



SEMIPROBE®

Test • Inspect • Innovate

SUCCESSFUL APPLICATION: HIGH FREQUENCY - 0117



Specific Requirements:

The customer required a semi-automatic 200 mm probe system that would be used to test a variety of high frequency (HF) devices up to 40 GHz. Wafer material would be either silicon or III-V compound. The system had to provide temperature capabilities that ranged from -60 °C to 200 °C. The devices would get contacted with probe cards, multi-contact wedges, high frequency probes and DC needles. Eight manual manipulators were required – four HF and four DC with appropriate probe arms, probe tips and cables.

SemiProbe Solution:

- PS4L SA-8 semi-automatic probe system:
 - 200 mm programmable X, Y, Z and theta stage with 200 mm load stroke and control electronics
 - 200 mm gold plated thermal chuck with vacuum holes and two (auxiliary chucks) that operate from -60 °C to 200 °C
 - Localized environmental chamber with a top hat for frost-free, dark and EMI shielding
 - PILOT Software Suite – Navigator, Wafer Map and Autoalign
 - Vibration isolation table
- Compound microscope bridge with compound microscope movement (50 mm of X and Y) and 50 mm of pneumatic Z
- Compound optics and CCTV system
- Eight manual manipulators with probe arms: four HF and four DC
- Air compressor and vacuum pump