

## Status of LBNF and DUNE

*Tuesday, September 13, 2016 2:00 PM (20 minutes)*

The global neutrino physics community is coming together to develop the Deep Underground Neutrino Experiment (DUNE). It is a groundbreaking science experiment for long-baseline neutrino oscillation studies and for neutrino astrophysics and nucleon decay searches. The facility required for DUNE, the Long-Baseline Neutrino Facility (LBNF), comprises an expansion of the underground infrastructure at the Sanford Underground Research Facility (SURF) in South Dakota and the creation of a megawatt neutrino-beam facility at Fermilab. DUNE will install a very large ( $4 \times 10$  kT) modular liquid argon time-projection chamber (LArTPC) located deep underground together with a high-resolution near detector hosted at Fermilab site, providing a 1300 km baseline. In this presentation I will describe the status of DUNE/LBNF and its scientific capabilities.

### Summary

**Primary author:** GARCIA-GAMEZ, Diego

**Presenter:** GARCIA-GAMEZ, Diego

**Session Classification:** Neutrinos

**Track Classification:** Neutrinos