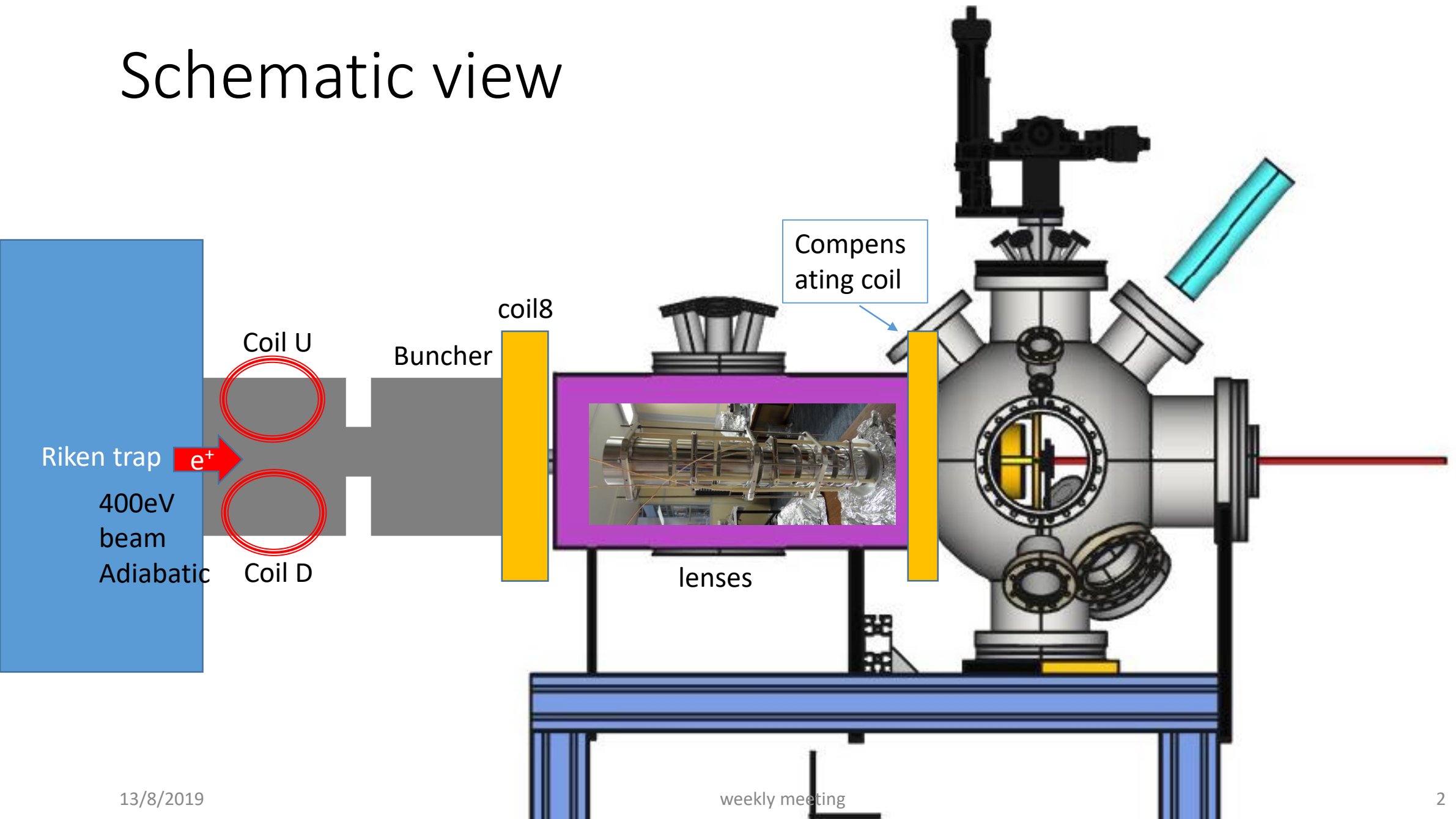


Beam tuning to Reaction chamber

SNU

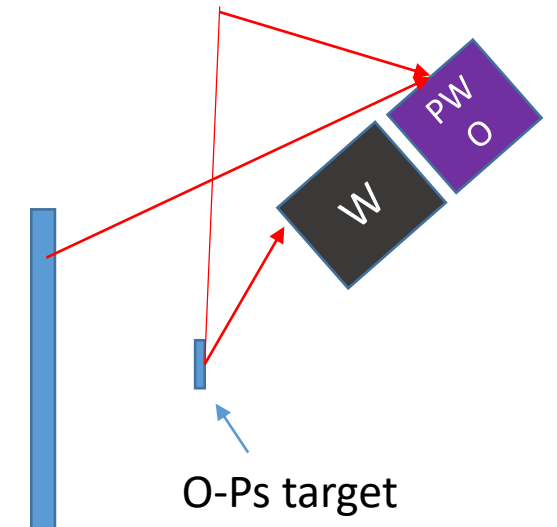
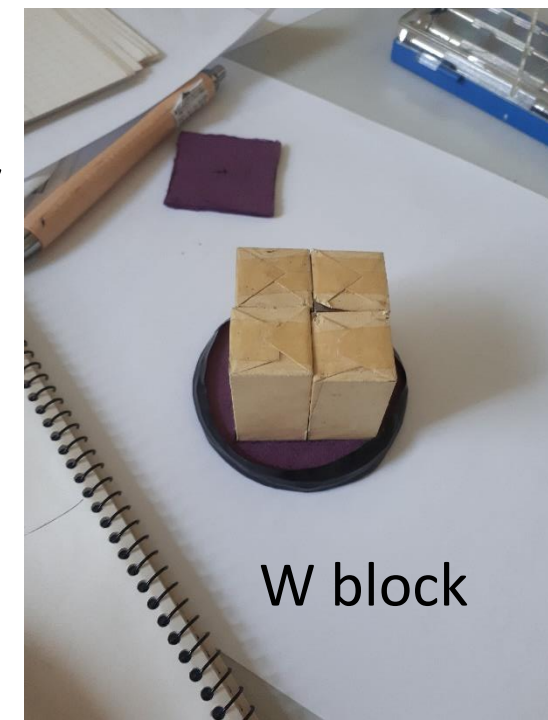
Bongho

Schematic view

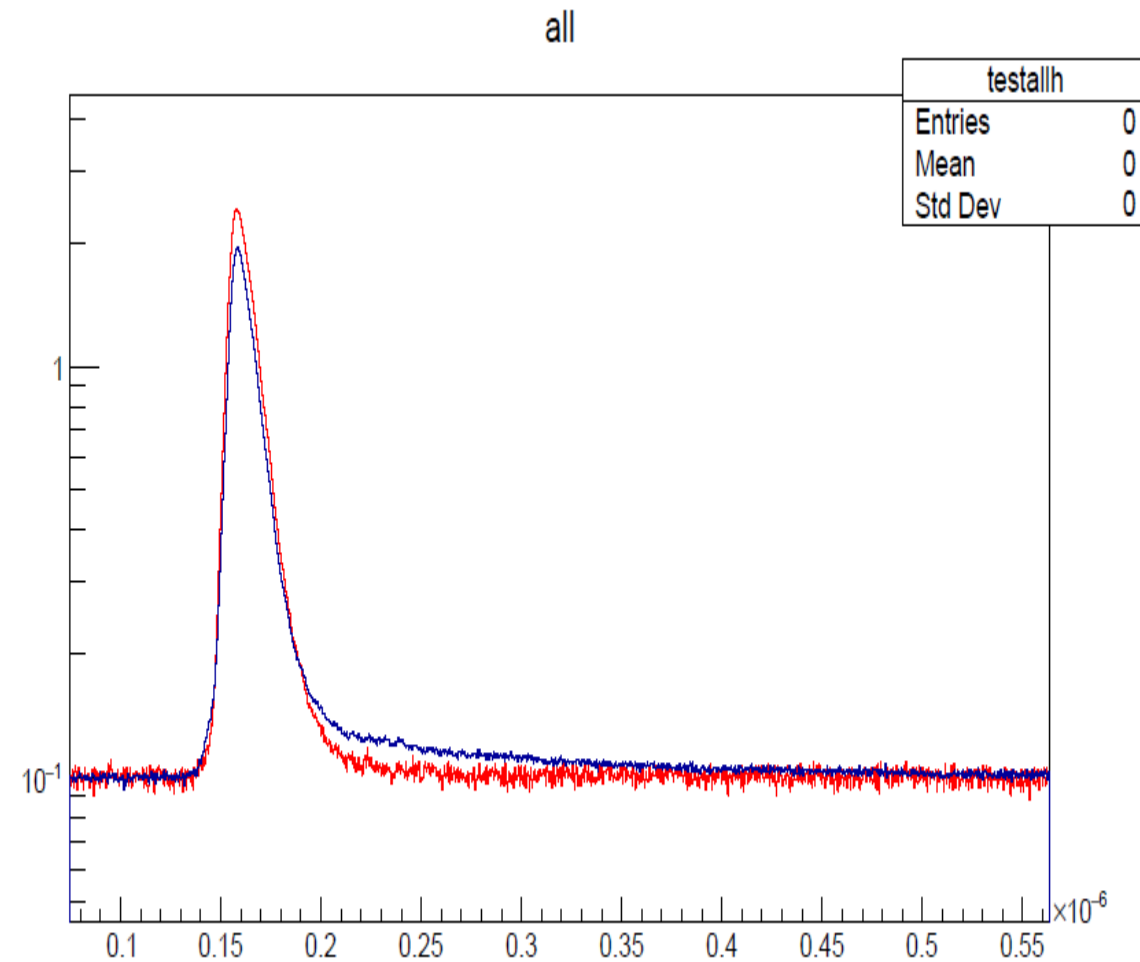
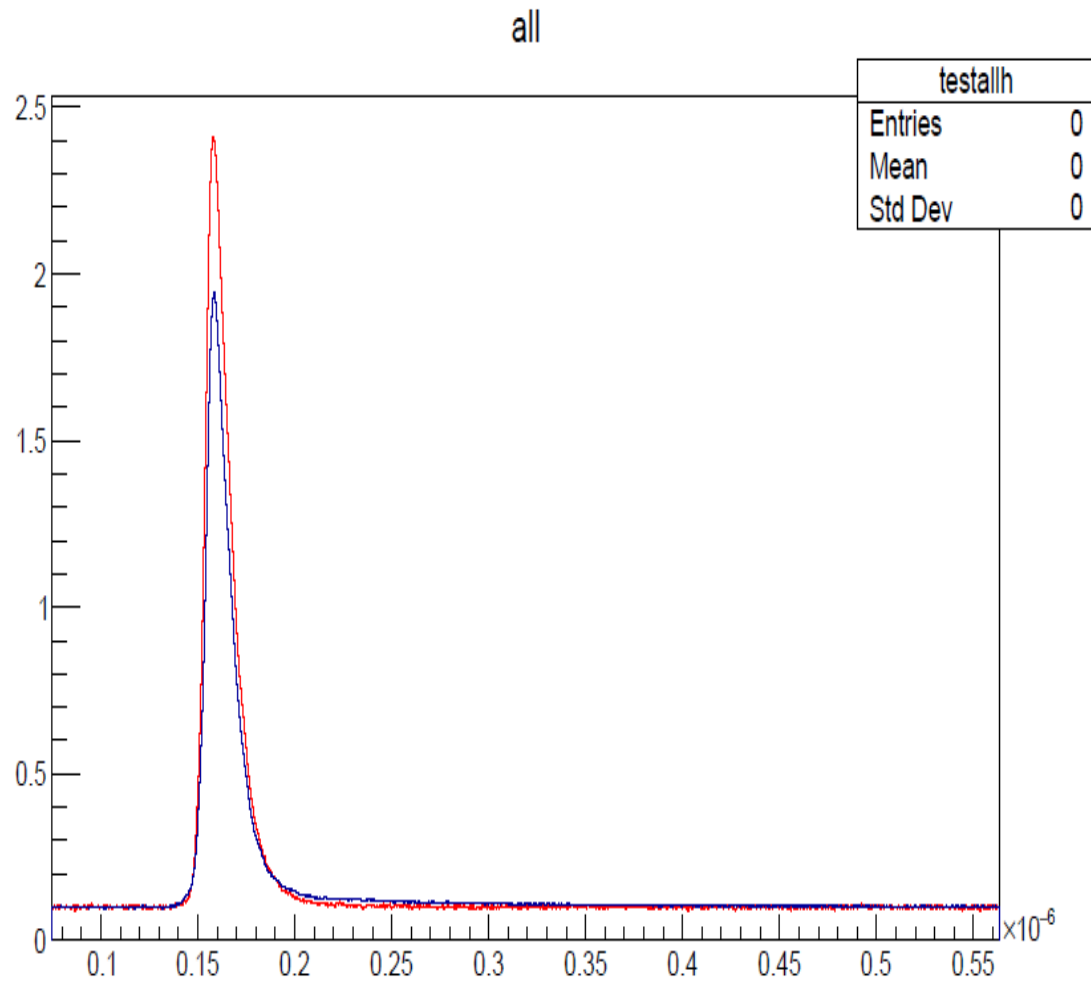


Positronium generation and related study

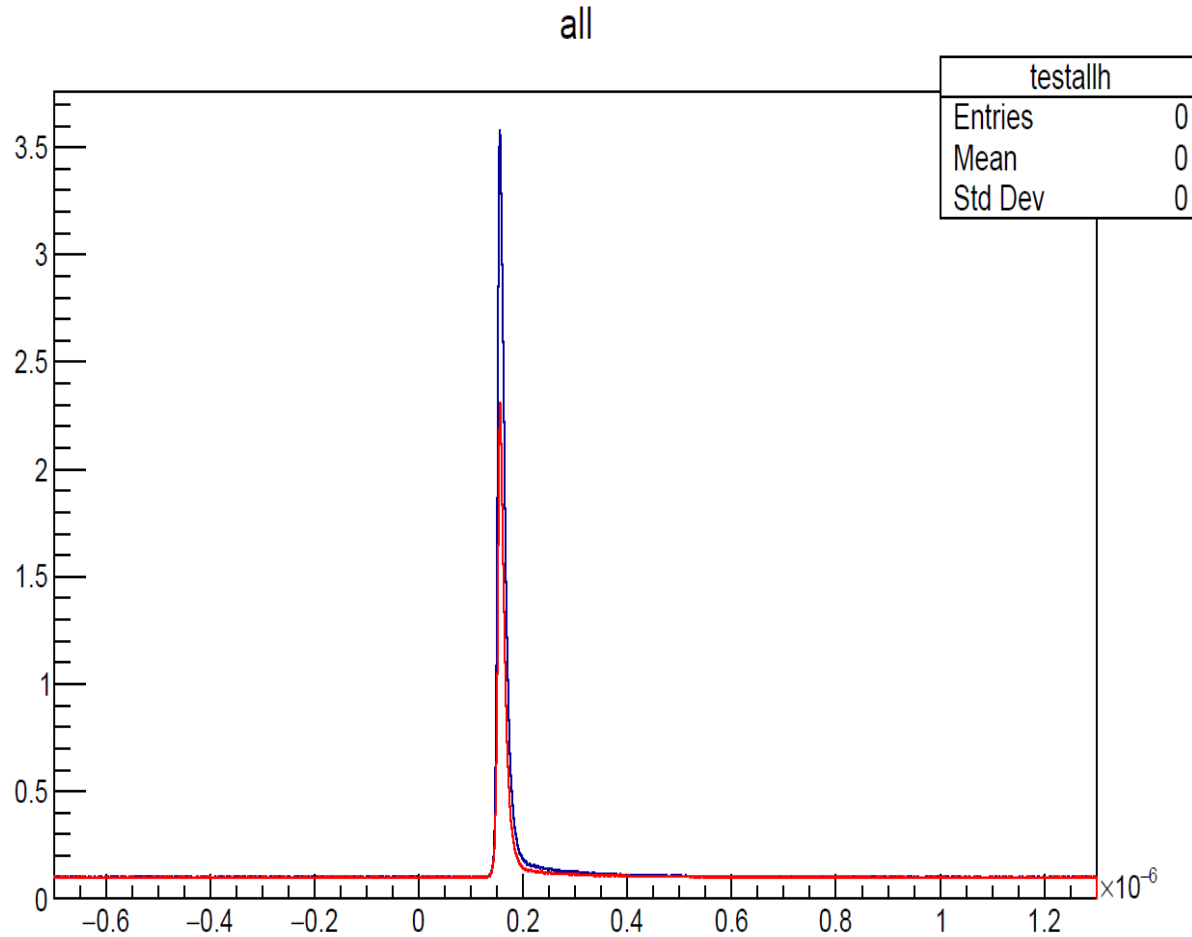
- I talked last time that I want to use positron beam to check the Compton background.
- It 's hard because the fraction of positron backscattering and loss in the middle of beam line can be measured even front of PWO detector is blocked by W block.
- But o-Ps decay give clear signal without nasty BG
- Respect to expected intensity $E+5$, to measure the Compton with 3 different position (to compare with simulation), more than an hour required.



Positron annihilation and positronium signal

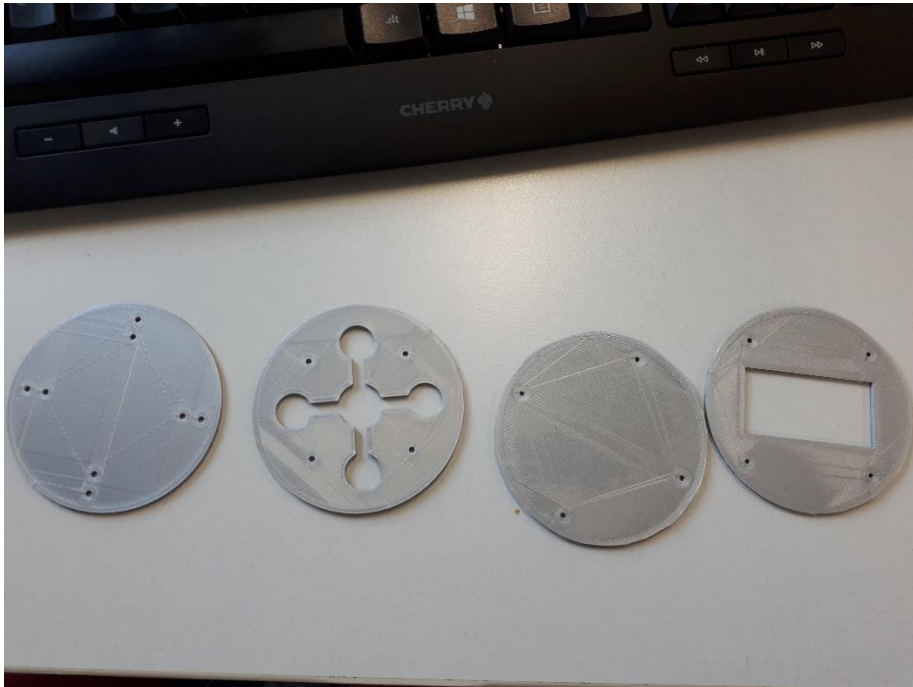


Test with different position (10~15cm distance)



- For the data with different distance, positronium amount is changed as expected from geometrical efficiency change but positron annihilation is not.

Support frame of new PWO detector



- Support frame of new detector is made by 3D print