two Keysight HV triax connectors
- Two BNC connectors
- Two SHV connectors
- Two standard triax connectors
- Includes grounding strap

### Specifications

- Max Voltage:
  - Keysight HV triax: 3000V
  - BNC: 500V
  - SHV: 5000V
  - Standard triax: 500V
- Connector type:
  - Keysight HV triax (jack)
  - BNC (jack)
  - SHV (jack)
  - Standard triax (jack)

### Compatibility

- Tesla



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## 151-466 — Tesla Bridge Mounting Kit for Keysight B1505A

### Features

- Tesla high-power bridge mounting kit for use with Keysight B1505A
- The kit includes necessary brackets, test head plates, interlock cables and hardware to mount the B1505A accessories configured with 1 HVSMU, 1 HCSMU, 2 HPSMUs and 1 MFCMU for typical measurement setup

### Compatibility

- Tesla

## 151-465 — Tesla Probes and Interconnect Accessory Kit for Keysight B1505A

### Features

- Tesla high-power probing kit for use with Keysight B1505A
- The kit includes the HVP and HCP probes, positioners, necessary brackets, cables and adapters to connect B1505A configured with 1 HVSMU, 1 HCSCMU, 2 HPSCMUs and 1 MFCMU for typical measurement setup

### Kit Contents

HVP-5C-E — HV, Coaxial Probe with SHV Connection	3
HVP-3T — HV, Triax Probe with Keysight HV Triax Connection	2
HCP-BNC-3-350 — HC Probe Holder with BNC Connection, 3-Finger, 350 µm (13.8 mils) Tip	2
DPP210-M positioner	5
RPP305 positioners	2
Interlock cable	1
Test head mounting brackets, small	4
Test head mounting brackets, large	1
Test head mounting plates	2
Keysight HV triax bulkhead assembly	2
Triax to BNC adapter	1
<a href="#">148-651 — HV Adapter Box, 2 SHV (Jack) to 2 BNC (Jack)</a>	1
<a href="#">148-657 — BNC Tee, 1 BNC (Plug) to 2 BNC (Jack)</a>	4
<a href="#">148-724 — SHV to 4-BNC Adapter Box 1 SHV (Jack), 1 BNC (Plug), 3 BNC (Jack)</a>	2
<a href="#">148-658 — Keysight HV Triax Cable, (Plug - Plug)</a>	3
<a href="#">148-659 — BNC Cable, 61 cm, (Plug - Plug)</a>	2
<a href="#">148-665 — HC BNC Cable, 61 cm (Plug - Plug)</a>	2
<a href="#">148-668 — Mini Triax (Plug) to BNC (Plug) Cable, 60 cm</a>	2
<a href="#">148-669 — Keysight HV Triax (Plug) – SHV (Plug), 60 cm</a>	1
<a href="#">148-670 — HC BNC Cable, 1.5 m (Plug - Plug)</a>	2
<a href="#">149-947 — SHV (Plug) to BNC (Plug) Cable, 60 cm</a>	2
<a href="#">149-958 — Keysight HV Triax (Plug) to Std Triax Cable (Plug), 1.5 m</a>	2
<a href="#">151-207 — SHV (Plug) to SHV (Plug) Cable, 60 cm</a>	2
<a href="#">149-976 — High Voltage Chuck Floating Plug</a>	1
<a href="#">149-977 — High Voltage Chuck Shorting Plug</a>	1
<a href="#">149-977 — High Voltage Chuck Shorting Plug</a>	1
<a href="#">149-981 — Chuck Cable, HV Chuck to SHV (Jack), 1.5 m</a>	1
<a href="#">151-256 — Chuck Cable, HV Chuck Connector to BNC (Plug), 1.5 m</a>	1

### Compatibility

- Tesla

### Ordering Information

- When ordering as standalone, a 149-401 cable kit is required

## 151-467 — Tesla Interconnect Kit for Keysight B1505A (Excluding Probes and Positioners)

### Features

- Tesla high-power probeless kit for use with Keysight B1505A
- The kit includes necessary brackets, cables and adapters to connect B1505A configured with 1 HVSMU, 1 HCSCMU, 2 HPSCMUs and 1 MFCMU for typical measurement setup

### Kit Contents

Interlock cable	1
Test head mounting brackets, small	4
Test head mounting brackets, large	1
Test head mounting plates	2
Keysight HV triax bulkhead assembly	2
Triax to BNC adapter	1
<a href="#">148-651 — HV Adapter Box, 2 SHV (Jack) to 2 BNC (Jack)</a>	1
<a href="#">148-657 — BNC Tee, 1 BNC (Plug) to 2 BNC (Jack)</a>	4
<a href="#">148-724 — SHV to 4-BNC Adapter Box 1 SHV (Jack), 1 BNC (Plug), 3 BNC (Jack)</a>	2
<a href="#">148-658 — Keysight HV Triax Cable, (Plug - Plug)</a>	3
<a href="#">148-659 — BNC Cable, 61 cm, (Plug - Plug)</a>	2
<a href="#">148-665 — HC BNC Cable, 61 cm (Plug - Plug)</a>	2
<a href="#">148-668 — Mini Triax (Plug) to BNC (Plug) Cable, 60 cm</a>	2
<a href="#">148-669 — Keysight HV Triax (Plug) – SHV (Plug), 60 cm</a>	1
<a href="#">148-670 — HC BNC Cable, 1.5 m (Plug - Plug)</a>	2
<a href="#">149-947 — SHV (Plug) to BNC (Plug) Cable, 60 cm</a>	2
<a href="#">149-958 — Keysight HV Triax (Plug) to Std Triax Cable (Plug), 1.5 m</a>	2
<a href="#">151-207 — SHV (Plug) to SHV (Plug) Cable, 60 cm</a>	2
<a href="#">149-976 — High Voltage Chuck Floating Plug</a>	1
<a href="#">149-977 — High Voltage Chuck Shorting Plug</a>	1
<a href="#">149-977 — High Voltage Chuck Shorting Plug</a>	1
<a href="#">149-981 — Chuck Cable, HV Chuck to SHV (Jack), 1.5 m</a>	1
<a href="#">151-256 — Chuck Cable, HV Chuck Connector to BNC (Plug), 1.5 m</a>	1

### Compatibility

- Tesla

### Ordering Information

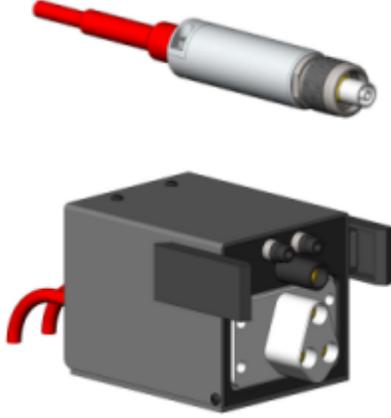
- When ordering as standalone, a 149-401 cable kit is required

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## 153-180 — Chuck Cable, HV Chuck to Keysight HV (Plug) for 40A High Current Test, 1.5m

### Features

- Provides dual triax connection between the HV Tesla chuck and Keysight B1505A HVSMU
- Low-leakage
- Very low resistance, HV, HC cable for dual HCSMU 40A configuration



### Specifications

- Maximum voltage: 3000V
- Maximum current (DC): 3A
- Maximum current (Pulse): 40A, (PW  $\leq$  1ms, Duty ratio  $\leq$  1%)
- Connector type: FormFactor HV chuck, Keysight HV (plug)
- Cable length: 1.5 m (5 ft)

### Compatibility

- Tesla

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## 153-190 — BNC to Keysight HV Triax Adapter

### Features

- Provides connection between Keysight B1505A dual HCSMU 40A solution and HCP-BNC probe



### Specifications

- Maximum voltage: 500V DC
- Maximum current (DC): 3A
- Maximum current (Pulse): 40A (PW  $\leq$  1ms, Duty ratio  $\leq$  1%)
- Connector type: Keysight HV triax (plug), BNC (jack)

### Compatibility

- Tesla

# Keithley Configuration

## KEITHLEY ACCESSORIES

### 144-527 — HV Triax Connector Cable, Interface Panel to Keithley 237/238

#### Features

- Provides connection between HV triax interface panel and:
  - High Voltage SMUs (Keithley)
  - Standard triax connectors



#### Specifications

- Maximum voltage: 1100V (triax)
- Maximum current (DC): 5A
- Cable length: 1m (3.3 ft)
- Cable characteristics:
  - Withstand voltage: 1,100V (F-G), (G-S)
  - Isolation resistance: 1TΩ @ 1,100V (F-G), 100GΩ @ 1,100V (G-S)
- Terminating connector types:
  - Amphenol triax threaded, 11/16-24 (plug)
  - Standard triax (plug) (HV version)

#### Compatibility

- Tesla

### 151-468 — Tesla Probes and Interconnect Kit for Keithley instruments

#### Features

- Tesla high-power probing kit for use with Keithley instruments
- The kit includes the HVP and HCP probes, positioners, necessary brackets, cables and adapters to connect the Keithley instruments for typical measurement setup

#### Kit Contents

RPP305 Positioners	2
DPP210-M Positioners	3
HCP-1-B — HC Probe Holder with Banana Jack Connections (no HCP tip)	2
<a href="#">HCP-TIP-3-350 — HC Replaceable Probe Tips, 5-pack</a>	1
HVP-13 — HV Triax Probe with CMI HV Triax Connection	3
PTT Needle, 12u	1 box

<a href="#">151-472 — Safety interlock Cable, 3 m</a>	1
<a href="#">162-085 — HV Triax Connector Cable, Interface Panel to HV Coax</a>	1
<a href="#">144-527 — HV Triax Connector Cable, Interface Panel to Keithley 237/238</a>	3
<a href="#">149-976 — High Voltage Chuck Floating Plug</a>	1
<a href="#">149-977 — High Voltage Chuck Shorting Plug</a>	1
<a href="#">High Power Chuck Connection Cables</a>	1
<a href="#">149-980 — Tesla Chuck Cable, HV Chuck to Banana Plug Connector, 1.5 m</a>	1
<a href="#">151-256 — Chuck Cable, HV Chuck Connector to BNC (Plug), 1.5 m</a>	1

#### Compatibility

- Tesla, TESLA200

### 151-469 — Tesla Interconnect Kit for Keithley Instruments (Excluding Probes and Positioners)

#### Features

- Tesla high-power probeless kit for use with Keithley instruments
- The kit includes brackets, cables and adapters to connect Keithley instruments for typical measurement setup

#### Kit Contents

<a href="#">151-472 — Safety interlock Cable, 3 m</a>	1
<a href="#">162-085 — HV Triax Connector Cable, Interface Panel to HV Coax</a>	1
<a href="#">144-527 — HV Triax Connector Cable, Interface Panel to Keithley 237/238</a>	3
<a href="#">149-976 — High Voltage Chuck Floating Plug</a>	1
<a href="#">149-977 — High Voltage Chuck Shorting Plug</a>	1
<a href="#">High Power Chuck Connection Cables</a>	1
<a href="#">149-980 — Tesla Chuck Cable, HV Chuck to Banana Plug Connector, 1.5 m</a>	1
<a href="#">151-256 — Chuck Cable, HV Chuck Connector to BNC (Plug), 1.5 m</a>	1

#### Compatibility

- Tesla

## 151-470 — HV Triax Interface Panel

### Features

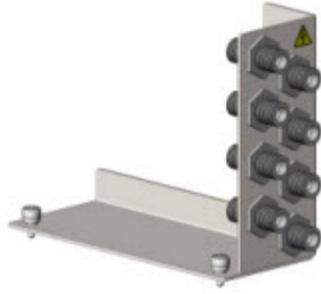
- Eight HV triax connections:
  - Four force
  - Four sense
- Includes grounding strap

### Specifications

- Max Voltage: 3000V (coax)/ 1500V (triax)
- Connector type: Amphenol triax threaded 11/16-24 (jack)

### Compatibility

- Tesla



## 162-085 — HV Triax Connector Cable, Interface Panel to HV Coax

### Features

- Provides connection between HV triax interface panel and coaxial instruments

### Specifications

- Maximum voltage: 3,000V (coax guard-shield connected), 1500V (triax)
- Maximum current (DC): 5A
- Cable length: 3m (9.8 ft)
- Cable characteristics
  - Impedance F-S: 40Ω
  - Withstand voltage F-S: 3,000V
  - Insulation resistance F-S: > 1T ohm @3000V
- Terminating connector types
  - Amphenol triax threaded, 11/16-24 (plug)
  - SHV coaxial (plug)
- Guard of HV triax connects cable shield



## 151-471 — HC Banana & STD Triax Interface Panel

### Features

- Four pairs standard red and black banana jacks
  - Four force
  - Four ground
- Includes grounding strap

### Specifications

- Maximum current (Pulse): 100A, (PW≤1ms, Duty ratio ≤1%)
- Max Voltage: 500V
- Connector type: Banana jack

### Compatibility

- Tesla



### Compatibility

- Tesla

## 151-472 — Safety Interlock Cable, 3 m

### Features

- Provides the interlock connection between the test instrument and the Tesla station safety light curtain

### Specifications

- Cable length: 3 m (9.8 ft)

### Compatibility

- Tesla



# Common Probes

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## 149-976 — High Voltage Chuck Floating Plug

### Product Features

- Provides the floating chuck connection for the Tesla high-power chuck
- Safety interlock connection



### Specifications

- Dual triax connection
- Maximum voltage: 10,000V

### Station Compatibility

- Tesla

### Ordering Information

- Chuck Guard terminal connects to Chuck Shield terminal.

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## 149-977 — High Voltage Chuck Shorting Plug

### Product Features

- Provides the shorting chuck connection for the Tesla high-power chuck
- Safety interlock connection



### Specifications

- Dual triax connection
- Maximum current (DC): 10A
- Maximum current (Pulse): 100A, (PW<=1ms, Duty ratio <=1%)

### Station Compatibility

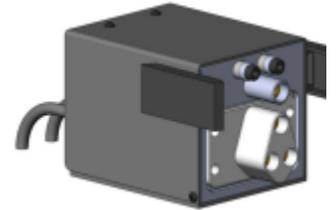
- Tesla

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## 149-978 — Chuck Cable, HV Chuck to Agilent HV (Plug), 1.5 m

### Product Features

- Provides dual triax connection between the high voltage Tesla chuck and Agilent B1505A HVSMU
- Low-leakage
- Low resistance, high voltage, high-current cable



### Specifications

- Maximum voltage: 3000V DC
- Connector type: Cascade Microtech HV chuck, Agilent high voltage (plug)
- Cable length: 1.5 m (4.92 ft)

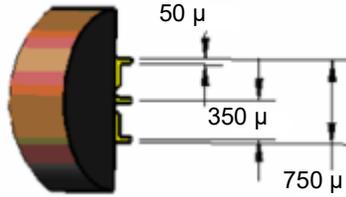
### Station Compatibility

- Tesla

## HCP-TIP-3-350 — HC Replaceable Probe Tips, 5-pack

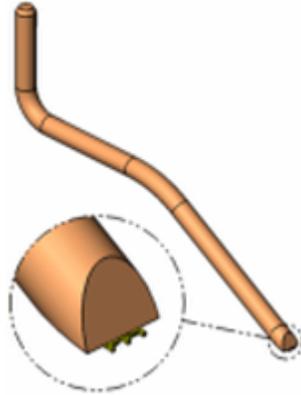
### Features

- Includes five tips for use with the HCP-1-B, high current parametric coax
- Patented tip design provides low contact resistance and superior current dissipation



### Specifications

- Maximum voltage: 500V DC
- Maximum current: 100A  
( $PW \leq 1\text{ms}$ , Duty ratio  $\leq 1\%$ )
- Tip material: Tungsten
- Number of tips: 3
- Tip pitch: 350 μm (13.8 mils)
- Total footprint: 750 μm (29.5 mils)
- Typical contact resistance on Al: 20mΩ
- Recommended range of overtravel: 150 to 200 μm (5.9 to 7.9 mils)
- Contact force: 20 gms per tip (60 grams total) @ 100 μm (3.9 mils) overtravel
- Scrub: 60 to 80 μm (2.4 to 3.1 mils)



### Compatibility

- Tesla, TESLA200

# High Power Chuck Connection Cables

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## 149-979 — HV Tesla Chuck Cable, HV Chuck Connector-Std Triax (Plug), 1.5m

### Features

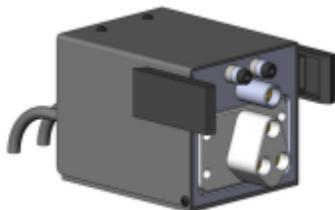
- Provides connection between the HV Tesla chuck and test instruments
- Low resistance, HV, HC cable

### Specifications

- Maximum voltage: 500V DC
- Maximum current: 5A (pulse)
- Connector type: FormFactor HV chuck, standard triax (plug)
- Cable length: 1.5 m (5 ft)

### Compatibility

- Tesla



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## 151-256 — Chuck Cable, HV Chuck Connector to BNC (Plug), 1.5 m

### Product Features

- Provides force and sense connection between the high voltage Tesla chuck and Agilent B1505A
- Low resistance, high voltage, high-current cable

### Specifications

- Maximum voltage: 500V DC
- Maximum current (DC): 5A
- Maximum current (Pulse): 40A, (PW<=1ms, Duty ratio <=1%)
- Connector type: Cascade Microtech HV chuck, BNC (plug)
- Cable length: 1.5 m (4.92 ft)

### Station Compatibility

- Tesla

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## 149-980 — Tesla Chuck Cable, HV Chuck to Banana Plug Connector, 1.5 m

### Features

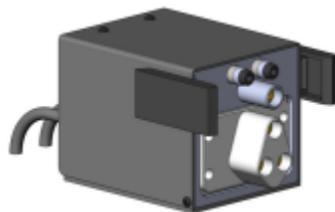
- Provides connection between the HV Tesla chuck and test instruments
- Low resistance, HV, HC cable

### Specifications

- Maximum voltage: 10000V DC
- Maximum current: 100A (pulse)
- Connector type: FormFactor HV chuck connector, banana jack
- Cable length: 1.5 m (5 ft)

### Compatibility

- Tesla



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## 151-257 — HV Tesla Chuck Cable, HV Chuck Connector-CMI HV (Plug), 1.5m

### Features

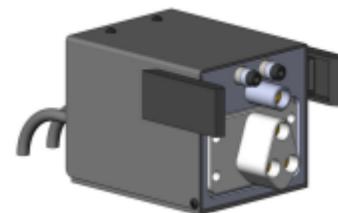
- Provides connection between the HV Tesla chuck and CMI HV Amphenol feed-thru panel
- Low leakage, low-resistance, HV, HC cable

### Specifications

- Maximum voltage: 3000V (coax), 1500V (triax)
- Connector type: FormFactor HV chuck, CMI HV Amphenol (plug)
- Cable length: 1.5 m (5 ft)

### Compatibility

- Tesla



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## 149-981 — Chuck Cable, HV Chuck to SHV (Jack), 1.5 m

### Product Features

- Provides force and sense connection between the high voltage Tesla chuck and Agilent B1505A
- Low resistance, high voltage, high-current cable

### Specifications

- Maximum voltage: 5000V DC
- Connector type: Cascade Microtech HV chuck, SHV (jack)
- Cable length: 1.5 m (4.92 ft)

### Station Compatibility

- Tesla

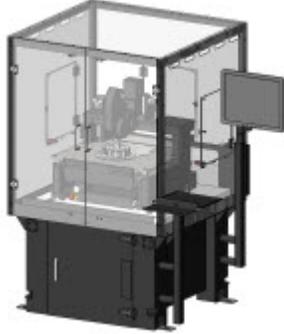
# Safety Enclosures

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## 170-750 — Clear Safety Enclosure Package

### *Features*

- Impact resistant clear acrylic enclosure
- Safety interlock system for high power testing
- Front opening doors for ergonomic test setup/operation
- Side & rear access panels for easy equipment configuration
- Mounting kit for standard Summit-Tesla vibration isolation table



### *Compatibility*

- Tesla (200 mm)

# Auxiliary Chucks

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## 174-213 — AUX chuck Add-on for Tesla HV Coax Chuck

### *Features*

- High-Power AUX chuck, with vacuum holes
- High isolation Eccosorb material (magnetically loaded)
- Enables addition surface for holding cleaning, calibration
- Probe contact substrates
- Remote vacuum control integrated into TESLA probe station
- Up to 2 High-Power AUX chucks can be added to a Tesla coax chuck

### *Compatibility*

- Tesla

### *Ordering Information*

- For field upgrade kits, request P/N from the FormFactor Custom Products Group



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