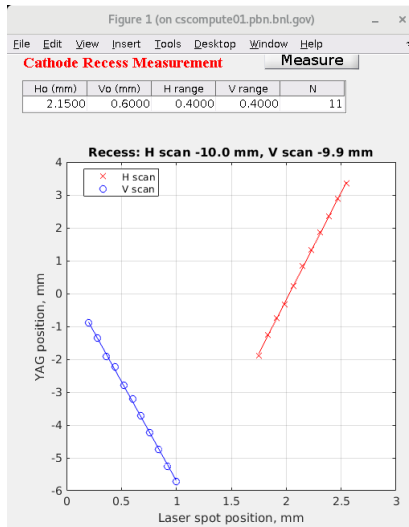


RHIC Time Meeting

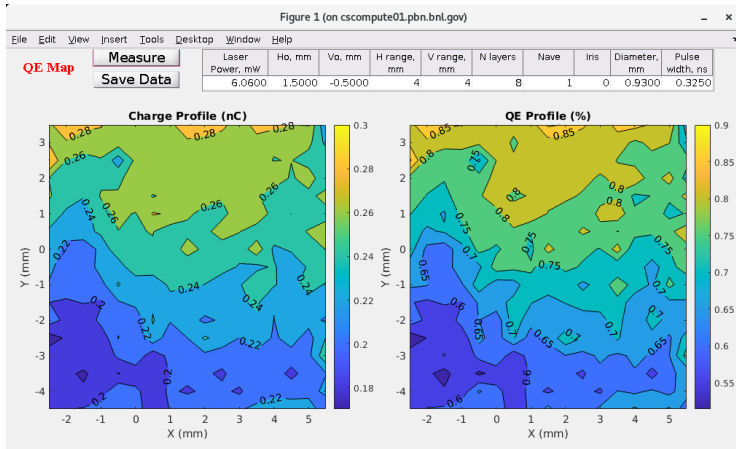
CeC Team

12/30/2025

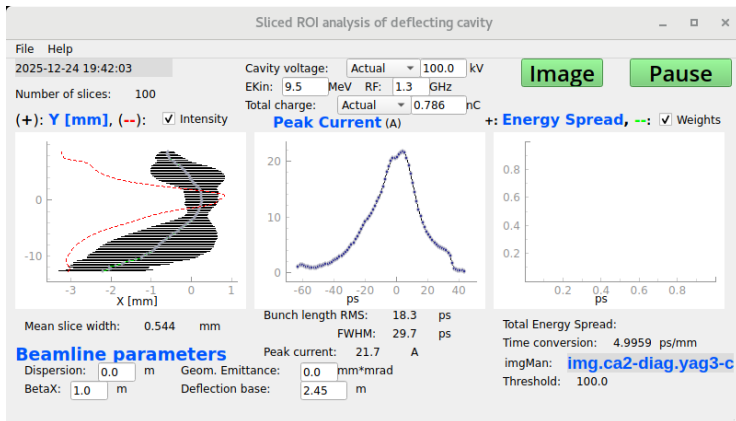
- Restore CeC operation with the new cathode.
 - Cathode recess measured
 - QE at the operation spot is 0.77%
 - QE map measured
- All KPPs are satisfied
 - Peak current 20 - 21 A
 - Slice emittance 1 - 1.5 μm
 - Slice energy spread 1.5e-4
- Operation tool development
 - Adjust orbit local bump
 - Beam charge feedback
 - Orbit feedback



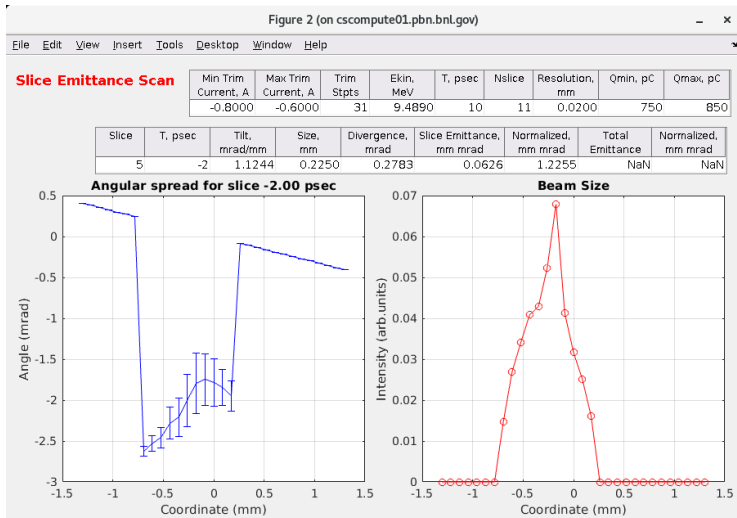
(a) Recess



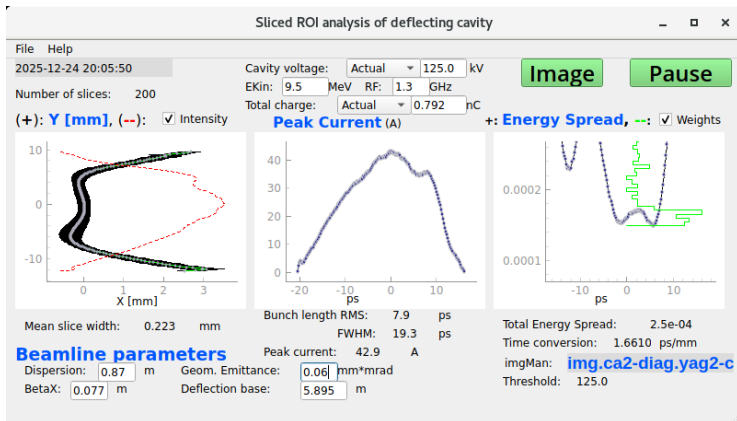
(a) QE map



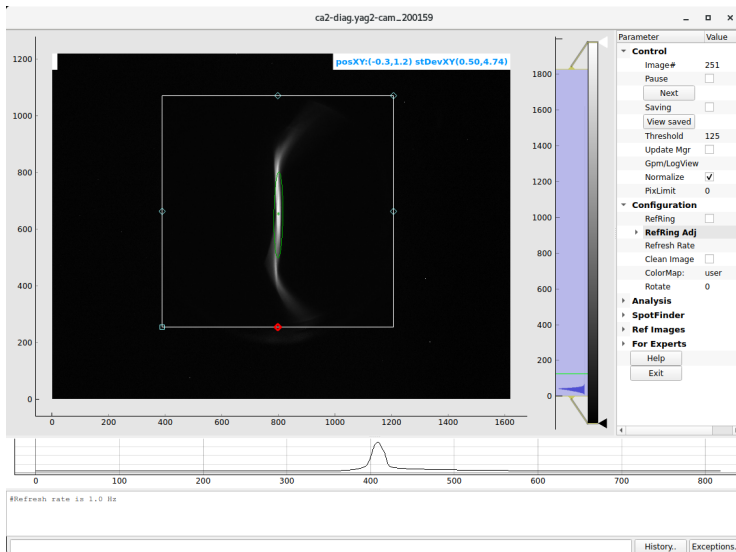
(a) Peak current



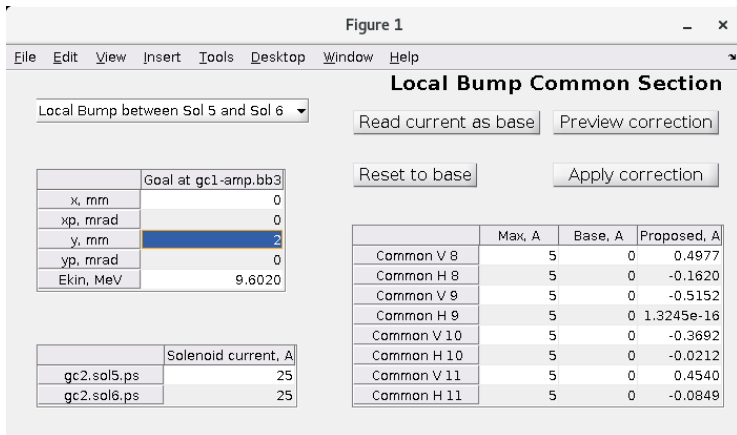
(a) Slice emittance



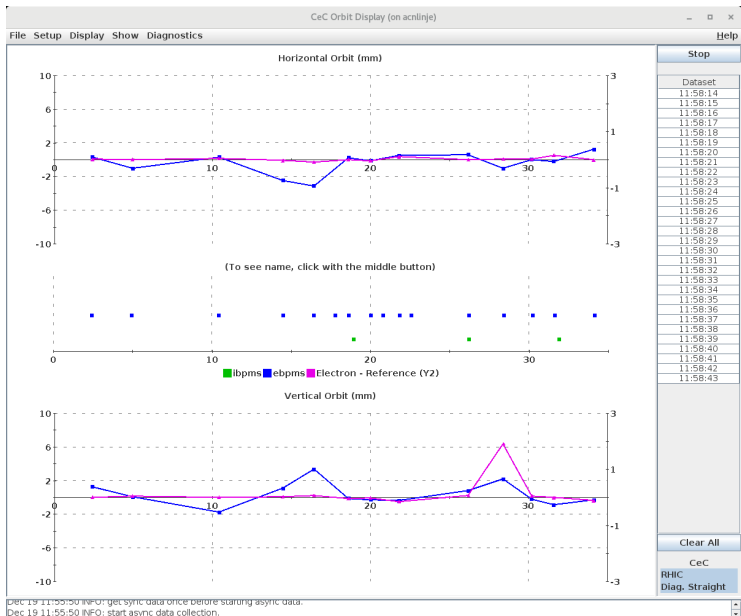
(a) Slice energy spread



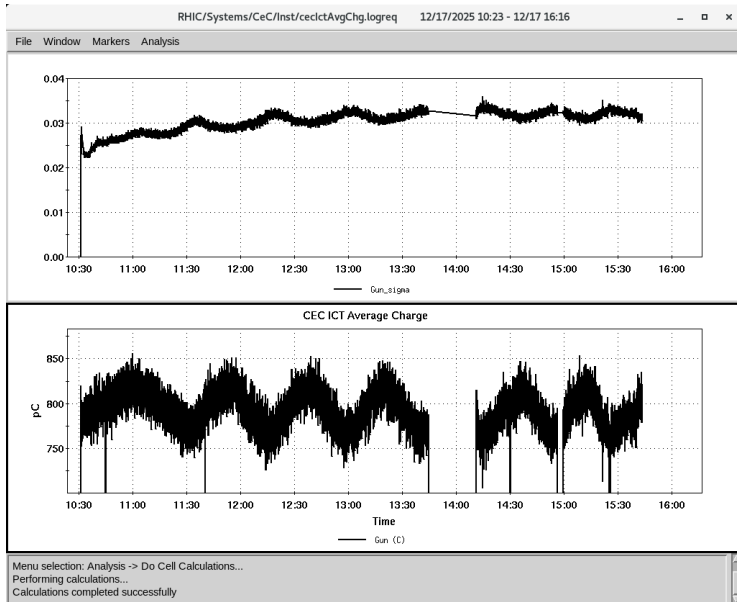
(a) Slice energy spread



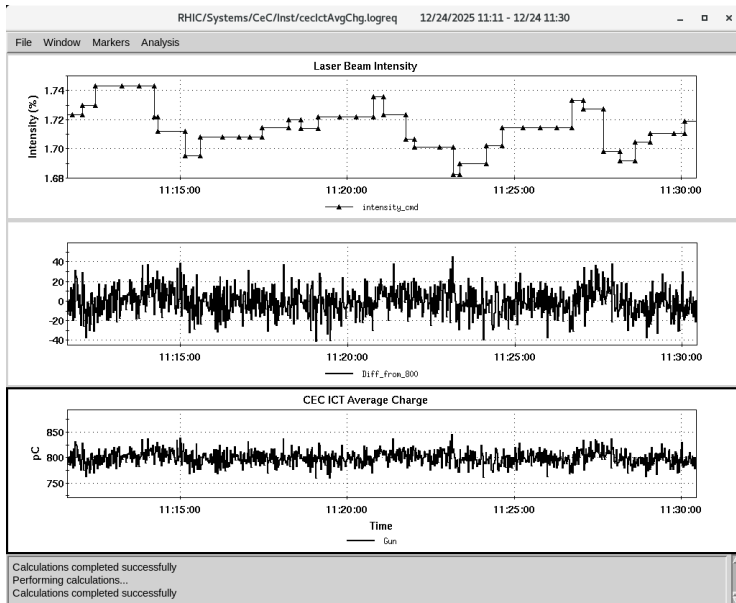
(a) Orbit local bump



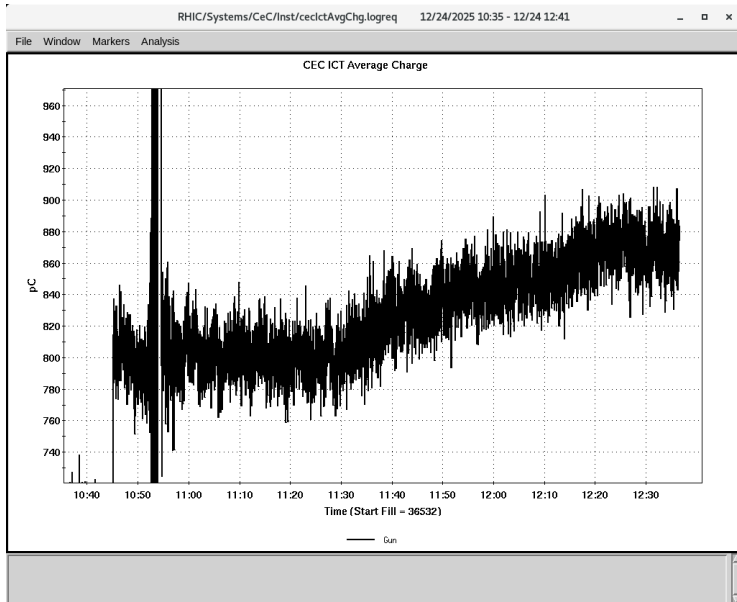
(a) Orbit local bump



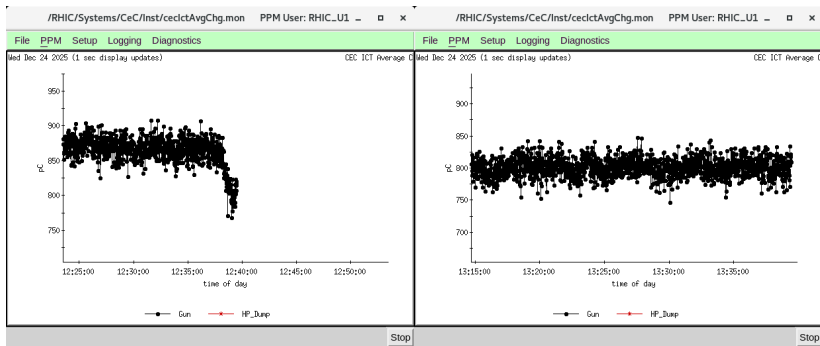
(a) Why charge feedback



(a) Charge feedback on

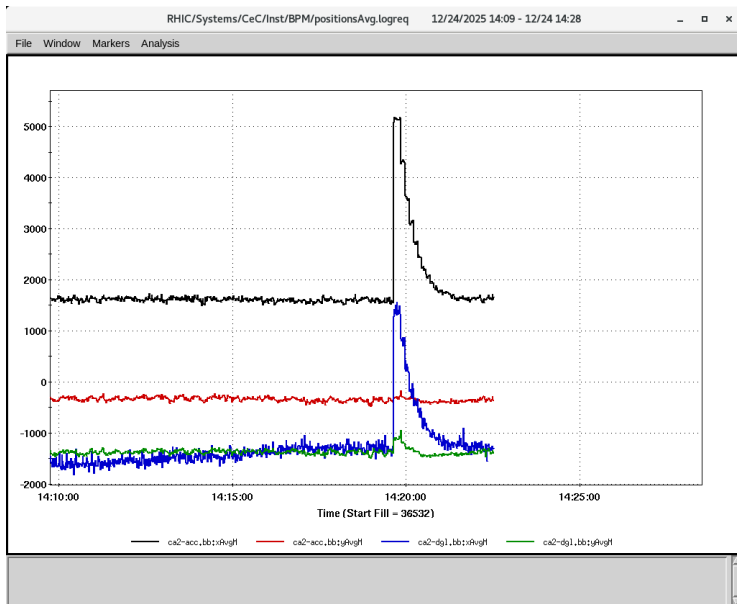


(a) Charge feedback off



(a) Charge feedback on

(b) Charge feedback on



(a) Orbit feedback with fractional correction