



GERMAN-ARMENIAN STUDENT COURSE ON ACCELERATOR PHYSICS

2026 October 3-11
CANDLE, ARMENIA

About the Course

An internship in advanced accelerator physics at the CANDLE institute in Armenia is offered with the support of DESY and EuXFEL through HICAPE, the Hamburg International Center for Accelerators, Photonics and Entrepreneurship. The internship is carried out in small mixed teams of German and Armenian students. It will replace one of the 4 experiments of the UHH Advanced Practicum in Physics (PHY- FP, STiNE 66-455). During a one-week stay each team will perform one out of 8 across a wide range of accelerator physics and technology experiments offered at the AREAL accelerator (CANDLE SRI) . AREAL is an ultrafast laser-driven electron accelerator that produces extremely short relativistic electron pulses using high-frequency electric fields. In addition to the acquired important skills, the students will experience the significance of international cooperation and personal contacts. The course is to be conducted in English and is expected to be held in October 2026.



COURSES

- Electron beam parameter measurements
- Vacuum technology in accelerators
- Generation of ultrashort relativistic electron beams
- Femtosecond lasers for linear electron accelerators
- Accelerator magnets and magnetic field measurement
- Radiofrequency techniques in accelerators
- Vibrating wire monitors and beam profile measurements
- Beam-matter interaction and radiation dose measurements



HICAPE