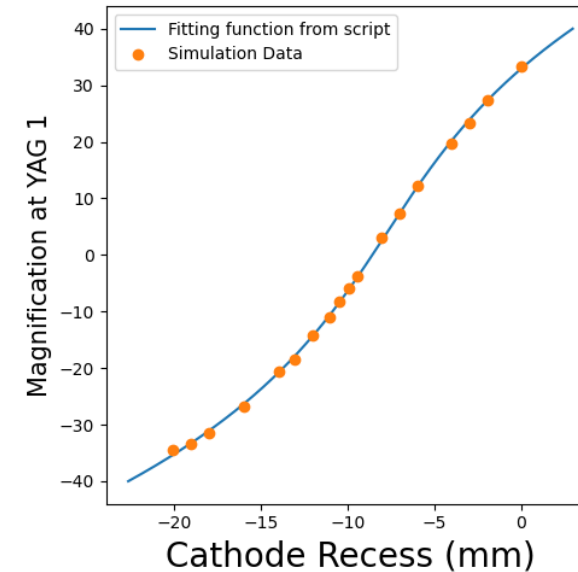
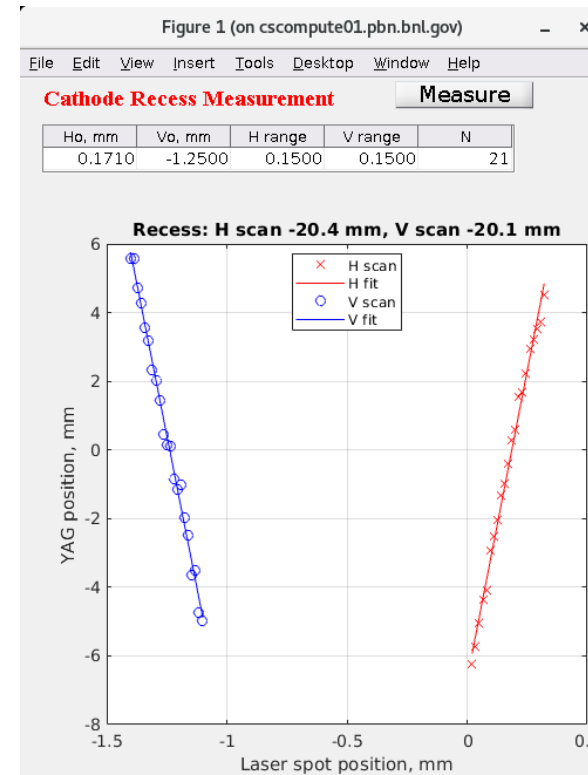
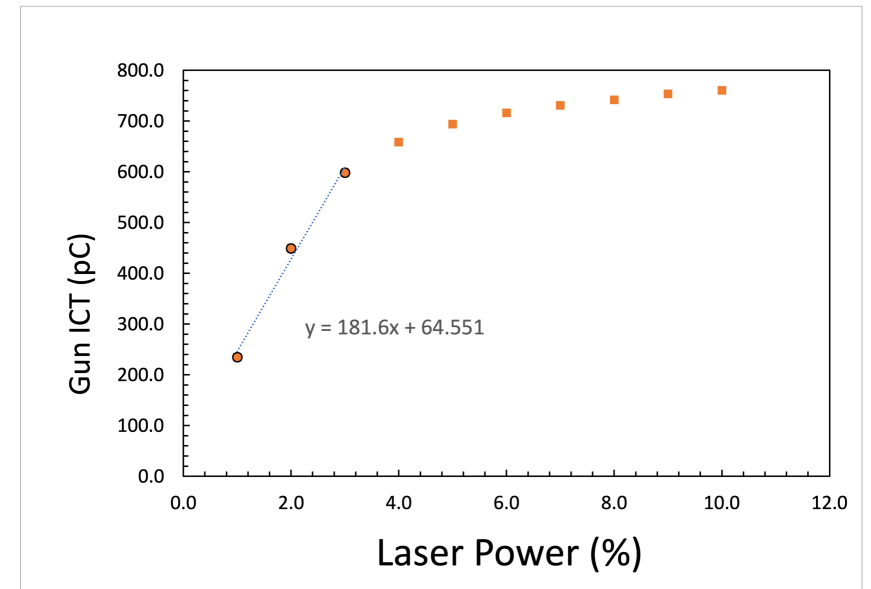


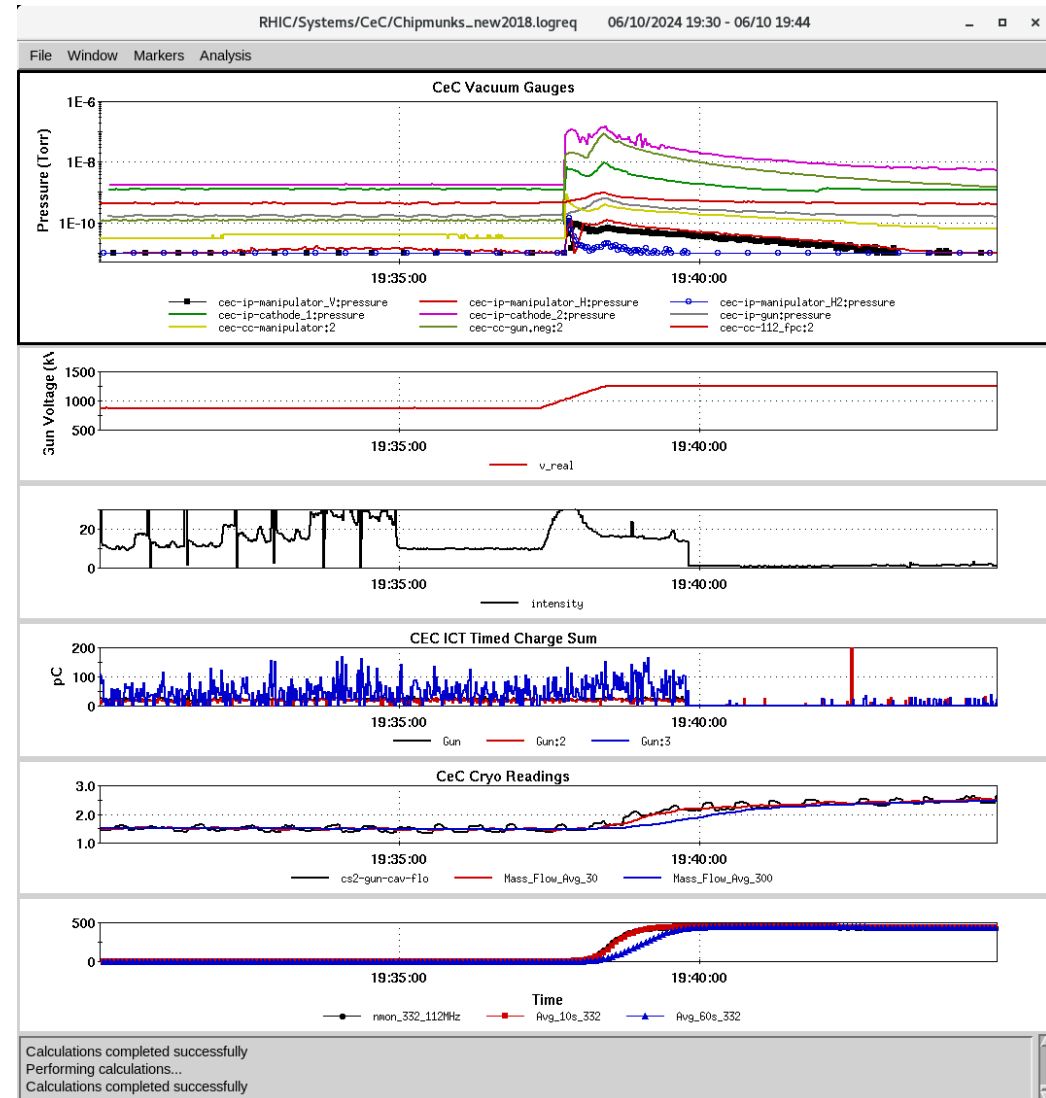
CeC status – 6.11.24

- Multi-alkali cathode has been installed and running with QE ~ 0.4-0.5%
- We experienced low saturation level which leads to low extracted charge from the cathode (cannot reach 1.5 nC – nominal)
- Larger cathode recess (lower surface field) measured presents a possible explanation.

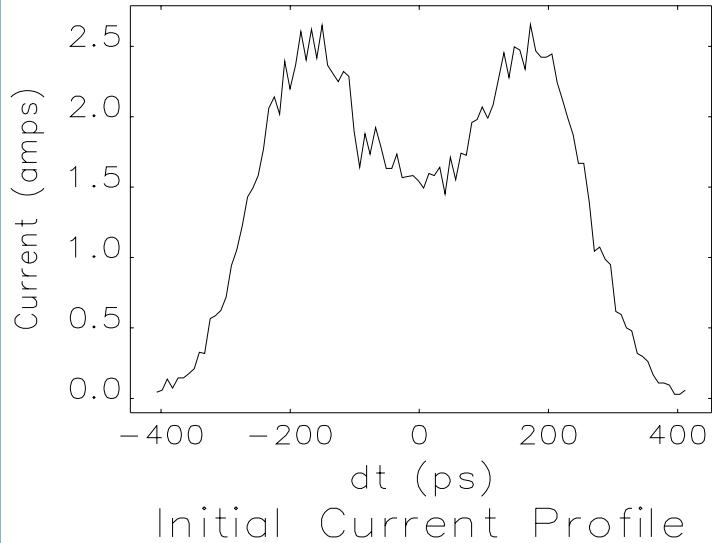


Cathode position adjustment

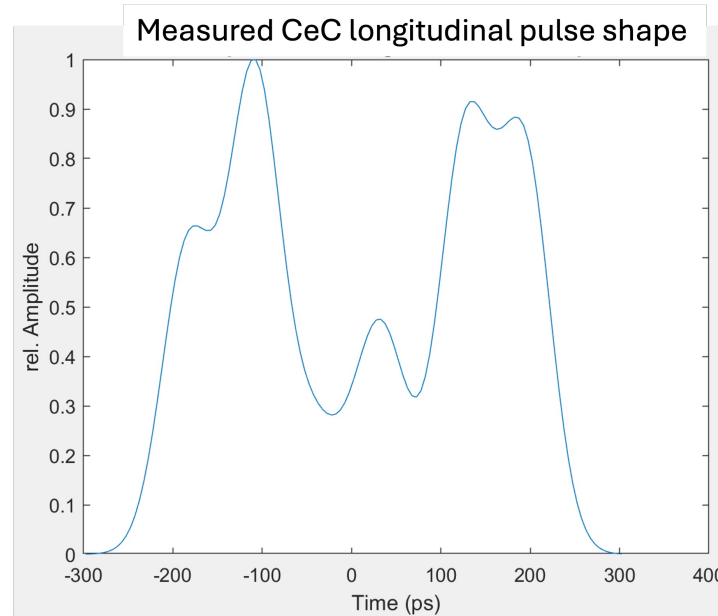
- Cathode position was adjusted during access (6/10). Position changed $\sim +8$ mm (deeper into the gun).
- Large vacuum burst happened, and QE dropped significantly.
- RF calibration changed (1.4 MV readback, 1 MV real) and needs to be modified.
- Plan to replace blank cathode during short access to check gun performance (conditioning).
- Replace remaining cathode during next maintenance.



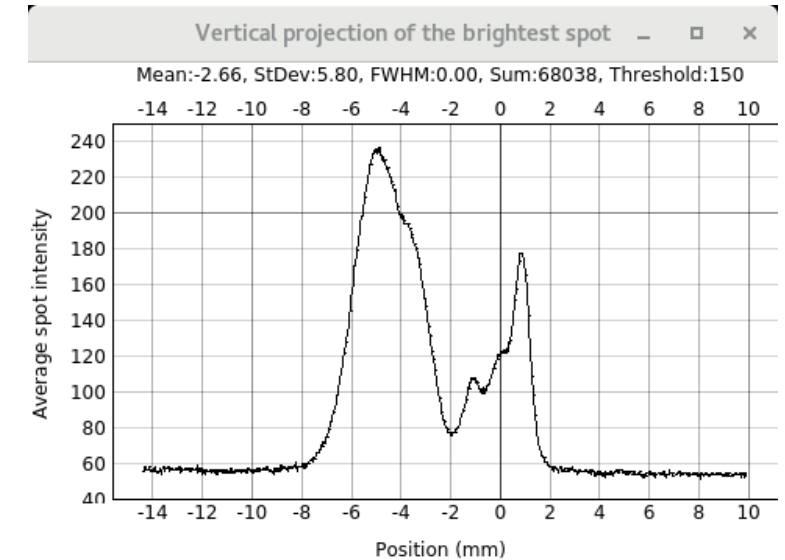
Laser shaping and 500 MHz



Proposed



Gun table



Yag in CeC beamline

- Beamlet intensity is different from design (preliminary - arrival time is correct). Work in better controlling individual beamlet is underway.
- 500 MHz AESRC was done and pre-start action item is being addressed.