



# **3D Probe Positioners**

Stepless Adjustable, Hands-free Testing 0 °C to +50 °C









#### **About 3D Probe Positioners**

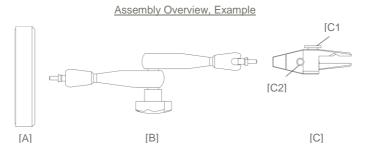
The 3D probes positioners are the third helping hand in any lab for precise and semi-permanent positioning of probes. Various probe holder models are available for different probe shapes allowing to start and stop measurements all the time without losing contact to the test point, e.g. when using PMK probes with spring loaded tips for best signal fidelity. The setup is quick and easy offering greatest flexibility during every day's measurement tasks. The operating and storage temperature range is 0°C to +50°C, at non-condensing humidity. The arms and probe holders from the 3D positioners are compatible to PMK's SKID positioning systems for probes and PCBs, which are also available for temperature ranges from -55°C to +155°C.

### **Getting Started**

Read the Getting Started section before first use. The use of this equipment is for qualified personnel only.

## **Assembly**

Screw the positioner arm [B] to the product specific base [A] with M6 thread, and tighten it with the 7mm wrench from the scope of delivery. The base [A] is available in three different variants: Steel base, vacuum base or table clamp. The positioner arms [B] with M6 thread are available with 130mm and 200mm span width. The probe holder [C] depends on the probe being in use. The drawing below shows the universal probe holder as example.



# **Clamping the Probe**

Different probes holders are designed to fit the different probe form factors.

#### Universal Probe Holder



Release the holder adjustable screw [C1] and clamp the probe into the probe holder [C], as shown in the figure above. To fix the probe, turn the holder adjustable screw [C1] contrary until the probe is fixed.

To increase the pressure on a rigid probe tip, if necessary, trim the Probe-Holder by the means of the spring-mounted set-screw [C2]. When using PMK's spring loaded tips, this setting is not required.

#### PMK Probe Holder



Release the holder adjustable screw [C1] and clamp the probe into the probe holder [C]. To fix the probe into the holder turn the holder adjustable screw [C1] contrary until the probe is fixed.

#### **BumbleBee® Twin Holder**



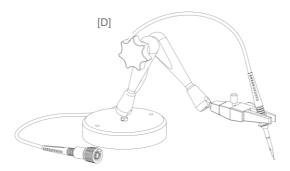
Insert the BumbleBee® high-voltage differential probe's input leads equipped with BumbleBee® probe tip adapters 4mm to 0.8mm (890-880-103) and needle pin tips (890-880-101 / 890-880-102) to the opening of this dual lead holder for hands-free positioning and tight connection of the needle pin inputs to the circuit under test.

# **Handling and Re-Positioning**

The 3D Probe Positioner can be operated easily. Hold the 3D Probe Positioner and loosen the central tensioning knob [D] until the 3D Probe Positioner can be moved.



Do not release the tensioning knob [D] completely, otherwise the 3D Probe Positioner collapses in itself and could damage your measuring setup.



Tensioning knob [D]. Example

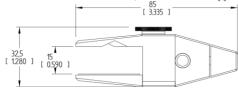
Bring the 3D Probe Positioner into the desired position and fix the device by turning the central tensioning knob [D] contrary. With the spring tip of PMK probes you can precisely set the contact to the measuring point.

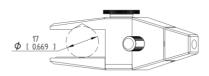
#### **Maintenance and General Notes**

The 3D Probe Positioners are almost maintenance-free. However if the device is exposed to pollution, regular cleaning is necessary. Remove dust and dirt from the joints. For cleaning purposes use standard cleaning agents commercially available. Don't use any lye or acids. Apply a little amount of lubricant to the screws and joints, as needed.

# Dimensional Drawing Universal holder (893-090-000)

The units are shown in mm, and in Inches in [].





# Scope of Delivery

3D Probe Positioning System Wrench 7mm (893-000-SW7)



## **Ordering Information**

For accessories, spare parts and more positioners, visit us at www.pmk.de

Order No.	Item	Picture
893-350-006	Universal 3D Probe Positioner MSU1500 with steel base (893-100-001), arm with span width 200mm (893-200-200), universal probe holder (893-090-000)	
893-350-011	Universal 3D Probe Positioner with magnet foot (893-100-004), arm with span width 200mm (893-200-200), universal probe holder (893-090-000)	
893-350-010	BumbleBee® 3D positioner with steel base, 200 mm span width and Twin Holder, ideal for positioning of a BumbleBee® probe with spring loaded tips	
893-350-001	PMK 3D Probe Positioner "MSA100" with steel base (893-100-001), arm with span width 200mm (893-200-200), PMK probe holder 5-12mm (893-050-000)	
893-350-002	PMK 3D Probe Positioner "MSB40" with table clamp (893-100-002), arm with span width 200mm (893-200-200), PMK probe holder 5-12mm (893-050-000)	₹ <b>/</b>
893-350-003	PMK 3D Probe Positioner "MSC85" with vacuum cup (893-100-003), arm with span width 200mm (893-200-200), PMK probe holder 5-12mm (893-050-000)	<b>3</b> /
893-350-004	PMK 3D Probe Positioner "MSM130" with magnet foot (893-100-004), arm with span width 130mm (893-200-130), PMK probe holder 5-12mm (893-050-000)	<b>**</b>
893-350-005	PMK 3D Probe Positioner "MSM200" with magnet foot (893-100-004), arm with span width 200mm (893-200-200), PMK probe holder 5-12mm (893-050-000)	

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#### Manufacturer

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# **Warranty**

PMK warrants this product for normal use and operation within specifications for a period of one year from date of shipment and will repair or replace any defective product, which was not damaged by negligence, misuse, improper installation, accident or unauthorized repair or modification by the buyer. This warranty is applicable only to defects due to material or workmanship. PMK disclaim any other implied warranties of merchantability or fitness for a particular purpose. PMK will not be liable for any indirect, special, incidental, or consequential damages (including damages for loss of profits, loss of business, loss of use or data, interruption of business and the like), even if PMK has been advised of the possibility of such damages arising from any defect or error in this manual or product.



