

MIT-Bates Linear Accelerator Facility Decommissioning Technical Support

Location:	Client:	Duration:	Scope:
MIT-Bates Linear Accelerator Center Middleton, Massachusetts	Argonne National Laboratory	February 2003 to April 2003	Accelerator D&D Planning

Key members of REIN staff were responsible for a contract to assist ANL in advising the US DOE Office of Science of recommended steps to support the eventual decommissioning of the Massachusetts Institute of Technology (MIT) Bates Linear Accelerator. The project scope provided order of magnitude cost estimates of three decommissioning scenarios for scope content, costs, and schedule. The scenarios were:

- 1) Brown/Greenfield: Complete removal of buildings and equipment to meet government regulatory requirements.
- 2) Cleanup to regulatory requirements and remove accelerator equipment/experiments. Buildings remain with possible transfer of buildings to MIT.
- 3) Cleanup to regulatory requirements and transfer buildings with accelerator equipment intact to MIT.

A visit and tour of the facility was conducted in February 2003 for the purpose of deriving a list of radiological records, facility drawings, and other pertinent documents for review. In addition, key facility personnel were interviewed to assess operational and radiological data. After review and assessment of the drawings, records, and data, a detailed report was provided with all backup documentation supporting the conclusions. The report consisted of:

- Total costs to implement each scenario;
- Listing of major decommissioning tasks for each scenario;
- Estimates of manpower, disposal/transport, and packaging costs and activity durations;
- Lists of assumptions and limitations for each scenario;
- Estimated durations and conceptual schedules for major D&D tasks;
- Key lessons learned from previous accelerator facility decommissioning.



Project Performance Features:

- ✓ Detailed project planning for linear accelerator facility decommissioning activities.
- ✓ Development of integrated decommissioning cost estimate and complete project schedule.