

SOFTWARE ASPECTS OF THE LANSCE ACCELERATOR COMPLEX CONTROL ROOM UPGRADE*

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The Los Alamos Neutron Science Center (LANSCE) central control room (CCR) configuration has been upgraded. The intent of the upgrade was to move toward a common operator interface, to increase the control room flexibility for simultaneous beam operations and development, to provide a cleaner and more comfortable control room for 24-hour, eight-month-per-year operations, and to improve the reliability and maintainability of the console interface hardware. The three dedicated-function consoles that serviced two separate control systems were replaced by a single multifunction console divided into three sections. Each section is able to control any part of the facility. To eliminate keyboard clutter, the new console contains six three-headed Sun workstations and several mainly display-oriented X-terminals. Each of the three sections of the new console has only two keyboards. To preserve our investment in VAX-based application programs while the VAX and EPICS control systems are merged, we have provided X-windows emulators for old, character-cell color CRTs and for the old graphics terminals and touch panels. In this paper, we discuss the the new console design, implementation issues, and the underlying control system capabilities that make such a unified design possible.