



LBNF Primary Beam Project Update

Anne Norrick

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Primary Beam

Magnets

What is included

All conventional magnets needed for extracting the beam from the Main Injector/Recycler and moving the protons to the target. Includes stands to hold the magnets, and plans for installation.

Ongoing Work

- » Positive Preliminary Design Review for the kickers, and production readiness review for the capacitors and ferrites.
- » Tests of kicker components are ongoing.
- » MI steel samples being sent to vendor.
- » Preparation for magnet stand Final Design Review has begun, with magnet stand notes in engineering review.

Magnet Power Supplies

What is included

Power supplies needed for any and all magnets used in the primary beam.

Ongoing Work

- » Schedule replanning moving forward.
- » Moving a transformer for the Primary Beam service building and a load for one of the dipole circuits onto Beamline scope.
- » Examinations of the MI-11 penetrations done to plan for cable running.
- » Work on designing the thyatron needed for the kicker power supply underway.

Primary Beam

Primary Water System

What is included

All water cooling for all magnets and power supplies.

Ongoing Work

- » Work on flow models and schematic diagrams for the LCW continue
- » Rearrangement work on LBNF-05 Power Supply Room are pending review.
- » Primary Water System Branch piping for power supplies in MI-14 is completed pending review.

Vacuum

What is included

Beam pipes and all of equipment needed to create and maintain vacuum in the beam pipes.

Ongoing Work

- » Preparing for Final Design Review in mid-January.
- » Received coated ceramic beam tube square samples from vendor and beginning electrical resistance measurements.

