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Title:	Call for Proposals: Proton Radiography 2026 Run Cycle
Author(s):	Sandstrom, Mary M. White, Brandon
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Call for Proposals: Proton Radiography 2026 Run Cycle

Deadline: 5:00 pm (MST), Friday, January 16, 2026
Program Advisory Committee Review with PI presentations: Tentative – Mid February 2026
Final Schedule Publication: Late February 2026
Issued by: Los Alamos Neutron Science Center (LANSCE)

The Los Alamos Neutron Science Center (LANSCE) invites proposals for experiments at the Proton Radiography (pRad) Facility during the 2026 run cycle. The pRad Facility uses 800 MeV protons from the LANSCE accelerator to diagnose dynamic and static experiments in support of national-security programs and other research that benefits from the unique capabilities of proton radiography.

The 2026 run cycle will include approximately three months of beamtime for non-plutonium (non-Pu) experiments during the first half of the year, with the Pu campaign scheduled for October through December 2026. Because of this, time for other user experiments will be limited. Only high-explosively driven (vessel) and static experiments will be scheduled in 2026, and no gun or PHELIX experiments will be reviewed. If pre-shot material or component characterization is needed to support an experiment, details should be included in the proposal.

Key Considerations for 2026

- All proposers must submit new or updated proposals, even if similar experiments were submitted or awarded beam time in previous years.
  This process allows the Program Advisory Committee (PAC) and program managers to gauge current interest, readiness, and future demand across the user community.
- Only high-explosively driven (vessel) shots and static experiments will be considered for the 2026 run cycle.
  No gun or PHELIX experiments will be reviewed or scheduled.
- Most submissions are expected to be updates to ongoing series. However, new experiment concepts are encouraged, particularly those addressing emerging scientific needs or new diagnostic capabilities.
  Due to limited beamtime, new experiments are unlikely to be scheduled in 2026 unless they are exceptionally high-impact or technically groundbreaking.
- This call will also be used to gauge long-term demand to inform facility and program planning beyond CY26.
- Proposers should indicate whether their experiment is intended to support or develop a future actinide experiment at pRad. This information helps guide long-term planning for facility readiness and program alignment.
- For help with the proposal process or assignment of a POC, contact Mary Sandstrom msandstrom@lanl.gov

pRad Facility Scope and Costs

The pRad Facility supports dynamic and static experiments that contribute directly to national security programs. For the 2026 run cycle, beamtime will be dedicated to high-

explosively driven (vessel) and static experiments. Gun and PHELIX experiments will not be scheduled in 2026.

Beam production operations at pRad are funded by NNSA programmatic sponsors. Approximately ten percent of beamtime may be available for compelling scientific proposals from institutions without programmatic sponsors or for proprietary work and Strategic Partnership Project (SPP) agreements.

User costs may include personnel support outside the pRad team as well as experimental setup, fabrication, and assembly. Proposals should demonstrate readiness and, when applicable, prior testing at other facilities. Each proposal should also identify known technical, operational, and safety risks and describe the mitigations that will be implemented.

Proposal Requirements

All proposals must be submitted through the LANSCE Experiment Management System (LEMS). The online submission form includes required fields from the 2026 pRad Experiment Request Form and is designed to improve review efficiency and ensure readiness.

1. In addition to the LEMS submission, proposers must upload a written proposal document that follows the structure outlined below. The written proposal provides essential detail for the Program Advisory Committee (PAC) and ensures that reviewers have complete technical context. Proposers should provide justification if any section is not applicable. Complete, well-documented proposals will receive higher priority during PAC review.
2. Each submission should include the following information:
3. Background – summary of previous experiments and findings, including references to archived data or publications when applicable.
4. Simulations – status of pre-shot simulations and confirmation that data are archived in CMF or an equivalent repository.
5. Experimental Models and Validation – description of the physics models being tested or validated and the required spatial, temporal, or diagnostic data.
6. Experimental Setup – description of the devices, configurations, and requested beam time, including operational and safety considerations.
7. Readiness – current parts availability, critical milestones, and risks to readiness, along with mitigation strategies.
8. Safety and Feasibility – identification of technical, operational, and safety risks with proposed mitigations.
9. Analysis and Reporting – identification of sponsoring programs and data stakeholders and a brief description of planned analysis, reporting, and publication activities. Data generated at pRad will be archived and managed through the facility's established National Security Data Service (NSDS) process.

Proposals must be submitted in LEMS no later than January 16, 2026. Incomplete or late proposals will not be accepted.

Evaluation Criteria:

Submitted proposals will be ranked on the following criteria:

1. Quality of the proposed science (What is the problem, and why are experiments needed?)
2. Impact to programs (How will the data be used?)
3. Appropriateness of using the pRad diagnostic for the experiments (Why can't this be done elsewhere?)
4. Readiness of the experiments, feasibility with stated resources, and requested time.

Program Advisory Committee

Complete proposals will first be reviewed for feasibility by assigned Points of Contact (POCs). Following this, all eligible experiments will be evaluated by the Program Advisory Committee (PAC). The PAC, an advisory body to the LANSCE User Facility Director, will assess and rank proposals based on the outlined criteria.

Proposal Submission

Step 1: Log into the LANSCE Experiment Management System

- Create or update your account in LEMS. The system questionnaire must be completed before submitting a proposal. Once this is done, you will receive a proposal number. *(Note: please confirm the current LEMS login link)*

Step 2: Submit Full Proposal to LANSCE

- Unclassified and OUO/Export Controlled Proposals
  Submit via transfer.lanl.gov or email to Mary Sandstrom (msandstrom@lanl.gov), Brandon White (bwhite8@lanl.gov), and Keith Rielage (rielagek@lanl.gov). Include your proposal ID number from Step 1.
- Classified Proposals
  Submit via transfer.lanl.gov or email on the classified network to the same contacts. For proposals containing Sigma 15 or 20 information, contact James Wernicke (wernicke@lanl.gov) for instructions.