SURFSCAN 6200 for small substrates [have to be mounted]

IMPORTANT:

- Do not use it for thick substrates (thickness > 1um)!
- You have to mount the sample on the carrier wafer
- 1. LOG IN using the access code: boss

(if the keyboard is not working use the virtual keyboard on the monitor)

- 2. Double click on the icon SCAN
- 3. Select the option **Recipe** (upper left corner) /Load
- 4. Load one of the Standard recipes:

UCSB GAIN4 0.16-1.6 - for 4 inch wafers, gain4 (0.16-1.6)um

UCSB GAIN2 1.6-28 - for 4 inch wafers, gain2 (1.6-28)um

Do not make any changes in the recipes!

- 5. Press OK, and recipe will be loaded
 - (It will show the name of the recipe at the top of the monitor)
- 6. Select the option Recipe
- 7. Scroll down to option Save as
- 8. Save as give a new name to the recipe (usually your name/company name etc.)
- 9. Select the option Recipe/View/Modify
- 10. **Modify** your recipe (edit wafer diameter, edge exclusion [has to be big enough, so scan can be done on a small circular area, slightly bigger than sample, gain, threshold etc.)
- 11. On the same page select the option **Bin Split** and click on **Default Bin** This would update changes in your recipe.
- 12. Save the changes
- 13. Mounting a small sample on a 4" wafer

(Use a small drop of water, place it in the middle of wafer. Place the sample over the water drop, center it. Make sure sample is mounted, not moving around.)

14. Loading the 4" wafer with mounted substrate on it:

(Load the 4" wafer with mounted substrate into the cassette -use right indexer)

- 15. Make sure 4" wafer with mounted substrate is facing up (Major cut could be facing either way.)
- 16. Place the cassette in the right indexer
- 17. Make sure cassette is sitting properly
- 18. Select on the monitor option **CASS** (Cassette)

(Wait for the tool to read all the wafers in the cassette.)

- 19. If you want to scan ONLY ONE wafer, select the wafer and click on **START** (upper bar)
- 20. Wait for the wafer to be picked up and scanned. Record results of the scan.
- 21. If you want to scan multiple wafers select option AUTO, then START
- 22. When the scan is complete, click on the HOME option, select RECIPE/exit, and LOG OFF
- 23. Log in in the LOG BOOK and write details regarding your scan/or issues

IMPORTANT: PLEASE LOG OFF after using the tool!