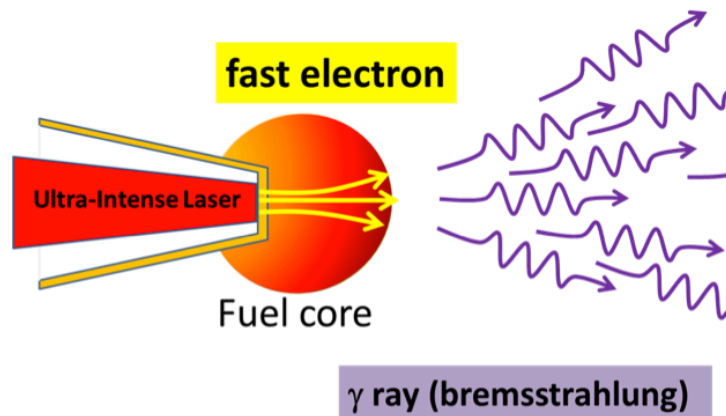


Fast Ignition Experiments and Intense Hard-X-Ray Harsh Environment



γ -ray and (γ -n) neutron harsh environment in Fast Ignition (FI) experiments.

Advanced x-ray and neutron diagnostics compatible with γ -ray and (γ , n) neutron harsh environment.

FI experiments successfully performed.

Pilot test experiments for near future experimental reactors.

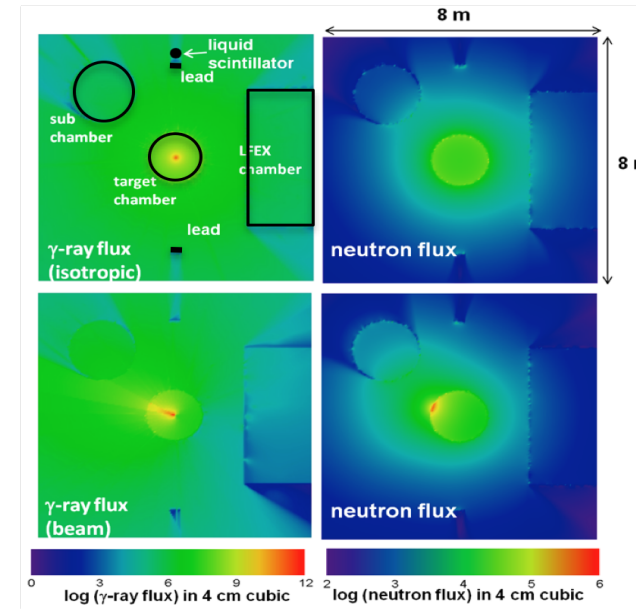


Fig. 1. Calculated γ -ray (left) and (γ ,n) neutrons (right) flux map around the target chamber for isotropic (top) and beam-like (bottom) γ -ray sources with 10^{12} γ -rays from the target at the center of the target chamber.

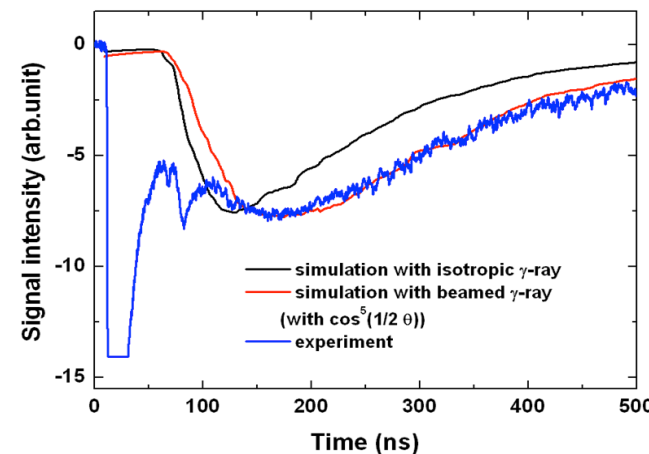


Fig. 2. Comparison of signals in a TOF neutron detector between experiment and calculation by Monte Carlo simulations. Position of the detector is indicated with a small solid black circle in Fig.1.