

# QUARTET detector test @ KIP

July 2023

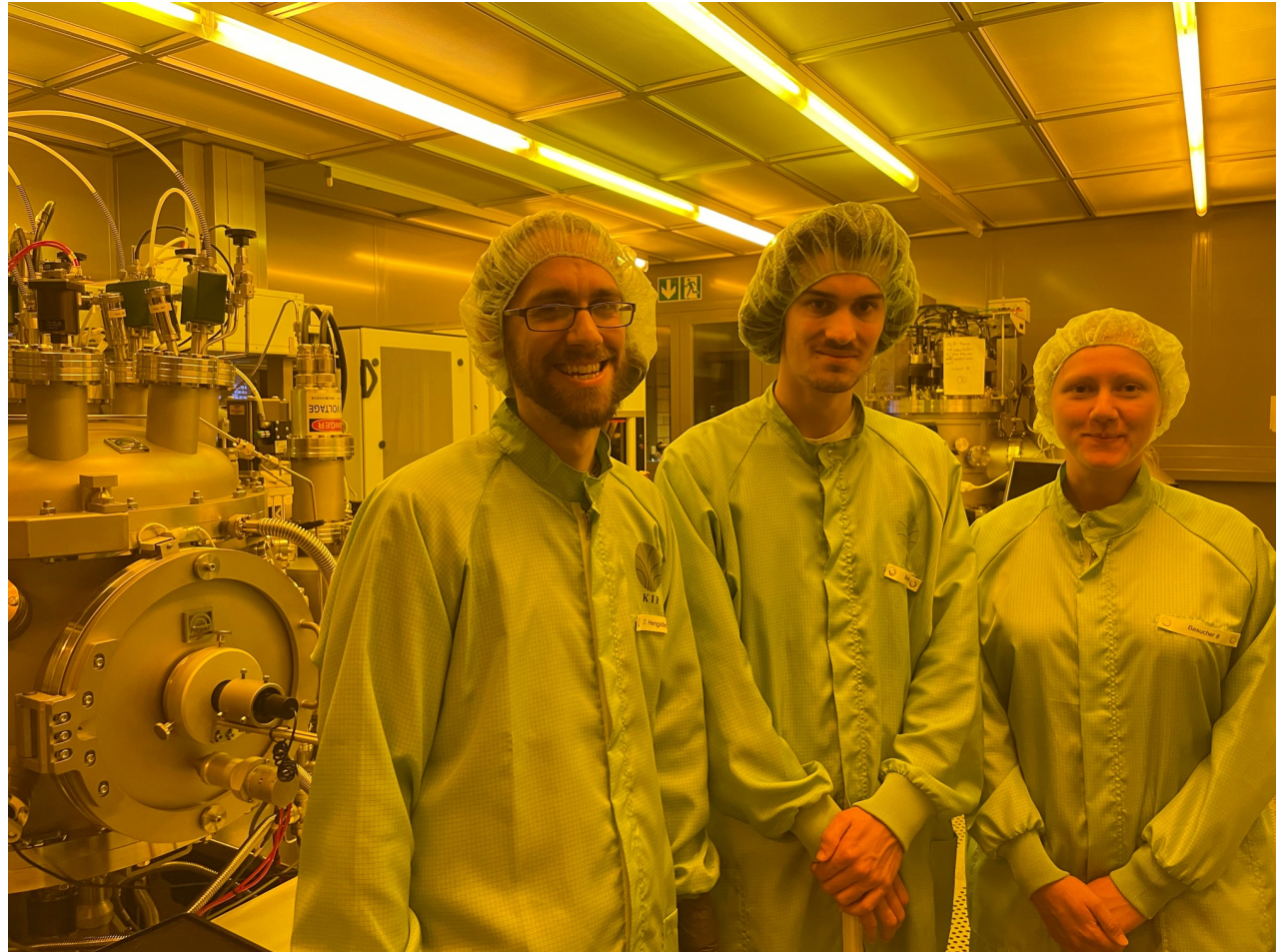
# Summary

- Detector cold and working
- We learned how to freeze in current and tune the squids
- Found one bad channel, otherwise worked great
- Took a few hours of  $^{55}\text{Fe}$  calibration spectra and walked through basic steps of data analysis with Daniel Unger
- Toured the cleanroom and learned a lot, thanks so much to the whole KIP team for the warm welcome and great visit !

# Detector setup, team, and $^{55}\text{Fe}$ calibration



# SQUID tuning and cleanroom visit



# To Do—as discussed during the visit

- Things to think about @ PSI
  - Water connections in the zone? What type of connector?
  - Clean power? Is there a UPS available at PSI if we decide we need one? (not big, the equivalent of powering 2 PC computers)
  - Squids are super-sensitive to wifi/cell signals, how to tune in the back of the hall? Additional shielding needed?
  - Finalize total number of shielding layers to be used
- Installation and tests @ PSI end of September
  - All hands on deck ! Come and learn to use the detector !
- New data being taken now at KIP which will allow us to practice data analysis before beamtime