

DESY Seminar

27 February 2007, 17:00, DESY Hörsaal

Andrea Longhin (Padova)

Recent Results from OPERA

The OPERA neutrino detector at the underground Gran Sasso Laboratory (LNGS) was designed to perform the first detection of neutrino oscillations in appearance mode, through the study of v_{μ} to v_{τ} oscillations. The apparatus consists of a lead/emulsion-film target complemented by electronic detectors. It is placed in the high-energy, long-baseline CERN to LNGS beam (CNGS) 730 km away from the neutrino source. In August and October 2006 a first run with CNGS neutrinos was successfully conducted. A first sample of neutrino events was collected, statistically consistent with the integrated beam intensity. After a description of the beam and of the detector, we report on the achievement of this milestone, and present an overview of the OPERA physics and of its future prospects.

- Tea and cookies will be served at 16:45 in the lobby.
- After the seminar there is a chance for private discussions with the speaker over wine and pretzels also in the lobby.