CEE Spinner/Hotplate

To be used for coating e-beam exposure samples. This spinner is NOT used for contact or stepper lithography substrates. Special care is needed to maintain submicron resist thickness coatings required for the Nabity e-beam.

Idle condition check:

- The spinner/hotplate should be on and the hotplate should be at 90°C
- There should protective wipers or foil in the bowl to capture any excess material

Programming the Spinner

 Press Reset on the control panel and ensure the display reads "CEE – 100CB Spinner" if it reads "CEE – 100CB Hotplate" press the Opt button. If "CEE – 100CB Spinner" is still not displayed press Reset again.



- To create a new Program press the Prog. key and then choose a number to store the new program under.



- Enter a final RPM value you wish to spin the wafer at then press Enter.



- Next enter a value for the ramp rate and press Enter.



- Finally enter the total spin time and press Enter.



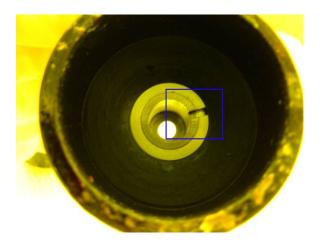
 Multiple spin stages can be programmed by repeating the above steps for each stage.
When the final stage is programmed instead of entering a RPM value for another stage press Clear to enter the END parameter.

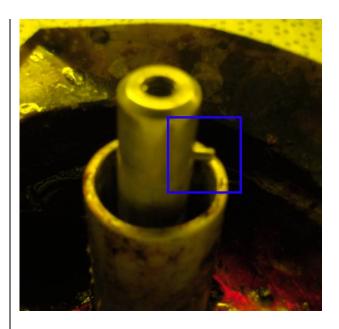
Loading a sample

- Select an appropriate chuck. One that is too large will cause insufficient vacuum errors and one that is too small will not adequately hold the sample.

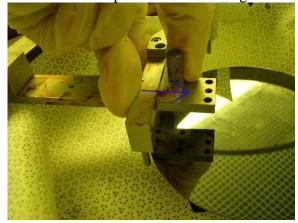
-Line up the notch on the bottom of the chuck to the pin on the spindle, tighten the special screw being extremely careful not to drop it.



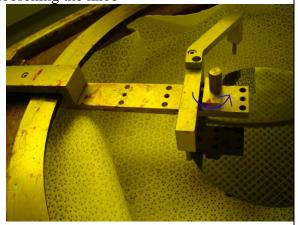




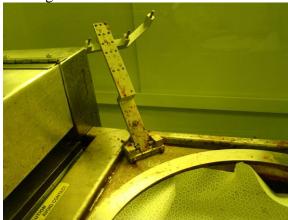
- Lower the centering arm and pull the springloaded centering pins toward the vacuum chuck. Load wafer onto chuck and make sure the edge of the wafer comes into contact with both pins on the centering arm.



 Adjust the pins of the centering arm to accommodate different sized wafers by loosening the knob



- Move the pins to the new desired setting and retighten the knob
- Release the spring-loaded pins and raise the centering arm.



Spinning

- Apply the material to be coated to the wafer.
- Close the lid.



- Press Run followed by the program number of the recipe you wish to run.
- Press Start on the panel to begin the spin.
- After the sample as stopped spinning lift the lid and remove the sample.

Baking

- Programming a bake recipe is very similar to that of a spin but the parameters are temperature, time, and contact method. The hotplate is usually kept at 90° and should not be set any higher.
- To run the bake press the Opt. Button if "CEE CB100 Hotplate" is not displayed press the reset button. Next press Run and the program number you wish to use followed by enter.
- Place your sample on the chuck against the pins and press start.
- Remove the sample when the process is complete

Possible Errors

- Insufficient Vacuum: Check to make sure the vacuum pump is plugged in and running. Also check to see that the vacuum lines are not bent or otherwise obstructed.