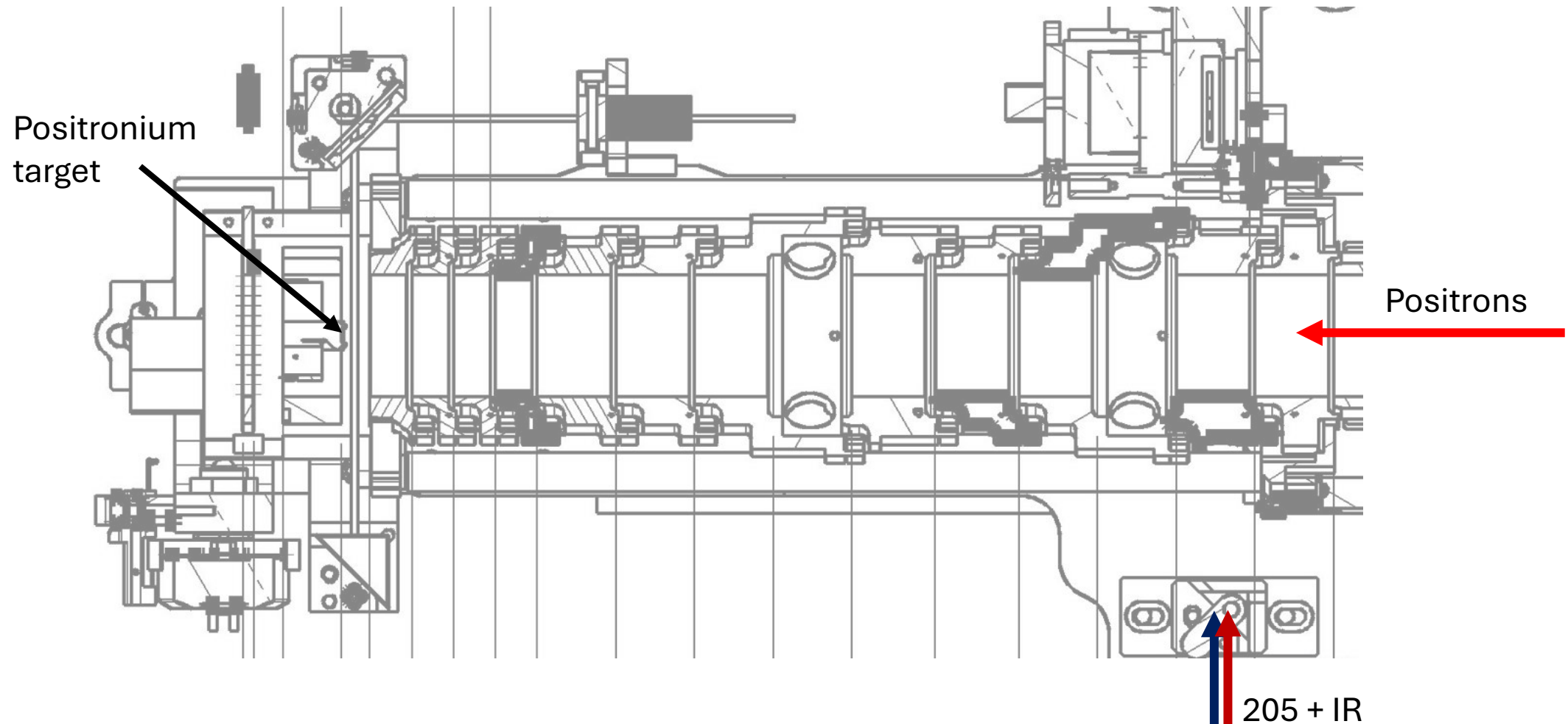


Rydberg positronium spectroscopy

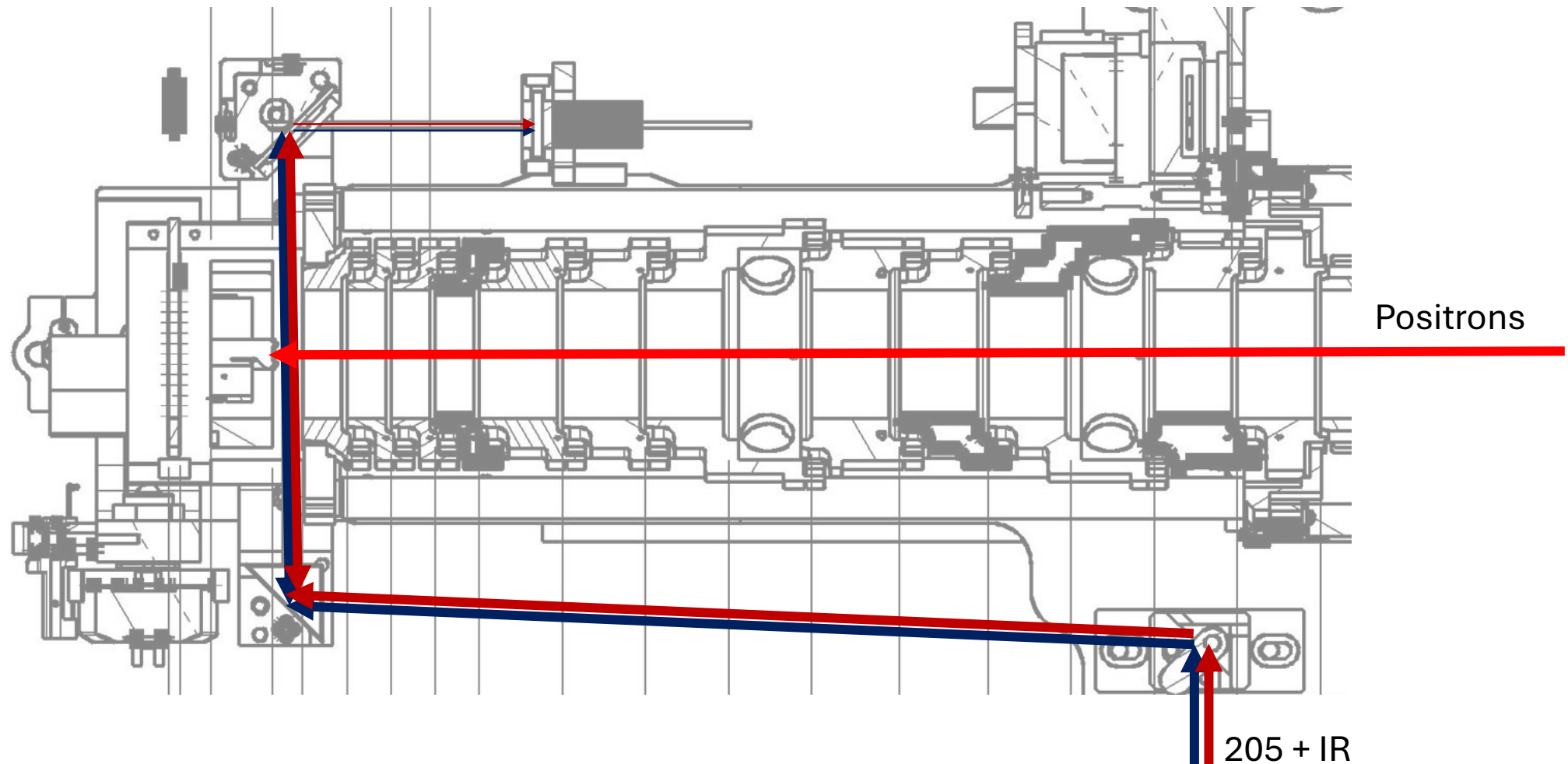
Valts Kruminis

Benjamin Rienacker

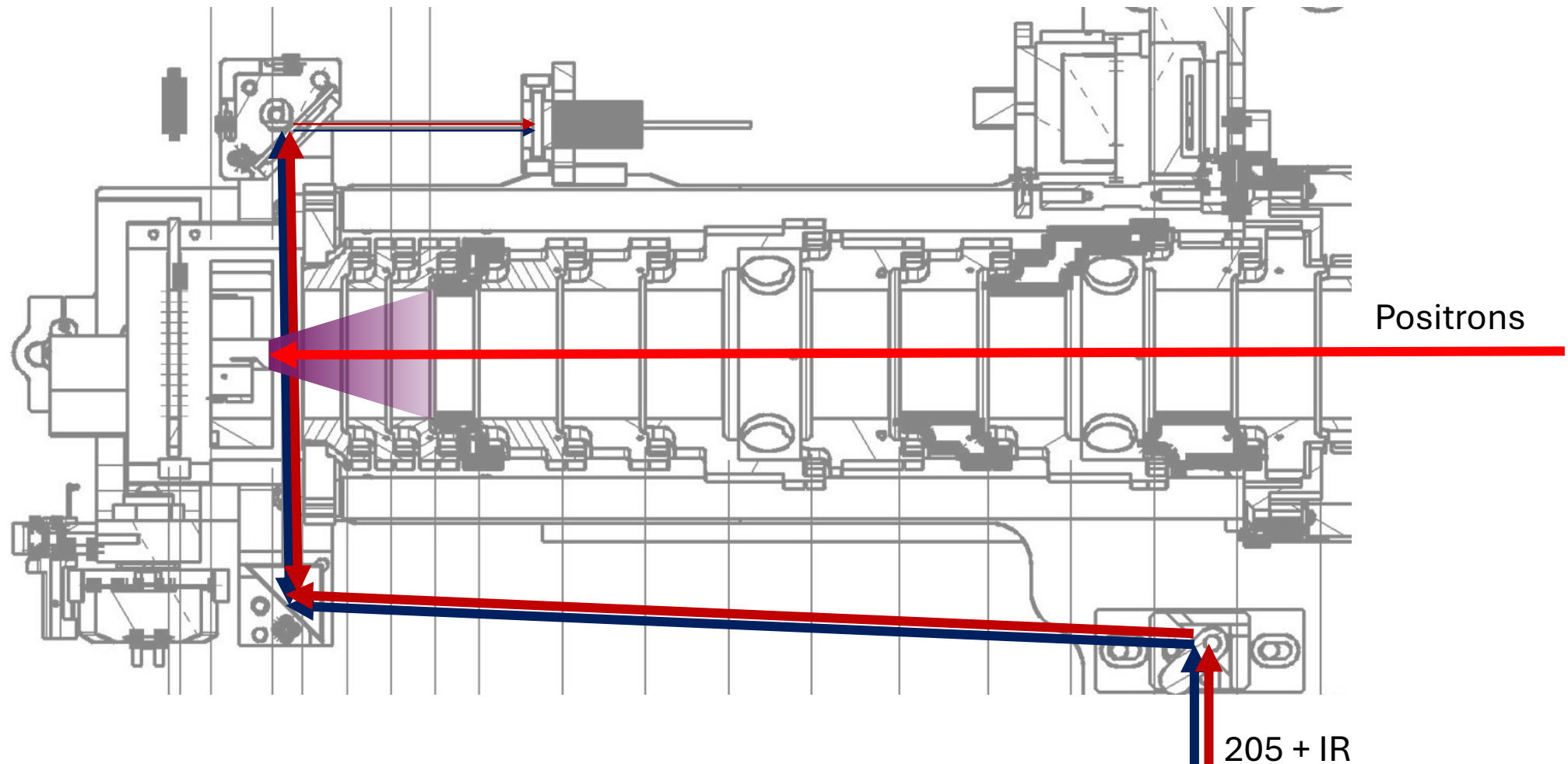
How is positronium made?



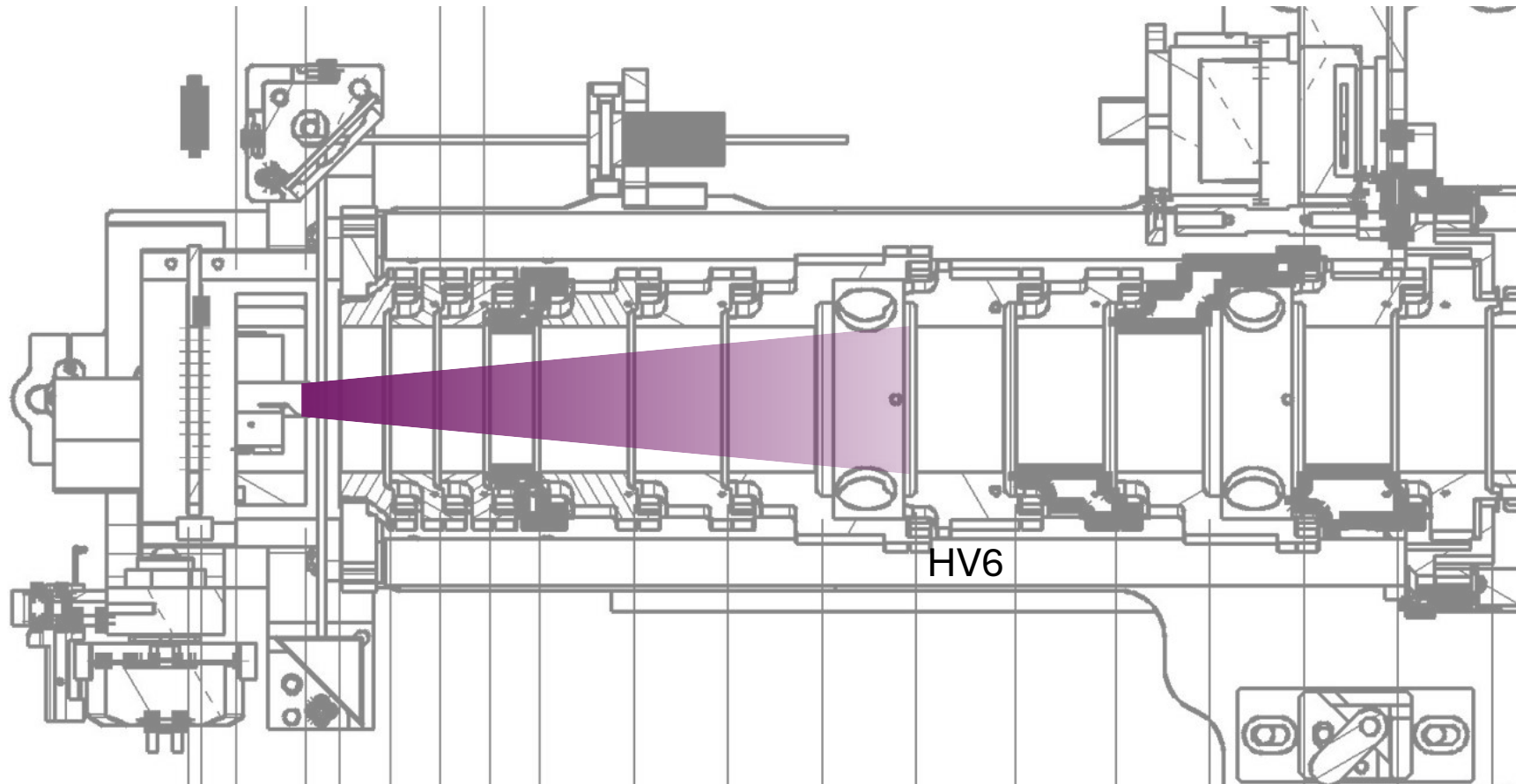
How is positronium made?



How is positronium made?



How we see what we made?

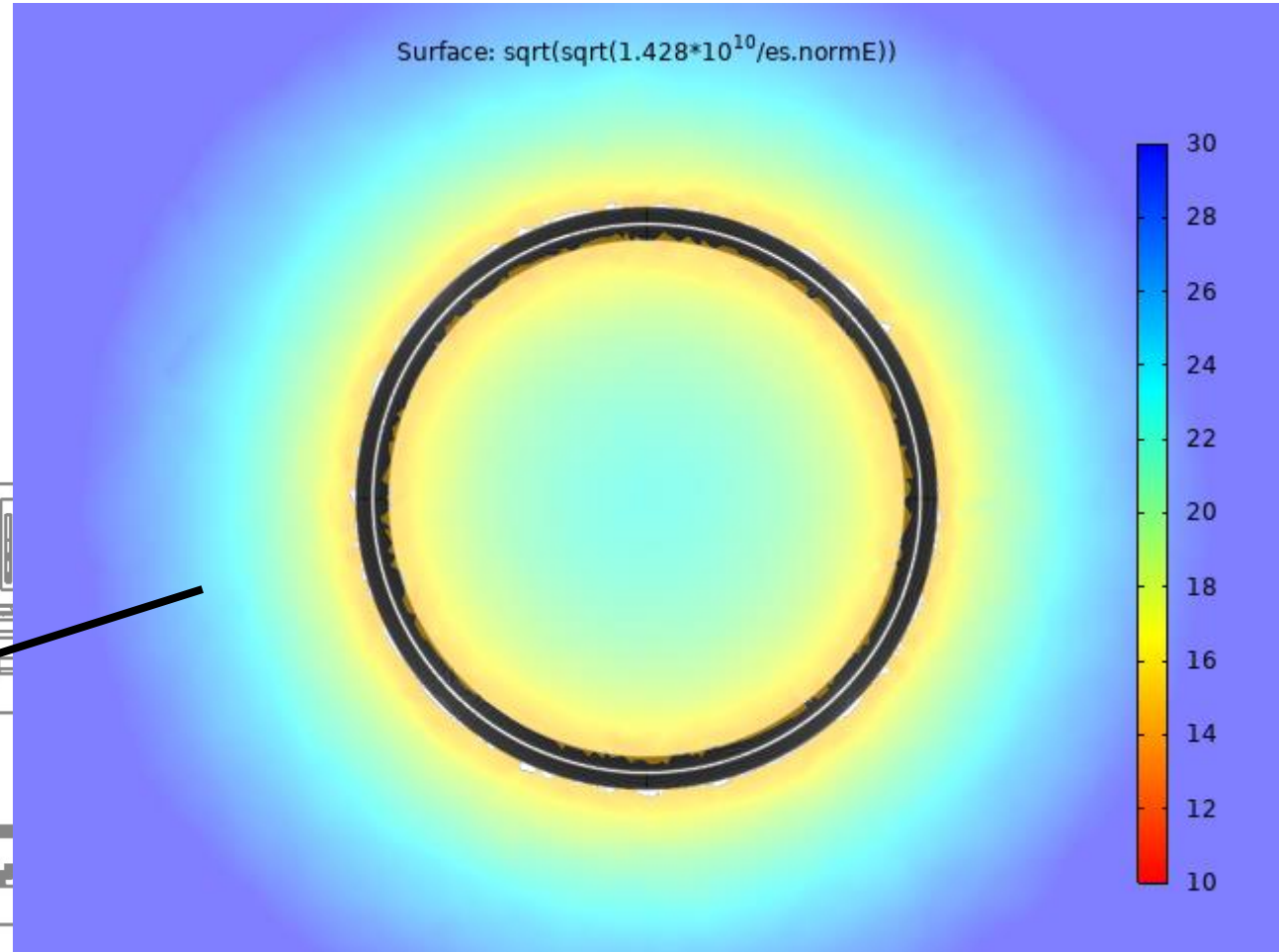
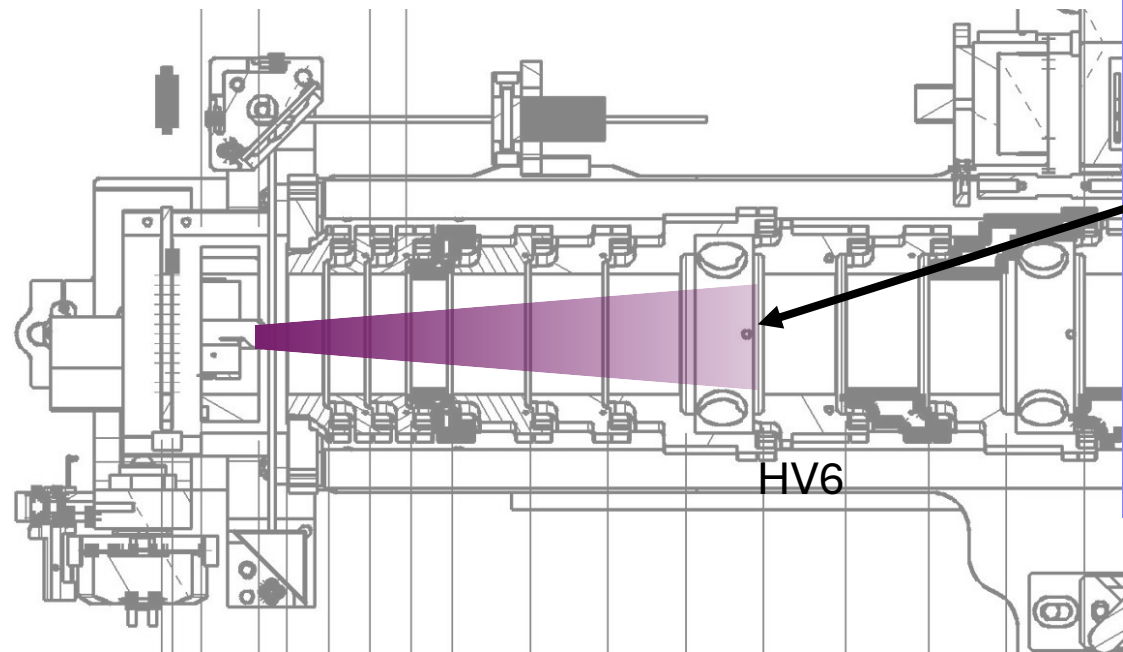


How we see what we made?

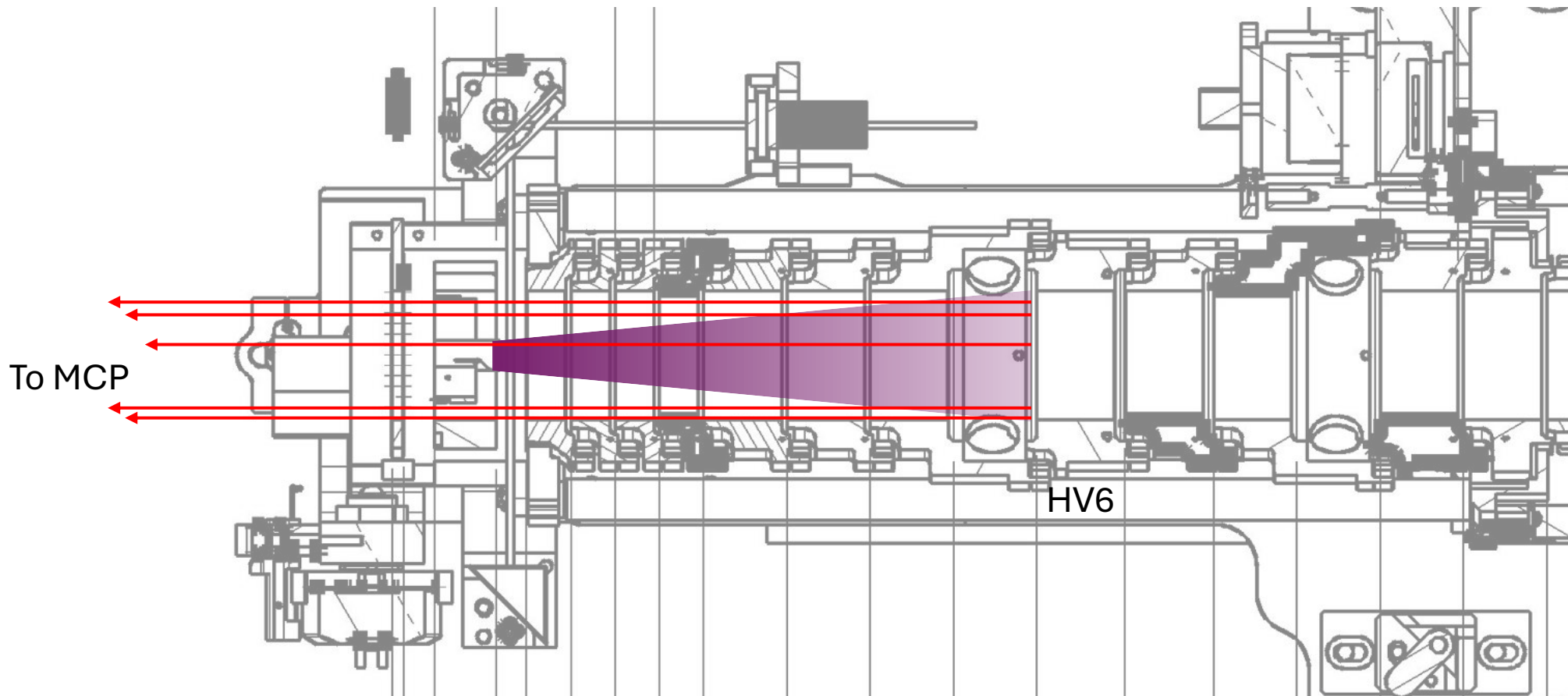
Maximum n level that can be ionized
with the field from 1600V on HV6

$$F_{\text{limit}}(n) = \frac{E_{ps}}{9\epsilon a_0} \frac{1}{n_{\text{eff}}^4}$$

Surface: sqrt(sqrt(1.428*10¹⁰/es.normE))

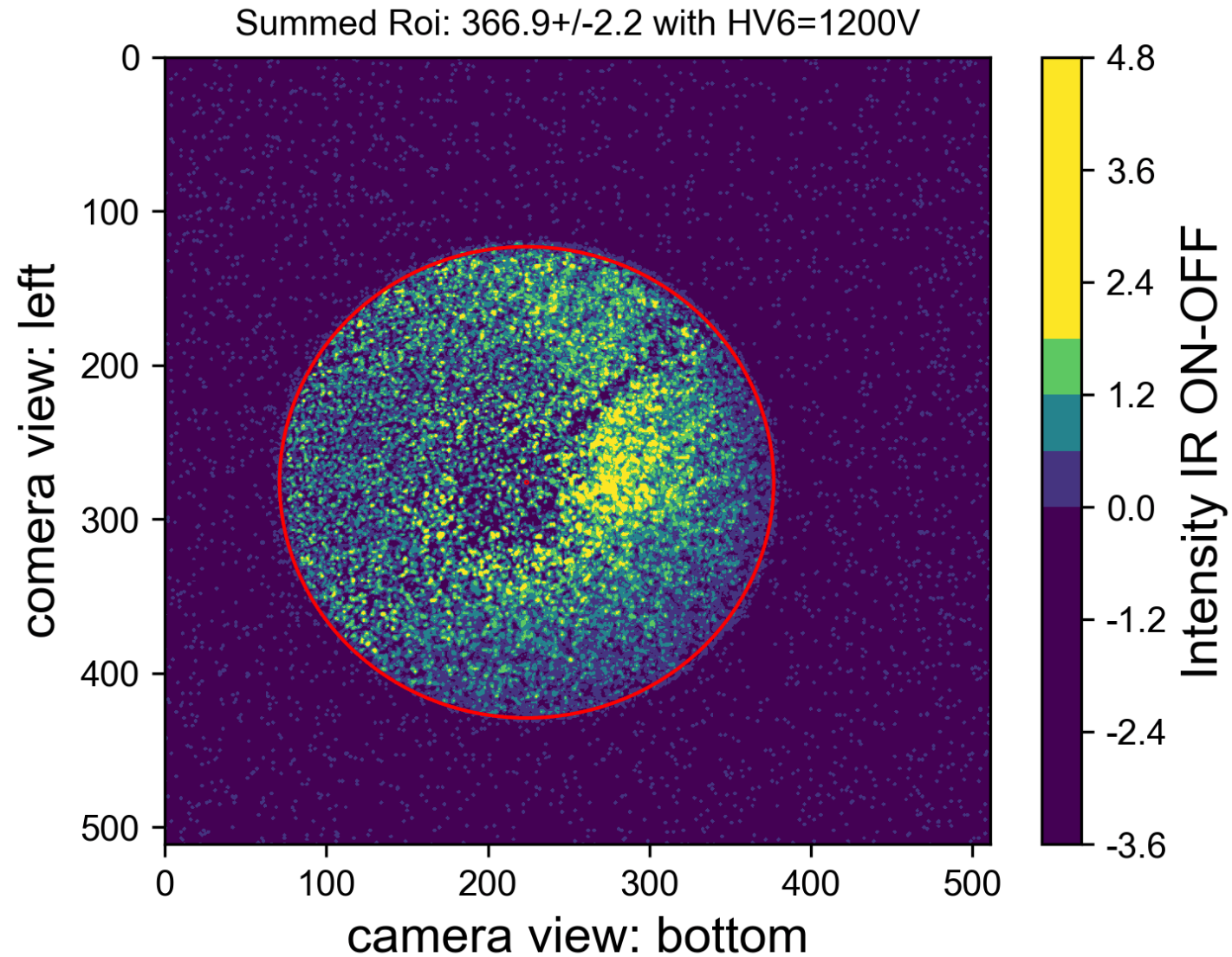


How we see what we made?



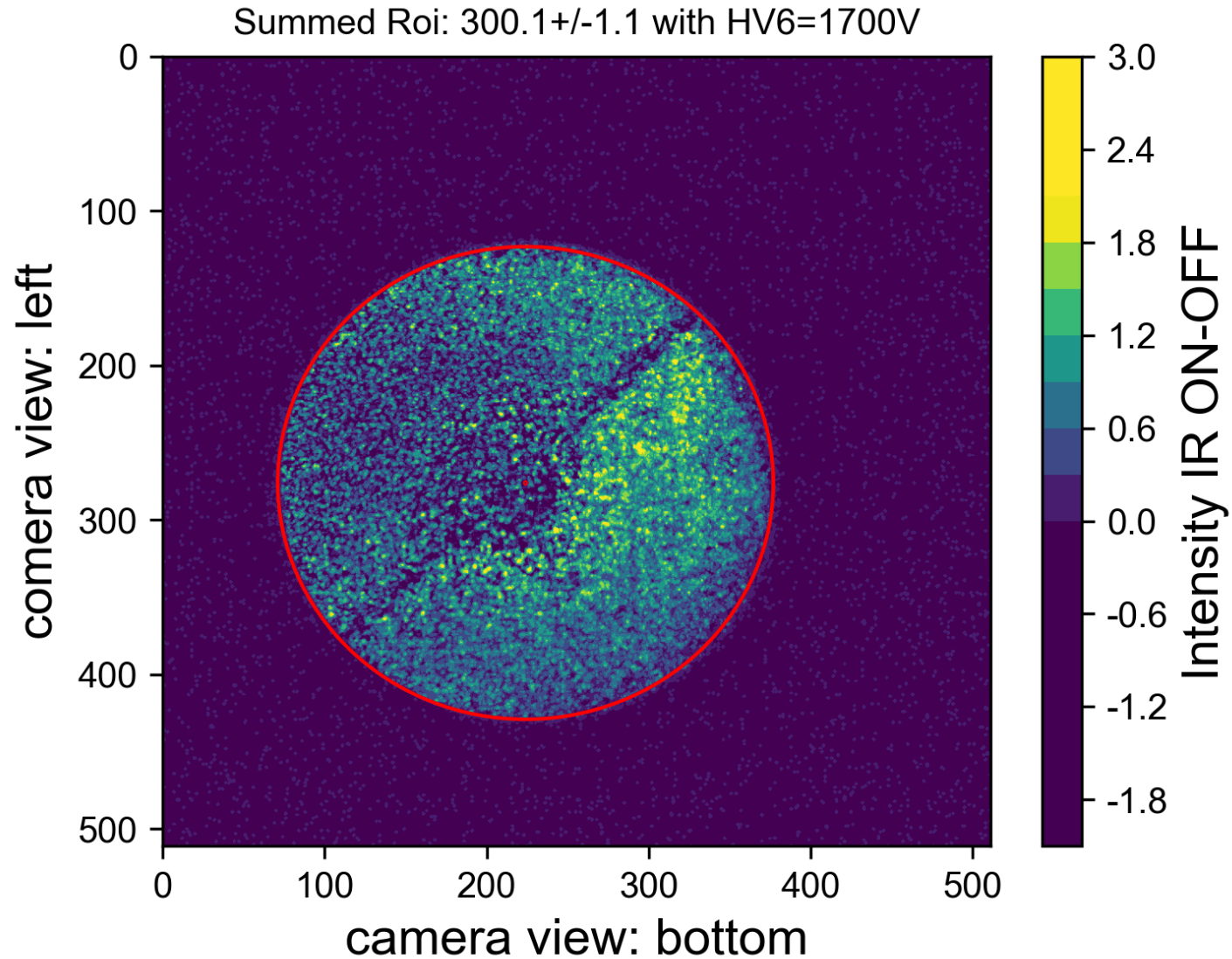
What did we see?

- 1660nm



What did we see?

- 1665nm



What did we see?

- 1670nm

