

Los Alamos National Laboratory Experimental Nuclear Physicist, P-27

Vacancy Name: IRC69908

Online Application: <http://jobs.lanl.gov>

Description

The P-27 group in Physics division is looking for a scientific leader to work on direct and indirect measurements of neutron-induced reaction physics. The successful candidate will perform measurements and analyses at the Los Alamos Neutron Science Center and/or external facilities including university and national user facilities in low-energy nuclear physics.

Research areas in the group include studies of nuclear astrophysics (s-process, r-process, heavy element synthesis), nuclear structure (gamma-ray spectroscopy, level density, photon strength function), nuclear reactions, studies of the fission outputs, and related topics. The teams are tightly coupled to the LANL T-2 nuclear physics and astrophysics theory group as well as rad-hydro modeling teams in CCS-2, XCP, and XTD. The intense neutron spallation sources at LANSCE are used in much of this work and cover a neutron energy range from sub-thermal to 800 MeV. Currently, the P-27 instrument suite at LANSCE includes the Detector for Advanced Neutron Capture Experiments (DANCE), the Low-Energy (n,Z) (LENZ) instrument, the Chi-Nu Prompt Fission Neutron Instrument, the fission Time Projection Chamber (TPC), and the SPectrometer for Ion DEtermination Research (SPIDER). The teams are actively involved in developing new instruments to take advantage of the unique time-of-flight neutron beams made available at LANSCE. At the Nevada National Security Site (NNSS), we are part of a large collaboration developing the capability for Neutron Diagnosed Subcritical Experiments. Outside Los Alamos, we actively pursue measurements studying the underlying nuclear physics to infer nuclear reaction rates for short-lived nuclei.

A successful candidate could pursue any research direction within the current research disciplines of the group, or in related areas, with appropriate funding. There may be additional opportunities for collaborative work with scientists from other groups or divisions at LANL.

Depending on their qualifications, the successful candidate would be hired as either a Scientist 3 or a Scientist 4. Interested candidates should direct questions to P-27 staff and/or to Matt Devlin, Acting P-27 Group Leader (devlin@lanl.gov and 505-665-0421). Applications should be made to jobs.lanl.gov, vacancy #IRC69908.