



Contribution ID: 11

Type: **not specified**

# ANNIE in 10 Minutes

*Tuesday, 17 August 2021 09:15 (15 minutes)*

The Accelerator Neutrino Neutron Interaction Experiment (ANNIE) is a 26-ton gadolinium-doped water Cherenkov detector situated 100-m downstream in Fermilab's Booster Neutrino Beam. ANNIE's main physics goal is to measure the final state neutron multiplicity of neutrino-nucleus interactions as a function of momentum transfer. This measurement will improve our understanding of these complex interactions and help reduce the associated systematic uncertainties, thus benefiting the next generation of long-baseline neutrino experiments. ANNIE will achieve its physics goals with the use of a new type of photodetector, the Large Area Picosecond Photodetector (LAPPD). The experiment is the first physics experiment to deploy an array of LAPPDs. Significant progress has been made on the characterization and development of this system. In this talk, we will present the status of ANNIE experiment.

**Primary author:** HE, Julie (UC Davis)

**Presenter:** HE, Julie (UC Davis)

**Session Classification:** Tuesday