

Cold Start-Up and Operation Procedure for **Plasmatherm Shuttlelock SLR-730-PECVD**

First-Check before starting a process

- 1) Switch on the main power to tool.
- 2) Check ventilation
- 3) Ensure all water supplies are turned on, water to chiller and the chiller itself.
- 4) Turn on nitrogen and compressed air
- 5) Turn on compressed air

*steps (2) – (5) explained with more details in the PPT file

Wafer Processing

- 6) Turn on the machine power, mechanical pump power, and lock pump power in PECVD
- 7) Turn on the computer power and launch the program
- 8) Turn on the RF power and Substrate power
- 9) If the chamber is not vented. Go to **Utilities, Vent**. Wait until the chamber is vented and load sample.
- 10) Go to **Utilities-Pump Chamber (Lovac)**. Hold chamber lid down and let the vacuum take hold.
- 11) Go to **Process-Load**. Enter desired recipe to run,
- 12) Go to **Ready**
- 13) Go to **Run**. The process will start by running the loaded process.
- 14) Should an alarm be detected, the nature of the alarm will be displayed in the Info” line near the bottom of the monitor screen (Graphic User Interface – GUI). This alarm needs to be acknowledged by clicking on the “Alarm” button located at the bottom r/hand corner of the GUI, after clicking on the alarm button the alarms sounder will cease and the “**Hold**” button will also be highlighted. The alarm will need to be resolved before this procedure can progress. Once the alarm has been resolved, click the “**Hold**” button and this will clear both the highlighted Alarm and the Hold buttons.
- 15) When finished go to **Pump Chamber (Lovac)**.
- 16) **When finished with a group of samples, run a chamber clean process,**
- 17) Go to **Standby**.
- 18) Shut off Nitrogen Purge.