

Probe Station and B1500A S.O.P. Draft version

by Tom Cherng

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A. Probe adjust

1. Turn on the Vacuum pump LCD monitor by switch on the extension cord.
2. Turn on the microscopy LED light and adjust the LED output brightness.
3. Pull the vacuum chuck out by dragging the chuck stage out.
4. Put your wafer at the chuck center.
5. Turn on the chuck vacuum by up the center tagle switch up.
6. Pull the chuck fully back.
7. The chuck can be adjust in X, Y and theta directions.
8. The X and Y direction can be fine turn by stage micro knob.
9. The theta direction can be rotated by hand when you release the lock screw of the chuck.
10. Use the CCD camera and LCD screen find the Pad position of your sample.
11. Lower the probe tip by adjust the X, Y and Z of the micropositioner.
12. You also can adjust the probe tip by adjust the probe arm pivot.
13. Make sure the tip is attached the pad surface.

B. I – V test

1. Click the EasyExpert icon on B1500 front screen.
2. Under your workspace line inside Target Workspace icon choose diode test and click continue icon. The software begin to load workspace and test setup environment. It needs 45 second for program loading.
3. Choose “Junction IV REV_Fwd” pattern from the Library.
4. Click “select”, the “Device parameters” and “Test parameter”’s window will popup on front of the screen.
5. From “Device parameters” window, you can the device length, width and I_{max} value.
6. From “Test parameters” window, you can adjust VanodeStart, VanodeStop, and VanodeStep by click that icon and use keyboard or popup keyPad to input the numerical value.
7. Start measurement by click the Green triangle icon on the right top corner of the screen.
8. The measured I-V graph and I-V data will displayed on the LCD screen.
9. You can copy I-V graph to the wordpad by click Copy Graph under Edit sub manual. Or I-V data to the wardpad by click Copy List under Edit sub manual.
10. Click Exit from the file manual when you finished your measurement.

C. Turn off the probe station

1. Rise the probe tip.
2. Turn off vacuum of the chuck. Drug out the chuck and take your sample.
3. Pull the chuck back to its original position.
4. Turn off the microscopy LED illuminate light.
5. Turn off the vacuum pump and LCD display power.