OAK RIDGE NATIONAL LABORATORY

Facilities Revitalization Project Consolidation and Campus Integration Plan

UT-BATTELLE

ORNL/TM-2002/87.R2

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OAK RIDGE NATIONAL LABORATORY

FACILITIES REVITALIZATION PROJECT
CONSOLIDATION AND CAMPUS INTEGRATION PLAN

October 2003

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ACRONYMS AND ABBREVIATIONS

A/E	architect/engineer
CAFM	Computer-Aided Facility Management
CMMS	Computerized Maintenance Management Systems
CMP	corrugated metal pipe
CSB	Computational Sciences Building
DOE	U.S. Department of Energy
DOT	U.S. Department of Transportation
EM	Environmental Management
ES&H	environment, safety, and health
ESH&Q	environment, safety, health, and quality
ETF	Engineering Technology Facility
F&O	Facilities and Operations
FM	Facilities Management
FRP	Facilities Revitalization Project
FSRC	Facility Space Return Criteria
FUA	Facility Use Agreement
GPP	general plant project
H&S	health and safety
HMIS	Hazardous Materials Inventory System
IGPP	institutional general plant project
JHE	job hazard evaluation
JICS	Joint Institute for Computational Sciences
LCFG	Laboratory for Comparative and Functional Genomics
LSS	Laboratory shift superintendent
MSDS	Materials Safety Data Sheet
NEPA	National Environmental Policy Act
NFPA	National Fire Protection Association
nusf	net usable square feet
O&M	operations and maintenance
OE	operating expense
ORCAS	Oak Ridge Center for Advanced Studies
ORNL	Oak Ridge National Laboratory
P&ID	piping and instrumentation diagram
P2	pollution prevention

PM	preventive maintenance
PRISM	Property Information System
PVC	polyvinylchloride
R&D	research and development
R2A2s	roles and responsibilities, authorities and accountabilities
RCC	Research Center Complex
RDF	Remote Distribution Facility
RHAC	research hazard analysis and control
RSS	research safety summary
ROB	Research Office Building
RSC	Research Support Center
S&M	surveillance and maintenance
SAMS	Space Allocation Management System
SBMS	Standards-Based Management System
SC	Office of Science
SME	subject-matter expert
TBD	to be determined
UPS	uninterruptible power supply
WBS	work breakdown structure

1. INTRODUCTION

Oak Ridge National Laboratory (ORNL) is in the process of upgrading its infrastructure to provide world-class facilities to accomplish its mission of scientific research. Revitalization of the ORNL campus is a key initiative of ORNL's prime contractor, UT-Battelle, LLC. The Facilities Revitalization Project (FRP) will replace and upgrade a wide variety of buildings and equipment, including specialized experimental laboratories, user facilities, hot cells, and a large complement of office space and associated utility systems. While conducting the FRP, significant coordinated efforts must take place for moves of personnel and systems; disposition of materials such as salvage, waste, and items for recycle or reuse; and transition of vacated space.

1.1 OVERALL FACILITIES REVITALIZATION PROJECT PLAN AND SCHEDULE

The FRP mission is to consolidate facilities at the main ORNL site, with the first phase of construction to be completed in five years. The facilities revitalization approach is to provide new, integrated facilities constructed in close proximity to the existing ORNL strategic research facilities utilizing a combination of U.S. Department of Energy (DOE), State of Tennessee, and private sector financial resources. These facilities will be constructed in an integrated campus layout that allows the free flow of scientific research among multidivisional teams, with consistent architectural themes regardless of construction funding source.

ORNL has developed a *Strategic Facilities Plan* (ORNL/TM-2000/238) that outlines a phased approach to the facilities revitalization effort, with primary emphasis in the first five years being establishment of the East Campus infrastructure, construction and refurbishment of critical mission-oriented research facilities, and consolidation of research staff from ORNL facilities at the Y-12 Complex. New facilities to be constructed as part of the East Campus development are depicted in Fig 1.1. Infrastructure projects that support East Campus development are shown in Fig. 1.2. ORNL main campus development is shown in Fig. 1.3 for the East Campus, Central Campus, and West Campus. Figure 1.4 shows the 7600 Area, and Fig 1.5 shows the 7900 Area for facilities to be constructed or renovated in Melton Valley.

1.2 FACILITIES REVITALIZATION PROJECT PLAN LAYOUT

The plan will be distributed in a manual or disk format to a controlled list. As revisions are made or sections developed, distributions will be made to this controlled distribution list. The layout of this plan is divided into the following sections and appendices:

Section 1. Introduction

This section is a summary of the overall ORNL FRP. The subsequent sections provide the consolidation planning of personnel and equipment for FRP development of each campus and the planning of campus development.

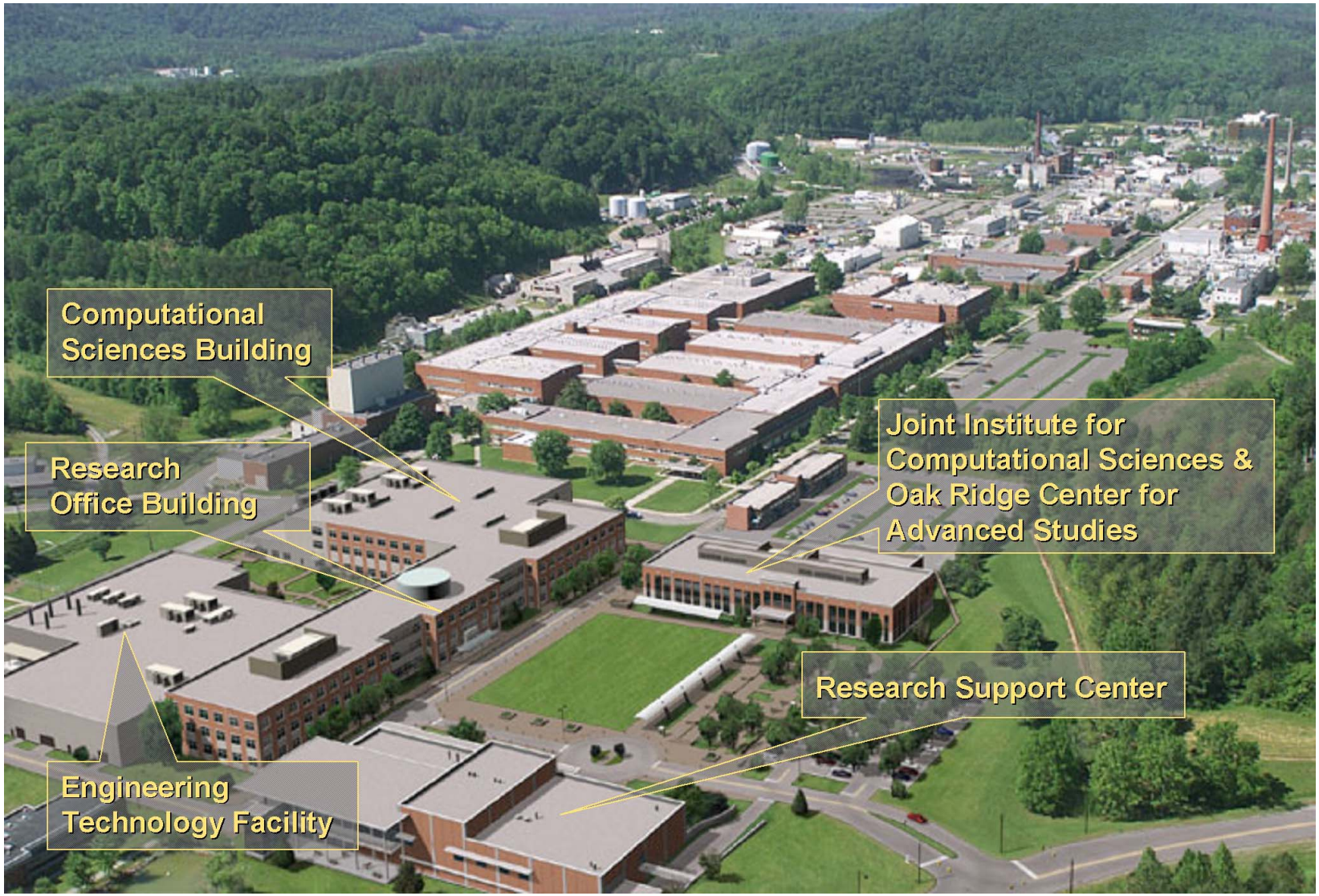


Fig. 1.1. ORNL East Campus.

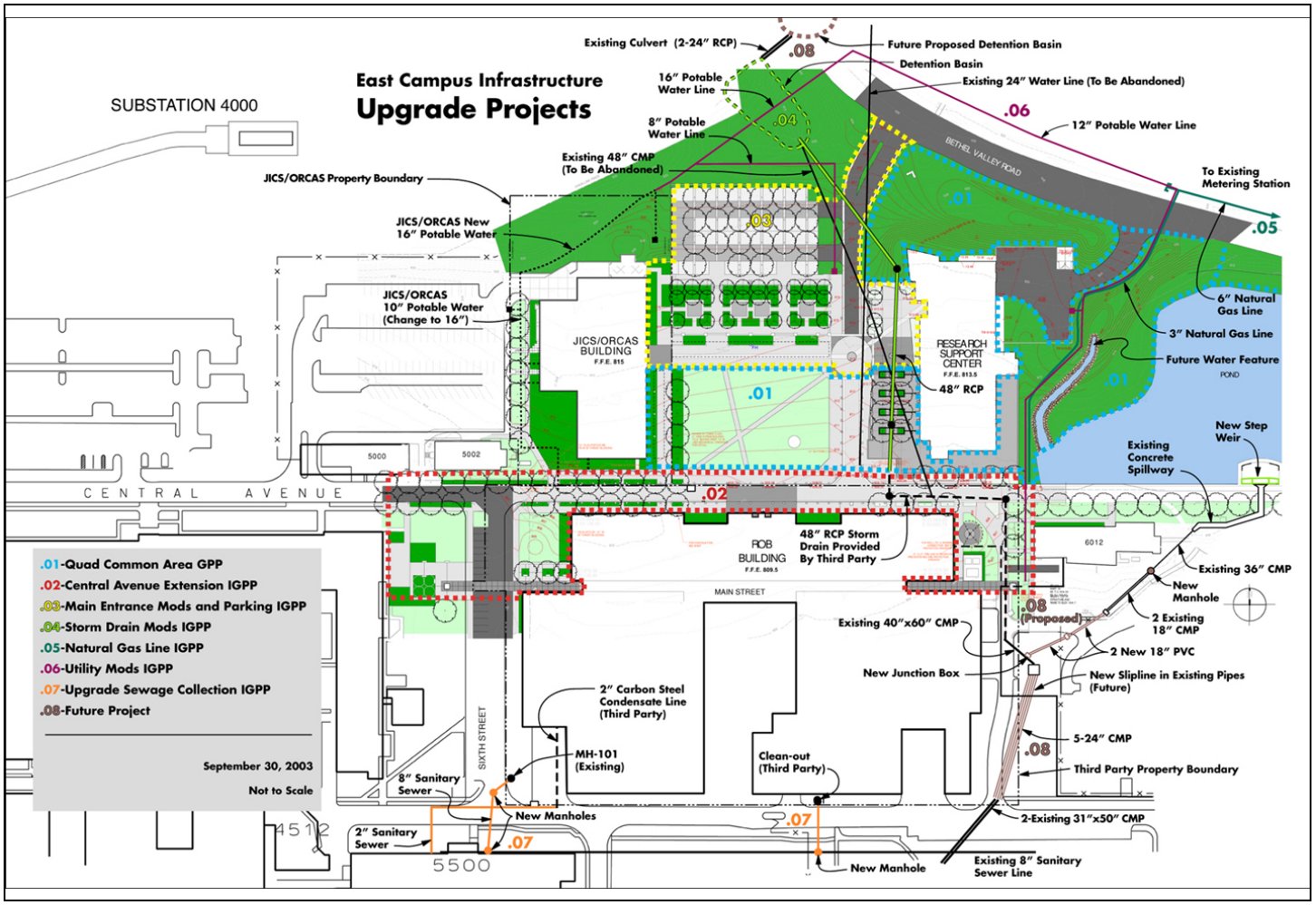


Fig. 1.2. East Campus Infrastructure Upgrade Projects.

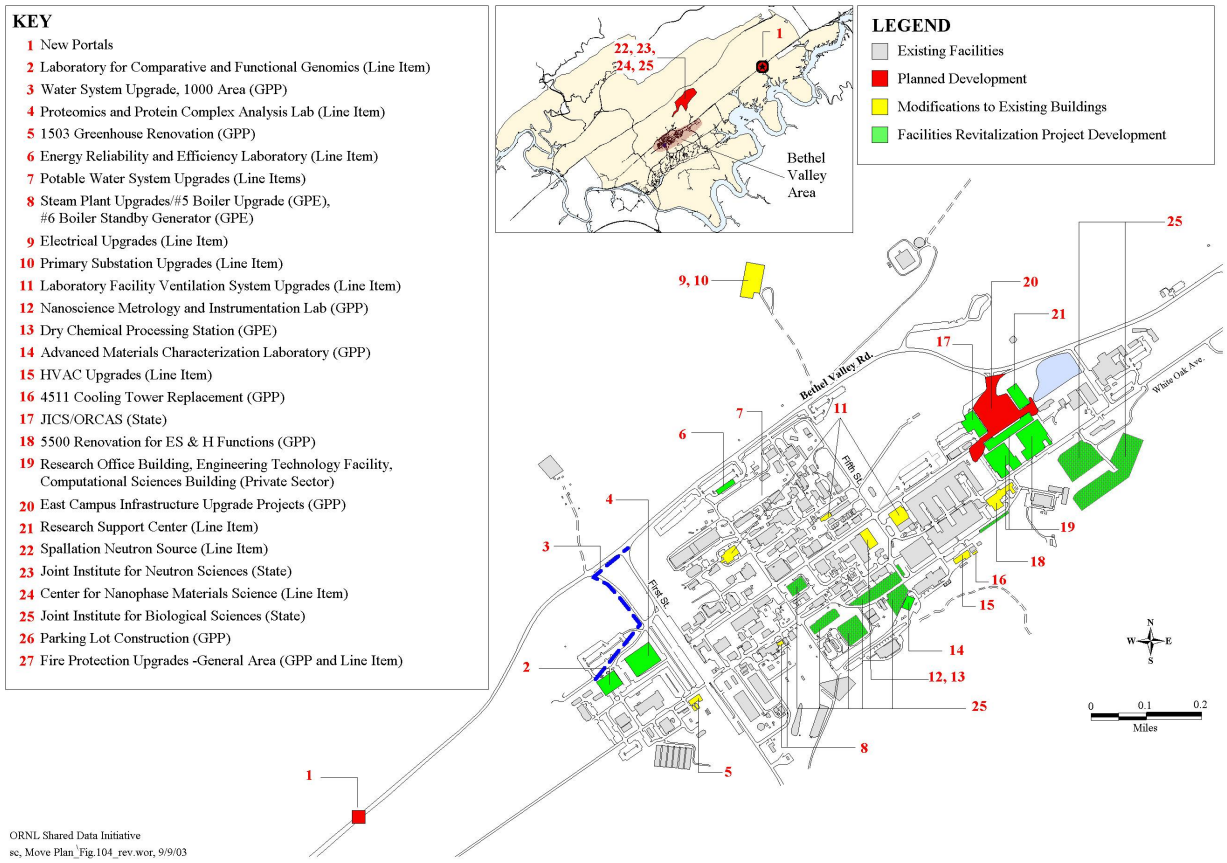


Fig. 1.3. ORNL Main Campus Projects.

Fig. 1.4. Planned New Facilities and Upgrades in the 7600 Area.

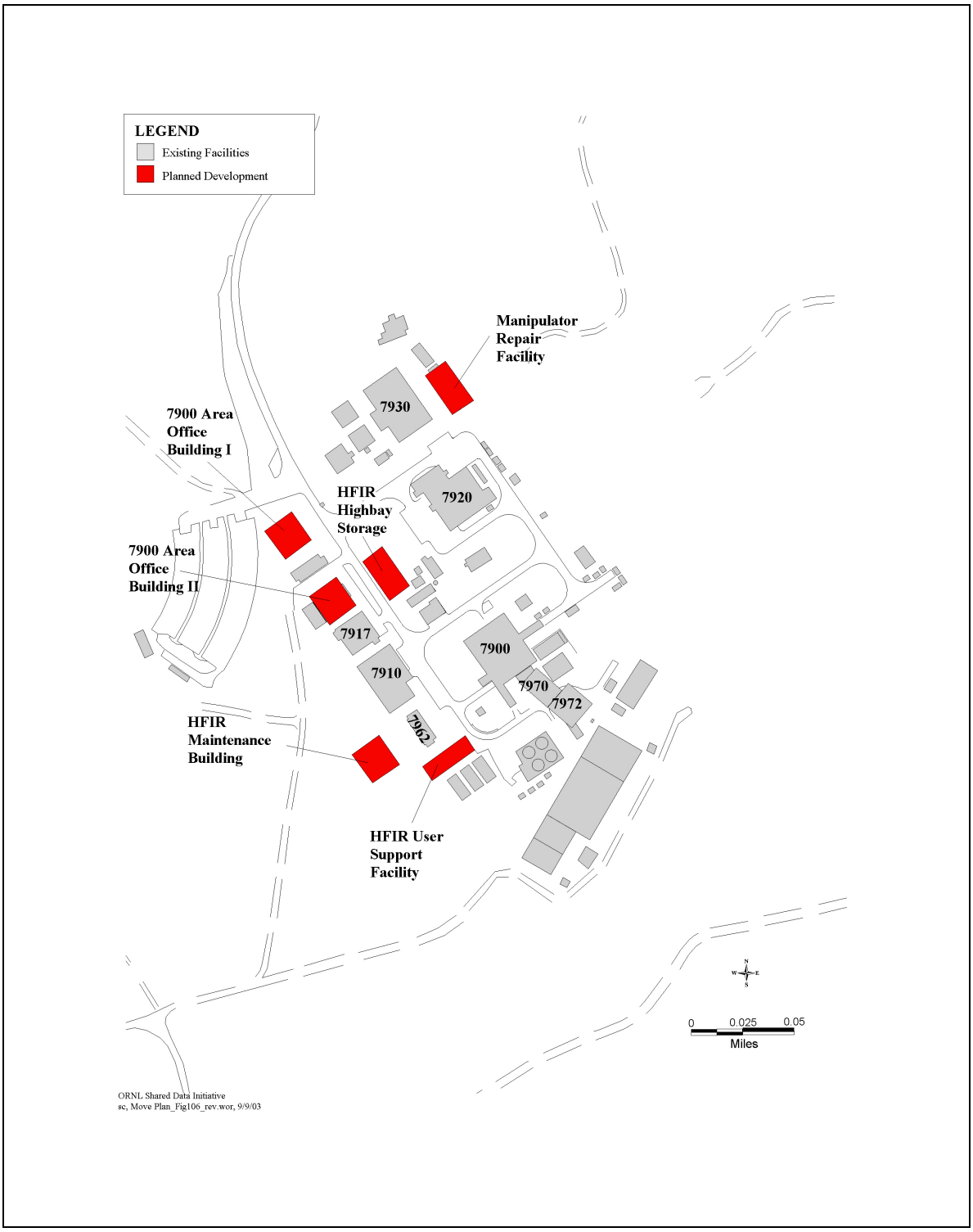


Fig. 1.5. Planned New Facilities in the 7900 Area.

Section 2. Organization, Roles, and Responsibilities

This section defines the FRP organization, organizational roles, and project team responsibilities.

Section 3. Work Scope

This section defines the FRP work scope in terms of a work breakdown structure (WBS) and dictionary. The current FRP work scope focuses on, but is not limited to, the ORNL East Campus. The work scope is divided into the following ten major elements:

- Facilities design and construction
- Network modifications—Complete FY 2003
- Personnel/equipment moves and renovations
- Main computer installation in the Computational Sciences Building (CSB)—Complete FY 2003
- New furniture
- Facilities maintenance and operations planning
- Security, fire, and environment, safety, and health (ES&H) technical integration
- Infrastructure upgrade projects
- Excess materials disposition
- Audio/visual equipment

Section 4. Schedule

This section provides an integrated schedule for the FRP work scope described in Section 3.

Section 5. Cost Estimates and Resource Requirements

This section provides cost estimates for the FRP work scope defined in Section 3 and craft resource requirements associated with personnel and laboratory moves and network tie-ins.

Appendices

The appendices provide detailed information referenced in the sections.

2. ORGANIZATION, ROLES, AND RESPONSIBILITIES

2.1 ORGANIZATIONAL STRUCTURE

The FRP organizational structure is established to facilitate the successful implementation and completion of projects for construction and renovations and the relocation of personnel and equipment. Figure 2.1 identifies the UT-Battelle organizational structure that directs and supports FRP functions. Figure 2.2 identifies specific functions and personnel assigned to the East Campus Integration Team..

2.2 ROLES AND RESPONSIBILITIES

The following roles and responsibilities are aligned with the positions identified in Figs. 2.1 and 2.2.

2.2.1 Facilities and Operations (F&O) Director

The F&O Director has overall responsibility for ORNL facilities and facilities operations. The F&O Director establishes the responsibilities and requirements for the FRP, approves plans and funding for FRP projects, appoints and directs the FRP Director and members of the ORNL Space Management Council, approves or obtains approval, as necessary, for issues submitted by the FRP Steering Committee and the ORNL Space Management Council.

2.2.1.1 Integrated Operations and Support Director

The Integrated Operations and Support Director has overall responsibility for measuring performance and integrating the FRP into site-wide plans.

2.2.1.2 Facilities Management Division Director

The Facilities Management Director has overall responsibility for managing and operating ORNL facilities. The Facilities Management Director accomplishes FRP facility-related work through individual complex managers and allocates and manages space through the ORNL Space Manager.

2.2.1.2.1 ORNL Space Manager

Space allocation and management is the responsibility of the ORNL Space Manager. The ORNL Space Manager maintains the Space Allocation Management System (SAMS) database. The system is used to identify allocation of space for space charges and tracking.

2.2.1.2.2 Complex Managers

ORNL Complex Managers have overall responsibility and authority for operating and maintaining facilities within their complex. Within FRP, the receiving Complex Manager is responsible for laboratory moves to facilities within their complex, as well as facility renovations necessary to accommodate personnel and laboratories.

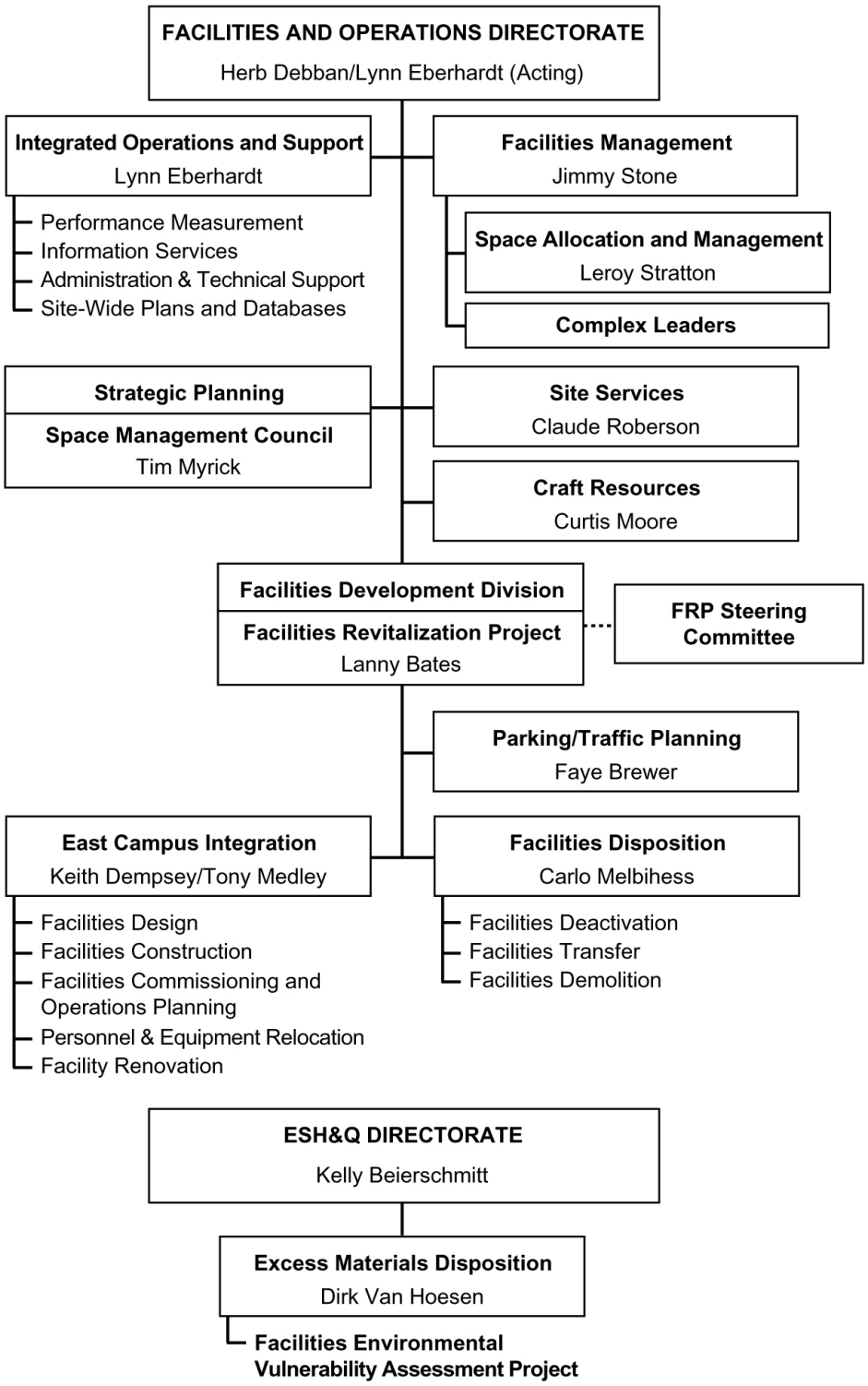


Fig. 2.1. FRP Organization Structure.

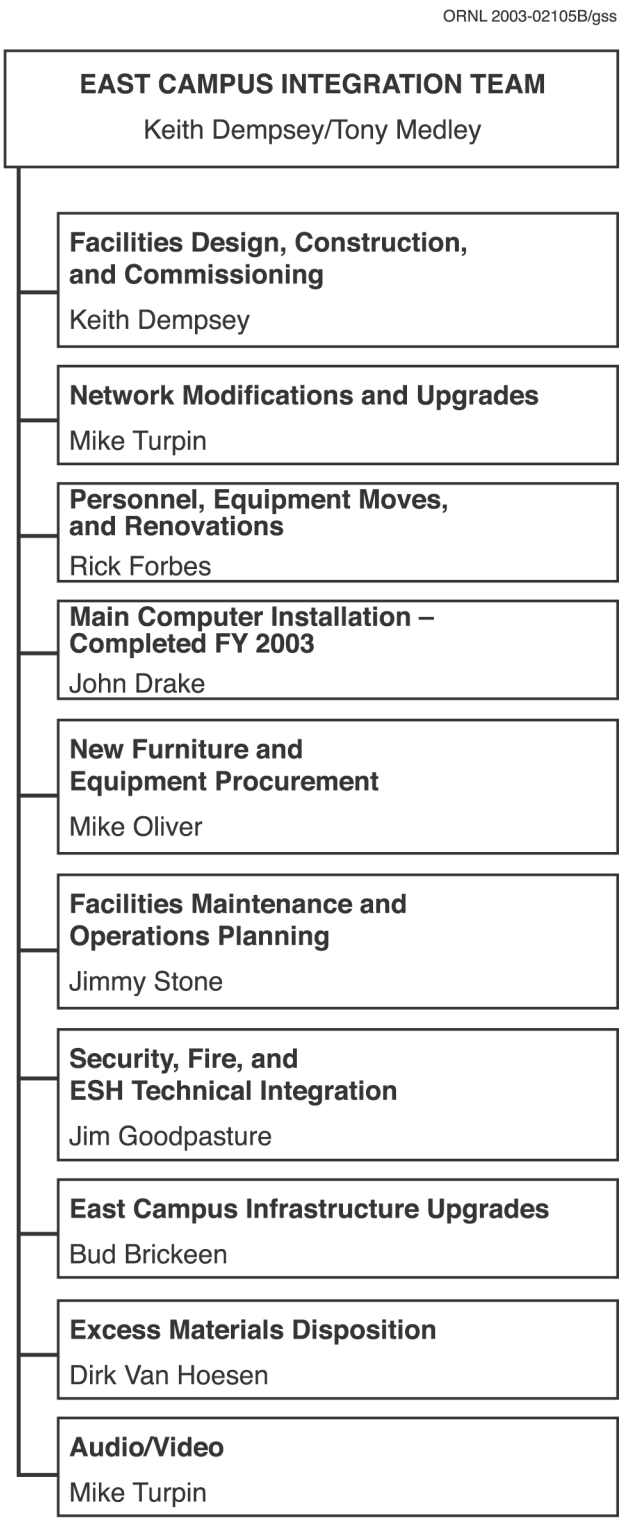


Fig. 2.2. East Campus Integration Team.

2.2.1.3 Strategic Planning/Space Management Council

The ORNL Space Management Council is chartered to provide space management planning and to make recommendations to the ORNL Associate Director of F&O and to the ORNL Leadership Team concerning issues that must be approved prior to implementation.

2.2.1.4 Site Services Director

The Site Services (Fabrication and Services) Director is responsible for planning and integrating FRP work performed by crafts.

2.2.1.5 Craft Resources Director

The Craft Resources Director is responsible for providing craft resources required to perform FRP work.

2.2.1.6 Facilities Development Division

2.2.1.6.1 Facilities Development Division/Facilities Revitalization Project Director

The FRP Director (FDD Director) has overall responsibility for planning and implementing the FRP. The FRP Director reports to the ORNL Associate Director of Facilities and Operations and interfaces with the ORNL FRP Steering Committee for guidance and approval of plans and schedules.

2.2.1.6.2 FRP Steering Committee

The FRP Steering Committee is chartered to provide routine UT-Battelle senior management and DOE oversight of new campus development. The FRP Steering Committee periodically reviews FRP plans and schedules to provide the FRP project team guidance on scope and direction.

2.2.1.6.3 FRP East Campus Integration Managers

The FRP East Campus Integration Managers have specific responsibilities for the integration and consolidation planning of the East Campus through the East Campus Integration Team, which is identified in Fig. 2.2.

2.2.1.6.4 FRP East Campus Integration Team

Members of the East Campus Integration Team (Fig. 2.2) have specific responsibilities for planning, implementation, tracking, and completing each assigned WBS element. The WBS elements are identified in Fig. 3.1, with specific descriptions and status provided in Section 3 of the plan.

2.2.1.6.5 ORNL Parking and Traffic Planning Manager

The ORNL Parking and Traffic Planning Manager has specific responsibility for the planning of parking lots, parking criteria, signage, construction project parking, and traffic flows.

2.2.1.6.6 ORNL Facilities Disposition Manager

The ORNL Facilities Disposition Manager is responsible for transferring excess facilities to Environment Management (EM) or another DOE contractor, for permanent shutdown, and/or demolition.

2.2.1.6.7 Excess Materials Disposition Manager

Following the removal of materials to meet space return criteria in a vacated facility, the remaining excess materials will be listed with plans for disposition. The Excess Materials Disposition Manager plans, schedules, and coordinates the removal of excess materials to final disposition, in preparation for placing a facility in cheap-to-keep mode for transfer or deactivation and demolition.

2.2.1.6.8 FRP Personnel and Equipment Relocation Team

The FRP Personnel and Equipment Relocation (PER) Team is responsible for the planning of personnel and equipment relocations and the planning, implementation, and completion of current facilities renovation projects. The following roles and responsibilities have been assigned:

- FRP PER Team Coordinator, Move Captains, and PER Team Members
  - Provide and implement planning for personnel and equipment relocations
  - Develop Personnel Move Data Sheets for individual relocations
  - Develop schedules and resource loading
  - Assure ES&H criteria are identified and implemented for personnel and equipment relocations
  - Manage renovations deemed construction under Davis-Bacon Act review
- Facilities Management Division Complex Managers
  - In concert with organizations occupying facilities, develop and initiate Facility Use Agreements (FUAs)
  - Manage all space through approved FUAs
  - Assist the PER Team to ensure accuracy of Personnel Move Data Sheets, schedules, and estimating resource requirements
  - Ensure that job hazard evaluations (JHEs) are developed and approved with input from all stakeholders
  - Manage relocations of personnel and equipment
  - Manage non-construction related renovations
- Facility and Operations Site Services Managers and Resource Managers
  - Provide craft personnel and resources to complete scheduled personnel and equipment relocations
  - Ensure that ES&H requirements are identified, planned, and implemented
- ES&H Subject-Matter Experts (SMEs)
  - Where appropriate, approve ES&H plans and special handling requirements
  - Interface with personnel performing the moves to ensure safe work practices
  - Assist in the development and approval of JHEs, waste management plans, and pollution prevention and recycling plans
  - Review procurement documents and provide field support

- Procurement and Legal
  - Secure necessary service contracts
  - Provide legal assistance in procurement contracts
- Service Contractors
  - Provide contracted services
  - Comply with all applicable ORNL ES&H requirements
- Affected Organizations
  - Interface with the PER Team and the Excess Materials Disposition Team to develop relocation plans, schedules, and data sheets
  - Communicate to the PER Team special scheduling requirements due to ongoing research
  - Perform functions agreed upon by the Personnel Move Data Sheets (e.g., preparation, moves, installations)
  - Interface with the PER Team to determine movement of equipment versus procurement of new equipment based on cost benefits
  - Ensure that only essential materials, supplies, and equipment are relocated
  - Support the PER Team and Excess Materials Disposition Team for the disposition of materials identified for salvage, recycle, or waste
  - Allocate identified resources required for implementation of the PER Plan
  - Provide requirements for renovation of personnel and laboratory space

3. WORK SCOPE

The work scope of the FRP is defined in Fig. 3.1, FRP Work Breakdown Structure (WBS) and the following WBS Dictionary sections.

3.1 FACILITIES DESIGN AND CONSTRUCTION (WBS 1.01)

Design and construction of new facilities in the East Campus area are an integral part of the *Strategic Facilities Plan* for revitalization of ORNL's research capabilities and supporting infrastructure. Consistent with DOE's approved *ORNL Institutional Plan*, new laboratories, supporting offices, and the necessary support facilities are planned for construction as part of an integrated new campus environment in the area north and east of the 4500N/S building complex (see Fig. 1.1). The new campus will include facilities constructed under standard DOE line item and general plant project (GPP) funds, institutional general plant project funds (IGPP) funds, and private sector and State of Tennessee funding sources. The overall goals of this Laboratory modernization initiative are to reduce the burdensome costs of maintaining the current inventory of 50+-year-old facilities, provide a safer environment for current staff, and ensure ORNL's ability to conduct world-class science in the twenty-first century.

3.1.1 Computational Sciences Building (Third Party) (WBS 1.01.01)—Complete FY 2003

The Computational Sciences Building (CSB) is the first of three buildings designed and constructed as a part of the third-party private development (see Fig. 1.1). The primary function of the CSB is to provide state-of-the-art housing for ORNL's evolving high-speed, high-performance computing capabilities. A second, equally important function is to provide Class "A" office space for the computing program personnel.

The facility has 137,400 ft^2 with approximately 98,348 net usable square feet (nusf) including 40,000 nusf of raised computer floor and approximately 42,000 nusf of office space, office support space, and special use space. The computer floor areas are open computer space with separate areas for computer laboratories, network support, and office space. The office space includes management suites, individual offices, conference rooms, storage, and copy centers.

The centerpiece of the CSB is a 40,000-nusf, world-class computing center. This center houses multiple large-scale computers simultaneously in two 20,000-nusf, climate-controlled rooms with one built above the other. The CSB is located on a portion of an approximately six-acre site on the ORNL campus east of Building 4500N in the old main parking lot (see Fig. 1.1).

Also included with the CSB is a Central Energy Plant that provides utility support to the other third-party buildings, the Engineering Technology Facility (ETF) and the Research Office Building (ROB). It provides hot and chilled water capacity for the Joint Institute for Computational Sciences (JICS)/Oak Ridge Center for Advanced Studies (ORCAS) and the Research Support Center (RSC).

Project start date: 8/01 Completion date: 9/03 (See Section 4.)

Project total estimated cost: $29,129,000 (See Section 5.)

3.1.2 Engineering Technology Facility (Third Party) (WBS 1.01.02)—Complete FY 2003

The Engineering Technology Facility (ETF) is the second of three buildings designed and constructed as a part of the third-party private development (see Fig. 1.1). The primary function of the ETF is to provide state-of-the-art housing for the Engineering Science and Technology Division and its research and test laboratories. The facility has 98,000 ft^2 with a minimum of 77,369 nusf of space. Of that amount, approximately 22,369 nusf are for laboratories, and 33,000 nusf are for Class "A" offices, office support, and special purpose space.

The laboratory space consists of 33 highly diverse engineering technology work areas. Each laboratory is unique in its utility and space requirements. State-of-the-art wet/dry research labs, clean rooms, and high-bay space will provide continued growth opportunities for this important research division. The office space includes management suites, individual offices, conference rooms, a future classified area, and administrative support areas.

The ETF is located on a portion of an approximately six-acre site, adjacent to the CSB and ROB, on the ORNL campus east of Building 4500N in the old main parking lot (see Fig. 1.1).

Project start date: 8/01 Completion date: 9/03 (See Section 4.)

Project total estimated cost: $26,852,000 (See Section 5.)

3.1.3 Research Office Building (Third Party) (WBS 1.01.03)—Complete FY 2003

The ROB is a 140,700 ft^2 building designed and constructed as a part of the third-party private development (see Fig 1.1). The ROB's primary function is to provide 87,158 nusf of Class "A" offices and support space for reproduction, photography, publishing, graphics, and the site mail processing center.

The facility provides space for consolidation of research and support staff from substandard space at ORNL and from various off-site leased buildings. Approximately 450 staff will be housed in this office-only building, with approximately 25% of that space reserved for staff from the 4500N and 4500S complex who will be temporarily dislocated from their offices during the multiyear laboratory rehabilitation.

The ROB is located on a portion of an approximately six-acre site, adjacent to the CSB and ETF, on the ORNL campus east of Building 4500N in the old main parking lot (see Fig. 1.1).

Project start date: 8/01 Completion date: 9/03 (See Section 4.)

Project total estimated cost: $22,653,000 (See Section 5.)

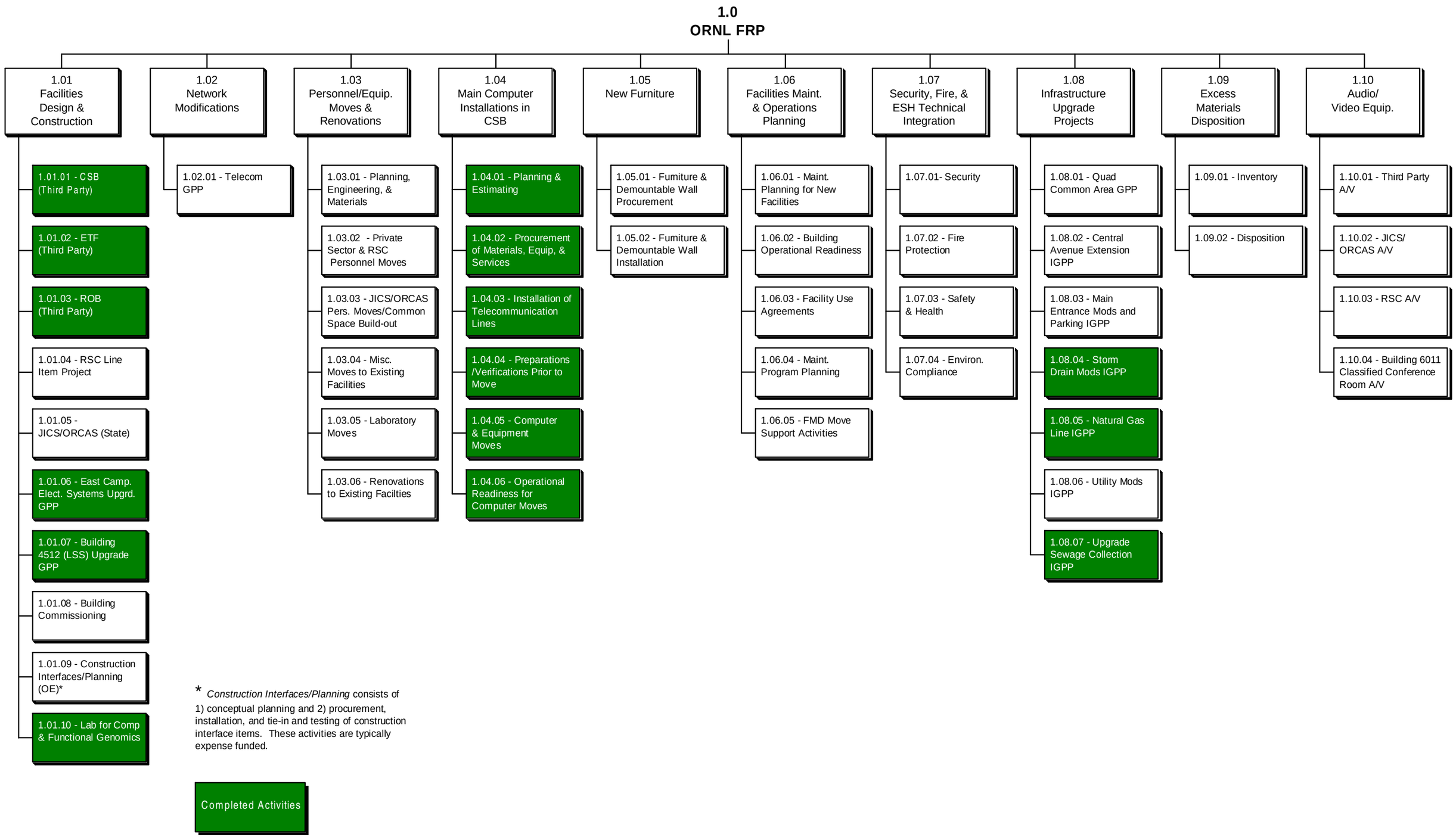


Fig. 3.1. ORNL Facilities Revitalization Project (FRP) Work Breakdown Structure

3.1.4 Research Support Center Line Item (WBS 1.01.04)

This project is the design and construction of the RSC as a DOE line item project. The RSC will consist of a new multistory, multipurpose building of approximately 50,000 ft^2. It will be located north of the development complex (see Fig. 1.1).

This building is an attractive state-of-the-art facility with easy visitor access, reflective of the Laboratory's stature and as functionally flexible as possible. It includes a conference center, a cafeteria, a visitor reception and control area, and office space for support staff.

Project start date: 4/01 Completion date: 8/04 (See Section 4.)

Project total estimated cost: $16,100,000 (See Section 5.)

3.1.5 JICS/ORCAS (State) (WBS 1.01.05)

In support of the broad research mission of ORNL and its core university partners (led by the University of Tennessee), the State of Tennessee designed and is constructing the JICS/ORCAS. The JICS/ORCAS is a state-of-the-art research and distance learning center at the ORNL site. The purpose of the JICS is to provide access to ORNL's unique high-performance computers through direct high-speed links to those systems, availability of fully outfitted work stations and office space, and ease of collaboration with ORNL staff and resources. The ORCAS, in adjacent companion space, builds upon the computational resources of the JICS by providing the following:

- Space and facilities to house multidiscipline study teams that will address broad national and international technical and scientific issues
- Workshop and symposium space and information networks to encourage broad collaboration of research staff from ORNL, associated and invited university staff, and industry researchers
- Local and distant learning space and facilities to promote educational interests of the state university system, the ORNL core universities, ORNL staff, and other national and international learning centers

The JICS/ORCAS facility is designed as a two-story space- and energy-efficient building of approximately 52,000 ft^2, situated on approximately 1.7 acres of land in the East Campus area of ORNL (Fig. 1.1). The facility design is oriented around several key features: (1) a raised floor computer center laboratory, (2) a large lecture hall, (3) a specially equipped distance learning center, (4) four self-contained incubator suites for computer-based collaborations, and (5) four team suites for multidisciplinary research. These primary research and education areas are supported by an array of Class "A" offices for the program director, staff, and students; a visitor reception area; lounge, kitchen and vending areas; an information center; and conference rooms and associated specialized support space and equipment.

Because of the multidisciplinary, interactive nature of the JICS/ORCAS mission, the facility will require a large array of specialized equipment and network capabilities. High-speed, large-bandwidth computer and network cabling and connectivity equipment is included in the basic facility design, along with associated raised floors

and special cooling/ventilation capabilities in the computer center laboratory and incubator suites. Similarly, for the lecture hall, distance learning center, and research suites, state-of-the-art audio/video and wireless communications equipment and supporting workstations are provided.

The JICS/ORCAS is located north of the CSB on the ORNL campus east of Building 4500N in the old main parking lot (see Fig. 1.1). JICS/ORCAS will be numbered Building 5100.

Project Start date: 7/01 Completion date: 2/04 (See Section 4.)

Project total estimated cost: $10,000,000 (See Section 5.)

3.1.6 East Campus Electrical Systems Upgrade (WBS 1.01.06)—Complete FY 2003

This landlord-funded GPP consisted of design, procurement, and construction work to provide electrical service to the new facilities to be located in the East Campus area. This GPP extended the existing 13.8-kV electrical feeders #224 and #254 from Substation 4000 into the new East Campus area for the ETF and CSB transformers and for Switches #1 and #2 and purchased four new switches for the East Campus area (installation of the switches was by East Campus construction contractors).

The new electrical services run underground in a concrete duct bank and are placed in an established utility easement that is flexible enough to provide for future expansion within the area without requiring additional utility relocations.

Project start date: 3/01 Completion date: 3/03 (See Section 4.)

Project total estimated cost: $765,000 (See Section 5.)

3.1.7 Building 4512 (LSS) Upgrade IGPP (WBS 1.01.07)—Complete FY 2003

This institutional general plant project (IGPP) consisted of design, procurement, and construction/installation work to upgrade Building 4512, Laboratory Emergency Response Center, to accommodate all the new emergency response inputs from the new East Campus development facilities. This project modified the Building 4512 interior as necessary to accommodate the precision air conditioning units and new termination racks and equipment. It upgraded Building 4512 HVAC with two precision air conditioning units to better cool the active electronics.

Project start date: 8/02 Completion date: 4/03 (See Section 4.)

Project total estimated cost: $400,000 (See Section 5.)

3.1.8 Building Commissioning (WBS 1.01.08)

This activity provides commissioning services for the JICS/ORCAS and third-party facilities at ORNL to ensure project performance requirements and functional needs are met. The services address requirements to meet the fundamental Leadership in Environmental and Energy Design (LEED™) while commissioning the JICS/ORCAS

Building and the third-party buildings that include the CSB, Central Energy Plant, ETF, and ROB.

Commissioning services include

- Working with the project team to identify performance requirements, construction quality, and value engineering opportunities.
- Reviewing the design for such features as energy efficiency, operability, maintainability, and LEED™ compliance.
- Observing and reviewing construction activities and installation practices that will affect maintenance, operation, or long-term performance of the building systems.
- Verifying building systems performance from a component to system to intra-system approach to ensure that commissioned building systems operate and perform as intended and required by the building functionality during final compliance reviews.
- Coordinating commissioning activities and close-out documentation with UT-Battelle, LLC, the UT-Battelle Development Corporation, and each project architect/engineer (A/E) and construction contractor.

Third-party project start date: 7/02 Completion date: 6/04 (See Section 4.)

Third-party project total estimated cost: $255,000 (See Section 5.)

JICS/ORCAS project start date: 8/01 Completion date: 3/04 (See Section 4.)

Project total estimated cost: $135,000 (Not funded through FRP in FY 2004.)

3.1.9 Construction Interfaces/Planning (WBS 1.01.09)

This activity included UT-Battelle construction interface activities required to procure and install materials and equipment as required by individual project contracts and agreements. This task also included UT-Battelle construction interface activities required to tie in and test plant utilities. The following activities were performed for the third-party buildings:

- Procurement of
  - Fume hoods
  - Category 6 telecommunication cable
  - Casework
  - Window blinds
  - Premanufactured clean rooms (for ETF and CSB)
  - Liebert precision A/C units (3)
  - 2.5-ton monorail hoist system
  - Laser curtains
- Installation/delivery of
  - Delivery of Room 4.2.1 bed plate to construction site
  - Casework
  - Window blinds
  - Premanufactured ETF and CSB clean rooms

- — 2.5-ton monorail hoist
- — Laser curtains
- — Civil and mechanical tie-in activities
- — Electrical/instrumentation tie-in and test activities

The following construction interface activities have been identified for the JICS/ORCAS:

- Procurement of
  - — Window blinds
  - — Door locks and cores
  - — Public address system
  - — Energy Star metering equipment
  - — Network tie-in equipment
- Installation of
  - — Window blinds
  - — Door locks and cores
  - — Public address system
  - — Energy Star metering equipment
  - — Network tie-in equipment
  - — Civil and mechanical tie-in activities
  - — Electrical/instrumentation tie-in and test activities

Planning activities needed to support East Campus development work are also included in this task.

Project start date: 2/01 Completion date: 2/04 (See Section 4.)

Project total estimated cost: $1,795,000 (See Section 5—FY 2004 activities not funded through FRP.)

3.1.10 Lab for Computational and Functional Genomics (OE) (WBS 1.01.10)—Complete FY 2003

The Laboratory for Comparative and Functional Genomics (LCFG) provides a modern gene function research facility, protects the genetic mutant mouse lines created during the past 50 years, and supports the DOE research programs. It replaces the deteriorated facility at the Y-12 National Security Complex with a new one on the ORNL Life Sciences Complex.

The LCFG provides cost-effective housing for the experimental animals that are vital to the next phase of the genome program research facility and is designed for efficient utilization of space, energy efficiency, and easy maintenance. The building accommodates the entire DOE live mutant mouse colony in Oak Ridge, which has been reduced in size by using cryogenic preservation technology. The facility is designed to permit the establishment of specific pathogen-free colonies of mice. It is a single-story, state-of-the-science research facility of approximately 36,000 ft^2 comprising four functional areas: support, animal housing, quarantine, and laboratory support. Site preparation consisted of clearing, grading, and excavating for the new structure; extension of access streets to the site; and landscaping and seeding. Outside

utility construction consisted of extending the required utilities from the building to the closest adequately sized supply source. Utilities include steam, sanitary sewer, potable and fire protection water, and electricity. Standard equipment includes such items as animal cages, watering equipment, environmental monitoring and control equipment, and other animal care equipment.

Project start date: 4/01 Completion date: 9/03 (See Section 4.)

Project total estimated cost: $ 13,900,000 (See Section 5.)

3.2 NETWORK MODIFICATIONS (WBS 1.02)

Network modifications are required to connect the new East Campus development facilities to the ORNL communication backbone in Building 4500N and the emergency response system in Building 4512.

3.2.1 Telecommunications GPP (WBS 1.02.01)

This landlord-funded GPP provides for design, procurement, and installation of telecommunications cabling and equipment required to support the development of the ORNL East Campus area. The telecommunications cabling is routed underground from Building 4500N, Central Office, and Building 4512, Laboratory Emergency Response Center, to the new East Campus.

In addition, this project designed and constructed additional pathways in the form of new manholes and underground telecommunication duct banks from Building 4512 to the East Campus area to serve present and future telecommunication needs. The project also provides final termination, tie-ins, and testing of telecommunications at the third-party buildings. During FY 2003, telecommunication cables for the RSC and JICS/ORCAS were pulled to an adjacent manhole and left coiled for future tie-ins. In FY 2004, the project will perform telecommunication tie-ins as the JICS/ORCAS and RSC are ready.

The project also designed, procured, and installed new telephone and network distribution equipment in the third-party buildings and JICS/ORCAS. Security servers in Building 4512 are relocated to a security room on the second floor of the CSB, and a new alarm system server has been purchased and installed in the CSB security room.

Project start date: 8/02 Completion date: 3/04 (See Section 4.)

Project total estimated cost: $2,200,000 (See Section 5.)

3.3 PERSONNEL/EQUIPMENT MOVES AND RENOVATIONS (WBS 1.03)

3.3.1 Consolidation Strategy

The Personnel and Equipment Consolidation Team Strategy is to ensure a smooth and cost effective transition of office, laboratory, and support space, resulting in minimized business and research and development (R&D) interruption. The success

of the accomplishment of this goal will be to maintain high customer satisfaction concerning planning, scheduling, and implementation of moves resulting from the Facilities Revitalization Project.

3.3.2 Consolidation Schedule

3.3.2.1 Phase I Move Planning and Scheduling—Complete FY 2002

Phase I is the definition of scope that is contained in this document and scheduling as identified in Section 4. This phase defines the tasks required to complete the scope of the FRP consolidation, identifies and schedules moves within the funding years, and identifies the funding resources needed to implement and complete the consolidation activities.

The moves are primarily office moves and laboratory moves with supporting shops and storage areas from existing facilities at the ORNL main site, the Y-12 Complex, and leased facilities. Relocation of personnel and equipment will be made to new facilities, renovated facilities, and existing facilities not requiring renovation. Some miscellaneous moves such as libraries and special-purpose rooms are scheduled for relocation. Section 4 provides the schedules for moves based on substantial completion of the Private Sector Facilities and other available facility move-in dates. The following is a listing of personnel relocations that are currently in the schedule:

- Energy Efficiencies Program
- Computing Sciences and Mathematics
- Networking and Computing Technologies
- Nuclear Science and Technology
- Computing Sciences and Engineering
- Computing and Computational Sciences
- Life Sciences
- Physics
- Laboratory Protection
- Metals and Ceramics
- Fusion Energy
- Technology Transfer
- Environmental Protection and Waste Services
- Environmental Sciences
- Business Information Systems
- Nuclear Technologies Program
- Facilities and Operations
- Legal
- Engineering Sciences and Technology
- University of Tennessee

Additional spaces other than personnel offices, libraries, and laboratories will be moved. Most of these spaces are storage or old shop spaces where only a portion of the material will be moved.

Laboratory relocations are taken from approximately 129 currently used laboratory spaces and consolidated within laboratories at the following locations:

- Engineering Technology Facility (Private Sector)
  - Nuclear Science and Technology
    - Thermal Hydraulics Laboratory—Complete
    - Capsule Assembly Laboratory—Complete
    - Flow Test Loop—Complete
  - Engineering Science and Technology
    - Air Craft Lab—Complete (stored at OSTI)
  - Engineering Science Technology
    - Advanced Photonics Laboratory
    - Advanced Thermal Hydraulics Laboratories
    - Diagnostics/Special Projects Equipment
    - Diamond Turning Equipment
    - Insulation Laboratory
    - MEMS/NEMS Laboratories
    - Environmental Effects Laboratory
    - Ion Milling Miscellaneous Equipment
    - Clean Room Laboratories
    - Hybrid Lighting Laboratory
    - Photonics Laboratory
    - Technology Information Center and Records Center
    - Optics Laboratories
    - Sensors and Electronics Laboratory
  - Metals and Ceramics
    - Composite Assembly Laboratory
    - Composite Stress Laboratory
    - Composite Processing Laboratory
    - Composite Characterization Laboratory
    - Composite Storage
    - Concrete Testing Laboratory
  - Fusion Energy
    - RF-3D Scanner Laboratory
    - Plasma Process Laboratory
    - RF Benchmarking and Remaining FED Laboratories
    - Pellet Laboratory
  - Quality Services
    - Quality Control Laboratory
- Computing Sciences Building (Private Sector)
  - Computing and Computational Sciences
    - Supercomputers—R&D—Complete
    - Computer Science Lab—Complete
    - Geographical Information Systems—Complete FY 2003
    - Robotics Lab—Complete
    - Audio Lab—Complete
    - Video Lab—Complete
    - VIZ Lab—Complete

        - CAVE Lab—Complete
        - Optical Lab C-D108—Complete
        - Optical Lab C-D224—Complete
        - Optical Lab C-D228—Complete
        - Optical Lab C-D230—Complete
        - Modeling and Simulation Lab—Complete
        - Biomolecular Programmed Assembly Lab—Complete
        - Nanofabrication Lab—Complete
        - Computer Labs—Business Systems—Complete
- Research Office Building
    - Nuclear Science and Technology
        - Nuclear Simulating Lab—Complete
        - Scale Training Lab—Complete
- Building 3500
    - Metals and Ceramics
        - Analog/Digital Systems Laboratories
- Building 4500S
    - Life Sciences Division
        - Structural Biology Lab
- Building 4508
    - Metals and Ceramics
        - Mechanical Properties Laboratory—Complete
- Building 5500
    - Isotope Production Wet Chemistry Laboratory
- Building 5510
    - Nuclear Science and Technology
        - Isotope Production Main Laboratory—Complete
- Building 4500N
    - Condensed Matter Sciences Division—Complete
- Laboratory for Comparative and Functional Genomics
    - Life Sciences
        - Comparative and Functional Genomics
        - Buildings 1061/1059—Complete
- Building 6010
    - Physics Division
        - Physics Labs—Complete
- 7600 Area Multiprogram Highbay
    - Fusion Energy
        - Fusion Energy Laboratories

Phase I of planning also documents a listing of major equipment that has been and will be relocated. Engineering Laboratory Move Packages for each of the spaces to be occupied by laboratories have been and are being developed to ensure the operational readiness of laboratory equipment and processes. During Phase I, engineering packages have been developed for the Nuclear Science and Technology Division laboratories that are being relocated to the Engineering Technology Facility in the private sector constructed facilities. The engineering Laboratory Move Packages include:

- detailed descriptions of the engineered layout for the new or renovated laboratories to be occupied;
- a listing of equipment and materials to be moved from laboratories being vacated;
- requirements for equipment and services for each of the laboratories;
- arrangement drawings for functional layouts, access requirements, casework, equipment being relocated, and new equipment being procured; and
- installation and connection drawings for mounting requirements, electrical and mechanical connections and interconnections, and utility connects.

3.3.2.2 Phase II Move Planning and Scheduling—Complete FY 2003

Phase II included the verification of estimates and schedules and the development of Personnel Move Data Sheets (see Appendix B) for office moves and Laboratory Move Packages (see Appendix C). Personnel Move Data Sheets and Laboratory Move Packages were provided to move crews and personnel being relocated to identify the scope of individual moves and to establish fixed move dates and other schedules related to the move of a specific office, laboratory, or support space. Service subcontract providers were identified during this phase for identified vendor services. Initial move schedules and resource and cost estimates were revised to reflect Personnel Move Data Sheet and Laboratory Move Package development findings.

3.3.2.3 Phase III Move Planning and Scheduling—Complete FY 2003

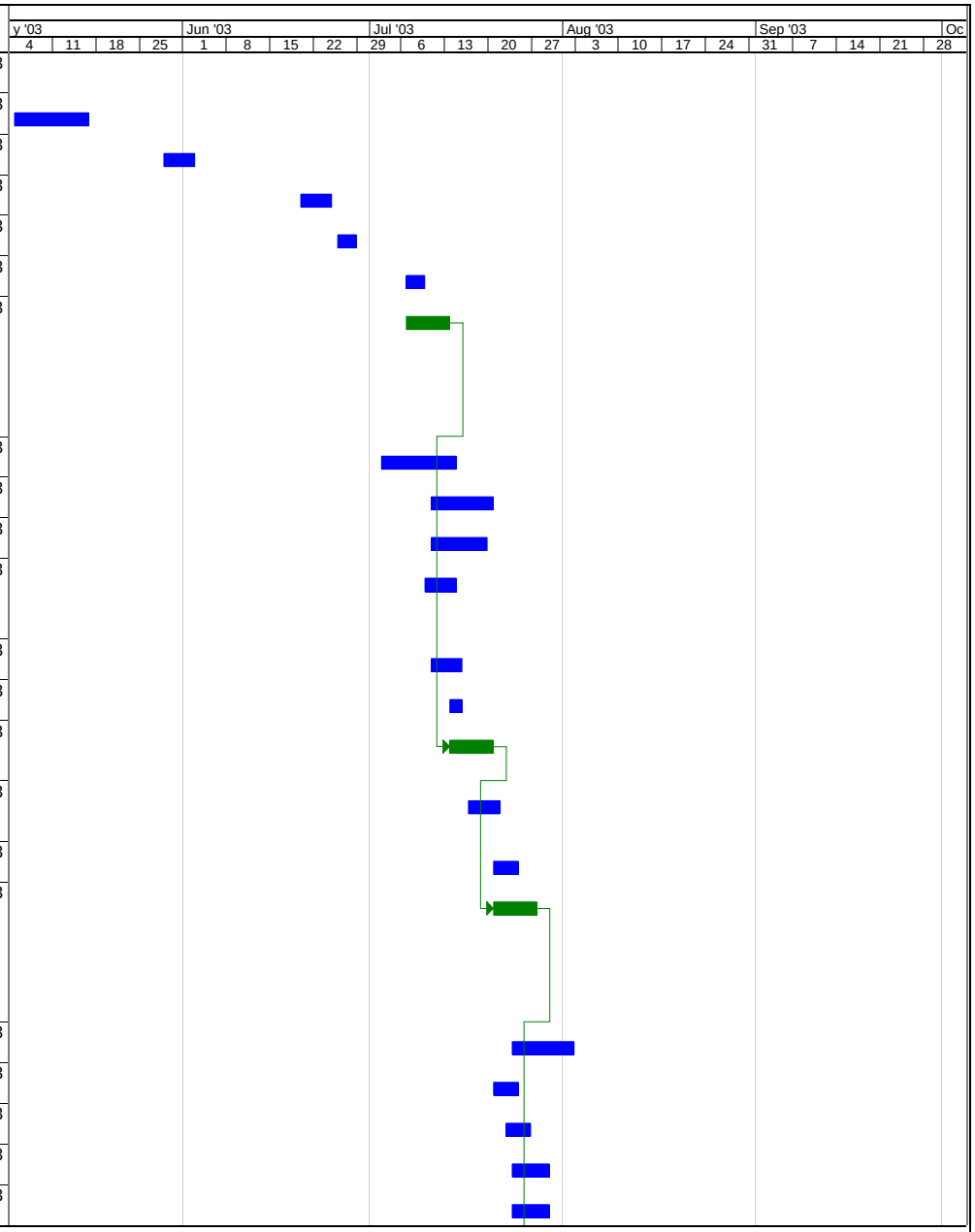
Phase III finalized the scope, resource requirements, and schedules during May and June of 2003. Other activities included finalization of secure funding for FY 2003 and FY 2004 service contracts, procurement of move materials and signage, and the development of environmental, safety, and health plans (e.g., lift plans, JHEs, Service Contractor ES&H Plans, ESH&Q Plans in Phase IV). Detailed plans and schedules for personnel and laboratory moves are included in Section 4. Summary schedules for FY 2003 personnel and laboratory moves are provided in Figs. 3.2 and 3.3, respectively.

3.3.2.4 Phase IV Implement and Maintain Move Plans and Schedules

Phase IV is the implementation of consolidation plans and schedules beginning in February 2002. Section 4 identifies the current move locations and scheduled start and completion dates. Summary schedules for FY 2004 personnel and laboratory moves are provided in Figs. 3.4 and 3.5, respectively.

Planning and implementation of personnel and equipment moves are the responsibility of the FRP Consolidation Team. Comprehensive planning for the moves is documented in Appendix A of this plan. Sections 4 and 5 also provide consolidation schedules and cost/resource estimates. East Campus relocation includes personnel and equipment from the Y-12 Complex, existing ORNL facilities, and off-site leased facilities. Relocation of personnel and equipment has been and will continue to be to newly constructed facilities, renovated facilities, and vacated space in existing facilities. Essential to the consolidation coordination is the involvement of the organizations impacted by the move and SMEs assisting in the plan development. The move process is separated into the following move activities: (1) move preparation,

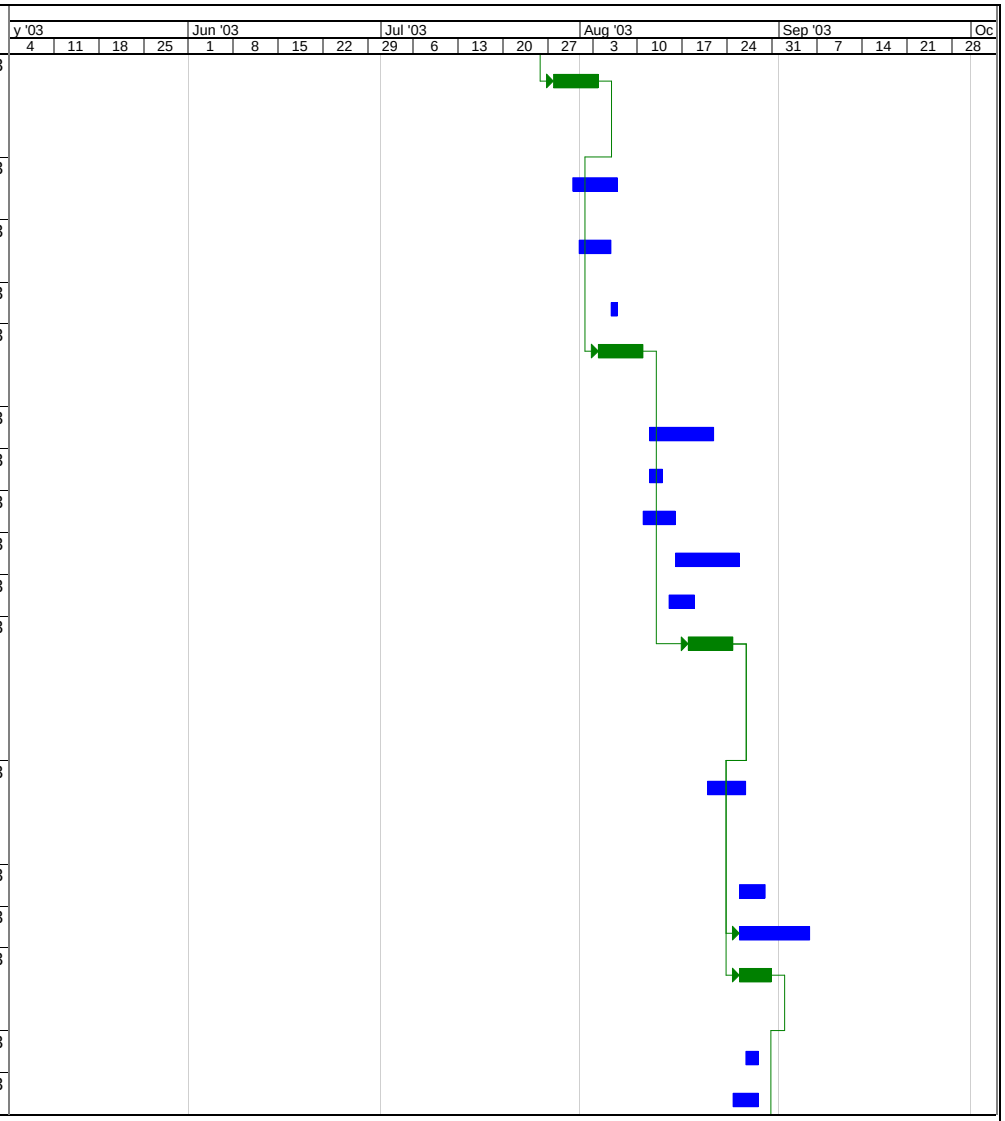
Task Name	Move ID Nos.	Spaces	Duration	Start	Finish	Physical Move Start
Move Furniture from 5500 to Salvage	SALVAGE-X094-5500	0	10 days	3/17/03	3/28/03	3/17/03
Move Furniture from 5510 to Salvage	SALVAGE-X094-5510	0	10 days	5/5/03	5/16/03	5/5/03
Move CSMD from 3546 to 2CSB	2CSBN-X012-3546	0	3 days	5/29/03	6/2/03	6/2/03
Move AG Node From 7601 to 3CSBN	3CSBN-X099-7601	0	3 days	6/20/03	6/24/03	6/24/03
Move NCTD from 7601 to 3CSBN	3CSBN-X054-7601	0	3 days	6/26/03	6/28/03	6/28/03
Move LSD Files from 9210 Rm 259 to 7601M & 7603	7601M-X001-9210 7603-X001-9210	0	3 days	7/7/03	7/9/03	7/8/03
Move CSMD, NTCD, & NSTD Personnel to CSB 3rd Floor North & 4500N	3CSBN-X012-3546 3CSBN-X054-1062 3CSBN-X054-1505 3CSBN-X054-3546 3CSBN-X054-4500S 3CSBN-X054-4500N 3CSBN-X054-7601	93	7 days	7/7/03	7/13/03	7/10/03
Move Furniture from 1062 to SALVAGE	SALVAGE-X054-1062	0	10 days	7/3/03	7/14/03	7/11/03
Move Furniture from 3546 to SALVAGE	SALVAGE-X094-3546	0	10 days	7/11/03	7/20/03	7/11/03
Move Furniture from 7601 to SALVAGE	SALVAGE-X094-7601	0	9 days	7/11/03	7/19/03	7/11/03
Move NCTD Computers & Equip. from 1062, 3546, 7601 to 3CSB	3CSBN-X054-1062 3CSBX-X054-3546 3CSBN-X054-7601	0	5 days	7/10/03	7/14/03	7/14/03
Move M&CD from 9204-1 to 4500S	4500S-X011-92041	3	5 days	7/11/03	7/15/03	7/15/03
Move CSMD AG Node from 3546 to 2CSB	2CSBX-X012-3546	0	2 days	7/14/03	7/15/03	7/15/03
Move NSTD Personnel to CSB 3rd Floor South	3CSBS-X094-1099C 3CSBS-X094-1060C 3CSBS-X094-9114-1	38	7 days	7/14/03	7/20/03	7/17/03
Move NSTD from 9114 & 113UV to 3CSB	3CSBS-X094-9114-2 3CSBS-X094-113UV	1	5 days	7/17/03	7/21/03	7/21/03
Move ESD from 1059 to 1062	1062-X042-1059 1062-X042-1062	13	4 days	7/21/03	7/24/03	7/23/03
Move CSMD, LPD, & CSED Personnel to CSB 2nd Floor	2CSBX-X012-3546 2CSBX-X012-6025 2CSBX-X012-6010 2CSBX-X012-6012 2CSBX-X107-4500N 2CSBX-X107-6012	51	7 days	7/21/03	7/27/03	7/24/03
Move Furniture from 1059 to SALVAGE	SALVAGE-X042-1059	0	10 days	7/24/03	8/2/03	7/24/03
Move CSMD Telecom Rm. Library from 6012 to 2CSB	2CSBX-X099-6012	0	4 days	7/21/03	7/24/03	7/24/03
Move LPD from 4512 to 2CSB	2CSBX-X026-4512	1	4 days	7/23/03	7/26/03	7/24/03
Move M&CD from 9204-1 to 4515	4515-X011-92041	3	6 days	7/24/03	7/29/03	7/29/03
Move CSED from NTRC to 2CSB	2CSBX-X107-NTRC	1	6 days	7/24/03	7/29/03	7/29/03



10/24/03 Page 1 UTB Moves Vendor Moves

Fig. 3.2. FY 2003 Summary Personnel Move Schedule

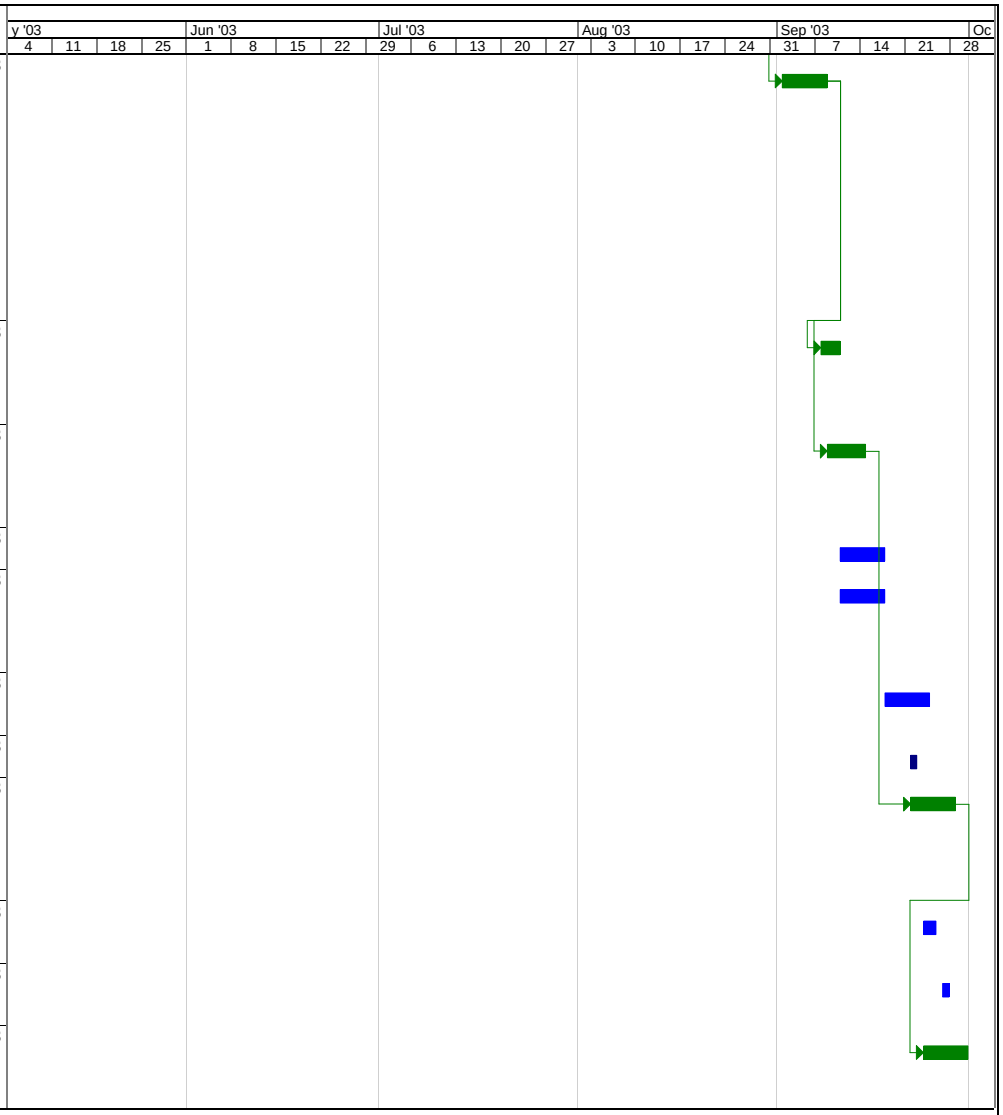
Task Name	Move ID Nos.	Spaces	Duration	Start	Finish	Physical Move Start
Move CSMD Personnel to CSB 1st Floor	1CSBX-X012-3546 1CSBX-X012-4500N 1CSBX-X012-4500S 1CSBX-X012-6010 1CSBX-X012-6025	36	7 days	7/28/03	8/3/03	7/31/03
Move CSMD from 3546 to 2CSB and Move LSD from 9210 to 1059 & 1061	1059-X001-9210 1061-X001-9210	30	7 days	7/31/03	8/6/03	8/4/03
Move CSMD from 6012 to 1CSB and Move F&O from 2652B to 1CSB	1CSBX-X089-2652B	2	5 days	8/1/03	8/5/03	8/5/03
Move NSTD File Cabinet from 6011 Rm 219 to 3ROBE	3ROBE-X094-6011	0	1 day	8/6/03	8/6/03	8/6/03
Move NSTD Personnel to ROB 3rd Floor East	3ROBE-X094-6010 3ROBE-X094-6011 3ROBE-X094-6025 3ROBE-X094-4500N	66	7 days	8/4/03	8/10/03	8/7/03
Move Furniture from 6025 to SALVAGE	SALVAGE-X094-6025	0	10 days	8/12/03	8/21/03	8/12/03
Move CSMD AV Furniture form 3546 to 2CSBX	2CSBX-X012-3546	0	2 days	8/12/03	8/13/03	8/13/03
Move PD from 6011 to 6025	6025-X013-6011	13	5 days	8/11/03	8/15/03	8/14/03
Move Furniture from 6011 to SALVAGE	SALVAGE-X094-6011	0	10 days	8/16/03	8/25/03	8/16/03
Move CSMD (Meili Chen) from 4500N to 1 CSBX	1CSBX-X012-4500N	1	4 days	8/15/03	8/18/03	8/18/03
Move BISD, ESTD & NSTD Personnel to ROB 2nd Floor East	2ROBE-X037-3500 2ROBE-X037-4500N 2ROBE-X092-4500N 2ROBE-X094-1060C 2ROBE-X094-1099C 2ROBE-X094-4500N 2ROBE-X094-92041	69	7 days	8/18/03	8/24/03	8/21/03
Move NSTD from 3500, 6025, 7917, & 7918 to 2ROB East	2ROBE-X094-3500 2ROBE-X094-7917 2ROBE-X094-7918	3	6 days	8/21/03	8/26/03	8/26/03
Move Furniture from 4500N to 6010 for the Physics Division	6010-X013-4500N	0	4 days	8/26/03	8/29/03	8/26/03
Move Furniture from 4500N to SALVAGE	SALVAGE-X094-4500N	0	10 days	8/26/03	9/5/03	8/26/03
Move PD from 6000, 6007, 6008, & 6010 to 6010	6010-X013-6000-1 6010-X013-6008 6010-X013-6007-1 6010-X013-6010-1	33	5 days	8/26/03	8/30/03	8/28/03
Move CCOD from 4500N to 4500S	4500S-X071-4500N	2	2 days	8/27/03	8/28/03	8/28/03
Move NSTD from 9204-3 to 5510	5510-X094-92043	6	4 days	8/25/03	8/28/03	8/28/03



10/24/03 Page 2 UTB Moves Vendor Moves

Fig. 3.2 (continued)

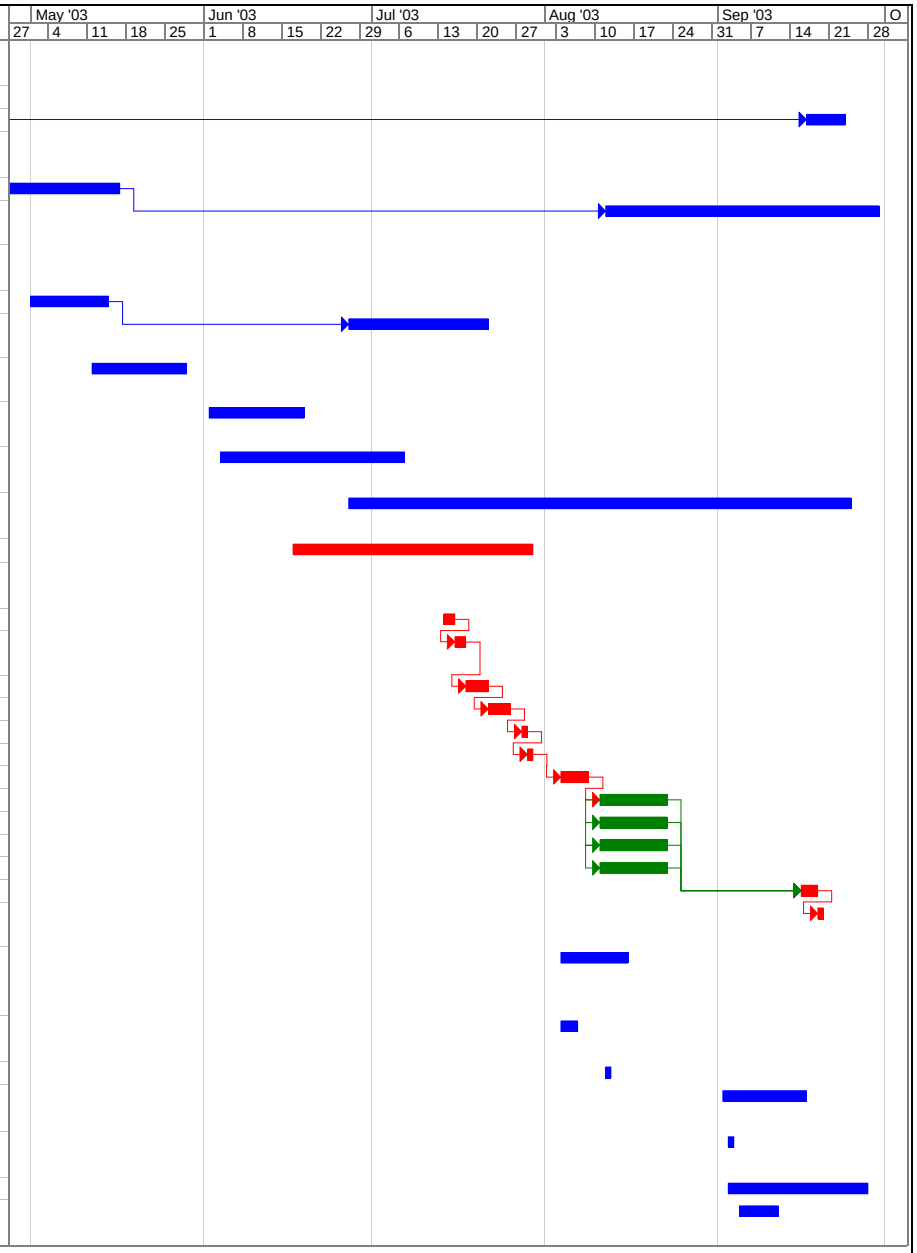
Task Name	Move ID Nos.	Spaces	Duration	Start	Finish	Physical Move Start
Move LSD from 1060C & 1061 to the 2nd Floor of CSB and ROBW; Move CSMD & CCSD to ROB 2nd Floor West & CSB	2CSBX-X001-1060C-1 2CSBX-X001-1061 2ROBW-X001-1061 2ROBW-X001-1060C 2CSBX-X012-6012 3CSBN-X012-6010 3CSBN-X012-6025 2ROBW-X012-1060C 2ROBW-X012-4500S 2ROBW-X012-6010 2ROBW-X012-6025 3CSBN-X012-6012 2ROBW-X110-4500N	72	7 days	9/2/03	9/8/03	9/4/03
Move CSMD from 6010, 6011, 6012, & 6025 to 6012	6012-X012-1505 6012-X012-6010 6012-X012-6011 6012-X012-6012 6012-X012-6025	11	3 days	9/8/03	9/10/03	9/10/03
Move CSED to ROB 1st Floor West & CSB 2nd Floor	1ROBW-X107-6010 1ROBW-X107-6011 1ROBW-X107-6025 1ROBW-X107-4500N-1 2CSBX-X107-6011	55	6 days	9/9/03	9/14/03	9/11/03
Move Contracts from 4500N to 1000	4500N-X065-4500N	14	7 days	9/11/03	9/17/03	9/16/03
Move CSED from 9204-1 and NTRC to 1ROBW and Move NSTD from 1099C to 1ROBW	2ROBW-X011-1060C 1ROBW-X094-1099C 1ROBW-X107-92041 1ROBW-X107-1060C	4	7 days	9/11/03	9/17/03	9/16/03
Move Graphics from 4500N to 4500N & 4500S	4500N-X071-4500N	12	7 days	9/18/03	9/24/03	9/22/03
Move Computer Server from 7606A to 1ROBE	1ROBE-X094-7606A-1	0	1 day	9/22/03	9/22/03	9/22/03
Move NSTD & FMD to ROB 1st Floor East	1ROBE-X089-2652B 1ROBE-X094-1060C 1ROBE-X094-4500N 1ROBE-X094-7606A-2 1ROBE-X094-7918 3CSBS-X094-4500N-1	41	7 days	9/22/03	9/28/03	9/25/03
Move NSTD from 9204-1 & 9204-3 to 1ROBE	1ROBE-X094-92041 1ROBE-X094-92043	2	2 days	9/24/03	9/25/03	9/25/03
Move 6 Fireking 4 Drawer Safes from 7606A to 1ROBE; Move 1 Safe from 4500N to 1ETF	1ROBE-X094-7606A-3 1ETFX-X094-4500N	0	1 day	9/27/03	9/27/03	9/27/03
Move PD from 6008, 6010, & 6025 to 6025; Move FED Library to Temporary Location in 4500N	6025-X013-6008 6025-X013-6010 6025-X013-6025 4500N-X019-92012	17	7 days	9/24/03	9/30/03	9/29/03



10/24/03 Page 3 UTB Moves Vendor Moves

Fig. 3.2 (continued)

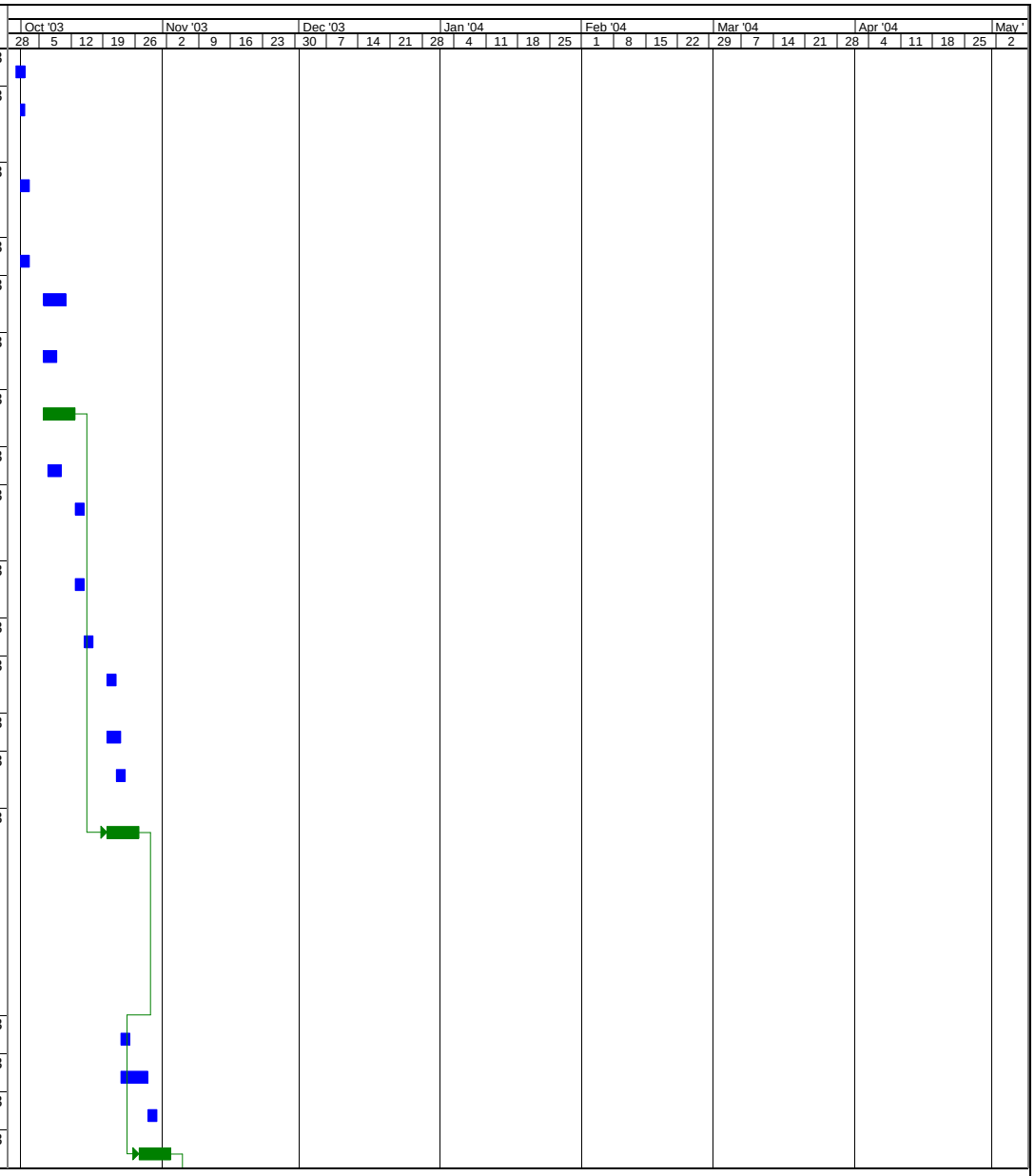
Task Name	Move ID	Duration	Start	Finish
Move NSTD Flow Test Loop Lab from Y-12 Bldg 9201-3 to ETF E-D111	**1ETF-L094-92013**	**125 days**	**4/1/03**	**9/23/03**
Phase I - Disassemble & Package		10 days	4/1/03	4/14/03
Phase II - Move & Partial Reassemble		5 days	9/17/03	9/23/03
Move NSTD Thermal Hydraulics Lab from Y-12 Bldg 9204-1 to ETF E-D111	**1ETF-L094-92041**	**121 days**	**4/14/03**	**9/29/03**
Phase I - Disassemble & Package 2/3 of Lab		24 days	4/14/03	5/16/03
Phase II - Disassemble/Package Remainder & Move All & Reassemble		35 days	8/12/03	9/29/03
Move M&CD Mechanical Properties Lab from Y-12 Bldg 9204-1 to 4500 & 4508	**4500-L011-92041 4508-L011-92041**	**59 days**	**5/1/03**	**7/21/03**
Phase I - Disassemble/Package/Move 30% of Lab		10 days	5/1/03	5/14/03
Phase II - Disassemble/Package/Move Remainder & Reconnect All		16 days	6/27/03	7/21/03
Move CAVE Lab from Bldg 6010 w/ Computer (from 4500N) to CSB C-B228 & 2nd Floor Computer Room	**2CSB-L012-4500N**	**12 days**	**5/12/03**	**5/28/03**
Move Condensed Matter Sciences Division Labs from 2024 to 4500N & 3025	**3025-L018-2024 4500N-L018-2024**	**15 days**	**6/2/03**	**6/18/03**
Move SAP Business Computers from 4500N to CSB 2nd Floor	**2CSB-L037-4500N**	**25 days**	**6/4/03**	**7/6/03**
Move NSTD Main Isotope Production Lab from Y-12 Bldg 9204-3 to 5510	**5510-L094-92043**	**62 days**	**6/27/03**	**9/24/03**
Move CSMD Supercomputers from 4500N to CSB 1st Floor	**1CSB-L012-4500N**	**31 days**	**6/17/03**	**7/29/03**
Move Remaining CSMD & CSED Small R&D Labs from 6010, 6011, 6012, & 4500 to CSB 1st & 2nd Floor		**49 days**	**7/14/03**	**9/19/03**
Move Viz Lab From 6012 to CSB C-B208	2CSB-L012-6012-1	2 days	7/14/03	7/15/03
Move Audio Lab From 6010 & 6012 to CSB C-B210-A	2CSB-L012-6010 2CSB-L012-6012-2	2 days	7/16/03	7/17/03
Move Video Lab From 6012 to CSB C-B210	2CSB-L012-6012-3	2 days	7/18/03	7/21/03
Move Computer Science Lab From 6012 to CSB C-E204-B	2CSB-L012-6012-4	4 days	7/22/03	7/25/03
Move GIS Lab From 4500N to CSB C-B224	2CSB-L107-4500N	1 day	7/28/03	7/28/03
Move Modeling & Simulation Lab From 6011 to CSB C-A216	2CSB-L107-6011	1 day	7/29/03	7/29/03
Move Robotics Lab From 6010 to CSB C-B216	2CSB-L012-6010-1	5 days	8/4/03	8/8/03
Move Optical Lab From 6010 to CSB C-D108	1CSB-L012-6010	10 days	8/11/03	8/22/03
Move Optical Lab From 6010 to CSB C-D230	2CSB-L012-6010-2	10 days	8/11/03	8/22/03
Move Optical Lab From 6010 to CSB C-D228	2CSB-L012-6010-3	10 days	8/11/03	8/22/03
Move Optical Lab From 6010 to CSB C-D224	2CSB-L012-6010-4	10 days	8/11/03	8/22/03
Move Nanofabrication Lab From 4500S to CSB C-C126-A	1CSB-L012-4500S-1	3 days	9/16/03	9/18/03
Move Biomolecular Programmed Assembly Lab from 4500S to CSB C-C124	1CSB-L012-4500S-2	1 day	9/19/03	9/19/03
Move LSD LCFG Labs from Y-12 Bldg 9210 to Bldgs. 1059, 1060, & 1061	**1059-L001-9210 1060-L001-9210 1061-L001-9210**	**10 days**	**8/4/03**	**8/15/03**
Move NSTD Nuclear Simulation Lab from 6025 to ROB R-M301	**3ROB-L094-6025**	**3 days**	**8/4/03**	**8/6/03**
Move NSTD Scale Training Lab from 6025 to ROB R-O304	**3ROB-L094-6025**	**1 day**	**8/12/03**	**8/12/03**
Move Physics Division Lab from 6000 to 6010 (old CAVE Lab Location)	**6010-L013-6000**	**11 days**	**9/2/03**	**9/16/03**
Move ESTD Electrical Test Coil from EPRI to ETF E-C102 (Diagnostics/Special Projects Lab)	**1ETF-L092-EPRI**	**1 day**	**9/3/03**	**9/3/03**
Move NSTD Capsule Assembly Lab from 4508 to ETF E-E101	**1ETF-L094-4508**	**19 days**	**9/3/03**	**9/27/03**
Move ESTD Aircraft Lab from Y-12 9401-1 to Storage in DOE's OSTI	**OSTI-L092-92041**	**5 days**	**9/5/03**	**9/11/03**



10/1/03 | UTB Moves | Vendor Moves | Vendor Box/Equip Moves & UTB Optical Table Moves

Fig. 3.3. FY 2003 Summary Laboratory Move Schedule

Task Name	Move ID Nos.	Spaces	Duration	Start	Finish	Physical Move Start
Move ESTD (Kueck) from NTRC to 3156	3156-X092-NTRC	1	2 days	9/30/03	10/1/03	10/1/03
Move NSTD Boxes (Diane Waters) from 4500N to 3CSBS & Move Sonia Lay Printer from 7918 to 1ROBE	3CSBS-X094-4500N-2 1ROBE-X094-7918	0	1 day	10/1/03	10/1/03	10/1/03
Move ESD (D. W. Lee & C. Hagan) from 4500N to 4500N; Move 29 Boxes from 4500N Rm 144A to Rm H-1	4500N-X042-4500N-1 4500N-X042-4500N-2	2	2 days	10/1/03	10/2/03	10/2/03
Move EPWS & CSD (Charlene Sanders) from 4500N to 4500N	4500N-X035-4500N 4500N-X060-4500N	3	2 days	10/1/03	10/2/03	10/2/03
Move approx. 30 FED Computer Servers fromY-12 9201-2 to 3 ROBW	3ROBW-X019-92012-1	0	5 days	10/6/03	10/10/03	10/6/03
Move PD from 6000-Area Buildings to to 6010 & 6025	6010-X013-6000 6010-X013-6010 6025-X013-6000-2	6	3 days	10/6/03	10/8/03	10/8/03
Move FED Personnel to ROB 3rd Floor West	3ROBW-X019-92012-2 1ROBW-X107-92012	58	7 days	10/6/03	10/12/03	10/9/03
Move Misc. Boxes for FED	3ROBW-X019-92012	2	3 days	10/7/03	10/9/03	10/14/03
Move ESTD's Betty Ann Walker (temporary move) within 4500N; Move EP&WS Personnel (Kyle & James) from 4500N to 5500	4500N-X092-4500N 5500-X035-4500N	3	2 days	10/13/03	10/14/03	10/14/03
Move Approx. 6 Fireking Safes from 7606A to 5510 (when furniture is moved in)	5510-X094-7606A	0	2 days	10/13/03	10/14/03	10/14/03
Move ESTD (Oland) from NTRC to 2ETF	2ETFX-X092-NTRC	1	2 days	10/15/03	10/16/03	10/16/03
Move Computer Servers from 1060 Commerce Park Rm 235 to CSB 2nd Floor Computer Rm	2CSB-X001-1060C-2	0	2 days	10/20/03	10/21/03	10/20/03
Move 35 NSTD Isotope Record Fireproof Safes from Y-12 9204-3 to	1ROBE-X094-92043	0	3 days	10/20/03	10/22/03	10/20/03
Move NSTD (Heatherly & Sitterson) from 4508 to 1ETF (move w/ Thermal Hyrd. Lab)	1ETFX-X094-4508	2	2 days	10/22/03	10/23/03	10/23/03
Move FMC, QS, NSTD, ESTD, & CCOD (Graphics) from 3500, 3606, 4500N, 4508, 1060C, NTRC, 4500S, 9201-C to 1ROBE, 1ETF, & 2ETF	1ROBE-X089-NTRC 1ROBE-X094-1060C 1ETFX-X094-2ROBE 2ETFX-X024-4500N 2ETFX-X092-3500-1 2ETFX-X092-3606 2ETFX-X092-4500N 2ETFX-X071-1060C 2ETFX-X092-NTRC 2ETFX-X092-3CSBN 2ETFX-X092-4500S-1	46	7 days	10/20/03	10/26/03	10/23/03
Move 1 NSTD Safe and Misc. Equip. Requiring Rigging Crew	2ETFX-X094-1060C-1	0	2 days	10/23/03	10/24/03	10/24/03
Move NSTD from 2ROBE to 2ETF	2ETFX-X094-2ROBE	3	6 days	10/23/03	10/28/03	10/28/03
Move ESTD Person from Y-12 9201-3 to 2ETF	2ETFX-X092-92013	1	2 days	10/29/03	10/30/03	10/30/03
Move ESTD from 3156 & 4500N to NTRC	NTRC-X092-4500N NTRC-X092-3156	16	7 days	10/27/03	11/2/03	10/30/03



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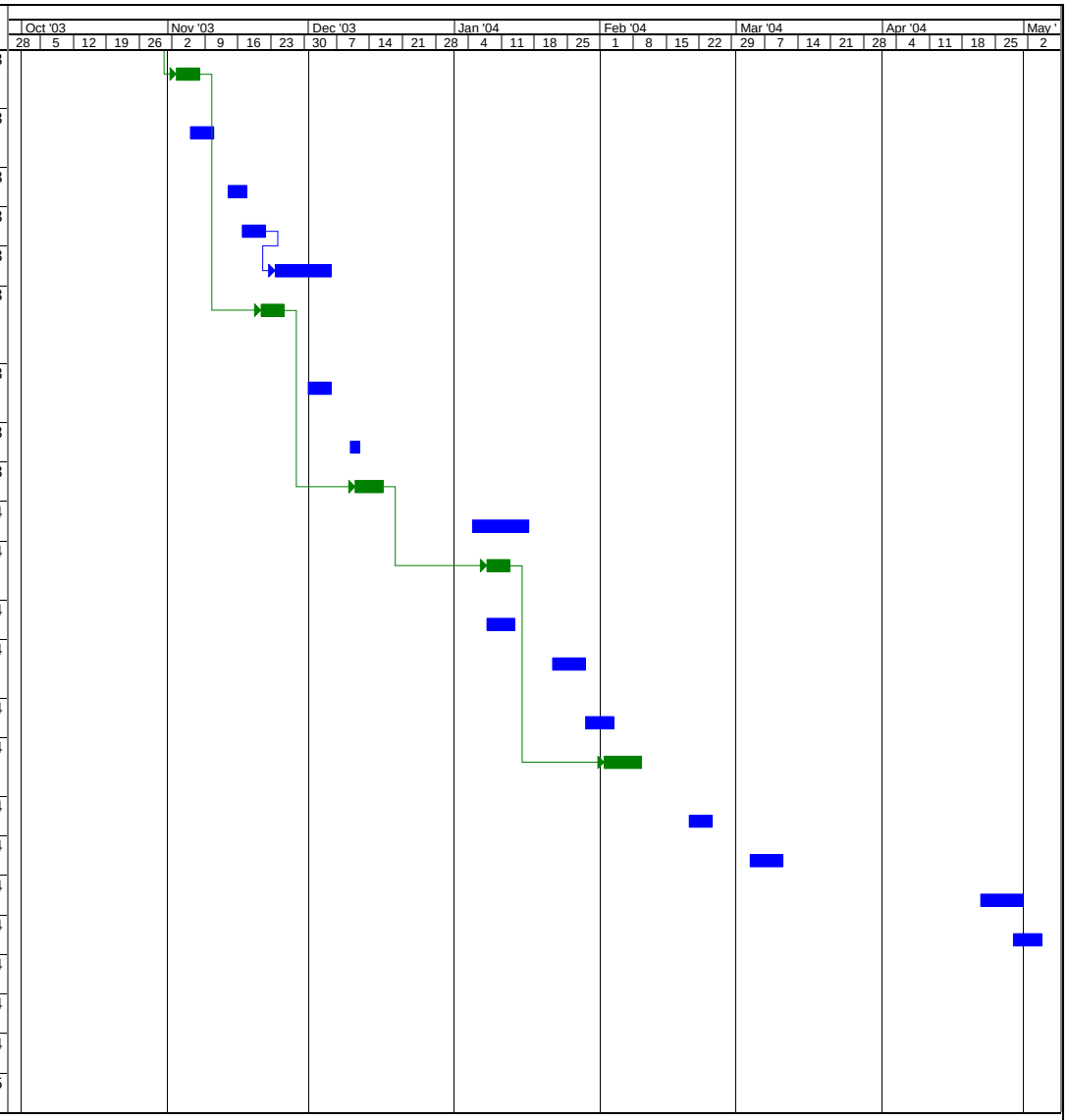
UTB Moves Vendor Moves

Fig. 3.4. FY 2004 Summary Personnel Move Schedule

Task Name	Move ID Nos.	Spaces	Duration	Start	Finish	Physical Move Start
Move ESTD & M&CD from 9204-1 to 2ETF	2ETFX-X092-92041	4	5 days	11/3/03	11/7/03	11/6/03
Move ESTD from 3147 to 3156; Move 11 NSTD Safes from 9725 to ROB R-H204B	3156-X092-3147 2ROBE-X094-9725	3	4 days	11/6/03	11/10/03	11/11/03
Move FED from 9201-2 to 1 ETF	1ETFX-X019-92012	1	2 days	11/14/03	11/17/03	11/17/03
Move E&E from 4500N to 4500N	4500N-X065-4500N	11	5 days	11/17/03	11/21/03	11/20/03
Move Furniture from 4500N to SALVAGE	SALVAGE-X065-4500N	0	10 days	11/24/03	12/5/03	11/24/03
Move Prime Contract Administration (PCA), Property, & Work for Others from 1000 to 3546	3546-X112-1000 3546-X079-1000 3546-X064-1000	15	3 days	11/21/03	11/25/03	11/25/03
Move Contracts Division (Procurement) from 4500N to 1000	1000-X064-4500N	14	5 days	12/1/03	12/5/03	12/4/03
Move ESTD (Datskos) from 4500S to 2ETF	2ETFX-X092-4500S-2	1	2 days	12/10/03	12/11/03	12/11/03
Move ESTD from 4500N to 3156	3156-X092-4500N 2ETFX-X092-4508	12	4 days	12/11/03	12/16/03	12/16/03
Move Furniture from 4500N to SALVAGE	SALVAGE-X071-4500N	0	10 days	1/5/04	1/16/04	1/5/04
Move NSTD FSAR Library from 9204-1 Rm 200 to 2ETF E-F205	2ETFX-X094-92041	2	3 days	1/8/04	1/12/04	1/12/04
Move M&CD from 9204-1 to 2ETF	2ETFX-X011-92041	9	4 days	1/8/04	1/13/04	1/13/04
Move M&CD from 9204-1 to 1ETF; Move Tech Standards File Room from 1060C to 2ETF	1ETFX-X011-92041 2ETFX-X094-1060C-2	10	5 days	1/22/04	1/28/04	1/27/04
Move NSTD from 9204-3 to 5500	5500-X094-92043	4	5 days	1/29/04	2/3/04	2/3/04
Move TTD from 111UV to 4500N & Move Legal from111UV to 4500N	4500N-X031-111UV 4500N-X085-111UV	32	6 days	2/2/04	2/9/04	2/6/04
Move Quality from 4500N to 2ETF	2ETFX-X024-4500N	1	3 days	2/20/04	2/24/04	2/24/04
Move ESTD from 3500 to 2ETFX	2ETFX-X092-3500-2	3	5 days	3/4/04	3/10/04	3/9/04
Move ESTD from 3606 to 3500	3500-X092-3606	17	7 days	4/22/04	4/30/04	4/27/04
Move CSMD from CSB to JICS	JICS-X012-3CSBN	6	4 days	4/29/04	5/4/04	5/4/04
Move F&O from 7606A to 7601	7601-X089-7606A	9	6 days	7/27/04	8/3/04	8/3/04
Move FED Personnel to 7606A	7606A-X019-92012	23	5 days	10/25/04	10/29/04	10/29/04
Move ESTD from 3500 to 3156	3156-X092-3500	5	3 days	12/1/04	12/3/04	12/3/04
Move M&CD from 1037 to 1ETF	1ETFX-X011-1037	6	5 days	4/11/05	4/15/05	4/15/05



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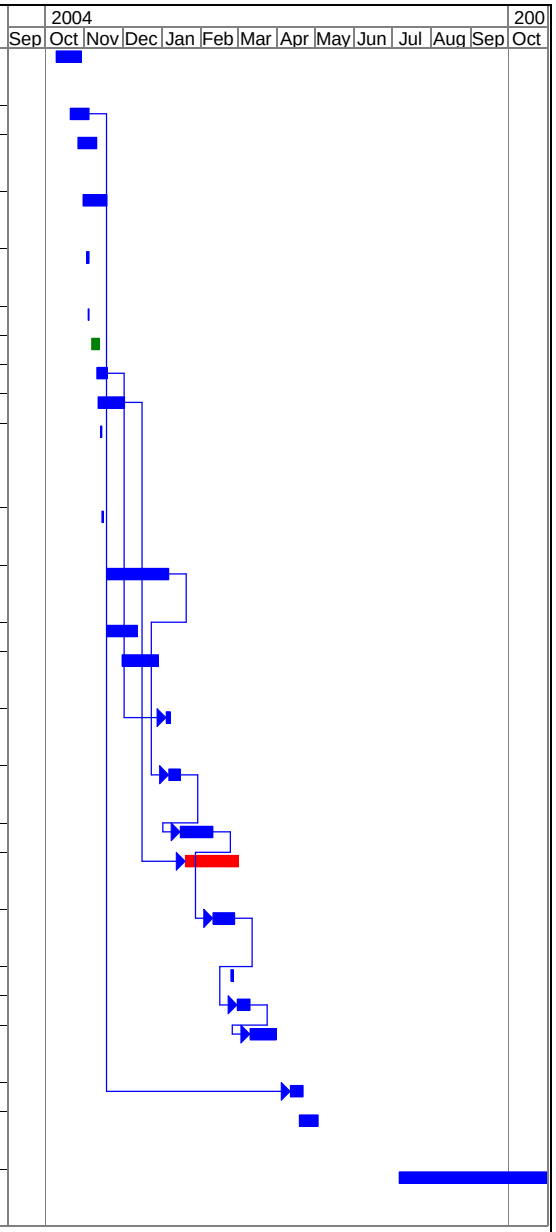
UTB Moves Vendor Moves

Fig. 3.4 (continued)

Task Name	Duration	Start	Finish	Move ID
Move ESTD MEMS/NEMS Testing/Ion Milling Equip from 4500S to ETF E-D202, E-D204, E-D206, E-D206A, E-D208A, & E-D210A	14 days	10/10/03	10/29/03	2ETF-L092-4500S
Move ESTD Optics Labs from 3500 to ETF E-D201, E-D203, & E-D205	11 days	10/21/03	11/4/03	2ETF-L092-3500
Move ESTD Environmental Effects Laboratory from 3500 High Bay to ETF E-C102	11 days	10/27/03	11/10/03	1ETF-L092-3500
Move ESTD Advanced Thermal Hydraulics Lab from Y-12 9204-1 to ETF E-F116, E-F117, & E-F118	13 days	10/31/03	11/18/03	1ETF-L092-92041
Move ESTD Diamond Turning Equipment from Y-12 Bldg 9201-3 to ETF E-B103, E-F116, E-D201, & E-D205	2 days	11/3/03	11/4/03	1ETF-L092-92013 2ETF-L092-92013
Move ESTD Clean Room from Y-12 9201-3 to ETF E-D208-A	1 day	11/4/03	11/4/03	2ETF-L092-92013-1
Move ESTD Hybrid Lighting Lab from NTRC to ETF E-D210	4 days	11/7/03	11/12/03	2ETF-L092-NTRC
Move ESTD Photonics Lab from NTRC Rm 121 to ETF E-D207	6 days	11/11/03	11/18/03	2ETF-L092-NTRC-1
Move FED Pellet Lab from Y-12 9201-2 to ETF E-D110	13 days	11/12/03	12/2/03	1ETF-L019-92012
Move ESTD Technology Information Center & Records Center from NTRC, 4500N, & 4500S to ETF E-D209 & E-F115	1 day	11/14/03	11/14/03	2ETF-L092-4500N 2ETF-L092-4500S-1 1ETF-L092-NTRC
Move ESTD Diagnostics/Special Projects Equipment from NTRC to Electro Optics Lab in ETF E-D201	1 day	11/15/03	11/15/03	2ETF-L092-NTRC-1
Move M&CD Composite Processing Lab from Y-12 9204-1 & 9725 to ETF E-D105	30 days	11/19/03	1/6/04	1ETF-L011-92041 1ETF-L011-9725
Move ESTD Insulation Lab from 4508 to ETF E-F110 & E-F112	16 days	11/19/03	12/12/03	1ETF-L092-4508
Move LSD Structural Biology Lab from Y-12 Bldg 9224 to 4500S (pending funding approval)	19 days	12/1/03	12/29/03	4500S-L001-9224
Move ESTD Advanced Photonics Applications Lab from 4500S Rm S-239 to NTRC Rm L-121	3 days	1/5/04	1/7/04	NTRC-L092-4500S
Move M&CD Composite Characterization Lab from Y-12 9204-1 to ETF E-D109	7 days	1/7/04	1/15/04	1ETF-L011-92041
Move M&CD Composite Stress Lab from Y-12 9204-1 to ETF E-D104	17 days	1/16/04	2/10/04	1ETF-L011-92041-1
Move FED RF-3D Scanner & Plasma Process Labs from Y-12 9201-2 to ETF E-C101	30 days	1/20/04	3/1/04	1ETF-L019-92012
Move M&CD Composite Assembly Room and Clean Room from Y-12 9204-1 to ETF E-D106-A & E-D106	13 days	2/11/04	2/27/04	1ETF-L011-92041-2
Move QSD Quality Control Lab from Y-12 9201-3 to ETF E-F108	2 days	2/25/04	2/26/04	1ETF-L069-92013
Move M&CD Composite Storage Lab from Y-12 9204-1 to ETF E-D107	8 days	3/1/04	3/10/04	1ETF-L011-92041-3
Move M&CD Concrete Testing Lab/Concrete Prep Lab from Y-12 9204-1 to ETF E-D113 & E-D113-A	15 days	3/11/04	3/31/04	1ETF-L011-92041-4
Move ESTD Analog/Digital Systems Labs from 3606 to 3500	8 days	4/12/04	4/21/04	3500-L092-3606
Move NSTD Isotope Production Wet Chemistry Labs from Y-12 9204-3 to 5500	11 days	4/19/04	5/3/04	5500-L094-92043
Move the Remaining FED Fusion Energy Laboratories (including RF Benchmark) from Y-12 9201-2 to Bldg. 7600	250 days	7/7/04	7/6/05	7600-L019-92012



10/24/03 | UTB Moves | Proposed Vendor Moves | Proposed UTB & Vendor Moves

Fig. 3.5. FY 2004 Summary Laboratory Move Schedule

(2) move execution, and (3) post-move actions. A punch-list system is being used by move coordinators to identify and prioritize problems for correction.

3.3.3 Existing Facilities Renovations

Figure 3.6 identifies facilities renovated during FY 2003 as a part of the FRP along with a summary schedule. Figure 3.7 identifies facilities to be renovated as part of the FRP during FY 2004. The existing facilities are being renovated to allow new operations. Detailed schedules for these renovations are included in Section 4.

3.3.4 Support Information

The following appendices provide specific information and guidance for consolidation of personnel and equipment in each of the campus areas:

- Appendix A contains the Move Policies and Procedures.
- Appendix B contains the Personnel Move Data Sheets.
- Appendix C contains the Laboratory Move Packages.

Project Start: 1/02 Scheduled Completion: 3/05 (See Section 4.)

Project Costs:* FY 2003—$4,813,000 FY 2004—$8,512,000** (See Section 5.)

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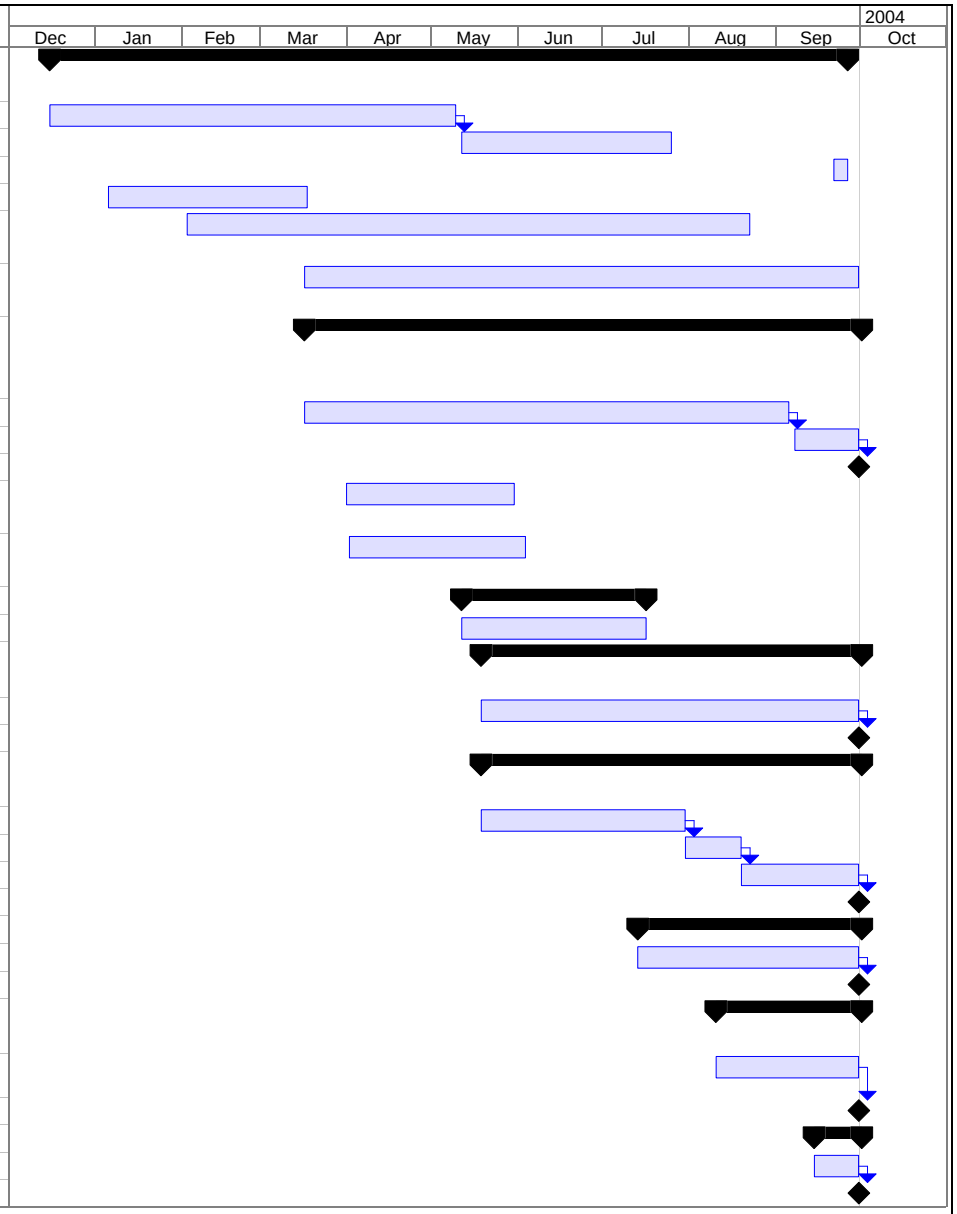
*Other costs associated with equipment moves are identified in Sections 3.4, 3.5, 3.6, 3.7, and 3.10.
**Of this FY 2004 total, $1,000,000 is DOE direct-funded.

3.4 MAIN COMPUTER INSTALLATION IN CSB (WBS 1.04)—COMPLETE FY 2003

This subproject included planning and executing the move of all computers now residing in the CSB computer rooms. The CSB computer rooms consist of a 20,000-ft^2, raised-floor area on the first floor and another 20,000-ft^2, raised-floor area on the second floor. The first-floor computer room is basically a single large computer room that houses the large supercomputers that resided in 4500N. The second floor computer room area is subdivided into several computer laboratories plus a large open area that houses the production business systems. Computer systems were moved in a manner that minimized system downtime and impact to users.

The location of all computers that required moving was identified. The target destination in the CSB for each of these computers was determined. Costs were estimated for preparing the CSB to receive the computers and for performing the actual computer move, and a detailed move plan was developed, encompassing all computers on the move list. Plans and arrangements were made for resources to perform the move by identifying all materials and equipment required to support the computer move. Service contracts were established/exercised to provide vendor support for the move, and services were procured to provide additional move support, as needed.

Task Name	Duration	Start	Finish
Renovate Bldg 5510 for Main Isotope Production Labs	**201 days**	**12/16/02**	**9/26/03**
Perform Design (Phase I & II)	104 days	12/16/02	5/9/03
Perform Construction	53 days	5/12/03	7/25/03
Install Process Chiller	5 days	9/22/03	9/26/03
Renovate Building 1000 for Travel	**51 days**	**1/6/03**	**3/17/03**
Renovate 4508 and 4500S for Mechanical Properties Lab	**142 days**	**2/3/03**	**8/22/03**
Renovate 1059 & 1061 for Life Sciences Division Labs	**138 days**	**3/17/03**	**9/30/03**
Renovate Building 5500 to Accommodate NSTD's Isotope Production Wet Chemistry Labs	**139 days**	**3/17/03**	**10/1/03**
Perform Design	121 days	3/17/03	9/5/03
Procure Construction Contractor	17 days	9/8/03	9/30/03
Continue Construction Contractor Procurement	1 day	10/1/03	10/1/03
Renovate Building 4500N for the Condensed Matter Sciences Division Lab	**42 days**	**4/1/03**	**5/30/03**
Renovate Building 1062 for Environmental Sciences Division	**43 days**	**4/2/03**	**6/3/03**
Renovate Building 6012 Roof for CCSD	**46 days**	**5/12/03**	**7/16/03**
Perform Design	46 days	5/12/03	7/16/03
Perform 4500N Headhouse Renovation Design	**95 days**	**5/19/03**	**10/1/03**
Perform Design	94 days	5/19/03	9/30/03
Continue Design in FY04	1 day	10/1/03	10/1/03
Renovate Building 6011 to Accommodate CCSD	**95 days**	**5/19/03**	**10/1/03**
Perform Design	51 days	5/19/03	7/30/03
Procure Construction Contractor	14 days	7/31/03	8/19/03
Perform Construction (Phase I)	29 days	8/20/03	9/30/03
Continue Construction in FY04 (Phase II)	1 day	10/1/03	10/1/03
Perform 4500N Library Expansion Design	**57 days**	**7/14/03**	**10/1/03**
Perform Design	56 days	7/14/03	9/30/03
Continue Design in FY04	1 day	10/1/03	10/1/03
Renovate Building 6025 to Accommodate Physics Division	**37 days**	**8/11/03**	**10/1/03**
Perform Building 6025 Renovations to Accommodate Physics Division	36 days	8/11/03	9/30/03
Continue Renovations in FY04	1 day	10/1/03	10/1/03
Renovate Building 3546	**13 days**	**9/15/03**	**10/1/03**
Perform Renovations	12 days	9/15/03	9/30/03
Continue Renovations in FY04	1 day	10/1/03	10/1/03



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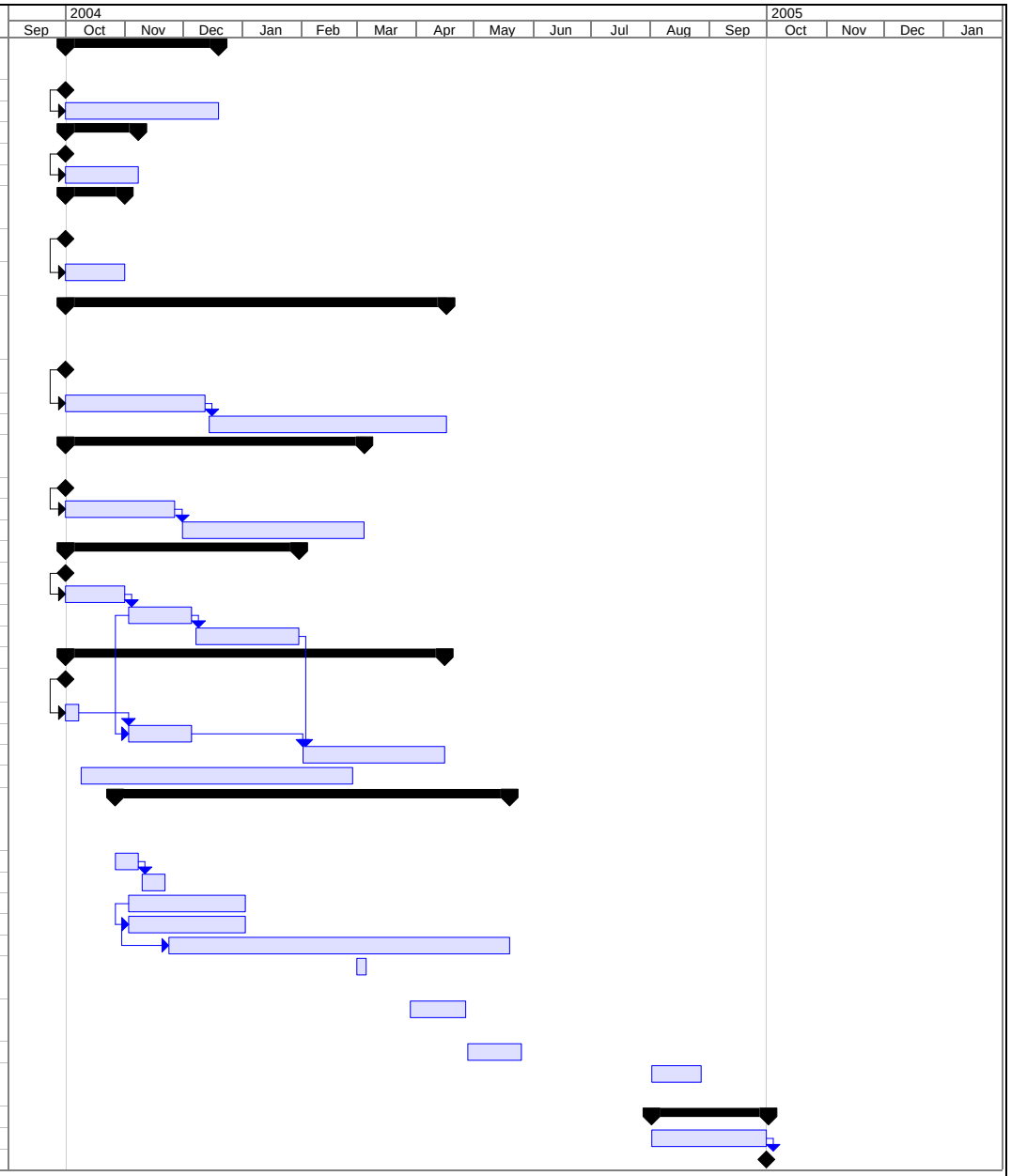
Task

Summary Bar

Continue to FY04

Fig. 3.6. FY 2003 Facility Renovation Summary Schedule

ID	Task Name	Duration	Start	Finish
1	**Renovate Building 6025 to Accommodate Physics Division**	**56 days**	**10/1/03**	**12/19/03**
2	Continue Building 6025 Renovations From FY03	1 day	10/1/03	10/1/03
3	Complete Building 6025 Renovations	56 days	10/1/03	12/19/03
4	**Renovate Building 3546**	**28 days**	**10/1/03**	**11/7/03**
5	Continue Building 3546 Renovations From FY03	1 day	10/1/03	10/1/03
6	Complete Building 3546 Renovations	28 days	10/1/03	11/7/03
7	**Renovate 4500N 2nd Floor-EERE Program Renovations (Maintenance)**	**23 days**	**10/1/03**	**10/31/03**
8	Continue 4500N 2nd Floor Renovations for EERE Program From FY03	1 day	10/1/03	10/1/03
9	Complete 4500N 2nd Floor Renovations for EERE Program	23 days	10/1/03	10/31/03
10	**Renovate Building 5500 to Accommodate NSTD's Isotope Production Wet Chemistry Labs**	**137 days**	**10/1/03**	**4/16/04**
11	Continue Construction Contractor Procurement From FY03	1 day	10/1/03	10/1/03
12	Complete Construction Contractor Procurement	51 days	10/1/03	12/12/03
13	Perform Construction	86 days	12/15/03	4/16/04
14	**Renovate Building 6011 to Accommodate CCSD**	**106 days**	**10/1/03**	**3/4/04**
15	Continue Construction from FY03 (Phase II)	1 day	10/1/03	10/1/03
16	Procure Construction Contractor (Phase II)	41 days	10/1/03	11/26/03
17	Perform Construction (Phase II)	65 days	12/1/03	3/4/04
18	**Perform 4500N Headhouse Renovation**	**82 days**	**10/1/03**	**1/30/04**
19	Continue 4500N Headhouse Design From FY03	1 day	10/1/03	10/1/03
20	Complete 4500N Headhouse Design	23 days	10/1/03	10/31/03
21	Procure Construction Contractor	23 days	11/3/03	12/5/03
22	Perform Construction	36 days	12/8/03	1/30/04
23	**Perform 4500N Library Expansion**	**136 days**	**10/1/03**	**4/15/04**
24	Continue 4500N Library Expansion Design From FY03	1 day	10/1/03	10/1/03
25	Complete 4500N Library Expansion Design	5 days	10/1/03	10/7/03
26	Procure the Construction Contractor	23 days	11/3/03	12/5/03
27	Perform Construction	54 days	2/2/04	4/15/04
28	**Building 6025 Foundation Stabilization**	**96 days**	**10/9/03**	**2/27/04**
29	**Buildings 3546, 3606, & 6012 Room/Common Area Air Conditioner Replacements/Modifications**	**142 days**	**10/27/03**	**5/19/04**
30	Procure Room Air Conditioners For 3546	10 days	10/27/03	11/7/03
31	Install 3546 Room Air Conditioners	10 days	11/10/03	11/21/03
32	Perform Modification Designs	40 days	11/3/03	1/2/04
33	Procure Contractor	40 days	11/3/03	1/2/04
34	Perform Modifications	122 days	11/24/03	5/19/04
35	**Install Concrete Approaches for 1059/1061 Nitrogen Headers**	**5 days**	**3/1/04**	**3/5/04**
36	**Building 3500 Lab Upgrades for Relocation of 3606 Labs**	**21 days**	**3/29/04**	**4/26/04**
37	**Renovate Building 3606 - 30 Office Spaces**	**20 days**	**4/28/04**	**5/25/04**
38	**Building 4500S Maintenance Shops Upgrades**	**20 days**	**8/2/04**	**8/27/04**
39	**Building 5002 First Floor Renovation**	**45 days**	**8/2/04**	**10/1/04**
40	Perform Design	44 days	8/2/04	9/30/04
41	Procure Contractor in FY05	1 day	10/1/04	10/1/04



10/24/03

Task | Continue From FY03 | Summary Bar

Fig. 3.7. FY 2004 Facility Renovation Summary Schedule

The building contractor was responsible for terminating the CSB communications lines in the Remote Distribution Facility (RDF) room (a portion of the CSB first-floor computer room). The contractor also terminated the computer room electrical lines in several electrical distribution boxes scattered throughout the raised floor areas. This subproject included responsibility for providing and running electrical lines from the electrical distribution boxes to the computers and network lines from the RDF to the computers.

Vendors (IBM, HP, and StorageTek) moved the supercomputers and the High-Performance Storage System. A mixture of vendor, contract, and internal laborers was used to move all of the remaining computers.

The computer move subproject estimate is summarized by WBS element in Section 5.

Project Schedule: The current computer moves occurred according to the schedule contained in Section 4.

Project start date: 5/02 Completion date: 9/03 (See Section 4.)

Project total estimated cost: $1,656,000 (See Section 5.)

3.5 NEW FURNITURE (WBS 1.05)

This activity involves interior design services, selection and specification of the new furniture, procurement and acquisition of furniture contracts, delivery and installation of furniture, and project support activities for the third-party buildings and JICS/ORCAS. The scope of furnishing encompasses office wood furniture, free-standing furniture, panel systems, seating, tables, lab furnishings, demountable walls, and miscellaneous accessories selected in accordance with the building architecture and the latest technology available in the market.

Section 4 contains a schedule for the design, procurement, manufacturing, delivery, and installation of new furniture by building. The schedule has been regularly updated with input from appropriate contractors during design, construction, and commissioning phases in concert with the building construction and furniture installer's schedules for each building.

Budget and resource requirements have been established in concert with the furniture contract procurement scope and schedule and the internal level of effort required to meet the contract award and furniture delivery schedule milestones.

During FY 2004 the furniture project will procure and/or install the following:

- Deferred furniture for Private Sector Facilities
- Additional desk chairs for Private Sector Facilities
- Furnishings for renovated facilities
- Building 3546 space furnishings
- Building 4500N Headhouse Furniture
- FSAR library bookcases

- Building 6025 conference room/library furniture
- Miscellaneous replacement furniture for other existing renovated facilities
- Building 6011 classified space furnishings
- Private Sector Facilities demountable wall modifications

In addition the furniture project will store and deliver JICS/ORCAS furniture.

Project start date: 5/02 Completion date: 9/04 (See Section 4.)

Project total estimated cost: $7,400,000 (See Section 5 for breakdowns by fiscal year.)

3.6 FACILITIES MAINTENANCE AND OPERATIONS PLANNING (WBS 1.06)

3.6.1 Maintenance Planning for New Facilities (Construction Phase) (WBS 1.06.01)

Maintenance planning work for new facilities is broken down in the following WBS by building:

1.06.01.1	**Maintenance Planning for CSB (Construction Phase)**
1.06.01.1.1	CSB piping and instrumentation diagrams (P&IDs)—Complete FY 2003
1.06.01.1.2	CSB component operations and maintenance (O&M) manuals—Complete FY 2003
1.06.01.1.3	CSB construction photographs—Complete FY 2003
1.06.01.1.4	CSB Materials Safety Data Sheets (MSDSs)—Complete FY 2003
1.06.01.1.5	CSB drawings
1.06.01.1.6	CSB warranties and service contracts
1.06.01.1.7	CSB Training—Complete FY 2003
1.06.01.2	**Maintenance Planning for ROB (Construction Phase)**
1.06.01.2.1	ROB P&IDs—Complete FY 2003
1.06.01.2.2	ROB component O&M manuals—Complete FY 2003
1.06.01.2.3	ROB construction photographs—Complete FY 2003
1.06.01.2.4	ROB MSDSs—Complete FY 2003
1.06.01.2.5	ROB drawings
1.06.01.2.6	ROB warranties and service contracts
1.06.01.2.7	ROB training—Complete FY 2003
1.06.01.3	**Maintenance Planning for ETF (Construction Phase)**
1.06.01.3.1	ETF P&IDs—Complete FY 2003
1.06.01.3.2	ETF component O&M manuals—Complete FY 2003
1.06.01.3.3	ETF construction photographs—Complete FY 2003
1.06.01.3.4	ETF MSDSs—Complete FY 2003
1.06.01.3.5	ETF drawings
1.06.01.3.6	ETF warranties and service contracts
1.06.01.3.7	ETF training—Complete FY 2003

1.06.01.4 Maintenance Planning for JICS/ORCAS (Construction Phase)

1.06.01.4.1 JICS/ORCAS P&IDs
1.06.01.4.2 JICS/ORCAS component O&M manuals
1.06.01.4.3 JICS/ORCAS construction photographs
1.06.01.4.4 JICS/ORCAS MSDSs
1.06.01.4.5 JICS/ORCAS drawings
1.06.01.4.6 JICS/ORCAS warranties and service contracts
1.06.01.4.7 JICS/ORCAS training

1.06.01.5 Maintenance Planning for RSC (Construction Phase)

1.06.01.5.1 RSC P&IDs
1.06.01.5.2 RSC component O&M manuals
1.06.01.5.3 RSC construction photographs
1.06.01.5.4 RSC MSDSs
1.06.01.5.5 RSC drawings
1.06.01.5.6 RSC warranties and service contracts
1.06.01.5.7 RSC training

The maintenance planning during the construction phase of the RSC requires the following information from the construction contractor/developer.

- Piping and instrumentation drawing (P&IDs)

  Drawings will be provided that detail the components that make up building systems and the steps associated with operating the system.

- Component O&M manuals

  The O&M manuals are due within 45 days of submittal acceptance by the A/E team. Because the O&M manuals have a different specification section, the manuals can be completed and submitted one section at a time. The O&M manuals should be submitted in both electronic and paper format.

  O&M manual structure includes a tab for each piece of equipment—equipment type, model numbers, serial numbers, and description (e.g., air handling units, chillers, elevators):

  — Sub-Tab A Design narrative and criteria
  — Sub-Tab B Sequences of operation
  — Sub-Tab C Approved submittals for equipment type
  — Sub-Tab D Start-up plan and report, construction checklists
  — Sub-Tab E Functional performance tests (completed), trending, and analysis
  — Sub-Tab F Owner training plan
  — Sub-Tab G Maintenance procedures and schedule of activity
  — Sub-Tab H Approved as-built documents

- Construction photographs include all digital and prints along with negatives taken during the construction phase.

- Material Safety Data Sheets (MSDSs)

  MSDSs will be collected for all coatings, sealants, adhesives, floor coverings, and applicable building materials that will be used in each new building. Each MSDS will be identified by end use and location of use.

- Drawings

  Shop Drawings: Approved shop drawings for all approved vendor submittals should be half size sheets folded, as required, to fit in binders.

  As-Built Drawings: Approved as-built drawings should be provided in either AutoCAD or MicroStation format.

- Warranties and service contracts

  A start date will be established for the warranties. The warranties and service contracts will be reviewed and commented on by the commissioning agent and the RCC manager.

- Training

  The Facilities Management Division will perform maintenance of the general building structure; the mechanical, electrical and plumbing systems; and the grounds. It is imperative that system documentation be developed along with self-directed training on the maintenance system because the maintenance staff will vary throughout the life of the building. The key areas of training will include, but are not limited to, the following:

  — Pumping systems (supply and waste)
  — HVAC systems
  — Steam system
  — Plumbing systems
  — Process waste system
  — Gas manifold systems
  — Life safety systems
  — Building material care and treatment
  — Landscape maintenance
  — Pavement maintenance, including snow/ice removal and use of salt/sand

  The training documentation should clearly detail the preventive maintenance requirements.

Project start date: 9/02 Completion date: 9/05 (See Section 4 for schedule details.)

Project total estimated cost: FY 2003—$60,000; FY 2004—$0 (See Section 5.)

3.6.2 Building Operational Readiness (WBS 1.06.02)

Operational readiness reviews are broken down in the following WBS by building:

1.06.02.1 CSB Building Operational Readiness—Complete FY 2003
1.06.02.2 ROB Building Operational Readiness—Complete FY 2003
1.06.02.3 ETF Building Operational Readiness
1.06.02.4 JICS/ORCAS Operational Readiness
1.06.02.5 RSC Building Operational Readiness

Criteria have been established that will include, but are not limited to, the following systems and areas:

- Building automation systems, including linkages to remote monitoring and control sites
- Chillers, pumps, piping, cooling towers, and associated equipment
- Air-handling units
- Exhaust fans
- Terminal units
- Unit heaters and unit ventilators
- Heat exchangers
- Computer room A/C units
- HVAC and laboratory control systems
- Plumbing systems
- Fire protection systems
- Service water heaters, pumps, and associated equipment
- Laboratory compressed air and vacuum system equipment
- Emergency power and uninterruptible power supply (UPS) system
- Utility metering systems
- Smoke control systems – interfaces, egress pressurization
- Fire alarm systems
- Security and access control systems
- Lighting control systems
- Voice/data communications systems
- Public address systems
- Power distribution system
- Electrical system from the building entrance through the main switchboard, switchgear, and to the distribution panels
- Architectural features including wall panels, doors, windows, and concrete
- All ceiling, wall, and floor coverings, including paint, tile, and carpet
- Roof, ladders, access ways, foot paths on the roof
- Removal of all construction materials and waste associated with construction
- Both electronic and paper copies of warranty information; as-built drawings for the buildings, all building systems and utilities; and approved shop drawings for all approved vendor submittals
- Elevators
- Casework including doors, windows, trim, and all other finish work

In addition to the criteria listed above, initiatives will be undertaken to prepare for operating and maintaining these buildings:

- Equipment and supplies needed to maintain the buildings will be procured (e.g., vacuum cleaners, carpet shampooers, cleaning supplies)
- Establishment of a shop area to support maintenance and research activities in ETF
- Upgrading areas that are deemed inadequate to support operations (e.g., adding power outlets to mail rooms and breakrooms to support needed equipment)

Project start date: 5/03 Completion date: 8/04 (See Section 4 for schedule details.)

Project total estimated cost: FY 2003—$40,000; FY 2004—$60,000 (See Section 5.)

3.6.3 Facility Use Agreements (WBS 1.06.03)

Facility Use Agreements (FUAs) are broken down in the following WBS by building:

1.06.03.1	CSB FUA—Complete FY 2003
1.06.03.2	ROB FUA—Complete FY 2003
1.06.03.3	ETF FUA
1.06.03.4	JICS/ORCAS FUA
1.06.03.5	RSC FUA

The intent of Laboratory management is to have an FUA for each active facility/building that houses ORNL staff, users/guests, contractor staff, programmatic equipment or other support equipment, and/or hazardous environments or hazardous materials. Facilities may be combined into common FUAs if the operational boundary conditions and the line management responsibility and accountability are identical and if the buildings are in close proximity to each other. An FUA must be established for each active facility to define the capabilities and processes that are in place within a facility and to ensure that the identified hazards are controlled within the confines of the facility or immediate work location.

Project start date: 11/02 Completion date: 6/04 (See Section 4 for schedule details.)

Project total estimated cost: $0 (Not funded through FRP.)

3.6.4 Maintenance Program Planning (WBS 1.06.04)

Maintenance program planning consists of two distinct, but related, efforts. The first effort will be to evaluate Computer-Aided Facility Management (CAFM) systems and Computerized Maintenance Management Systems (CMMS) and identify the systems that are deemed most appropriate for use at ORNL. As a part of facilities revitalization, there is an urgent need to improve operational performance, improve efficiency, and improve reliability of the infrastructure and support systems. These new tools will provide the framework to reach these desired goals. These systems will be procured, installed, configured, and piloted in the CSB. At the completion of the pilot project, a recommendation will be made to the Facilities Revitalization Team regarding the path forward to update and upgrade facilities management at ORNL. The CAFM and CMMS pilot activity is broken down by the following WBS:

1.06.04.1	Independent Third-Party Evaluation of ORNL systems (Heery International)
1.06.04.1.1	Scope - Evaluate existing systems and recommend approach to improve facilities management processes
1.06.04.1.2	Recommendations
1.06.04.1.2.1	Replace in-house software with COTS systems for CMMS, CAFM, and GIS functionality
1.06.04.1.2.2	Institute "best practice" maintenance management
1.06.04.2	Established broad inter-directorate project team
1.06.04.3	Established inter-directorate steering committee
1.06.04.4	Functional specifications of CMMS developed
1.06.04.5	Functional specifications of CAFM developed
1.06.04.6	Worked with Records Management Group to develop document management requirements
1.06.04.7	Pilot project critical success factors developed
1.06.04.8	Communication plan developed
1.06.04.9	Product evaluations conducted
1.06.04.9.1	CMMS [Datastream (SNS), SAP, Maximo]
1.06.04.9.2	CAFM [Bentley (SNS uses ProjectWise and Engineering uses MicroStation), FIS]
1.06.04.9.3	CMMS/CAFM (Tririga)
1.06.04.9.4	GIS (ArchView, in-house)
1.06.04.10	Estimated Pilot and Lab-wide Implementation Cost developed
1.06.04.11	Product Recommendation presented to Steering Committee and Herb Debban
1.06.04.12	Obtain Lab Management approval to continue
1.06.04.13	Procure CMMS and CAFM products and install products
1.06.04.14	Prepare CAFM for pilot implementation by October 2003
1.06.04.15	Begin CAFM pilot by January 2004
1.06.04.16	Prepare CMMS for pilot implementation by January 2004
1.06.04.17	Begin CMMS pilot by April 2004
1.06.04.18	Complete pilot activities by July 2004
1.06.04.19	Complete evaluation of pilot by September 2004
1.06.04.20	Present pilot results and provide recommendations to the steering committee by September 2004

The second effort will consist of developing a building maintenance program for use in monitoring and maintaining all the buildings collectively. The maintenance program planning is broken down by the following WBS:

1.06.04.21	**CSB Maintenance Program Plan**
1.06.04.21.1	CSB Annual Work Plan
1.06.04.21.2	CSB Preventive Maintenance Program
1.06.04.21.3	CSB Predictive Maintenance Program
1.06.04.22	**ROB Maintenance Program Plan**
1.06.04.22.1	ROB Annual Work Plan
1.06.04.22.2	ROB Preventive Maintenance Program
1.06.04.22.3	ROB Predictive Maintenance Program
1.06.04.23	**ETF Maintenance Program Plan**

1.06.04.23.1 ETF Annual Work Plan
1.06.04.23.2 ETF Preventive Maintenance Program
1.06.04.23.3 ETF Predictive Maintenance Program

1.06.04.24 JICS/ORCAS Maintenance Program Plan
1.06.04.24.1 JICS/ORCAS Annual Work Plan
1.06.04.24.2 JICS/ORCAS Preventive Maintenance Program
1.06.04.24.3 JICS/ORCAS Predictive Maintenance Program

1.06.04.25 RSC Maintenance Program Plan
1.06.04.25.1 RSC Annual Work Plan
1.06.04.25.2 RSC Preventive Maintenance Program
1.06.04.25.3 RSC Predictive Maintenance Program

The elements of the Maintenance Program for these buildings, the "Research Center Complex," are as follows:

- The Annual Work Plan provides information about both funds and personnel resources required for successful operation of the complex.
- Preventive maintenance (PM) is pre-planned with known labor estimates, material, and tool requirements. The types of PM procedures to be considered include:
  - Inspections
  - Adjustments
  - Testing
  - Calibrations
  - Rebuilds
  - Replacements
- The following sources will be utilized in the development of the PM program:
  - Vendor-recommended PM
  - O&M manuals
  - Plant experience such as craft workers who perform work and operate the equipment
  - Commissioning
  - Consultant-recommended PM
- Predictive maintenance compares the trend of measured physical parameters against known engineering limits for the purpose of detecting, analyzing, and correcting problems before failure occurs. This will result in need-based (rather than schedule-based) maintenance, thereby increasing reliability and reducing cost.

Project start date: 5/03 Completion date: 8/04 (See Section 4 for schedule details.)

Project total estimated cost: FY 2003—$150,000; FY 2004—$300,000 (See Section 5.)

Move Support Activities (WBS 1.06.05)

Experience gained from the move activities in FY 2003 have shown that significant resources are necessary to keep the facilities clean and support move-related activities

during the move process. Janitorial and laborer support is needed to remove trash. Support is also needed by carpenters, electricians, and other crafts to move, adjust, and protect structures and to perform a myriad of other tasks.

Project start date: 5/03 Completion date: 8/04 (See Section 4 for schedule details.)

Project total estimated cost: FY 2004—$35,000 (See Section 5.)

3.7 SECURITY, FIRE, AND ES&H TECHNICAL INTEGRATION (WBS 1.07)

The purpose of the Security, Fire, and ES&H Technical Integration Team is to ensure that technical support is provided to all personnel in all phases of the project. The availability of SMEs will assist customers in the safe and successful transfer of materials and equipment, ensuring protection of personnel, the environment, and the public. An ES&H plan has been developed for the East Campus consolidation activities. ES&H plans for construction activities are developed at a project level.

3.7.1 Security (WBS 1.07.01)

Security SMEs from the Laboratory Protection Division will provide support through their existing project and/or research program assignments. Security systems include proximity card systems, alarm systems, and badge and pass systems. Support for these security systems include the following:

- Providing input to the design of security systems and providing design review support
- Providing oversight of security system installation in new and renovated FRP facilities
- Providing tie-in and test support for security systems
- Providing oversight for moving security systems from Building 4512 to the CSB second-floor security room—Complete FY 2003
- Procuring and installing door locks, including keying of the door locks—Complete FY 2003 (except for EFT installation)

During FY 2004, the Laboratory Protection Division (LPD) will provide the following additional security support functions to the FRP:

- Complete installation of door locks, including keying in ETF.
- *Sensors and Electronics Laboratory in ETF*—To convert the Sensors and Electronics Laboratory in EFT-E-B101 to classified space. The LPD will design, procure, and install security hardware and integrate the hardware into the current security system.
- *JICS/ORCAS Support*—Design, procure, and install security access control and alarm systems in the JICS/ORCAS. Integrate the systems into ORNL plantwide system.
- *RSC Support*—Integrate RSC security access and alarm systems into the ORNL plantwide systems.

- *Building 5000 Badge and Pass*—The LPD will relocate security equipment related to the badging system to a temporary location to allow demolition of Building 5000 in the spring of 2004. When the RSC construction is complete, LPD will relocate the same badging system security equipment from the temporary location to the permanent RSC location.
- *ROB Classified Area*—LPD will obtain a security certification assessment of conference room ROB R-H210. LPD will purchase and have installed equipment required to convert the conference area into a classified area. LPD will also oversee building and service modifications required to meet classified area requirements.
- *Building 6011 Classified Area*—LPD will purchase and have installed security equipment and doors required to convert the Building 6011 conference room into a classified conference room.

Project start date: 5/03 Completion date: 9/04 (See Section 4 for schedule details.)

Project total estimated cost: FY 2003—$60,000; FY 2004—$195,000 (See Section 5.)

3.7.2 Fire Protection (WBS 1.07.02)

Fire Protection SMEs will assist operations personnel in preserving the integrity of the FUA, which includes the following:

- All systems and/or equipment installation must be in accordance with applicable building/fire codes to maintain the building's occupancy criteria.
- All work shall be managed and controlled through use of the Work Control Subject Area and other fire and hazardous material Standards-Based Management System (SBMS) subject areas.
- All hazardous material brought into the facility must be carried on an inventory maintained by the material custodian/user/owner and provided to F&O management.
- All doorways, corridors, and stairwells serving as part of the means of egress shall be maintained clear at all times.

New facility acceptance requires the following approved documents and information:

- Automatic sprinkler systems (per NFPA 13)
  - Contractor's certificate
  - Record/as-built drawings and calculations
  - Operating/maintenance manuals
- Automatic fire alarm systems (per NFPA 72)
  - Contractor's certificate
  - Record/as-built drawings and calculations
  - Operating/maintenance manuals
  - Input/output matrix
- Emergency power/UPS systems (per NFPA 110)
  - Letter of compliance
  - Operating/maintenance manuals
  - Manufacturer's certification

  - Test results
  - Schematics and drawings
- Operating/maintenance/specification information on
  - Fire dampers
  - Smoke dampers
  - Elevator recall functions
  - Other fire protection systems, as applicable

Project start date: 2/01 Completion date: 8/05 (See Section 4.)

Project total estimated cost: $20,000 in FY 2004

3.7.3 Health and Safety (WBS 1.07.03)

Health and safety (H&S) SMEs provide technical support during all phases of the project. It is anticipated that most of this support will be accomplished using existing company resources. The following activities are included in the scope of the Health and Safety support team:

- Review room data sheets as SME,
- Participate on Move Team for plan reviews,
- Review hoisting and rigging plans for equipment moves,
- Assist in transfer of hazardous materials from physical locations and in the Hazardous Materials Inventory System (HMIS) system,
- Assist in developing JHEs, research hazard analysis and controls (RHACs), and research safety summaries (RSS),
- Assist in development of FUAs for hazardous material storage issues,
- Conduct environmental and personal exposure monitoring for hazardous materials prior to and during equipment dismantling,
- Assist in identifying appropriate new hazard warnings and signage,
- Review lockout/tagout activities during all phases of the project,
- Review procurement documents to ensure appropriate health and safety provisions are included, and
- Provide health and safety oversight of field activities.

3.7.3.1 Health and Safety Planning

The Facilities Revitalization Project Integrated Safety Management Plan for Personnel and Laboratory Moves, ORNL/TM-2003/148 (http://www.ornl.gov/~dmsi/facilities/frp_ismp.pdf) has been developed and approved to integrate health and safety into project work practices. This plan is a road map for applying the appropriate integrated safety management controls from the ORNL SBMS system and ORNL FDD construction management procedures to the following FRP work:

- Moves/services performed by subcontractors
- Moves performed by UT-Battelle
- Packing/unpacking work performed by UT-Battelle

3.7.3.2 Project Planning

To promote smooth transfer of personnel and materials, the H&S SMEs are included at the earliest possible stages of the planning and approval process. This will eliminate work delays and stoppages.

Project start date: 2/01 Completion date: 8/05 (See Section 4.)

Project total estimated cost: FY 2004—$30,000

3.7.4 Environmental Compliance (WBS 1.07.04)

Environmental SMEs from the Environmental Protection and Waste Services Division provide support through their existing project and/or research program assignments. As a result, no significant costs should be incurred by the FRP. Environmental support will include the following:

- Preparing project review summaries to assess the impacts for groundwater, all air permits, the Clean Water Act, hazardous waste generated, and National Environmental Policy Act (NEPA) impacts.
- Ensuring construction activities are performed according to Tennessee General Permit No. TNR 10-0000, Storm Water Discharges from Construction Activities
- Preparing environmental protection and waste management portions of procurement specifications
- Providing oversight of construction/renovation implementation of waste management plans
- Providing overall environmental and waste management construction oversight

Project start date: 2/01 Completion date: 8/05 (See Section 4.)

Project total estimated cost: FY 2004—$10,000

3.8 INFRASTRUCTURE UPGRADE PROJECTS (WBS 1.08)

Infrastructure upgrades are a series of IGPPs and GPPs designed to integrate utilities, roads, common areas, and landscaping in support of current and planned major FRPs (see Fig. 1.2). These infrastructure upgrade projects support the following major projects:

- Computational Science Building (CSB)—Third-party project
- Engineering Technology Facility (ETF)—Third-party project
- Research Office Building (ROB)—Third-party project
- JICS/ORCAS—State-funded
- Research Support Center (RSC)—Line-item project

Descriptions of the East Campus infrastructure upgrade utility tie-ins, by system, are included in Appendix D.

3.8.1 Quadrangle Common Area IGPP (WBS 1.08.01)

This Quadrangle Common Area IGPP consists of designing and constructing the quadrangle lawn between the JICS/ORCAS Building and the RSC, constructing a portion of Seventh Street, constructing exterior seating and dining terraces adjacent to the cafeteria, and landscaping (see Fig. 1.2).

The project design, completed in FY 2003, fits architecturally within the overall East Campus Master Plan and consequentially works collaboratively with JICS/ORCAS, ROB, and RSC architectural components.

This GPP scope consists of

- Constructing the quadrangle lawn between the JICS/ORCAS Building and the RSC, including
  - Performing the rough and finish grading
  - Spreading topsoil and seeding or sodding
  - Installing landscaping consisting of trees and shrubs
  - Adding a signature sculpture
  - Providing area lighting
  - Providing sidewalks to connect the interpretive terrace and the RSC with the third-party buildings
- Constructing Seventh Street from the passenger drop-off node south to the Central Avenue extension, including
  - Constructing concrete sidewalks on both sides of Seventh Street
  - Installing landscape and hardscape between Seventh Street and the RSC consisting of concrete pavers, trees, shrubs, and seating areas
  - Installing concrete bollards on each side of the street
  - Installing area lighting
  - Demolishing the East Campus main entry sign
- Constructing exterior seating and dining terraces adjacent to the cafeteria, including
  - Installing concrete and brick pavers, steps, and plaza areas
  - Installing landscaping consisting of trees and shrubs
  - Installing outdoor seating and tables
  - Installing retaining walls for the plaza area
  - Installing a retaining wall east of the RSC
- Performing finish grading with topsoil, planting lawn/natural grasses, and installing landscaping and screening trees on the east side of the RSC
- Performing finish grading, planting lawn/natural grasses/groundcover and screening trees on the area north of the RSC

Project start date (predesign): 10/02 Completion date: 6/05 (See Section 4.)

Project total estimated cost: $3,100,000 (See Section 5.)

3.8.2 Central Avenue Extension IGPP (WBS 1.08.02)

This project consists of design, procurement, and construction work to extend Central Avenue east of Sixth Street and Central Avenue (see Fig. 1.2) and provide landscaping as follows:

- Demolishing existing asphalt and curbing at the current intersection of Central Avenue and Sixth Street—Complete FY 2003
- Constructing the Central Avenue Extension road approximately 680 ft to the east of the intersection of Central Avenue and Sixth Street to the east side of ROB—Complete FY 2003
  - Installing a sub-base of limestone aggregate and performing final grading
  - Performing final surfacing of the Central Avenue Extension road using asphalt and concrete pavers
  - Installing bollards to limit the Central Avenue Extension to pedestrian and emergency traffic
- Installing a storm water system along the Central Avenue Extension—Complete FY 2003
  - Installing storm drains and inlet structures along the extended Central Avenue
  - Connecting the storm drains and inlet structures into the East Campus Storm Drain System
- Installing hardscape and landscape between the extended Central Avenue and the ROB, including
  - Sidewalks
  - Trees and plantings
  - Bollards
  - Area lighting and outdoor electrical outlets
  - Drip irrigation system
- Provide hardscape and landscape for East Gathering Area (northeast of the ROB), West Gathering Area (northwest of the ROB), and 4500N Gathering Area (northwest of Building 4500N), including
  - Sidewalks
  - Trees and plantings
  - Bollards
  - Area lighting and outdoor electrical outlets
  - Drip irrigation
  - Seating for individuals

Project start date (predesign): 7/02 Completion date: 3/04 (See Section 4.)

Project total estimated cost: $1,725,000 (See Section 5.)

3.8.3 Main Entrance Modifications and Parking IGPP (WBS 1.08.03)

This Main Entrance Modifications and Parking IGPP consists of designing and constructing the East Campus main entry road, the north parking court, an interpretive terrace, a foundation for a future pergola with passive rain harvesting, a passenger drop-off node, and a visitors' center plaza between the JICS/ORCAS Building and the RSC (see Fig. 1.2).

The overall project design, completed in FY 2003, fits architecturally within the East Campus Master Plan and consequentially works collaboratively with JICS/ORCAS, ROB, and RSC architectural components.

This IGPP scope consists of

- Constructing the main entry road to the East Campus Area from Bethel Valley Road to the passenger drop-off node, including
  - Rough grading and layout
  - Subsurface preparations, including storm drain system connections
  - Concrete curbing with storm drains
  - Asphalt surfacing
  - Way-finding devices (consistent with campus standards)
  - Area lighting
  - Small grassy areas and restoration of grassy areas along the road (trees not included)
- Constructing the north parking court, including
  - Rough grading and layout
  - Subsurface preparations, including storm drain system connections
  - Concrete curbing and sidewalks, including connections to handicap access ramps to JICS/ORCAS and RSC entrances
  - Surfacing of parking areas and entrances to the parking areas with a combination of permeable concrete and asphalt
  - Landscaping (including trees to shade the parking area) and way-finding devices
  - Area lighting
- Constructing the interpretive terrace between the quadrangle lawn and the parking court, including
  - Rough grading and layout
  - Surfacing the walking areas with a combination of concrete, architectural concrete, and brick pavers
  - Circulation transition from the parking court to the quadrangle lawn
  - East Campus way-finding devices
  - Seating areas for individuals/large groups
  - Landscaping using passive irrigation technology that uses stormwater from the parking court
  - Area lighting
- Constructing a foundation for a future shade pergola between JICS/ORCAS and the RSC with embedded piping for passive rain harvesting
- Constructing a visitors' center plaza to integrate the interpretive terrace and passenger drop-off node with the RSC main entrance, including
  - Entrance plaza to the east of the passenger drop-off surfaced with a combination of architectural concrete and brick pavers
  - Passenger drop-off node surfaced with a combination of architectural concrete and brick pavers
  - Protective bollards
  - Landscaping consisting of trees and shrubs
  - Seating areas for individuals
  - Rain harvesting from surface drainage and RSC roof drainage

Project start date (predesign): 10/02 Completion date: 3/05 (See Section 4.)

Project total estimated cost: $2,725,000 (See Section 5.)

3.8.4 Storm Drain Modifications IGPP (WBS 1.08.04)—Complete FY 2003

This project consisted of design, procurement, and construction work to replace and realign a 48-in. underground storm sewer line (see Fig. 1.2) and evaluate the watershed. This IGPP

- Replaced and realigned the underground 48-in. storm sewer from the north entrance of the East Campus area to manhole SD-MH-105A at Central Avenue using a 36-in. and 48-in. reinforced concrete pipe
- Modified the existing head wall at the north end of the old 48-in. storm sewer line to accommodate the new 36-in. line
- Added new manhole(s) or catch basin(s) as required for final alignment
- Evaluated the watershed for the East Campus area to determine if a detention basin is needed on the north side of Bethel Valley Road
- Added a new step weir at the pond outlet

In addition, this project provided design improvements to the stormwater system from the pond step weir to the existing stormwater system east of ETF and south of Building 6012 and a stormwater detention basin north of Bethel Valley Road.

Project start date: 7/02 Completion date: 6/03 (See Section 4.)

Project total estimated cost: $425,000 (See Section 5.)

3.8.5 Natural Gas Line IGPP (WBS 1.08.05)—Complete FY 2003

This East Campus IGPP consisted of design, procurement, and construction work associated with a new underground natural gas line (see Fig. 1.2) constructed of high-density polyethylene.

The new natural gas line was routed from an existing metering station (near the intersection of Melton Valley Access Road and Bethel Valley Road) to the northeast corner property boundary for the East Campus Third-Party Project. The new 6- and/or 3-in.-diameter line ties in to the metering station at an existing valve pit and was routed west, along the north side of Bethel Valley Road.

Approximately 2000 ft west of the metering station, a 6 in. × 6 in. × 3 in. tee was installed. The 6-in. run of the tee was terminated with a 6-in. valve and a blind flange for future expansion.

The 3-in. branch from the tee was routed to the south, under Bethel Valley Road. A 3 in. × 3 in. × 3 in. tee with valve and blind flange was provided behind RSC for future connection to the cafeteria kitchen.

The 3-in. line was routed through the grassy area adjacent to the western edge of the ORNL Swan Pond and terminated to the northeast corner of the third-party

development property. The Third-Party Project tied in at this point for service to their Central Energy Plant.

Project start date: 7/02 Completion date: 1/03 (See Section 4.)

Project total estimated cost: $290,000 (See Section 5.)

3.8.6 Utility Modifications IGPP (WBS 1.08.06)

This project consists of design, procurement, and construction work to extend chilled and hot water lines (see Fig. 1.2) in the Central Avenue Extension area and extend potable water lines to complete a loop north of the East Campus Development. During FY 2003 the design was completed. This IGPP

- Extended the chilled supply and return lines along the north side of the Central Avenue Extension from near the intersection of Sixth Street and Central Avenue to the east end of the Central Avenue Extension
- Extended the hot water supply and return lines along the north side of the Central Avenue Extension from near the intersection of Sixth Street and Central Avenue to the east end of the Central Avenue Extension
- Extended the 16-in. potable water line from north of JICS/ORCAS to the existing 24-in. water main north of Bethel Valley Road. From the 24-in. water main north of Bethel Valley Road, a 12-in. potable water line was built southeast to just south of Building 6012. Fire hydrants were added to these water lines north of the Interpretative Terrace and east of the RSC.

Project start date: 7/02 Completion date: 1/04 (See Section 4.)

Project total estimated cost: $500,000 (See Section 5.)

3.8.7 Upgrade Sewage Collection IGPP (WBS 1.08.07)—Complete FY 2003

This project consisted of design, procurement, and construction work (see Fig. 1.2) to extend the sewage collection system parallel to the Central Avenue Extension and provide two small extensions across White Oak Avenue. This IGPP

- Extended service from the existing sanitary sewer manhole SS-MH-103 (south of JICS/ORCAS) to the east end of the Central Avenue extension and added two new manholes. One manhole was added at the east end of the extension, and one manhole was added west of Seventh Street.
- Tied in the existing sanitary sewer line south of White Oak Avenue to existing Manhole MH-101. A new manhole was added at the tie-in location with the existing sanitary sewer line.
- Tied in the existing sanitary sewer line south of White Oak Avenue to an existing clean-out on the south side of ETF. A tee was added to the existing sanitary sewer line at the tie-in location.

Project start date: 7/02 Completion date: 6/03 (See Section 4.)

Project total estimated cost: $284,000 (See Section 5.)

3.9 EXCESS MATERIALS DISPOSITION (WBS 1.09)

The goal of this effort is to remove excess materials from buildings that are included in this plan. The buildings are no longer required for the Office of Science (SC) mission and are to be vacated, so the buildings can be transferred to another DOE program or put into "cheap-to-keep" mode. The buildings that will be included in this effort are identified in Table 3.1. To accomplish this task, the following activities will be undertaken.

An inventory of excess materials in each of the facilities will be developed. The inventory will develop information on the nature of the excess material (e.g., property number, size, weight, and process data). This information will be evaluated to determine the most cost-effective disposition pathway for the material. The inventory process will also provide an effective way to develop and produce "manifests" for materials that are being disposed. The inventory process will also be useful in capturing information that will be essential to planning for future disposition efforts, identifying opportunities for process improvements, and developing performance metrics.

Excess materials will be dispositioned through an appropriate pathway based on the nature of the material. To date, most of the materials removed from buildings being vacated have been green-tagged and processed through salvage/sales or recycled as scrap metal. Contaminated or "suspect" items have been containerized, processed, and packaged for disposal. Several "breakthrough" disposition pathways are currently being pursued, including increasing the amount of materials sent for scrap/recycling and to the on-site sanitary/industrial landfill and establishing off-site disposal capabilities at government or commercial facilities, using a mobile radiation monitor to help reduce radiation survey costs. It will be the goal of the disposition process to send materials through pathways with the lowest system cost. The following disposition pathways will be used:

- ORNL Salvage/Property Sales—The ORNL salvage/sales process will be used for materials that can be green-tagged and have resale value. In general, this disposition pathway will only be used for materials with sufficient sale/salvage value to off-set the cost for green-tagging.
- Scrap metal—The ORNL scrap metal contract will be used. Currently scrap metal for recycle cannot come from an RMMA and must be green-tagged. More cost-effective methods will be sought to demonstrate that excess materials sent to scrap comply with DOE Order 5400.5 requirements.
- Industrial/sanitary waste—Materials that meet the waste acceptance criteria will be disposed of at the Y-12 sanitary industrial landfill. A Special Waste disposal permit will be sought for the large volume of noncontaminated equipment expected to be encountered during this cleanup effort.
- Chemical reuse—Chemicals that meet the acceptance criteria will be sent to the Chemical Management Center at ORNL for reuse.
- Waste Chemicals—Chemicals that are considered waste will be managed through the ORNL waste certification process and the Laboratory Waste Services chemical disposal contract.

Table 3.1. Cost Estimates for Facility Excess Materials Disposition Activities by WBS ($ in thousands)

WBS 1.09	Facility	Facility Name	Ft^2	Cost ($K)	
.01	2011	Electric and AC Service Centers	6,627	281	Complete
.02	2024	Quality Assurance Inspection Office Building	10,300	52	Complete
.03	2093	Environmental Storage Building	420	8	Complete
.04	3013	Energy Development Storage Building	616	12	Complete
.05	7600	Experimental Gas Cooled Reactor	73,000	37	Complete
.06	9204-1	Engineering Technology	196,700	4,100	Complete
.07	9401-1	Engineering Technology Laboratory Facility	12,000	300	Complete
.08	9743-2	Pigeon Quarters	2,200	11	Complete
.09	9770-02	Radiation Source	155	1	Complete
.10	9999-3	Electrical Switchgear and Rectifier	2,400	60	Complete
.11	9610-2	Flammable Materials Storage	683	17	Complete
.12	9999-4	Electrical Equipment	300	8	Complete
		Total FY 2003	**305,401**	**4,887**	
.13	2019	Laser Laboratory	800	20	
.14	3037	Chemical Technology Offices	8,008	80	
.15	3504	Geosciences Laboratory	3,952	198	
.16	3523	RIS Sensor Development, South Annex	1,170	29	
~~.17~~	~~3542~~	~~Storage Building for 3506 and 3517~~	~~576~~	~~14~~	Transfered to BJC
.18	3587	Instrument Lab Annex and Clothing Storage	5,473	82	
.19	3605	TSD Storage Building	416	21	
.20	3610	Storage Building	400	21	
.21	9210	Mammalian Genetics	65,700	657	
.22	9224	Molecular Biology Facility	10,100	152	
.23	9422	LCTF Compressor	2,500	63	
.24	9999-1	Motor Generator	500	13	
		Total FY 2004	**99,019**	**1,336**	
.25	2008	ORNL Whole Body Counter	4,368	87	
.26	2009	Cafeteria Warehouse	4,368	66	
.27	2010	ORNL Cafeteria	13,099	20	
.28	2517	HRDP/Training	2,880	29	
.29	3003	Surface Modification and Characterization Facility	10,806	32	
.30	3017	Chemical Technology Division Annex	10,140	15	
.31	3036	Radioisotope Material Shipping and Packaging	1,529	54	
.32	3080	Superconductivity Laboratory	1,872	56	
.33	3100	Source and Special Materials Vault	1,686	59	
.34	3115	Solid State Offices	2,792	28	
.35	3136	Equipment Test Facility—3019	600	21	
.36	3543	Maces Storage Building	651	13	
.37	3503	High Radiation Level Chemical Engineering Lab	13,716	481	
.38	9201-2	Fusion Energy Administration and Lab Building	257,200	5,144	
.39	9204-3	Isotope Separations	216,200	4,324	
		Total FY 2005	**541,907**	**10,429**	
		Grand Total	**946,327**	**16,652**	

- Materials that are contaminated with radioactive materials above release criteria will be managed as waste through the existing ORNL waste certification process and disposed of at government or commercial disposal sites.

Project schedule: The inventory process began with a pilot effort conducted at 9204-1 from 8/19/02 to 9/30/02. The inventory effort will be performed for each of the remaining facilities and will be scheduled to be performed in parallel with the start of disposition activities in the facility.

The material disposition activities are assumed to be consistent from building to building but may vary in duration depending on the size and nature of the facility.

Project cost: The cost by WBS element for the Excess Material Disposition efforts is included in Table 3.1. A summary by fiscal year is provided in Table 3.2.

Table 3.2. Cost Estimates for Facility Excess Materials Disposition Activities by Fiscal Year ($ in thousands)

WBS	Activity	FY 2003	FY 2004	FY 2005	Total
1.09	Total	4,887	1,336	10,429	16,652

The following assumptions are reflected in these estimates:

- Legacy Material Tax is provided based on Senior Leadership prioritization, and direct programmatic funding is provided for the remaining cost each year.
- A facility transition agreement is reached with the Y-12 Complex that does not require removal of all material from buildings (e.g., furniture remains in office and lab areas).
- Facility occupants will be responsible for satisfying "ORNL Space Return Criteria" noted in Appendix A.

Project start date: 8/02 Completion date: 8/05 (See Section 4 for schedule details.)

Project total estimated cost: $16,652,000 (See Section 5.)

3.10 AUDIO/VISUAL EQUIPMENT (WBS 1.10)

The purpose of this project is to determine requirements, identify equipment configurations to meet the requirements, prepare funding proposals (as required), assist in procurement, and arrange for installation/training for the audio and video needs for the East Campus facilities (CSB, ETF, ROB, JICS/ORCAS, and RSC). Note: Installation of this equipment is not required for occupancy of the facilities. Specific identified tasks include

- Formulate designs
  - Based on requirements, group similar rooms and establish standard baseline designs based on ORNL standards
  - Identify desired unique capabilities and systems not met by baseline designs
  - Establish potential solutions for unique capabilities and systems
  - Identify and acquire knowledge of latest technology by telephone and travel

  - Determine spare equipment and maintenance needs
  - Continue to keep customers and building engineers in loop as designs evolve
  - Involve external consultants in special design considerations
  - Ensure equipment availability
  - Finalize designs
  - Obtain approval for any special requests
- Identify potential vendors and their capabilities
  - Determine needed service and equipment providers
  - Evaluate potential vendors at their locations or previous installations
  - Evaluate in-house capabilities for system installations
- Participate in procurement process
  - Current knowledge and known requirements suggest individual items will be less than $25K
  - Involve procurement personnel to ensure understanding and compliance of procurement procedures
  - Other steps—to be determined
- Install equipment
  - Determine installation schedule to ensure efficiency
  - Ensure needed documentation and equipment are available
  - Oversee installations
- Test all systems
  - Develop test checklists
  - Perform functionality checks
  - Resolve problems
- Provide training mechanisms
  - Operational guides (manual and electronic)
  - Training personnel for operational assistance

Third-Party Facilities (CSB, ETF, ROB):

Project start date: 10/02 Completion date: 1/04 (See Section 4 for schedule details.)

Project total estimated cost: $590,000* (See Section 5.)—$350,000 FY 2003; $240,000 FY 2004

JICS/ORCAS

Project start date: 12/02 Completion date: 5/04 (See Section 4 for schedule details.)

Project total estimated cost: $800,000 (See Section 5.)—State of Tennessee providing $500,000

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*Cost estimate: $490K (assumes projector-only for the "minimum" configured conference room, projector+smartboard+computer for the "basic" conference room, five videoconferencing systems as requested by stakeholders, and $30K applied towards one special-purpose room with remaining funding being supplied by the Computing and Computational Sciences Directorate).

RSC

Project start date: 9/02 Completion date: 10/04 (See Section 4 for schedule details.)

Project total estimated cost: $590,000 (See Section 5.)

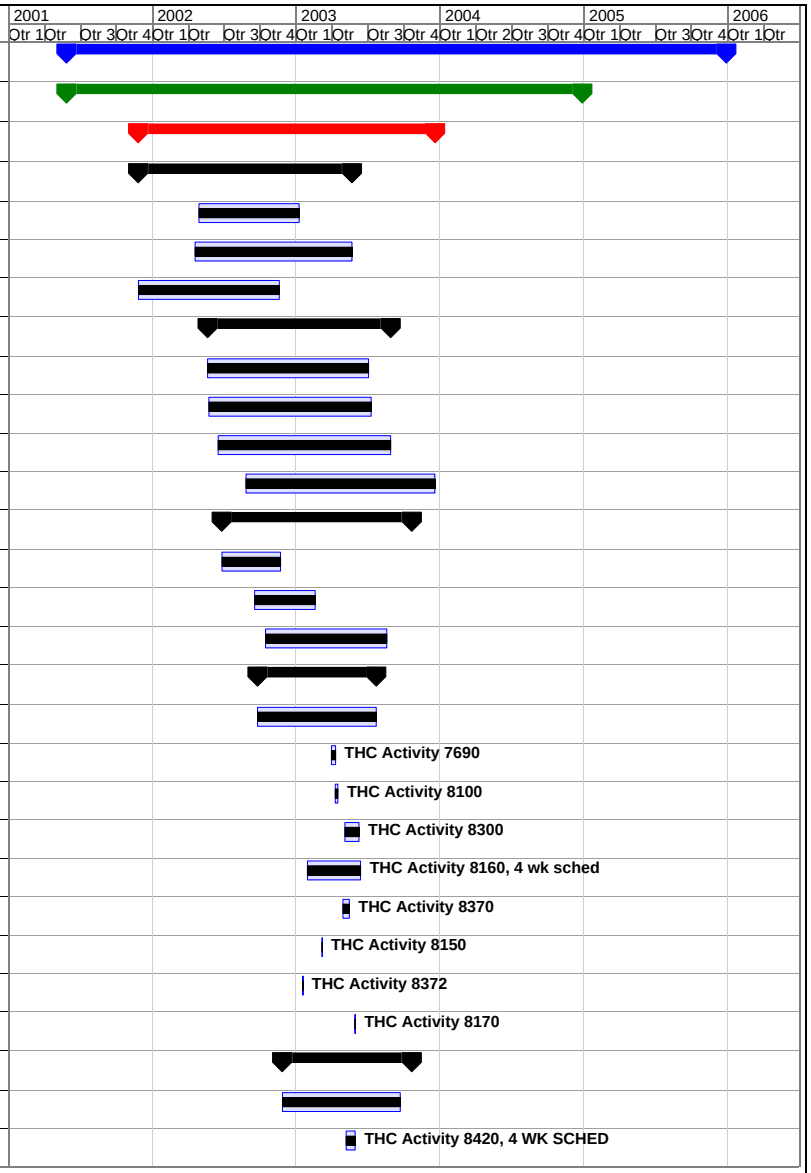
4. SCHEDULE

4.1 FACILITIES REVITALIZATION PROJECT INTEGRATED SCHEDULE

Figure 4.1 on the following pages contains an integrated schedule depicting progress to date for the FRP. This schedule is organized by the FRP WBS and has been developed by integrating individual project schedules with the other FRP work elements. Logical ties have been developed within the schedule to integrate related work elements. This schedule is the early start schedule based on the following assumptions:

- Adequate internal resources are available to support moves.
- Contingency is built into vendor box moves during the week.
- Ivan Allen/Steelcase meet their installation schedule for demountable wall panels and furniture.
- Move vendor has adequate manpower to meet box move schedule.
- Capital and Third-Party Projects supporting FRP are completed as scheduled.
- Funding levels will be maintained through FY 2003 and FY 2004.
- Some moves may be constrained by R&D mission deliverable schedules.

ID	WBS	Task Name	Duration	Start		Finish	
1	1	ORNL East Campus Development	1149 d	2/26/01	A	9/28/05	
2	1.01	Facilities Design & Const.	898 d	2/26/01	A	9/27/04	
3	1.01.01	Computational Sciences Building	517 d	8/27/01	A	9/19/03	A
4	1.01.01.01	CSB Preconstruction	371 d	8/27/01	A	2/20/03	A
5	1.01.01.01.01	UTB Review-CSB	178 d	1/28/02	A	10/9/02	A
6	1.01.01.01.02	Bid and Award-CSB	273 d	1/18/02	A	2/20/03	A
7	1.01.01.01.03	Design and Permitting-CSB	246 d	8/27/01	A	8/20/02	A
8	1.01.01.02	CSB Procurement	320 d	2/19/02	A	5/29/03	A
9	1.01.01.02.01	Prepare and Deliver Submittals-CSB	283 d	2/19/02	A	4/4/03	A
10	1.01.01.02.02	Review and Return Submittals-CSB	284 d	2/22/02	A	4/10/03	A
11	1.01.01.02.03	Material Fab & Delivery-CSB	301 d	3/18/02	A	5/29/03	A
12	1.01.01.03	Site Work Construction	330 d	5/28/02	A	9/19/03	A
13	1.01.01.04	CSB Construction	330 d	3/27/02	A	7/22/03	A
14	1.01.01.04.01	CSB Foundations and SOG	104 d	3/27/02	A	8/23/02	A
15	1.01.01.04.02	CSB Superstructure	107 d	6/19/02	A	11/19/02	A
16	1.01.01.04.03	CSB Enclosure	213 d	7/16/02	A	5/20/03	A
17	1.01.01.04.04	CSB Rough-in	206 d	6/26/02	A	4/23/03	A
18	1.01.01.04.04.1	CSB Rough-in (Total All Floors)	206 d	6/26/02	A	4/23/03	A
19	1.01.01.04.04.2	Voice/Data Cable&Racks-1st Floor CSB (THC Act. 7690)	9 d	12/30/02	A	1/10/03	A
20	1.01.01.04.04.3	Voice/Data Cable&Racks-2nd Floor CSB (THC Act. 8100)	5 d	1/9/03	A	1/15/03	A
21	1.01.01.04.04.4	Voice/Data Cable&Racks-3rd Floor CSB (THC Act. 8300)	26 d	2/3/03	A	3/10/03	A
22	1.01.01.04.04.5	Install Piping in Central Energy Plant (THC Act. 8160)	92 d	10/30/02	A	3/14/03	A
23	1.01.01.04.04.6	ORNL Install 15kv Feeder to CSB Gen/Transformer (THC Activity 8370)	13 d	1/29/03	A	2/14/03	A
24	1.01.01.04.04.7	Set & Tie-in Transformers for ETF (THC Activity 8150)	1 d	12/6/02	A	12/6/02	A
25	1.01.01.04.04.8	Install ROB 15kv Feeder to Switches 1 & 2 (Activity 8372)	1 d	10/18/02	A	10/18/02	A
26	1.01.01.04.04.9	Energize Permanent Power for CSB (THC Activity 8170)	1 d	2/28/03	A	2/28/03	A
27	1.01.01.04.05	CSB Finishes	224 d	8/28/02	A	7/22/03	A
28	1.01.01.04.05.1	CSB Finishes (Total All Floors)	205 d	8/28/02	A	6/23/03	A
29	1.01.01.04.05.2	Prime & First Coat Walls First Floor CSB (THC Activity 8420)	17 d	2/6/03	A	2/28/03	A



Facilities Revitalization Project Integrated Schedule

Task | Progress | Milestone | Summary | Deadline

Fig. 4.1. Facilities Revitalization Project Integrated Schedule

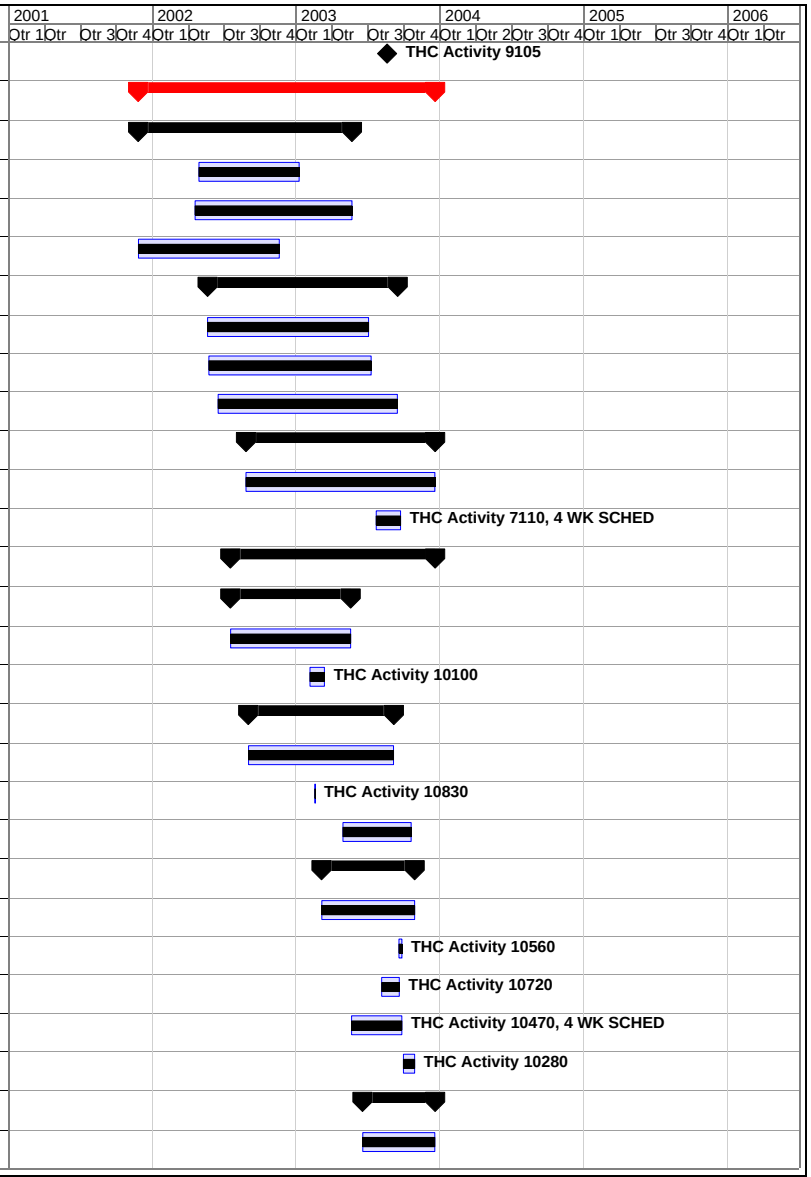
ID	WBS	Task Name	Duration	Start		Finish	
30	1.01.01.04.05.3	Install First Floor Access Flooring CSB (THC Activity 8660)	22 d	1/21/03	A	2/19/03	A
31	1.01.01.04.05.4	Install Second Floor Access Flooring CSB (THC Activity 9100)	25 d	3/10/03	A	4/11/03	A
32	1.01.01.04.05.5	Install Ceiling Tile Second Floor CSB (THC Activity 8800)	33 d	3/13/03	A	4/29/03	A
33	1.01.01.04.05.6	Install Millwork First Floor CSB (THC Activity 8460)	5 d	3/3/03	A	3/7/03	A
34	1.01.01.04.05.7	Install Millwork Second Floor CSB (THC Activity 8740)	5 d	3/3/03	A	3/7/03	A
35	1.01.01.04.05.8	Install Millwork Third Floor CSB (THC Activity 8940)	5 d	3/3/03	A	3/7/03	A
36	1.01.01.04.05.9	Finish Paint First Floor CSB (THC Act. 8530)	33 d	3/12/03	A	4/28/03	A
37	1.01.01.04.05.10	Finish Paint CSB Second Floor (THC Act.8820)	39 d	3/6/03	A	4/30/03	A
38	1.01.01.04.05.11	Finish Paint Third Floor CSB (THC Act. 9020)	23 d	3/21/03	A	4/23/03	A
39	1.01.01.04.05.12	Install VCT/Carpet First Floor CSB (THC Act. 8600)	25 d	3/24/03	A	4/28/03	A
40	1.01.01.04.05.13	Install VCT/Carpet Second Floor CSB (THC Activity 8840)	32 d	3/17/03	A	4/30/03	A
41	1.01.01.04.05.14	Install VCT/Carpet Third Floor CSB (THC Activity 9040)	6 d	4/15/03	A	4/23/03	A
42	1.01.01.04.05.15	Install Ceiling Grid First Floor CSB (THC Act. 8450)	45 d	2/12/03	A	4/15/03	A
43	1.01.01.04.05.16	Rock, Tape & Finish Third Floor CSB (THC Act. 8900)	24 d	1/13/03	A	2/14/03	A
44	1.01.01.04.05.17	Install Ceiling Tile First Floor CSB (THC Act. 8590)	23 d	3/20/03	A	4/22/03	A
45	1.01.01.04.05.18	Install Acoustical Wall Panels Second Floor CSB (THC Act. 8830)	5 d	4/21/03	A	4/25/03	A
46	1.01.01.04.05.19	Pre-punch First Floor by THC, CSB (THC Activity 8630)	9 d	4/15/03	A	4/28/03	A
47	1.01.01.04.05.20	UTBDC Install Clean Room First Floor CSB (THC Activity 9600)	5 d	3/17/03	A	3/21/03	A
48	1.01.01.04.05.21	Install Ceiling Tile Third Floor CSB (THC Act. 9000)	9 d	4/9/03	A	4/22/03	A
49	1.01.01.04.05.22	Heery, Keenan, ORNL Punch List 1st Floor CSB (THC Activity 8640)	2 d	4/29/03	A	4/30/03	A
50	1.01.01.04.05.23	Heery, Keenan, ORNL Punch List 2nd Floor CSB (THC Activity 8885)	1 d	5/7/03	A	5/7/03	A
51	1.01.01.04.05.24	Heery, Keenan, ORNL Punch List 3rd Floor CSB (THC Activity 9085)	1 d	4/24/03	A	4/24/03	A
52	1.01.01.04.05.25	Complete Punch List First Floor CSB (THC Activity 8620)	41 d	5/22/03	A	7/22/03	A
53	1.01.01.04.05.26	Complete Punch List Second Floor CSB (THC Activity 8890)	41 d	5/22/03	A	7/22/03	A
54	1.01.01.04.05.27	Complete Punch List Third Floor CSB (THC Activity 9090)	41 d	5/22/03	A	7/22/03	A
55	1.01.01.04.05.28	ORNL Install Removable Walls Third Floor CSB (THC Activity 9260)	20 d	5/12/03	A	6/9/03	A
56	1.01.01.04.05.29	Final Clean First Floor CSB (THC Activity 8650)	22 d	4/30/03	A	5/30/03	A
57	1.01.01.04.05.30	Final Clean Second Floor CSB (THC Activity 8895)	16 d	4/28/03	A	5/19/03	A
58	1.01.01.04.05.31	Final Clean Third Floor CSB (THC Activity 9095)	3 d	4/21/03	A	4/23/03	A

Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
59	1.01.01.04.05.32	Substantial Completion CSB (THC Activity 9105)	1 d	5/22/03	A	5/22/03	A
60	**1.01.02**	**Engineering Technology Facility**	**517 d**	**8/27/01**	**A**	**9/19/03**	**A**
61	**1.01.02.01**	**ETF Preconstruction**	**371 d**	**8/27/01**	**A**	**2/20/03**	**A**
62	1.01.02.01.01	UTB Review-ETF	178 d	1/28/02	A	10/9/02	A
63	1.01.02.01.02	Bid and Award-ETF	273 d	1/18/02	A	2/20/03	A
64	1.01.02.01.03	Design and Permitting-ETF	246 d	8/27/01	A	8/20/02	A
65	**1.01.02.02**	**ETF Procurement**	**332 d**	**2/19/02**	**A**	**6/16/03**	**A**
66	1.01.02.02.01	Prepare and Deliver Submittals-ETF	283 d	2/19/02	A	4/4/03	A
67	1.01.02.02.02	Review and Return Submittals-ETF	284 d	2/22/02	A	4/10/03	A
68	1.01.02.02.03	Material Fab & Delivery-ETF	313 d	3/18/02	A	6/16/03	A
69	**1.01.02.03**	**Site work Construction**	**330 d**	**5/28/02**	**A**	**9/19/03**	**A**
70	1.01.02.03.01	Site Work Construction (Total Site work Activities)	330 d	5/28/02	A	9/19/03	A
71	1.01.02.03.02	ORNL Hawkins Central Ave. Extension Road Base (THC Activity 7110)	44 d	4/23/03	A	6/24/03	A
72	**1.01.02.04**	**ETF Construction**	**357 d**	**4/18/02**	**A**	**9/19/03**	**A**
73	**1.01.02.04.01**	**ETF Foundations and SOG**	**208 d**	**4/18/02**	**A**	**2/17/03**	**A**
74	1.01.02.04.01.1	ETF Foundations and SOG	208 d	4/18/02	A	2/17/03	A
75	1.01.02.04.01.2	Prepare and Place SOG SW, ETF (THC Activity 10100)	25 d	11/6/02	A	12/12/02	A
76	**1.01.02.04.02**	**ETF Superstructure**	**254 d**	**6/3/02**	**A**	**6/6/03**	**A**
77	1.01.02.04.02.1	ETF Superstructure	254 d	6/3/02	A	6/6/03	A
78	1.01.02.04.02.2	Install UTBDC Bedplate, First Floor ETF (THC Activity 10830)	1 d	11/18/02	A	11/18/02	A
79	1.01.02.04.03	ETF Enclosure	120 d	1/29/03	A	7/21/03	A
80	**1.01.02.04.04**	**ETF Rough-in**	**160 d**	**12/6/02**	**A**	**7/29/03**	**A**
81	1.01.02.04.04.1	ETF Rough-in (Total All Floors)	160 d	12/6/02	A	7/29/03	A
82	1.01.02.04.04.2	Voice/Data Cable&Racks-1st Floor ETF (THC Act. 10560)	6 d	6/20/03	A	6/27/03	A
83	1.01.02.04.04.3	Voice/Data Cable&Racks-2nd Floor ETF (THC Act. 10720)	32 d	5/7/03	A	6/20/03	A
84	1.01.02.04.04.4	Install & Insulate Ductwork-First Floor ETF (THC Activity 10470)	90 d	2/20/03	A	6/27/03	A
85	1.01.02.04.04.5	Start-up and Adjust Elevators, ETF (THC Activity 10280)	19 d	7/1/03	A	7/29/03	A
86	**1.01.02.04.05**	**ETF Finishes**	**127 d**	**3/20/03**	**A**	**9/19/03**	**A**
87	1.01.02.04.05.1	ETF Finishes (Total All Floors)	127 d	3/20/03	A	9/19/03	A



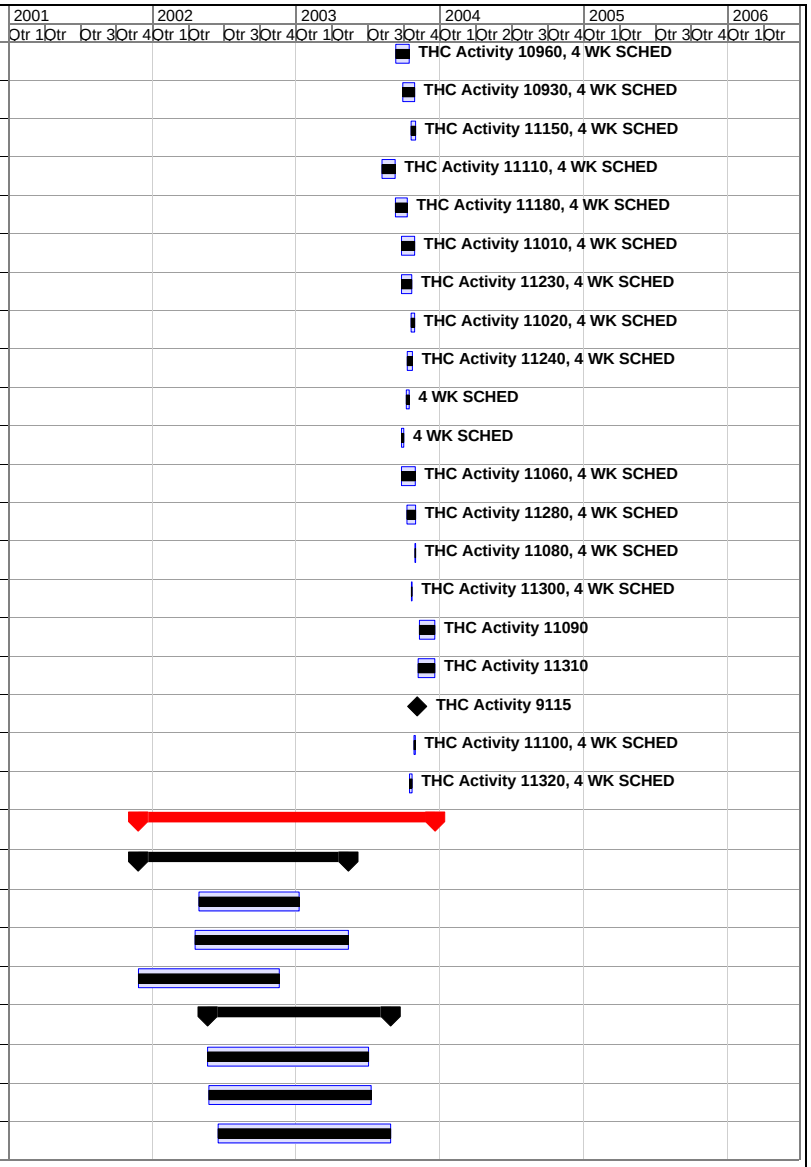
Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

10/24/03 | 4 - 5 | Progress Reported Through 9/30/03

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
88	1.01.02.04.05.2	Install Ceiling Grid First Floor ETF (THC Act. 10960)	23 d	6/12/03	A	7/16/03	A
89	1.01.02.04.05.3	Install Millwork First Floor ETF (THC Activity 10930)	21 d	6/30/03	A	7/30/03	A
90	1.01.02.04.05.4	Install Millwork Second Floor ETF (THC Activity 11150)	10 d	7/21/03	A	8/1/03	A
91	1.01.02.04.05.5	Rock, Tape & Finish Second Floor ETF (THC Act. 11110)	23 d	5/8/03	A	6/10/03	A
92	1.01.02.04.05.6	Install Ceiling Grid Second Floor ETF (THC Act. 11180)	21 d	6/11/03	A	7/11/03	A
93	1.01.02.04.05.7	Finish Paint ETF First Floor (THC Act. 11010)	22 d	6/26/03	A	7/29/03	A
94	1.01.02.04.05.8	Finish Paint ETF Second Floor (THC Act. 11230)	16 d	6/27/03	A	7/22/03	A
95	1.01.02.04.05.9	Install VCT/Carpet/Seal Floors First Floor ETF (THC Activity 11020)	8 d	7/21/03	A	7/30/03	A
96	1.01.02.04.05.10	Install VCT/Carpet Second Floor ETF (THC Activity 11240)	10 d	7/11/03	A	7/24/03	A
97	1.01.02.04.05.11	Epoxy Floors-First Floor ETF	6 d	7/9/03	A	7/16/03	A
98	1.01.02.04.05.12	Epoxy Floors-Second Floor ETF	5 d	6/26/03	A	7/2/03	A
99	1.01.02.04.05.13	Install Door and Hardware First Floor ETF (THC Activity 11060)	23 d	6/27/03	A	7/31/03	A
100	1.01.02.04.05.14	Install Door and Hardware Second Floor ETF (THC Activity 11280)	17 d	7/10/03	A	8/1/03	A
101	1.01.02.04.05.15	Heery, Keenan, ORNL Punch List 1st Floor ETF (THC Activity 11080)	2 d	7/31/03	A	8/1/03	A
102	1.01.02.04.05.16	Heery, Keenan, ORNL Punch List 2nd Floor ETF (THC Activity 11300)	2 d	7/22/03	A	7/23/03	A
103	1.01.02.04.05.17	Complete Punch List First Floor ETF (THC Activity 11090)	29 d	8/11/03	A	9/19/03	A
104	1.01.02.04.05.18	Complete Punch List Second Floor ETF (THC Activity 11310)	30 d	8/8/03	A	9/19/03	A
105	1.01.02.04.05.19	Substantial Completion ETF (THC Activity 9115)	1 d	8/6/03	A	8/6/03	A
106	1.01.02.04.05.20	Final Clean First Floor, ETF (THC Activity 11100)	4 d	7/28/03	A	7/31/03	A
107	1.01.02.04.05.21	Final Clean Second Floor ETF (THC Activity 11320)	5 d	7/17/03	A	7/23/03	A
108	**1.01.03**	**Research Office Building**	**517 d**	**8/27/01**	**A**	**9/19/03**	**A**
109	**1.01.03.01**	**ROB Preconstruction**	**364 d**	**8/27/01**	**A**	**2/11/03**	**A**
110	1.01.03.01.01	UTB Review-ROB	178 d	1/28/02	A	10/9/02	A
111	1.01.03.01.02	Bid and Award-ROB	266 d	1/18/02	A	2/11/03	A
112	1.01.03.01.03	Design and Permitting-ROB	246 d	8/27/01	A	8/20/02	A
113	**1.01.03.02**	**ROB Procurement**	**320 d**	**2/19/02**	**A**	**5/29/03**	**A**
114	1.01.03.02.01	Prepare and Deliver Submittals-ROB	283 d	2/19/02	A	4/4/03	A
115	1.01.03.02.02	Review and Return Submittals-ROB	284 d	2/22/02	A	4/10/03	A
116	1.01.03.02.03	Material Fab & Delivery-ROB	301 d	3/18/02	A	5/29/03	A

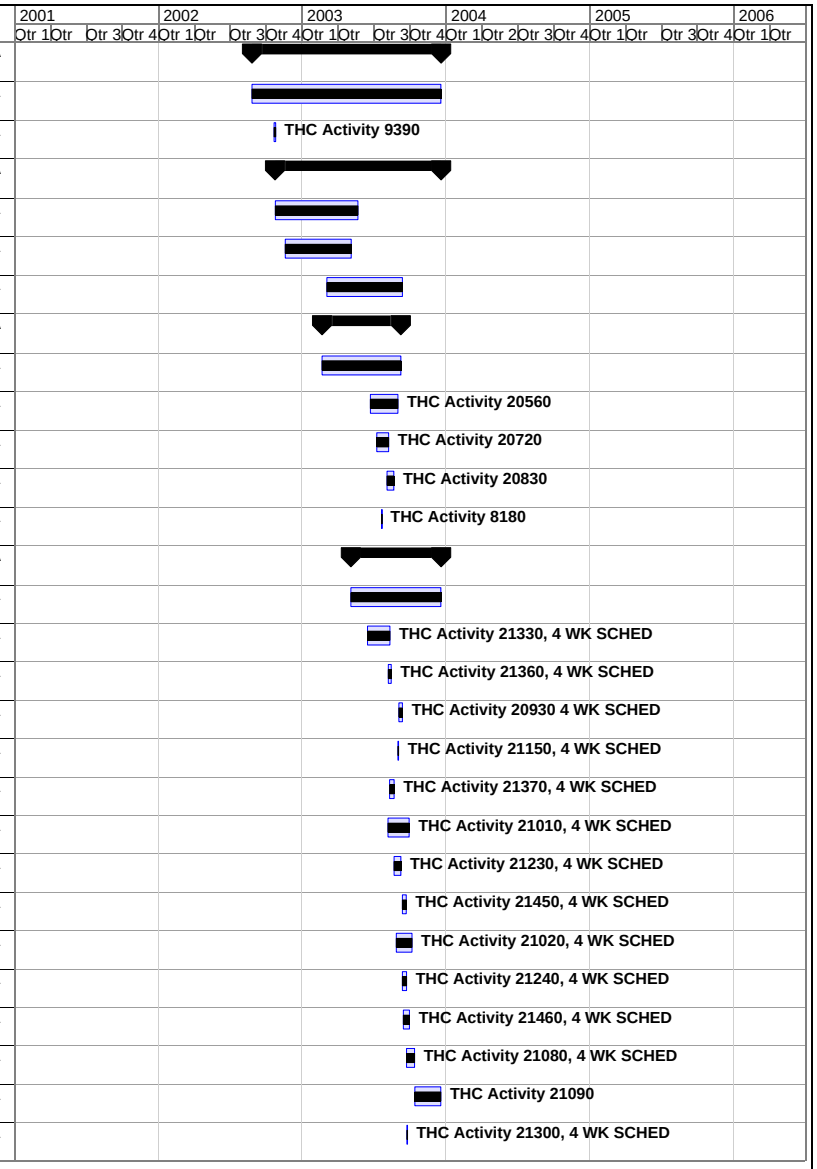


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
117	**1.01.03.03**	**Site Work Construction**	**330 d**	**5/28/02**	**A**	**9/19/03**	**A**
118	1.01.03.03.01	Site Work Construction	330 d	5/28/02	A	9/19/03	A
119	1.01.03.04	Install Storm Water Line 200 (ROB North) (THC Activity 9390)	4 d	7/23/02	A	7/26/02	A
120	**1.01.03.05**	**ROB Construction**	**289 d**	**7/26/02**	**A**	**9/19/03**	**A**
121	1.01.03.05.01	ROB Foundations and SOG	143 d	7/26/02	A	2/20/03	A
122	1.01.03.05.02	ROB Superstructure	113 d	8/20/02	A	2/3/03	A
123	1.01.03.05.03	ROB Enclosure	132 d	12/4/02	A	6/13/03	A
124	**1.01.03.05.04**	**ROB Rough-in**	**134 d**	**11/22/02**	**A**	**6/9/03**	**A**
125	1.01.03.05.04.1	ROB Rough-in (Total All Floors)	134 d	11/22/02	A	6/9/03	A
126	1.01.03.05.04.2	Voice/Data Cable&Racks-1st Floor ROB (THC Act. 20560)	49 d	3/24/03	A	6/2/03	A
127	1.01.03.05.04.3	Voice/Data Cable&Racks-2nd Floor ROB (THC Act. 20720)	22 d	4/9/03	A	5/9/03	A
128	1.01.03.05.04.4	Voice/Data Cable&Racks-3rd Floor ROB (THC Act. 20830)	14 d	5/5/03	A	5/22/03	A
129	1.01.03.05.04.5	Energize Permanent Power for ROB (THC Activity 8180)	1 d	4/21/03	A	4/21/03	A
130	**1.01.03.05.05**	**ROB Finishes**	**160 d**	**2/3/03**	**A**	**9/19/03**	**A**
131	1.01.03.05.05.1	ROB Finishes (Total All Floors)	160 d	2/3/03	A	9/19/03	A
132	1.01.03.05.05.2	Rock, Tape & Finish Third Floor ROB (THC Act. 21330)	40 d	3/17/03	A	5/12/03	A
133	1.01.03.05.05.3	Install Plumbing Fixtures Third Floor Rob (THC Activity 21360)	6 d	5/9/03	A	5/16/03	A
134	1.01.03.05.05.4	Install Millwork First Floor ROB (THC Activity 20930)	8 d	6/4/03	A	6/13/03	A
135	1.01.03.05.05.5	Install Millwork Second Floor ROB (THC Activity 21150)	3 d	6/2/03	A	6/4/03	A
136	1.01.03.05.05.6	Install Millwork Third Floor ROB (THC Activity 21370)	10 d	5/12/03	A	5/23/03	A
137	1.01.03.05.05.7	Finish Paint First Floor ROB (THC Act. 21010)	37 d	5/8/03	A	6/30/03	A
138	1.01.03.05.05.8	Finish Paint Second Floor ROB (THC Act. 21230)	11 d	5/23/03	A	6/9/03	A
139	1.01.03.05.05.9	Finish Paint ROB Third Floor (THC Act. 21450)	7 d	6/13/03	A	6/23/03	A
140	1.01.03.05.05.10	Install VCT/Carpet ROB First Floor (THC Activity 21020)	26 d	5/29/03	A	7/7/03	A
141	1.01.03.05.05.11	Install VCT/Carpet ROB Second Floor (THC Activity 21240)	8 d	6/13/03	A	6/24/03	A
142	1.01.03.05.05.12	Install VCT/Carpet ROB Third Floor (THC Activity 21460)	12 d	6/16/03	A	7/1/03	A
143	1.01.03.05.05.13	Heery, Keenan, ORNL Punch List 1st Floor ROB (THC Activity 21080)	13 d	6/24/03	A	7/14/03	A
144	1.01.03.05.05.14	Complete Punch List First Floor ROB (THC Activity 21090)	48 d	7/15/03	A	9/19/03	A
145	1.01.03.05.05.15	Heery, Keenan, ORNL Punch List 2nd Floor ROB (THC Activity 21300)	2 d	6/25/03	A	6/26/03	A



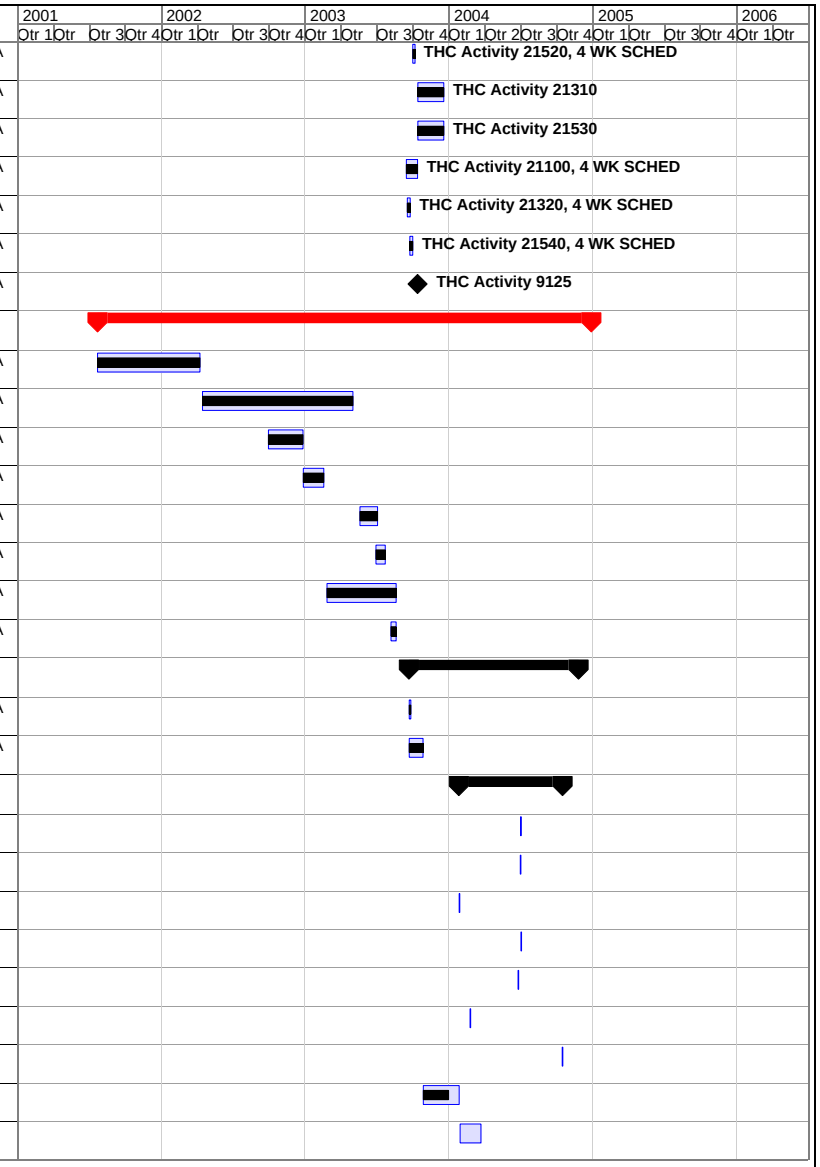
Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

10/24/03 | 4 - 7 | Progress Reported Through 9/30/03

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
146	1.01.03.05.05.16	Heery, Keenan, ORNL Punch List 3rd Floor ROB (THC Activity 21520)	2 d	7/2/03	A	7/7/03	A
147	1.01.03.05.05.17	Compete Punch List Second Floor ROB (THC Activity 21310)	48 d	7/15/03	A	9/19/03	A
148	1.01.03.05.05.18	Complete Punch List Third Floor ROB (THC Activity 21530)	48 d	7/15/03	A	9/19/03	A
149	1.01.03.05.05.19	Final Clean First Floor ROB (THC Activity 21100)	19 d	6/16/03	A	7/14/03	A
150	1.01.03.05.05.20	Final Clean Second Floor ROB (THC Activity 21320)	6 d	6/18/03	A	6/25/03	A
151	1.01.03.05.05.21	Final Clean Third Floor ROB (THC Activity 21540)	6 d	6/25/03	A	7/2/03	A
152	1.01.03.05.05.22	Substantial Completion ROB (THC Activity 9125)	1 d	7/15/03	A	7/15/03	A
153	**1.01.04**	**Research Support Center**	**859 d**	**4/23/01**	**A**	**9/27/04**	
154	1.01.04.01	RSC Pre-Design	177 d	4/23/01	A	1/7/02	A
155	1.01.04.02	RSC Design-Title I & II	263 d	1/14/02	A	1/31/03	A
156	1.01.04.03	External Independent Review	61 d	7/1/02	A	9/26/02	A
157	1.01.04.04	RSC CD-2	37 d	9/27/02	A	11/18/02	A
158	1.01.04.05	RSC IPR	34 d	2/18/03	A	4/4/03	A
159	1.01.04.06	RSC CD-3	17 d	3/31/03	A	4/23/03	A
160	1.01.04.07	Procure Construction Contractor	120 d	11/26/02	A	5/21/03	A
161	1.01.04.08	DOE Procurement Review	10 d	5/8/03	A	5/21/03	A
162	**1.01.04.09**	**RSC Construction**	**296 d**	**6/23/03**	**A**	**8/26/04**	
163	1.01.04.09.01	Mobilize-RSC	5 d	6/23/03	A	6/27/03	A
164	1.01.04.09.02	Site-RSC	24 d	6/23/03	A	7/28/03	A
165	**1.01.04.09.03**	**RSC Tie-ins**	**179 d**	**10/28/03**	**A**	**7/16/04**	
166	1.01.04.09.03.1	Potable Water Tie-ins-RSC	1 d	4/1/04		4/1/04	
167	1.01.04.09.03.2	Sewer Tie-ins-RSC	1 d	3/31/04		3/31/04	
168	1.01.04.09.03.3	Storm Drain Tie-ins-RSC	1 d	10/28/03		10/28/03	
169	1.01.04.09.03.4	Electrical Tie-ins-RSC	1 d	4/2/04		4/2/04	
170	1.01.04.09.03.5	Natural Gas Tie-ins-RSC	1 d	3/26/04		3/26/04	
171	1.01.04.09.03.6	Hot & Chilled Water Tie-ins-RSC	1 d	11/25/03		11/25/03	
172	1.01.04.09.03.7	Telecommunications Tie-ins-RSC	1 d	7/16/04		7/16/04	
173	1.01.04.09.04	Caissons/Concrete/Foundations-RSC	65 d	7/29/03	A	10/28/03	
174	1.01.04.09.05	Structure/Steel-RSC	36 d	10/30/03		12/22/03	

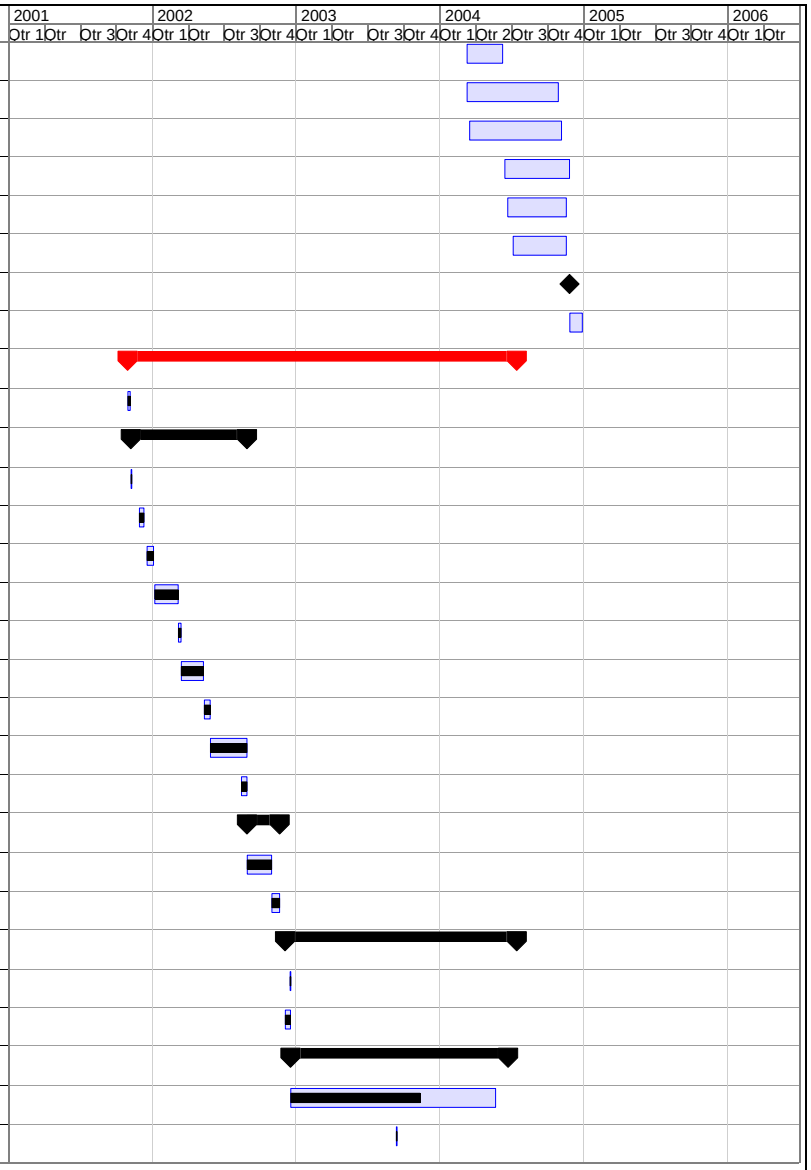


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
175	1.01.04.09.06	Exterior Envelope-RSC	61 d	12/10/03		3/9/04	
176	1.01.04.09.07	Interior First Floor-RSC	158 d	12/10/03		7/28/04	
177	1.01.04.09.08	Interior Second Floor-RSC	159 d	12/17/03		8/5/04	
178	1.01.04.09.09	Specialties-RSC	115 d	3/15/04		8/26/04	
179	1.01.04.09.10	Equipment-RSC	104 d	3/22/04		8/18/04	
180	1.01.04.09.11	Finishes-RSC	94 d	4/5/04		8/18/04	
181	1.01.04.10	RSC Complete	0 d	8/26/04		8/26/04	
182	1.01.04.11	RSC CD-4	21 d	8/27/04		9/27/04	
183	**1.01.05**	**JICS/ORCAS (State)**	**677 d**	**7/31/01**	**A**	**4/14/04**	
184	1.01.05.01	SBC Approval	5 d	7/31/01	A	8/6/01	A
185	**1.01.05.02**	**Design Phase**	**202 d**	**8/9/01**	**A**	**5/30/02**	**A**
186	1.01.05.02.01	Notice to Proceed	1 d	8/9/01	A	8/9/01	A
187	1.01.05.02.02	Program Confirmation	7 d	8/30/01	A	9/10/01	A
188	1.01.05.02.03	Program Review (1)	14 d	9/18/01	A	10/5/01	A
189	1.01.05.02.04	Schematic Design Phase	42 d	10/8/01	A	12/6/01	A
190	1.01.05.02.05	SDP Approval (7)	5 d	12/7/01	A	12/13/01	A
191	1.01.05.02.06	Design Develop. Phase	37 d	12/14/01	A	2/8/02	A
192	1.01.05.02.07	DDP Approval (7)	11 d	2/11/02	A	2/25/02	A
193	1.01.05.02.08	CFC Construction Documents	66 d	2/26/02	A	5/30/02	A
194	1.01.05.02.09	CDP Approval (14)	10 d	5/16/02	A	5/30/02	A
195	**1.01.05.03**	**Bid and Award Construction Contract Phase**	**57 d**	**5/31/02**	**A**	**8/21/02**	**A**
196	1.01.05.03.01	Bid Construction Contract	42 d	5/31/02	A	7/31/02	A
197	1.01.05.03.02	Award Construction Contract	15 d	8/1/02	A	8/21/02	A
198	**1.01.05.04**	**Construction Phase**	**403 d**	**9/4/02**	**A**	**4/14/04**	
199	1.01.05.04.01	Notice to Proceed -JICS/ORCAS	1 d	9/17/02	A	9/17/02	A
200	1.01.05.04.02	Mobilization-JICS/ORCAS	10 d	9/4/02	A	9/17/02	A
201	**1.01.05.04.03**	**Construction**	**378 d**	**9/18/02**	**A**	**3/23/04**	
202	1.01.05.04.03.1	Site work-JICS/ORCAS	356 d	9/18/02	A	2/20/04	
203	1.01.05.04.03.2	Chilled Water/Hot Water Tie-in-JICS/ORCAS	1 d	6/13/03	A	6/13/03	A

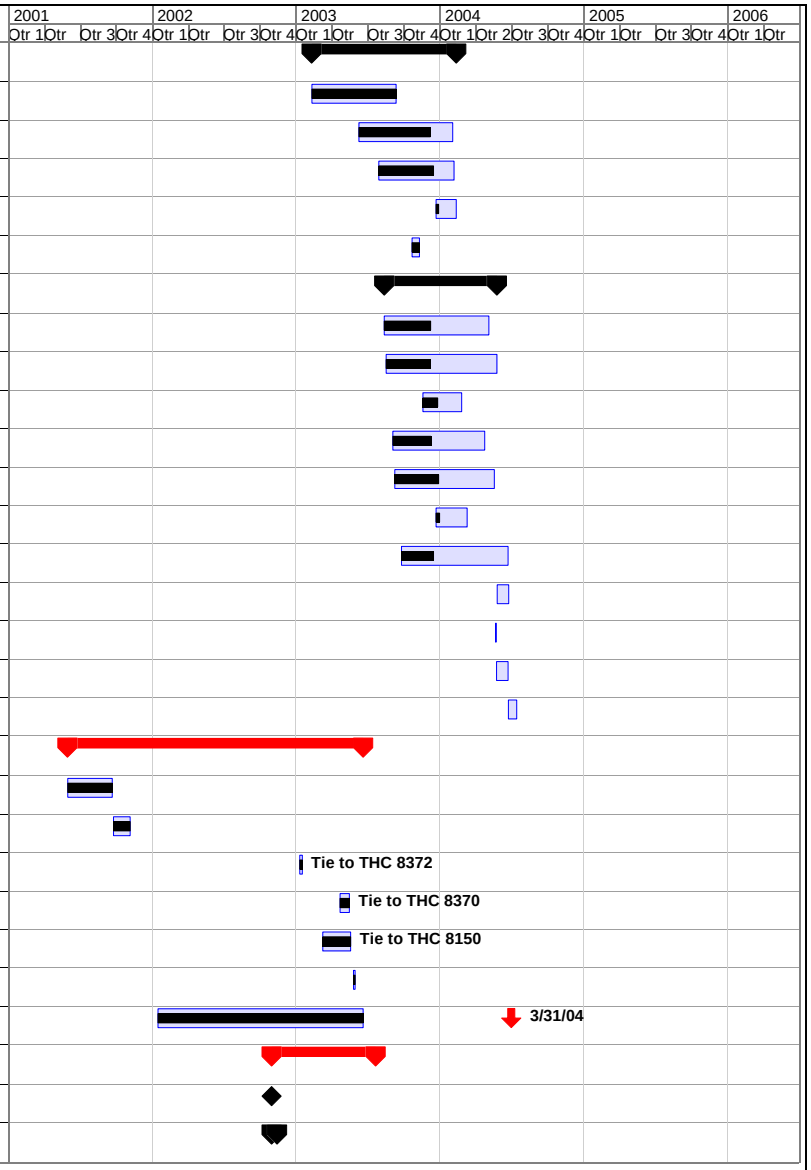


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
204	**1.01.05.04.03.3**	**Structure/Exterior Skin**	**252 d**	**11/11/02**	**A**	**11/12/03**	
205	1.01.05.04.03.3.1	Footings/UG MPE/Slab-JICS/ORCAS	146 d	11/11/02	A	6/12/03	A
206	1.01.05.04.03.3.2	Steel Erection-JICS/ORCAS	166 d	3/10/03	A	11/3/03	
207	1.01.05.04.03.3.3	Metal Studs/Masonry-JICS/ORCAS	133 d	4/30/03	A	11/6/03	
208	1.01.05.04.03.3.4	Metal Panels/Windows-JICA/ORCAS	38 d	9/22/03	A	11/12/03	
209	1.01.05.04.03.3.5	Roofing-JICS/ORCAS	14 d	7/23/03	A	8/11/03	A
210	**1.01.05.04.03.4**	**Building Interior**	**194 d**	**5/14/03**	**A**	**2/23/04**	
211	1.01.05.04.03.4.1	First Floor Interior-South-JICS/ORCAS	180 d	5/14/03	A	2/3/04	
212	1.01.05.04.03.4.2	First Floor Interior-North-JICS/ORCAS	191 d	5/19/03	A	2/23/04	
213	1.01.05.04.03.4.3	First Floor Electrical Room-JICS/ORCAS	70 d	8/20/03	A	11/26/03	
214	1.01.05.04.03.4.4	Second Floor Interior-South-JICS/ORCAS	159 d	6/4/03	A	1/23/04	
215	1.01.05.04.03.4.5	Second Floor Interior-North-JICS/ORCAS	173 d	6/9/03	A	2/17/04	
216	1.01.05.04.03.4.6	Second Floor Electrical Room-JICS/ORCAS	56 d	9/22/03	A	12/10/03	
217	1.01.05.04.03.5	Purchase & Install Audio Visual & Telecommunications Equipment-JICS/ORCAS	185 d	6/26/03	A	3/23/04	
218	1.01.05.04.04	Install Furniture-JICS/ORCAS	22 d	2/24/04		3/24/04	
219	1.01.05.04.05	Substantial Completion-JICS/ORCAS	1 d	2/20/04		2/20/04	
220	1.01.05.04.06	Complete Project Documentation/Final Acceptance-JICS/ORCAS	22 d	2/23/04		3/23/04	
221	1.01.05.04.07	Final Inspection/Project Close Out-JICS/ORCAS	15 d	3/24/04		4/14/04	
222	**1.01.06**	**East Campus Elect. Sys Upgrade**	**515 d**	**3/1/01**	**A**	**3/21/03**	**A**
223	1.01.06.01	Electrical System Upgrade Design	80 d	3/1/01	A	6/22/01	A
224	1.01.06.02	Electrical System Upgrade Procurement of Const Contractor	29 d	6/25/01	A	8/6/01	A
225	1.01.06.03	Deliver Four Switches for Third Party Installation	5 d	10/11/02	A	10/17/02	A
226	1.01.06.04	Install 15kv Feeder to CSB Transformer	18 d	1/21/03	A	2/14/03	A
227	1.01.06.05	Install 15kv Feeder to ETF Generator/Transformer	47 d	12/9/02	A	2/17/03	A
228	1.01.06.06	Energize Circuits From Building 4000	5 d	2/24/03	A	2/28/03	A
229	1.01.06.07	Electrical System Upgrade Construction	357 d	10/16/01	A	3/21/03	A
230	**1.01.07**	**Building 4512 (LSS) Upgrade**	**180 d**	**8/1/02**	**A**	**4/21/03**	**A**
231	1.01.07.01	Start Project	0 d	8/1/02	A	8/1/02	A
232	**1.01.07.02**	**Project Planning**	**10 d**	**8/1/02**	**A**	**8/14/02**	**A**

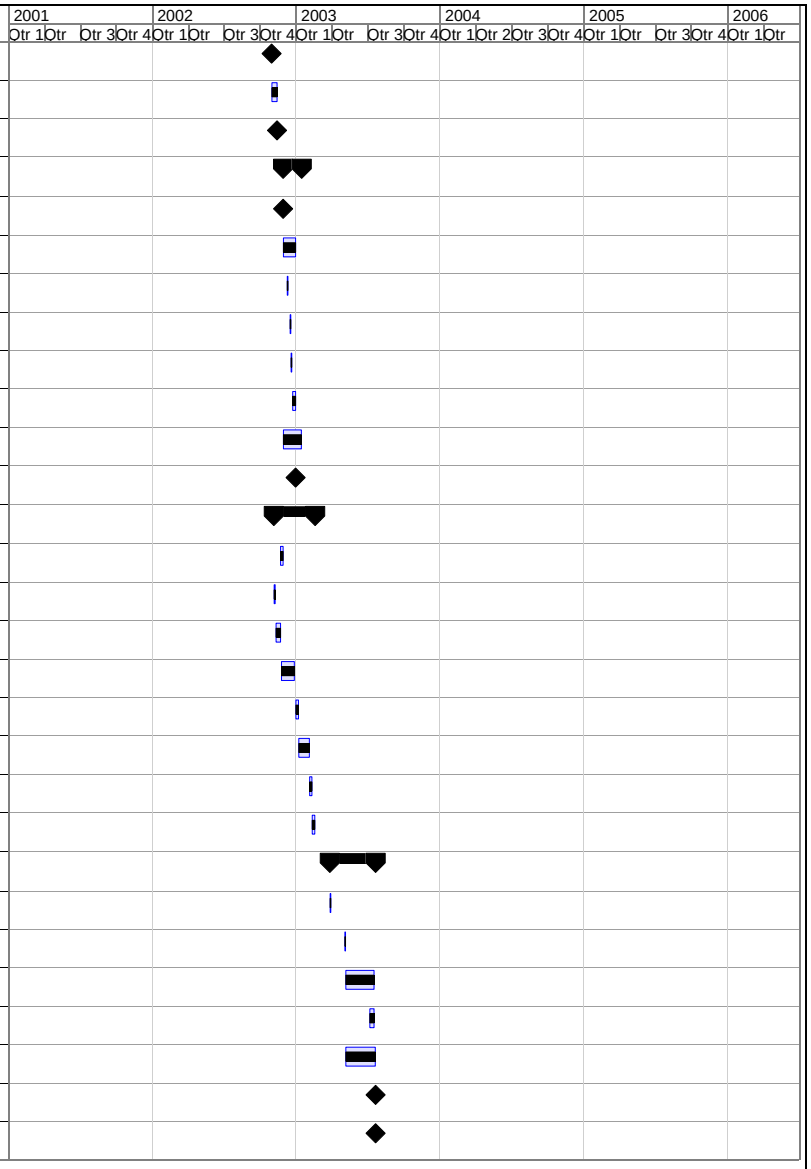


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
233	1.01.07.02.01	Start Project Planning	0 d	8/1/02	A	8/1/02	A
234	1.01.07.02.02	Prepare Project Planning & Define Project Scope, Sched & Cost	10 d	8/1/02	A	8/14/02	A
235	1.01.07.02.03	Complete Project Planning	0 d	8/14/02	A	8/14/02	A
236	**1.01.07.03**	**Design**	**32 d**	**8/29/02**	**A**	**10/15/02**	**A**
237	1.01.07.03.01	Start Design	0 d	8/29/02	A	8/29/02	A
238	1.01.07.03.02	Design HVAC Improvements	21 d	8/30/02	A	9/30/02	A
239	1.01.07.03.03	HVAC Design 50% Review	2 d	9/9/02	A	9/10/02	A
240	1.01.07.03.04	HVAC Design 90% Review	2 d	9/16/02	A	9/17/02	A
241	1.01.07.03.05	HVAC Design Issue CFC Drawings	2 d	9/19/02	A	9/20/02	A
242	1.01.07.03.06	Prepare Construction Specs	6 d	9/23/02	A	9/30/02	A
243	1.01.07.03.07	UTB Design Management	32 d	8/30/02	A	10/15/02	A
244	1.01.07.03.08	Complete Design	0 d	9/30/02	A	9/30/02	A
245	**1.01.07.04**	**Procurement**	**73 d**	**8/7/02**	**A**	**11/18/02**	**A**
246	1.01.07.04.01	Prepare STD for HVAC Improvements Design	5 d	8/23/02	A	8/29/02	A
247	1.01.07.04.02	Prepare RFP for Liebert Precision A/C Units	3 d	8/7/02	A	8/9/02	A
248	1.01.07.04.03	Bid & Award Liebert Units	10 d	8/12/02	A	8/23/02	A
249	1.01.07.04.04	Fab & Deliver Liebert Units	24 d	8/26/02	A	9/27/02	A
250	1.01.07.04.05	Prepare RFP for HVAC Improvements	5 d	10/1/02	A	10/7/02	A
251	1.01.07.04.06	Bid & Award HVAC Improvements Contract	20 d	10/8/02	A	11/4/02	A
252	1.01.07.04.07	Contractor Prepare ES&H Submittals	5 d	11/5/02	A	11/11/02	A
253	1.01.07.04.08	UTB Review & Accept ES&H Submittals	5 d	11/12/02	A	11/18/02	A
254	**1.01.07.05**	**Construction**	**79 d**	**12/27/02**	**A**	**4/21/03**	**A**
255	1.01.07.05.01	Issue Notice to Proceed to Contractor	1 d	12/27/02	A	12/27/02	A
256	1.01.07.05.02	Contractor Mobilize	2 d	2/3/03	A	2/4/03	A
257	1.01.07.05.03	Construct HVAC Improvements	52 d	2/5/03	A	4/17/03	A
258	1.01.07.05.04	Install Liebert Units	9 d	4/7/03	A	4/17/03	A
259	1.01.07.05.05	UTB Title III Inspection	53 d	2/5/03	A	4/21/03	A
260	1.01.07.05.06	Complete Construction	0 d	4/21/03	A	4/21/03	A
261	1.01.07.06	Complete Project	0 d	4/21/03	A	4/21/03	A

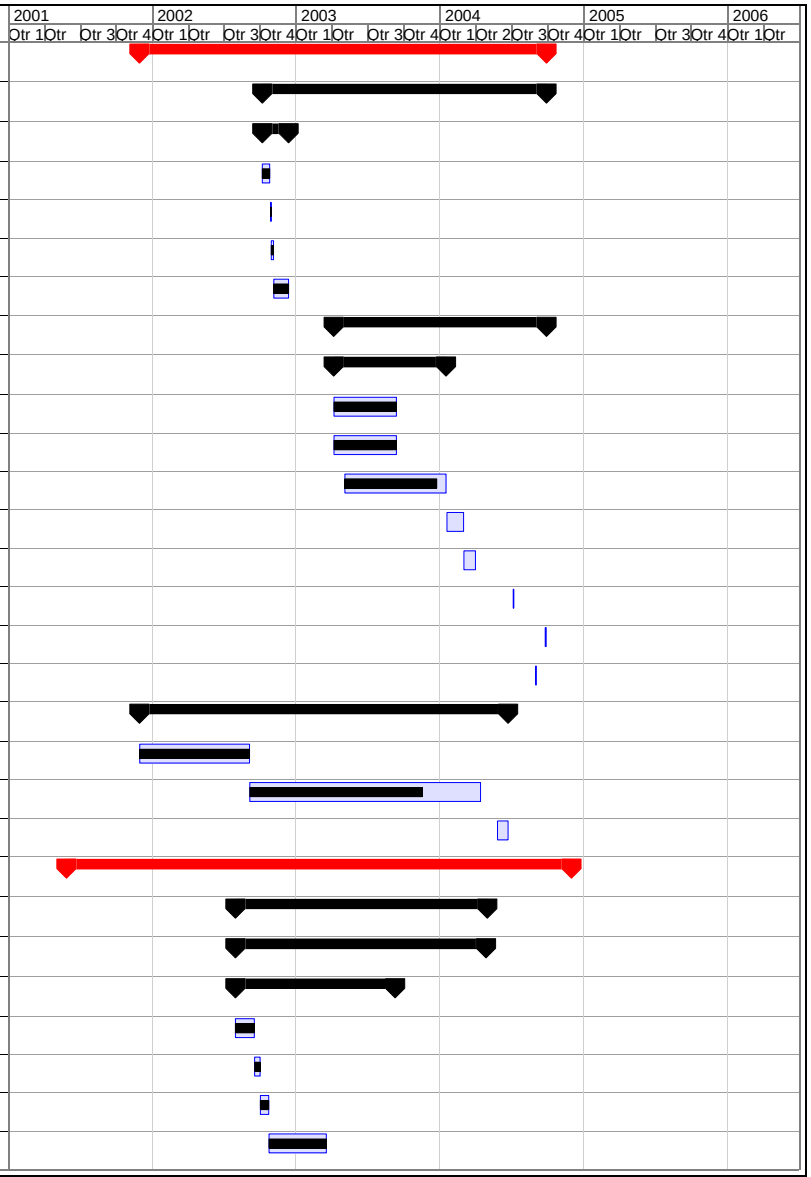


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
262	**1.01.08**	**Building Commissioning**	**706 d**	**8/31/01**	**A**	**6/28/04**	
263	**1.01.08.01**	**Third Party Project**	**496 d**	**7/8/02**	**A**	**6/28/04**	
264	**1.01.08.01.01**	**Procurement**	**48 d**	**7/8/02**	**A**	**9/12/02**	**A**
265	1.01.08.01.01.1	Prepare Commissioning Agent Specification	15 d	7/8/02	A	7/26/02	A
266	1.01.08.01.01.2	Prepare Sole Source Justification	2 d	7/29/02	A	7/30/02	A
267	1.01.08.01.01.3	Prepare & Issue Commissioning Agent RFP	4 d	7/31/02	A	8/5/02	A
268	1.01.08.01.01.4	Bid & Award Commissioning Agent	27 d	8/6/02	A	9/12/02	A
269	**1.01.08.01.02**	**Commissioning**	**372 d**	**1/6/03**	**A**	**6/28/04**	
270	**1.01.08.01.02.1**	**Systems Commissioning**	**199 d**	**1/6/03**	**A**	**10/17/03**	**A**
271	1.01.08.01.02.1.1	Central Energy Plant	112 d	1/6/03	A	6/13/03	A
272	1.01.08.01.02.1.2	Electrical	112 d	1/6/03	A	6/13/03	A
273	1.01.08.01.02.1.3	Mechanical	180 d	2/3/03	A	10/17/03	
274	1.01.08.01.02.2	Prepare Draft Commissioning Report	29 d	10/20/03		12/1/03	
275	1.01.08.01.02.3	Prepare Final Commissioning Report	20 d	12/2/03		12/31/03	
276	1.01.08.01.02.4	Warranty Review-CSB	2 d	4/5/04		4/6/04	
277	1.01.08.01.02.5	Warranty Review-ETF	2 d	6/25/04		6/28/04	
278	1.01.08.01.02.6	Warranty Review-ROB	2 d	6/1/04		6/2/04	
279	**1.01.08.02**	**JICS/ORCAS**	**639 d**	**8/31/01**	**A**	**3/23/04**	
280	1.01.08.02.01	MP&E Design Reviews	190 d	8/31/01	A	6/5/02	A
281	1.01.08.02.02	Perform Construction Reviews	400 d	6/6/02	A	1/13/04	
282	1.01.08.02.03	Perform Final Compliance Review	20 d	2/25/04		3/23/04	
283	**1.01.09**	**Construction Interfaces/Planning**	**880 d**	**2/26/01**	**A**	**8/31/04**	
284	**1.01.09.01**	**Third Party Project Construction Interfaces**	**437 d**	**5/1/02**	**A**	**1/30/04**	
285	**1.01.09.01.01**	**Procurement**	**434 d**	**5/1/02**	**A**	**1/27/04**	
286	**1.01.09.01.01.1**	**Fume Hood Procurement**	**278 d**	**5/1/02**	**A**	**6/10/03**	**A**
287	1.01.09.01.01.1.1	Prepare Fume Hood Specification	34 d	5/1/02	A	6/18/02	A
288	1.01.09.01.01.1.2	Prepare & Issue Fume Hood RFP	10 d	6/19/02	A	7/2/02	A
289	1.01.09.01.01.1.3	Bid & Award Fume Hoods	14 d	7/3/02	A	7/24/02	A
290	1.01.09.01.01.1.4	Fabricate Fume Hoods & Store	101 d	7/25/02	A	12/17/02	A

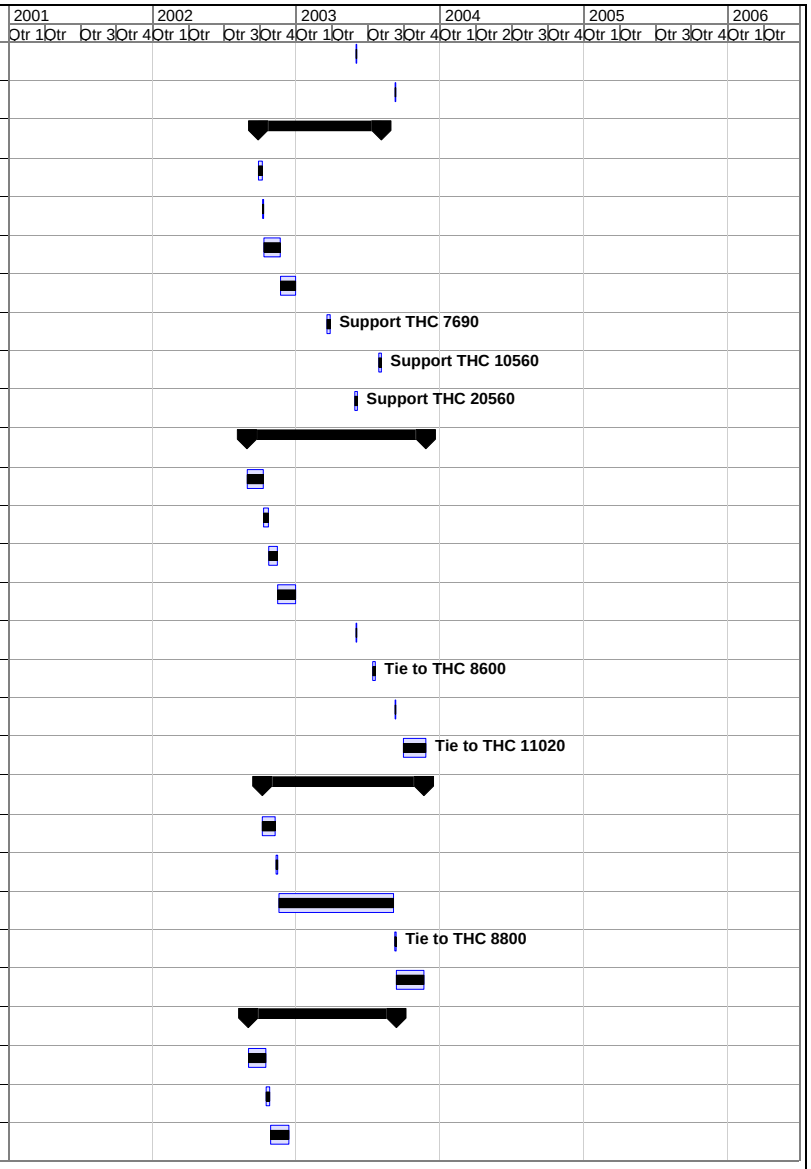


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
291	1.01.09.01.01.1.5	Notify Vendor of CSB Fume Hood Delivery/Installation Schedule	1 d	3/3/03	A	3/3/03	A
292	1.01.09.01.01.1.6	Notify Vendor of ETF Fume Hood Delivery/Installation Schedule	1 d	6/10/03	A	6/10/03	A
293	**1.01.09.01.01.2**	**Category 6 Cable Procurement**	**213 d**	**6/28/02**	**A**	**5/6/03**	**A**
294	1.01.09.01.01.2.1	Prepare Category 6 Cable Specification	5 d	6/28/02	A	7/8/02	A
295	1.01.09.01.01.2.2	Prepare & Issue Cat 6 Cable RFP	3 d	7/9/02	A	7/11/02	A
296	1.01.09.01.01.2.3	Bid & Award Cat 6 Cable	30 d	7/12/02	A	8/22/02	A
297	1.01.09.01.01.2.4	Mfg./Store Cat 6 Cable	26 d	8/23/02	A	9/30/02	A
298	1.01.09.01.01.2.5	UTB Deliver CSB Cat. 6 Cable To Haskell From Storage	5 d	12/19/02	A	12/27/02	A
299	1.01.09.01.01.2.6	UTB Deliver ETF Cat. 6 Cable To Haskell From Storage	5 d	4/30/03	A	5/6/03	A
300	1.01.09.01.01.2.7	UTB Deliver ROB Cat. 6 Cable To Haskell From Storage	5 d	2/28/03	A	3/6/03	A
301	**1.01.09.01.01.3**	**Casework Procurement**	**311 d**	**5/31/02**	**A**	**8/27/03**	**A**
302	1.01.09.01.01.3.1	Prepare Casework Specification	27 d	5/31/02	A	7/10/02	A
303	1.01.09.01.01.3.2	Prepare & Issue Casework RFP	9 d	7/11/02	A	7/23/02	A
304	1.01.09.01.01.3.3	Bid & Award Casework	17 d	7/24/02	A	8/15/02	A
305	1.01.09.01.01.3.4	Fabricate Casework & Vendor Store	31 d	8/16/02	A	9/30/02	A
306	1.01.09.01.01.3.5	Notify Vendor of CSB Casework Delivery/Installment Schedule	1 d	3/3/03	A	3/3/03	A
307	1.01.09.01.01.3.6	Vendor Deliver CSB Casework	5 d	4/14/03	A	4/21/03	A
308	1.01.09.01.01.3.7	Notify Vendor of ETF Casework Delivery/Installment Schedule	1 d	6/10/03	A	6/10/03	A
309	1.01.09.01.01.3.8	Vendor Deliver ETF Casework	40 d	7/1/03	A	8/27/03	A
310	**1.01.09.01.01.4**	**Window Blinds Procurement**	**284 d**	**7/8/02**	**A**	**8/22/03**	**A**
311	1.01.09.01.01.4.1	Prepare Window Blind Specification	25 d	7/8/02	A	8/9/02	A
312	1.01.09.01.01.4.2	Prepare & Issue Window Blind RFP	5 d	8/12/02	A	8/16/02	A
313	1.01.09.01.01.4.3	Bid & Award Window Blind	201 d	8/19/02	A	6/6/03	A
314	1.01.09.01.01.4.4	Order Blinds for Third Party Windows	4 d	6/9/03	A	6/12/03	A
315	1.01.09.01.01.4.5	Fabricate Third Party Window Blinds & Deliver	49 d	6/13/03	A	8/22/03	A
316	**1.01.09.01.01.5**	**Premanufactured ETF Clean Room Procurement**	**259 d**	**6/3/02**	**A**	**6/13/03**	**A**
317	1.01.09.01.01.5.1	Prepare ETF Clean Room Specification	31 d	6/3/02	A	7/17/02	A
318	1.01.09.01.01.5.2	Prepare & Issue ETF Clean Room RFP	7 d	7/18/02	A	7/26/02	A
319	1.01.09.01.01.5.3	Bid & Award ETF Clean Room	34 d	7/29/02	A	9/13/02	A



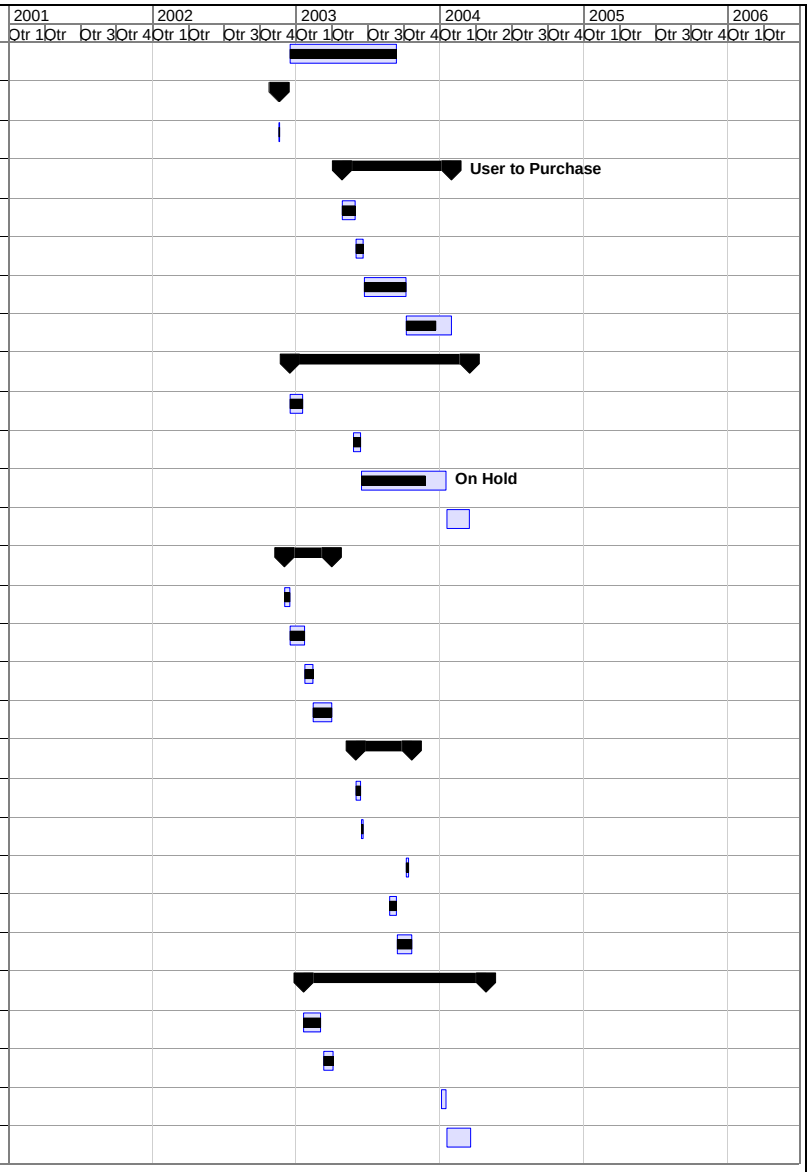
Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

10/24/03 | 4 - 13 | Progress Reported Through 9/30/03

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
320	1.01.09.01.01.5.4	Fabricate ETF Clean Room & Deliver	187 d	9/16/02	A	6/13/03	A
321	**1.01.09.01.01.6**	**Liebert Precision A/C Procurement**	**3 d**	**8/19/02**	**A**	**8/21/02**	**A**
322	1.01.09.01.01.6.1	Prepare & Issue PO to Supplier or SJC for 3 Units	3 d	8/19/02	A	8/21/02	A
323	**1.01.09.01.01.7**	**2.5 Ton Monorail Hoist**	**195 d**	**1/27/03**	**A**	**10/31/03**	
324	1.01.09.01.01.7.1	Prepare Monorail Hoist Specification	25 d	1/27/03	A	2/28/03	A
325	1.01.09.01.01.7.2	Prepare & Issue Monorail Hoist System RFQ	15 d	3/3/03	A	3/21/03	A
326	1.01.09.01.01.7.3	Prepare & Issue Purchase Order for Monorail Hoist	72 d	3/24/03	A	7/7/03	A
327	1.01.09.01.01.7.4	Fabricate & Deliver Monorail Hoist	83 d	7/8/03	A	10/31/03	
328	**1.01.09.01.01.8**	**5-Ton Bridge Crane Procurement**	**314 d**	**9/16/02**	**A**	**12/16/03**	
329	1.01.09.01.01.8.1	Prepare Bridge Crane Specification	25 d	9/16/02	A	10/18/02	A
330	1.01.09.01.01.8.2	Prepare & Issue Bridge Crane RFP	15 d	2/24/03	A	3/14/03	A
331	1.01.09.01.01.8.3	Prepare and Issue Purchase Order for 5-Ton Bridge Crane	150 d	3/17/03	A	10/17/03	
332	1.01.09.01.01.8.4	Fabricate & Deliver 5-Ton Bridge Crane	40 d	10/20/03		12/16/03	
333	**1.01.09.01.01.9**	**Premanufactured CSB Clean Room Procurement**	**82 d**	**9/3/02**	**A**	**12/31/02**	**A**
334	1.01.09.01.01.9.1	Prepare CSB Clean Room Specification	10 d	9/3/02	A	9/16/02	A
335	1.01.09.01.01.9.2	Prepare & Issue CSB Clean Room RFP	27 d	9/17/02	A	10/23/02	A
336	1.01.09.01.01.9.3	Bid & Award CSB Clean Room	15 d	10/24/02	A	11/13/02	A
337	1.01.09.01.01.9.4	Fabricate CSB Clean Room & Deliver	30 d	11/14/02	A	12/31/02	A
338	**1.01.09.01.01.10**	**Laser Curtains**	**98 d**	**3/3/03**	**A**	**7/22/03**	**A**
339	1.01.09.01.01.10.1	Laser Curtain Supports Evaluation	10 d	3/3/03	A	3/14/03	A
340	1.01.09.01.01.10.2	THC Install/Modify Laser Curtain Supports As Required	5 d	3/17/03	A	3/21/03	A
341	1.01.09.01.01.10.3	UTB Provide Laser Curtain & Tracks	5 d	7/8/03	A	7/14/03	A
342	1.01.09.01.01.10.4	Purchase ETF Laser Curtains	14 d	5/27/03	A	6/13/03	A
343	1.01.09.01.01.10.5	Fabricate and Deliver ETF Laser Curtains	25 d	6/16/03	A	7/22/03	A
344	**1.01.09.01.01.11**	**Energy Star Metering Equipment Procurement**	**315 d**	**10/21/02**	**A**	**1/27/04**	
345	1.01.09.01.01.11.1	Prepare Energy Metering Plan	30 d	10/21/02	A	12/3/02	A
346	1.01.09.01.01.11.6	Prepare Energy Star Metering Equipment Specification	15 d	12/11/02	A	1/3/03	A
347	1.01.09.01.01.11.7	Prepare & Issue Energy Star Metering Equipment RFQ	10 d	10/6/03		10/17/03	
348	1.01.09.01.01.11.8	Bid & Award Energy Star Metering Equipment	43 d	10/20/03		12/19/03	

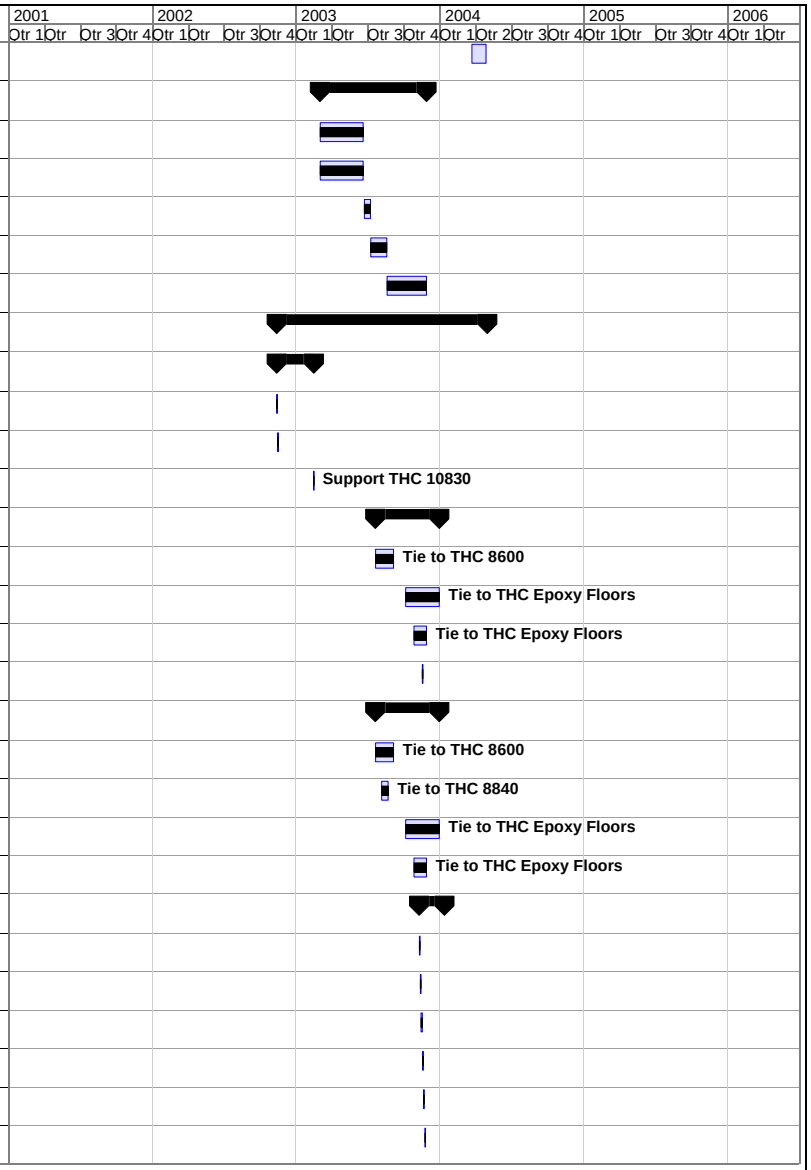


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
349	1.01.09.01.01.11.9	Deliver Energy Star Metering Equipment	23 d	12/22/03		1/27/04	
350	**1.01.09.01.01.12**	**Signage Procurement**	**187 d**	**12/2/02**	**A**	**8/29/03**	**A**
351	1.01.09.01.01.12.1	Prepare Signage Requirements-Non Safety Related Signage	76 d	12/2/02	A	3/21/03	A
352	1.01.09.01.01.12.2	Prepare Specifications-Non Safety Related Signage	76 d	12/2/02	A	3/21/03	A
353	1.01.09.01.01.12.3	Prepare & Issue RFQ-Non Safety Related Signage	12 d	3/24/03	A	4/8/03	A
354	1.01.09.01.01.12.4	Bid & Award Non Safety Releated Signage	29 d	4/9/03	A	5/20/03	A
355	1.01.09.01.01.12.5	Fabricate & Deliver Non Safety Releated Signage	70 d	5/21/03	A	8/29/03	A
356	**1.01.09.01.02**	**Installation/Delivery**	**365 d**	**8/14/02**	**A**	**1/30/04**	
357	**1.01.09.01.02.1**	**ETF Room 4.2.1 Bed Plate Move**	**67 d**	**8/14/02**	**A**	**11/15/02**	**A**
358	1.01.09.01.02.1.1	Remove Dynamometer & Bed Plate from Foundation	2 d	8/14/02	A	8/15/02	A
359	1.01.09.01.02.1.2	Survey/Store the Bedplate	1 d	8/16/02	A	8/16/02	A
360	1.01.09.01.02.1.3	Transport the Bedplate from Y-12 9401-1 to Site	1 d	11/15/02	A	11/15/02	A
361	**1.01.09.01.02.2**	**Fume Hood Installation**	**113 d**	**4/21/03**	**A**	**9/30/03**	**A**
362	1.01.09.01.02.2.1	Vendor Install CSB Fume Hoods-1st Floor	34 d	4/21/03	A	6/6/03	A
363	1.01.09.01.02.2.2	Vendor Install ETF Fume Hoods-1st Floor	61 d	7/7/03	A	9/30/03	A
364	1.01.09.01.02.2.3	Vendor Install ETF Fume Hoods in Rooms E-2072, 2073, 2074, 2075, 2076, 2077, 2079,	25 d	7/28/03	A	8/29/03	A
365	1.01.09.01.02.2.4	Vendor Install Fume Hood in Clean Room ETF E-2083	1 d	8/18/03	A	8/18/03	A
366	**1.01.09.01.02.3**	**Casework Installation**	**113 d**	**4/21/03**	**A**	**9/30/03**	**A**
367	1.01.09.01.02.3.1	Vendor Install Casework CSB First Floor	34 d	4/21/03	A	6/6/03	A
368	1.01.09.01.02.3.2	Vendor Install Casework CSB Second Floor	13 d	5/7/03	A	5/23/03	A
369	1.01.09.01.02.3.3	Vendor Install Casework ETF First Floor	61 d	7/7/03	A	9/30/03	A
370	1.01.09.01.02.3.4	Vendor Install Casework in ETF E-2072, 2073, 2074, 2075, 2076, 2077, 2079, 2084	25 d	7/28/03	A	8/29/03	A
371	**1.01.09.01.02.4**	**Window Blind Installation**	**45 d**	**8/11/03**	**A**	**10/13/03**	
372	1.01.09.01.02.4.1	Vendor Install Tracks for Window Blinds-CSB-3	2 d	8/11/03	A	8/12/03	A
373	1.01.09.01.02.4.2	Vendor Install Tracks for Window Blinds-CSB-2	2 d	8/13/03	A	8/14/03	A
374	1.01.09.01.02.4.3	Vendor Install Tracks for Window Blinds-CSB-1	2 d	8/15/03	A	8/18/03	A
375	1.01.09.01.02.4.4	Vendor Install Tracks for Window Blinds-ROB-3	2 d	8/19/03	A	8/20/03	A
376	1.01.09.01.02.4.5	Vendor Install Tracks for Window Blinds-ROB-2	2 d	8/21/03	A	8/22/03	A
377	1.01.09.01.02.4.6	Vendor Install Tracks for Window Blinds-ROB-1	2 d	8/25/03	A	8/26/03	A

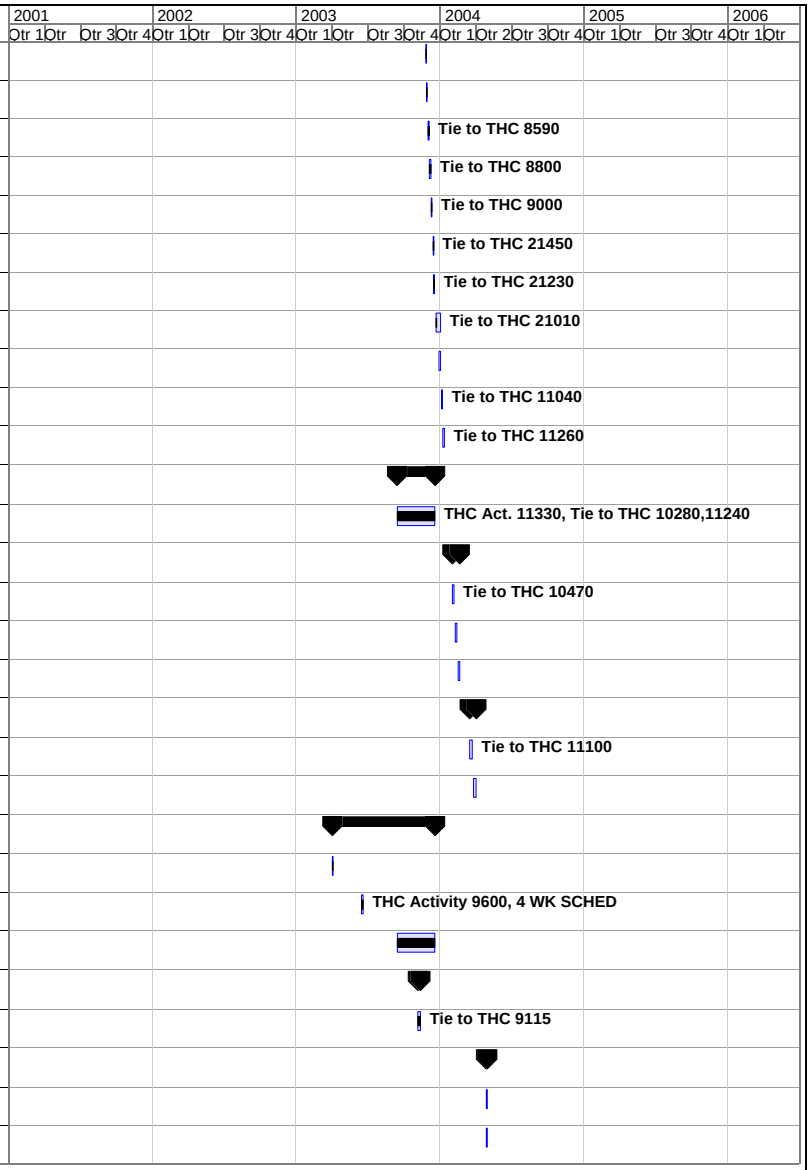


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
378	1.01.09.01.02.4.7	Vendor Install Tracks for Window Blinds-ETF-1	2 d	8/27/03	A	8/28/03	A
379	1.01.09.01.02.4.8	Vendor Install Tracks for Window Blinds-ETF-2	1 d	8/29/03	A	8/29/03	A
380	1.01.09.01.02.4.9	Vendor Install Third Floor CSB Window Blinds	3 d	9/2/03	A	9/4/03	A
381	1.01.09.01.02.4.10	Vendor Install Second Floor CSB Window Blinds	3 d	9/5/03	A	9/9/03	A
382	1.01.09.01.02.4.11	Vendor Install CSB First Floor Window Blinds	3 d	9/10/03	A	9/12/03	A
383	1.01.09.01.02.4.12	Vendor Install ROB Third Floor East Window Blinds	1 d	9/15/03	A	9/15/03	A
384	1.01.09.01.02.4.13	Vendor Install ROB Second Floor Window Blinds	3 d	9/16/03	A	9/18/03	A
385	1.01.09.01.02.4.14	Vendor Install ROB Third Floor West Window Blinds	10 d	9/22/03	A	10/3/03	
386	1.01.09.01.02.4.15	Vendor Install ROB First Floor Window Blinds	5 d	9/29/03	A	10/3/03	
387	1.01.09.01.02.4.16	Vendor Install ETF First Floor Window Blinds	3 d	10/6/03		10/8/03	
388	1.01.09.01.02.4.17	Vendor Install ETF Second Floor Window Blinds	3 d	10/9/03		10/13/03	
389	**1.01.09.01.02.5**	**Premanufactured ETF Clean Room Installation**	**67 d**	**6/16/03**	**A**	**9/19/03**	**A**
390	1.01.09.01.02.5.1	UTB Install ETF Premanufactured Clean Room in Rm 5.4 (THC Activity 11330)	67 d	6/16/03	A	9/19/03	A
391	**1.01.09.01.02.6**	**Monorail Hoist Installation**	**15 d**	**11/3/03**		**11/21/03**	
392	1.01.09.01.02.6.1	UTB Install Monorail Track in ETF Room E-D110 (6.4)-Pellet Lab	5 d	11/3/03		11/7/03	
393	1.01.09.01.02.6.2	Install Hoist	5 d	11/10/03		11/14/03	
394	1.01.09.01.02.6.3	Certify Monorail Hoist	5 d	11/17/03		11/21/03	
395	**1.01.09.01.02.7**	**5-Ton Bridge Crane Installation**	**10 d**	**12/17/03**		**1/2/04**	
396	1.01.09.01.02.7.1	UTB Install 5-Ton Bridge Crane in ETF Room E-D105 (5.7)-Composite Processing Lab	5 d	12/17/03		12/23/03	
397	1.01.09.01.02.7.2	Certify 5-Ton Bridge Crane	5 d	12/26/03		1/2/04	
398	**1.01.09.01.02.8**	**Premanufactured CSB Clean Room Installation**	**181 d**	**1/2/03**	**A**	**9/19/03**	**A**
399	1.01.09.01.02.8.1	Vendor Unload & Stock CSB Premanufactured Clean Room in First Floor	1 d	1/2/03	A	1/2/03	A
400	1.01.09.01.02.8.2	Vendor Install CSB Premanufactured Clean Room in First Floor (THC Activity 9600)	5 d	3/17/03	A	3/21/03	A
401	1.01.09.01.02.8.3	Vendor Complete Finish Work On CSB Premanufactured Clean Room in First Floor	67 d	6/16/03	A	9/19/03	A
402	**1.01.09.01.02.9**	**Laser Curtains**	**5 d**	**8/7/03**	**A**	**8/13/03**	**A**
403	1.01.09.01.02.9.1	UTB Install Laser Curtain Tracks in ETF Photonics, Hybrid Lighting, and MEMS/NEMS	5 d	8/7/03	A	8/13/03	A
404	**1.01.09.01.02.10**	**Energy Star Metering Equipment Installation**	**3 d**	**1/28/04**		**1/30/04**	
405	1.01.09.01.02.10.1	Install Energy Star Metering Equipment for Electrical	3 d	1/28/04		1/30/04	
406	1.01.09.01.02.10.13	Install Energy Star Metering Equipment for Plumbing	3 d	1/28/04		1/30/04	

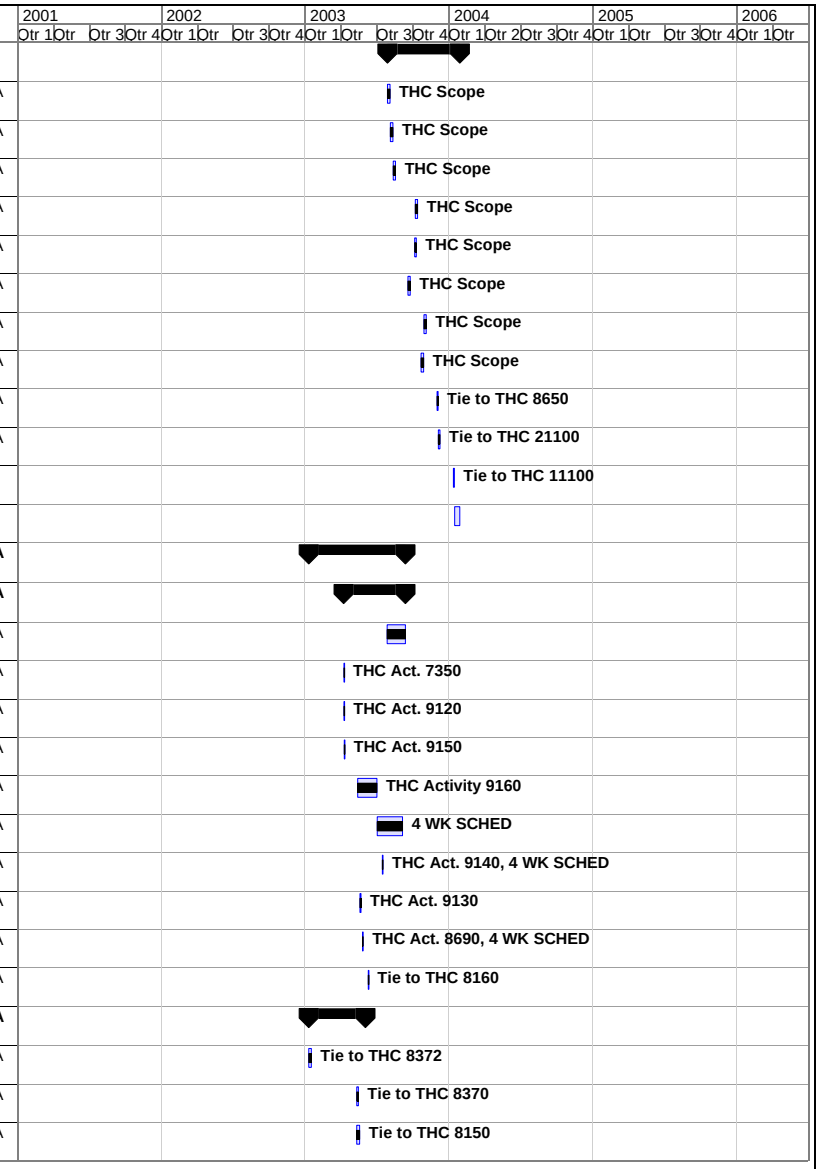


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
407	**1.01.09.01.02.11**	**Signage**	**128 d**	**4/29/03**	**A**	**10/29/03**	
408	1.01.09.01.02.11.1	THC Install Life Safety Code Signage CSB First Floor	5 d	4/29/03	A	5/5/03	A
409	1.01.09.01.02.11.2	THC Install Life Safety Code Signage CSB Second Floor	5 d	5/6/03	A	5/12/03	A
410	1.01.09.01.02.11.3	THC Install Life Safety Code Signage CSB Third Floor	5 d	5/13/03	A	5/19/03	A
411	1.01.09.01.02.11.4	THC Install Life Safety Code Signage ROB First Floor	5 d	7/8/03	A	7/14/03	A
412	1.01.09.01.02.11.5	THC Install Life Safety Code Signage ROB Second Floor	5 d	7/7/03	A	7/11/03	A
413	1.01.09.01.02.11.6	THC Install Life Safety Code Signage ROB Third Floor	5 d	6/20/03	A	6/26/03	A
414	1.01.09.01.02.11.7	THC Install Life Safety Code Signage ETF First Floor	5 d	7/30/03	A	8/5/03	A
415	1.01.09.01.02.11.8	THC Install Life Safety Code Signage ETF Second Floor	5 d	7/23/03	A	7/29/03	A
416	1.01.09.01.02.11.9	Install Non Safety Related Signage CSB	3 d	9/2/03	A	9/4/03	A
417	1.01.09.01.02.11.10	Install Non Safety Related Signage ROB	3 d	9/5/03	A	9/9/03	A
418	1.01.09.01.02.11.11	Install Non Safety Related Signage ETF	3 d	10/13/03		10/15/03	
419	1.01.09.01.02.11.12	Install Outside Signage	10 d	10/16/03		10/29/03	
420	**1.01.09.01.03**	**Tie-in and Test Activities**	**168 d**	**10/11/02**	**A**	**6/13/03**	**A**
421	**1.01.09.01.03.1**	**Civil Mechanical Tie-in Activities**	**110 d**	**1/8/03**	**A**	**6/13/03**	**A**
422	1.01.09.01.03.1.1	Install and Tie-in Quad 48" Storm Drains	34 d	4/28/03	A	6/13/03	A
423	1.01.09.01.03.1.2	UTB Tie-in Natural Gas Lines (THC Activity 7350)	1 d	1/8/03	A	1/8/03	A
424	1.01.09.01.03.1.3	UTB Tie-in North 16-inch Water Main to 24-inch Main (THC Activity 9120)	2 d	1/8/03	A	1/9/03	A
425	1.01.09.01.03.1.4	UTB Tie-in North 16-inch Water Main at NW ROB (THC Activity 9150)	2 d	1/9/03	A	1/10/03	A
426	1.01.09.01.03.1.5	UTB Install Sanitary Line for CSB-White Oak/6th Street (THC Activity 9160)	36 d	2/12/03	A	4/2/03	A
427	1.01.09.01.03.1.6	UTB Install Sanitary Line for ETF-White Oak	41 d	4/3/03	A	6/6/03	A
428	1.01.09.01.03.1.7	ROB Tie-in Fire Water Main at Bldg. 6012 (THC Activity 9140)	2 d	4/16/03	A	4/17/03	A
429	1.01.09.01.03.1.8	UTB Tie-in 8-inch Water Main at White Oak Avenue (THC Activity 9130)	3 d	2/18/03	A	2/20/03	A
430	1.01.09.01.03.1.9	UTB Tie-in West Water Main at 6th Street (THC Activity 8690)	2 d	2/25/03	A	2/26/03	A
431	1.01.09.01.03.1.10	UTB Tie-in Steam Line	1 d	3/11/03	A	3/11/03	A
432	**1.01.09.01.03.2**	**Electrical/Instrumentation Tie-in & Test Activities**	**96 d**	**10/11/02**	**A**	**3/3/03**	**A**
433	1.01.09.01.03.2.1	Deliver Four Switches for Third Party Installation	5 d	10/11/02	A	10/17/02	A
434	1.01.09.01.03.2.2	Install 15kv Feeder to CSB Transformer (See Electrical Systems Upgrade GPP)	5 d	2/10/03	A	2/14/03	A
435	1.01.09.01.03.2.3	Install 15kv Feeder to ETF Generator/Transformer (See Electrical	6 d	2/10/03	A	2/17/03	A

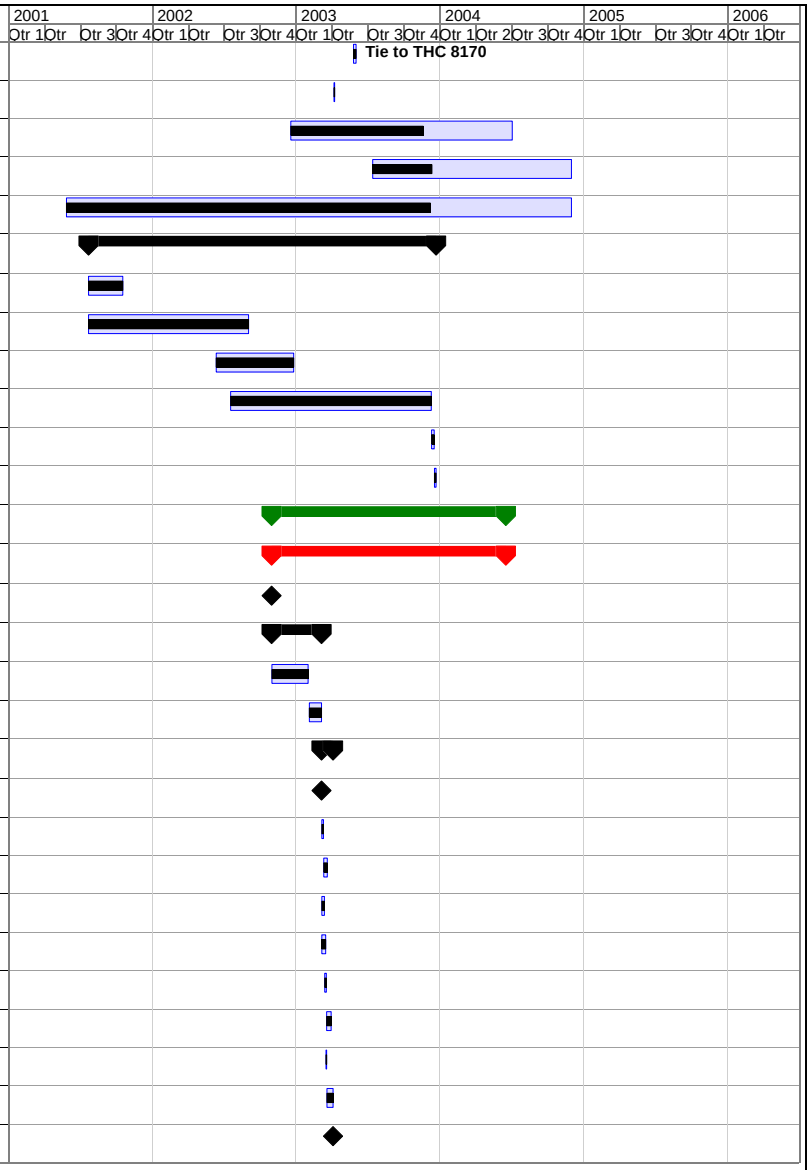


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
436	1.01.09.01.03.2.4	Energize Circuits From Building 4000	5 d	2/25/03	A	3/3/03	A
437	1.01.09.01.03.2.5	Lift Station Isolation	1 d	1/6/03	A	1/6/03	A
438	1.01.09.02	JICS/ORCAS Construction Interfaces	386 d	9/18/02	A	4/2/04	
439	1.01.09.03	RSC Construction Interfaces	347 d	4/14/03	A	8/31/04	
440	1.01.09.04	Project Planning	880 d	2/26/01	A	8/31/04	
441	**1.01.10**	**Lab for Comp & Functional Genomics**	**605 d**	**4/23/01**	**A**	**9/22/03**	**A**
442	1.01.10.01	Pre-Design	61 d	4/23/01	A	7/19/01	A
443	1.01.10.02	Design	279 d	4/23/01	A	6/3/02	A
444	1.01.10.03	Construction Procurement	136 d	3/13/02	A	9/25/02	A
445	1.01.10.04	Construction	350 d	4/18/02	A	9/10/03	A
446	1.01.10.05	Punchlist & Corrections	5 d	9/11/03	A	9/17/03	A
447	1.01.10.06	Final Acceptance	3 d	9/18/03	A	9/22/03	A
448	**1.02**	**Network Mods**	**407 d**	**8/1/02**	**A**	**3/17/04**	
449	**1.02.01**	**Telecommunication GPP**	**407 d**	**8/1/02**	**A**	**3/17/04**	
450	1.02.01.01	Start Project	0 d	8/1/02	A	8/1/02	A
451	**1.02.01.02**	**Planning**	**88 d**	**8/1/02**	**A**	**12/5/02**	**A**
452	1.02.01.02.01	Prepare Preliminary Proposal	66 d	8/1/02	A	11/1/02	A
453	1.02.01.02.02	Obtain DOE Approval	22 d	11/4/02	A	12/5/02	A
454	**1.02.01.03**	**UTB Design**	**18 d**	**12/5/02**	**A**	**1/3/03**	**A**
455	1.02.01.03.01	Start Design	0 d	12/5/02	A	12/5/02	A
456	1.02.01.03.02	UTB Prepare Equipment Specification (Racks)	3 d	12/6/02	A	12/10/02	A
457	1.02.01.03.03	UTB Prepare Equipment Specifications (Network Equip)	8 d	12/11/02	A	12/20/02	A
458	1.02.01.03.04	UTB Prepare 50% New Duct Banks/Manholes (MH TE & B-2A) Design	5 d	12/6/02	A	12/12/02	A
459	1.02.01.03.05	UTB Prepare 50% Equipment Layout Design (CSB-RDF, CSB-Security, & Rm 134 in 4500N)	7 d	12/6/02	A	12/16/02	A
460	1.02.01.03.06	UTB & Qwest Perform 50% On-board Design Review on Duct Banks/Manholes	3 d	12/13/02	A	12/17/02	A
461	1.02.01.03.07	UTB Complete CFC Design Package for New Duct Banks/Manholes (Includes Const. Specs)	7 d	12/18/02	A	12/30/02	A
462	1.02.01.03.08	UTB & Qwest Perform 50% On-board Design Review on Equipment Layout	2 d	12/17/02	A	12/18/02	A
463	1.02.01.03.09	UTB Complete CFC Design Package for Telecom Cables/Equip Layout (Includes Const. Specs)	9 d	12/19/02	A	1/3/03	A
464	1.02.01.03.10	Complete Design	0 d	1/3/03	A	1/3/03	A

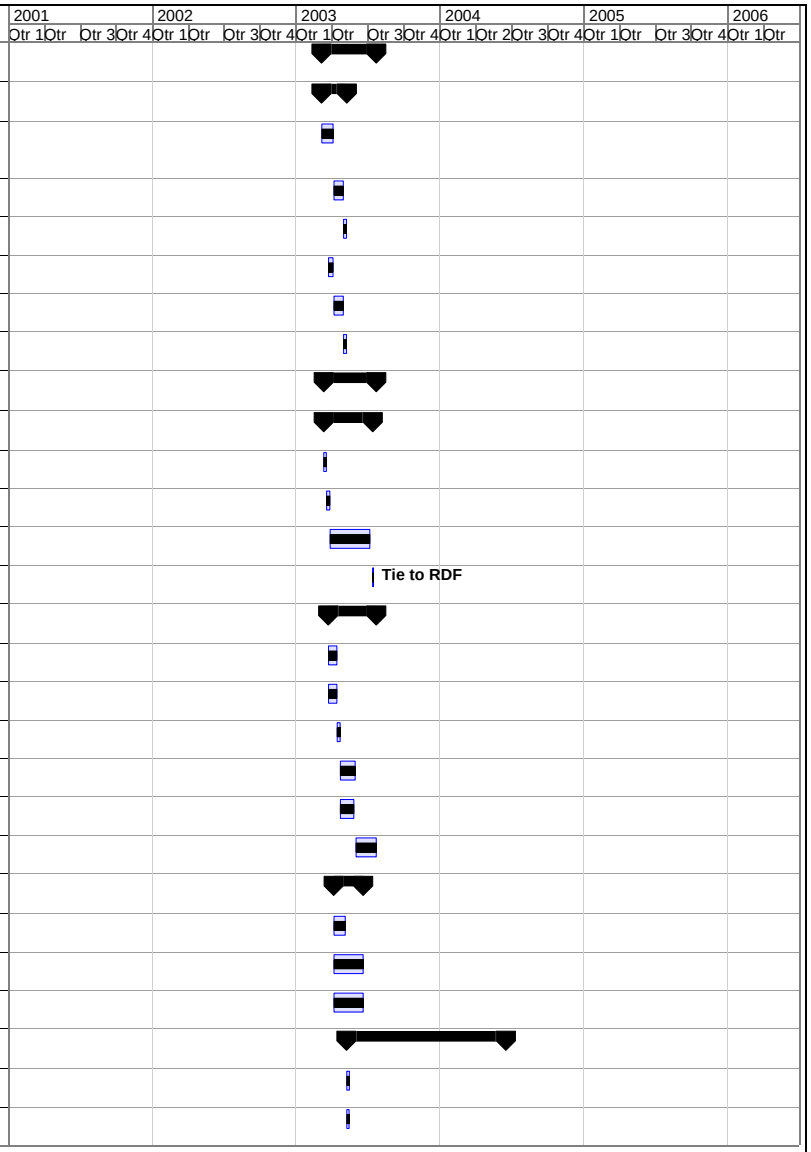


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
465	**1.02.01.04**	**UTB Procurement**	**94 d**	**12/6/02**	**A**	**4/23/03**	**A**
466	**1.02.01.04.01**	**Construction Contractor**	**42 d**	**12/6/02**	**A**	**2/7/03**	**A**
467	1.02.01.04.01.1	UTB Issue Design Package & Establish Task Order for New Duct Banks/Manholes Const.	18 d	12/6/02	A	1/3/03	A
468	1.02.01.04.01.2	Obtain Qwest AHA for New Duct Banks/Manholes	17 d	1/6/03	A	1/29/03	A
469	1.02.01.04.01.3	Review & Comment Qwest AHA for New Duct Banks/Manholes	7 d	1/30/03	A	2/7/03	A
470	1.02.01.04.01.4	UTB Issue CFC Design Package & Establish Task Order for Telecom Installation	7 d	12/23/02	A	1/3/03	A
471	1.02.01.04.01.5	Obtain Qwest AHA for Telecom Installation	17 d	1/6/03	A	1/29/03	A
472	1.02.01.04.01.6	Review & Comment Qwest AHA for Telecom Installation	7 d	1/30/03	A	2/7/03	A
473	**1.02.01.04.02**	**Equipment**	**91 d**	**12/11/02**	**A**	**4/23/03**	**A**
474	**1.02.01.04.02.1**	**Terminal Racks (CSB-RDF & CSB Security)**	**85 d**	**12/11/02**	**A**	**4/14/03**	**A**
475	1.02.01.04.02.1.1	UTB Prepare & Issue CSB-RDF Racks RFQ	5 d	12/11/02	A	12/17/02	A
476	1.02.01.04.02.1.2	Bid & Award CSB-RDF Racks	5 d	12/18/02	A	12/26/02	A
477	1.02.01.04.02.1.3	Deliver CSB-RDF Racks	70 d	12/27/02	A	4/7/03	A
478	1.02.01.04.02.1.4	Provide 4 Telecom Racks for Haskell Installation in CSB	1 d	4/14/03	A	4/14/03	A
479	**1.02.01.04.02.2**	**Network Equipment**	**83 d**	**12/23/02**	**A**	**4/23/03**	**A**
480	1.02.01.04.02.2.1	UTB Prepare & Issue Network Distribution Eqpt RFQ-CSB & Long Lead Items	13 d	12/23/02	A	1/13/03	A
481	1.02.01.04.02.2.2	UTB Prepare & Issue Network Distribution Eqpt RFQ-Remaining Items	13 d	12/23/02	A	1/13/03	A
482	1.02.01.04.02.2.3	Bid & Award Network Distribution Eqpt-CSB & Long Lead Items	5 d	1/14/03	A	1/21/03	A
483	1.02.01.04.02.2.4	Bid & Award Network Distribution Eqpt-Remaining Items	28 d	1/22/03	A	2/28/03	A
484	1.02.01.04.02.2.5	Deliver Network CSB Distribution Eqpt & Long Lead Items	25 d	1/22/03	A	2/25/03	A
485	1.02.01.04.02.2.6	Deliver Remaining Network Distribution Eqpt	37 d	3/3/03	A	4/23/03	A
486	**1.02.01.05**	**Qwest Procurement**	**54 d**	**1/6/03**	**A**	**3/21/03**	**A**
487	1.02.01.05.01	Qwest Procure Manhole & Duct Bank Materials	20 d	1/6/03	A	2/3/03	A
488	1.02.01.05.02	Qwest Procure Cable (fiber, coax, control, twisted pair Cat 3, etc.)	54 d	1/6/03	A	3/21/03	A
489	1.02.01.05.03	Qwest Procure Racks for 4500N	54 d	1/6/03	A	3/21/03	A
490	**1.02.01.06**	**Construction**	**278 d**	**2/7/03**	**A**	**3/17/04**	
491	1.02.01.06.01	Qwest Excavate for Manholes & Duct Bank	6 d	2/7/03	A	2/14/03	A
492	1.02.01.06.02	Qwest Place Manhole MH B-2A	5 d	2/7/03	A	2/13/03	A

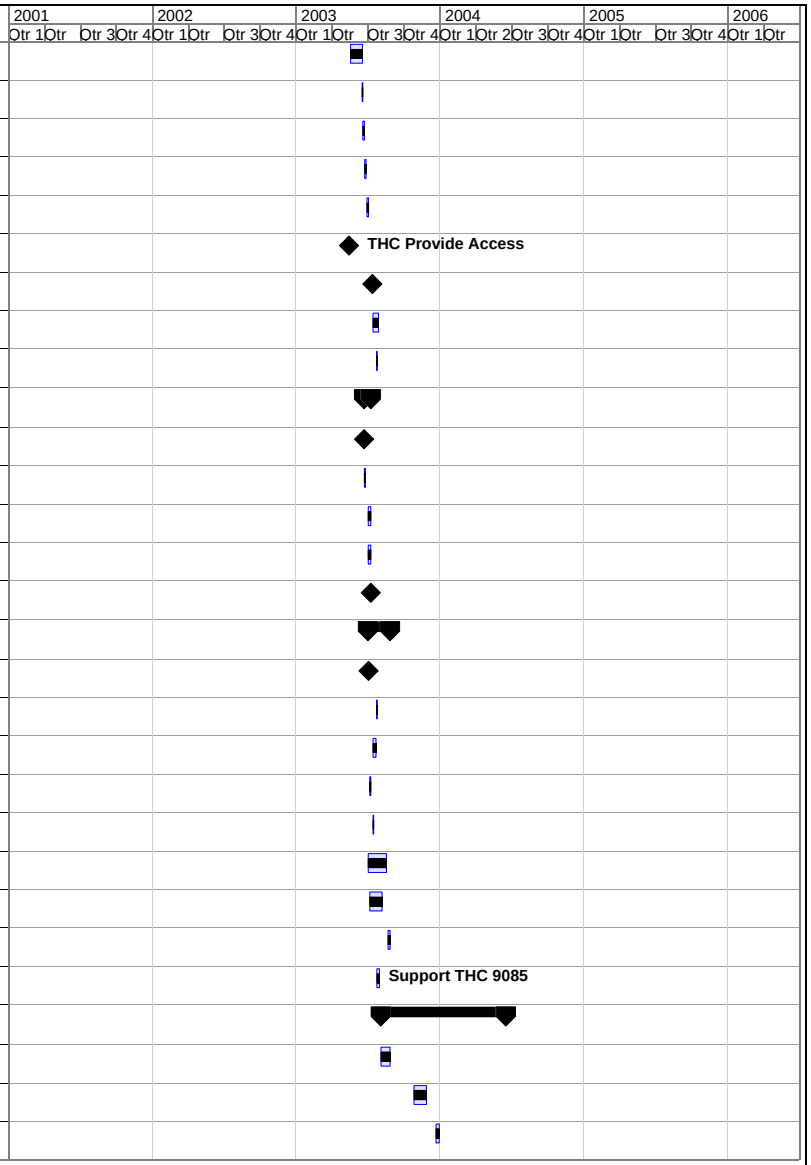


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
493	1.02.01.06.03	Qwest Construct Duct Bank and Conduits	23 d	2/17/03	A	3/19/03	A
494	1.02.01.06.04	Qwest Install Manhole MH TE	3 d	3/18/03	A	3/20/03	A
495	1.02.01.06.05	Qwest Pull Maxicell in New Conduits	3 d	3/20/03	A	3/24/03	A
496	1.02.01.06.06	Place New Duct System Between New and Existing Manholes MH-TE & MH-TD	4 d	3/25/03	A	3/28/03	A
497	1.02.01.06.07	Qwest Install Cabinets in 4500N	4 d	3/31/03	A	4/3/03	A
498	1.02.01.06.08	RDF and Security Room in CSB Available to UTB For Cable Pulling	0 d	2/13/03	A	2/13/03	A
499	1.02.01.06.09	RDF Available For Cabinet Installation	1 d	4/14/03	A	4/14/03	A
500	1.02.01.06.10	Qwest Install Cabinets in CSB-RDF	10 d	4/15/03	A	4/29/03	A
501	1.02.01.06.17	Qwest Install Cabinets in Security Room	2 d	4/24/03	A	4/25/03	A
502	**1.02.01.06.11**	**Qwest Pull Cable**	**13 d**	**3/24/03**	**A**	**4/9/03**	**A**
503	1.02.01.06.11.1	Start Cable Pulling	0 d	3/24/03	A	3/24/03	A
504	1.02.01.06.11.2	Pull Copper Cable From 4500N to CSB	3 d	3/24/03	A	3/26/03	A
505	1.02.01.06.11.3	Pull Fiber Cable From 4500N to CSB(S1,S2,FO1,FO2,FO3,FO4,FO7)	5 d	4/3/03	A	4/9/03	A
506	1.02.01.06.11.4	Pull Fiber Cable From 4512 to CSB (S3,S4,FA1,FA2)	5 d	4/3/03	A	4/9/03	A
507	1.02.01.06.11.5	Complete Cable Pulling	0 d	4/9/03	A	4/9/03	A
508	**1.02.01.06.12**	**Qwest Terminate/Test Cables**	**38 d**	**4/3/03**	**A**	**5/28/03**	**A**
509	1.02.01.06.12.1	Start Termination/Testing	0 d	4/3/03	A	4/3/03	A
510	1.02.01.06.12.2	Install Patch Panels & Frames for Security	2 d	4/24/03	A	4/25/03	A
511	1.02.01.06.12.3	Install Patch Panels & Frames In RDF	5 d	4/15/03	A	4/22/03	A
512	1.02.01.06.12.4	Place Cables in CSB	3 d	4/7/03	A	4/9/03	A
513	1.02.01.06.12.5	Place Copper Cable in CSB 100 Pair Riser S-16	1 d	4/15/03	A	4/15/03	A
514	1.02.01.06.12.6	Splice Copper Cable	32 d	4/3/03	A	5/19/03	A
515	1.02.01.06.12.7	Terminate/Splice Fiber Cable	23 d	4/7/03	A	5/8/03	A
516	1.02.01.06.12.8	Complete Termination/Testing	3 d	5/22/03	A	5/28/03	A
517	1.02.01.06.13	If Necessary, Pull Fire Alarm & Temporary Telephone Cable to Support CSB Testing	5 d	4/25/03	A	5/1/03	A
518	**1.02.01.06.14**	**UTB Install Communication Equipment**	**218 d**	**5/5/03**	**A**	**3/17/04**	
519	1.02.01.06.14.1	Install Network Distribution Equip in CSB Telecom Closets and RDF	17 d	5/5/03	A	5/28/03	A
520	1.02.01.06.14.2	Install Network Distribution Equip in ROB Telecom Closets	25 d	7/28/03	A	8/29/03	A
521	1.02.01.06.14.3	Install Network Distribution Equip in ETF	7 d	9/22/03	A	9/30/03	A

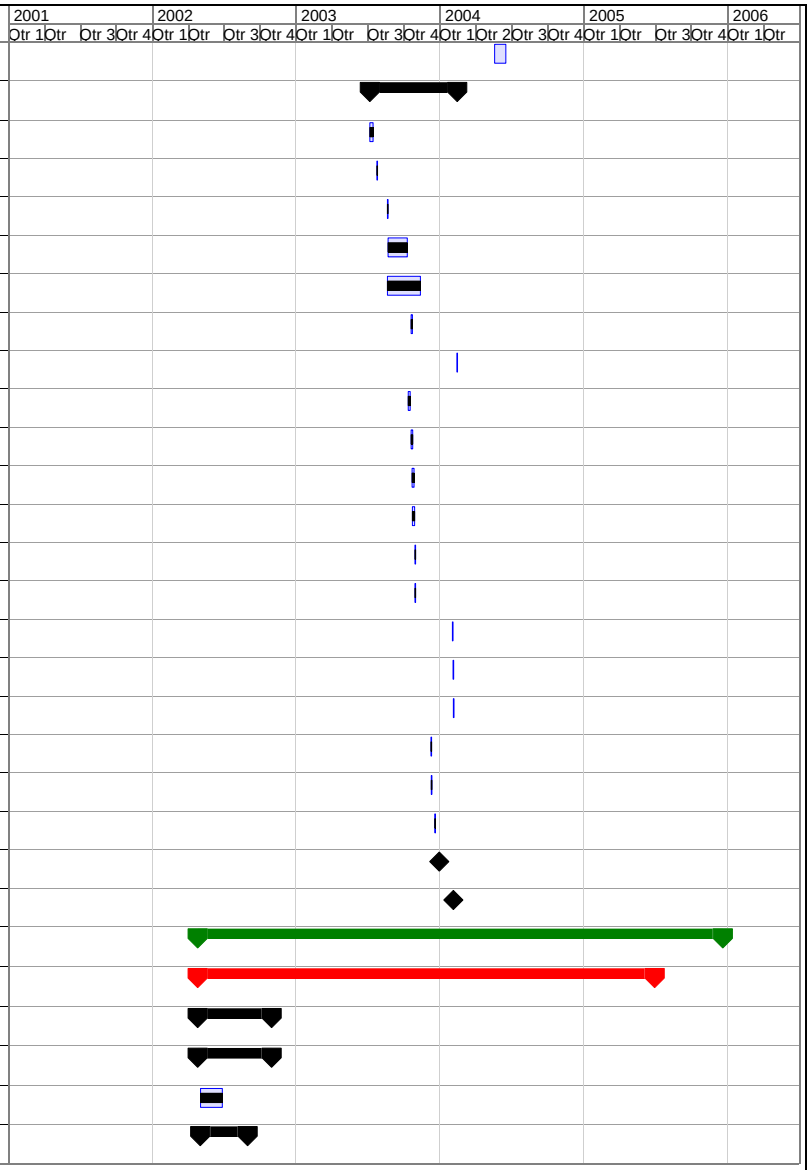


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
522	1.02.01.06.14.4	Install Network Distribution Eqpt in JICS/ORCAS	21 d	2/18/04		3/17/04	
523	**1.02.01.06.15**	**Install Security Systems**	**155 d**	**4/7/03**	**A**	**11/14/03**	
524	1.02.01.06.15.1	Install Electrical Circuit in CSB Security Room	7 d	4/7/03	A	4/15/03	A
525	1.02.01.06.15.2	Install Racks in Security Room	1 d	4/25/03	A	4/25/03	A
526	1.02.01.06.15.3	Install Second Termination Block to Connect Security Room To 4512 and 2500	1 d	5/22/03	A	5/22/03	A
527	1.02.01.06.15.4	UTB Verify Termination of Fiber to Security Room	33 d	5/23/03	A	7/11/03	A
528	1.02.01.06.15.5	Install Security Hardware & Certify Controllers M8 & M16 Are Operational	57 d	5/22/03	A	8/13/03	A
529	1.02.01.06.15.6	Terminate Security Fiber Cable & Activate System	4 d	7/21/03	A	7/24/03	A
530	1.02.01.06.15.7	Security Dept. Lock Manholes	1 d	11/14/03		11/14/03	
531	1.02.01.06.15.8	Qwest Install Phone Circuits for CSB Prox Readers	5 d	7/14/03	A	7/18/03	A
532	1.02.01.06.15.9	Install New Alarm Server System & Equipment	5 d	7/21/03	A	7/25/03	A
533	1.02.01.06.15.10	UTB Relocate Access Control Servers Bldg 4512 to CSB	4 d	7/23/03	A	7/28/03	A
534	1.02.01.06.15.11	UTB Tie-in Security Fiber Network - CSB	4 d	7/24/03	A	7/29/03	A
535	1.02.01.06.15.12	UTB Tie-in Alarm System for CSB	1 d	7/30/03	A	7/30/03	A
536	1.02.01.06.15.13	Site Access Control System Operational for CSB	1 d	7/30/03	A	7/30/03	A
537	1.02.01.06.15.14	UTB Tie-in Security Fiber - ETF	1 d	11/3/03		11/3/03	
538	1.02.01.06.15.15	UTB Tie-in Security Controls to SACS - ETF	1 d	11/4/03		11/4/03	
539	1.02.01.06.15.16	UTB Tie-in Alarm Circuits for ETF	1 d	11/5/03		11/5/03	
540	1.02.01.06.15.17	UTB Tie-in Security Fiber - ROB	1 d	9/9/03	A	9/9/03	A
541	1.02.01.06.15.18	UTB Tie-in Security Controls to SACS - ROB	1 d	9/10/03	A	9/10/03	A
542	1.02.01.06.15.19	UTB Tie-in Alarm Circuits to ROB	1 d	9/19/03	A	9/19/03	A
543	1.02.01.06.16	Complete Construction	0 d	9/30/03	A	9/30/03	A
544	1.02.01.07	Complete Project	0 d	11/5/03		11/5/03	
545	**1.03**	**Personnel & Equipment Moves & Renovations**	**914 d**	**1/25/02**	**A**	**9/19/05**	
546	**1.03.01**	**Planning, Engineering, and Materials**	**795 d**	**1/25/02**	**A**	**3/30/05**	
547	**1.03.01.01**	**Phase 1-Define Scope**	**130 d**	**1/25/02**	**A**	**7/31/02**	**A**
548	**1.03.01.01.01**	**FRP Move Plan Development**	**130 d**	**1/25/02**	**A**	**7/31/02**	**A**
549	1.03.01.01.01.1	Develop Planning Schedule	40 d	2/1/02	A	3/28/02	A
550	**1.03.01.01.01.2**	**Identify Move Locations**	**84 d**	**2/1/02**	**A**	**5/31/02**	**A**

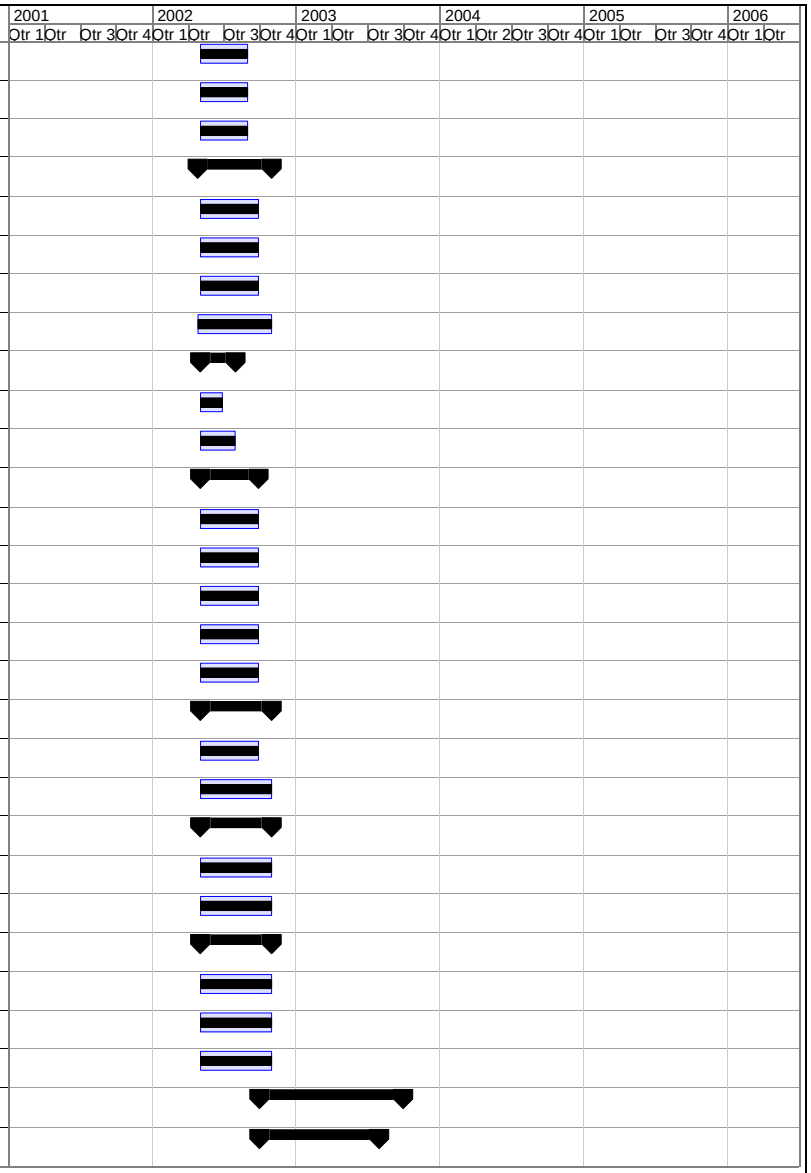


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
551	1.03.01.01.01.2.1	Validate Data Sheets With Plan Criteria	84 d	2/1/02	A	5/31/02	A
552	1.03.01.01.01.2.2	Equipment Locations	84 d	2/1/02	A	5/31/02	A
553	1.03.01.01.01.2.3	Personnel Locations	84 d	2/1/02	A	5/31/02	A
554	**1.03.01.01.01.3**	**Identify Resource Requirements & Cost Estimates**	**130 d**	**1/25/02**	**A**	**7/31/02**	**A**
555	1.03.01.01.01.3.1	Office Moves	104 d	2/1/02	A	6/28/02	A
556	1.03.01.01.01.3.2	Other	104 d	2/1/02	A	6/28/02	A
557	1.03.01.01.01.3.3	Transition	104 d	2/1/02	A	6/28/02	A
558	1.03.01.01.01.3.4	Identify Potential Funding Sources	130 d	1/25/02	A	7/31/02	A
559	**1.03.01.01.01.4**	**Develop Guidelines and Policies for Moves**	**62 d**	**2/1/02**	**A**	**4/30/02**	**A**
560	1.03.01.01.01.4.1	Detailed Move & Clean Out Criteria	40 d	2/1/02	A	3/28/02	A
561	1.03.01.01.01.4.2	Obtain Approvals for Move Plans/Policies	62 d	2/1/02	A	4/30/02	A
562	**1.03.01.01.01.5**	**Identify Service Requirements & Special Needs**	**104 d**	**2/1/02**	**A**	**6/28/02**	**A**
563	1.03.01.01.01.5.1	Utilities	104 d	2/1/02	A	6/28/02	A
564	1.03.01.01.01.5.2	Telecommunications	104 d	2/1/02	A	6/28/02	A
565	1.03.01.01.01.5.3	Research Milestones	104 d	2/1/02	A	6/28/02	A
566	1.03.01.01.01.5.4	Downtime/Outages	104 d	2/1/02	A	6/28/02	A
567	1.03.01.01.01.5.5	Other	104 d	2/1/02	A	6/28/02	A
568	**1.03.01.01.01.6**	**Identify Access & Egress Requirements**	**125 d**	**2/1/02**	**A**	**7/31/02**	**A**
569	1.03.01.01.01.6.1	Review Drawings	104 d	2/1/02	A	6/28/02	A
570	1.03.01.01.01.6.2	Identify Items Requiring Placement During Construction	125 d	2/1/02	A	7/31/02	A
571	**1.03.01.01.01.7**	**Develop & Submit Initial Cost Requirements**	**125 d**	**2/1/02**	**A**	**7/31/02**	**A**
572	1.03.01.01.01.7.1	Direct (Programmatic)	125 d	2/1/02	A	7/31/02	A
573	1.03.01.01.01.7.2	Indirect (Overhead/Space Charge)	125 d	2/1/02	A	7/31/02	A
574	**1.03.01.01.01.8**	**Develop & Submit Initial Resource Requirements**	**125 d**	**2/1/02**	**A**	**7/31/02**	**A**
575	1.03.01.01.01.8.1	Personnel Resource Loading	125 d	2/1/02	A	7/31/02	A
576	1.03.01.01.01.8.2	Equipment Resource Loading	125 d	2/1/02	A	7/31/02	A
577	1.03.01.01.01.8.3	Identify Potential Service Contracts	125 d	2/1/02	A	7/31/02	A
578	**1.03.01.02**	**Phase II-Refine Scope & Resource Requirements**	**250 d**	**7/1/02**	**A**	**6/30/03**	**A**
579	**1.03.01.02.01**	**Develop Room/Space Data Sheets**	**208 d**	**7/1/02**	**A**	**4/30/03**	**A**

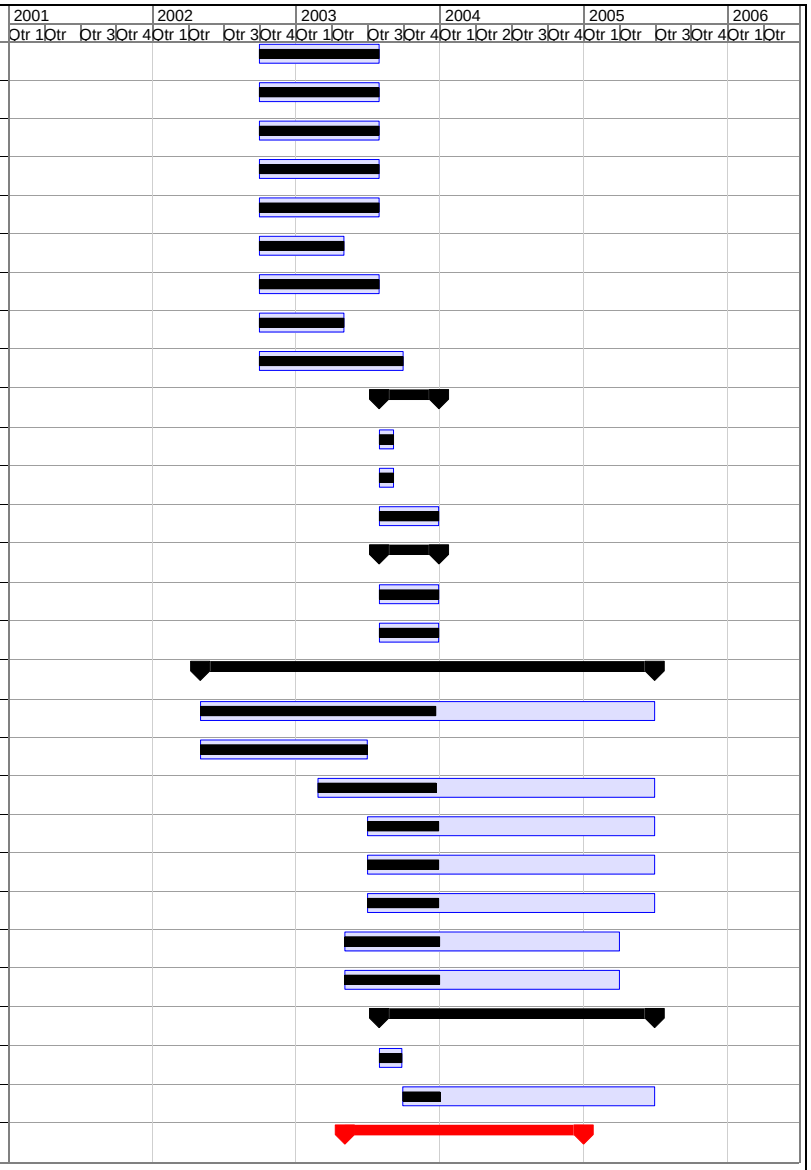


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
580	1.03.01.02.01.1	Offices	208 d	7/1/02	A	4/30/03	A
581	1.03.01.02.01.2	Laboratories	208 d	7/1/02	A	4/30/03	A
582	1.03.01.02.01.3	Shops/Storage/Other Specialized Areas	208 d	7/1/02	A	4/30/03	A
583	1.03.01.02.02	Develop Equipment Lists	208 d	7/1/02	A	4/30/03	A
584	1.03.01.02.03	Develop Move Scope	208 d	7/1/02	A	4/30/03	A
585	1.03.01.02.04	Initiate Service Contracts and/or Vendor Services	146 d	7/1/02	A	1/31/03	A
586	1.03.01.02.05	Submit Revised Resource & Cost Estimates	208 d	7/1/02	A	4/30/03	A
587	1.03.01.02.06	Identify Move Material Needs	146 d	7/1/02	A	1/31/03	A
588	1.03.01.02.07	Identify Move Captains and Train Teams	250 d	7/1/02	A	6/30/03	A
589	**1.03.01.03**	**Phase III-Finalize Scope & Resource Requirements**	**104 d**	**5/1/03**	**A**	**9/29/03**	**A**
590	1.03.01.03.01	Finalize Scope	26 d	5/1/03	A	6/6/03	A
591	1.03.01.03.02	Finalize Computer Equipment Move Plans	26 d	5/1/03	A	6/6/03	A
592	1.03.01.03.03	Secure Resources and Funding	104 d	5/1/03	A	9/29/03	A
593	**1.03.01.03.04**	**Prioritize Activities**	**104 d**	**5/1/03**	**A**	**9/29/03**	**A**
594	1.03.01.03.04.1	Moves	104 d	5/1/03	A	9/29/03	A
595	1.03.01.03.04.2	Disposition Activities	104 d	5/1/03	A	9/29/03	A
596	**1.03.01.04**	**Phase IV-Implement and Maintain Move Plans and Schedules**	**790 d**	**2/1/02**	**A**	**3/30/05**	
597	1.03.01.04.01	Initiate Work Requests/Authorizations	790 d	2/1/02	A	3/30/05	
598	1.03.01.04.02	Implement Moves Prior to April FY03	291 d	2/1/02	A	3/31/03	A
599	1.03.01.04.03	Conduct Readiness Reviews for Move	583 d	11/26/02	A	3/30/05	
600	1.03.01.04.04	Assist Responsible Organization in Relocation Activities	499 d	4/1/03	A	3/30/05	
601	1.03.01.04.05	Assist Disposition Team in Cleanout Activities	499 d	4/1/03	A	3/30/05	
602	1.03.01.04.06	Maintain Move Plans and Schedules	499 d	4/1/03	A	3/30/05	
603	1.03.01.04.07	Manage Facilities Revitalization Project Moves	480 d	2/3/03	A	12/31/04	
604	1.03.01.04.08	Prepare and Maintain Move Packages and Provide Move Support	480 d	2/3/03	A	12/31/04	
605	**1.03.01.05**	**Develop and Maintain ESH&Q Plans**	**478 d**	**5/1/03**	**A**	**3/30/05**	
606	1.03.01.05.01	Risk Assessment	41 d	5/1/03	A	6/27/03	A
607	1.03.01.05.02	Develop and Maintain ESH&Q Plans	437 d	6/30/03	A	3/30/05	
608	**1.03.02**	**Private Sector & RSC Personnel Moves**	**418 d**	**2/3/03**	**A**	**9/30/04**	

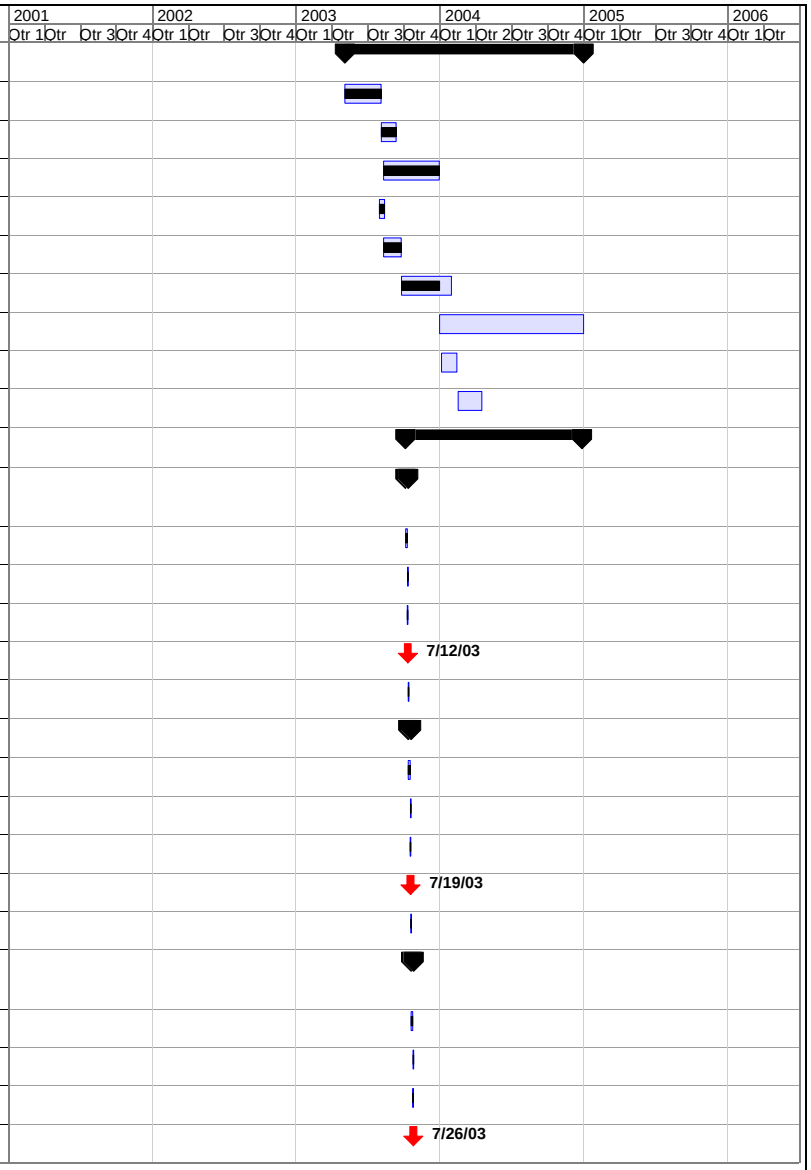


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
609	**1.03.02.01**	**Procurement/Installation of Materials, Equipment, & Services for Private Sector Moves**	**418 d**	**2/3/03**	**A**	**9/30/04**	
610	1.03.02.01.01	Prepare & Issue RFP For Moving Boxes to Private Sector Buildings	65 d	2/3/03	A	5/5/03	A
611	1.03.02.01.02	Award Contract for Moving Boxes to Private Sector Buildings	27 d	5/6/03	A	6/12/03	A
612	1.03.02.01.03	Procure Move Materials-FY03	98 d	5/12/03	A	9/30/03	A
613	1.03.02.01.04	Issue Purchase Order for New Telephones to Qwest	10 d	5/1/03	A	5/14/03	A
614	1.03.02.01.05	Issue Common Area Furnishings and Equipment Purchase Order	32 d	5/12/03	A	6/25/03	A
615	1.03.02.01.06	Install Common Area Furnishings and Equipment	89 d	6/26/03	A	10/31/03	
616	1.03.02.01.07	Procure Move Materials-FY04	251 d	10/1/03		9/30/04	
617	1.03.02.01.08	Purchase Common Area Furnishings and Equipment-FY04	30 d	10/6/03		11/14/03	
618	1.03.02.01.09	Install Common Area Furnishings and Equipment-FY04	40 d	11/17/03		1/16/04	
619	**1.03.02.02**	**Individual Space Moves to Private Sector & RSC Buildings**	**308 d**	**7/7/03**	**A**	**9/26/04**	
620	**1.03.02.02.01**	**Move CSMD & NCTD to CSB-3 North (ID 3CSBN-X054-4500S, -4500N, -1062, -7601, -3546, -1505, -X012-3546) (93 Spaces)**	**5 d**	**7/7/03**	**A**	**7/13/03**	**A**
621	1.03.02.02.01.1	Pack NCTD & NSTD for Move to CSB-3N	5 d	7/7/03	A	7/11/03	A
622	1.03.02.02.01.2	Qwest Ring/ Reconnect Phone Lines & Set New Phones in CSB-3N	0.5 d	7/11/03	A	7/11/03	A
623	1.03.02.02.01.3	Disconnect & Reconnect Computers for CSB-3N	2.5 d	7/10/03	A	7/12/03	A
624	1.03.02.02.01.4	Move Boxes to CSB-3N	1.5 d	7/11/03	A	7/12/03	A
625	1.03.02.02.01.5	Post Move Work CSB-3N	1 d	7/13/03	A	7/13/03	A
626	**1.03.02.02.02**	**Move NSTD to CSB-3 South (ID 3CSBS-X094-1099C, -1060C, -9114-1) (38 Spaces)**	**5 d**	**7/14/03**	**A**	**7/20/03**	**A**
627	1.03.02.02.02.1	Pack NSTD for Move to CSB-3S	5 d	7/14/03	A	7/18/03	A
628	1.03.02.02.02.2	Qwest Ring/ Reconnect Phone Lines & Set New Phones in CSB-3S	0.5 d	7/18/03	A	7/18/03	A
629	1.03.02.02.02.3	Disconnect & Reconnect Computers for CSB-3S	2.5 d	7/17/03	A	7/19/03	A
630	1.03.02.02.02.4	Move Boxes to CSB-3S	1.5 d	7/18/03	A	7/19/03	A
631	1.03.02.02.02.5	Post Move Work CSB-3S	1 d	7/20/03	A	7/20/03	A
632	**1.03.02.02.03**	**Move CSMD & CSED to CSB-2 (ID 2CSBX-X012-3546, -6025, -6010, -6012, 2CSBX-X107-4500N, -6012) (51 Spaces)**	**5 d**	**7/21/03**	**A**	**7/27/03**	**A**
633	1.03.02.02.03.1	Pack CCSD , LPD & CSED for Move to CSB-2	5 d	7/21/03	A	7/25/03	A
634	1.03.02.02.03.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in CSB-2	0.5 d	7/25/03	A	7/25/03	A
635	1.03.02.02.03.3	Disconnect & Reconnect Computers for CSB-2	2.5 d	7/24/03	A	7/26/03	A
636	1.03.02.02.03.4	Move Boxes to CSB-2	1.5 d	7/25/03	A	7/26/03	A

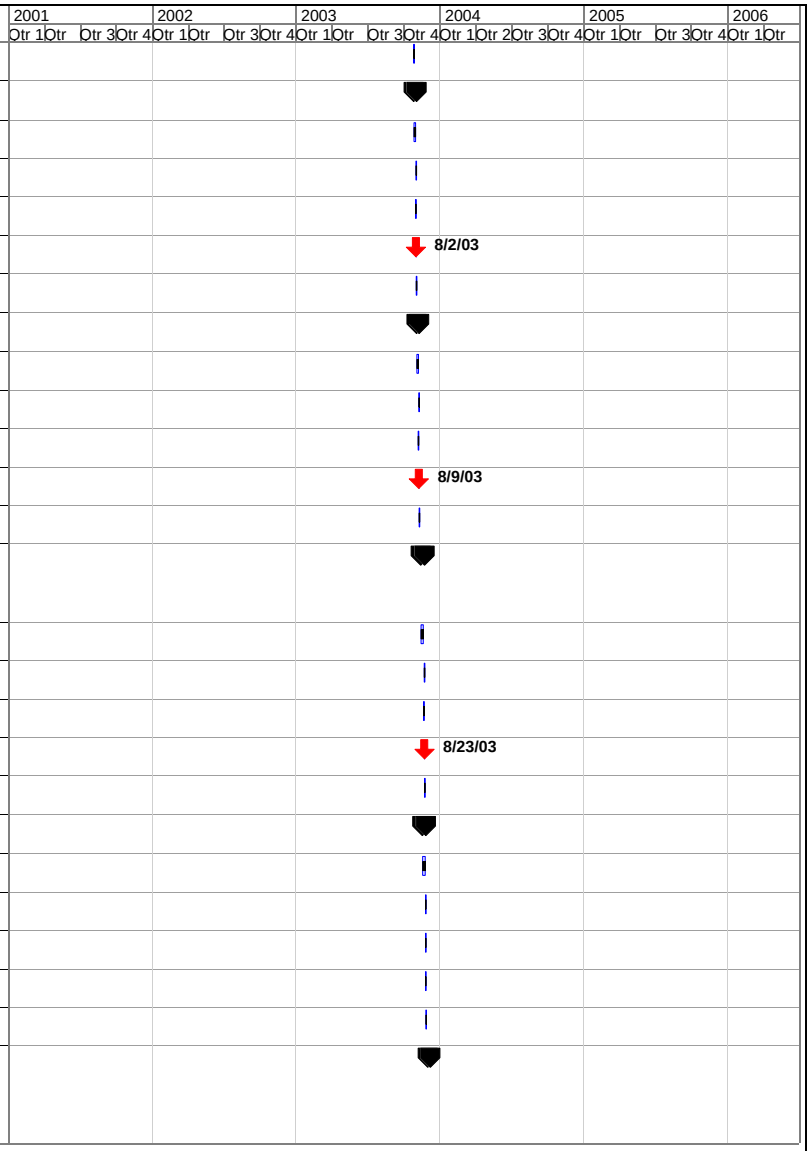


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
637	1.03.02.02.03.5	Post Move Work CSB-2	1 d	7/27/03	A	7/27/03	A
638	**1.03.02.02.04**	**Move CSMD to CSB-1 (ID 1CSBX-X012-4500N, -4500S, -6025, -6010, -3546) (36 Spaces)**	**5 d**	**7/28/03**	**A**	**8/3/03**	**A**
639	1.03.02.02.04.1	Pack CSMD for Move to CSB-1	5 d	7/28/03	A	8/1/03	A
640	1.03.02.02.04.2	Qwest Ring/ Reconnect Phone Lines & Set New Phones in CSB-1	0.5 d	8/1/03	A	8/1/03	A
641	1.03.02.02.04.3	Disconnect & Reconnect Computers for CSB-1	2.5 d	7/31/03	A	8/2/03	A
642	1.03.02.02.04.4	Move Boxes to CSB-1	1.5 d	8/1/03	A	8/2/03	A
643	1.03.02.02.04.5	Post Move Work CSB-1	1 d	8/3/03	A	8/3/03	A
644	**1.03.02.02.05**	**Move NSTD to ROB-3 East (ID 3ROBE-X094-6010, -6011, -6025, -4500N) (66 Spaces)**	**5 d**	**8/4/03**	**A**	**8/10/03**	**A**
645	1.03.02.02.05.1	Pack NSTD for Move to ROB-3E	5 d	8/4/03	A	8/8/03	A
646	1.03.02.02.05.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ROB-3E	0.5 d	8/8/03	A	8/8/03	A
647	1.03.02.02.05.3	Disconnect & Reconnect Computers for ROB-3E	2.5 d	8/7/03	A	8/9/03	A
648	1.03.02.02.05.4	Move Boxes to ROB-3E	1.5 d	8/8/03	A	8/9/03	A
649	1.03.02.02.05.5	Post Move Work ROB-3E	1 d	8/10/03	A	8/10/03	A
650	**1.03.02.02.06**	**Move BISD, ESTD, & NSTD to ROB-2 East (ID 2ROBE-X037-3500,-4500N, 2ROBE-X092-4500N, 2ROBE-X094-1060C, -1099C, -4500N, -92041) (69 Spaces)**	**6 d**	**8/15/03**	**A**	**8/24/03**	**A**
651	1.03.02.02.06.1	Pack BISD, ESTD & NSTD for Move to ROB-2E	5 d	8/15/03	A	8/21/03	A
652	1.03.02.02.06.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ROB-2E	0.5 d	8/22/03	A	8/22/03	A
653	1.03.02.02.06.3	Disconnect & Reconnect Computers for ROB-2E	2.5 d	8/21/03	A	8/23/03	A
654	1.03.02.02.06.4	Move Boxes to ROB-2E	1.5 d	8/22/03	A	8/23/03	A
655	1.03.02.02.06.5	Post Move Work ROB-2E	1 d	8/24/03	A	8/24/03	A
656	**1.03.02.02.07**	**Move NSTD from 9204-1 to ROB-2E (ID 2ROBE-X094-92041) (8 Spaces)**	**7 d**	**8/19/03**	**A**	**8/27/03**	**A**
657	1.03.02.02.07.1	Pack NSTD for Move to ROB-2E	5 d	8/19/03	A	8/25/03	A
658	1.03.02.02.07.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ROB-2E	0.5 d	8/26/03	A	8/26/03	A
659	1.03.02.02.07.3	Disconnect & Reconnect NSTD Computers in ROB-2E	1 d	8/26/03	A	8/26/03	A
660	1.03.02.02.07.4	Move Boxes to ROB-2E	1 d	8/26/03	A	8/26/03	A
661	1.03.02.02.07.5	Post Move Work ROB-2E	1 d	8/27/03	A	8/27/03	A
662	**1.03.02.02.08**	**Move LSD fm 1060C & 1061 to CSB-2 & ROB-2W, CSMD & CCSD to ROB-2W (ID2CSBX-X001-1060C-1, -1061, -X012-6012, 3CSBN-X012-6010, -6025,-6012, 2ROBW-X001-1061,-1060C, -X012-6010C,-4500S, 6010, 6025, 2ROBW-X110-4500N) (72 Spaces)**	**4 d**	**9/2/03**	**A**	**9/7/03**	**A**

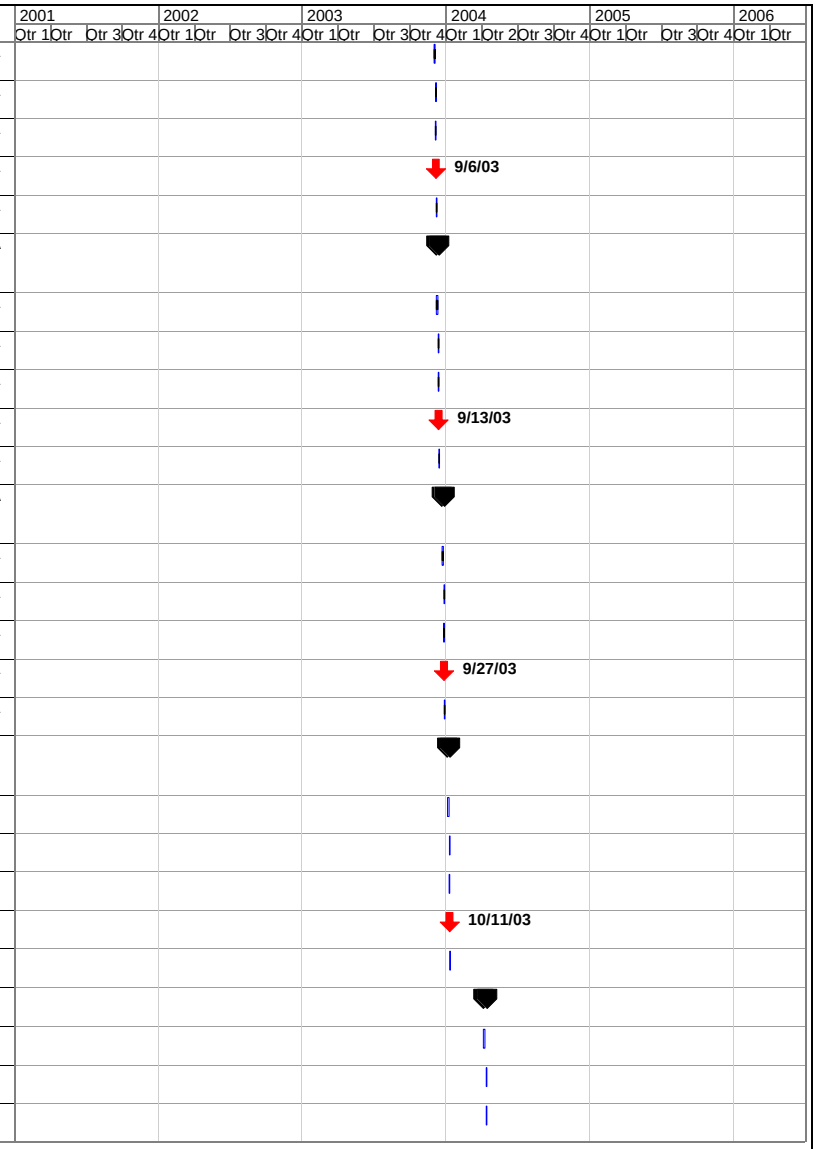


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
663	1.03.02.02.08.1	Pack LSD, CSMD & CCSD for Move to ROB-2W & CSB	3 d	9/2/03	A	9/4/03	A
664	1.03.02.02.08.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ROB-2W & CSB	0.5 d	9/5/03	A	9/5/03	A
665	1.03.02.02.08.3	Disconnect & Reconnect Computers for ROB-2W & CSB	2.5 d	9/4/03	A	9/6/03	A
666	1.03.02.02.08.4	Move Boxes to ROB-2W & CSB	1.5 d	9/5/03	A	9/6/03	A
667	1.03.02.02.08.5	Post Move Work ROB-2W & CSB	1 d	9/7/03	A	9/7/03	A
668	**1.03.02.02.09**	**Move CSED to ROB-1 West & Furniture to CSB-2 (ID 1ROBW-X107-6010, -6011, -6025, -4500N-1, 2CSBX-X107-6011) (55 Spaces)**	**5 d**	**9/8/03**	**A**	**9/14/03**	**A**
669	1.03.02.02.09.1	Pack CSED for Move to ROB-1W	4 d	9/8/03	A	9/11/03	A
670	1.03.02.02.09.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ROB-1W	0.5 d	9/12/03	A	9/12/03	A
671	1.03.02.02.09.3	Disconnect & Reconnect X107 Computers for ROB-1W	2.5 d	9/11/03	A	9/13/03	A
672	1.03.02.02.09.4	Move Boxes to ROB-1W	1.5 d	9/12/03	A	9/13/03	A
673	1.03.02.02.09.5	Post Move Work ROB-1W	1 d	9/14/03	A	9/14/03	A
674	**1.03.02.02.10**	**Move NSTD & FMD to ROB-1E & CSB-3 (ID 1ROBE-X089-2652B, -X094-1060C, -4500N, -7606A-2, -7918, 3CSBS-X094-4500N-1) (41 Spaces)**	**5 d**	**9/22/03**	**A**	**9/28/03**	**A**
675	1.03.02.02.10.1	Pack CCSD for Move to ROB-1E	4 d	9/22/03	A	9/25/03	A
676	1.03.02.02.10.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ROB-1E	0.5 d	9/26/03	A	9/26/03	A
677	1.03.02.02.10.3	Disconnect & Reconnect Computers for ROB-1E	2.5 d	9/25/03	A	9/27/03	A
678	1.03.02.02.10.4	Move Boxes to ROB-1E	1.5 d	9/26/03	A	9/27/03	A
679	1.03.02.02.10.5	Post Move Work ROB-1E	1 d	9/28/03	A	9/28/03	A
680	**1.03.02.02.11**	**Move FED to ROB-3W & CSED to ROB-1W (3ROBW-X019-92012-2, 1ROBW-X107-92012) (58 Spaces)**	**5 d**	**10/6/03**		**10/12/03**	
681	1.03.02.02.11.1	Pack FED for Move to ROB-3W	5 d	10/6/03		10/10/03	
682	1.03.02.02.11.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ROB-3W	0.5 d	10/10/03		10/10/03	
683	1.03.02.02.11.3	Disconnect & Reconnect Computers for ROB-3W	2.5 d	10/9/03		10/11/03	
684	1.03.02.02.11.4	Move Boxes to ROB-3W	1.5 d	10/10/03		10/11/03	
685	1.03.02.02.11.5	Post Move Work ROB-3W	1 d	10/12/03		10/12/03	
686	**1.03.02.02.12**	**Move NSTD FSAR Library from 9204-1 to ETF-2 (ID 2ETFX-X094-92041) (2 Spaces)**	**8 d**	**1/5/04**		**1/14/04**	
687	1.03.02.02.12.1	Pack NSTD for Move to ETF-2	5 d	1/5/04		1/9/04	
688	1.03.02.02.12.2	Qwest Ring/Reconnect NSTD Phone Lines & Set New Phones in ETF-2	0.5 d	1/12/04		1/12/04	
689	1.03.02.02.12.3	Disconnect & Reconnect NSTD Computers for ETF-2	1 d	1/12/04		1/12/04	

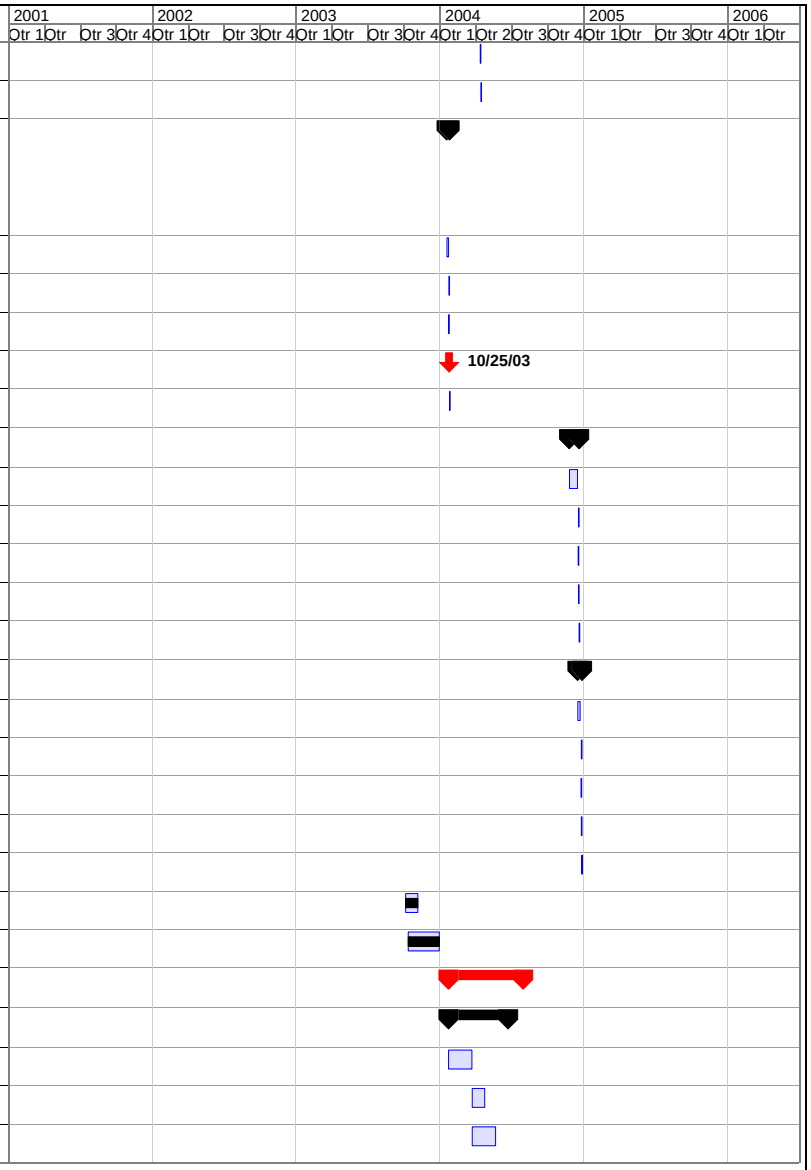


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
690	1.03.02.02.12.4	Move NSTD Boxes from 4508 to ETF-2 (Vendor)	2 d	1/12/04		1/13/04	
691	1.03.02.02.12.5	Post Move Work ETF-2	1 d	1/14/04		1/14/04	
692	**1.03.02.02.13**	**Move LSD, ESTD, NSTD, QSD& Graphics to ETF-2B & FMD to ROB-1E(ID 1EFTX-X094-2ROBE, 2ETFX-X024-4500N, -X092-3606, -3500-1, -NTRC, -4500N, -4500S-1,-3CSBN, -X071-1060C, -X094-1099C, 1ROBE-X089-NTRC, -X094-1060C) (46 Spaces)**	**5 d**	**10/20/03**		**10/26/03**	
693	1.03.02.02.13.1	Pack LSD, ESTD, NSTD, QSD & Graphics for Move to ETF-2B	5 d	10/20/03		10/24/03	
694	1.03.02.02.13.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ETF-2B	0.5 d	10/24/03		10/24/03	
695	1.03.02.02.13.3	Disconnect & Reconnect Computers for ETF-2B	2.5 d	10/23/03		10/25/03	
696	1.03.02.02.13.4	Move Boxes to ETF-2B (Vendor)	1.5 d	10/24/03		10/25/03	
697	1.03.02.02.13.5	Post Move Work ETF-2B	1 d	10/26/03		10/26/03	
698	**1.03.02.02.14**	**Move LPD From 5000 to RSC 1**	**16 d**	**8/26/04**		**9/19/04**	
699	1.03.02.02.14.1	Pack LPD for Move to RSC 1	5 d	8/26/04		9/15/04	
700	1.03.02.02.14.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in RSC 1	0.5 d	9/17/04		9/17/04	
701	1.03.02.02.14.3	Disconnect & Reconnect Computers for RSC 1	2.5 d	9/16/04		9/18/04	
702	1.03.02.02.14.4	Move Boxes to RSC 1	1.5 d	9/17/04		9/18/04	
703	1.03.02.02.14.5	Post Move Work RSC 1	1 d	9/18/04		9/19/04	
704	**1.03.02.02.15**	**Move LPD From 5002 to RSC 2**	**7 d**	**9/16/04**		**9/26/04**	
705	1.03.02.02.15.1	Pack LPD for Move to RSC 2	5 d	9/16/04		9/22/04	
706	1.03.02.02.15.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in RSC 2	0.5 d	9/24/04		9/24/04	
707	1.03.02.02.15.3	Disconnect & Reconnect Computers for RSC 2	2.5 d	9/23/04		9/25/04	
708	1.03.02.02.15.4	Move Boxes to RSC 2	1.5 d	9/24/04		9/25/04	
709	1.03.02.02.15.5	Post Move Work RSC 2	1 d	9/25/04		9/26/04	
710	1.03.02.02.16	Miscellaneous Moves	12 d	7/7/03	A	8/7/03	A
711	1.03.02.02.17	Third Party Building Maintenance-FY03	56 d	7/14/03	A	9/30/03	A
712	**1.03.03**	**State of Tennessee (JICS/ORCAS) Personnel Moves**	**128.5 d**	**10/24/03**		**4/30/04**	
713	**1.03.03.01**	**Procurement/Installation of Materials, Equipment, & Services for JICS/ORCAS Moves**	**102 d**	**10/24/03**		**3/23/04**	
714	1.03.03.01.01	Contract for Moving Boxes to JICS/ORCAS	40 d	10/24/03		12/22/03	
715	1.03.03.01.02	Procure Move Materials for JICS/ORCAS Moves	20 d	12/23/03		1/23/04	
716	1.03.03.01.03	Procure Common Area Materials and Equipment	40 d	12/23/03		2/20/04	

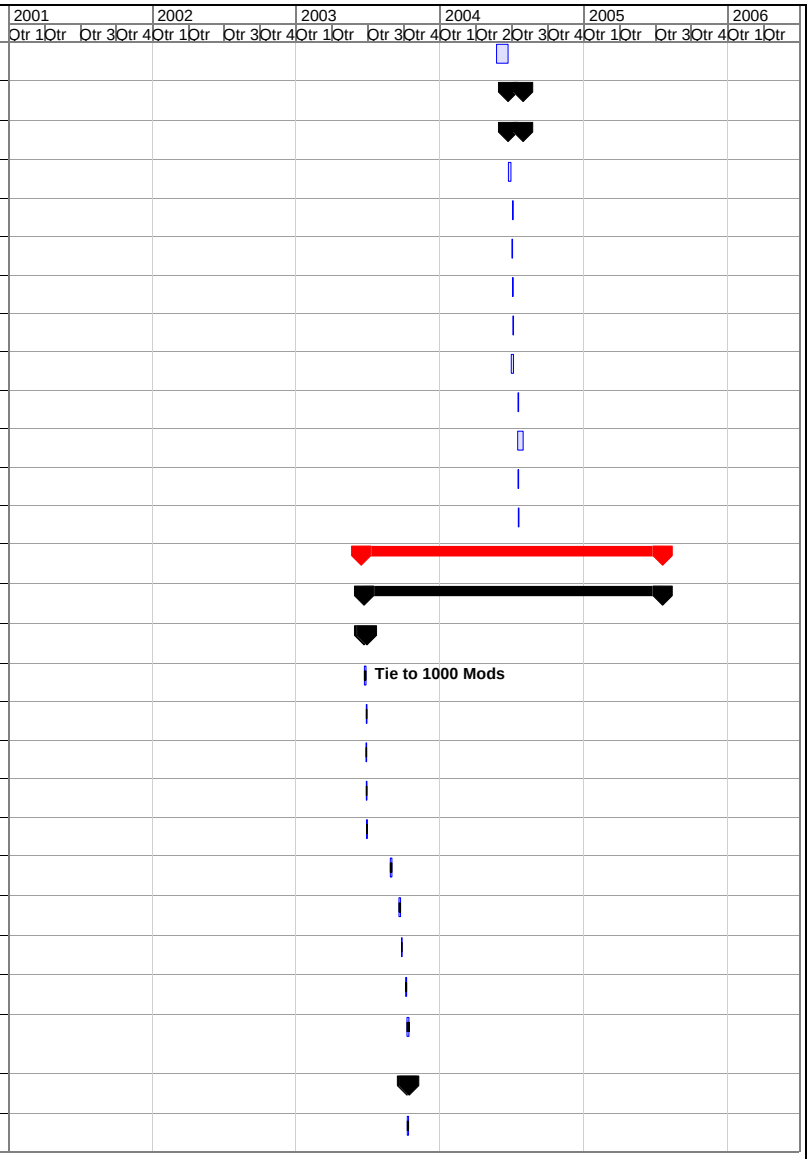


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
717	1.03.03.01.04	Install Common Area Materials and Equipment	22 d	2/23/04		3/23/04	
718	**1.03.03.02**	**Individual Space Moves to JICS/ORCAS**	**26.5 d**	**3/24/04**		**4/30/04**	
719	**1.03.03.02.01**	**3546-UT-JICS**	**26.5 d**	**3/24/04**		**4/30/04**	
720	1.03.03.02.01.1	Pack for Move to JICS/ORCAS 1st Floor	5 d	3/24/04		3/30/04	
721	1.03.03.02.01.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in JICS/ORCAS 1	0.5 d	4/2/04		4/2/04	
722	1.03.03.02.01.3	Disconnect/ Reconnect Computers for JICS/ORCAS 1	2.5 d	4/1/04		4/3/04	
723	1.03.03.02.01.4	Move Boxes to JICS/ORCAS 1	1.5 d	4/2/04		4/3/04	
724	1.03.03.02.01.5	Post Move Work JICS/ORCAS 1	1 d	4/3/04		4/4/04	
725	1.03.03.02.01.6	Pack for Move to JICS/ORCAS 2nd Floor	5 d	3/31/04		4/6/04	
726	1.03.03.02.01.7	Qwest Ring/Reconnect Phone Lines & Set New Phones in JICS/ORCAS 2	0.5 d	4/16/04		4/16/04	
727	1.03.03.02.01.8	Disconnect/ Reconnect Computers for JICS/ORCAS 2	2.5 d	4/16/04		4/30/04	
728	1.03.03.02.01.9	Move Boxes to JICS/ORCAS 2	1.5 d	4/16/04		4/17/04	
729	1.03.03.02.01.10	Post Move Work JICS/ORCAS 2	1 d	4/17/04		4/18/04	
730	**1.03.04**	**Personnel/Equipment Moves**	**524 d**	**3/17/03**	**A**	**4/19/05**	
731	**1.03.04.01**	**Personnel/Equipment Moves to New Spaces**	**519 d**	**3/24/03**	**A**	**4/19/05**	
732	**1.03.04.01.01**	**Move BISD From 1060C to 1000**	**5 d**	**3/24/03**	**A**	**3/30/03**	**A**
733	1.03.04.01.01.1	Pack BISD for Move to 1000	5 d	3/24/03	A	3/28/03	A
734	1.03.04.01.01.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in 1000	0.5 d	3/28/03	A	3/28/03	A
735	1.03.04.01.01.3	Disconnect & Reconnect Computers for 1000	2.5 d	3/27/03	A	3/29/03	A
736	1.03.04.01.01.4	Move Boxes to 1000	1.5 d	3/28/03	A	3/29/03	A
737	1.03.04.01.01.5	Post Move Work 1000	1 d	3/30/03	A	3/30/03	A
738	**1.03.04.01.02**	**Move CSMD from 3546 to CSB-2 (ID 2CSBN-X012-3546) (0 Spaces)**	**3 d**	**5/29/03**	**A**	**6/2/03**	**A**
739	**1.03.04.01.03**	**Move AG Node from 7601 to CSB-3N (ID 3CSBN-X099-7601) (0 Spaces)**	**3 d**	**6/20/03**	**A**	**6/24/03**	**A**
740	**1.03.04.01.04**	**Move NCTD from 7601 to CSB-3N (ID 3CSBN-X054-7601) (0 Spaces)**	**3 d**	**6/26/03**	**A**	**6/28/03**	**A**
741	**1.03.04.01.05**	**Move LSD Files from 9210 to 7601M & 7603 (ID 7601M-X001-9210, 7603-X001-9210) (0 Spaces)**	**3 d**	**7/7/03**	**A**	**7/9/03**	**A**
742	**1.03.04.01.06**	**Move NCTD Computers & Equipment from 1062, 3546, & 7601 to CSB-3N (ID 3CSBN-X054-1062, -3546, -7601) (0 Spaces)**	**4 d**	**7/10/03**	**A**	**7/15/03**	**A**
743	**1.03.04.01.07**	**Move M&CD from 9204-1 to 4500S (ID 4500S-X011-92041) (3 Spaces)**	**4 d**	**7/11/03**	**A**	**7/16/03**	**A**
744	1.03.04.01.07.1	Pack M&CD for Move to 4500S	2 d	7/11/03	A	7/14/03	A



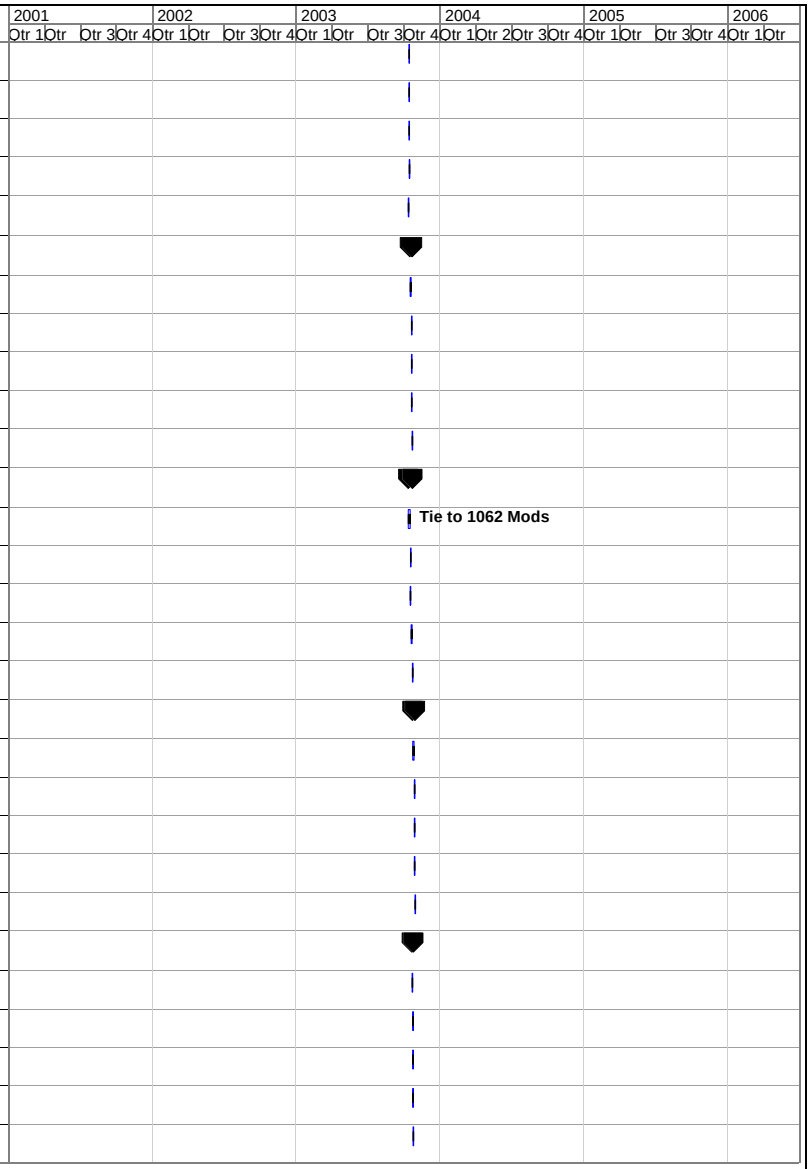
Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

10/24/03 **4 - 28** rogress Reported Through 9/30/03

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
745	1.03.04.01.07.2	Qwest Ring/Reconnect Phone Lines and Set Phones in 4500S	0.5 d	7/15/03	A	7/15/03	A
746	1.03.04.01.07.3	Disconnect & Reconnect M&CD Computers in 4500S	1 d	7/15/03	A	7/15/03	A
747	1.03.04.01.07.4	Move M&CD Boxes to 4500S	1 d	7/15/03	A	7/15/03	A
748	1.03.04.01.07.5	Post Move Work 4500S	1 d	7/16/03	A	7/16/03	A
749	**1.03.04.01.08**	**Move CSMD AG Node from 3546 to CSB-2 (ID 2CSBX-X012-3546) (0 Spaces)**	**2 d**	**7/14/03**	**A**	**7/15/03**	**A**
750	**1.03.04.01.09**	**Move NSTD from 9114 & 113UV to CSB-3S (ID 3CSBS-X094-9114, -113UV) (2 Spaces)**	**4 d**	**7/18/03**	**A**	**7/23/03**	**A**
751	1.03.04.01.09.1	Pack NSTD for Move to CSB-3S	2 d	7/18/03	A	7/21/03	A
752	1.03.04.01.09.2	Qwest Ring/Reconnect Phone Lines and Set New Phones in CSB-3S	0.5 d	7/22/03	A	7/22/03	A
753	1.03.04.01.09.3	Disconnect & Reconnect NSTD Computers in CSB-3S	1 d	7/22/03	A	7/22/03	A
754	1.03.04.01.09.4	Move NSTD Boxes to CSB-3S	1 d	7/22/03	A	7/22/03	A
755	1.03.04.01.09.5	Post Move Work CSB-3S	1 d	7/23/03	A	7/23/03	A
756	**1.03.04.01.10**	**Move ESD From 1059 to 1062 (13 Spaces) (ID 1062-X042-1059, -1062)**	**9 d**	**7/14/03**	**A**	**7/24/03**	**A**
757	1.03.04.01.10.1	Pack ESD for Move to 1062	5 d	7/14/03	A	7/18/03	A
758	1.03.04.01.10.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in 1062	0.5 d	7/18/03	A	7/18/03	A
759	1.03.04.01.10.3	Disconnect & Reconnect Computers for 1062	2.5 d	7/17/03	A	7/19/03	A
760	1.03.04.01.10.4	Move Boxes to 1062	3 d	7/21/03	A	7/23/03	A
761	1.03.04.01.10.5	Post Move Work 1062	1 d	7/24/03	A	7/24/03	A
762	**1.03.04.01.11**	**Move M&CD from 9204-1 to 4515 (ID 4515-X011-92041) (3Spaces)**	**4 d**	**7/25/03**	**A**	**7/30/03**	**A**
763	1.03.04.01.11.1	Pack M&CD for Move to 4515	2 d	7/25/03	A	7/28/03	A
764	1.03.04.01.11.2	Qwest Ring/Reconnect Phone Lines & Set Phones in 4515	0.5 d	7/29/03	A	7/29/03	A
765	1.03.04.01.11.3	Disconnect & Reconnect M&CD Computers in 4515	1 d	7/29/03	A	7/29/03	A
766	1.03.04.01.11.4	Move M&CD Boxes to 4515	1 d	7/29/03	A	7/29/03	A
767	1.03.04.01.11.5	Post Move Work in 4515	1 d	7/30/03	A	7/30/03	A
768	**1.03.04.01.12**	**Move LPD from 4512 to CSB-2 (ID 2CSBX-X026-4512) (1 Space)**	**3 d**	**7/23/03**	**A**	**7/26/03**	**A**
769	1.03.04.01.12.1	Pack LPD for Move to CSB-2	2 d	7/23/03	A	7/24/03	A
770	1.03.04.01.12.2	Qwest Ring/Reconnect LPD Phone Line & Set New Phone in CSB-2	0.5 d	7/25/03	A	7/25/03	A
771	1.03.04.01.12.3	Disconnect & Reconnect LPD Computer in CSB-2	1 d	7/25/03	A	7/25/03	A
772	1.03.04.01.12.4	Move LPD Boxes to CSB-2	1 d	7/25/03	A	7/25/03	A
773	1.03.04.01.12.5	Post Move Work in CSB-2	1 d	7/26/03	A	7/26/03	A

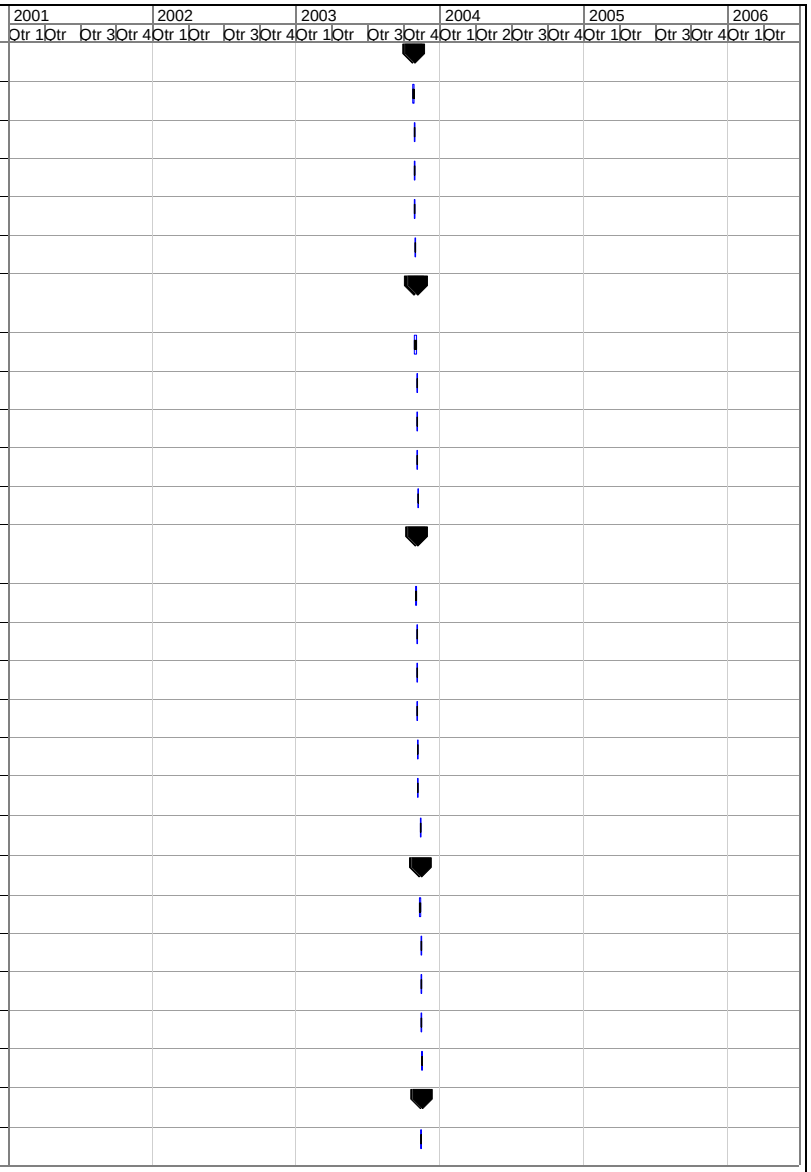


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
774	**1.03.04.01.13**	**Move CSED from NTRC to CSB-2 (ID 2CSBX-X107-NTRC) (1 Space)**	**4 d**	**7/25/03**	**A**	**7/30/03**	**A**
775	1.03.04.01.13.1	Pack CSED for Move to CSB-2	2 d	7/25/03	A	7/28/03	A
776	1.03.04.01.13.2	Qwest Ring/Reconnect CSED Phone Lines & Set New Phones in CSB-2	0.5 d	7/29/03	A	7/29/03	A
777	1.03.04.01.13.3	Disconnect & Reconnect CSED Computers in CSB-2	1 d	7/29/03	A	7/29/03	A
778	1.03.04.01.13.4	Move CSED Boxes to CSB-2	1 d	7/29/03	A	7/29/03	A
779	1.03.04.01.13.5	Post Move Work in CSB-2	1 d	7/30/03	A	7/30/03	A
780	**1.03.04.01.14**	**Move CSMD from 3546 to CSB-2 & LSD from 9210 to 1059 & 1061 (ID 1059-X001-9210, 1061-X001-9210) (30 Spaces)**	**8 d**	**7/29/03**	**A**	**8/7/03**	**A**
781	1.03.04.01.14.1	Pack CSMD & LSD for Moves to CSB, 1059, & 1061	5 d	7/29/03	A	8/4/03	A
782	1.03.04.01.14.2	Qwest Ring/Reconnect Phone Lines & Set Phones in CSB, 1059, & 1061	0.5 d	8/5/03	A	8/5/03	A
783	1.03.04.01.14.3	Disconnect & Reconnect Computers in CSB, 1059, & 1061	2 d	8/5/03	A	8/6/03	A
784	1.03.04.01.14.4	Move CSMD & LSD Boxes to CSB, 1059, & 1061	2 d	8/5/03	A	8/6/03	A
785	1.03.04.01.14.5	Post Move Work in CSB, 1059, & 1061	1 d	8/7/03	A	8/7/03	A
786	**1.03.04.01.15**	**Move CSMD from 6012 and F&O from 2652B to CSB-1 (ID 1CSBX-X089-2652B) (2 Spaces)**	**4 d**	**8/1/03**	**A**	**8/6/03**	**A**
787	1.03.04.01.15.1	Pack CSMD and F&O for Move to CSB-1	2 d	8/1/03	A	8/4/03	A
788	1.03.04.01.15.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in CSB-1	0.5 d	8/5/03	A	8/5/03	A
789	1.03.04.01.15.3	Disconnect & Reconnect Computers in CSB-1	1 d	8/5/03	A	8/5/03	A
790	1.03.04.01.15.4	Move CSMD and F&O Boxes to CSB-1	1 d	8/5/03	A	8/5/03	A
791	1.03.04.01.15.5	Post Move Work in CSB-1	1 d	8/6/03	A	8/6/03	A
792	**1.03.04.01.16**	**Move NSTD File Cabinet from 6011 to ROB-3E (ID 3ROBE-X094-6011) (0 Spaces)**	**1 d**	**8/6/03**	**A**	**8/6/03**	**A**
793	**1.03.04.01.17**	**Move CSMD AV Furniture from 3546 to CSB-2 (ID 2CSBX-X012-3546) (0 Spaces)**	**1 d**	**8/13/03**	**A**	**8/13/03**	**A**
794	**1.03.04.01.18**	**Move PD From 6011 to 6025 (ID 6025-X013-6011) (13 SPACES)**	**5 d**	**8/11/03**	**A**	**8/16/03**	**A**
795	1.03.04.01.18.1	Pack PD for Move to 6025	4 d	8/11/03	A	8/14/03	A
796	1.03.04.01.18.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in 6025	0.5 d	8/15/03	A	8/15/03	A
797	1.03.04.01.18.3	Disconnect & Reconnect PD Computers for 6025	1 d	8/15/03	A	8/15/03	A
798	1.03.04.01.18.4	Move PD Boxes from 6010 & 6011 to 6025	1 d	8/15/03	A	8/15/03	A
799	1.03.04.01.18.5	Post Move Work 6025	1 d	8/16/03	A	8/16/03	A
800	**1.03.04.01.19**	**Move CSMD from 4500N to CSB-1 (ID 1CSBX-X012-4500N) (1 Space)**	**4 d**	**8/14/03**	**A**	**8/19/03**	**A**
801	1.03.04.01.19.1	Pack CSMD for Move to CSB-1	2 d	8/14/03	A	8/15/03	A

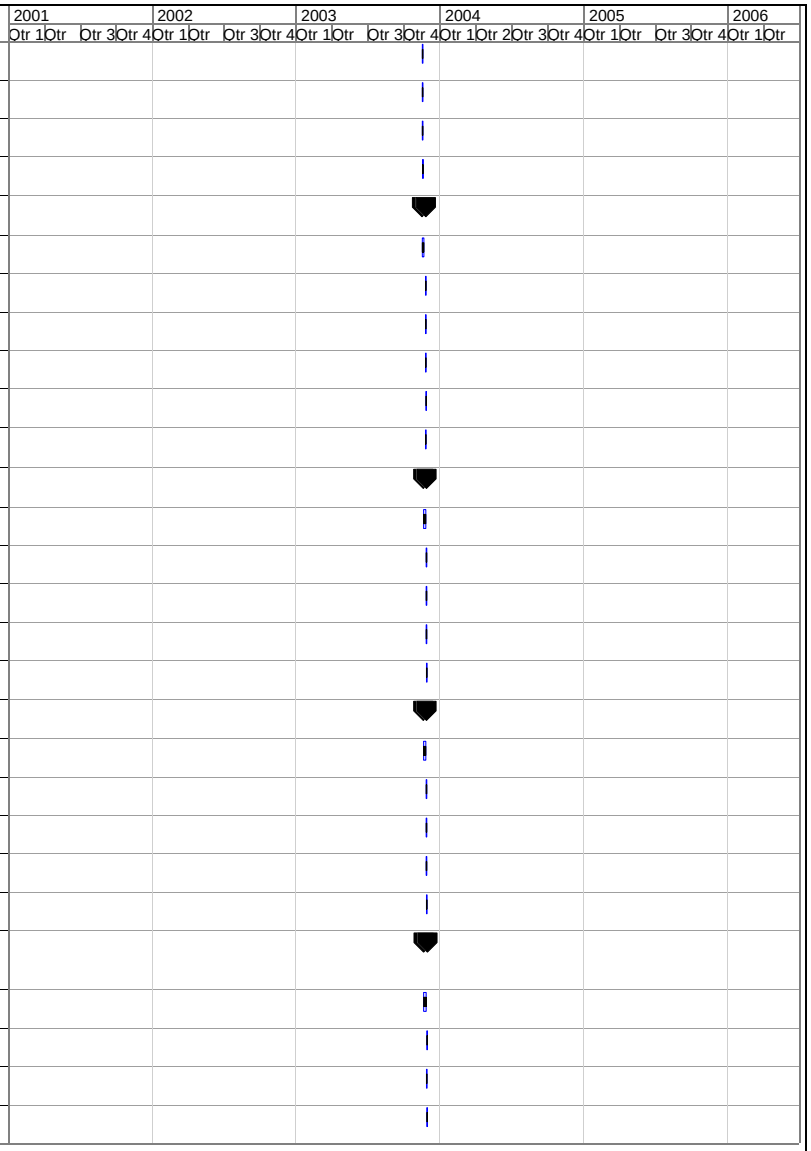


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
802	1.03.04.01.19.2	Qwest Ring/Reconnect Phone Line & Set New Phone in CSB-1	0.5 d	8/18/03	A	8/18/03	A
803	1.03.04.01.19.3	Disconnect & Reconnect CSMD Computer for CSB-1	1 d	8/18/03	A	8/18/03	A
804	1.03.04.01.19.4	Move CSMD from 4500N to CSB-1	1 d	8/18/03	A	8/18/03	A
805	1.03.04.01.19.5	Post Move Work in CSB-1	1 d	8/19/03	A	8/19/03	A
806	**1.03.04.01.20**	**Move NSTD From 3500 6025, 7917, 7918 to ROB-2E (ID 2ROBE-X094-3500,-7917, -7918) (3 Spaces)**	**8 d**	**8/18/03**	**A**	**8/27/03**	**A**
807	1.03.04.01.20.1	Pack NSTD for Move to ROB-2E	5 d	8/18/03	A	8/22/03	A
808	1.03.04.01.20.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ROB-2E	0.5 d	8/26/03	A	8/26/03	A
809	1.03.04.01.20.3	Disconnect & Reconnect Computers for ROB-2E	1 d	8/26/03	A	8/26/03	A
810	1.03.04.01.20.4	Move Boxes to ROB-2E	1 d	8/26/03	A	8/26/03	A
811	1.03.04.01.20.5	Post Move Work ROB-2E	1 d	8/27/03	A	8/27/03	A
812	**1.03.04.01.74**	**Move PD Furniture from 4500N to 6010 (ID 6010-X013-4500N) (0 Spaces)**	**1 d**	**8/26/03**		**8/26/03**	
813	**1.03.04.01.21**	**Move NSTD From Y-12 9204-3 to 5510 (ID 5510-X094-92043) (6 Spaces)**	**7 d**	**8/21/03**	**A**	**8/29/03**	**A**
814	1.03.04.01.21.1	Pack NSTD for Move to 5510	5 d	8/21/03	A	8/27/03	A
815	1.03.04.01.21.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in 5510	0.5 d	8/28/03	A	8/28/03	A
816	1.03.04.01.21.3	Disconnect & Reconnect NSTD Computers for 5510	1 d	8/28/03	A	8/28/03	A
817	1.03.04.01.21.4	Move NSTD Boxes from 9204-3 to 5510	1 d	8/28/03	A	8/28/03	A
818	1.03.04.01.21.5	Post Move Work 5510	1 d	8/29/03	A	8/29/03	A
819	**1.03.04.01.22**	**Move Publishing from 4500N to 4500S (ID 4500S-X071-4500N) (2 Spaces**	**7 d**	**8/21/03**	**A**	**8/29/03**	**A**
820	1.03.04.01.22.1	Pack Publishing for Move to 4500S	5 d	8/21/03	A	8/27/03	A
821	1.03.04.01.22.2	Qwest Ring/Reconnect Phone Lines & Set Phones in 4500S	0.5 d	8/28/03	A	8/28/03	A
822	1.03.04.01.22.3	Disconnect & Reconnect Publishing Computers for 4500S	1 d	8/28/03	A	8/28/03	A
823	1.03.04.01.22.4	Move Publishing Boxes from 4500N to 4500S	1 d	8/28/03	A	8/28/03	A
824	1.03.04.01.22.5	Post Move Work in 4500S	1 d	8/29/03	A	8/29/03	A
825	**1.03.04.01.23**	**Move PD from 6000, 6007, 6008, & 6010 to 6010 (ID 6010-X013-6000-1,-6008, -6007-1, -6010-1) (33 Spaces-Vendor)**	**6 d**	**8/22/03**	**A**	**8/31/03**	**A**
826	1.03.04.01.23.1	Pack PD for Moves to 6010	5 d	8/22/03	A	8/28/03	A
827	1.03.04.01.23.2	Qwest Ring/Reconnect Phone Lines & Set Phones in 6010	0.5 d	8/29/03	A	8/29/03	A
828	1.03.04.01.23.3	Disconnect & Reconnect PD Computers in 6010	2.5 d	8/28/03	A	8/30/03	A
829	1.03.04.01.23.4	Move Boxes to 6010	1.5 d	8/29/03	A	8/30/03	A

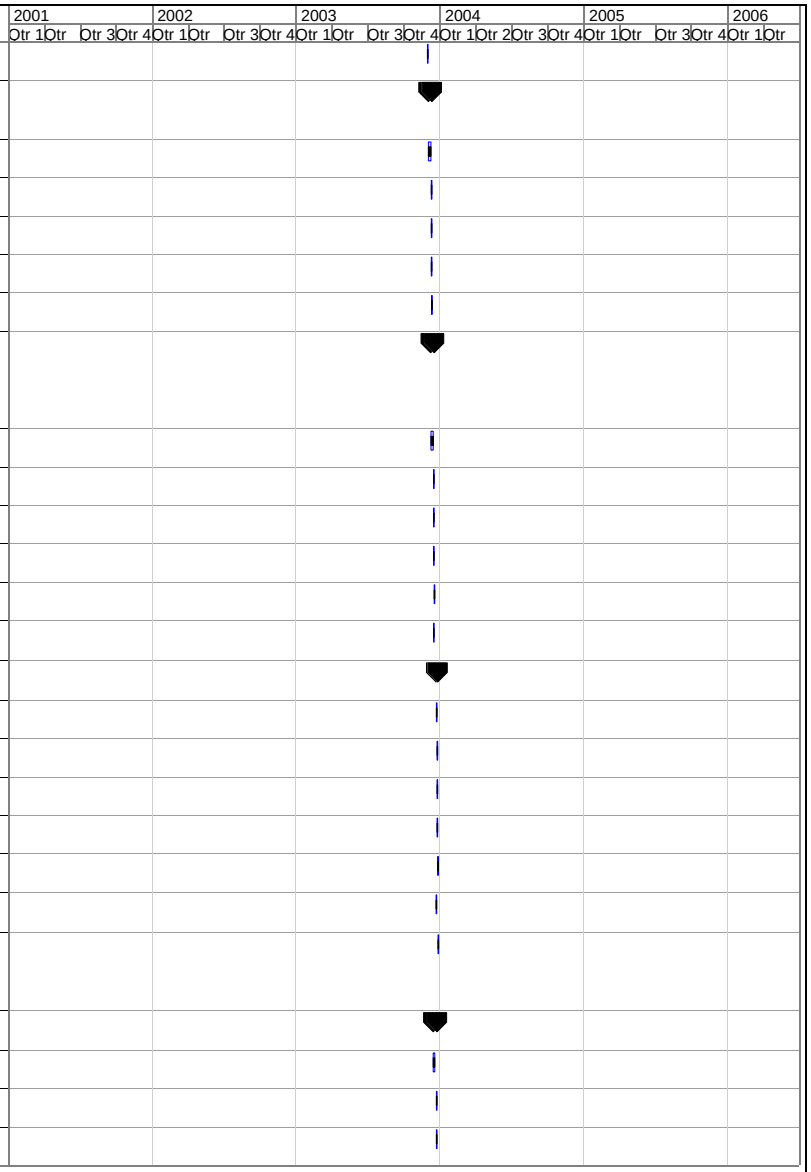


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
830	1.03.04.01.23.5	Post Move Work in 6010	1 d	8/31/03	A	8/31/03	A
831	**1.03.04.01.24**	**Move CSMD from 6011, 6010, 6012, & 6025 to 6012 (ID 6012-X012-1505, -6010, -6011, -6012, -6025) (11 Spaces)**	**7 d**	**9/3/03**	**A**	**9/11/03**	**A**
832	1.03.04.01.24.1	Pack CSMD for Move to 6012	5 d	9/3/03	A	9/9/03	A
833	1.03.04.01.24.2	Qwest Ring/Reconnect Phone Lines & Set Phones in 6012	0.5 d	9/10/03	A	9/10/03	A
834	1.03.04.01.24.3	Disconnect & Reconncet CSMD Computers for 6012	1 d	9/10/03	A	9/10/03	A
835	1.03.04.01.24.4	Move Boxes to 6012	1 d	9/10/03	A	9/10/03	A
836	1.03.04.01.24.5	Post Move Work in 6012	1 d	9/11/03	A	9/11/03	A
837	**1.03.04.01.26**	**Move CESD From 9204-1 & 1060C to ROB-1W, NSTD from 1099C to ROB-1W, & MCD from 1060C to ROB-2W (ID 1ROBW-X094-1099C, 1ROBW-X107-92041, -1060C, 2ROBW-X011-1060C) (4 Spaces)**	**7 d**	**9/9/03**	**A**	**9/17/03**	**A**
838	1.03.04.01.26.1	Pack CESD, NSTD, & MCD for Moves to ROB-1W & ROB-2W	5 d	9/9/03	A	9/15/03	A
839	1.03.04.01.26.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ROB-1W & ROB-2W	0.5 d	9/16/03	A	9/16/03	A
840	1.03.04.01.26.3	Disconnect & Reconnect CSED, NSTD, & MCD Computers for ROB-1W &ROB-2W	1 d	9/16/03	A	9/16/03	A
841	1.03.04.01.26.4	Move CSED, NSTD, & MCD Boxes to ROB-1W & ROB-2W	1 d	9/16/03	A	9/16/03	A
842	1.03.04.01.26.5	Post Move Work ROB-1W & ROB-2W	1 d	9/17/03	A	9/17/03	A
843	**1.03.04.01.75**	**Move EESD Furniture From 4500N to Storage (ID 4500N-X065-4500N) (0 Spaces)**	**1 d**	**9/16/03**	**A**	**9/16/03**	**A**
844	**1.03.04.01.27**	**Move NSTD from 9204-1 & 9204-3 to ROB-1E (ID 1ROBE-X094-92041, -92043) (2 Spaces)**	**4 d**	**9/23/03**	**A**	**9/26/03**	**A**
845	1.03.04.01.27.1	Pack NCTD for Move to ROB-1E	2 d	9/23/03	A	9/24/03	A
846	1.03.04.01.27.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ROB-1E	0.5 d	9/25/03	A	9/25/03	A
847	1.03.04.01.27.3	Disconnect & Reconnect NSTD Computers for ROB-1E	1 d	9/25/03	A	9/25/03	A
848	1.03.04.01.27.4	Move NSTD Boxes to ROB-1E	1 d	9/25/03	A	9/25/03	A
849	1.03.04.01.27.5	Post Move Work in ROB-1E	1 d	9/26/03	A	9/26/03	A
850	**1.03.04.01.28**	**Move NSTD Server from 7606A-1 to ROB-1E (0 Spaces)**	**1 d**	**9/22/03**	**A**	**9/22/03**	**A**
851	**1.03.04.01.29**	**Move 6 NSTD FireKing Safes from 7606A to ROB-1E & 1 Safe from 4500N to ETF-1(ID 1ROBE-X094-7606A-3, 1ETFX-X094-4500N) (0 Spaces)**	**1 d**	**9/27/03**	**A**	**9/27/03**	**A**
852	**1.03.04.01.30**	**Move Graphics From 4500N to 4500N (ID 4500N-X071-4500N) (17 Spaces)**	**8 d**	**9/15/03**	**A**	**9/24/03**	**A**
853	1.03.04.01.30.1	Pack Graphics for Move to 4500N & 4500S	5 d	9/15/03	A	9/19/03	A
854	1.03.04.01.30.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in 4500N & 4500S	0.5 d	9/23/03	A	9/23/03	A
855	1.03.04.01.30.3	Disconnect & Reconnect Graphics Computers for 4500N & 4500S	1 d	9/23/03	A	9/23/03	A

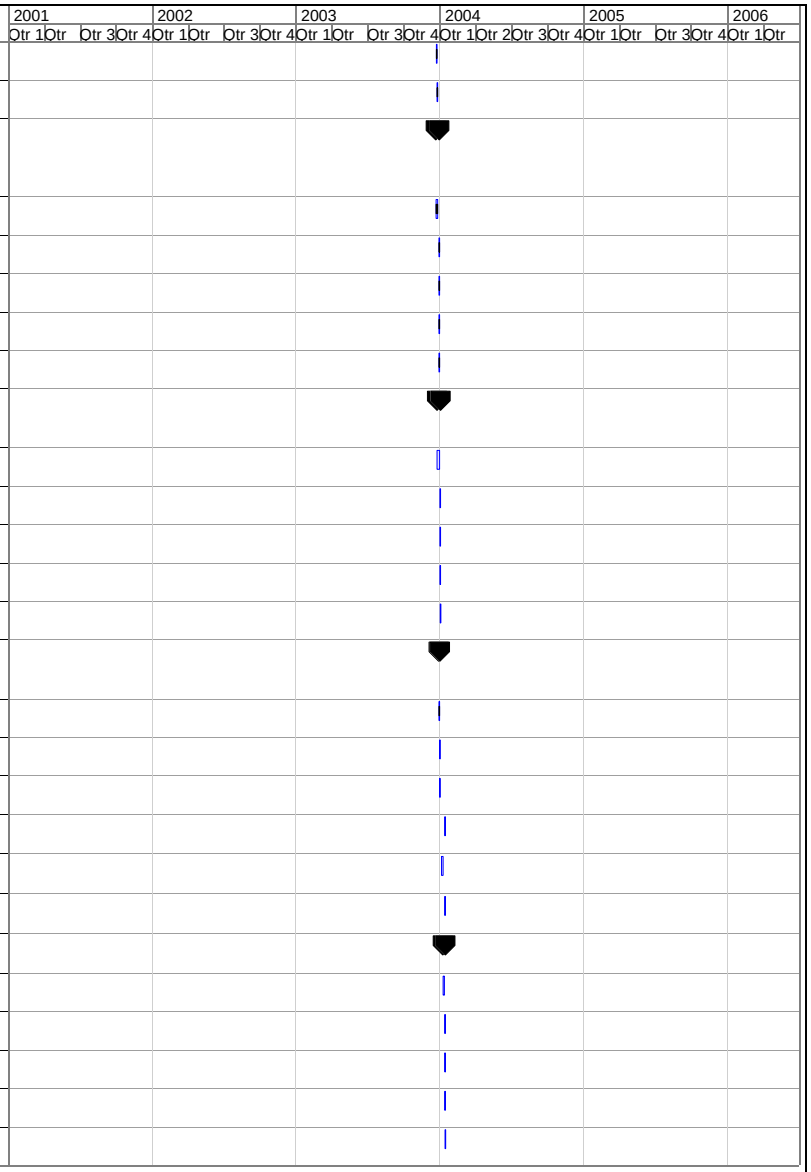


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
856	1.03.04.01.30.4	Move Graphics Boxes from 4500N to 4500N & 4500S	1 d	9/23/03	A	9/23/03	A
857	1.03.04.01.30.5	Post Move Work 4500N & 4500S	1 d	9/24/03	A	9/24/03	A
858	**1.03.04.01.31**	**Move FED Library from 9201-2 to 4500N & Move PD from 6008, 6010 & 6025 to 6025 (ID 4500N-X019-92012, 6025-X013-6008, -6010,-6025) (17 Spaces) (Vendor Move)**	**7 d**	**9/22/03**	**A**	**9/30/03**	**A**
859	1.03.04.01.31.1	Pack FED Library and PD for Moves to 4500N & 6025	5 d	9/22/03	A	9/26/03	A
860	1.03.04.01.31.2	Qwest Ring/Reconnect Phone Lines & Set Phones in 6025	0.5 d	9/29/03	A	9/29/03	A
861	1.03.04.01.31.3	Disconnect & Reconnect PD Computers for 6025	1 d	9/29/03	A	9/29/03	A
862	1.03.04.01.31.4	Move FED Library to 4500N & PD to 6025	1 d	9/29/03	A	9/29/03	A
863	1.03.04.01.31.5	Post Move Work in 6025	1 d	9/30/03	A	9/30/03	A
864	**1.03.04.01.32**	**Move ESD, EPWS, & CSD from 4500N to 4500N & 1501 (ID 4500N-X042-4500N-1, -4500N-2, -X60-4500N, -X035-4500N) (5 Spaces)**	**7 d**	**9/25/03**	**A**	**10/3/03**	
865	1.03.04.01.32.1	Pack ESD EPWS, & CSD for Move to 4500N & 1501	5 d	9/25/03	A	10/1/03	
866	1.03.04.01.32.2	Qwest Ring/Reconnect ESD, EPWS, & CSD Phone Lines & Set Phones in 4500N & 1501	0.5 d	10/2/03		10/2/03	
867	1.03.04.01.32.3	Disconnect & Reconnect ESD, EPWS, & CSD Computers in 4500N & 1501	1 d	10/2/03		10/2/03	
868	1.03.04.01.32.4	Move ESD, EPWS, & CSD from 4500N to 4500N & 1501	1 d	10/2/03		10/2/03	
869	1.03.04.01.32.5	Post Move Work in 4500N	1 d	10/3/03		10/3/03	
870	**1.03.04.01.33**	**Move NSTD Boxes From 4500N to CSB-3S & Printer from 7918 to ROB-1E (ID 3CSBS-X094-4500N-2, 1ROBE-X094-7918) (0 Spaces)**	**3 d**	**9/29/03**	**A**	**10/1/03**	
871	1.03.04.01.33.1	Pack NSTD for Move to CSB-3S	2 d	9/29/03	A	9/30/03	A
872	1.03.04.01.33.2	Pick Up NSTD Printer & Connect in ROB-1E	1 d	10/1/03		10/1/03	
873	1.03.04.01.33.3	Move NSTD Boxes from 4500N to CSB-3S	1 d	10/1/03		10/1/03	
874	**1.03.04.01.34**	**Move FED Chairs & Boxes from 9201-2 to ROB-3W (ID 3ROBW-X019-92012) (0 Spaces)**	**1 d**	**10/14/03**		**10/14/03**	
875	**1.03.04.01.35**	**Move FED Servers from 9201-2 to ROB-3W (ID 3ROBW-X019-92012-1) (0 Spaces)**	**5 d**	**10/6/03**		**10/10/03**	
876	**1.03.04.01.36**	**Temporary Relocation-ESTD from 4500N to 4500N (ID 4500N-X092-4500N) (1 Space)**	**1 d**	**10/14/03**		**10/14/03**	
877	**1.03.04.01.37**	**Move EPWS from 4500N to 5500 (ID 5500-X035-4500N) (2 Spaces)**	**4 d**	**10/10/03**		**10/15/03**	
878	1.03.04.01.37.1	Pack EPWS for Move to 5500	2 d	10/10/03		10/13/03	
879	1.03.04.01.37.2	Qwest Ring/Reconnect Phone Lines & Set Phones in 5500	0.5 d	10/14/03		10/14/03	
880	1.03.04.01.37.3	Disconnect & Reconnect EPWS Computers for 5500	1 d	10/14/03		10/14/03	
881	1.03.04.01.37.4	Move EPWS Boxes from 4500N to 5500	1 d	10/14/03		10/14/03	
882	1.03.04.01.37.5	Post Move Work in 5500	1 d	10/15/03		10/15/03	

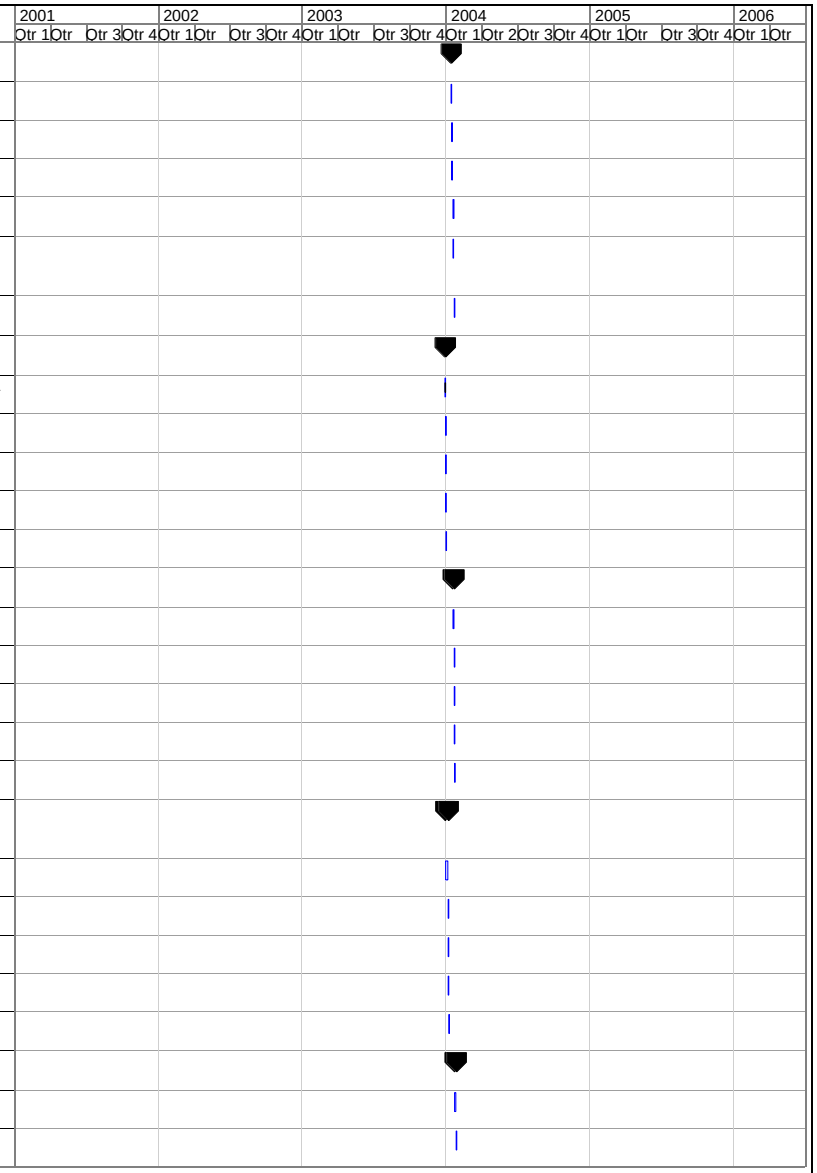


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
883	**1.03.04.01.38**	**Move ESTD from NTRC to ETF-2 (ID 2ETFX-X092-NTRC) (1 Space)**	**2 d**	**10/15/03**		**10/16/03**	
884	1.03.04.01.38.1	Pack ESTD for Move to ETF-2	1 d	10/15/03		10/15/03	
885	1.03.04.01.38.2	Qwest Ring/Reconnect Phone Line & Set New Phone in ETF-2	0.5 d	10/16/03		10/16/03	
886	1.03.04.01.38.3	Move ESTD Boxes to ETF-2	1 d	10/16/03		10/16/03	
887	**1.03.04.01.39**	**Move 35 NSTD Isotope Record Fireproof Safes from 9204-3 to ROB-1E (ID 1ROBE-X094-92043)**	**3 d**	**10/20/03**		**10/22/03**	
888	**1.03.04.01.40**	**Move Computer Servers from 1060 Commerce Park Rm 235 to CSB-2 Computer Room (ID 2CSB-X001-1060C) (0 SPACES)**	**2 d**	**10/20/03**		**10/21/03**	
889	**1.03.04.01.41**	**Move 1 NSTD Safe & Misc. Equipment from 1060C to ETF-2 (ID 2ETFX-X094-1060C-1) (0 Spaces)**	**2 d**	**10/23/03**		**10/24/03**	
890	**1.03.04.01.42**	**Move ESTD from NTRC to 3156 (ID 3156-X092-NTRC) (1 Space)**	**4 d**	**9/29/03**	**A**	**10/2/03**	
891	1.03.04.01.42.1	Pack ESTD for Move in 3156	2 d	9/29/03	A	9/30/03	A
892	1.03.04.01.42.2	Qwest Ring/Reconnect Phone Line & Set Phone in 3156	0.5 d	10/1/03		10/1/03	
893	1.03.04.01.42.3	Disconnect & Reconnect ESTD Computer in 3156	1 d	10/1/03		10/1/03	
894	1.03.04.01.42.4	Move ESTD in 3156	1 d	10/1/03		10/1/03	
895	1.03.04.01.42.5	Post Move Work in 3156	1 d	10/2/03		10/2/03	
896	**1.03.04.01.43**	**Move NSTD from 4508 to ETF-1 (ID 1ETFX-X094-4508) (2 Spaces)**	**5 d**	**10/20/03**		**10/24/03**	
897	1.03.04.01.43.1	Pack FED for Move to ETF-1	3 d	10/20/03		10/22/03	
898	1.03.04.01.43.2	Qwest Ring/Reconnect Phone Lines & Set Phones in ETF-1	0.5 d	10/23/03		10/23/03	
899	1.03.04.01.43.3	Disconnect & Reconnect FED Computers in ETF-1	1 d	10/23/03		10/23/03	
900	1.03.04.01.43.4	Move FED Boxes from 4500N to ETF-1	1 d	10/23/03		10/23/03	
901	1.03.04.01.43.5	Post Move Work in ETF-1	1 d	10/24/03		10/24/03	
902	**1.03.04.01.44**	**Move PD From 6000 & 6010 to 6025 & 6010 (ID 6025-X013-6000-2, 6010-X013-6000, -6010) (6 Spaces)**	**7 d**	**10/1/03**		**10/9/03**	
903	1.03.04.01.44.1	Pack PD for Move to 6025	5 d	10/1/03		10/7/03	
904	1.03.04.01.44.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in 6025	0.5 d	10/8/03		10/8/03	
905	1.03.04.01.44.3	Disconnect & Reconnect Computers for 6025	1 d	10/8/03		10/8/03	
906	1.03.04.01.44.4	Move Boxes to 6025	1 d	10/8/03		10/8/03	
907	1.03.04.01.44.5	Post Move Work 6025	1 d	10/9/03		10/9/03	
908	**1.03.04.01.45**	**Move NSTD from ROB-2E to ETF-2 & from 1060C to ROB-1E (ID 2ETFX-X094-2ROBE) (3 Spaces)**	**4 d**	**10/24/03**		**10/29/03**	
909	1.03.04.01.45.1	Pack NSTD for Move to ETF-2 & ROB-1E	2 d	10/24/03		10/27/03	
910	1.03.04.01.45.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ETF-2 & ROB-1E	0.5 d	10/28/03		10/28/03	



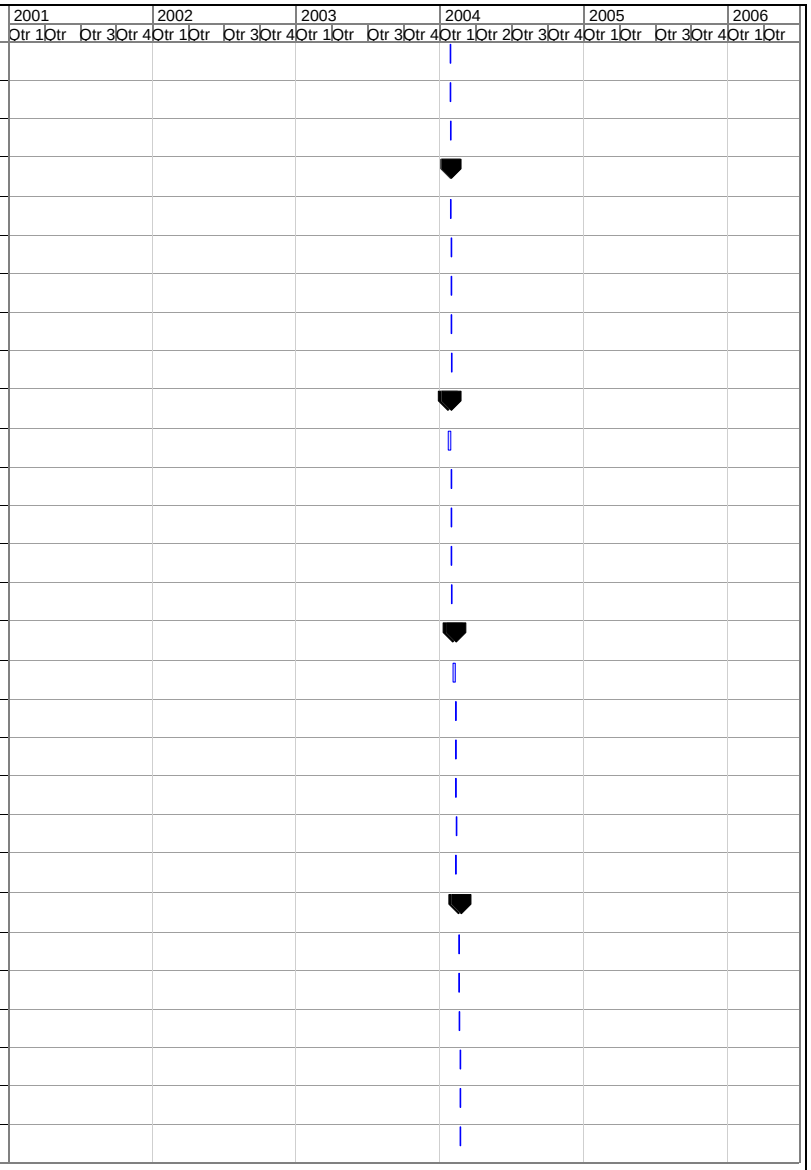
Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

10/24/03 9/30/03

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start	Finish
911	1.03.04.01.45.3	Disconnect & Reconnect NSTD Computers for ETF-2 & ROB-1E	1 d	10/28/03	10/28/03
912	1.03.04.01.45.4	Move NSTD Boxes from ROB-2E to ETF-2 & ROB-1E	1 d	10/28/03	10/28/03
913	1.03.04.01.45.5	Post Move Work in ETF-2 & ROB-1E	1 d	10/29/03	10/29/03
914	**1.03.04.01.46**	**Move ESTD from 9201-3 to ETF-2 (ID 2ETFX-X092-92013) (1 Space)**	**3 d**	**10/29/03**	**10/31/03**
915	1.03.04.01.46.1	Pack ESTD for Move to ETF-2	1 d	10/29/03	10/29/03
916	1.03.04.01.46.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ETF-2	0.5 d	10/30/03	10/30/03
917	1.03.04.01.46.3	Disconnect & Reconnect ESTD Computer for ETF-2	1 d	10/30/03	10/30/03
918	1.03.04.01.46.4	Move ESTD Boxes from 9201-3 to ETF-2	1 d	10/30/03	10/30/03
919	1.03.04.01.46.5	Post Move Work in ETF-2	1 d	10/31/03	10/31/03
920	**1.03.04.01.47**	**Move ESTD from 3156 &4500N to NTRC (ID NTRC-X092-4500N, -3156-Vendor) (16 Spaces)**	**7 d**	**10/23/03**	**10/31/03**
921	1.03.04.01.47.1	Pack ESTD for Moves to NTRC	5 d	10/23/03	10/29/03
922	1.03.04.01.47.2	Qwest Ring/Reconect Phone Lines & Set Phones in NTRC	0.5 d	10/30/03	10/30/03
923	1.03.04.01.47.3	Disconnect & Reconnect ESTD Computers for NTRC	1 d	10/30/03	10/30/03
924	1.03.04.01.47.4	Move ESTD Boxes from 3156 & 4500N to NTRC (Vendor Move)	1 d	10/30/03	10/30/03
925	1.03.04.01.47.5	Post Move Work in NTRC	1 d	10/31/03	10/31/03
926	**1.03.04.01.48**	**Move ESTD from 3147 to 3156 (ID 3156-X092-3147) (3 Spaces)**	**7 d**	**11/4/03**	**11/12/03**
927	1.03.04.01.48.1	Pack ESTD for Move to 3156	5 d	11/4/03	11/10/03
928	1.03.04.01.48.2	Qwest Ring/Reconnect Phone Line & Set Phone in 3156	0.5 d	11/11/03	11/11/03
929	1.03.04.01.48.3	Disconnect & Reconnect ESTD Computer in 3156	1 d	11/11/03	11/11/03
930	1.03.04.01.48.4	Move ESTD Boxes from 3147 to 3156	1 d	11/11/03	11/11/03
931	1.03.04.01.48.5	Post Move Work in 3156	1 d	11/12/03	11/12/03
932	**1.03.04.01.49**	**Move 11 NSTD Safes from 9725 to ROB-2E (ID 2ROBE-X-94-9725)**	**1 d**	**11/11/03**	**11/11/03**
933	**1.03.04.01.50**	**Move E&E From 4500N to 4500N (ID 4500N-X065-4500N) (11 Spaces)**	**5 d**	**11/19/03**	**11/25/03**
934	1.03.04.01.50.1	Pack E&E for Move to 4500N	1 d	11/19/03	11/19/03
935	1.03.04.01.50.2	Disconnect E&E Computers	1 d	11/19/03	11/19/03
936	1.03.04.01.50.3	Disassemble, Move, & Reassemble Furniture	2 d	11/20/03	11/21/03
937	1.03.04.01.50.4	Qwest Ring/Reconnect Phone Lines & Set New Phones in 4500N	0.5 d	11/21/03	11/21/03
938	1.03.04.01.50.5	Reconnect E&E Computers on Second Floor 4500N	1 d	11/22/03	11/22/03
939	1.03.04.01.50.6	Move Boxes to 4500N	1 d	11/22/03	11/22/03

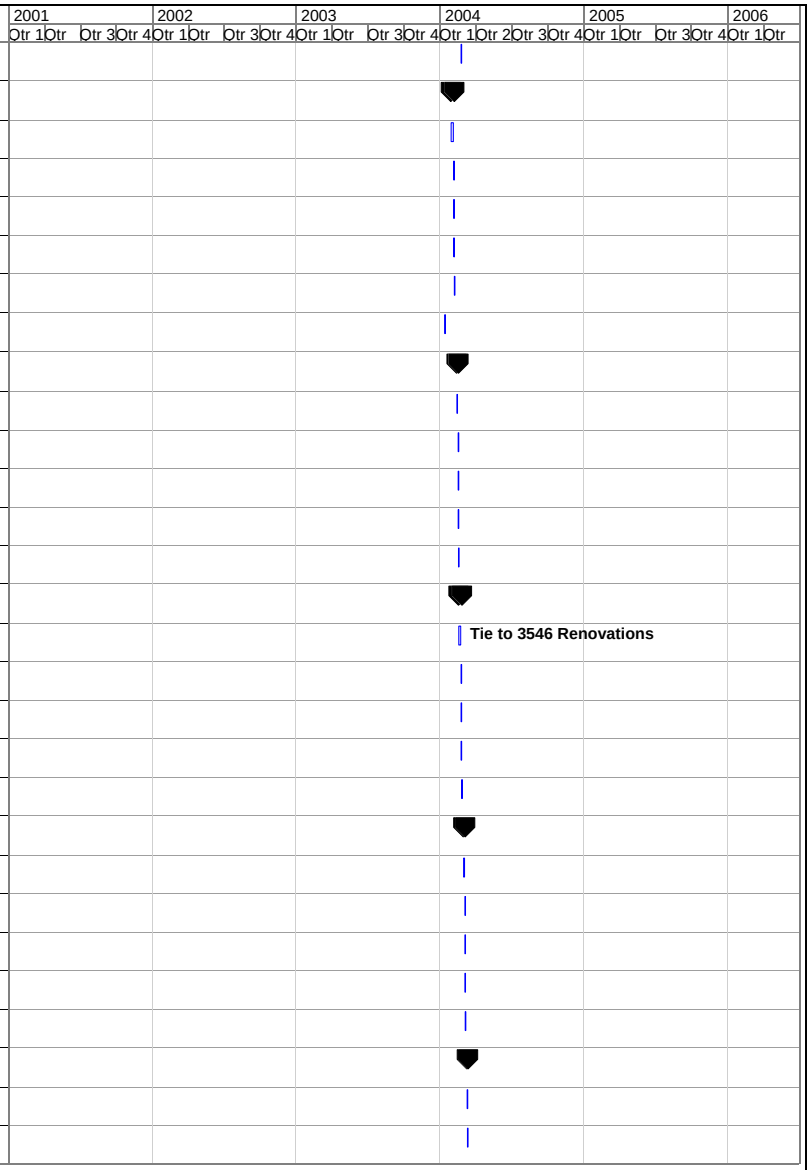


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start	Finish
940	1.03.04.01.50.7	Post Move Work 4500N	1 d	11/25/03	11/25/03
941	**1.03.04.01.51**	**Move ESTD & MCD from 9204-1 to ETF-2 (ID 2ETFX-X092-92041, -X011-92041) (13 Spaces)**	**7 d**	**10/30/03**	**11/7/03**
942	1.03.04.01.51.1	Pack ESTD & MCD for Move to ETF-2	5 d	10/30/03	11/5/03
943	1.03.04.01.51.2	Qwest Ring/Reconnect Phone Lines & Set Phones in ETF-2	0.5 d	11/6/03	11/6/03
944	1.03.04.01.51.3	Disconnect & Reconnect ESTD Computers in ETF-2	1 d	11/6/03	11/6/03
945	1.03.04.01.51.4	Move ESTD Boxes from 9204-1 to ETF-2 (Vendor Move)	1 d	11/6/03	11/6/03
946	1.03.04.01.51.5	Post Move Work in ETF-2	1 d	11/7/03	11/7/03
947	**1.03.04.01.52**	**Move 6 NSTD Fireking Safes from 7606A to 5510 (ID 5510-X094-7606A) (0 Spaces)**	**1 d**	**10/14/03**	**10/14/03**
948	**1.03.04.01.53**	**Move FED from 9201-2 to ETF-1 (ID 1ETFX-X019-92012) (1 Space)**	**3 d**	**11/14/03**	**11/18/03**
949	1.03.04.01.53.1	Pack FED for Move to ETF-1	1 d	11/14/03	11/14/03
950	1.03.04.01.53.2	Qwest Ring/Reconnect Phone Lines & Set Phone in ETF-1	0.5 d	11/17/03	11/17/03
951	1.03.04.01.53.3	Disconnect & Reconnect FED Computer in ETF-1	1 d	11/17/03	11/17/03
952	1.03.04.01.53.4	Move FED Boxes from 9202-1 to ETF-1	1 d	11/17/03	11/17/03
953	1.03.04.01.53.5	Post Move Work in ETF-1	1 d	11/18/03	11/18/03
954	**1.03.04.01.54**	**Move PCA From 1000 to 3546 (ID 3546-X112-1000, -X079-1000, -X064-1000) (15 Spaces)**	**6 d**	**11/19/03**	**11/26/03**
955	1.03.04.01.54.1	Pack PCA for Move to 3546 (18 Spaces)	4 d	11/19/03	11/24/03
956	1.03.04.01.54.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in 3546	0.5 d	11/25/03	11/25/03
957	1.03.04.01.54.3	Disconnect & Reconnect Computers for 3546	1 d	11/25/03	11/25/03
958	1.03.04.01.54.4	Move Boxes to 3546 (Vendor Move)	1 d	11/25/03	11/25/03
959	1.03.04.01.54.5	Post Move Work 3546	1 d	11/26/03	11/26/03
960	**1.03.04.01.55**	**Move Contracts from 4500N to 1000 (ID 1000-X064-4500N) (14 Spaces)**	**5 d**	**12/1/03**	**12/5/03**
961	1.03.04.01.55.1	Pack Contracts & MCD for Move to 1000	3 d	12/1/03	12/3/03
962	1.03.04.01.55.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in 1000	0.5 d	12/4/03	12/4/03
963	1.03.04.01.55.3	Disconnect & Reconnect Computers for 1000	1 d	12/4/03	12/4/03
964	1.03.04.01.55.4	Move Boxes to 1000	1 d	12/4/03	12/4/03
965	1.03.04.01.55.5	Post Move Work in 1000	1 d	12/5/03	12/5/03
966	**1.03.04.01.56**	**Move ESTD from 4500S to ETF-2 (ID 2ETFX-X092-4500S-2) (1 Space)**	**3 d**	**12/10/03**	**12/12/03**
967	1.03.04.01.56.1	Pack ESTD for Move to ETF-2 (1 Space)	1 d	12/10/03	12/10/03
968	1.03.04.01.56.2	Qwest Ring/Reconnect Phone Line & Set New Phone in ETF-2	0.5 d	12/11/03	12/11/03

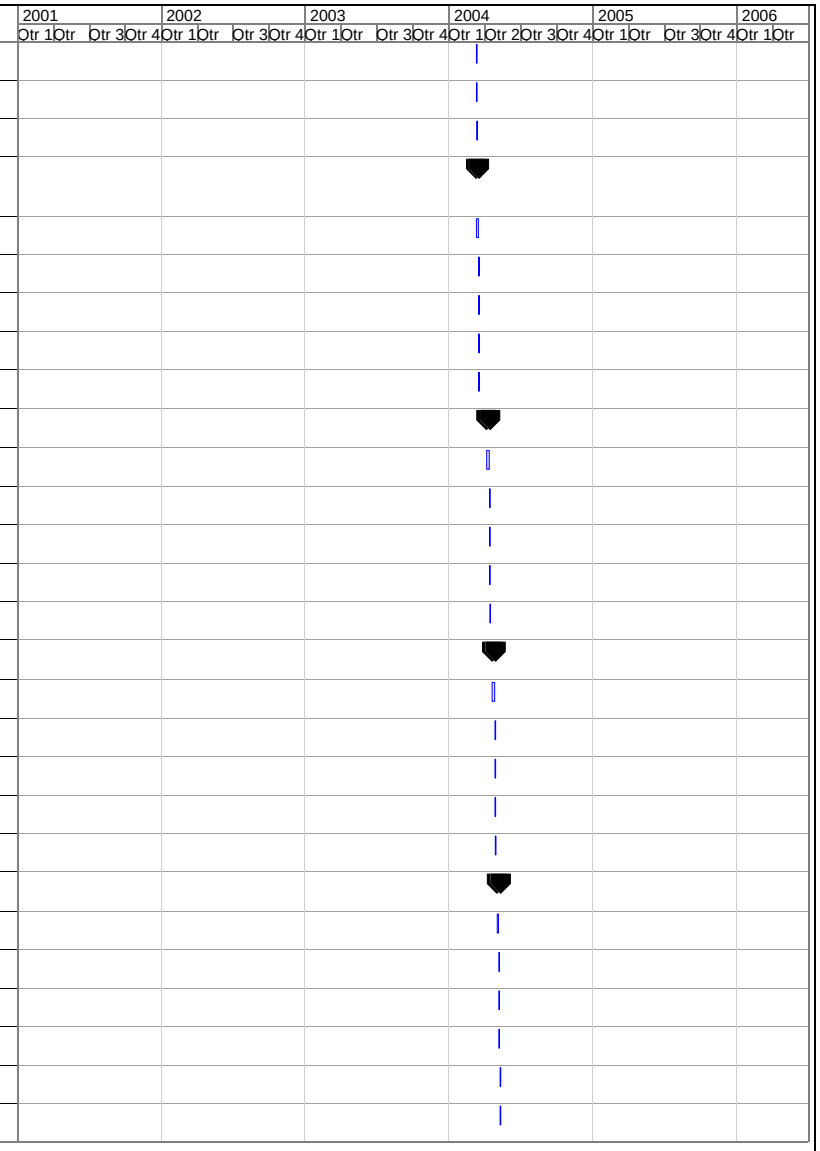


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start	Finish
969	1.03.04.01.56.3	Disconnect & Reconnect ESTD Computer for ETF-2	1 d	12/11/03	12/11/03
970	1.03.04.01.56.4	Move ESTD Boxes to ETF-2	1 d	12/11/03	12/11/03
971	1.03.04.01.56.5	Post Move Work in ETF-2	1 d	12/12/03	12/12/03
972	**1.03.04.01.57**	**Move ESTD from 4500N to 3156 & from 4508 to ETF-2 (ID 3156-X092-4500N, 2ETFX-X092-4508-Vendor Move) (12 Spaces)**	**5 d**	**12/11/03**	**12/17/03**
973	1.03.04.01.57.1	Pack ESTD for Move to 3156 & ETF-2	3 d	12/11/03	12/15/03
974	1.03.04.01.57.2	Qwest Ring/Reconnect Phone Lines & Set Phones in 3156 & ETF-2	0.5 d	12/16/03	12/16/03
975	1.03.04.01.57.3	Disconnect & Reconnect ESTD Computers in 3156 & ETF-2	1 d	12/16/03	12/16/03
976	1.03.04.01.57.4	Move ESTD Boxes from 4500N to 3156 & ETF-2 (9 Internal/3Vendor Move)	1 d	12/16/03	12/16/03
977	1.03.04.01.57.5	Post Move Work in 3156 & ETF-2	1 d	12/17/03	12/17/03
978	**1.03.04.01.58**	**Move M&CD from 9204-1 to ETF-2 (ID 2ETFX-X011-92041) (9 Spaces)**	**7 d**	**1/6/04**	**1/14/04**
979	1.03.04.01.58.1	Pack M&CD for Move to ETF-2	5 d	1/6/04	1/12/04
980	1.03.04.01.58.2	Qwest Ring/Reconnect Phone Lines & Set Phones in ETF-2	0.5 d	1/13/04	1/13/04
981	1.03.04.01.58.3	Disconnect & Reconnect M&CDComputers in ETF-2	1 d	1/13/04	1/13/04
982	1.03.04.01.58.4	Move M&CD Boxes from 9204-1 to ETF-2	1 d	1/13/04	1/13/04
983	1.03.04.01.58.5	Post Move Work in ETF-2	1 d	1/14/04	1/14/04
984	**1.03.04.01.59**	**Move M&CD from 9204-1 to ETF-1 (ID 1ETFX-X011-92041) (10 Spaces)**	**7 d**	**1/20/04**	**1/28/04**
985	1.03.04.01.59.1	Pack M&CD for Move to ETF-1	5 d	1/20/04	1/26/04
986	1.03.04.01.59.2	Qwest Ring/Reonnect Phone Lines & Set Phones in ETF-1	0.5 d	1/27/04	1/27/04
987	1.03.04.01.59.3	Disconnect & Reconnect M&CD Computers in ETF-1	1 d	1/27/04	1/27/04
988	1.03.04.01.59.4	Move M&CD Boxes from 9204-1 to ETF-1	1 d	1/27/04	1/27/04
989	1.03.04.01.59.5	Post Move Work in ETF-1	1 d	1/28/04	1/28/04
990	**1.03.04.01.60**	**Move TTED From 111UV to 4500N (ID 4500N-X031-111UV) (19 SPACES) (Vendor Move)**	**7 d**	**2/2/04**	**2/10/04**
991	1.03.04.01.60.1	Pack TTED for Move to 4500N	4 d	2/2/04	2/5/04
992	1.03.04.01.60.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in 4500N	0.5 d	2/6/04	2/6/04
993	1.03.04.01.60.3	Disconnect TTED Computers in 111UV	1 d	2/6/04	2/6/04
994	1.03.04.01.60.4	Disassemble, Move, & Reassemble TTED Furniture (Furniture Vendor)	2 d	2/6/04	2/7/04
995	1.03.04.01.60.5	Reconnect TTED Computers in 4500N	1 d	2/9/04	2/9/04
996	1.03.04.01.60.6	Move TTED Boxes from 111VU to 4500N (Vendor Move)	1 d	2/9/04	2/9/04

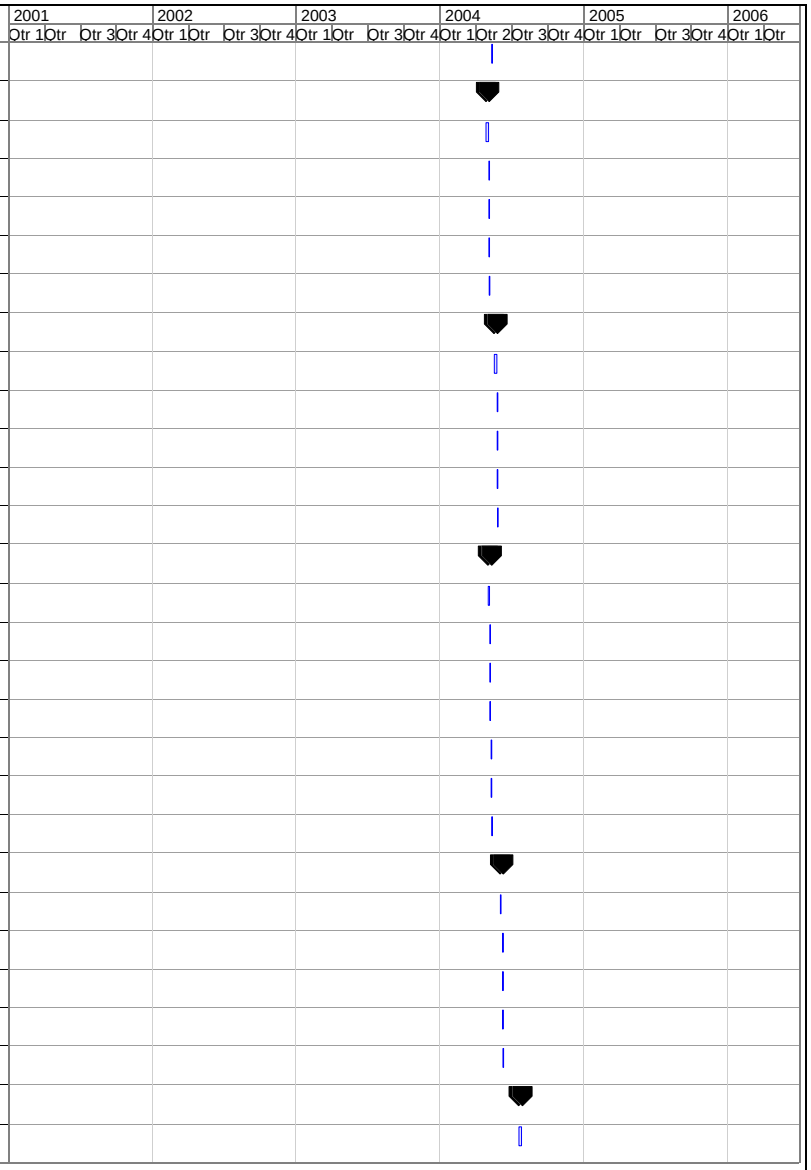


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start	Finish
997	1.03.04.01.60.7	Post Move Work 4500N	1 d	2/10/04	2/10/04
998	**1.03.04.01.61**	**Move NSTD from 9204-3 to 5500 (ID 5500-X094-92043) (4 Spaces)**	**7 d**	**1/27/04**	**2/4/04**
999	1.03.04.01.61.1	Pack NSTD for Move to 5500	5 d	1/27/04	2/2/04
1000	1.03.04.01.61.2	Qwest Ring/Reconnect NSTD Phone Lines & Set Phones in 5500	0.5 d	2/3/04	2/3/04
1001	1.03.04.01.61.3	Disconnect & Reconnect NSTD Computers in 5500	1 d	2/3/04	2/3/04
1002	1.03.04.01.61.4	Move NSTD from 9204-3 to 5500	1 d	2/3/04	2/3/04
1003	1.03.04.01.61.5	Post Move Work in 5500	1 d	2/4/04	2/4/04
1004	**1.03.04.01.62**	**Move Quality from 4500N to ETF-2 (ID 2ETFX-X024-4500N) (1 Space)**	**7 d**	**2/17/04**	**2/25/04**
1005	1.03.04.01.62.1	Pack Quality for Move to ETF-2	5 d	2/17/04	2/23/04
1006	1.03.04.01.62.2	Qwest Ring/Reconnect Quality Phone Line & Set Phone in ETF-2	0.5 d	2/24/04	2/24/04
1007	1.03.04.01.62.3	Disconnect & Reconnect Quality Computer in ETF-2	1 d	2/24/04	2/24/04
1008	1.03.04.01.62.4	Move Quality from 4500N to ETF-2	1 d	2/24/04	2/24/04
1009	1.03.04.01.62.5	Post Move Work in ETF-2	1 d	2/25/04	2/25/04
1010	**1.03.04.01.63**	**Move Legal From 111UV to 4500N (ID 4500N-X085-111UV) (13 SPACES) (Vendor Move)**	**7 d**	**2/2/04**	**2/10/04**
1011	1.03.04.01.63.1	Pack Legal for Move to 4500N	4 d	2/2/04	2/5/04
1012	1.03.04.01.63.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in 4500N	0.5 d	2/6/04	2/6/04
1013	1.03.04.01.63.3	Disconnect Legal Computers in 111UV	1 d	2/6/04	2/6/04
1014	1.03.04.01.63.4	Disassemble, Move, & Reassemble Furniture & Files (Furniture Vendor)	2 d	2/6/04	2/7/04
1015	1.03.04.01.63.5	Reconnect Legal Computers in 4500N	1 d	2/9/04	2/9/04
1016	1.03.04.01.63.6	Move Legal Boxes from 111VU to 4500N (Vendor Move)	1 d	2/9/04	2/9/04
1017	1.03.04.01.63.7	Post Move Work 4500N	1 d	2/10/04	2/10/04
1018	**1.03.04.01.64**	**Move ESTD from 3500 to ETF-2 (ID 2ETFX-X092-3500-2) (5 Spaces)**	**6 d**	**3/3/04**	**3/10/04**
1019	1.03.04.01.64.1	Pack ESTD for Move to ETF-2	3 d	3/3/04	3/5/04
1020	1.03.04.01.64.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in ETF-2	0.5 d	3/9/04	3/9/04
1021	1.03.04.01.64.3	Disconnect & Reconnect ESTD Computers for ETF-2	1 d	3/9/04	3/9/04
1022	1.03.04.01.64.4	Move ESTD from 3500 to ETF-2	1 d	3/9/04	3/9/04
1023	1.03.04.01.64.5	Post Move Work in ETF-2	1 d	3/10/04	3/10/04
1024	**1.03.04.01.65**	**Move ESTD from 3606 to 3500 (ID 3500-X092-3606) (17 Spaces)**	**7 d**	**4/20/04**	**4/28/04**
1025	1.03.04.01.65.1	Pack ESTD for Move to 3500	5 d	4/20/04	4/26/04

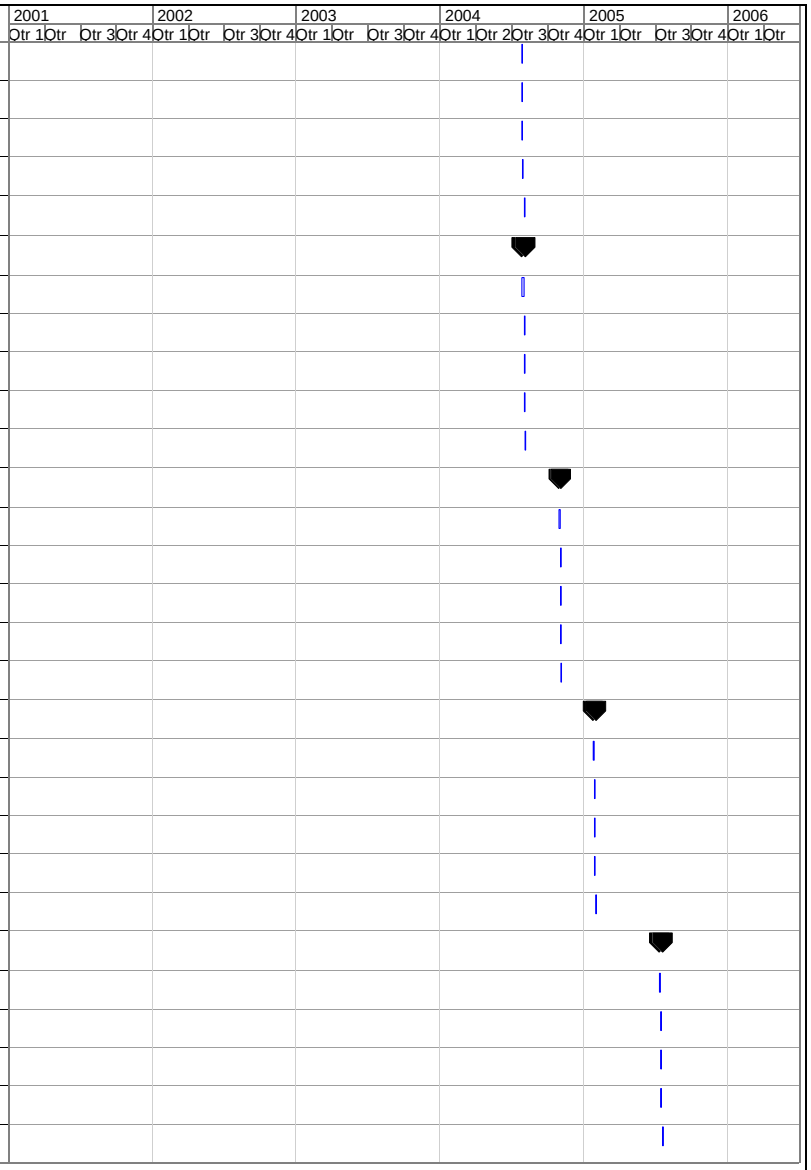


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start	Finish
1026	1.03.04.01.65.2	Qwest Ring/Reconnect ESTD Phone Lines & Set Phones in 3500	0.5 d	4/27/04	4/27/04
1027	1.03.04.01.65.3	Disconnect & Reconnect ESTD Computers in 3500	1 d	4/27/04	4/27/04
1028	1.03.04.01.65.4	Move ESTD from 3606 to 3500	1 d	4/27/04	4/27/04
1029	1.03.04.01.65.5	Post Move Work in 3500	1 d	4/28/04	4/28/04
1030	**1.03.04.01.66**	**Move Fusion Energy Library from 4500N to 4500N (ID 4500N-X019-4500N) (0 Spaces)**	**1 d**	**5/3/04**	**5/3/04**
1031	**1.03.04.01.67**	**Move CSMD from CSB-3N to JICS (ID JICS-X012-3CSBN) (6 Spaces)**	**7 d**	**4/27/04**	**5/5/04**
1032	1.03.04.01.67.1	Pack CSMD for Move to JICS	5 d	4/27/04	5/3/04
1033	1.03.04.01.67.2	Qwest Ring/Reconnect CSMD Phone Lines & Set Phones in JICS	0.5 d	5/4/04	5/4/04
1034	1.03.04.01.67.3	Disconnect & Reconnect CSMD Computers in JICS	1 d	5/4/04	5/4/04
1035	1.03.04.01.67.4	Move CSMD from CSB-3N to JICS	1 d	5/4/04	5/4/04
1036	1.03.04.01.67.5	Post Move Work in JICS	1 d	5/5/04	5/5/04
1037	**1.03.04.01.69**	**Move F&O from 7606A to 7601 (ID 7601-X089-7606A) (9 Spaces)**	**4 d**	**7/30/04**	**8/4/04**
1038	1.03.04.01.69.1	Pack F&O for Move to 7601	2 d	7/30/04	8/2/04
1039	1.03.04.01.69.2	Qwest Ring/Reconnect Phone Lines & Set New Phones in 7601	0.5 d	8/3/04	8/3/04
1040	1.03.04.01.69.3	Disconnect & Reconnect F&O Computers for 7601	1 d	8/3/04	8/3/04
1041	1.03.04.01.69.4	Move F&O Boxes from 7606A to 7601	1 d	8/3/04	8/3/04
1042	1.03.04.01.69.5	Post Move Work in 7601	1 d	8/4/04	8/4/04
1043	**1.03.04.01.68**	**Move FED from 9201-2 to 7606A (ID 7606A-X019-92012) (15 Spaces)**	**6 d**	**10/25/04**	**11/1/04**
1044	1.03.04.01.68.1	Pack FED for Move to 7606A	4 d	10/25/04	10/28/04
1045	1.03.04.01.68.2	Qwest Ring/Reconnect FED Phone Lines & Set Phones in 7606A	0.5 d	10/29/04	10/29/04
1046	1.03.04.01.68.3	Disconnect & Reconnect FED Computers in 7606A	1 d	10/29/04	10/29/04
1047	1.03.04.01.68.4	Move FED from 9201-2 to 7606A	1 d	10/29/04	10/29/04
1048	1.03.04.01.68.5	Post Move Work in 7606A	1 d	11/1/04	11/1/04
1049	**1.03.04.01.70**	**Move M&CD from 1037 to ETF-1 (ID 1ETFX-X011-1037) (6 Spaces)**	**7 d**	**4/11/05**	**4/19/05**
1050	1.03.04.01.70.1	Pack M&CD for Move to ETF-1	4 d	4/11/05	4/14/05
1051	1.03.04.01.70.2	Qwest Ring/Reconnect M&CD Phone Lines & Set Phones in ETF-1	0.5 d	4/15/05	4/15/05
1052	1.03.04.01.70.3	Disconnect & Reconnect M&CD Computers in ETF-1	1 d	4/15/05	4/15/05
1053	1.03.04.01.70.4	Move M&CD from 1037 to ETF-1	1 d	4/15/05	4/15/05
1054	1.03.04.01.70.5	Post Move Work in ETF-1	1 d	4/19/05	4/19/05

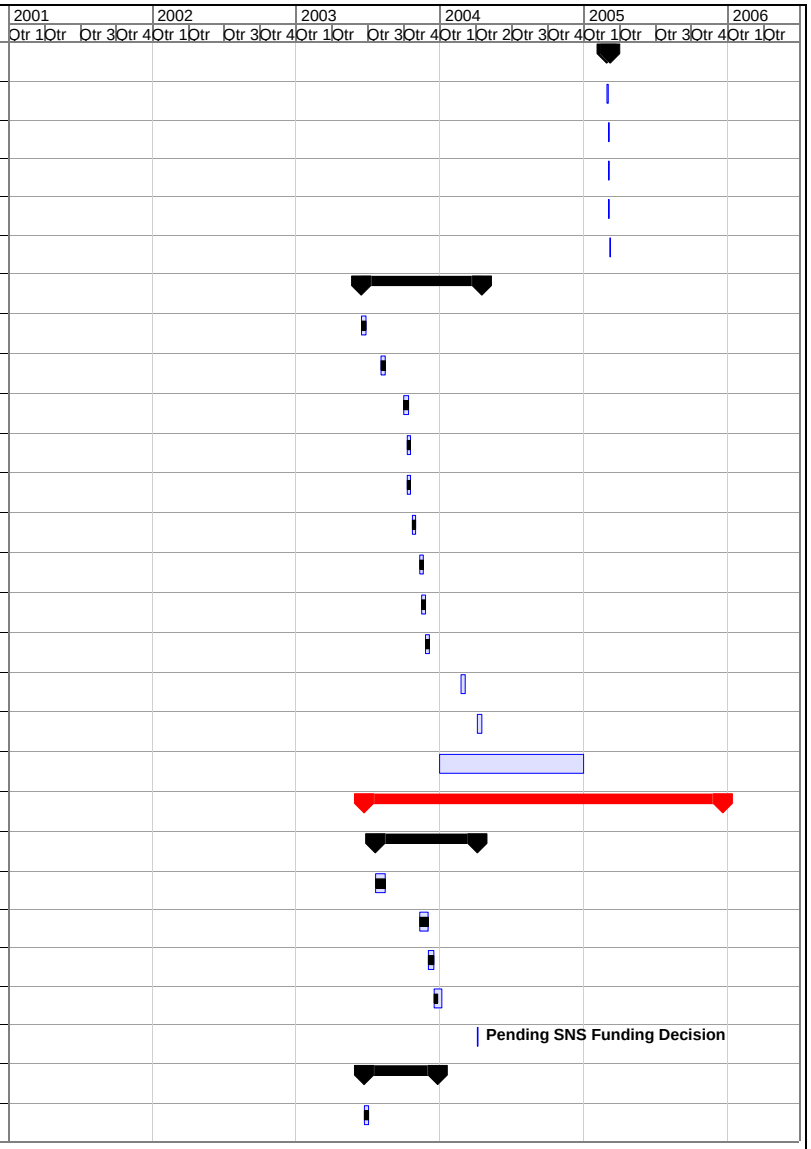


Facilities Revitalization Project Integrated Schedule

Task | Progress | Milestone | Summary | Deadline

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1055	**1.03.04.01.71**	**Move ESTD from 3500 to 3156 (ID 3156-X092-3500) (5 Spaces)**	**7 d**	**11/29/04**		**12/7/04**	
1056	1.03.04.01.71.1	Pack ESTD for Move to 3156	4 d	11/29/04		12/2/04	
1057	1.03.04.01.71.2	Qwest Ring/Reconnect ESTD Phone Lines & Set Phones in 3156	0.5 d	12/3/04		12/3/04	
1058	1.03.04.01.71.3	Disconnect & Reconnect ESTD Computers in 3156	1 d	12/3/04		12/3/04	
1059	1.03.04.01.71.4	Move ESTD from 3500 to 3156	1 d	12/3/04		12/3/04	
1060	1.03.04.01.71.5	Post Move Work in 3156	1 d	12/7/04		12/7/04	
1061	**1.03.04.02**	**Move Furniture to Salvage**	**210 d**	**3/17/03**	**A**	**1/16/04**	
1062	**1.03.04.02.01**	**Move Furniture from 5500 to Salvage (ID SALVAGE-X094-5500) (0 Spaces)**	**10 d**	**3/17/03**	**A**	**3/28/03**	**A**
1063	**1.03.04.02.02**	**Move Furniture from 5510 to Salvage (ID SALVAGE-X094-5510) (0 Spaces)**	**10 d**	**5/5/03**	**A**	**5/16/03**	**A**
1064	**1.03.04.02.03**	**Move Furniture from 1062 to Salvage (ID SALVAGE-X054-1062) (0 Spaces)**	**7 d**	**7/2/03**	**A**	**7/14/03**	**A**
1065	**1.03.04.02.04**	**Move Furniture from 3546 to Salvage (ID SALVAGE-X094-3546) (0 Spaces)**	**7 d**	**7/11/03**	**A**	**7/19/03**	**A**
1066	**1.03.04.02.05**	**Move Furniture from 7601 to Salvage (ID SALVAGE-X094-7601) (0 Spaces)**	**7 d**	**7/11/03**	**A**	**7/19/03**	**A**
1067	**1.03.04.02.06**	**Move Furniture from 1059 to Salvage (ID SALVAGE-X042-1059) (0 Spaces)**	**7 d**	**7/24/03**	**A**	**8/1/03**	**A**
1068	**1.03.04.02.07**	**Move Furniture from 6025 to Salvage (ID SALVAGE-X094-6025) (0 Spaces)**	**8 d**	**8/12/03**	**A**	**8/21/03**	**A**
1069	**1.03.04.02.08**	**Move Furniture from 6011 to Salvage (ID SALVAGE-X094-6011) (0 Spaces)**	**7 d**	**8/16/03**	**A**	**8/26/03**	**A**
1070	**1.03.04.02.09**	**Move Furniture from 4500N to Salvage (ID SALVAGE-X094-4500N) (0 Spaces)**	**9 d**	**8/26/03**	**A**	**9/5/03**	**A**
1071	**1.03.04.02.10**	**Move Furniture from 4500N to Salvage (ID SALVAGE-X065-4500N) (0 Spaces)**	**8 d**	**11/24/03**		**12/5/03**	
1072	**1.03.04.02.11**	**Move Furniture from 4500N to Salvage (ID SALVAGE-X071-4500N) (0 Spaces)**	**10 d**	**1/5/04**		**1/16/04**	
1073	**1.03.04.03**	**Move Telephones - FY04**	**251 d**	**10/1/03**		**9/30/04**	
1074	**1.03.05**	**Laboratory Moves**	**624 d**	**3/24/03**	**A**	**9/19/05**	
1075	**1.03.05.01**	**Move NSTD Thermal Hydraulics Lab From Y-12 Bldg. 9204-1 to ETF E-D111**	**177 d**	**4/21/03**	**A**	**1/5/04**	
1076	1.03.05.01.01	Disassemble & Package Thermal Hydraulics Lab for Move to ETF E-D111-Phase I	20 d	4/21/03	A	5/16/03	A
1077	1.03.05.01.02	Disassemble & Package Thermal Hydraulics Lab for Move to ETF E-D111-Phase II	15 d	8/12/03	A	9/2/03	A
1078	1.03.05.01.03	Move Thermal Hydraulics Lab to ETF E-D111	10 d	9/3/03	A	9/16/03	A
1079	1.03.05.01.04	Assemble Thermal Hydraulics Lab in ETF E-D111	15 d	9/17/03	A	10/7/03	
1080	1.03.05.01.05	Move Mercury Loop From Y-12 Bldg. 9204-1	1 d	1/5/04		1/5/04	
1081	**1.03.05.02**	**Move NSTD Flow Test Loop From Y-12 Bldg. 9201-3 to ETF E-D111**	**130 d**	**3/24/03**	**A**	**9/26/03**	**A**
1082	1.03.05.02.01	Disassemble & Package Flow Test Loop for Move to ETF E-D111	10 d	3/24/03	A	4/4/03	A

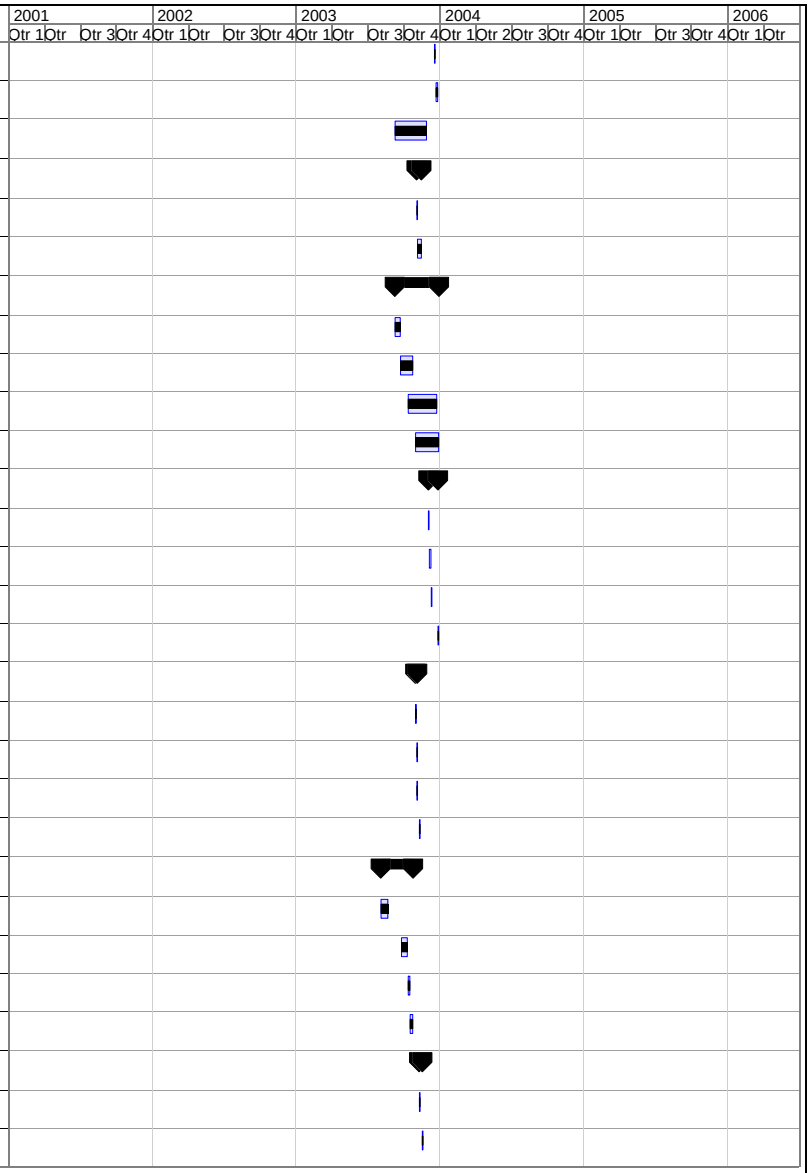


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1083	1.03.05.02.02	Move Flow Test Loop to ETF E-D111	2 d	9/18/03	A	9/19/03	A
1084	1.03.05.02.03	Electrical Hookup of Flow Test Loop in ETF E-D111	5 d	9/22/03	A	9/26/03	A
1085	**1.03.05.03**	**Move Main Computers & Labs (See WBS 1.04.05 for details)**	**57 d**	**6/10/03**	**A**	**8/29/03**	**A**
1086	**1.03.05.04**	**Move LCFG Labs From Y-12 Bldg. 9210 to 1059, 1060, & 1061**	**10 d**	**8/4/03**	**A**	**8/15/03**	**A**
1087	1.03.05.04.01	Prepare/Fumigate Equipment for LC&FG Lab Move	2 d	8/4/03	A	8/5/03	A
1088	1.03.05.04.02	Move LC&FG Lab	8 d	8/6/03	A	8/15/03	A
1089	**1.03.05.05**	**Move NSTD Isotope Production Lab From Y-12 Bldg. 9204-3 to 5510**	**77 d**	**6/10/03**	**A**	**9/29/03**	**A**
1090	1.03.05.05.01	Isotope Lab Move Preparation	10 d	6/10/03	A	6/23/03	A
1091	1.03.05.05.02	Load Isotope Lab for Move to 5510	22 d	6/24/03	A	7/25/03	A
1092	1.03.05.05.03	Transfer and Unload Isotope Lab at 5510	52 d	7/14/03	A	9/24/03	A
1093	1.03.05.05.04	Assemble Isotope Lab	41 d	8/1/03	A	9/29/03	A
1094	**1.03.05.06**	**Move NSTD Capsule Assembly Lab to ETF E-E101**	**18 d**	**9/3/03**	**A**	**9/27/03**	**A**
1095	1.03.05.06.01	Prepare Capsule Assembly Lab for Move to ETF E-E101	2 d	9/3/03	A	9/4/03	A
1096	1.03.05.06.02	Move Capsule Assemble Lab to ETF E-E101	3 d	9/5/03	A	9/9/03	A
1097	1.03.05.06.03	Assemble Capsule Assembly Lab in ETF E-E101	2 d	9/10/03	A	9/11/03	A
1098	1.03.05.06.04	Move Remaining Capsule Assembly Lab Items to ETF E-E101	1 d	9/27/03	A	9/27/03	A
1099	**1.03.05.07**	**Move NSTD Nuclear Simulation Lab From 6025 to ROB R-M301**	**3 d**	**8/1/03**	**A**	**8/5/03**	**A**
1100	1.03.05.07.01	Prepare Nuclear Simulation Lab for Move to ROB R-M301	1 d	8/1/03	A	8/1/03	A
1101	1.03.05.07.02	Move Nuclear Simulation Lab to ROB R-M301	1 d	8/4/03	A	8/4/03	A
1102	1.03.05.07.03	Assemble Nuclear Simulation Lab in ROB R-M301	1 d	8/5/03	A	8/5/03	A
1103	**1.03.05.08**	**Move NSTD Scale Training Lab From 6025 to ROB R-O304**	**1 d**	**8/11/03**	**A**	**8/11/03**	**A**
1104	**1.03.05.09**	**Move Mechanical Properties Lab Fom Y-12 Bldg. 9204-1 to 4500 & 4508**	**57 d**	**5/5/03**	**A**	**7/25/03**	**A**
1105	1.03.05.09.01	Phase I - Disassemble/Package/Move 30% of Mechanical Properties Lab	14 d	5/5/03	A	5/22/03	A
1106	1.03.05.09.02	Phase II-Disassemble Remainder of Mechanical Properties Lab	9 d	6/27/03	A	7/11/03	A
1107	1.03.05.09.03	Phase II - Move Remainder of Mechanical Properties Lab	4 d	7/14/03	A	7/17/03	A
1108	1.03.05.09.04	Phase II - Assemble & Connect Mechanical Properties Lab	6 d	7/18/03	A	7/25/03	A
1109	**1.03.05.10**	**Move Optical Lab From 6010 to CSB C-D108**	**6 d**	**8/11/03**	**A**	**8/18/03**	**A**
1110	1.03.05.10.01	Disconnect & Pack Optical Lab For Move From 6010 to CSB C-D108	1 d	8/11/03	A	8/11/03	A
1111	1.03.05.10.02	Move Optical Lab From 6010 to CSB C-D108	1 d	8/18/03	A	8/18/03	A

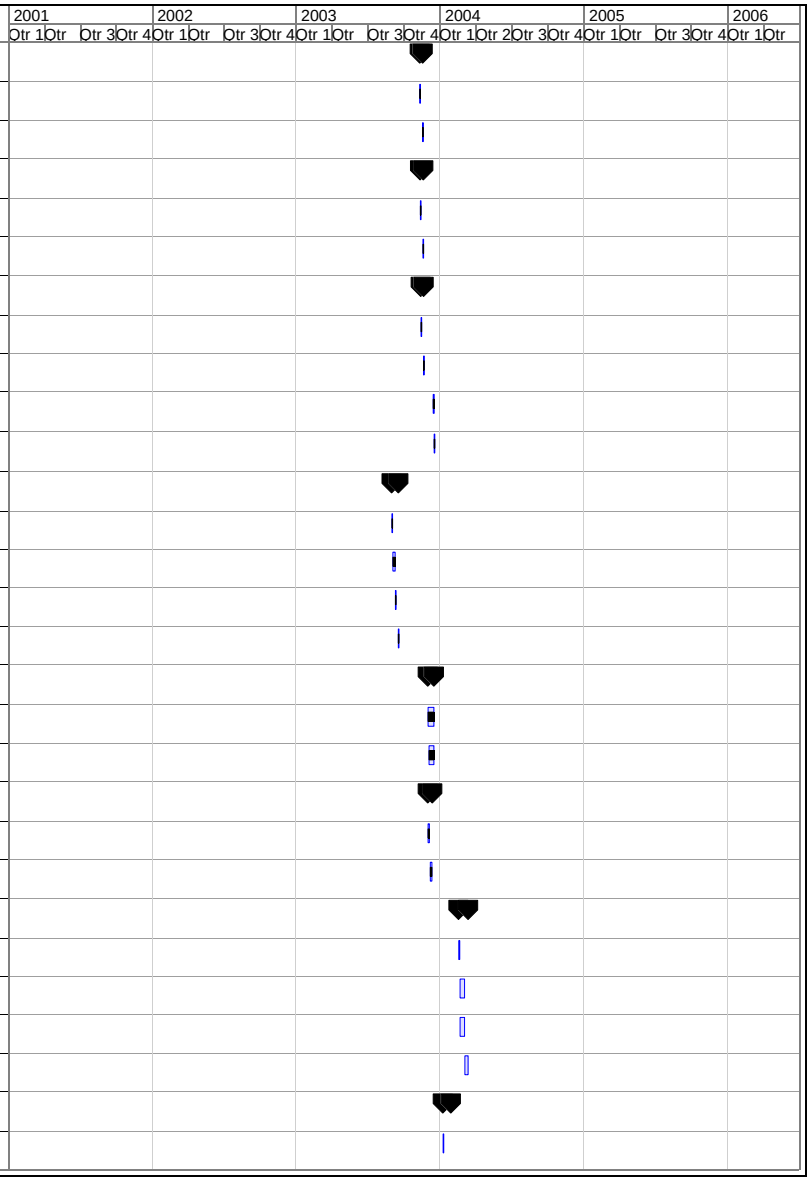


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1112	**1.03.05.11**	**Move Optical Lab From 6010 to CSB C-D224**	**6 d**	**8/12/03**	**A**	**8/19/03**	**A**
1113	1.03.05.11.01	Disconnect & Pack Optical Lab For Move From 6010 to CSB C-D224	1 d	8/12/03	A	8/12/03	A
1114	1.03.05.11.02	Move Optical Lab From 6010 to CSB C-D224	1 d	8/19/03	A	8/19/03	A
1115	**1.03.05.12**	**Move Optical Lab From 6010 to CSB C-D230**	**6 d**	**8/13/03**	**A**	**8/20/03**	**A**
1116	1.03.05.12.01	Pack Optical Lab For Move From 6010 to CSB C-D230	2 d	8/13/03	A	8/14/03	A
1117	1.03.05.12.02	Move Optical Lab From 6010 to CSB C-D230	1 d	8/20/03	A	8/20/03	A
1118	**1.03.05.13**	**Move Optical Lab From 6010 to CSB C-D228**	**5 d**	**8/15/03**	**A**	**8/21/03**	**A**
1119	1.03.05.13.01	Pack Optical Lab For Move From 6010 to CSB C-D228	1 d	8/15/03	A	8/15/03	A
1120	1.03.05.13.02	Move Optical Lab From 6010 to CSB C-D228	1 d	8/21/03	A	8/21/03	A
1121	**1.03.05.14**	**Move Nano Fabrication Lab From 4500S to CSB C-C126-A**	**3 d**	**9/15/03**	**A**	**9/17/03**	**A**
1122	**1.03.05.15**	**Move Biomolecular Lab From 4500S to CSB C-C124**	**1 d**	**9/17/03**	**A**	**9/17/03**	**A**
1123	**1.03.05.16**	**Move Condensed Matter Sciences Div. Labs From 2024 to 4500N & 3025**	**13 d**	**6/2/03**	**A**	**6/18/03**	**A**
1124	1.03.05.16.01	Disassemble Condensed Matter Labs	2 d	6/2/03	A	6/3/03	A
1125	1.03.05.16.02	Move Labs From 2024 to 4500N & 3025	5 d	6/4/03	A	6/10/03	A
1126	1.03.05.16.03	Assemble Condensed Matter Labs	2 d	6/11/03	A	6/12/03	A
1127	1.03.05.16.04	Move Ovens to Condensed Matter Labs	1 d	6/18/03	A	6/18/03	A
1128	**1.03.05.17**	**Move Physics Div. from 6000 to 6010**	**11 d**	**9/2/03**	**A**	**9/16/03**	**A**
1129	1.03.05.17.01	Move Physics Div. from 6000 to 6010	11 d	9/2/03	A	9/16/03	A
1130	1.03.05.17.02	Move Physics Div. Boxes from 6000 to 6010	9 d	9/4/03	A	9/16/03	A
1131	**1.03.05.18**	**Move ESTD Aircraft Lab from Y-12 9401-1 to Storage in Bldg. 7600**	**9 d**	**9/2/03**	**A**	**9/12/03**	**A**
1132	1.03.05.18.01	Disassemble ESTD Aircraft Lab	4 d	9/2/03	A	9/5/03	A
1133	1.03.05.18.02	Move ESTD Aircraft Lab from Y-12 9401-1 to Storage in Bldg. 7600	5 d	9/8/03	A	9/12/03	A
1134	**1.03.05.19**	**Move Insulation Lab from Bldg. 4508 to ETF E-F112 & E-F110**	**16 d**	**11/19/03**		**12/12/03**	
1135	1.03.05.19.01	Disassemble Insulation Lab	3 d	11/19/03		11/21/03	
1136	1.03.05.19.02	Labor Crew Move Insulation Lab to ETF E-F112 & E-F110	7 d	11/22/03		12/3/03	
1137	1.03.05.19.03	Rigger Crew Move Insulation Lab to ETF E-F112 & E-F110	7 d	11/22/03		12/3/03	
1138	1.03.05.19.04	Assemble Insulation Lab in ETF	7 d	12/4/03		12/12/03	
1139	**1.03.05.20**	**Move MEMS/NEMS Testing Lab & Ion Milling Clean Room from 4500S to ETF E-D202, E-D204, & E-D206A**	**14 d**	**10/10/03**		**10/29/03**	
1140	1.03.05.20.01	Disassemble MEMS/NEMS Testing Lab	1 d	10/10/03		10/10/03	

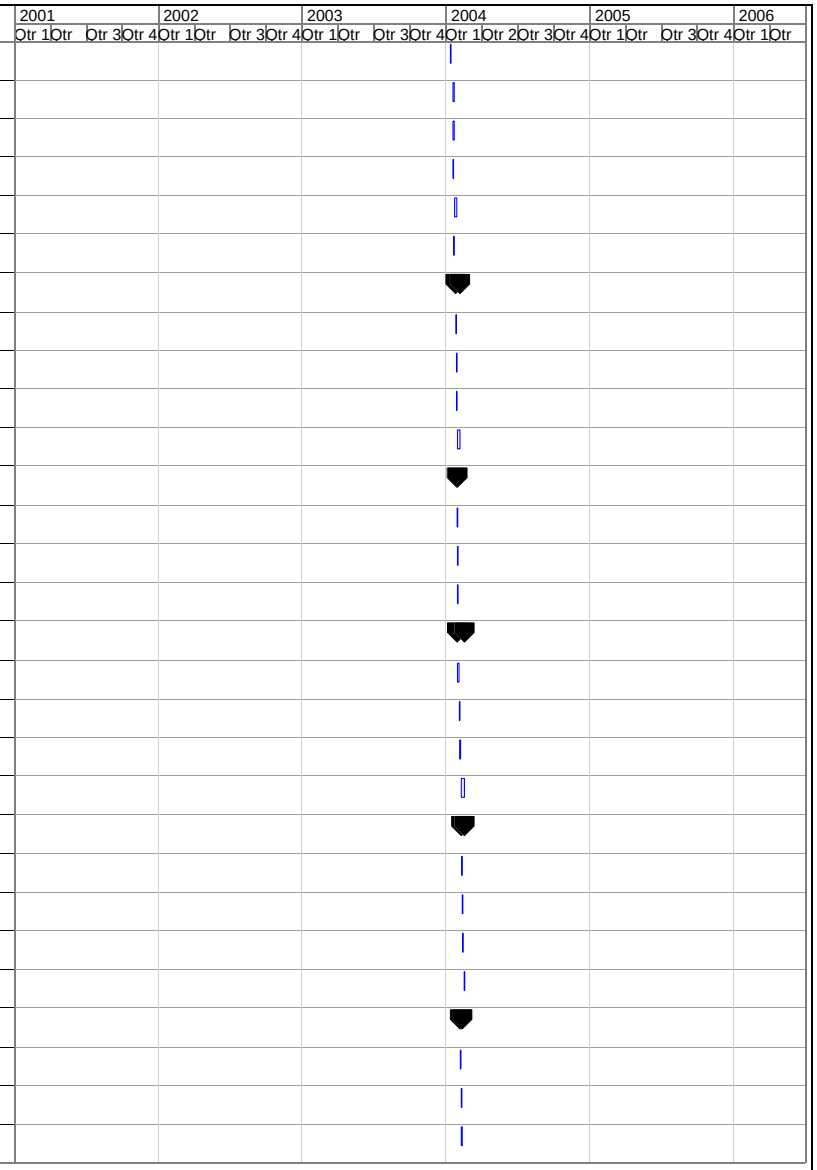


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start	Finish
1141	1.03.05.20.02	Disassemble 4500S Clean Room for Move to ETF (Ion Milling)	1 d	10/13/03	10/13/03
1142	1.03.05.20.03	Labor Crew Move MEMS/NEMS Testing Lab to ETF E-D201, E-D202, E-D204, & E-D206	4 d	10/20/03	10/23/03
1143	1.03.05.20.04	Rigger Crew Move MEMS/NEMS Testing Lab to ETF E-D201, E-D202, E-D204, & E-D206	4 d	10/20/03	10/23/03
1144	1.03.05.20.05	Move 4500S Clean Room to ETF E-D206-A (Ion Milling)	2 d	10/20/03	10/21/03
1145	1.03.05.20.06	Assemble MEMS/NEMS Testing Lab in ETF	4 d	10/24/03	10/29/03
1146	1.03.05.20.07	Assemble Clean Room in ETF (Ion Milling)	1 d	10/22/03	10/22/03
1147	**1.03.05.21**	**Move Environmental Effects Lab from 3500 to ETF E-C102**	**9 d**	**10/27/03**	**11/6/03**
1148	1.03.05.21.01	Disassemble Environmental Effects Lab	2 d	10/27/03	10/28/03
1149	1.03.05.21.02	Labor Crew Move Environmental Effects Lab to ETF E-C102	2 d	10/29/03	10/30/03
1150	1.03.05.21.03	Rigger Crew Move Environmental Effects Lab to ETF E-C102	2 d	10/29/03	10/30/03
1151	1.03.05.21.04	Assemble Environmental Effects Lab in ETF E-C102	5 d	10/31/03	11/6/03
1152	**1.03.05.22**	**Move Diamond Turning Lab Misc. Equipment from Y-12 to ETF E-B103, E-F116, E-D201, & E-D205**	**2 d**	**10/30/03**	**10/31/03**
1153	1.03.05.22.01	Disassemble Diamond Turning Lab for Move from Y-12 to ETF	1 d	10/30/03	10/30/03
1154	1.03.05.22.02	Labor Crew Move Diamond Turning Lab Equipment to ETF E-B103, E-F116, E-D201, & E-D205	1 d	10/31/03	10/31/03
1155	1.03.05.22.03	Rigger Crew Move Diamond Turning Lab Equipment to ETF E-B103, E-F116, E-D201, & E-D205	1 d	10/31/03	10/31/03
1156	**1.03.05.23**	**Move Advanced Thermal Hydraulics Lab from 9204-1 to ETF E-F116, E-F117, & E-F118**	**13 d**	**10/31/03**	**11/18/03**
1157	1.03.05.23.01	Disassemble Advanced Thermal Hydraulics Lab For Move to ETF	3 d	10/31/03	11/4/03
1158	1.03.05.23.02	Labor Crew Move Advanced Thermal Hydraulics Lab to ETF	3 d	11/5/03	11/7/03
1159	1.03.05.23.03	Rigger Crew Move Advanced Thermal Hydraulics Lab to ETF	3 d	11/6/03	11/8/03
1160	1.03.05.23.04	Assemble Advanced Thermal Hydraulics Lab in ETF	7 d	11/10/03	11/18/03
1161	**1.03.05.24**	**Move Photonics Lab from NTRC Rm 121 to ETF E-D207**	**6 d**	**11/11/03**	**11/18/03**
1162	1.03.05.24.01	Disassemble Photonics Lab	1 d	11/11/03	11/11/03
1163	1.03.05.24.02	Labor Crew Move Photonics Lab to ETF E-D207	2 d	11/12/03	11/13/03
1164	1.03.05.24.03	Rigger Crew Move Photonics Lab to ETF E-D207	2 d	11/13/03	11/14/03
1165	1.03.05.24.04	Assemble Photonic Lab in ETF	2 d	11/17/03	11/18/03
1166	**1.03.05.25**	**Move ESTD Hybrid Lighting Lab from NTRC to ETF E-D210**	**4 d**	**11/7/03**	**11/12/03**
1167	1.03.05.25.01	Disassemble Hybrid Lighting Lab	1 d	11/7/03	11/7/03
1168	1.03.05.25.02	Labor Crew Move Hybrid Lighting Lab to ETF E-D210	1 d	11/10/03	11/10/03
1169	1.03.05.25.03	Rigger Crew Move Hybrid Lighting Lab to ETF E-D210	3 d	11/10/03	11/12/03

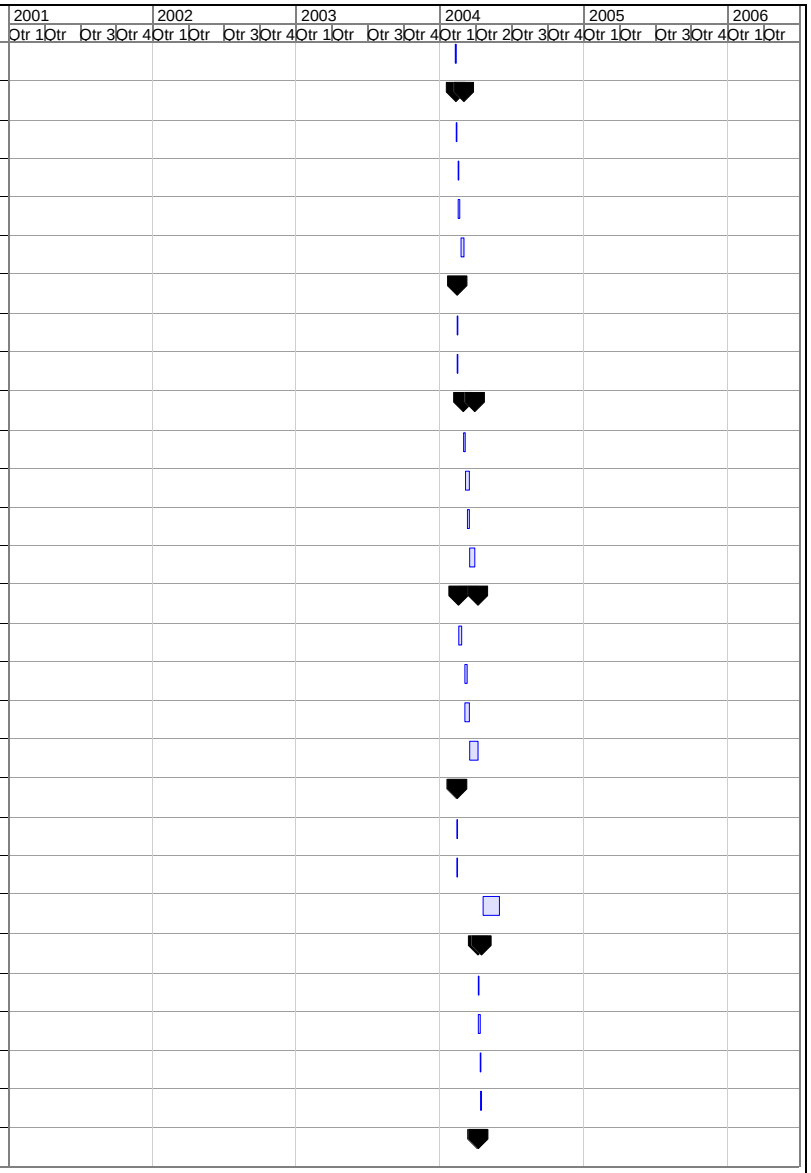


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start	Finish
1170	1.03.05.25.04	Assemble Hybrid Lighting Lab in ETF	3 d	11/10/03	11/12/03
1171	**1.03.05.26**	**Move FED Pellet Lab from Y-12 9201-2 to ETF E-D110**	**13 d**	**11/12/03**	**12/2/03**
1172	1.03.05.26.01	Disassemble Pellet Lab	3 d	11/12/03	11/14/03
1173	1.03.05.26.02	Labor Crew Move Pellet Lab to ETF E-D110	2 d	11/17/03	11/18/03
1174	1.03.05.26.03	Rigger Crew Move Pellet Lab to ETF E-D110	5 d	11/17/03	11/21/03
1175	1.03.05.26.04	Assemble Pellet Lab in ETF	5 d	11/24/03	12/2/03
1176	**1.03.05.27**	**Move Diagnostics/Special Projects Equipment from NTRC to ETF E-D201**	**1 d**	**11/15/03**	**11/15/03**
1177	1.03.05.27.01	Labor Crew Move Diagnostics/Special Projects Equipment from NTRC to ETF E-D201	1 d	11/15/03	11/15/03
1178	1.03.05.27.02	Rigger Crew Move Diagnostics/Special Projects Equipment from NTRC to ETF E-D201	1 d	11/15/03	11/15/03
1179	**1.03.05.28**	**Move LSD Structural Biology Lab From Y-12 Bldg 9224 to UT Facilities (Pending Funding)**	**19 d**	**12/1/03**	**12/29/03**
1180	1.03.05.28.01	Disconnect & Pack Structural Biology Lab for Move from 9224 to 4500S	5 d	12/1/03	12/5/03
1181	1.03.05.28.02	Labor Crew Move Structural Biology Lab from 9224 to 4500S	8 d	12/6/03	12/15/03
1182	1.03.05.28.03	Rigger Crew Move Structural Biology Lab from 9224 to 4500S	4 d	12/11/03	12/15/03
1183	1.03.05.28.04	Reconnect Structrual Biology Lab in 4500S	8 d	12/16/03	12/29/03
1184	**1.03.05.29**	**Move M&CD Composite Processing Lab from Y-12 9204-3 to ETF E-D105**	**30 d**	**11/19/03**	**1/6/04**
1185	1.03.05.29.01	Disassemble Composite Processing Lab	6 d	11/19/03	11/26/03
1186	1.03.05.29.02	Labor Crew Move Composite Processing Lab to ETF E-D105	6 d	12/4/03	12/10/03
1187	1.03.05.29.03	Rigger Crew Move Composite Processing Lab to ETF E-D105	11 d	12/4/03	12/16/03
1188	1.03.05.29.04	Assemble Composite Processing Lab in ETF E-D105	12 d	12/17/03	1/6/04
1189	**1.03.05.30**	**Move ESTD Technology Information Center & Records from 4500S to ETF E-D209 & E-F115**	**1 d**	**11/14/03**	**11/14/03**
1190	1.03.05.30.01	Labor Crew Move ESTD Technology Information Center & Records from 4500S to ETF E-D209 & E-F115	1 d	11/14/03	11/14/03
1191	1.03.05.30.02	Rigger Crew Move ESTD Technology Information Center & Records from 4500S to ETF E-D209 & E-F115	1 d	11/14/03	11/14/03
1192	**1.03.05.31**	**Move FED RF-3D Scanner & Plasma Process Labs from Y-12 9201-2 to ETF E-C101**	**30 d**	**1/20/04**	**3/1/04**
1193	**1.03.05.32**	**Move M&CD Composite Characterization Lab from Y-12 9204-1 to ETF E-D109**	**7 d**	**1/7/04**	**1/15/04**
1194	1.03.05.32.01	Disassemble Composite Characterization Lab	1 d	1/7/04	1/7/04
1195	1.03.05.32.02	Labor Crew Move Composite Characterization Lab to ETF E-D109	4 d	1/8/04	1/12/04
1196	1.03.05.32.03	Rigger Crew Move Composite Characterization Lab to ETF E-D109	1 d	1/12/04	1/12/04
1197	1.03.05.32.04	Assemble Composite Characterization Lab in ETF E-D109	3 d	1/13/04	1/15/04
1198	**1.03.05.33**	**Move Advanced Photonics Applications Lab from 4500S Rm S-239 to NTRC Rm L-121**	**3 d**	**1/5/04**	**1/7/04**

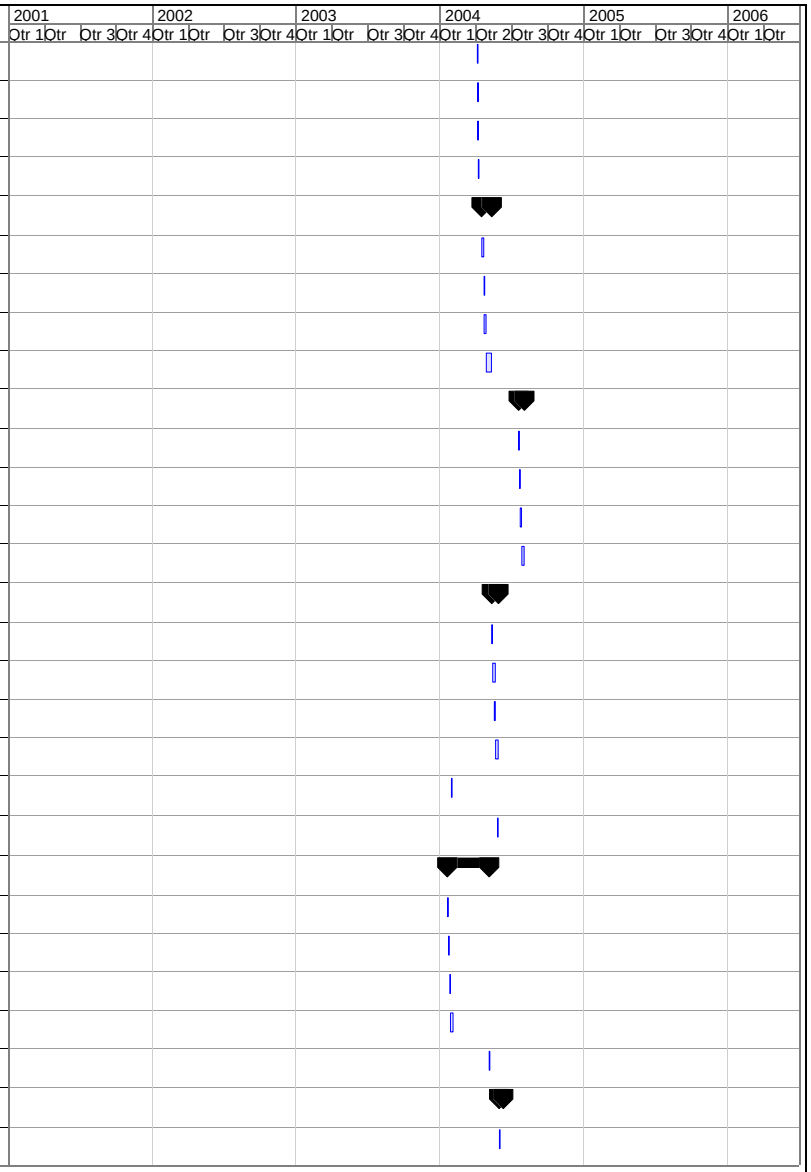


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start	Finish
1199	1.03.05.33.01	Disassemble Advanced Photonics Applications Lab	1 d	1/5/04	1/5/04
1200	1.03.05.33.02	Labor Crew Move Advanced Photonics Applications Lab to NTRC	1 d	1/6/04	1/6/04
1201	1.03.05.33.03	Rigger Crew Move Advanced Photonics Applications Lab to NTRC	1 d	1/6/04	1/6/04
1202	1.03.05.33.04	Assemble Advanced Photonics Lab in NTRC	1 d	1/7/04	1/7/04
1203	**1.03.05.34**	**Move M&CD Composite Stress Lab from Y-12 9204-1 to ETF E-D104**	**17 d**	**1/16/04**	**2/10/04**
1204	1.03.05.34.01	Disassemble Composite Stress Lab	3 d	1/16/04	1/21/04
1205	1.03.05.34.02	Labor Crew Move Composite Stress Lab to ETF E-D104	2 d	1/22/04	1/23/04
1206	1.03.05.34.03	Rigger Crew Move Composite Stress Lab to ETF E-D104	5 d	1/22/04	1/27/04
1207	1.03.05.34.04	Assemble Composite Stress Lab in ETF E-D014	10 d	1/28/04	2/10/04
1208	**1.03.05.35**	**Move NSTD Isotope Production Wet Chemistry Lab from Y-12 9204-3 to 5500**	**11 d**	**4/19/04**	**5/3/04**
1209	1.03.05.35.01	Prepare Wet Chemistry Lab for Move to 5500	2 d	4/19/04	4/20/04
1210	1.03.05.35.02	Load Wet Chemistry Lab for Move to 5500	2 d	4/21/04	4/22/04
1211	1.03.05.35.03	Transfer & Unload Wet Chemistry Lab at 5500	2 d	4/23/04	4/26/04
1212	1.03.05.35.04	Install Wet Chemistry Lab in 5500	5 d	4/27/04	5/3/04
1213	**1.03.05.36**	**Move M&CD Composite Assembly Room & Clean Room from Y-12 9204-1 to ETF E-D106-A & E-D106**	**13 d**	**2/11/04**	**2/27/04**
1214	1.03.05.36.01	Disassemble Composite Assembly Room & Clean Room	2 d	2/11/04	2/12/04
1215	1.03.05.36.02	Labor Crew Move Composite Assembly Room & Clean Room to ETF E-D106-A & E-D106	6 d	2/13/04	2/19/04
1216	1.03.05.36.03	Rigger Crew Move Composite Assembly Room & Clean Room to ETF E-D106-A & E-D106	3 d	2/17/04	2/19/04
1217	1.03.05.36.04	Assemble Composite Assembly Room & Clean Room in ETF E-D106-A & E-D106	6 d	2/20/04	2/27/04
1218	**1.03.05.37**	**Labor Crew Move ESTD Clean Room from Y-12 9201-3 to ETF E-D208-A & E-D216A**	**1 d**	**10/31/03**	**10/31/03**
1219	**1.03.05.38**	**Rigger Crew Move QSD Quality Control Lab from Y-12 9201-3 to ETF E-F108**	**2 d**	**2/25/04**	**2/26/04**
1220	**1.03.05.39**	**Move ESTD Optics Labs from Bldg. 3500, NTRC, & Y-12 9201-3 to ETF E-D201, E-D203, & E-D205**	**71 d**	**10/21/03**	**2/4/04**
1221	1.03.05.39.01	Disassemble ESTD Optics Labs in Bldg. 3500	2 d	10/21/03	10/22/03
1222	1.03.05.39.02	Labor Crew Move ESTD Optics Labs to ETF E-D201, E-D203, & E-D205	2 d	10/24/03	10/25/03
1223	1.03.05.39.03	Rigger Crew Move ESTD Optics Labs to ETF E-D201, E-D203, & E-D205	2 d	10/27/03	10/28/03
1224	1.03.05.39.04	Assemble ESTD Optics Labs in ETF	5 d	10/29/03	11/4/03
1225	1.03.05.39.05	Move Two Optics Tables From Room 17 Bldg. 3500 to ETF E-D201	1 d	2/4/04	2/4/04
1226	**1.03.05.40**	**Move M&CD Composite Storage Lab from Y-12 9204-1 to ETF E-D107**	**8 d**	**3/1/04**	**3/10/04**
1227	1.03.05.40.01	Disassemble Composite Storage Lab	2 d	3/1/04	3/2/04

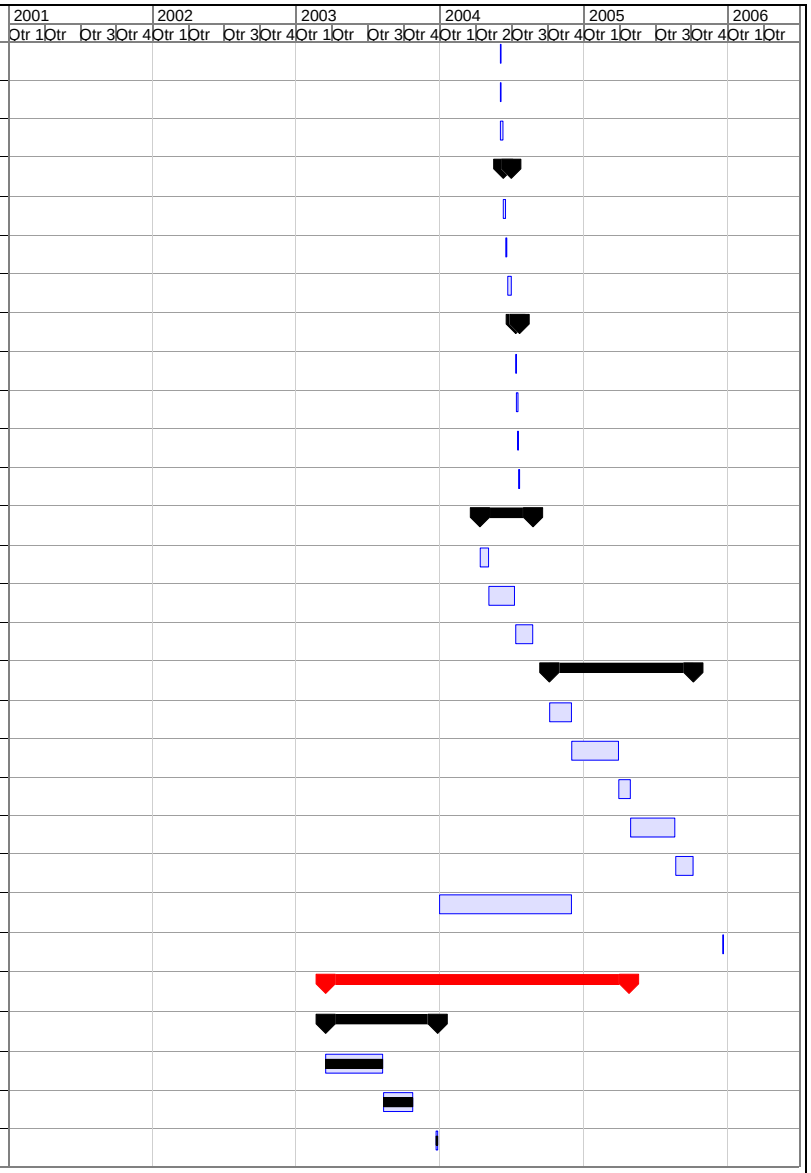


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1228	1.03.05.40.02	Labor Crew Move Composite Storage Lab to ETF E-D107	1 d	3/3/04		3/3/04	
1229	1.03.05.40.03	Rigger Crew Move Composite Storage Lab to ETF E-D107	1 d	3/3/04		3/3/04	
1230	1.03.05.40.04	Assemble Composite Storage Lab in ETF E-D107	5 d	3/4/04		3/10/04	
1231	**1.03.05.41**	**Move M&CD Concrete Testing Lab/Concrete Prep Lab from 9204-1 to ETF E-D113 & E-D113-A**	**15 d**	**3/11/04**		**3/31/04**	
1232	1.03.05.41.01	Disassemble Concrete Testing Lab/Concrete Preparation Lab	4 d	3/11/04		3/16/04	
1233	1.03.05.41.02	Rigger Crew Move Concrete Testing Lab/Concrete Preparation Lab to ETF E-D113 & E-D113-A	3 d	3/17/04		3/19/04	
1234	1.03.05.41.03	Assemble Concrete Testing Lab/Concrete Preparation Lab in ETF E-D113 & E-D113-A	8 d	3/22/04		3/31/04	
1235	**1.03.05.42**	**Move ESTD Analog/Digital Systems Labs from Bldg. 3606 to Bldg. 3500**	**8 d**	**4/12/04**		**4/21/04**	
1236	1.03.05.42.01	Disassemble ESTD Analog/Digital Systems Labs for Move from Bldg. 3606 to Bldg. 3500	1 d	4/12/04		4/12/04	
1237	1.03.05.42.02	Labor Crew Move ESTD Analog/Digital Systems Labs from Bldg. 3606 to Bldg. 3500	5 d	4/13/04		4/17/04	
1238	1.03.05.42.03	Rigger Crew Move ESTD Analog/Digital Systems Labs from Bldg. 3606 to Bldg. 3500	2 d	4/16/04		4/17/04	
1239	1.03.05.42.04	Assemble ESTD Analog/Digital Systems Labs in Bldg. 3500	3 d	4/19/04		4/21/04	
1240	**1.03.05.43**	**Move M&CD Membrane Technology Lab from K-1037 to ETF E-D102, E-D103, & E-D115**	**95 d**	**1/12/04**		**5/25/04**	
1241	1.03.05.43.01	Disassemble Membrane Technology Lab	15 d	1/12/04		2/2/04	
1242	1.03.05.43.02	Move Membrane Technology Lab to ETF E-D103 & E-D115	48 d	2/3/04		4/8/04	
1243	1.03.05.43.03	Assemble Membrane Technology Lab in ETF E-D103 & E-D115	32 d	4/12/04		5/25/04	
1244	**1.03.05.44**	**Move Remaining Fusion Energy Labs (including RF Benchmark) from 9201-2 to Bldg. 7600**	**250 d**	**7/7/04**		**7/6/05**	
1245	1.03.05.44.01	Shutdown & Safe Disconnect (UTB)	40 d	7/7/04		8/31/04	
1246	1.03.05.44.02	Disassemble & Package (Vendor)	80 d	9/1/04		12/28/04	
1247	1.03.05.44.03	Move Equipment (UTB)	20 d	12/29/04		1/27/05	
1248	1.03.05.44.04	Unpackage & Reassemble Equipment (Vendor)	80 d	1/28/05		5/20/05	
1249	1.03.05.44.05	Perform Equipment Tie-ins (UTB)	30 d	5/23/05		7/6/05	
1250	**1.03.05.45**	**Install Additional Utility Services in Labs**	**230 d**	**10/1/03**		**8/31/04**	
1251	**1.03.05.46**	**Move Nano Particle Lab From 4500S to CSB C-C122**	**1 d**	**9/19/05**		**9/19/05**	
1252	**1.03.06**	**Renovations to Existing Facilities**	**525 d**	**12/16/02**	**A**	**1/24/05**	
1253	**1.03.06.01**	**Renovate Bldg 5510 For Isotope Production Labs**	**196 d**	**12/16/02**	**A**	**9/26/03**	**A**
1254	1.03.06.01.01	Perform Design for Bldg 5510 Renovation	100 d	12/16/02	A	5/9/03	A
1255	1.03.06.01.02	Renovate Bldg 5510	52 d	5/12/03	A	7/25/03	A
1256	1.03.06.01.03	Install Process Chiller and Hood in Bldg 5510	5 d	9/22/03	A	9/26/03	A

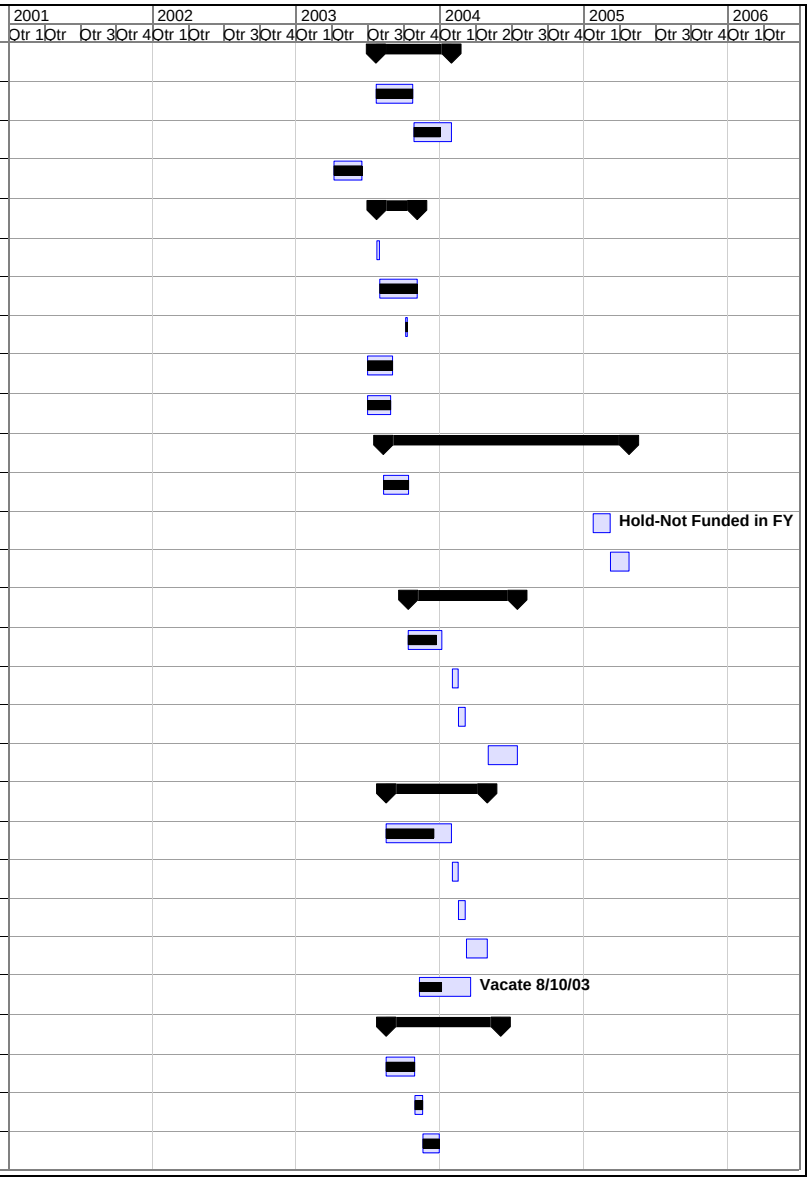


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1257	**1.03.06.02**	**Renovate Buildings 1059/1061 For Life Sciences Division Labs**	**134 d**	**4/23/03**	**A**	**10/31/03**	
1258	1.03.06.02.01	Renovate Buildings 1059/1061 For Life Sciences Division Labs	65 d	4/23/03	A	7/25/03	A
1259	1.03.06.02.02	Install Nitrogen System, Lab Furniture, Exhaust Fan, & Instrumentation in 1059/1061	69 d	7/28/03	A	10/31/03	
1260	**1.03.06.03**	**Renovate Building 1000 For Travel**	**50 d**	**1/6/03**	**A**	**3/17/03**	**A**
1261	**1.03.06.04**	**Building 4508-Mechanical Properties**	**70 d**	**4/25/03**	**A**	**8/5/03**	**A**
1262	1.03.06.04.01	Mechanical Properties Floor Mods	5 d	4/25/03	A	5/1/03	A
1263	1.03.06.04.02	Mechanical Properties-Electrical & Piping Mods & Misc. Renovations	65 d	5/2/03	A	8/5/03	A
1264	1.03.06.04.03	Mechanical Properties-Ceiling Installation	5 d	7/7/03	A	7/11/03	A
1265	**1.03.06.05**	**Renovate Building 1062 For Environmental Sciences Division**	**44 d**	**4/1/03**	**A**	**6/3/03**	**A**
1266	**1.03.06.06**	**Renovate Building 4500N For Condensed Matter Sciences Division Lab**	**42 d**	**4/1/03**	**A**	**5/30/03**	**A**
1267	**1.03.06.07**	**Renovate Building 6012 Roof for CCSD**	**425 d**	**5/12/03**	**A**	**1/24/05**	
1268	1.03.06.07.01	Perform Design to Renovate Building 6012 Roof for CCSD	43 d	5/12/03	A	7/14/03	A
1269	1.03.06.07.02	Procure Construction Contractor to Renovate Building 6012 Roof for CCSD	30 d	10/25/04		12/7/04	
1270	1.03.06.07.03	Perform Renovation to Building 6012 Roof for CCSD	30 d	12/8/04		1/24/05	
1271	**1.03.06.08**	**Perform 4500N Library Expansion**	**191 d**	**7/14/03**	**A**	**4/15/04**	
1272	1.03.06.08.01	Perform 4500N Library Expansion Design	61 d	7/14/03	A	10/7/03	
1273	1.03.06.08.02	Procure Construction Contractor for 4500N Library Expansion	11 d	11/3/03		11/17/03	
1274	1.03.06.08.03	Construction Contractor Mobilize for 4500N Renovations	12 d	11/18/03		12/5/03	
1275	1.03.06.08.04	Perform 4500N Library Expansion	53 d	2/2/04		4/15/04	
1276	**1.03.06.09**	**Perform 4500N Headhouse Renovation (Tech. Transfer & Legal)**	**175 d**	**5/19/03**	**A**	**1/30/04**	
1277	1.03.06.09.01	Perform 4500N Headhouse Renovation Design	116 d	5/19/03	A	10/31/03	
1278	1.03.06.09.02	Procure Construction Contractor for 4500N Headhouse Renovation	11 d	11/3/03		11/17/03	
1279	1.03.06.09.03	Construction Contractor Mobilize for 4500N Headhouse Renovation	12 d	11/18/03		12/5/03	
1280	1.03.06.09.04	Perform 4500N Headhouse Renovation	36 d	12/8/03		1/30/04	
1281	**1.03.06.10**	**Renovate Buildings 6000/6004/6010/6025 To Accommodate PD**	**92 d**	**8/11/03**	**A**	**12/19/03**	
1282	**1.03.06.11**	**Renovate Building 6011 To Accommodate CCSD**	**199 d**	**5/19/03**	**A**	**3/4/04**	
1283	1.03.06.11.01	Perform Design to Renovate Building 6011 To Accommodate CCSD	50 d	5/19/03	A	7/30/03	A
1284	1.03.06.11.02	Procure Construction Contractor to Renovate Building 6011 to Accommodate CCSD (Phase I)	14 d	7/31/03	A	8/19/03	A
1285	1.03.06.11.03	Perform Renovations to Building 6011 to Accommodate CCSD (Phase I)	29 d	8/20/03	A	9/30/03	A

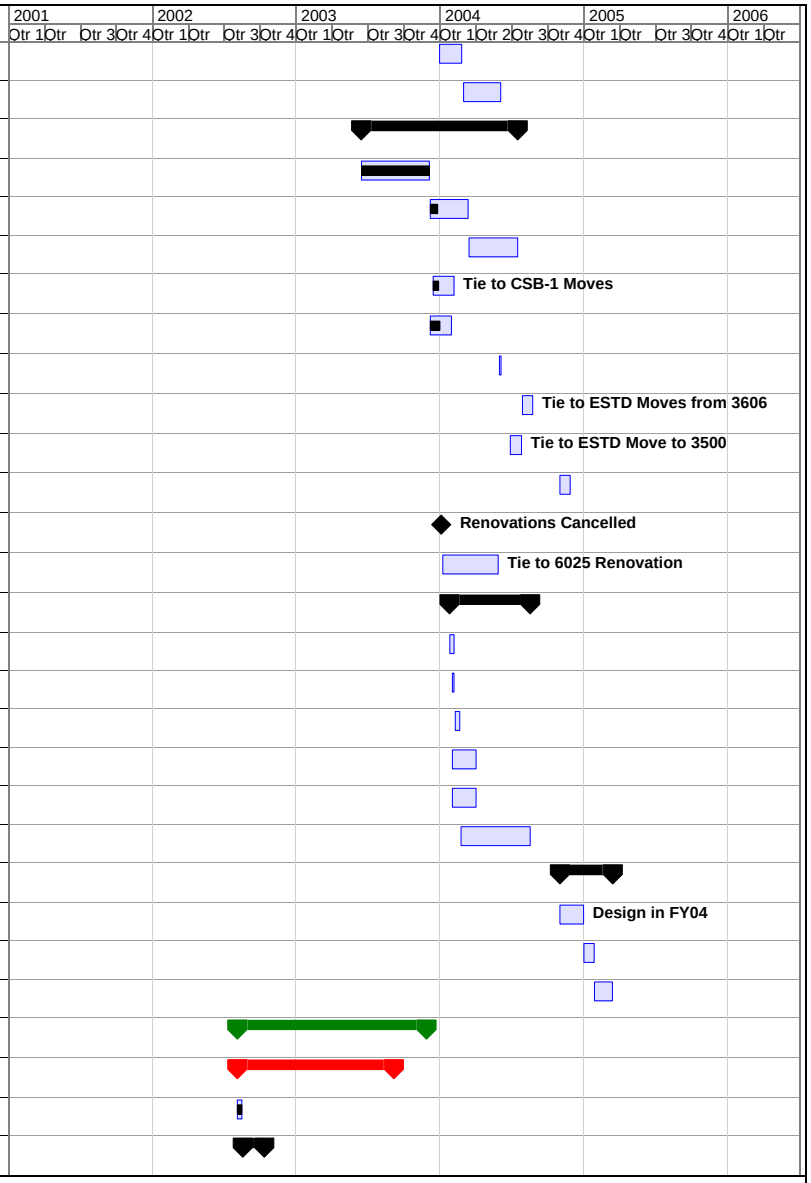


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1286	1.03.06.11.04	Procure Construction Contractor (Phase II)	41 d	10/1/03		11/26/03	
1287	1.03.06.11.05	Perform Renovations to Building 6011 (Phase II)	65 d	12/1/03		3/4/04	
1288	**1.03.06.12**	**Renovate Building 5500 For NSTD Isotope Production Wet Chemistry Labs**	**273 d**	**3/17/03**	**A**	**4/16/04**	
1289	1.03.06.12.01	Perform Design for Bldg 5500 Renovation	120 d	3/17/03	A	9/5/03	A
1290	1.03.06.12.02	Procure Construction Contractor for Bldg 5500 Renovation	68 d	9/8/03	A	12/12/03	
1291	1.03.06.12.03	Renovate Bldg 5500	85 d	12/15/03		4/16/04	
1292	**1.03.06.13**	**Renovate Building 3546**	**40 d**	**9/15/03**	**A**	**11/7/03**	
1293	**1.03.06.14**	**Renovate 4500N 2nd Floor-EERE Program Renovation (Maintenance)**	**40 d**	**9/8/03**	**A**	**10/31/03**	
1294	**1.03.06.15**	**Install Concrete Approaches for 1059/1061 Nitrogen Headers**	**5 d**	**3/1/04**		**3/5/04**	
1295	**1.03.06.16**	**Renovate Building 3606 - 30 Office Spaces**	**20 d**	**4/28/04**		**5/25/04**	
1296	**1.03.06.17**	**Building 3500 Lab Upgrades for Relocation of 3606 Labs**	**20 d**	**3/29/04**		**4/26/04**	
1297	**1.03.06.18**	**Building 4500S Maintenace Shops Upgrades**	**20 d**	**8/2/04**		**8/27/04**	
1298	**1.03.06.19**	**Building 4500S Upgrades for LSD Research from 9224 (Cancelled)**	**1 d**	**10/6/03**		**10/6/03**	
1299	**1.03.06.20**	**Building 6025 Foundation Stabilization**	**96 d**	**10/9/03**		**2/27/04**	
1300	**1.03.06.21**	**Buildings 3546, 3606, & 6012 Room Air Conditioner Replacements**	**140 d**	**10/27/03**		**5/18/04**	
1301	1.03.06.21.01	Procure Room Air Conditioners for 3546	10 d	10/27/03		11/7/03	
1302	1.03.06.21.04	Remove Old 3546 Room Air Conditioners	5 d	11/3/03		11/7/03	
1303	1.03.06.21.05	Install New 3546 Room Air Conditioners	10 d	11/10/03		11/21/03	
1304	1.03.06.21.06	Perform Modification Design for 3546, 3606, & 6012 Air Conditioning	40 d	11/3/03		1/2/04	
1305	1.03.06.21.07	Procure Contractor for 3546, 3606, & 6012 Air Conditioning Modifications	40 d	11/3/03		1/2/04	
1306	1.03.06.21.08	Preform 3546, 3606, & 6012 Air Conditioning Modifications	120 d	11/24/03		5/18/04	
1307	**1.03.06.22**	**Building 5002 First Floor Renovation**	**93 d**	**8/2/04**		**12/13/04**	
1308	1.03.06.22.01	Perform 5002 First Floor Renovation Design	43 d	8/2/04		9/30/04	
1309	1.03.06.22.02	Procure Construction Contractor for 5002 First Floor Renovation	20 d	10/1/04		10/28/04	
1310	1.03.06.22.03	Preform 5002 First Floor Renovation	30 d	10/29/04		12/13/04	
1311	**1.04**	**Main Computer Installation in CSB**	**331 d**	**5/6/02**	**A**	**8/29/03**	**A**
1312	**1.04.01**	**Planning and Estimating**	**273 d**	**5/6/02**	**A**	**6/6/03**	**A**
1313	1.04.01.01	Inventory Computers to be Moved	10 d	5/6/02	A	5/17/02	A
1314	**1.04.01.02**	**Develop Preliminary Cost Estimate**	**37 d**	**5/20/02**	**A**	**7/12/02**	**A**

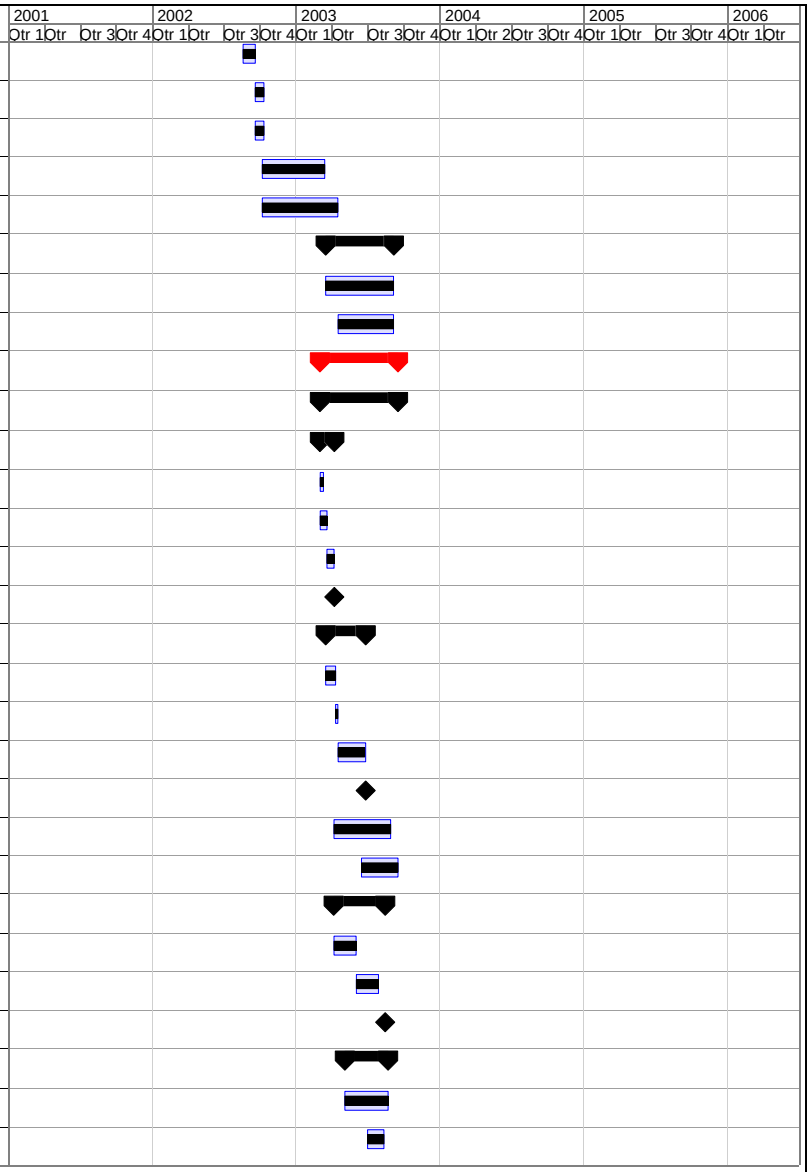


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1315	1.04.01.02.01	Develop Draft Overall Cost Estimate for Move	23 d	5/20/02	A	6/20/02	A
1316	1.04.01.02.02	Estimate Network Connections and Lines	15 d	6/20/02	A	7/12/02	A
1317	1.04.01.02.03	Estimate Electrical Lines, Breakers, Plugs, & Tile Cut	15 d	6/20/02	A	7/12/02	A
1318	1.04.01.03	Preliminary Floor Plan for 1st Floor Computer Room	112 d	7/8/02	A	12/13/02	A
1319	1.04.01.04	Preliminary Floor Plan for 2nd Floor Computer Room	132 d	7/8/02	A	1/15/03	A
1320	**1.04.01.05**	**Plan Computer Moves**	**119 d**	**12/16/02**	**A**	**6/6/03**	**A**
1321	1.04.01.05.01	Plan 1st Floor Computer Moves	119 d	12/16/02	A	6/6/03	A
1322	1.04.01.05.02	Plan 2nd Floor Computer Moves	99 d	1/16/03	A	6/6/03	A
1323	**1.04.02**	**Procurement of Materials, Equip., & Services**	**136 d**	**12/2/02**	**A**	**6/17/03**	**A**
1324	**1.04.02.01**	**Procure Material to Support Move**	**136 d**	**12/2/02**	**A**	**6/17/03**	**A**
1325	**1.04.02.01.01**	**Procure Electrical Cables for First Floor**	**23 d**	**12/2/02**	**A**	**1/6/03**	**A**
1326	1.04.02.01.01.1	Identify Electrical Termination Locations-1st Floor	7 d	12/2/02	A	12/10/02	A
1327	1.04.02.01.01.2	Generate Electrical Cable Schedule-1st Floor	14 d	12/2/02	A	12/19/02	A
1328	1.04.02.01.01.3	Contract To Have Electrical Cable Made Up-1st Floor	10 d	12/19/02	A	1/6/03	A
1329	1.04.02.01.01.4	Electrical Cables Delivered To Walker-1st Floor	0 d	1/6/03	A	1/6/03	A
1330	**1.04.02.01.02**	**Procure Electrical Cables for Second Floor**	**70 d**	**12/16/02**	**A**	**3/27/03**	**A**
1331	1.04.02.01.02.1	Identify Electrical Termination Locations-2nd Floor	17 d	12/16/02	A	1/10/03	A
1332	1.04.02.01.02.2	Generate Electrical Cable Schedule-2nd Floor	4 d	1/10/03	A	1/15/03	A
1333	1.04.02.01.02.3	Contract To Have Electrical Cable Made Up-2nd Floor	50 d	1/16/03	A	3/27/03	A
1334	1.04.02.01.02.4	Electrical Cables Delivered To Walker-2nd Floor	0 d	3/27/03	A	3/27/03	A
1335	1.04.02.01.03	Determine Additional Move Material To Procure	102 d	1/6/03	A	5/30/03	A
1336	1.04.02.01.04	Procure Additional Move Material	65 d	3/17/03	A	6/17/03	A
1337	**1.04.02.02**	**Procure Equip. for Backup Computer Facility**	**92 d**	**1/6/03**	**A**	**5/16/03**	**A**
1338	1.04.02.02.01	Procure Dev/QA Filer for Backup Computer Facility	40 d	1/6/03	A	3/3/03	A
1339	1.04.02.02.02	Install & Test Dev/QA Filer in Backup Computer Facility	40 d	3/4/03	A	4/29/03	A
1340	1.04.02.02.03	Backup Computer Facility Dev/QA Env. Operational	0 d	5/16/03	A	5/16/03	A
1341	**1.04.02.03**	**Procure Move Services**	**79 d**	**2/3/03**	**A**	**5/23/03**	**A**
1342	1.04.02.03.01	Determine Services to Procure	79 d	2/3/03	A	5/23/03	A
1343	1.04.02.03.02	Procure Services	30 d	4/1/03	A	5/13/03	A

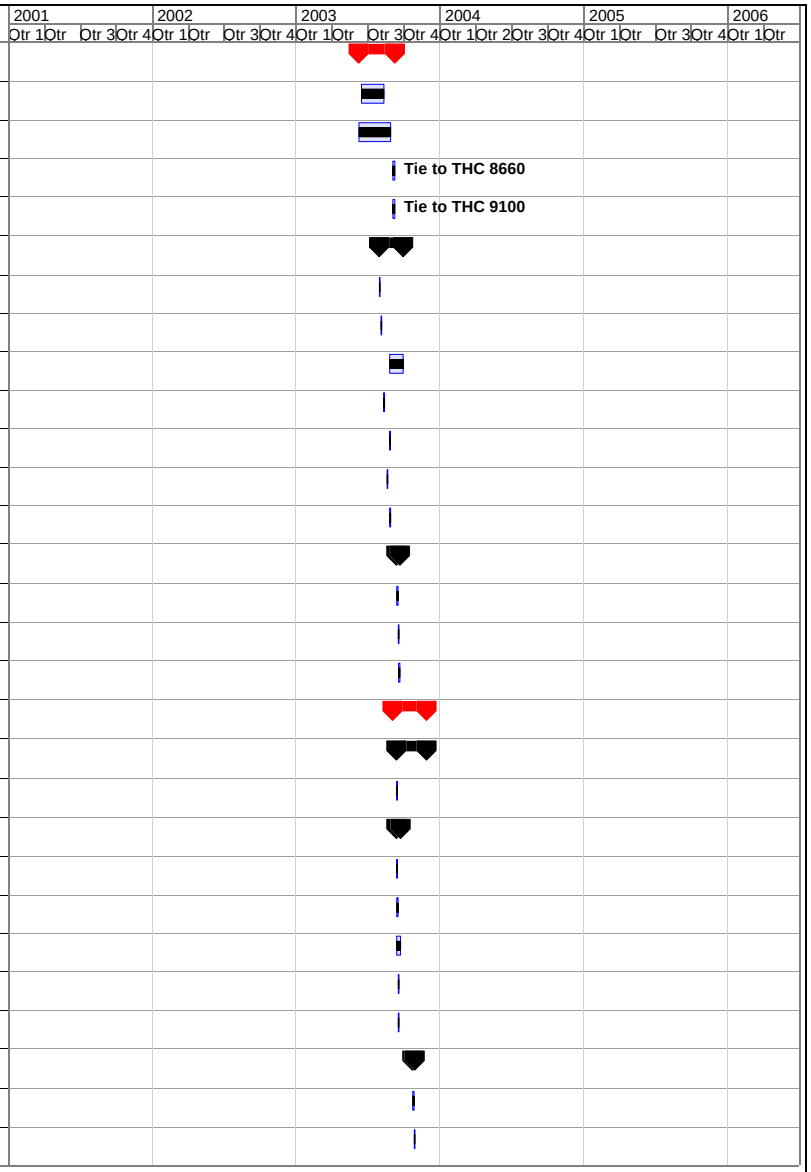


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1344	**1.04.03**	**Installation of Telecommunication Lines**	**64 d**	**3/10/03**	**A**	**6/9/03**	**A**
1345	1.04.03.01	Contract To Have Some Spare Tiles Cut	40 d	3/17/03	A	5/12/03	A
1346	1.04.03.02	Make-up/Procure Network Feeds	57 d	3/10/03	A	5/29/03	A
1347	1.04.03.03	UTB Install Network Feeds - 1st Floor CSB Computer Room	4 d	6/4/03	A	6/9/03	A
1348	1.04.03.04	UTB Install Network Feeds - 2nd Floor CSB Computer Room	4 d	6/4/03	A	6/9/03	A
1349	**1.04.04**	**Preparations/Verifications Prior to Move**	**42 d**	**5/1/03**	**A**	**6/30/03**	**A**
1350	1.04.04.01	Final Clean 1st Floor Computer Room	2 d	5/1/03	A	5/2/03	A
1351	1.04.04.02	Final Clean 2nd Floor Computer Room	2 d	5/5/03	A	5/6/03	A
1352	1.04.04.03	Daily Cleaning of Computer Rooms	31 d	5/27/03	A	6/30/03	A
1353	1.04.04.04	Move Cave Lab to CSB C-B228	3 d	5/12/03	A	5/14/03	A
1354	1.04.04.05	Move Capsicum to CSB C-B228	2 d	5/27/03	A	5/28/03	A
1355	1.04.04.06	Move STK Silos from Y-12 to CSB-1	2 d	5/21/03	A	5/22/03	A
1356	1.04.04.07	Install Y-12 STK Silos	4 d	5/27/03	A	5/30/03	A
1357	**1.04.04.08**	**Move Cray to 1st Floor Computer Room**	**5 d**	**6/14/03**	**A**	**6/22/03**	**A**
1358	1.04.04.08.01	System Prep/Shutdown-Cray	4 d	6/14/03	A	6/17/03	A
1359	1.04.04.08.02	Move Cray to CSB	1 d	6/18/03	A	6/18/03	A
1360	1.04.04.08.03	Setup/Install/Checkout	4 d	6/19/03	A	6/22/03	A
1361	**1.04.05**	**Computer & Equipment Moves**	**61 d**	**6/4/03**	**A**	**8/29/03**	**A**
1362	**1.04.05.01**	**Move Computers to 1st Floor Computer Room**	**53 d**	**6/14/03**	**A**	**8/29/03**	**A**
1363	1.04.05.01.01	Move Internet Connection & "Top End" of Network	2 d	6/14/03	A	6/15/03	A
1364	**1.04.05.01.02**	**Move Cheetah/Eagle/HPSS**	**7 d**	**6/14/03**	**A**	**6/24/03**	**A**
1365	1.04.05.01.02.1	Vendor Shutdown Cheetah/Eagle/HPSS	2 d	6/14/03	A	6/15/03	A
1366	1.04.05.01.02.2	Move Cheetah/Part of Eagle/HPSS to CSB-1	4 d	6/14/03	A	6/17/03	A
1367	1.04.05.01.02.3	Set Up/Startup/Checkout Cheetah/Eagle/HPSS	11 d	6/14/03	A	6/24/03	A
1368	1.04.05.01.02.4	Move Remainder of Eagle to CSB-1	2 d	6/18/03	A	6/19/03	A
1369	1.04.05.01.02.5	Set Up/Startup/Checkout Remainder of Eagle	2 d	6/18/03	A	6/19/03	A
1370	**1.04.05.01.03**	**Move Falcon**	**3 d**	**7/25/03**	**A**	**7/29/03**	**A**
1371	1.04.05.01.03.1	Vendor-Shutdown/System Prep.-Falcon	2 d	7/25/03	A	7/28/03	A
1372	1.04.05.01.03.2	Move Misc. Falcon Cabinets & Equipment	1 d	7/29/03	A	7/29/03	A



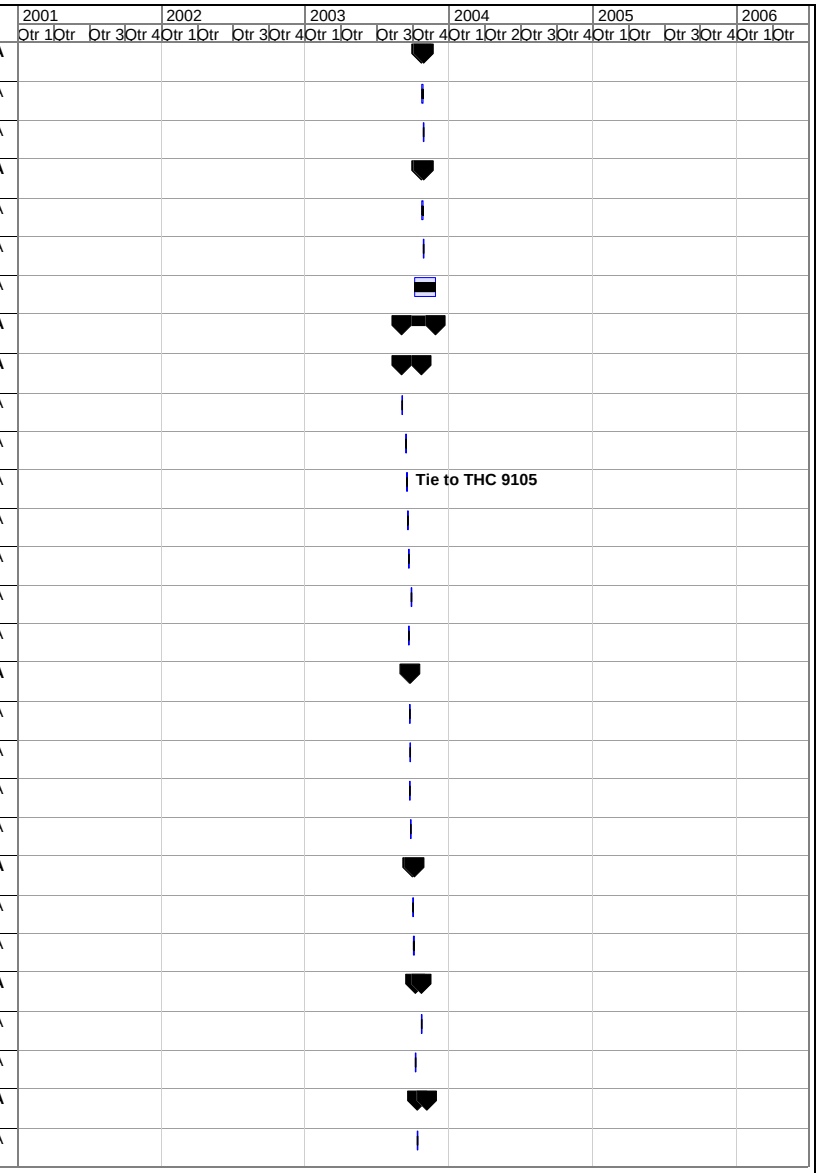
Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

10/24/03 | 4 - 50 | rogress Reported Through 9/30/03

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1373	**1.04.05.01.04**	**Move Colt**	**3 d**	**7/25/03**	**A**	**7/29/03**	**A**
1374	1.04.05.01.04.1	Vendor-Shutdown/System Prep.-Colt	2 d	7/25/03	A	7/28/03	A
1375	1.04.05.01.04.2	Move Misc. Colt Cabinets & Equipment	1 d	7/29/03	A	7/29/03	A
1376	**1.04.05.01.05**	**Move Other Supercomputing**	**3 d**	**7/25/03**	**A**	**7/29/03**	**A**
1377	1.04.05.01.05.1	Shutdown/System Prep.Other	2 d	7/25/03	A	7/28/03	A
1378	1.04.05.01.05.2	Move Other Supercomputing Equipment	1 d	7/29/03	A	7/29/03	A
1379	1.04.05.01.06	Clear Vacated Areas - CSB-1	40 d	7/7/03	A	8/29/03	A
1380	**1.04.05.02**	**Move Computers to 2nd Floor Computer Room**	**60 d**	**6/4/03**	**A**	**8/28/03**	**A**
1381	**1.04.05.02.01**	**Move Business and Infrastructure Servers**	**35 d**	**6/4/03**	**A**	**7/24/03**	**A**
1382	1.04.05.02.01.1	Move Netserver 1 & Networking	1 d	6/4/03	A	6/4/03	A
1383	1.04.05.02.01.2	Move Hank, Surveyor, & Search 1	1 d	6/14/03	A	6/14/03	A
1384	1.04.05.02.01.3	Move Infrastructure/Business Phase 1 (H-8,H-9,H-11,H-16, Robot 1)	1 d	6/17/03	A	6/17/03	A
1385	1.04.05.02.01.4	Move Infrastructure/Business Phase 2 (H-7, H-15, G-5, G-6)	1 d	6/19/03	A	6/19/03	A
1386	1.04.05.02.01.5	Move Infrastructure/Business Phase 3 (H-2, H-3, H-6, H-17, J. Green)	1 d	6/21/03	A	6/21/03	A
1387	1.04.05.02.01.6	Move Infrastructure/Business Phase 4 (H-5, H-12, H-13,SWS1, Test-DC, GADX1)	1 d	6/28/03	A	6/28/03	A
1388	1.04.05.02.01.7	Move DSN1 & EXTDHCP2	1 d	6/21/03	A	6/21/03	A
1389	**1.04.05.02.01.8**	**Move SAP QA Environment**	**2 d**	**6/24/03**	**A**	**6/25/03**	**A**
1390	1.04.05.02.01.8.1	Shut Down/Move SAP QA Environment	1 d	6/24/03	A	6/24/03	A
1391	1.04.05.02.01.8.2	Start Up/Checkout SAP QA Environment	1 d	6/25/03	A	6/25/03	A
1392	1.04.05.02.01.9	Move DIAL 1 & INMCSX	1 d	6/24/03	A	6/24/03	A
1393	1.04.05.02.01.10	Move VPN1 & INMMON	1 d	6/26/03	A	6/26/03	A
1394	**1.04.05.02.01.11**	**Move SAP Production Environment & Email**	**1 d**	**7/2/03**	**A**	**7/6/03**	**A**
1395	1.04.05.02.01.11.1	Shut Down/Move SAP Production Environment & Email	2 d	7/2/03	A	7/3/03	A
1396	1.04.05.02.01.11.2	Start Up/Checkout SAP Production Environment & Email	3 d	7/4/03	A	7/6/03	A
1397	**1.04.05.02.01.12**	**Move Org./Project Servers**	**12 d**	**7/9/03**	**A**	**7/24/03**	**A**
1398	1.04.05.02.01.12.1	Move OASCR Servers	1 d	7/24/03	A	7/24/03	A
1399	1.04.05.02.01.12.2	Move CS&E Division Servers	1 d	7/9/03	A	7/9/03	A
1400	**1.04.05.02.02**	**Move Computer Labs**	**18 d**	**7/14/03**	**A**	**8/6/03**	**A**
1401	1.04.05.02.02.1	Move Viz Lab From 6010 & 6011 to CSB C-B208	2 d	7/14/03	A	7/15/03	A

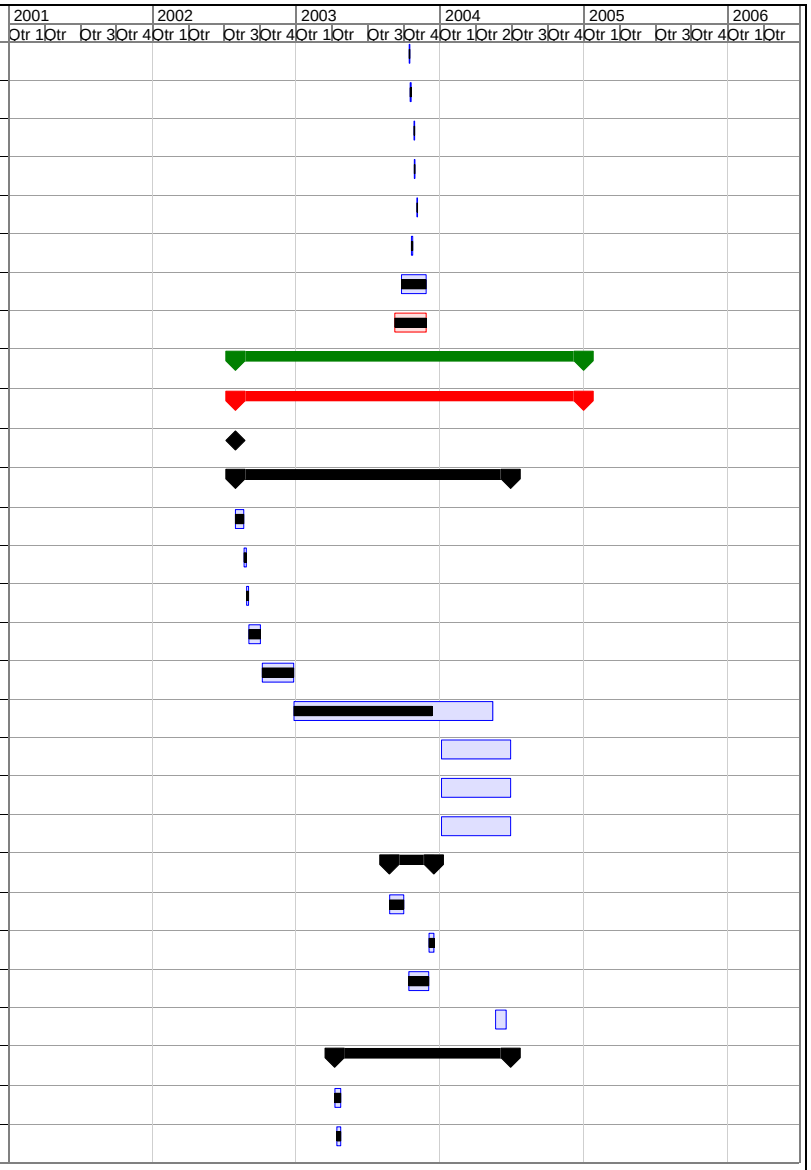


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1402	1.04.05.02.02.2	Move Audio Lab From 6010 & 6011to CSB C-B210-A	2 d	7/16/03	A	7/17/03	A
1403	1.04.05.02.02.3	Move Video Lab From 6011 to CSB C-B210	2 d	7/18/03	A	7/21/03	A
1404	1.04.05.02.02.4	Move GIS Lab From 4500N to CSB C-B224	1 d	7/28/03	A	7/28/03	A
1405	1.04.05.02.02.5	Move Modeling & Simulation Lab From 6011 to CSB C-A216	1 d	7/29/03	A	7/29/03	A
1406	1.04.05.02.02.6	Move Robotics Lab From 6010 to CSB C-B216	2 d	8/5/03	A	8/6/03	A
1407	1.04.05.02.02.7	Move Computer Science Lab From 6012 to CSB C-E204-B	4 d	7/22/03	A	7/25/03	A
1408	1.04.05.02.03	Clear Vacated Areas-2nd Floor Computer Room Moves	50 d	6/26/03	A	8/28/03	A
1409	1.04.06	Operational Readiness for Computer Move	57 d	6/9/03	A	8/28/03	A
1410	**1.05**	**New Furniture**	**606 d**	**5/1/02**	**A**	**9/30/04**	
1411	**1.05.01**	**Furniture & Demountable Walls Procurement**	**606 d**	**5/1/02**	**A**	**9/30/04**	
1412	1.05.01.01	Start New Furniture & Demountable Wall Procurement	0 d	5/1/02	A	5/1/02	A
1413	**1.05.01.02**	**Furniture (Third Party & JICS/ORCAS)**	**478 d**	**5/1/02**	**A**	**3/29/04**	
1414	1.05.01.02.01	Prepare Furniture Specification	15 d	5/1/02	A	5/21/02	A
1415	1.05.01.02.02	Review & Finalize Furniture Specification	4 d	5/22/02	A	5/28/02	A
1416	1.05.01.02.03	Prepare & Issue Furniture RFP	4 d	5/29/02	A	6/3/02	A
1417	1.05.01.02.04	Bid & Award Furniture	22 d	6/4/02	A	7/3/02	A
1418	1.05.01.02.05	Manufacture Furniture	57 d	7/8/02	A	9/25/02	A
1419	1.05.01.02.06	Store Furniture Offsite	345 d	9/26/02	A	2/13/04	
1420	1.05.01.02.07	Procure Furniture Deferred from FY03	120 d	10/6/03		3/29/04	
1421	1.05.01.02.08	Procure Additional Guest Chairs	120 d	10/6/03		3/29/04	
1422	1.05.01.02.09	Procure Additional Desk Chairs	120 d	10/6/03		3/29/04	
1423	**1.05.01.02.10**	**Deliver Third Party Furniture to Jobsite**	**78 d**	**5/27/03**	**A**	**9/16/03**	**A**
1424	1.05.01.02.10.1	Deliver CSB Furniture	27 d	5/27/03	A	7/2/03	A
1425	1.05.01.02.10.2	Deliver ETF Furniture	9 d	9/4/03	A	9/16/03	A
1426	1.05.01.02.10.3	Deliver ROB Furniture	36 d	7/15/03	A	9/3/03	A
1427	1.05.01.02.11	Store/Deliver JICS/ORCAS Furniture to Jobsite	20 d	2/20/04		3/18/04	
1428	**1.05.01.03**	**Demountable Panels (Third Party)**	**307 d**	**1/8/03**	**A**	**3/29/04**	
1429	1.05.01.03.01	DOE Approve Demountable Panel Procurement Strategy	11 d	1/8/03	A	1/23/03	A
1430	1.05.01.03.02	Update Demountable Panel Drawings & Specifications	8 d	1/13/03	A	1/23/03	A

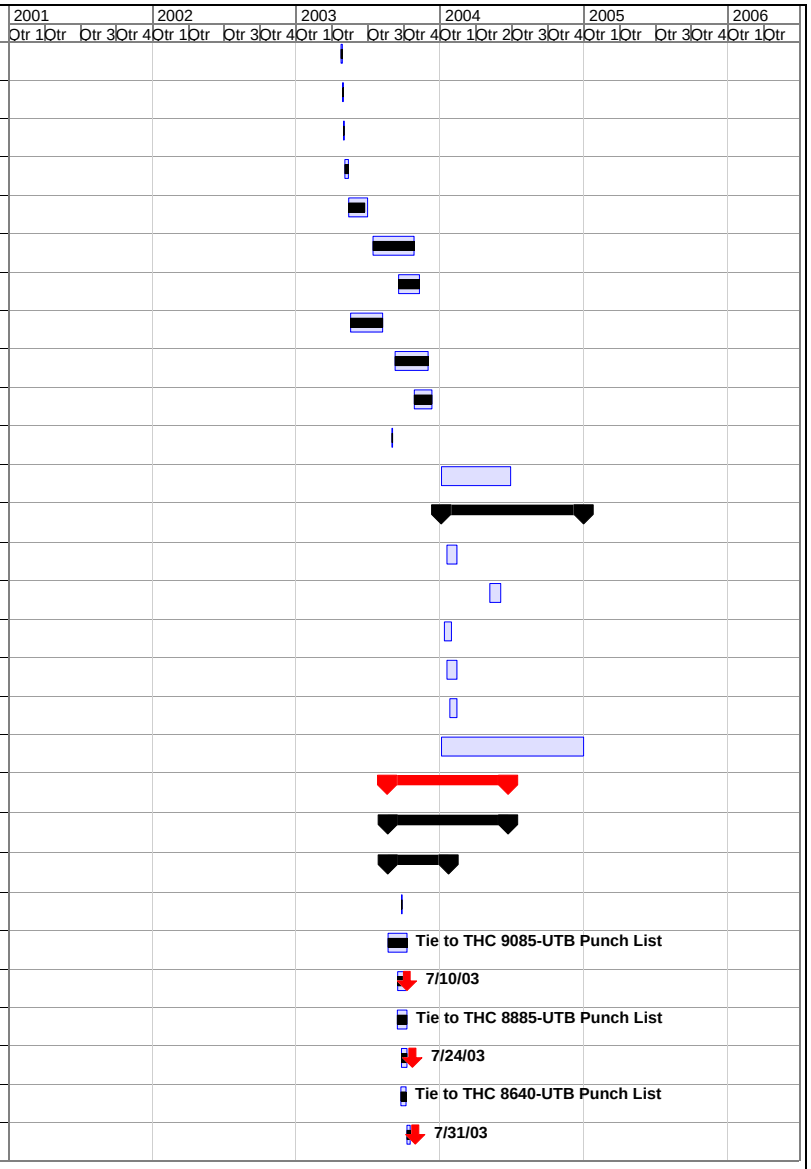


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1431	1.05.01.03.03	Issue Demountable Panel RFP	2 d	1/24/03	A	1/27/03	A
1432	1.05.01.03.04	Receive Vendor Proposal for Demountable Panels	2 d	1/28/03	A	1/29/03	A
1433	1.05.01.03.05	Award Demountable Panels Contract	2 d	1/30/03	A	1/31/03	A
1434	1.05.01.03.06	Place the Third Party Demountable Panel Order	7 d	2/3/03	A	2/11/03	A
1435	1.05.01.03.07	Prepare Shop Drawings & Release for Fabrication-CSB	35 d	2/12/03	A	4/1/03	A
1436	1.05.01.03.08	Prepare Shop Drawings & Release for Fabrication-ROB	71 d	4/15/03	A	7/28/03	A
1437	1.05.01.03.09	Prepare Shop Drawings & Release for Fabrication-ETF	36 d	6/19/03	A	8/11/03	A
1438	1.05.01.03.10	Fabricate Demountable Panels-CSB	59 d	2/17/03	A	5/9/03	A
1439	1.05.01.03.11	Fabricate Demonuntable Panels-ROB	58 d	6/10/03	A	9/2/03	A
1440	1.05.01.03.12	Fabricate Demountable Panels-ETF	33 d	7/29/03	A	9/12/03	A
1441	1.05.01.03.13	UTB Order Demountable Panels for ROB-3W	1 d	6/2/03	A	6/2/03	A
1442	1.05.01.03.14	Procure Additional Demountable Panels for Private Sector Wall Modifications	120 d	10/6/03		3/29/04	
1443	**1.05.01.04**	**Procure Furnishings for Renovated Facilities**	**248 d**	**10/6/03**		**9/30/04**	
1444	1.05.01.04.01	Procure Space Furnishings for Building 3546	20 d	10/20/03		11/14/03	
1445	1.05.01.04.02	Procure Building 6011 Classified Space Furnishings	20 d	2/6/04		3/4/04	
1446	1.05.01.04.03	Procure FSAR Library Bookcases	15 d	10/13/03		10/31/03	
1447	1.05.01.04.04	Procure 4500N Headhouse Furniture	20 d	10/20/03		11/14/03	
1448	1.05.01.04.05	Procure 6025 Conference Room/Library Furniture	15 d	10/27/03		11/14/03	
1449	1.05.01.04.06	Procure Miscellaneous Replacement Furniture for Other Existing Renovated Facilities	248 d	10/6/03		9/30/04	
1450	**1.05.02**	**Furniture & Demountable Walls Installation**	**209 d**	**5/22/03**	**A**	**3/23/04**	
1451	**1.05.02.01**	**Furniture**	**208 d**	**5/23/03**	**A**	**3/23/04**	
1452	**1.05.02.01.01**	**Third Party**	**106 d**	**5/23/03**	**A**	**10/23/03**	
1453	1.05.02.01.01.1	Vendor Install Furniture in CSB C-C101 Conference Room	1 d	6/26/03	A	6/26/03	A
1454	1.05.02.01.01.2	Vendor Install CSB-3 Furniture & Steelcase Architectural Walls	33 d	5/23/03	A	7/10/03	A
1455	1.05.02.01.01.3	Resolve Punchlist Items for CSB-3 Furniture & Steelcase Architectural Walls	16 d	6/17/03	A	7/10/03	A
1456	1.05.02.01.01.4	Vendor Install CSB-2 Furniture	18 d	6/16/03	A	7/10/03	A
1457	1.05.02.01.01.5	Resolve Punchlist Items for CSB-2 Furniture	10 d	6/26/03	A	7/10/03	A
1458	1.05.02.01.01.6	Vendor Install CSB-1 Furniture	8 d	6/25/03	A	7/7/03	A
1459	1.05.02.01.01.7	Resolve Punchlist Items for CSB-1 Furniture	7 d	7/10/03	A	7/18/03	A



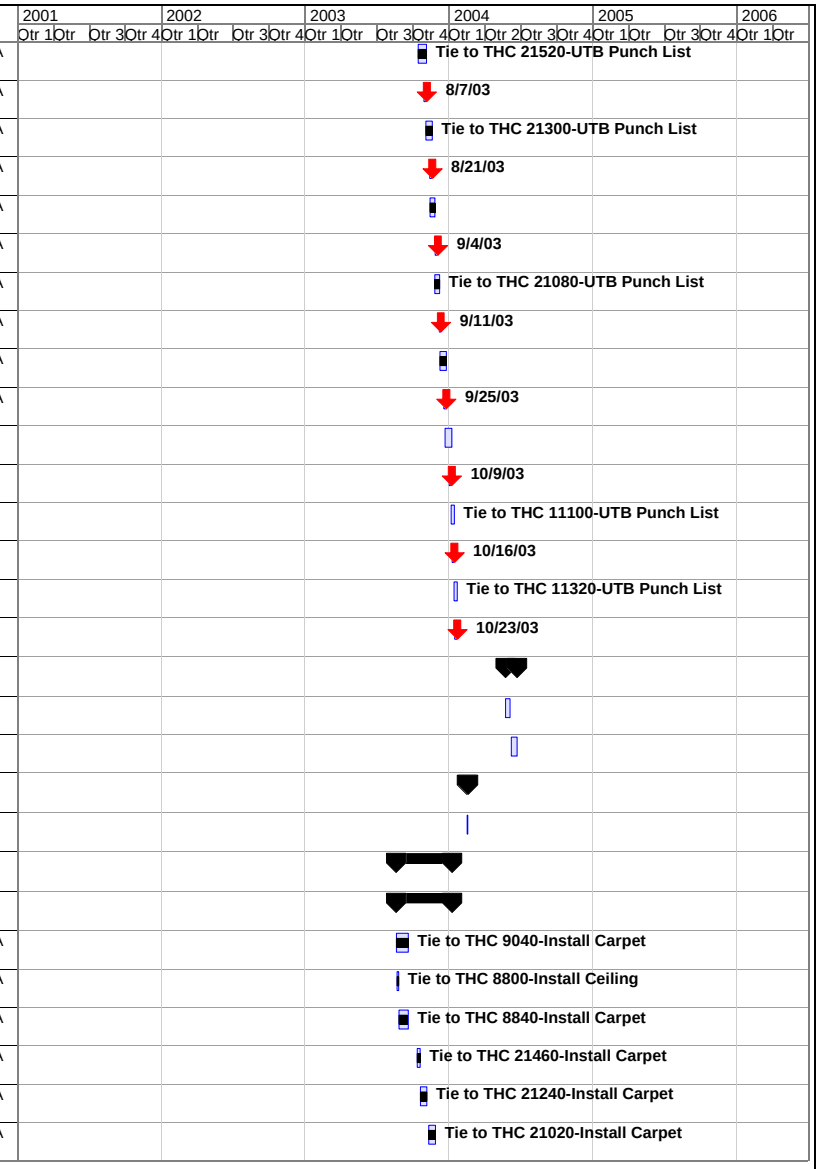
Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

10/24/03 | 4 - 53 | rogress Reported Through 9/30/03

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1460	1.05.02.01.01.8	Vendor Install ROB-3E Furniture	16 d	7/16/03	A	8/6/03	A
1461	1.05.02.01.01.9	Resolve Punchlist Items for ROB-3E Furniture	5 d	7/31/03	A	8/6/03	A
1462	1.05.02.01.01.10	Vendor Install ROB-2E Furniture & Steelcase Architectural Walls	14 d	8/4/03	A	8/21/03	A
1463	1.05.02.01.01.11	Resolve Punchlist Items for ROB-2E Furniture & Steelcase Architectural Walls	6 d	8/14/03	A	8/21/03	A
1464	1.05.02.01.01.12	Vendor Install ROB-2W Furniture	9 d	8/15/03	A	8/27/03	A
1465	1.05.02.01.01.13	Resolve Punchlist Items for ROB-2W Furniture	5 d	8/28/03	A	9/4/03	A
1466	1.05.02.01.01.14	Vendor Install ROB-1W Furniture	8 d	8/27/03	A	9/8/03	A
1467	1.05.02.01.01.15	Resolve Punchlist Items for ROB-1W Furniture	4 d	9/8/03	A	9/11/03	A
1468	1.05.02.01.01.16	Vendor Install ROB-1E Furniture	13 d	9/9/03	A	9/25/03	A
1469	1.05.02.01.01.17	Resolve Punchlist Items for ROB-1E Furniture	5 d	9/19/03	A	9/25/03	A
1470	1.05.02.01.01.18	Vendor Install ROB-3W Furniture & Steelcase Architectural Walls	14 d	9/22/03	A	10/9/03	
1471	1.05.02.01.01.19	Resolve Punchlist Items for ROB-3W Furniture & Steelcase Architectural Walls	5 d	10/3/03		10/9/03	
1472	1.05.02.01.01.20	Vendor Install ETF-1 Furniture	7 d	10/8/03		10/16/03	
1473	1.05.02.01.01.21	Resolve Punchlist Items for ETF-1 Furniture	5 d	10/10/03		10/16/03	
1474	1.05.02.01.01.22	Vendor Install ETF-2 Furniture & Steelcase Architectural Walls	7 d	10/15/03		10/23/03	
1475	1.05.02.01.01.23	Resolve Punchlist Items for ETF-2 Furniture & Steelcase Architecural Walls	5 d	10/17/03		10/23/03	
1476	**1.05.02.01.02**	**JICS/ORCAS**	**22 d**	**2/23/04**		**3/23/04**	
1477	1.05.02.01.02.1	Vendor Install First Floor Furniture	10 d	2/23/04		3/5/04	
1478	1.05.02.01.02.2	Vendor Install Second Floor Furniture	12 d	3/8/04		3/23/04	
1479	**1.05.02.01.03**	**Other Facilities**	**3 d**	**11/17/03**		**11/19/03**	
1480	1.05.02.01.03.1	Building 4500N 2nd Floor for EERE	3 d	11/17/03		11/19/03	
1481	**1.05.02.02**	**Demountable Panels Installation**	**98 d**	**5/22/03**	**A**	**10/10/03**	
1482	**1.05.02.02.01**	**Third Party**	**98 d**	**5/22/03**	**A**	**10/10/03**	
1483	1.05.02.02.01.1	UTB Vendor Deliver & Install CSB-3 Demountable Panels (THC Activity 9260)	21 d	5/22/03	A	6/20/03	A
1484	1.05.02.02.01.2	UTB Vendor Deliver & Install CSB-2 Demountable Panels For Security Room	2 d	5/23/03	A	5/27/03	A
1485	1.05.02.02.01.3	UTB Vendor Deliver & Install CSB-2 Demountable Panels	18 d	5/28/03	A	6/20/03	A
1486	1.05.02.02.01.4	UTB Vendor Deliver & Install ROB-3E Demountable Panels (THC Activity 9360)	6 d	7/14/03	A	7/21/03	A
1487	1.05.02.02.01.5	UTB Vendor Deliver & Install ROB-2 Demountable Panels (THC Activity 9320)	13 d	7/22/03	A	8/7/03	A
1488	1.05.02.02.01.6	UTB Vendor Deliver & Install ROB-1 Demountable Panels (THC Activity 9340)	14 d	8/12/03	A	8/29/03	A



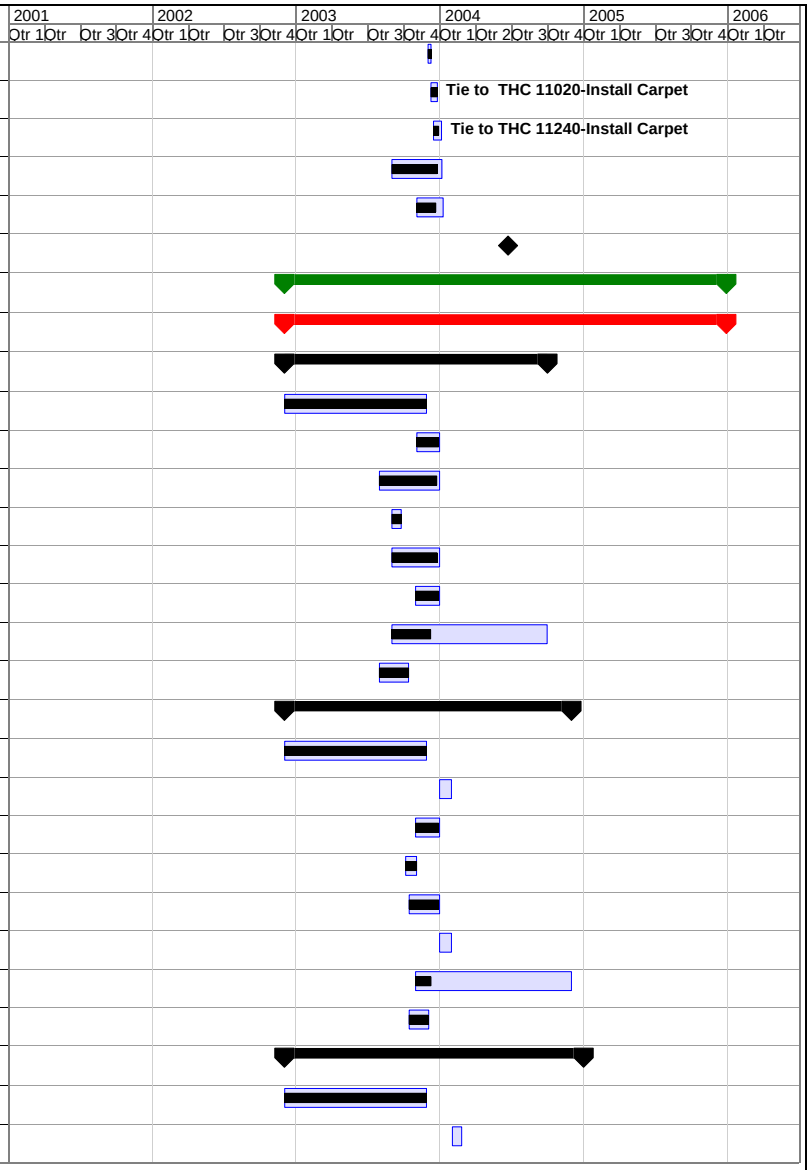
Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

10/24/03 **4 - 54** rogress Reported Through 9/30/03

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1489	1.05.02.02.01.7	UTB Vendor Deliver & Install ROB-3W Demountable Panels	6 d	9/2/03	A	9/9/03	A
1490	1.05.02.02.01.8	UTB Vendor Deliver & Install ETF-1 Demountable Panels (THC Activity 9280)	13 d	9/9/03	A	9/25/03	A
1491	1.05.02.02.01.9	UTB Vendor Deliver & Install ETF-2 Demountable Panels (THC Activity 9300)	15 d	9/16/03	A	10/6/03	
1492	1.05.02.02.01.10	Vendor Fabricate & Deliver Replacement Doors	89 d	6/2/03	A	10/7/03	
1493	1.05.02.02.01.11	UTB Demountable Wall Vendor Install Replecement Doors	49 d	8/4/03	A	10/10/03	
1494	1.05.03	Complete Furniture & Demountable Wall Installation	0 d	3/23/04		3/23/04	
1495	**1.06**	**Facilities Maint. & Operations Planning**	**769 d**	**9/3/02**	**A**	**9/28/05**	
1496	**1.06.01**	**Maintenance Planning for New Facilities (Const. Phase)**	**769 d**	**9/3/02**	**A**	**9/28/05**	
1497	**1.06.01.01**	**Maintenance Planning for CSB (Construction Phase)**	**458 d**	**9/3/02**	**A**	**6/30/04**	
1498	1.06.01.01.01	CSB P&IDs (Construction)	249 d	9/3/02	A	8/29/03	A
1499	1.06.01.01.02	CSB P&IDs (As-built)	42 d	8/4/03	A	10/1/03	
1500	1.06.01.01.03	CSB Component O&M Manuals (May 2003)	106 d	5/1/03	A	10/1/03	
1501	1.06.01.01.04	CSB Construction Photographs (June 2003)	18 d	6/2/03	A	6/25/03	A
1502	1.06.01.01.05	CSB MSDSs (June 2003)	85 d	6/2/03	A	10/1/03	
1503	1.06.01.01.06	CSB Drawings (As-builts)	43 d	8/1/03	A	10/1/03	
1504	1.06.01.01.07	CSB Warranties and Service Contracts (June 2004)	272 d	6/2/03	A	6/30/04	
1505	1.06.01.01.08	CSB Training (May 2003)	50 d	5/1/03	A	7/14/03	A
1506	**1.06.01.02**	**Maintenance Planning for ROB (Construction Phase)**	**500 d**	**9/3/02**	**A**	**8/31/04**	
1507	1.06.01.02.01	ROB P&IDs (Construction)	249 d	9/3/02	A	8/29/03	A
1508	1.06.01.02.02	ROB P&IDs (As-built)	23 d	10/1/03		10/31/03	
1509	1.06.01.02.03	ROB Component O&M Manuals (May 2003)	43 d	8/1/03	A	10/1/03	
1510	1.06.01.02.04	ROB Construction Photographs (August 2003)	21 d	7/7/03	A	8/4/03	A
1511	1.06.01.02.05	ROB MSDSs (August 2003)	55 d	7/16/03	A	10/1/03	
1512	1.06.01.02.06	ROB Drawings (As-built)	23 d	10/1/03		10/31/03	
1513	1.06.01.02.07	ROB Warranties and Service Contracts (August 2004)	272 d	8/1/03	A	8/31/04	
1514	1.06.01.02.08	ROB Training (June 2003)	35 d	7/16/03	A	9/3/03	A
1515	**1.06.01.03**	**Maintenance Planning for ETF (Construction Phase)**	**521 d**	**9/3/02**	**A**	**9/30/04**	
1516	1.06.01.03.01	ETF P&IDs (Construction)	249 d	9/3/02	A	8/29/03	A
1517	1.06.01.03.02	ETF P&IDs (As-built)	18 d	11/3/03		11/26/03	

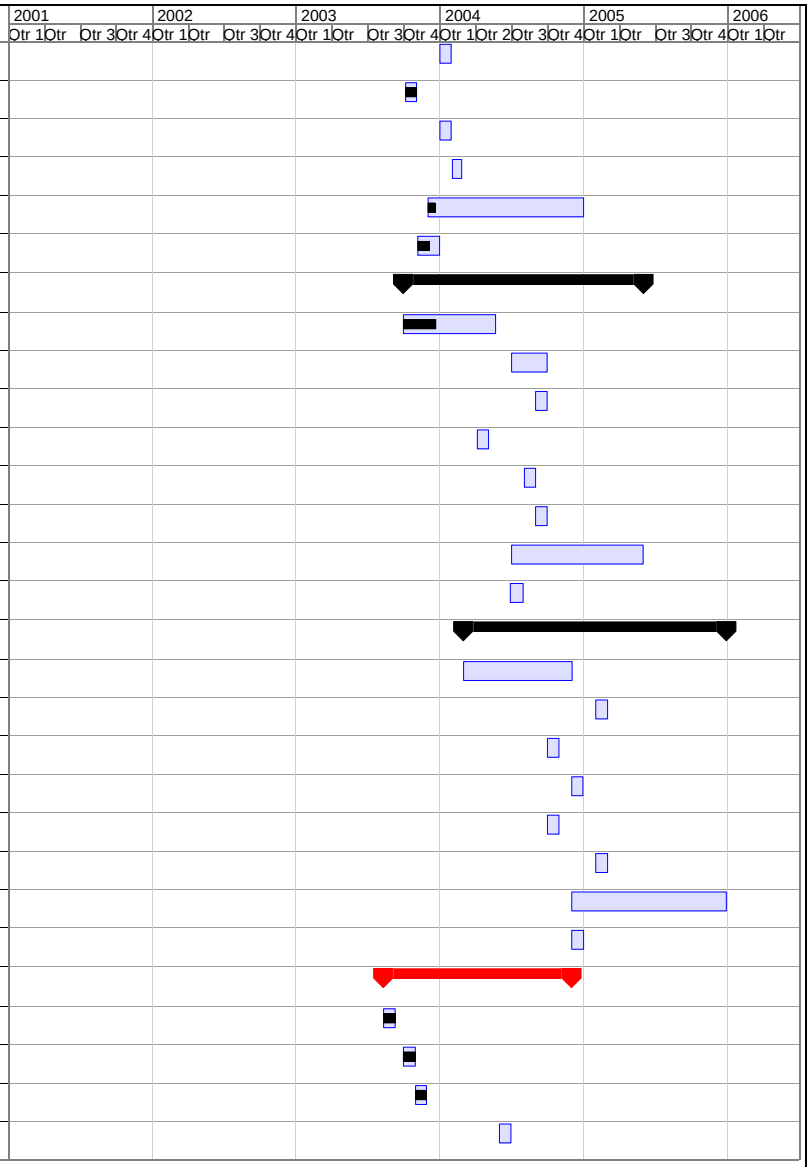


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1518	1.06.01.03.03	ETF Component O&M Manuals (May 2003)	21 d	10/2/03		10/30/03	
1519	1.06.01.03.04	ETF Construction Photographs (August 2003)	21 d	7/7/03	A	8/4/03	A
1520	1.06.01.03.05	ETF MSDSs (September 2003)	21 d	10/2/03		10/30/03	
1521	1.06.01.03.06	ETF Drawings (As-built)	18 d	11/3/03		11/26/03	
1522	1.06.01.03.07	ETF Warranties and Service Contracts (April 2004)	272 d	9/2/03	A	9/30/04	
1523	1.06.01.03.08	ETF Training (September 2003)	39 d	8/7/03	A	10/1/03	
1524	**1.06.01.04**	**Maintenance Planning for JICS/ORCAS (Construction Phase)**	**416 d**	**7/1/03**		**3/1/05**	
1525	1.06.01.04.01	JICS/ORCAS P& IDs (Construction)	160 d	7/1/03	A	2/20/04	
1526	1.06.01.04.02	JICS/ORCAS P&IDs (As-built)	63 d	4/1/04		6/30/04	
1527	1.06.01.04.03	JICS/ORCAS Component O&M Manuals (January 2004)	22 d	6/1/04		6/30/04	
1528	1.06.01.04.04	JICS/ORCAS Construction Photographs (January 2004)	20 d	1/5/04		2/2/04	
1529	1.06.01.04.05	JICS/ORCAS MSDSs (December 2003)	21 d	5/3/04		6/1/04	
1530	1.06.01.04.06	JICS/ORCAS Drawings (As-built)	22 d	6/1/04		6/30/04	
1531	1.06.01.04.07	JICS/ORCAS Warranties and Service Contracts (November 2003)	228 d	4/1/04		3/1/05	
1532	1.06.01.04.08	JICS/ORCAS Training (January 2004)	24 d	3/29/04		4/30/04	
1533	**1.06.01.05**	**Maintenance Planning for RSC (Construction Phase)**	**458 d**	**12/1/03**		**9/28/05**	
1534	1.06.01.05.01	RSC P& IDs (Construction)	190 d	12/1/03		9/1/04	
1535	1.06.01.05.02	RSC P&IDs (As-built)	20 d	11/1/04		11/30/04	
1536	1.06.01.05.03	RSC Component O&M Manuals (July 2004)	20 d	7/1/04		7/30/04	
1537	1.06.01.05.04	RSC Construction Photographs (September 2004)	20 d	9/1/04		9/29/04	
1538	1.06.01.05.05	RSC MSDSs (July 2004)	20 d	7/1/04		7/30/04	
1539	1.06.01.05.06	RSC Drawings (As-built)	20 d	11/1/04		11/30/04	
1540	1.06.01.05.07	RSC Warranties and Service Contracts (September 2005)	269 d	9/1/04		9/28/05	
1541	1.06.01.05.08	RSC Training (June 2004)	21 d	9/1/04		9/30/04	
1542	**1.06.02**	**Building Operational Readiness**	**328 d**	**5/12/03**	**A**	**8/31/04**	
1543	1.06.02.01	CSB Building Operational Readiness (May 2003)	21 d	5/12/03	A	6/10/03	A
1544	1.06.02.02	ROB Building Operational Readiness (July 2003)	21 d	7/1/03	A	7/31/03	A
1545	1.06.02.03	ETF Building Operational Readiness (August 2003)	21 d	8/1/03	A	8/29/03	A
1546	1.06.02.04	JICS/ORCAS Building Operational Readiness (February 2004)	22 d	3/1/04		3/30/04	

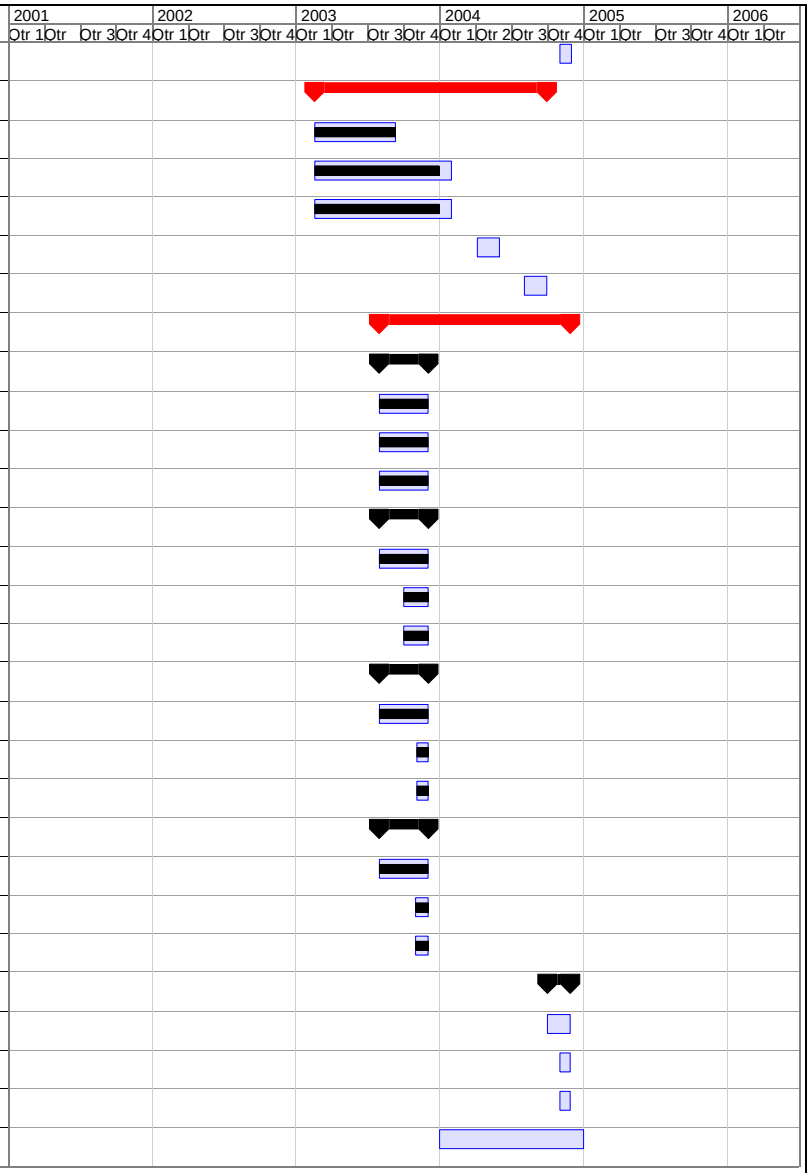


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1547	1.06.02.05	RSC Building Operational Readiness (August 2004)	22 d	8/2/04		8/31/04	
1548	**1.06.03**	**Facility Use Agreements**	**403 d**	**11/18/02**	**A**	**6/29/04**	
1549	1.06.03.01	CSB FUA	140 d	11/18/02	A	6/11/03	A
1550	1.06.03.02	ROB FUA	239 d	11/18/02	A	10/31/03	
1551	1.06.03.03	ETF FUA	239 d	11/18/02	A	10/31/03	
1552	1.06.03.04	JICS/ORCAS FUA	40 d	1/5/04		3/1/04	
1553	1.06.03.05	RSC FUA	41 d	5/3/04		6/29/04	
1554	**1.06.04**	**Maintenance Program Planning**	**333 d**	**5/1/03**	**A**	**8/27/04**	
1555	**1.06.04.01**	**CSB Maintenance Program Plan**	**85 d**	**5/1/03**	**A**	**9/2/03**	**A**
1556	1.06.04.01.01	CSB Annual Work Plan (May 2003)	85 d	5/1/03	A	9/2/03	A
1557	1.06.04.01.02	CSB Preventive Maintenance Program (May 2003)	85 d	5/1/03	A	9/2/03	A
1558	1.06.04.01.03	CSB Predictive Maintenance Program (May 2003)	85 d	5/1/03	A	9/2/03	A
1559	**1.06.04.02**	**ROB Maintenance Program Plan**	**85 d**	**5/1/03**	**A**	**9/2/03**	**A**
1560	1.06.04.02.01	ROB Annual Work Plan (May 2003)	85 d	5/1/03	A	9/2/03	A
1561	1.06.04.02.02	ROB Preventive Maintenance Program (July 2003)	42 d	7/2/03	A	9/2/03	A
1562	1.06.04.02.03	ROB Predictive Maintenance Program (July 2003)	42 d	7/2/03	A	9/2/03	A
1563	**1.06.04.03**	**ETF Maintenance Program Plan**	**85 d**	**5/1/03**	**A**	**9/2/03**	**A**
1564	1.06.04.03.01	ETF Annual Work Plan (May 2003)	85 d	5/1/03	A	9/2/03	A
1565	1.06.04.03.02	ETF Preventive Maintenance Program (August 2003)	21 d	8/4/03	A	9/2/03	A
1566	1.06.04.03.03	ETF Predictive Maintenance Program (August 2003)	21 d	8/4/03	A	9/2/03	A
1567	**1.06.04.04**	**JICS/ORCAS Maintenance Program Plan**	**85 d**	**5/1/03**	**A**	**9/2/03**	**A**
1568	1.06.04.04.01	JICS/ORCAS Annual Work Plan (May 2003)	85 d	5/1/03	A	9/2/03	A
1569	1.06.04.04.02	JICS/ORCAS Preventive Maintenance Program (October 2003)	22 d	8/1/03	A	9/2/03	A
1570	1.06.04.04.03	JICS/ORCAS Predictive Maintenance Program (October 2003)	22 d	8/1/03	A	9/2/03	A
1571	**1.06.04.05**	**RSC Maintenance Program Plan**	**40 d**	**7/1/04**		**8/27/04**	
1572	1.06.04.05.01	RSC Annual Work Plan (May 2004)	40 d	7/1/04		8/27/04	
1573	1.06.04.05.02	RSC Preventive Maintenance Program (August 2004)	20 d	8/2/04		8/27/04	
1574	1.06.04.05.03	RSC Predictive Maintenance Program (August 2004)	20 d	8/2/04		8/27/04	
1575	**1.06.05**	**FMD Move Support-FY04**	**251 d**	**10/1/03**		**9/30/04**	



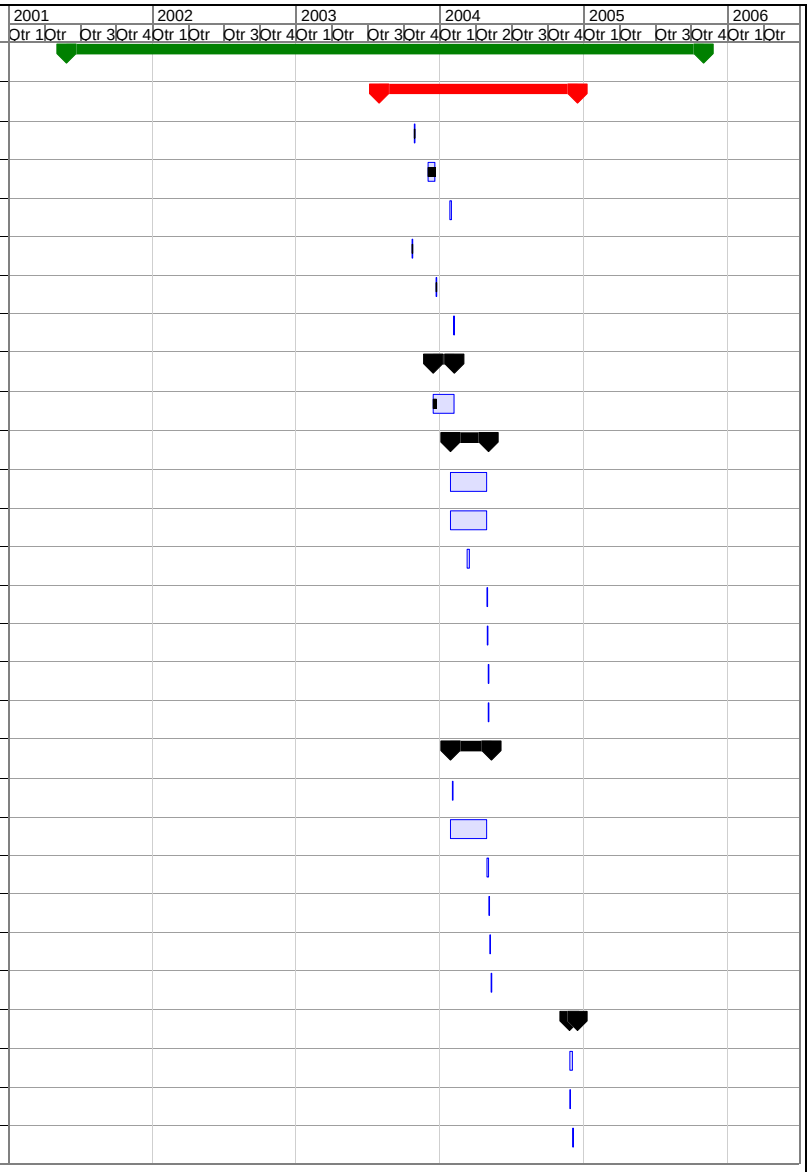
Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

10/24/03 4 - 57 rogress Reported Through 9/30/03

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1576	**1.07**	**Security, Fire, & ESH Tech Integration**	**1108 d**	**2/26/01**	**A**	**8/1/05**	
1577	**1.07.01**	**Security**	**345 d**	**5/1/03**	**A**	**9/15/04**	
1578	1.07.01.01	Verify Installation Certification - CSB	2 d	7/29/03	A	7/30/03	A
1579	1.07.01.02	Verify Installation Certification - ROB	14 d	9/2/03	A	9/19/03	A
1580	1.07.01.03	Verify Installation Certification - ETF	5 d	10/27/03		10/31/03	
1581	1.07.01.05	CSB Security Room Ready for Occupancy	1 d	7/23/03	A	7/23/03	A
1582	1.07.01.06	ROB Ready for Occupancy	1 d	9/22/03	A	9/22/03	A
1583	1.07.01.07	ETF Ready for Occupancy	1 d	11/6/03		11/6/03	
1584	**1.07.01.08**	**Third Party Building Access**	**40 d**	**9/15/03**	**A**	**11/7/03**	
1585	1.07.01.08.01	Install Hardware & Controls for Handicapped Access on Six Entrance Doors for ROB	40 d	9/15/03	A	11/7/03	
1586	**1.07.01.09**	**ROB Classified Area**	**63 d**	**10/29/03**		**2/2/04**	
1587	1.07.01.09.01	Order Doors, Frames, & Hardware for Converting the ROB Conference Room Into a Classified Conference	60 d	10/29/03		1/28/04	
1588	1.07.01.09.02	Order Door, Frame, & Hardware for Converting ROB Area Into Classified Area	60 d	10/29/03		1/28/04	
1589	1.07.01.09.03	Extend Walls to Ceiling for ROB Classified Conference Room and Classified Space	5 d	12/10/03		12/16/03	
1590	1.07.01.09.04	Install Doors for ROB Classified Conference Room & Classified Space	1 d	1/29/04		1/29/04	
1591	1.07.01.09.05	Test ROB Classified Space (WSI)	1 d	1/30/04		1/30/04	
1592	1.07.01.09.06	Verify ROB Classified Space Badge Readers & Alarms	1 d	2/2/04		2/2/04	
1593	1.07.01.09.07	ROB Classified Area Certified	1 d	2/2/04		2/2/04	
1594	**1.07.01.10**	**Building 6011 Classified Area**	**68 d**	**10/29/03**		**2/9/04**	
1595	1.07.01.10.01	Install Badge Reader on West Wing Interior Door in Bldg. 6011	1 d	11/3/03		11/3/03	
1596	1.07.01.10.02	Order Classified Doors and Frames for 3 Doors in Bldg. 6011	60 d	10/29/03		1/28/04	
1597	1.07.01.10.03	Install Badge Readers and Alarms for Classified Conference Room	3 d	1/29/04		2/2/04	
1598	1.07.01.10.04	Verify Alarms in Bldg. 6011 Classified Conference Room	3 d	2/3/04		2/5/04	
1599	1.07.01.10.05	Test Bldg. 6011 Classified Conference Room Badge Readers and Alarms	1 d	2/6/04		2/6/04	
1600	1.07.01.10.06	Input Access List for Bldg. 6011 Classified Conference Room Badge Readers	1 d	2/9/04		2/9/04	
1601	**1.07.01.11**	**RSC**	**13 d**	**8/27/04**		**9/15/04**	
1602	1.07.01.11.01	Verify Installation Certification - RSC	5 d	8/27/04		9/2/04	
1603	1.07.01.11.02	Tie-in Security Fiber-RSC	1 d	8/27/04		8/27/04	
1604	1.07.01.11.03	Tie-in Security Controls to SACS-RSC	1 d	9/3/04		9/3/04	

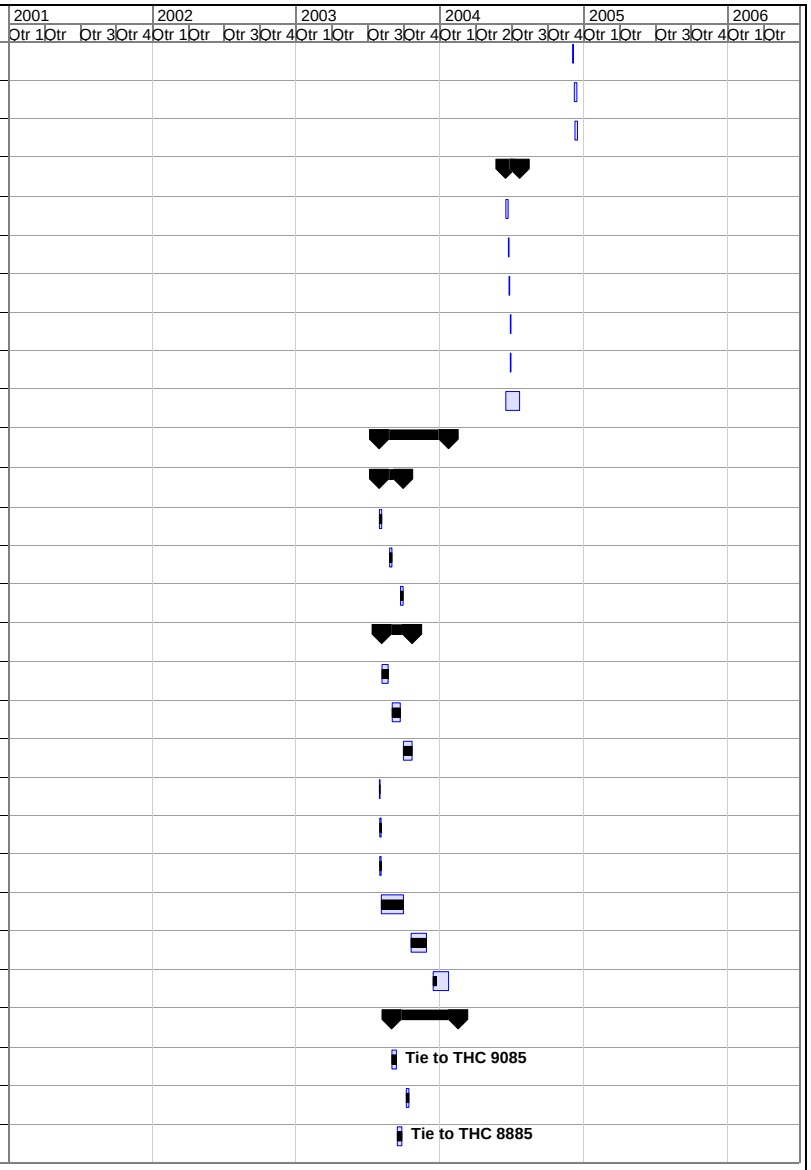


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1605	1.07.01.11.04	Tie-in Alarm Circuits-RSC	1 d	9/3/04		9/3/04	
1606	1.07.01.11.05	SACS Terminal Availabililty & Equipment Reload	5 d	9/7/04		9/13/04	
1607	1.07.01.11.06	Move Badge Office & Visitor Control to RSC	5 d	9/9/04		9/15/04	
1608	**1.07.01.12**	**JICS/ORCAS**	**25 d**	**3/17/04**		**4/21/04**	
1609	1.07.01.12.01	Install Readers/Alarms-JICS/ORCAS	5 d	3/17/04		3/23/04	
1610	1.07.01.12.02	Tie-in Security Fiber-JICS/ORCAS	1 d	3/24/04		3/24/04	
1611	1.07.01.12.03	Verify Installation Certification-JICS/ORCAS	2 d	3/25/04		3/26/04	
1612	1.07.01.12.04	Tie-in Security Controls to SACS-JICS/ORCAS	1 d	3/29/04		3/29/04	
1613	1.07.01.12.05	Tie-in Alarm Circuits-JICA/ORCAS	1 d	3/29/04		3/29/04	
1614	1.07.01.12.06	Install Hardware & Controls for Handicapped Access-JICS/ORCAS	25 d	3/17/04		4/21/04	
1615	**1.07.01.13**	**Door Lock Cores and Keys Procurement**	**123 d**	**5/1/03**	**A**	**10/24/03**	**A**
1616	**1.07.01.13.01**	**Establish Seating Chart**	**42 d**	**5/1/03**	**A**	**6/30/03**	**A**
1617	1.07.01.13.01.1	Establish Seating Chart-CSB	5 d	5/1/03	A	5/7/03	A
1618	1.07.01.13.01.2	Establish Seating Chart-ROB	5 d	5/27/03	A	6/2/03	A
1619	1.07.01.13.01.3	Establish Seating Chart-ETF	5 d	6/24/03	A	6/30/03	A
1620	**1.07.01.13.02**	**Develop Keying Matrix**	**52 d**	**5/8/03**	**A**	**7/23/03**	**A**
1621	1.07.01.13.02.1	Develop Keying Matrix-CSB	12 d	5/8/03	A	5/23/03	A
1622	1.07.01.13.02.2	Develop Keying Matrix-ROB	15 d	6/3/03	A	6/23/03	A
1623	1.07.01.13.02.3	Develop Keying Matrix-ETF	15 d	7/1/03	A	7/23/03	A
1624	1.07.01.13.03	Prepare Door Lock Cores & Keys Specifications	1 d	5/1/03	A	5/1/03	A
1625	1.07.01.13.04	Prepare & Issue Door Lock Cores & Keys RFQ	2 d	5/2/03	A	5/5/03	A
1626	1.07.01.13.05	Award Door Lock Cores & Keys Contract	2 d	5/2/03	A	5/5/03	A
1627	1.07.01.13.06	Order & Deliver Door Lock Cores & Keys-CSB	40 d	5/6/03	A	7/1/03	A
1628	1.07.01.13.07	Order & Deliver Door Lock Cores & Keys-ROB	30 d	7/21/03	A	8/29/03	A
1629	1.07.01.13.08	Order & Deliver Door Lock Cores & Keys-ETF	30 d	9/15/03	A	10/24/03	
1630	**1.07.01.14**	**Door Lock Cores and Keys Installation**	**118 d**	**6/2/03**	**A**	**11/17/03**	
1631	1.07.01.14.01	UTB Install Door Lock Cores CSB Third Floor	10 d	6/2/03	A	6/13/03	A
1632	1.07.01.14.02	UTB Install Door Lock Cores CSB Third Floor Replacement Doors	5 d	7/9/03	A	7/15/03	A
1633	1.07.01.14.03	UTB Install Door Lock Cores CSB Second Floor	10 d	6/16/03	A	6/27/03	A

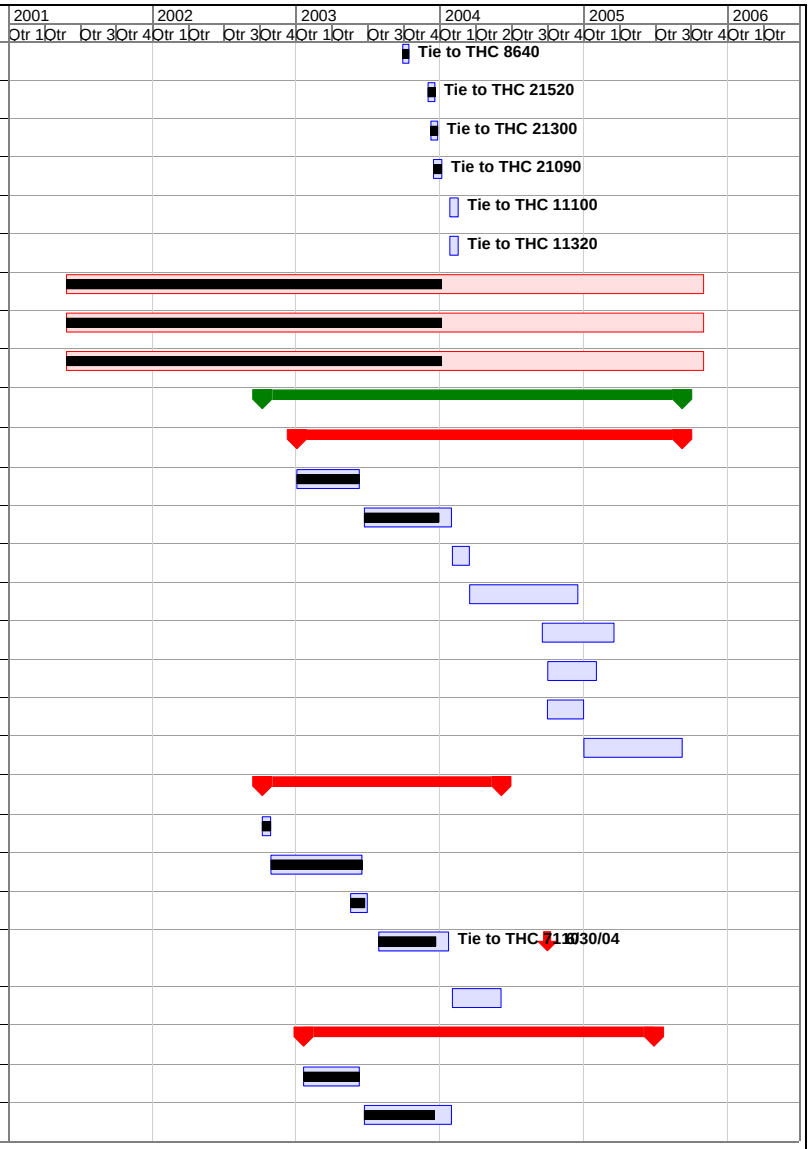


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1634	1.07.01.14.04	UTB Install Door Lock Cores CSB First Floor	10 d	6/30/03	A	7/15/03	A
1635	1.07.01.14.05	UTB Install Door Lock Cores ROB Third Floor	14 d	9/2/03	A	9/19/03	A
1636	1.07.01.14.06	UTB Install Door Lock Cores ROB Second Floor	14 d	9/9/03	A	9/26/03	A
1637	1.07.01.14.07	UTB Install Door Lock Cores ROB First Floor	16 d	9/16/03	A	10/7/03	
1638	1.07.01.14.08	UTB Install Door Lock Cores ETF First Floor	16 d	10/27/03		11/17/03	
1639	1.07.01.14.09	UTB Install Door Lock Cores ETF Second Floor	16 d	10/27/03		11/17/03	
1640	1.07.02	Fire Protection	1108 d	2/26/01	A	8/1/05	
1641	1.07.03	Safety & Health	1108 d	2/26/01	A	8/1/05	
1642	1.07.04	Environmental Compliance	1108 d	2/26/01	A	8/1/05	
1643	**1.08**	**East Campus Infrastructure Upgrade Projects**	**732 d**	**7/8/02**	**A**	**6/8/05**	
1644	**1.08.01**	**Quad Common Area IGPP**	**669 d**	**10/4/02**	**A**	**6/8/05**	
1645	1.08.01.01	Quad Predesign	107 d	10/4/02	A	3/11/03	A
1646	1.08.01.02	Quad Design	155 d	3/24/03	A	10/31/03	
1647	1.08.01.03	Quad Procurement of Const Contractor	30 d	11/3/03		12/16/03	
1648	1.08.01.04	Quad Construction - Quad Open Area	188 d	12/17/03		9/16/04	
1649	1.08.01.05	Quad Construction - Street Construction	126 d	6/18/04		12/17/04	
1650	1.08.01.06	Quad Construction - Hardscape Adjacent to RSC	85 d	7/2/04		11/2/04	
1651	1.08.01.07	Quad Construction-Procure Landscape Contractor	63 d	7/1/04		9/30/04	
1652	1.08.01.08	Quad Construction - Final Landscape and Groundcover	171 d	10/1/04		6/8/05	
1653	**1.08.02**	**Central Avenue Extension IGPP**	**417 d**	**7/8/02**	**A**	**3/5/04**	
1654	1.08.02.01	Central Ave. Predesign	16 d	7/8/02	A	7/29/02	A
1655	1.08.02.02	Central Ave. Design	159 d	7/30/02	A	3/18/03	A
1656	1.08.02.03	Central Ave. Procurement of Const. Contractor	31 d	2/17/03	A	3/31/03	A
1657	1.08.02.04	Central Ave. Phase I Const (Road Base & Final Surfacing, Hardscape, Lighting, Irrigation, and Concrete Sub Base for Pavers)	124 d	4/30/03	A	10/24/03	
1658	1.08.02.05	Central Ave. Phase II Const (Landscaping & Gathering Area)	84 d	11/3/03		3/5/04	
1659	**1.08.03**	**Main Entrance Mods & Parking IGPP**	**607 d**	**10/21/02**	**A**	**3/28/05**	
1660	1.08.03.01	Entry & Parking Predesign	96 d	10/21/02	A	3/11/03	A
1661	1.08.03.02	Entry & Parking Design	155 d	3/24/03	A	10/31/03	

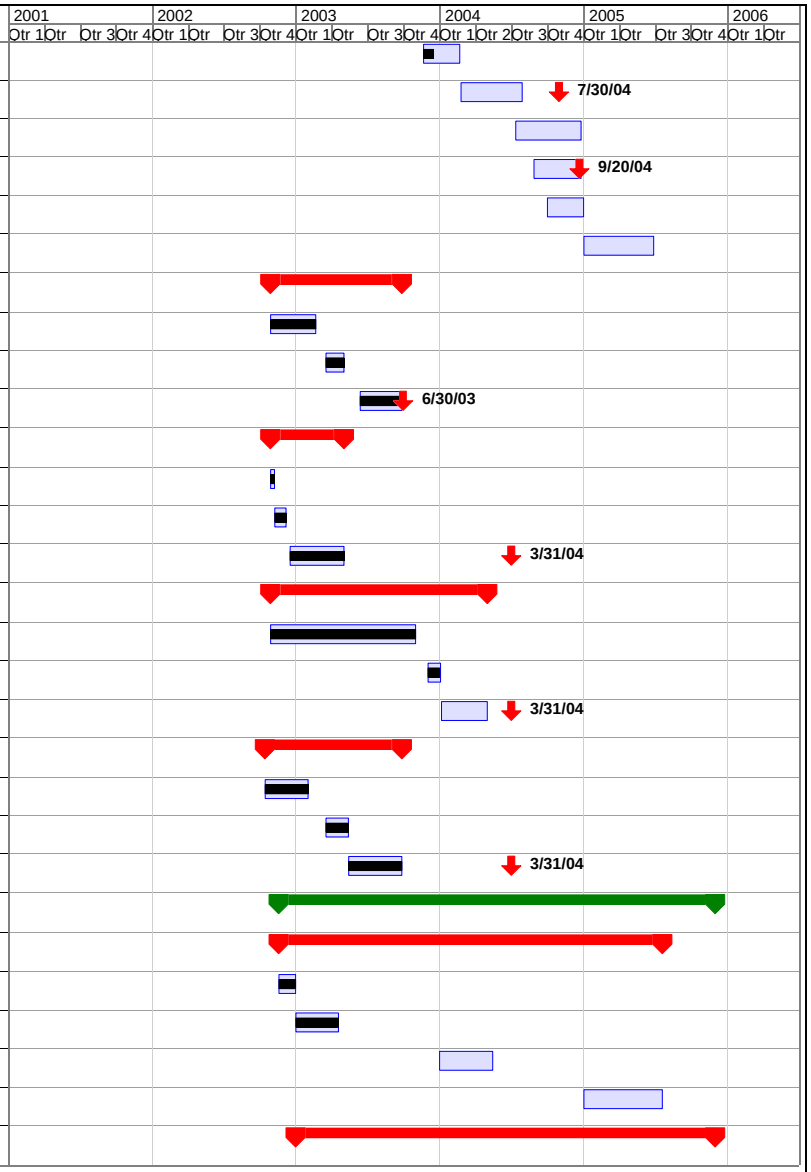


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1662	1.08.03.03	Entry & Parking Procurement of Const Contractor	65 d	8/22/03	A	11/21/03	
1663	1.08.03.04	Entry & Parking Phase I Const(Entry Road& N Parking)	105 d	11/24/03		4/27/04	
1664	1.08.03.05	Entry&Parking Phase II Const (Interpretative Terr)	116 d	4/12/04		9/24/04	
1665	1.08.03.06	Quad Area Const Phase III (Visitor Ctr Plaza & Passenger Drop-off)	82 d	5/28/04		9/24/04	
1666	1.08.03.07	Entry&Parking Phase IV-Procure Landscape Contractor	63 d	7/1/04		9/30/04	
1667	1.08.03.08	Entry&Parking Phase IV-Landscaping	120 d	10/1/04		3/28/05	
1668	**1.08.04**	**Storm Drain Mods IGPP**	**231 d**	**7/29/02**	**A**	**6/27/03**	**A**
1669	1.08.04.01	Storm Drain Mods Design	82 d	7/29/02	A	11/20/02	A
1670	1.08.04.02	Procure Const Contractor for Storm Drain Mods & Sewage Collection Upgrade	30 d	12/17/02	A	1/31/03	A
1671	1.08.04.03	Storm Drain Mods Construction	75 d	3/13/03	A	6/27/03	A
1672	**1.08.05**	**Natural Gas Line IGPP**	**128 d**	**7/29/02**	**A**	**1/31/03**	**A**
1673	1.08.05.01	Natural Gas Line Design	8 d	7/29/02	A	8/7/02	A
1674	1.08.05.02	Natural Gas Line Procurement of Const Contractor	21 d	8/8/02	A	9/6/02	A
1675	1.08.05.03	Natural Gas Line Construction	94 d	9/16/02	A	1/31/03	A
1676	**1.08.06**	**Utility Mods IGPP**	**377 d**	**7/29/02**	**A**	**1/30/04**	
1677	1.08.06.01	Utility Mods Design (Hot & Chilled Water Lines - 02, Potable Water Line - 03)	254 d	7/29/02	A	8/1/03	A
1678	1.08.06.02	Utility Mods Procurement of Const Contractor (Potable Water)	24 d	9/2/03	A	10/3/03	
1679	1.08.06.03	Utility Mods Construction (Potable Water)	79 d	10/6/03		1/30/04	
1680	**1.08.07**	**Upgrade Sewage Collection IGPP**	**241 d**	**7/15/02**	**A**	**6/27/03**	**A**
1681	1.08.07.01	Sewage Collection Upgrade Design	79 d	7/15/02	A	11/1/02	A
1682	1.08.07.02	Procure Const Contractor for Sewage Collection Upgrade & Storm Drain Mods	37 d	12/17/02	A	2/11/03	A
1683	1.08.07.03	Sewage Collection Construction	96 d	2/12/03	A	6/27/03	A
1684	**1.09**	**Excess Materials Disposition**	**759 d**	**8/19/02**	**A**	**8/30/05**	
1685	**1.09.01**	**Inventory**	**666 d**	**8/19/02**	**A**	**4/18/05**	
1686	1.09.01.01	Inventory Bldg 9204-1	30 d	8/19/02	A	9/30/02	A
1687	1.09.01.02	Inventory Buildings FY 2003	74 d	10/1/02	A	1/17/03	A
1688	1.09.01.03	Inventory Buildings FY 2004	92 d	10/1/03		2/13/04	
1689	1.09.01.04	Inventory Buildings FY 2005	135 d	10/1/04		4/18/05	
1690	**1.09.02**	**Disposition**	**729 d**	**10/1/02**	**A**	**8/30/05**	

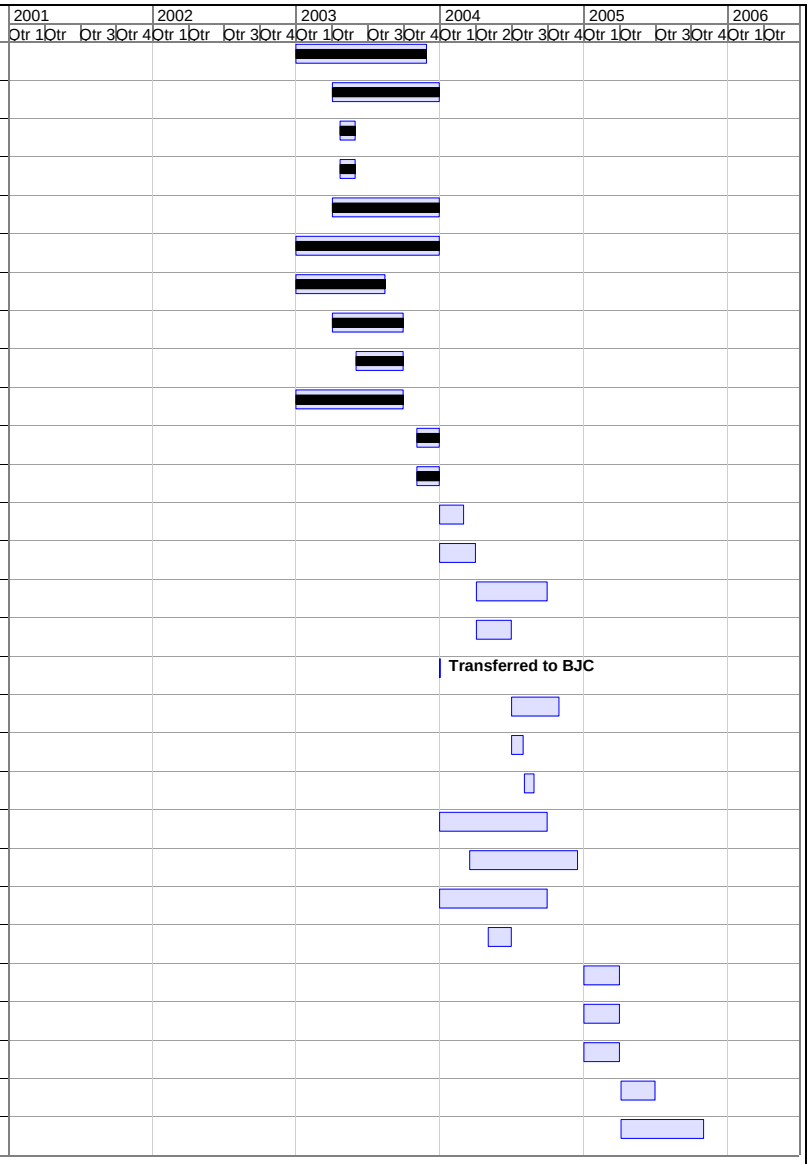


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1691	1.09.02.01	Disposition Materials-Bldg 2011 Electric & AC Service Ctr	229 d	10/1/02	A	8/29/03	A
1692	1.09.02.02	Disposition Materials-Bldg 2024 QA Inspection Office	188 d	1/2/03	A	9/30/03	A
1693	1.09.02.03	Disposition Materials-Bldg 2093 Environmental Storage Bldg	29 d	1/21/03	A	2/28/03	A
1694	1.09.02.04	Disposition Materials-Bldg 3013 Energy Develop Storage Bldg	29 d	1/21/03	A	2/28/03	A
1695	1.09.02.05	Disposition Materials-Bldg 7600 Experimental Gas Cooled Reactor	188 d	1/2/03	A	9/30/03	A
1696	1.09.02.06	Disposition Materials-Bldg 9204-1 Engineering Technology	250 d	10/1/02	A	9/30/03	A
1697	1.09.02.07	Disposition Materials-Bldg 9401-1 Engr Tech & Lab Facility	156 d	10/1/02	A	5/15/03	A
1698	1.09.02.08	Disposition Materials-Bldg 9743-2 Pigeon Quarters	125 d	1/2/03	A	6/30/03	A
1699	1.09.02.09	Disposition Materials-Bldg9770-02 Radiation Source	84 d	3/3/03	A	6/30/03	A
1700	1.09.02.10	Disposition Materials-Bldg 9999-3 Elec Switchgear & Rectifier	187 d	10/1/02	A	6/30/03	A
1701	1.09.02.11	Disposition Materials-Bldg 9610-2 Flammable Materials Storage	41 d	8/4/03	A	9/30/03	A
1702	1.09.02.12	Disposition Materials-Bldg 9999-4 Electrical Equipment	41 d	8/4/03	A	9/30/03	A
1703	1.09.02.13	Disposition Materials-Bldg 2019 Laser Lab	42 d	10/1/03		12/1/03	
1704	1.09.02.14	Disposition Materials-Bldg 3037 Chem Tech Offices	62 d	10/1/03		12/31/03	
1705	1.09.02.15	Disposition Materials-Bldg 3504 Geosciences Lab	126 d	1/2/04		6/30/04	
1706	1.09.02.16	Disposition Materials-Bldg 3523 RIS Sensor Development, South	63 d	1/2/04		3/31/04	
1707	1.09.02.17	Disposition Materials-Bldg 3542 Storage Bldg for 3506 & 3517	1 d	10/1/03		10/1/03	
1708	1.09.02.18	Disposition Materials-Bldg 3587 Inst Lab Annex & Clothing Storage	83 d	4/1/04		7/30/04	
1709	1.09.02.19	Disposition Materials-Bldg 3605 TSD Storage Bldg	21 d	4/1/04		4/30/04	
1710	1.09.02.20	Disposition Materials-Bldg 3610 Storage Bldg	20 d	5/3/04		5/28/04	
1711	1.09.02.21	Disposition Materials-Bldg 9210 Mammalian Genetics	188 d	10/1/03		6/30/04	
1712	1.09.02.22	Disposition Materials-Bldg 9224 Molecular Biology Facility	188 d	12/16/03		9/15/04	
1713	1.09.02.23	Disposition Materials-Bldg 9422 LCTF Compressor	188 d	10/1/03		6/30/04	
1714	1.09.02.24	Disposition Materials-Bldg 9999-1 Motor Generator	43 d	2/2/04		3/31/04	
1715	1.09.02.25	Disposition Materials-Bldg 2008 ORNL Whole Body Counter	62 d	10/1/04		12/31/04	
1716	1.09.02.26	Disposition Materials-Bldg 2009 Cafeteria Warehouse	62 d	10/1/04		12/31/04	
1717	1.09.02.27	Disposition Materials-Bldg 2010 ORNL Cafeteria	62 d	10/1/04		12/31/04	
1718	1.09.02.28	Disposition Materials-Bldg 2517 HRDP/Training	61 d	1/4/05		3/31/05	
1719	1.09.02.29	Disposition Materials-Bldg 3003 Surface Mod & Characterization	145 d	1/4/05		8/1/05	

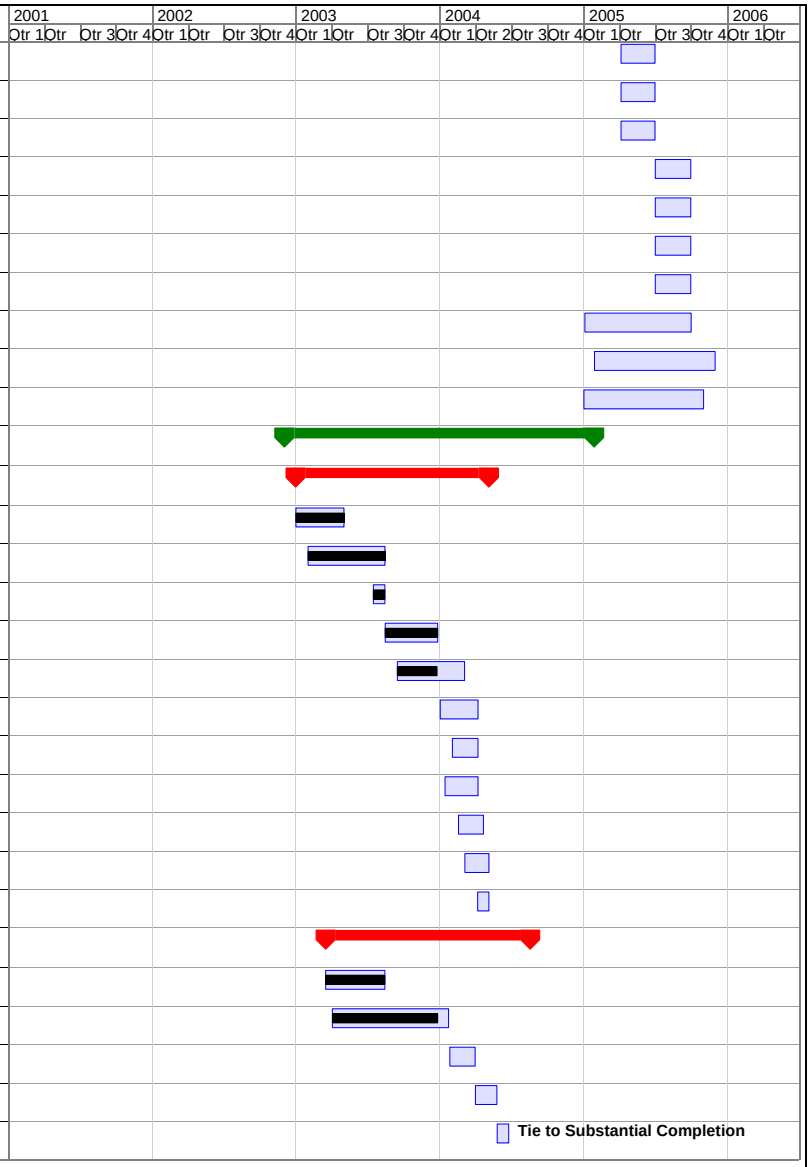


Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish	
1720	1.09.02.30	Disposition Materials-Bldg 3017 Chem Tech Div Annex	61 d	1/4/05		3/31/05	
1721	1.09.02.31	Disposition Materials-Bldg 3036 Radioisotope Matl Shipping & Packaging	61 d	1/4/05		3/31/05	
1722	1.09.02.32	Disposition Materials-Bldg 3080 Superconductivity Lab	61 d	1/4/05		3/31/05	
1723	1.09.02.33	Disposition Materials-Bldg 3100 Source & Special Material Vault	64 d	4/1/05		6/30/05	
1724	1.09.02.34	Disposition Materials-Bldg 3115 Solid State Offices	64 d	4/1/05		6/30/05	
1725	1.09.02.35	Disposition Materials-Bldg 3136 Equipment Test Facility (3019)	64 d	4/1/05		6/30/05	
1726	1.09.02.36	Disposition Materials-Bldg 3543 Maces Storage Bldg	64 d	4/1/05		6/30/05	
1727	1.09.02.37	Disposition Materials-Bldg 3503 High Rad Level Chem Eng Bldg	187 d	10/4/04		7/1/05	
1728	1.09.02.38	Disposition Materials-Bldg 9201-2 Fusion Energy Admin & Lab Bldg	208 d	10/29/04		8/30/05	
1729	1.09.02.39	Disposition Materials-Bldg 9204-3 Isotope Separations	207 d	10/1/04		8/1/05	
1730	**1.10**	**Audio/Video Equipment**	**540 d**	**9/3/02**	**A**	**10/27/04**	
1731	**1.10.01**	**Third Party Audio/Video**	**334 d**	**10/1/02**	**A**	**2/3/04**	
1732	1.10.01.01	Identify End-User Requirements-Third Party A/V	83 d	10/1/02	A	1/31/03	A
1733	1.10.01.02	Formulate Designs-Third Party A/V	133 d	11/1/02	A	5/15/03	A
1734	1.10.01.03	Prepare Procurement Package For Funding-Third Party A/V	21 d	4/16/03	A	5/15/03	A
1735	1.10.01.04	Procure Phase I Equipment-Third Party A/V	92 d	5/16/03	A	9/26/03	A
1736	1.10.01.05	Install Phase I Equipment/Systems-Third Party A/V	118 d	6/16/03	A	12/3/03	
1737	1.10.01.06	Test Phase I Equipment/Systems-Third Party A/V	63 d	10/3/03		1/6/04	
1738	1.10.01.07	Train Phase I Users-Third Party A/V	42 d	11/3/03		1/6/04	
1739	1.10.01.08	Procure Phase II Equipment-Third Party A/V	55 d	10/15/03		1/6/04	
1740	1.10.01.09	Install Phase II Equipment/Systems-Third Party A/V	40 d	11/18/03		1/20/04	
1741	1.10.01.10	Test Phase II Equipment/Systems-Third Party A/V	40 d	12/4/03		2/3/04	
1742	1.10.01.11	Train Phase II Users-Third Party A/V	20 d	1/6/04		2/3/04	
1743	**1.10.02**	**JICS/ORCAS Audio/Video**	**356 d**	**12/16/02**	**A**	**5/18/04**	
1744	1.10.02.01	Identify End-User Requirements-JICS/ORCAS A/V	104 d	12/16/02	A	5/15/03	A
1745	1.10.02.02	Formulate Designs-JICS/ORCAS A/V	206 d	1/2/03	A	10/24/03	
1746	1.10.02.03	Prepare Procurement Pkg For Funding-JICS/ORCAS A/V	43 d	10/27/03		12/30/03	
1747	1.10.02.04	Procure Equipment-JICS/ORCAS A/V	37 d	12/31/03		2/23/04	
1748	1.10.02.05	Install Equipment/Systems-JICS/ORCAS A/V	22 d	2/24/04		3/24/04	

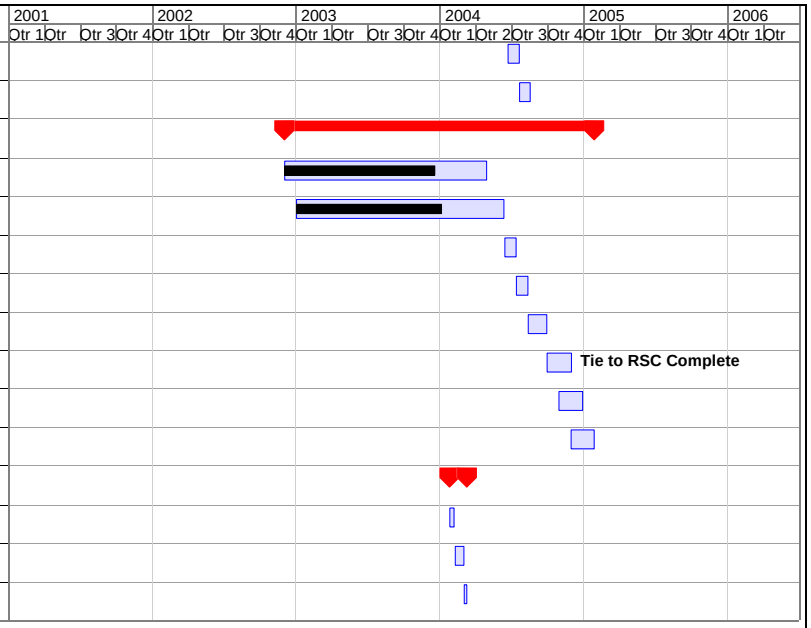


Facilities Revitalization Project Integrated Schedule

Task | Progress | Milestone | Summary | Deadline

Fig. 4.1 (continued)

ID	WBS	Task Name	Duration	Start		Finish
1749	1.10.02.06	Test Equipment/Systems-JICS/ORCAS A/V	20 d	3/23/04		4/20/04
1750	1.10.02.07	Train Users-JICS/ORCAS A/V	20 d	4/21/04		5/18/04
1751	**1.10.03**	**RSC Audio/Video**	**540 d**	**9/3/02**	**A**	**10/27/04**
1752	1.10.03.01	Identify End-User Requirements-RSC A/V	350 d	9/3/02	A	1/28/04
1753	1.10.03.02	Formulate Designs-RSC A/V	360 d	10/3/02	A	3/12/04
1754	1.10.03.03	Prepare Procurement Pkg For Funding-RSC A/V	20 d	3/15/04		4/12/04
1755	1.10.03.04	Procure Equipment-RSC A/V	22 d	4/13/04		5/12/04
1756	1.10.03.05	Manufacture Equipment-RSC A/V	33 d	5/13/04		6/29/04
1757	1.10.03.06	Install Equipment/Systems-RSC A/V	43 d	6/30/04		8/31/04
1758	1.10.03.07	Test Equipment/Systems-RSC A/V	42 d	7/30/04		9/28/04
1759	1.10.03.08	Train Users-RSC A/V	42 d	8/30/04		10/27/04
1760	**1.10.04**	**Building 6011 Classified Conference Room Audio/Video**	**30 d**	**10/27/03**		**12/9/03**
1761	1.10.04.01	Identify End-User Requirements-6011 Classified Conference Room	10 d	10/27/03		11/7/03
1762	1.10.04.02	Procure Equipment-6011Classified Conference Room	15 d	11/10/03		12/2/03
1763	1.10.04.03	Install Equipment-6011 Classified Conference Room	5 d	12/3/03		12/9/03



Facilities Revitalization Project Integrated Schedule

Task | Milestone | Deadline
Progress | Summary

Fig. 4.1 (continued)

5. COST ESTIMATES AND RESOURCE REQUIREMENTS

5.1 COST ESTIMATE SUMMARY

Cost estimates for each East Campus WBS element have been listed in Table 5.1 for FY 2003 and Table 5.2 for FY 2004. The cost estimates assume the following:

- Individual programs will be able to fund their portion of laboratory moves.
- The State of Tennessee will fund $500K for Audio/Video equipment procurement and installation during FY 2004.
- Private Development and Capital Construction Projects will be completed as scheduled.

5.2 RESOURCE REQUIREMENTS

Craft resource requirements in FY 2003 for laboratory moves, personnel moves, network tie-ins, and renovations are contained in Table 5.3 and Fig. 5.1. Craft resource requirements in FY 2004 for laboratory moves, personnel moves, network tie-ins, and renovations are contained in Table 5.4 and Fig. 5.2. Craft resource requirements for renovations are based on anticipated Davis-Bacon rulings for the renovation work.

Table 5.1. FY 2003 FRP Cost Estimate by Funding Source

WBS No.	WBS Element	TEC	Funding Source($ in Thousands)							Total
			Private Funding	FY 03 Line Item	FY 03 FRP Funded					
					Prog. OE	Lab OE	IGPP	GPP	GPE	
1.01	Facilities Design & Construction		88,634	4,941	0	1,450	283	0	650	95,958
1.01.01	Computational Science Building	29,129	29,129							29,129
1.01.02	Engineering Technology Facility	26,852	26,852							26,852
1.01.03	Research Office Building	22,653	22,653							22,653
1.01.04	Research Support Center	16,100	0	4,941						4,941
1.01.05	JICS/ORCAS (State)	10,000	10,000							10,000
1.01.06	East Campus Electrical Systems Upgrade	765								0
1.01.07	Building 4512 (LSS) Upgrade	400					283			283
1.01.08	Building Commissioning	NA				305				305
1.01.09	Construction Interfaces/Planning	NA				1,145	0	0	650	1,795
1.01.10	Lab for Computational & Functional Genomics	13,900								0
1.02	Network Modifications		0	0	0	0	0	2,200	0	2,200
1.02.01	Telecommunication GPP	2,200						2,200		2,200
1.03	Personnel/Equipment Moves & Renovations		0	0	907	3,206	700	0	0	4,813
1.03.01	Planning & Engineering	NA				1,425				1,425
1.03.02	Private Sector & RSC Personnel Moves	NA				360				360
1.03.03	State of TN (JICS/ORCAS) Personnel Moves	NA				0				0
1.03.04	Personnel Moves to Existing Facilities	NA				146				146
1.03.05	Laboratory Moves	NA			907					907
1.03.06	Renovations to Existing Facilities	NA				1,275	700			1,975
1.04	Main Computer Installations in CSB		0	0	949	547	0	0	160	1,656
1.04.01	Planning & Estimating	NA			0	0			0	0
1.04.02	Procurement of Materials, Equipment, & Services	NA			338	357	0	0	160	855
1.04.03	Installation of Electrical & Telecom	NA			35	32				67
1.04.04	Computer & Equipment Moves	NA			576	158				734
1.04.05	Oper. Readiness for Computer Moves	NA			0	0				0
1.05	New Furniture		0	0	0	2,088	0	0	0	2,088
1.05.01	Procurement	6,100				1,740				1,740
1.05.02	Installation	1,220				348				348
1.06.	Facilities Maintenance & Operations Planning		0	0	0	250	0	0	0	250
1.06.01	Maintenance Planning for New Facilities	NA				60				60
1.06.02	Building Operational Readiness	NA				40				40
1.06.03	Facility Use Agreements	NA				0				0
1.06.04	Maintenance Program Planning	NA				150				150

Table 5.1 (continued)

WBS No.	WBS Element	TEC	Funding Source($ in Thousands)							Total
			Private Funding	FY 03 Line Item	FY 03 FRP Funded					
					Prog. OE	Lab OE	IGPP	GPP	GPE	
1.07	Security, Fire, & ESH Technical Integration		0	0	0	65	0	0	0	65
1.07.01	Security	NA				65				65
1.07.02	Fire Protection	NA				0				0
1.07.03	Safety & Health	NA				0				0
1.07.04	Environmental Compliance	NA				0				0
1.08	Infrastructure Upgrade Projects		0	0	0	0	2,595	260	0	2,855
1.08.01	Quad Common Area GPP	3,100					0	260		260
1.08.02	Central Avenue Extension IGPP	1,725					1,500	0		1,500
1.08.03	Main Entrance Mods and Parking IGPP	2,725					240	0		240
1.08.04	Storm Drain Mods IGPP	425					373	0		373
1.08.05	Natural Gas Line IGPP	290					168	0		168
1.08.06	Utility Mods IGPP	500					54	0		54
1.08.07	Upgrade Sewage Collection IGPP	284					260	0		260
1.08.08	Detention Basin GPP	TBD						0	0	0
1.09	Excess Materials Disposition		0	0	0	5,343	0	0	0	5,343
1.09.01	Inventory	NA				275				275
1.09.02	Dispostion	NA				5,068				5,068
1.10	Audio/Video Equipment		0	0	0	250	0	0	0	250
1.10.01	Third Party A/V	NA				250				250
1.10.02	JICS/ORCAS A/V	NA				0				0
1.10.03	RSC A/V	NA				0				0
Totals	***WBS Total***	***NA***	***88,634***	***4,941***	***1,856***	***13,199***	***3,578***	***2,460***	***810***	***115,478***
Subtotals	***FRP Private Sector***		***88,634***							***88,634***
	Legacy OE					***5,343***				***5,343***
	FRP Capital Projects			***4,941***			***3,578***	***2,460***		***10,979***
	FRP Design and Construction					***1,450***			***650***	***2,100***
	FRP Consolidation Moves & Renovations				***1,856***	***6,406***	***700***		***160***	***9,122***
	Management Reserve					***312***				***312***
	Total FRP Consolidation Moves & Renovations	***0***	***0***	***0***	***1,856***	***6,718***	***700***	***0***	***160***	***9,434***

Table 5.2. FY 2004 FRP Cost Estimate by Funding Source

WBS No.	WBS Element	TEC	Funding Source($ in Thousands)							Total
			Private Funding	FY 04 Line Item	FY 04 FRP Funded					
					Prog. OE	Lab OE	IGPP	GPP	GPE	
1.01	Facilities Design & Construction		0	9,600	0	0	0	0	0	9,600
1.01.01	Computational Science Building	29,129								0
1.01.02	Engineering Technology Facility	26,852								0
1.01.03	Research Office Building	22,653								0
1.01.04	Research Support Center	16,100		9,600						9,600
1.01.05	JICS/ORCAS (State)	10,000								0
1.01.06	East Campus Electrical Systems Upgrade	765								0
1.01.07	Building 4512 (LSS) Upgrade	400								0
1.01.08	Building Commissioning (funded outside of FRP)	NA								0
1.01.09	Construction Interfaces/Planning (funded outside of FRP)	NA								0
1.01.10	Lab for Computational & Functional Genomics	13,900								0
1.02	Network Modifications		0	0	0	0	0	0	0	0
1.02.01	Telecommunication GPP (carryover funding for JICS	2,200								0
1.03	Personnel/Equipment Moves & Renovations		0	0	1,761	5,684	575	0	0	8,020
1.03.01	Planning, Engineering, & Materials	NA				1,270				1,270
1.03.01.01	Phase I - Define Scope					0				
1.03.01.02	Phase II - Refine Scope & Resource Reqirements					0				
1.03.01.03	Phase III - Finalize Scope & Resource Requirements					0				
1.03.01.04	Phase IV - Implement & Maintain Move Plans/Schedules					1,250				
1.03.01.05	Develop/Maintain ESH&Q Plans					20				
1.03.02	Private Sector & RSC Personnel Moves	NA				250				250
1.03.02.01	Procurement/Installation of Materials, Equipment, & Services for Private Sector Moves					150				
1.03.02.02	Move Personnel to Private Sector & RSC Buildings					100				
1.03.03	State of TN (JICS/ORCAS) Personnel Moves/ Common Space Build-out	NA				85				85
1.03.03.01	Procurement/Installation of Materials, Equipment, & Services for JICS/ORCAS Moves					60				
1.03.03.02	Move Personnel to JICS/ORCAS					25				
1.03.04	Miscellaneous Personnel Moves to Existing Facilities	NA				220				220
1.03.04.01	Move Personnel/Equipment to Existing Facilities					120				
1.03.04.02	Move Outdated Furniture to Salvage					50				
1.03.04.03	Move Telephones					50				

Table 5.2 (continued)

WBS No.	WBS Element	TEC	Funding Source($ in Thousands)							Total
			Private Funding	FY 04 Line Item	FY 04 FRP Funded					
					Prog. OE	Lab OE	IGPP	GPP	GPE	
1.03.05	Laboratory Moves	NA			1,761	1,584				3,345
1.03.05.01 to 1.03.05.18	FY 03 Laboratory Moves				0	0				
1.03.05.19	Move ESTD Insulation Lab from 4508 to ETF E-F110 & E-F112				91					
1.03.05.20	Move ESTD MEMS/NEMS Testing/Ion Milling Lab from 4500S to ETF E-D202, E-D204, E-D206, & E-D206A				78					
1.03.05.21	Move ESTD Environmental Effects Laboratory from 3500 High Bay to ETF E-C102				30					
1.03.05.22	Move Move ESTD Diamond Turning Equipment from Y-12 Bldg 9201-3 to ETF E-B103, E-F116, E-D201, & E-D205				5					
1.03.05.23	Move ESTD Advanced Thermal Hydraulics Lab from Y-12 9204-1 to ETF E-F116, E-F117, & E-F118				55					
1.03.05.24	Move ESTD Photonics Lab from NTRC Rm 121 to ETF E-D207				18					
1.03.05.25	Move ESTD Hybrid Lighting Lab from NTRC to ETF E-D210				27					
1.03.05.26	Move FED Pellet Lab from Y-12 9201-2 to ETF E-D110 & Repair Building 9201-2 Overhead Crane to Allow Move.				57					
1.03.05.27	Move ESTD Diagnostics/Special Projects Lab from NTRC to ETF E-D201				8					
1.03.05.28	Move LSD Structural Biology Lab from Y-12 Bldg 9224 to 4500S (pending funding approval)					84				
1.03.05.29	Move M&CD Composite Processing Lab from Y-12 9204-1 & 9725 to ETF E-D105				116					
1.03.05.30	Move ESTD Technology Information Center & Records Center from NTRC, 4500N, & 4500S to ETF E-D209 & E-F115				5					
1.03.05.31	Move FED RF-3D Scanner & Plasma Process Labs from Y-12 9201-2 to ETF E-C101				363					
1.03.05.32	Move M&CD Composite Characterization Lab from Y-12 9204-1 to ETF E-D109				23					
1.03.05.33	Move Advanced Photonics Applications Lab from 4500S Rm S-239 to NTRC Rm L-121				8					
1.03.05.34	Move M&CD Composite Stress Lab from Y-12 9204-1 to ETF E-D104				82					
1.03.05.35	Move NSTD Isotope Production Wet Chemistry Labs from Y-12 9204-3 to 5500				25					

Table 5.2 (continued)

WBS No.	WBS Element	TEC	Funding Source($ in Thousands)							Total
			Private Funding	FY 04 Line Item	FY 04 FRP Funded					
					Prog. OE	Lab OE	IGPP	GPP	GPE	
1.03.05.36	Move M&CD Composite Assembly Room and Clean Room from Y-12 9204-1 to ETF E-D106-A & E-D106				64					
1.03.05.37	Move ESTD Clean Room from 4500S & Y-12 9201-3 to ETF E-D208-A				4					
1.03.05.38	Move QSD Quality Control Lab from Y-12 9201-3 to ETF E-F108				5					
1.03.05.39	Move ESTD Optics Labs from 3500 to ETF E-D203 & E-D205				36					
1.03.05.40	Move M&CD Composite Storage Lab from Y-12 9204-1 to ETF E-D107				27					
1.03.05.41	Move M&CD Concrete Testing Lab/Concrete Prep Lab from Y-12 9204-1 to ETF E-D113 & E-D113-A				27					
1.03.05.42	Move ESTD Analog/Digital Systems Labs from 3606 to 3500				27					
1.03.05.43	Move M&CD Membrane Technology Lab from K1037 to ETF E-D102, E-D103, & E-D115 (Deferred to FY05)				0					
1.03.05.44	Initiate Moving the Remaining FED Fusion Energy Laboratories (including RF Benchmark) from Y-12 9201-2 to Bldg. 7600				580	1,000				
1.03.05.45	Install Additional Utility Service Installations for Insulation Lab, Capsule Assembly Lab, etc.					500				

Table 5.2 (continued)

WBS No.	WBS Element	TEC	Funding Source($ in Thousands)							Total
			Private Funding	FY 04 Line Item	FY 04 FRP Funded					
					Prog. OE	Lab OE	IGPP	GPP	GPE	
1.03.06	Renovations to Existing Facilities	NA				2,275	575			2,850
1.03.06.01 to .07	Renovations Performed during FY03					0				
1.03.06.08	Perform Bldg 4500N Library Expansion Construction					400				
1.03.06.09	Perform 4500N Headhouse Renovation (Tech Transfer & Legal)					300				
1.03.06.10	Complete Renovating Building 6000/6004/6010/6025 for PD					140				
1.03.06.11	Perform Building 6011 Renovation Construction					500				
1.03.06.12	Perform Renovation Construction on Building 5500 for NSTD Isotope Production Wet Chemistry Labs						575			
1.03.06.13	Complete Renovating Building 3546					90				
1.03.06.14	Complete EERE Program Renovation to 4500N 2nd Floor					15				
1.03.06.15	Add Approach Pads for Building 1059 & 1061 Nitrogen Headers					10				
1.03.06.16	Renovate Building 3606 - 30 Office Spaces					120				
1.03.06.17	Renovate Building 3500 Lab Upgrades for Relocation of Building 3606 Labs					100				
1.03.06.18	Upgrade Building 4500S Maintenance Shops					100				
1.03.06.19	Upgrade Building 4500S for LSD Research Relocations from Building 9224 - Cancelled					0				
1.03.06.20	Stabilize Building 6025 Foundation					200				
1.03.06.21	Replace Room Air Conditioners in Buildings 3546, 3606, & 6012					250				
1.03.06.22	Perform Renovation Design for Building 5002 First Floor					50				
1.04	Main Computer Installations in CSB		0	0	0	0	0	0	0	0
1.04.01	Planning & Estimating	NA								0
1.04.02	Procurement of Materials, Equipment, & Services	NA								0
1.04.03	Installation of Telecommunication Lines	NA								0
1.04.04	Preparations/Verifications Prior to the Move	NA								
1.04.05	Computer & Equipment Moves	NA								0
1.04.06	Opererational Readiness for Computer Moves	NA								0

Table 5.2 (continued)

WBS No.	WBS Element	TEC	Funding Source($ in Thousands)							Total
			Private Funding	FY 04 Line Item	FY 04 FRP Funded					
					Prog. OE	Lab OE	IGPP	GPP	GPE	
1.05	New Furniture		0	0	0	1,158	0	0	0	1,158
1.05.01	Furniture & Demountable Wall Procurement	6,100				908				908
1.05.01.01	FY03 Furniture									
1.05.01.02	Procure Private Sector Furniture					505				505
1.05.01.02.01 to .06	FY03 Procured Private Sector Furniture					0				
1.05.01.02.07	Procure Furniture Deferred from FY03					365				
1.05.01.02.08	Procure Additional Guest Chairs (deferred)					0				
1.05.01.02.09	Procure Additional Desk Chairs					60				
1.05.01.02.10	Deliver Third Party Furniture to Jobsite					0				
1.05.01.02.11	Store/Deliver JICS/ORCAS Furniture to Jobsite					80				
1.05.01.03	Procure Third Party Demountable Panels					*15*				
1.05.01.03.01 to .13	FY 03 Procured Third Party Demountable Panels					0				
1.05.01.03.14	Procure Additional Demount. Panels for 3rd Party Wall Mods					15				
1.05.01.04	Procure Furnishings for Renovated Facilities					388				388
1.05.01.04.01	Procure Space Furnishings for Building 3546					108				
1.05.01.04.02	Procure Building 6011 Classified Space Furnishings					150				
1.05.01.04.03	Procure FSAR Library Bookcases					17				
1.05.01.04.04	Procure 4500N Headhouse Furniture					35				
1.05.01.04.05	Procure 6025 Conf. Room/Library Furniture					50				
1.05.01.04.06	Procure Miscellaneous Replacement Furniture for Other Existing Renovated Facilities (EERC, etc.)					28				
1.05.02	Furniture & Demountable Wall Installation					250				250
1.06.	Facilities Maintenance & Operations Planning		0	0	0	395	0	0	0	395
1.06.01	Maintenance Planning for New Facilities (not funded thru FRP)	NA				0				0
1.06.02	Building Operational Readiness	NA				60				60
1.06.03	Facility Use Agreements (not funded thru FRP)	NA				0				0
1.06.04	Maintenance Program Planning	NA				300				300
1.06.05	FMD Move Support Activities	NA				35				35
1.07	Security, Fire, & ESH Technical Integration		0	0	0	255	0	0	0	255
1.07.01	Security	NA				195				195
1.07.02	Fire Protection	NA				20				20
1.07.03	Safety & Health	NA				30				30
1.07.04	Environmental Compliance	NA				10				10

Table 5.2 (continued)

WBS No.	WBS Element	TEC	Funding Source($ in Thousands)							Total
			Private Funding	FY 04 Line Item	FY 04 FRP Funded					
					Prog. OE	Lab OE	IGPP	GPP	GPE	
1.08	Infrastructure Upgrade Projects		0	0	0	0	3,433	0	0	3,433
1.08.01	Quad Common Area IGPP	3,100					1,414			1,414
1.08.02	Central Avenue Extension IGPP	1,725					285			285
1.08.03	Main Entrance Mods and Parking IGPP	2,725					1,234			1,234
1.08.04	Storm Drain Mods IGPP	425								0
1.08.05	Natural Gas Line IGPP	290								0
1.08.06	Utility Mods IGPP	500					500			500
1.08.07	Upgrade Sewage Collection IGPP	284								0
1.09	Excess Materials Disposition		0	0	0	1,336	0	0	0	1,336
1.09.01	Inventory	NA				67				67
1.09.02	Dispostion	NA				1,269				1,269
1.10	Audio/Video Equipment		0	0	0	1,240	0	0	0	1,240
1.10.01	Third Party A/V	NA				240				240
1.10.02	JICS/ORCAS A/V	NA				300				300
1.10.03	RSC A/V	NA				550				550
1.10.04	Building 6011 Classified Conference Room A/V	NA				150				150
Totals	***WBS Total***	***NA***	***0***	***9,600***	***1,761***	***10,068***	***4,008***	***0***	***0***	***25,437***
Subtotals	***FRP Private Sector***	NA	***0***							***0***
	Legacy OE	NA				***1,336***				***1,336***
	FRP Capital Projects	NA		***9,600***		***0***	***4,008***	***0***		***13,608***
	FRP Design and Construction	NA				***0***			***0***	***0***
	FRP Consolidation Moves & Renovations	NA			***1,761***	***8,732***	***0***		***0***	***10,493***
	Management Reserve	NA				***268***				***268***
	Total FRP Consolidation Moves & Renovations	NA	***0***	***0***	***1,761***	***9,000***	***0***	***0***	***0***	***10,761***

- WBS elements completed in FY 2003

Numbers in blue - $1,000K of $2,181K is direct funded for FED moves. The remainder is division programatic operation expense funded.

Numbers in purple - Includes $1,000K Laboratories share of Fusion Energy Division's move

Number in Red - Assumes the State of TN provides $500K additional for the procurement and installation of Audio/Video Equipment.

Table 5.3. Total Craft Hours Required by Week for FY 2003 Laboratory Moves, Personnel Moves, and Computer Tie-ins

	16-Mar	23-Mar	30-Mar	6-Apr	13-Apr	20-Apr	27-Apr	4-May	11-May	18-May	25-May	1-Jun	8-Jun	15-Jun	22-Jun	29-Jun	6-Jul	13-Jul	20-Jul	27-Jul	3-Aug	10-Aug	17-Aug	24-Aug	31-Aug	7-Sep	14-Sep	21-Sep	28-Sep	Total Hours
Laborer	0	40	20	0	0	2	35	35	83	3	10	120	86	51	59	55	183	274	297	182	301	245	125	190	167	236	167	163	106	**3,235**
Carpenter	0	0	8	0	0	43	103	39	70	30	24	46	46	30	30	18	109	69	77	44	59	95	66	81	32	48	80	112	70	**1,429**
Truck Driver	0	12	0	0	0	0	0	38	62	31	0	57	36	28	18	20	50	82	94	30	67	40	45	13	89	135	71	21	6	**1,045**
Rigger	0	0	0	0	0	0	0	70	78	56	0	68	45	80	48	48	0	104	40	39	26	42	98	2	213	298	158	9	0	**1,522**
Electrician	0	0	8	0	0	58	102	259	257	212	161	217	226	222	123	88	130	143	311	148	148	163	180	185	116	93	265	397	240	**4,452**
Instru Tech	0	0	0	0	0	0	0	176	176	176	71	100	76	68	44	46	41	22	148	205	171	165	155	218	24	32	72	134	64	**2,384**
Operator	0	0	0	0	0	0	0	38	42	31	0	34	23	4	10	20	38	58	78	18	45	23	33	5	152	226	113	3	4	**998**
Pipe Fitter	0	0	0	0	0	21	59	223	213	201	148	200	200	184	93	57	95	70	219	87	81	56	52	53	64	58	75	94	9	**2,612**
Millwright	0	0	0	0	0	9	9	9	68	0	0	16	16	0	1	2	2	4	17	2	10	13	45	13	9	10	18	68	4	**345**
IT-Comp	0	60	8	0	0	0	0	0	0	0	0	0	0	0	0	0	60	162	115	100	106	66	100	74	92	100	76	116	58	**1,293**
Iron Worker	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	10	16	16	**42**
Insulator	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	7	12	7	35	0	0	0	0	0	0	0	8	14	14	**100**
Totals:	**-**	**112**	**44**	**-**	**-**	**133**	**308**	**887**	**1,049**	**740**	**414**	**858**	**754**	**667**	**429**	**361**	**720**	**995**	**1,431**	**855**	**1,014**	**908**	**899**	**834**	**958**	**1,236**	**1,113**	**1,147**	**591**	**19,457**

Fig. 5.1. FY 2003 Craft Resource Requirements for Lab Moves, Personnel Moves, & Computer Tie-ins.

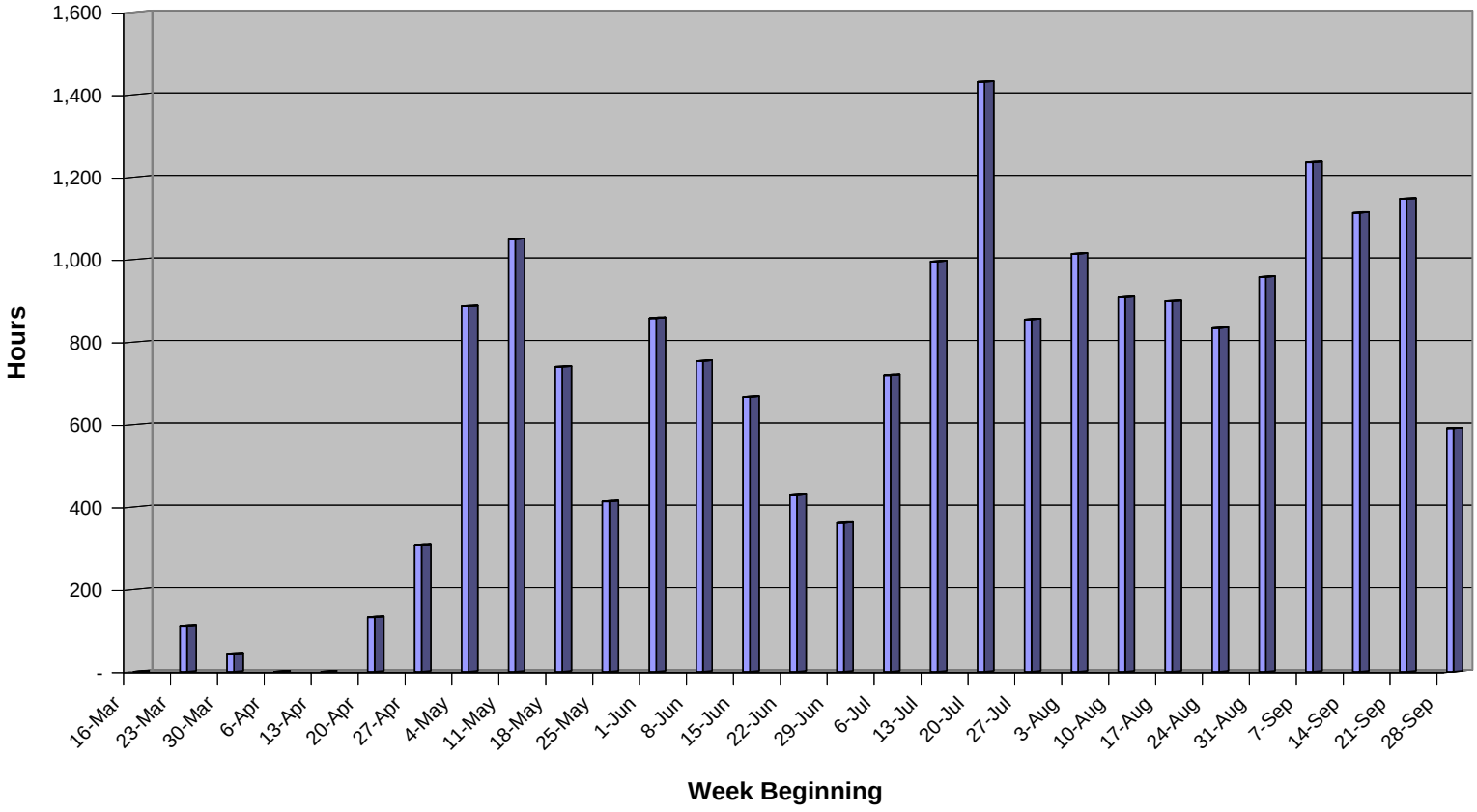
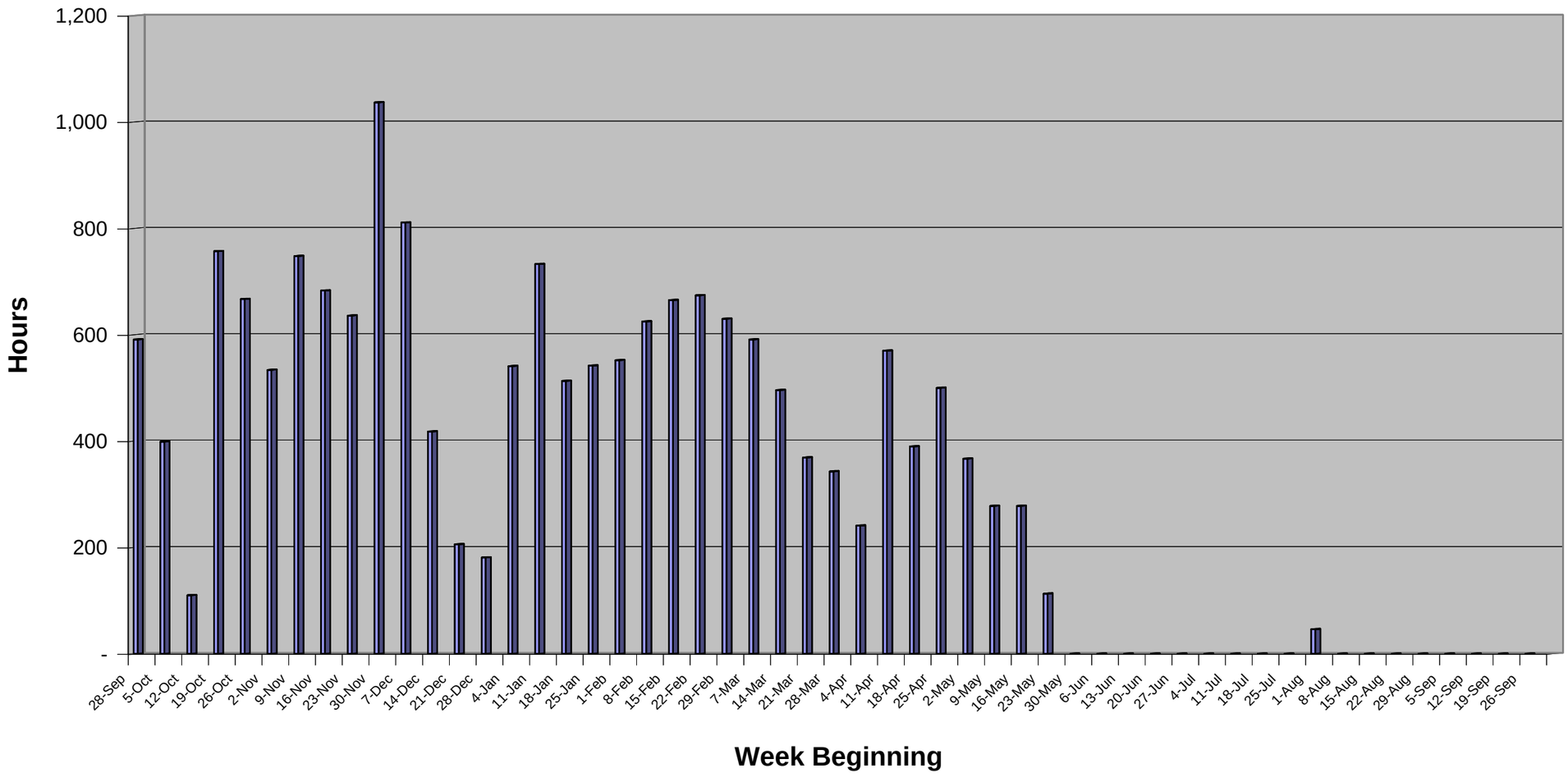


Table 5.4.Total Craft Hours Required by Week for FY 2004 Laboratory Moves, Personnel Moves, and Computer Tie-ins*

	28-Sep	5-Oct	12-Oct	19-Oct	26-Oct	2-Nov	9-Nov	16-Nov	23-Nov	30-Nov	7-Dec	14-Dec	21-Dec	28-Dec	4-Jan	11-Jan	18-Jan	25-Jan	1-Feb	8-Feb	15-Feb	22-Feb	29-Feb	7-Mar	14-Mar	21-Mar	28-Mar
Laborer	106	98	48	287	182	104	181	154	224	432	300	56	0	0	277	213	64	40	57	144	176	55	80	72	48	48	48
Carpenter	70	20	2	10	21	10	66	58	21	52	22	40	28	15	4	86	84	107	80	42	0	2	64	52	0	0	0
Truck Driver	6	34	14	136	71	48	102	74	72	152	146	36	0	0	88	60	40	24	38	56	96	58	56	44	64	40	40
Rigger	0	0	16	112	75	48	116	96	48	96	144	48	0	0	32	16	48	32	132	160	208	192	176	160	208	160	160
Electrician	240	92	10	26	84	94	73	90	112	86	42	78	70	71	56	86	64	73	60	68	16	82	15	30	16	40	24
Instru Tech	64	16	0	8	13	60	37	20	0	46	23	31	23	8	4	31	18	19	8	10	73	125	130	123	71	0	0
Operator	4	2	10	70	38	24	59	44	18	48	72	26	0	0	36	30	24	18	47	54	78	70	62	56	78	54	54
Pipe Fitter	9	8	4	18	54	53	51	60	60	72	40	47	41	35	15	88	80	107	60	34	4	20	29	20	0	0	0
Millwright	4	8	2	26	65	39	61	73	57	29	18	46	44	52	29	95	70	88	28	13	2	7	0	11	11	27	17
IT-Comp	58	108	4	64	32	8	2	14	24	24	4	10	0	0	0	19	3	15	14	32	0	3	0	8	0	0	0
Sheet Metal	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	6	3	4	2	8	40	0	0	0	0	0
Refrig. Mech	0	0	0	0	26	39	0	0	0	0	0	0	0	0	0	3	6	8	12	5	0	0	18	15	0	0	0
Iron Worker	16	7	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Insulator	14	6	0	0	6	7	0	0	0	0	0	0	0	0	0	3	6	8	12	5	4	20	0	0	0	0	0
Totals:	**591**	**399**	**110**	**757**	**667**	**534**	**748**	**683**	**636**	**1,037**	**811**	**418**	**206**	**181**	**541**	**733**	**513**	**542**	**552**	**625**	**665**	**674**	**630**	**591**	**496**	**369**	**343**

	4-Apr	11-Apr	18-Apr	25-Apr	2-May	9-May	16-May	23-May	30-May	6-Jun	13-Jun	20-Jun	27-Jun	4-Jul	11-Jul	18-Jul	25-Jul	1-Aug	8-Aug	15-Aug	22-Aug	29-Aug	5-Sep	12-Sep	19-Sep	26-Sep	Total Hours
Laborer	38	160	20	68	48	0	0	0	0	0	0	0	0	0	0	0	0	24	0	0	0	0	0	0	0	0	**3,852**
Carpenter	0	64	64	72	68	64	64	26	0	0	0	0	0	0	0	0	0	4	0	0	0	0	0	0	0	0	**1,382**
Truck Driver	32	56	7	15	2	0	0	0	0	0	0	0	0	0	0	0	0	4	0	0	0	0	0	0	0	0	**1,711**
Rigger	128	32	5	5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**2,653**
Electrician	0	60	76	114	70	52	52	21	0	0	0	0	0	0	0	0	0	4	0	0	0	0	0	0	0	0	**2,247**
Instru Tech	0	20	28	16	16	16	16	7	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**1,080**
Operator	43	16	4	6	2	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	**1,149**
Pipe Fitter	0	88	104	114	89	80	80	32	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**1,596**
Millwright	0	72	80	64	64	64	64	26	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**1,356**
IT-Comp	0	2	2	26	8	2	2	1	0	0	0	0	0	0	0	0	0	8	0	0	0	0	0	0	0	0	**497**
Sheet Metal	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**66**
Refrig. Mech	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**132**
Iron Worker	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**23**
Insulator	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**91**
Totals:	**241**	**570**	**390**	**500**	**367**	**278**	**278**	**113**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**46**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**17,835**

Fig. 5.2. FY 2004 Craft Resource Requirements for Lab Moves, Personnel Moves, and Computer Tie-ins



APPENDIX A

MOVE POLICIES AND PROCEDURES

APPENDIX A. MOVE POLICIES AND PROCEDURES

CONSOLIDATION SCOPE

The following activities are included in the scope of the Personnel and Equipment Consolidation Team:

- Development of a process flow for the planning and implementation of personnel and equipment moves (Fig. A.1).
- Development of a Move Planning Schedule (Section 4).
- Development of Move Resource and Cost Tables (Section 5).
- Establishment of a Consolidation Team comprised of the Move Coordinator; Move Captains, representing impacted organizations; Facility and Operations Directorate personnel, representing Complex Managers, Site Service Managers, and Resource Managers; and technical Subject Matter Experts (SMEs), representing the Environment, Safety, and Health (ES&H) Directorate.
- Development of Personnel Move Data Sheets (Appendix B) and Laboratory Move Packages (Appendix C) describing requirements and resources for moving personnel and equipment.
- Development of a list of equipment (existing and new) to be relocated (Appendix C).
- Interface with the responsible leads for planning, procurement, and installation of office and other non-fixed furniture.
- Relocation and consolidation of on-site and off-site personnel and equipment to new facilities constructed by the State of Tennessee, private sector, and DOE.
- Relocation and consolidation of on-site and off-site personnel and equipment to other existing facilities impacted by the FRP.
- Development of FRP Move Policies, Move Preparation Sheet Instructions, and Move Readiness Sheet Instructions.

FACILITY USE AGREEMENTS

The Facilities Management Division will provide resources to develop and approve Facility Use Agreements (FUAs) for each of the newly constructed facilities and for reuse of existing facilities by impacted organizations.

- FUAs shall be developed by the Complex Manager to specify operating boundaries within facilities.
- Where appropriate, Job Hazard Evaluations (JHEs) shall be developed prior to relocation and restart operations by the affected organization. These JHEs must meet the requirements specified within the applicable FUA.
- Each affected organization shall perform or procure required resources to meet the Space Return Criteria.
- Each affected organization shall work within FUAs applicable to its new facility.
  - Equipment, supplies, hazardous materials, chemicals, radioactive materials, waste, and other materials must be located within specified areas designed for placement within the FUAs (e.g., FUAs for use of hallways, foyers, and other common areas).

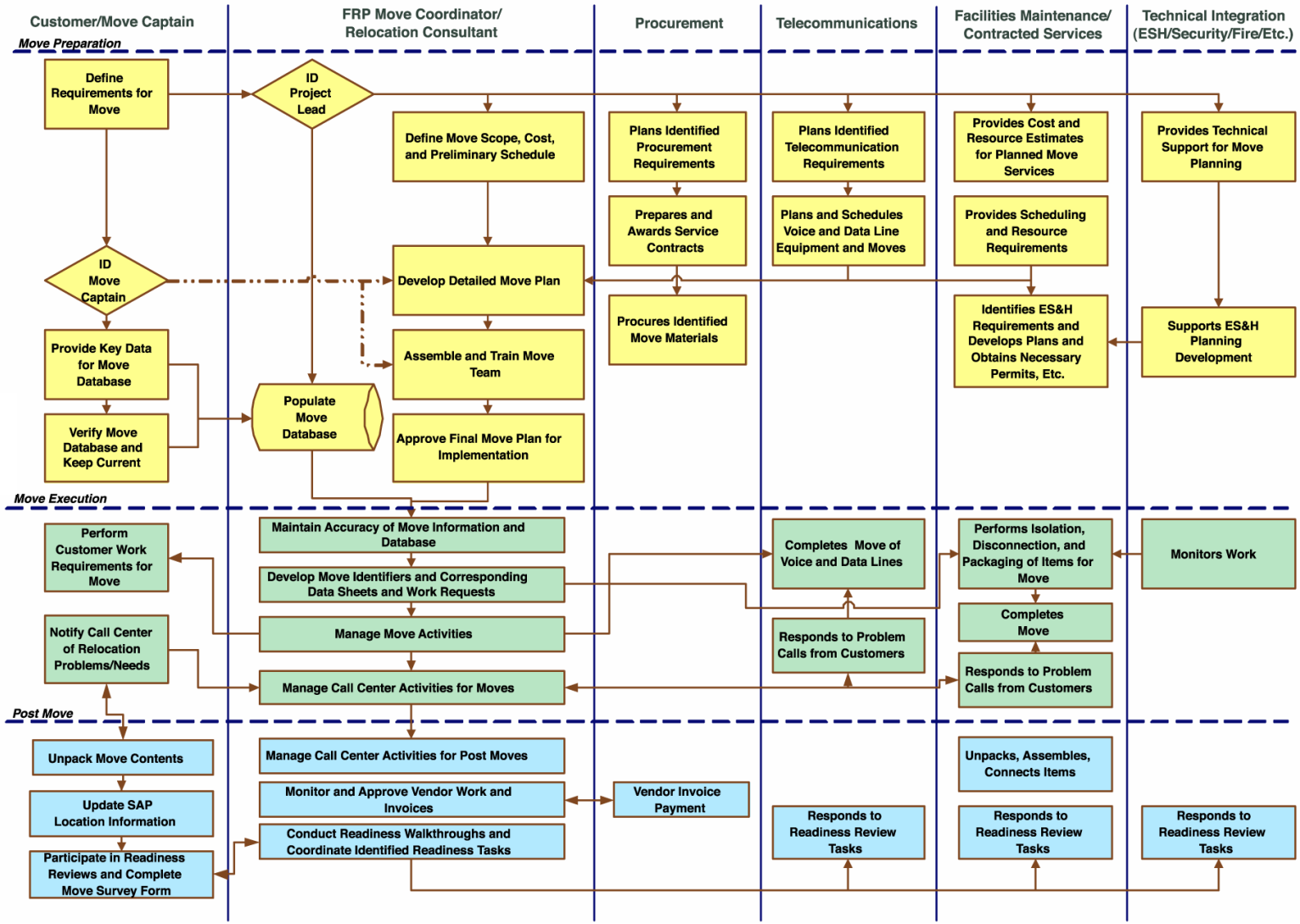


Fig. A.1. Personnel and Equipment Moves.

CONSOLIDATION ROLES AND RESPONSIBILITIES

Roles and responsibilities for the relocation of personnel and equipment are defined in Section 2.

PREPARATION, MOVE, AND INSTALLATION REQUIREMENTS

Unless otherwise specified in the FRP Personnel Move Data Sheets, the following shall apply:

- Newly constructed facilities office and general common space where building furniture is supplied.
  - Packing materials will be supplied to office occupants for packing of materials, files, etc.
  - Personal items such as plants, pictures, or other items of personal value will be moved by the owner as approved by the FUA.
  - Office furniture will not be moved into the newly constructed facilities unless approved by the Complex Leader and specified on the Personnel Move Data Sheets.
  - Materials to be moved will be labeled with relocation information and special instructions. Personnel Move Data Sheets will be posted at each move location. Preprinted labels will be supplied to affected organizations to ensure that sufficient information is provided.
  - Disconnection, preparation, and installation requirements of equipment and materials will be identified and documented on Personnel Move Data Sheets with designated responsibilities, resource requirements, etc.
  - General computing and other office equipment will be disconnected and prepared for the move by the owner and/or the Consolidation Team as identified on the Personnel Move Data Sheets.
  - Personnel Move Data Sheets will specify equipment requiring special arrangements (e.g., copiers) requiring vendor interfaces or other equipment and materials that may have ES&H or special handling requirements.
  - Special requirements for handling and rigging of equipment and materials will be reviewed and approved by ES&H SMEs.
  - Each affected organization will perform or contract any necessary activities required for meeting the Space Return Criteria.

- Newly constructed laboratory, shop, equipment, and other specialized space.
  - Personnel Move Data Sheets will identify equipment and materials to be relocated.
  - Owner will be responsible for appropriate tagging and approvals for relocation of equipment and materials (e.g., hazardous materials, document classification).
  - Disconnection, preparation, and installation requirements of equipment and materials will be identified and documented on Personnel Move Data Sheets with designated responsibilities, resource requirements, etc.
  - Special requirements for handling and rigging of equipment and materials will be reviewed and approved by ES&H SMEs.
  - Each affected organization will perform or contract any necessary activities required for meeting the Space Return Criteria.

- Existing facilities relocation of personnel, materials, and equipment.
  - Existing facilities will be ready for occupancy as agreed upon by the F&O Complex Manager, the Consolidation Team, and the affected organization.
  - Personnel Move Data Sheets will identify all materials and equipment to be relocated.
  - Disconnection, preparation, and installation requirements of equipment and materials will be identified and documented on Personnel Move Data Sheets with designated responsibilities, resource requirements, etc.
  - Furniture will remain, unless identified on Personnel Move Data Sheets, in existing facilities when moves are made to other existing facilities.
  - Special requirements for handling and rigging of equipment and materials will be reviewed and approved by ES&H SMEs.
  - Each affected organization will perform or contract any necessary activities required for meeting the Space Return Criteria.

- Relocation of personnel, equipment, and materials not identified on a Personnel Move Data Sheet as part of the scheduled moves will be coordinated through the Consolidation Team and the Complex Manager. Costs associated with these unscheduled moves are the responsibility of the owner.

CONSOLIDATION METHOD

Relocation implementation is through the Consolidation Team. The team consists of move captains assigned by the impacted organizations, division telecommunication coordinators, F&O personnel providing services, and the consolidation coordinator. Two primary move types will occur. Personnel moves will be scheduled to accommodate a group of approximately 80 staff members a week. Laboratory and shop moves will be scheduled in concert with programmatic milestones and resource allocations. Following the planning and scheduling of personnel and equipment relocations, consolidation implementation for a specific Move Identification will occur as follows:

- Present to one month prior to scheduled move:
  - Identification of personnel and equipment to be relocated.
  - Update of personnel and equipment consolidation database for assignment of Move Identifications Numbers (Move Identifications Numbers will identify a selection of personnel and equipment assigned for a specific move).
  - Identification and scheduling of resources for relocations and renovations.
  - Development of Personnel Move Data Sheets specifying individual move requirements.
  - Issue of Personnel Move Data Sheets to service personnel performing work for planning and scheduling requirements.
  - Listing of telecommunications (voice and data) connections and user requirements.
  - Documentation and submittal of identified “change request forms” for new construction building designs and requirements for existing facility renovations and equipment upgrades.

- — Survey of facilities to be vacated to plan for the disposal, surplus, and reuse of excess materials. Excess of identified materials not required for current operations and operations needed prior to relocations.
- — Procurement of packing and move materials required for the personnel and equipment relocations.
- — Development of required ES&H plans, JHEs, lift plans, and other required documentation.

- One month to one week prior to scheduled move:
  - — Finalization of Move Identifications and Personnel Move Data Sheets.
  - — Packing of office and other administrative materials not essential to operations needed until following the move.
  - — Isolation, disconnection, and packing of nonessential laboratory and shop equipment.
  - — Finalization of telecommunications work request for voice and data lines.
  - — Specific scheduling of relocation resources.
  - — Protection of flooring, walls, elevators, etc., of facilities to be occupied in preparation of moves.
  - — Scheduling of copier equipment moves by copier provider.
  - — Establishment of a move call center to answer questions and correct problems.

- Week of scheduled move:
  - — (Monday through Friday) Packing of materials and equipment to be moved during a scheduled Move Identification.
  - — (Thursday morning) Begin disconnection and packing of desktop computer systems and office equipment to be moved.
  - — (Thursday afternoon) Begin disconnection of telephones from current occupied locations. Begin relocation of desktop computing systems and office equipment.
  - — (Friday afternoon through Saturday afternoon) Move of office and administrative materials. Move of copier equipment by copier provider. Note: Laboratory/shop equipment moves and relocations will be conducted following an arranged schedule to meet programmatic milestones.
  - — (Friday/Saturday) Complete telephone connections at designated locations.
  - — (Saturday afternoon) Preparation of space for arrival of personnel at new location.

- Monday through Wednesday following the move week:
  - — Scheduling and completion of work activities resulting from problem calls to the Consolidation Call Center.

- Thirty days following move:
  - — Space Return Criteria are met.

ORNL SPACE RETURN CRITERIA

The following criteria must be used whenever an ORNL division desires to transfer the Space Rent responsibility for all or part of a facility's unneeded or non-useable

division or program space and utilities to the Laboratory or to another UT-Battelle tenant organization.

Upon return of an entire facility/building, the additional criteria must be met in preparation for the Facility Operations effort to place it in cheap-to-keep status.

The removal of Space Rent responsibility will be conditional upon the transferring organization meeting the applicable criteria. The cognizant Facility Operations building manager, the transferring tenant organization, and the new tenant organization shall review and verify compliance with the criteria. Upon transfer of space, all facility conditions, including legacy, become the responsibility of the new tenant. The ORNL Space Manager will transfer the responsibility for the designated space upon compliance with the following criteria:

- Return for reuse
  The current tenant (responsible division) is responsible for all listed transfer items, including legacy.
  - The releasing organization shall provide written notice to the ORNL Site Space Coordinator of intent to return space by the 15th of each month.
  - The space will be transferred to the "Vacant" space pool 90 calendar days from the notification pending satisfactory completion of all transfer items.
  - During the 90-day grace period, the responsible division will be responsible for the space rent; however, early release will be granted for transfers to divisions other than X025.
  - The space must be in a "functional and reusable" condition suitable for immediate occupation, and the space reflected as vacant in the SAMS database.
  - The area is physically clean.
  - Facility Management will assess furniture in space to be returned. Serviceable furniture will remain in offices. Nonserviceable furniture shall be removed. File cabinets shall be removed.
  - Built-in laboratory furniture shall remain. All other furniture shall be removed from laboratories and other areas.
  - Computers and ancillary equipment shall be removed.
  - Equipment not permanently affixed to the facility shall be removed. Surveillance and Maintenance (S&M) on remaining fixed research equipment shall be the responsibility of the research owner.
  - Chemicals shall be removed.
  - Documents shall be removed.
  - Hazardous waste and other waste material shall be removed.
  - Pending facility safety issues shall be completed.
  - All contamination shall be stabilized. If conditions warrant, the new tenant has the right to request that an ES&H survey be performed by the releasing organization.
  - Space will be accepted for return if of a reasonable size and configuration for future reuse by other organizational units within the Laboratory. All "Returned" space must be consolidated.
  - All facility infrastructure issues shall be forwarded to the cognizant Facility Complex Manager for resolution.

- An entire building for reuse must be placed in a minimum operational status by the tenant organization.
- The releasing organization is responsible for scheduling a walk-down with the ORNL Space Manager of all space to be returned prior to the end of the 90-day period.

- Additions if returned for deactivation, shutdown
  Furniture assets should be consolidated within the building. The space owner may remove all serviceable furniture.
  - Major, fixed research equipment must be placed in a safe shutdown status with all removable hazardous material removed with the appropriate disposition. This equipment S&M shall remain the responsibility of the research owner.
  - An ESH&Q characterization is completed with all identified contamination stabilized.
  - Pending safety issues shall be completed in accordance with a nonoccupancy facility.

PROJECT MOVE POLICIES

- All ORNL employees shall comply with the roles and responsibilities, authorities and accountabilities (R2A2s) identified in the *ORNL Facilities Revitalization Project Consolidation Plan*.
- ORNL's intent is to leave office furniture intact and move only personnel, their computers and associated hardware, their files, and office chairs.
- Personnel moving into a new and furnished ORNL facility should move only materials and equipment that are essential to their operations and that are not planned as a part of the new facilities.
- Personnel relocating to an existing ORNL facility that has furniture and equipment intact should relocate only materials and equipment essential to their mission and that are not already in place at their new destination.
- Organizations planning to relocate personnel should contact their Complex Facility Manager and the ORNL Space Manager for assistance to determine what furniture and equipment are appropriate to leave behind. All other items must be readied for disposition in accordance with the Facility Space Return Criteria.
  Note: All property transfers and disposal requirements should be addressed during the move process.
- A cost analysis should be performed to determine if it is more economical to dispose of and replace equipment, chemicals, and hazardous materials or to pay shipping and handling costs for relocation.
- Every effort should be made to dispose of or replace any radiologically or PCB-contaminated items or equipment.
- Personnel to be moved on a given date should have all preparation actions accomplished prior to the beginning of the work shift on that date. Failure to meet this deadline will result in rescheduling costs being charged back to the organization when the move is accomplished.
- The following relocation costs are expected to be borne by the Facilities Revitalization Project:

- Nonprogrammatic-funded moves (Laboratory Overhead or Division Overhead)
- Transportation
- Loading and unloading
- Boxes, packing materials, identification tags
- Move coordination by the FRP Consolidation Team
- Computer and associated equipment relocation and installation
- Telecommunications relocation
- Equipment and furniture disassembly and reinstallation
- Preparation of research experiments and equipment for transportation/relocation

- The following relocation costs are expected to be borne by the relocating organization:
  - Programmatic-funded moves
  - Packing and preparation of office files, computers, and miscellaneous office equipment
  - Unpacking and placement of items moved
  - Placement of identification tags
  - Relocation of personal items (e.g., pictures, plants, and other items of personal value)
  - Support for Personnel Move Data Sheet development and other consolidation planning requirements
  - Support for developing a list of equipment for disposition, transition, and relocation
  - Support for preparing research experiments and equipment for relocation/ transportation
  - Activities required to meet the Facility Space Return Criteria
  - Preparation of items to be left behind for disposition by the Transition Team
    - Green tagging
    - Property Information System (PRISM) entry
    - Disposal of hazardous waste
    - Hazardous Materials Inventory System (HMIS) updates

MOVE PREPARATION CHECK LIST

This document is provided as a tool for assisting organizations and the Consolidation Team in preparation for a move.

- ❑ Material to be moved is packed and labeled with relocation information and any special instructions.
- ❑ Personnel Move Data Sheets are posted at each move location.
- ❑ Installation requirements for equipment and materials are identified and documented on Personnel Move Data Sheets with designated responsibilities, resource requirements, etc., identified.
- ❑ Any furniture identified for relocation is identified and approved on the Personnel Move Data Sheet.
- ❑ Any necessary room layouts/sketches have been prepared and are attached to the Personnel Move Data Sheet.
- ❑ General computing and other office equipment is ready for relocation.
- ❑ Special requirements for handling and rigging of equipment and materials have been reviewed and approved by the applicable ES&H SME.
- ❑ All necessary activities required for meeting the Facility Space Return Criteria (FSRC) have been accomplished.
- ❑ All ES&H and U.S. Department of Transportation (DOT) requirements have been addressed.
- ❑ All appropriate green tags, property transfer tags, computer sanitization tags, and approvals for relocation of equipment and materials have been secured.
- ❑ Property Information System (PRISM) and Hazardous Materials Inventory System (HMIS) databases have been updated to reflect any necessary change(s).
- ❑ All hazardous waste has been placed in the appropriate management area, and the disposal paperwork has been initiated.
- ❑ All nonessential or unneeded office supplies, files, equipment, furniture, etc., are labeled for recycle, trash, hazardous waste, or salvage and are readied for transport.
- ❑ All files are purged of unneeded materials, and any files appropriate for relocation to Laboratory Records have been identified and readied.
- ❑ All file cabinets, bookcases, and desks have been emptied.
- ❑ All equipment containing liquids or hazardous materials has been prepared and readied for transport.

MOVE READINESS REVIEW LIST

- ❑ Facilities are ready for occupancy as agreed upon by the Facilities and Operations Complex Manager, the Consolidation Team, and the affected organization.
- ❑ Work request/authorizations are in place.
- ❑ All items to be moved are packed and ready for relocation.
- ❑ Labels provided are completed with all requested information and appropriately placed.
- ❑ Shipping papers are in place, if applicable.
- ❑ The contents of equipment containing liquids are secured to prevent leakage.
- ❑ If equipment containing liquids is destined for disposal, all free liquids have been drained.
- ❑ Personnel Move Data Sheets have been finalized and are available for use.
- ❑ The following resources are committed and scheduled, if applicable:
  - — Special vendor needs, if applicable
  - — Telecommunications support
  - — Site services
  - — Facility management
  - — ES&H support
  - — Instrument technicians
  - — Affected organization personnel
  - — Personnel tools and equipment
  - — Telecommunications
- ❑ Lift plans are in place.
- ❑ Job Hazard Evaluations (JHEs) are in place.
- ❑ All ES&H issues/requirements have been addressed.
- ❑ Computer equipment is prepared for relocation.
- ❑ Items identified for disposition or transition are labeled and prepared for assigned destinations.
- ❑ All special requirements are identified and addressed.
- ❑ Any special shutdown or scheduling issues have been addressed.
- ❑ Support personnel have been briefed regarding Personnel Move Data Sheet use and JHE and lift plan requirements.
- ❑ A backup plan for resource loading is in place.

Note: A readiness review should include a representative from each organization with a role in accomplishing the activities being reviewed.

APPENDIX B

PERSONNEL MOVE DATA SHEETS

Table B.1. Summary Personnel Move Data Sheets (Sorted by Date)

Table B.2. Individual Personnel Move Data Sheets

Table B.1. Summary Personnel Move Data Sheets (Sorted by Date)

From	To	Division	Number of People	Move ID	Date	Internal/ External Moves	Backfill Spaces	Open Spaces	Comments	Predecessor	Label Color Scheme (background)
5500	SALVAGE	X094	0	SALVAGE-X094-5500	03/17/03	I					
5510	SALVAGE	X094	0	SALVAGE-X094-5510	05/05/03	I					
3546	2CSBX	X012	0	2CSBN-X012-3546	06/02/03	I			Move Equipment	CSB Substantial Completion	
7601	3CSBN	X099	0	3CSBN-X099-7601	06/24/03	I			Move AG Node to F-307-A (Johnson)	CSB Substantial Completion	
7601	3CSBN	X054	0	3CSBN-X054-7601	06/28/03	I			Move Equip. to F-307-D (Turpin)	CSB Substantial Completion	Orange
9210	7601M	X001	0	7601M-X001-9210	07/08/03	I			Move Files	Associated w/LC&FG Lab Moves	Yellow
9210	7603	X001	0	7603-X001-9210	07/08/03	I			Move Files to room 259	Associated w/LC&FG Lab Moves	Yellow
3546	3CSBN	X012	4	3CSBN-X012-3546	07/10/03	E			Temporary moved from 3546	CSB-3N Furniture	Yellow
1062	3CSBN	X054	9	3CSBN-X054-1062	07/10/03	E			ESD	CSB-3N Furniture	Yellow
1505	3CSBN	X054	1	3CSBN-X054-1505	07/10/03	E				CSB-3 Furniture	
3546	3CSBN	X054	9	3CSBN-X054-3546	07/10/03	E			Renovation 7/14-8/10	CSB-3 Furniture	Yellow
4500N	3CSBN	X054	23	3CSBN-X054-4500N	07/10/03	E				CSB-3 Furniture	Yellow
4500S	3CSBN	X054	24	3CSBN-X054-4500S	07/10/03	E				CSB-3N Furniture	Yellow
7601	3CSBN	X054	23	3CSBN-X054-7601-1	07/10/03	E				CSB-3N Furniture	Yellow
1062	SALVAGE	X054	0	SALVAGE-X054-1062	07/11/03	I					
3546	SALVAGE	X094	0	SALVAGE-X094-3546	07/11/03	I					
7601	SALVAGE	X094	0	SALVAGE-X094-7601	07/11/03	I					
1062	3CSBN	X054	0	3CSBN-X054-1062	07/14/03	I			Move 30 computers	3CSBN-X054-1062; Completion of staff relocation from 1059	Light Blue
7601	3CSBN	X054	0	3CSBN-X054-7601-2	07/14/03	I			Move Equip. to C-H308 (Suzanne)	3CSBN-X054-7601	Orange
3546	3CSBX	X054	0	3CSBX-X054-3546	07/14/03	I			Move Equipment	CSB Substantial Completion	Light Blue
3546	2CSBX	X012	0	2CSBX-X012-3546	07/15/03	I			AG Node to C-B-226 B; Johnston 574-8806	CSB Substantial Completion	
92041	4500S	X011	3	4500S-X011-92041	07/15/03	I			Coord. w/Baldwin	Mech Properties Lab Move & when space is available	
1060C	3CSBS	X094	1	3CSBS-X094-1060C	07/17/03	E			Raffo-Caiado		Light Green
1099C	3CSBS	X094	34	3CSBS-X094-1099C	07/17/03	E			Includes moving safe & files	CSB-3 Furniture	Light Green
9114	3CSBS	X094	1	3CSBS-X094-9114-1	07/17/03	E					Light Green
113UV	3CSBS	X094	0	3CSBS-X094-113CUV	07/21/03	I			5 Boxes for Hembre	CSB-3 Furniture	
9114	3CSBS	X094	1	3CSBS-X094-9114-2	07/21/03	I			Riedy	CSB-3 Furniture	
1059	1062	X042	12	1062-X042-1059	07/23/03	I			ESD	1062 Furniture	Turquoise
1062	X042	1062	1	1062-X042-1062	07/23/03	I			Tuskan		Turquoise
3546	2CSBX	X012	1	2CSBX-X012-3546	07/24/03	E			Rome	CSB-2 Furniture	
6010	2CSB	X012	19	2CSBX-X012-6010	07/24/03	E				CSB-2 Furniture	Orange
6012	2CSBX	X012	18	2CSBX-X012-6012	07/24/03	E				CSB-2 Furniture	Orange
6025	2CSBX	X012	5	2CSBX-X012-6025	07/24/03	E				CSB-2 Furniture	Orange
4512	2CSBX	X026	1	2CSBX-X026-4512	07/24/03	I			Watson	Telecom Project	
6012	2CSBX	X012	0	2CSBX-X099-6012	07/24/03	I			Telecom Room Library to C-E202-A	Telecom Project	

Table B.1 (continued)

From	To	Division	Number of People	Move ID	Date	Internal/ External Moves	Backfill Spaces	Open Spaces	Comments	Predecessor	Label Color Scheme (background)
4500N	2CSBX	X107	7	2CSBX-X107-4500N	07/24/03	E				CSB-2 Furniture	Orange
6012	2CSBX	X107	1	2CSBX-X107-6012	07/24/03	E			Flanery, Jr.	CSB-2 Furniture	Orange
1059	SALVAGE	X042	0	SALVAGE-X042-1059	07/24/03	I					
NTRC	2CSBX	X107	1	2CSBX-X107-NTRC	07/29/03	I			Liu	CSB-2 Furniture	
92041	4515	X011	3	4515-X011-92041	07/29/03	I			Coord. w/Baldwin	Mech Properties Lab Move & when space is available	
3546	1CSBX	X012	2	1CSBX-X012-3546	07/31/03	E			Halloy and Wong	CSB-1 Furniture	Light Blue
4500N	1CSBX	X012	22	1CSBX-X012-4500N-1	07/31/03	E			STK	CSB-1 Furniture	Light Blue
4500S	1CSBX	X012	5	1CSBX-X012-4500S	07/31/03	E				CSB-1 Furniture	Light Blue
6010	1CSBX	X012	3	1CSBX-X012-6010	07/31/03	E			Dunning, Jr., Jeon, & Zhong	CSB-1 Furniture	Light Blue
6025	1CSBX	X012	4	1CSBX-X012-6025	07/31/03	E			Space relocation for staff temporarily moved to multiple facilities when Bldg. 6003 was demolished.	CSB-1 Furniture	Light Blue
9210	1061	X001	5	1061-X001-9210	08/04/03	I			Associated w/LC&FG Lab Moves	1059/1061 Renovations	Yellow
2652B	1CSBX	X089	2	1CSBX-X089-2652B	08/05/03	I			Fraker and Wood	CSB-1 Furniture	
9210	1059	X001	25	1059-X001-9210	08/06/03	I			Associated w/LC&FG Lab Moves	1059/1061 Renovations	Light Green
6011	3ROBE	X094	0	3ROBE-X094-6011	08/06/03	I			Locked file cabinet w/ DOE files in Rm 219	ROB-3E Furniture	
4500N	X094	3ROBE	4	3ROBE-X094-4500N	08/07/03	E					Pink
6010	3ROBE	X094	2	3ROBE-X094-6010	08/07/03	E			Guber and Valentine	ROB-3E Furniture	Pink
6011	3ROBE	X094	33	3ROBE-X094-6011	08/07/03	E				ROB-3E Furniture	Pink
6025	3ROBE	X094	29	3ROBE-X094-6025	08/07/03	E				3ROBE Furniture	Pink
6025	SALVAGE	X094	0	SALVAGE-X094-6025	08/12/03	I					
3546	2CSBX	X012	0	2CSBX-X012-3546	08/13/03	I			AV Furniture		Light Green
6011	6025	X013	13	6025-X013-6011	08/14/03	I				Empty 6010 (Move out CCSD people)	Light Blue
6011	SALVAGE	X094	0	SALVAGE-X094-6011	08/16/03	I					
4500N	1CSBX	X012	1	1CSBX-X012-4500N-2	08/18/03	I			Chen	CSB-1 Furniture	Light Blue
3500	2ROBE	X037	1	2ROBE-X037-3500	08/21/03	E			Davis		
4500N	2ROBE	X037	2	2ROBE-X037-4500N	08/21/03	E			Personnel move associated w/ 2ROBE-X092-4500N	ROB-2E Furniture	Turquoise
4500N	2ROBE	X092	12	2ROBE-X092-4500N	08/21/03	E			Includes filing cabinets, refrig., storage cabinets, etc.	ROB-2E Furniture	Turquoise
1060C	2ROBE	X094	16	2ROBE-X094-1060C	08/21/03	E			Mays, Yoder, Williams	ROB-2E Furniture	Turquoise
1099C	2ROBE	X094	17	2ROBE-X094-1099C	08/21/03	E			Includes 7 file cabinets	ROB-2E Furniture	Turquoise
4500N	2ROBE	X094	12	2ROBE-X094-4500N	08/21/03	E				ROB-2E Furniture	Turquoise
92041	2ROBE	X094	9	2ROBE-X094-92041	08/21/03	E				ROB-2E Furniture	Yellow
4500N	6010	X013	0	6010-X013-4500N	08/26/03	I			Furniture for PD		
3500	2ROBE	X094	1	2ROBE-X094-3500	08/26/03	I			Dole	ROB-2E Furniture	Yellow
7917	2ROBE	X094	1	2ROBE-X094-7917	08/26/03	I			Move Flanagan's 2nd Office	2ROBE Furniture	Yellow
7918	2ROBE	X094	1	2ROBE-X094-7918	08/26/03	I			Owens	2ROBE Furniture	Yellow

Table B.1 (continued)

From	To	Division	Number of People	Move ID	Date	Internal/ External Moves	Backfill Spaces	Open Spaces	Comments	Predecessor	Label Color Scheme (background)
4500N	SALVAGE	X094	0	SALVAGE-094-4500N	08/26/03	I			Space for Legal	Wheeler vacating space (2ROBE-X092-4500N)	Yellow
4500N	4500S	X071	2	4500S-X071-4500N	08/28/03	I			PUBLISHING	Div 054 Move to CSB-3N	Orange
92043	5510	X094	6	5510-X094-92043	08/28/03	I			Associated w/ Main Isotope Production Lab; Aaron said they will move people with the last of the equipment;	Main Isotope Production Lab; Must find new furniture or move existing furniture from Y-12	Light Blue
6000	6010	X013	15	6010-X013-6000-1	08/28/03	E			Includes furniture & common furnishings	Move CCSD to CSB	Light Blue
6007	6010	X013	8	6010-X013-6007-1	08/28/03	E				When personnel move out of 6010 to Third Party Bldgs.	Light Blue
6008	6010	X013	6	6010-X013-6008	08/28/03	E			Includes furniture & common furnishings	When personnel move out of 6010 to Third Party Bldgs.	Light Blue
6010	6010	X013	4	6010-X013-6010-1	08/28/03	E				When personnel move out of 6010 to Third Party Bldgs.	Light Blue
1060C	2CSBX	X001	4	2CSBX-X001-1060C-1	09/04/03	E					Yellow
1061	2CSBX	X001	1	2CSBX-X001-1061	09/04/03	E			Peng		Yellow
6012	2CSBX	X012	1	2CSBX-X012-6012	09/04/03	E			Choppella		Yellow
1060C	2ROBW	X001	18	2ROBW-X001-1060C	09/04/03	E					Orange
1061	2ROBW	X001	1	2ROBW-X001-1061	09/04/03	E			Thurston		Orange
1060C	2ROBW	X012	2	2ROBW-X012-1060C	09/04/03	E			Fridman and Schmoyer		Orange
4500S	2ROBW	X012	12	2ROBW-X012-4500S	09/04/03	E				ROB-2W Furniture	Orange
6010	2ROBW	X012	14	2ROBW-X012-6010	09/04/03	E				ROB-2W Furniture	Orange
6012	2ROBW	X012	1	2ROBW-X012-6012	09/04/03	E			Wilde		
6025	2ROBW	X012	7	2ROBW-X012-6025	09/04/03	E			Relocation of division staff from Bldg. 6000	ROB-2W Furniture	Orange
4500N	2ROBW	X110	7	2ROBW-X110-4500N	09/04/03	E				ROB-2 Furniture	Orange
6010	3CSBN	X012	1	3CSBN-X012-6010	09/04/03	E			Munavalli		Yellow
6012	3CSBN	X012	2	3CSBN-X012-6012	09/04/03	E			Choi and Day		Yellow
6025	3CSBN	X012	1	3CSBN-X012-6025	09/04/03	E			Mitchom		Yellow
1505	6012	X012	2	6012-X012-1505	09/10/03	I			Horwedel & Jackson		
6011	6012	X012	1	6012-X012-6010	09/10/03	I					Yellow
6010	6012	X012	3	6012-X012-6011	09/10/03	I					Yellow
6012	6012	X012	10	6012-X012-6012	09/10/03	I					Yellow
6025	6012	X012	2	6012-X012-6025	09/10/03	I			Parks & Ryan		Yellow
4500N	1ROBW	X107	10	1ROBW-X107-4500N-1	09/11/03	E				ROB-1W Furniture	Light Blue
6010	1ROBW	X107	2	1ROBW-X107-6010	09/11/03	E			Summers & ?	ROB-1W Furniture	Light Blue
6011	1ROBW	X107	23	1ROBW-X107-6011	09/11/03	E				ROB-1W Furniture	Light Blue
6025	1ROBW	X107	18	1ROBW-X107-6025	09/11/03	E				ROB-1W Furniture	Light Blue
6011	2CSBX	X107	0	2CSBX-X107-6011	09/11/03	E			PCs and Chairs		Orange
1060C	1ROBW	X107	1	1ROBW-X107-1060C	09/16/03	I			Crawford		Light Green
1099C	1ROBW	X094	1	1ROBW-X094-1099C	09/16/03	I			Lease to be terminated 5/04	ROB-1W Furniture	Light Green
92041	1ROBW	X107	1	1ROBW-X107-92041	09/16/03	I			Y-12 Vacated Space	ROB-1W Furniture	Light Green

Table B.1 (continued)

From	To	Division	Number of People	Move ID	Date	Internal/ External Moves	Backfill Spaces	Open Spaces	Comments	Predecessor	Label Color Scheme (background)
1060C	2ROBW	X011	1	2ROBW-X011-1060C	09/16/03	I					Light Green
4500N	4500N	X065	0	4500N-X065-4500N	09/16/03	I			Move furniture to storage ST-2E		Gray
4500N	4500N	X071	17	4500N-X071-4500N	09/22/03	I			LIBRARY MOVE	Library Renovation & Personnel Move to ROB-2	Yellow
7606A	1ROBE	X094	0	1ROBE-X094-7606A-1	09/22/03	I			Move Server		
2652B	1ROBE	X089	3	1ROBE-X089-2652B	09/25/03	E			Justice, Mathys, & O;Connor	ROB-1E Furniture	Light Green
4500N	1ROBE	X094	28	1ROBE-X094-4500N	09/25/03	E				ROB-1E Furniture	Light Green
7606A	1ROBE	X094	5	1ROBE-X094-7606A-2	09/25/03	E			NSTD; Wagoner other office	ROB-1E & Lab Moves	Light Green
7918	1ROBE	X094	4	1ROBE-X094-7918	09/25/03	E					Light Green
92041	1ROBE	X094	1	1ROBE-X094-92041	09/25/03	I			Shaffer		Light Green
92043	1ROBE	X094	1	1ROBE-X094-92043	09/25/03	I			Wagoner		Light Green
4500N	1ROBW	X107	0	1ROBW-X107-4500N-2	09/25/03	I			Files		
4500N	3CSBS	X094	1	3CSBS-X094-4500N-1	09/25/03	E			Tucker		Yellow
4500N	1ETFX	X094	0	1ETFX-X094-4500N	09/27/03	I			1 Safe-Contact Wheeler		
7606A	1ROBE	X094	0	1ROBE-X094-7606A-3	09/27/03	I			Move 6 FireKing 4-drawer Safes		
92012	4500N	X019	0	4500N-X019-92012	09/29/03	E			Fusion Energy Library - Temp.	FED Personnel Moves	Light Blue
6008	6025	X013	1	6025-X013-6008	09/29/03	E			Cardall	6025 Renovation	Turquoise
6010	6025	X013	15	6025-X013-6010	09/29/03	E					Turquoise
6025	6025	X013	1	6025-X013-6025	09/29/03	E					Turquoise
7918	1ROBE	X094	0	1ROBE-X094-7918	10/01/03	I			Pickup new printer at Bldg 7918 and deliver to Lay 1ROBE Rm R107		
4500N	3CSBS	X094	0	3CSBS-X094-4500N-2	10/01/03	I			Move Tucker's boxes		
NTRC	3156	X092	1	3156-X092-NTRC	10/01/03	I			Associated w/ MEMS/NEMS & Ion Milling Lab Moves - Kueck is moving.	ETF-2 Furniture & Lab Move	Yellow
4500N	1501	X042	1	1505-X042-4500N	10/02/03	I			Lee		Light Blue
4500N	4500N	X042	1	4500N-X042-4500N-1	10/02/03	I			Hagan	None	Light Blue
4500N	4500N	X042	0	4500N-X042-4500N-2	10/02/03	I			Move 29 boxes to Rm H-1		
4500N	4500N	X060	1	4500N-X060-4500N	10/02/03	I			Move Sanders		Light Blue
92012	3ROBW	X019	0	3ROBW-X019-92012-1	10/06/03	I			Move approx 30 servers between 10/6 and 10/10 (begin moves at 5pm & move no more than 8 each night)		Orange
6010	6000	X013	1	6010-X013-6000	10/08/03	E			Move Alton		Turquoise
6010	6010	X013	1	6010-X013-6010	10/08/03	E			Move Kennedy		Turquoise
6000	6025	X013	4	6025-X013-6000-2	10/08/03	E			Ervin, Milan, McBride, Young, Alton, and Kennedy	6025 Renovation	Turquoise
92012	3ROBW	X019	58	3ROBW-X019-92012-2	10/09/03	E			Attending Conference in Mid Oct.	ROB-3W Furniture	Yellow
92012	1ROBW	X107	1	1ROBW-X107-92012	10/09/03	E			Strickler; move w/FED		Light Green
92012	3ROBW	X107	0	3ROBW-X019-92012	10/14/03	I			Chairs and Boxes for FED	ROB-3W Furniture	Yellow
4500N	4500N	X092	1	4500N-X092-4500N	10/14/03	I			Walker - Temporary relocation - moving to ETF later		Orange

Table B.1 (continued)

From	To	Division	Number of People	Move ID	Date	Internal/ External Moves	Backfill Spaces	Open Spaces	Comments	Predecessor	Label Color Scheme (background)
4500N	5500	X035	2	5500-X035-4500N	10/14/03	I			ENVIRONMENTAL PROT - Rutherford and Hall		Orange
7606A	5510	X094	0	5510-X094-7606A	10/14/03	I			Move 6 FireKing Safes - Contact Marcus 574-0437 - Alternate Zevevbergen 574-5917		
NTRC	2ETFX	X092	1	2ETFX-X092-NTRC	10/16/03	I			Oland moved himself		Light Green
92043	1ROBE	X094	0	1ROBE-X094-92043	10/20/03	I			Move 35 isotope record fireproof safes.	ROB-1E Furniture & 5510-X094-92043	Light Green
1060C	2CSBX	X001	0	2CSBX-X001-1060C	10/20/03	I			Move Servers from Rm 235		Light Blue
4508	1ETFX	X094	2	1ETFX-X094-4508	10/23/03	I			Move Sitterson & Heatherly	ETF-1 Furniture & Coord. w/ Thermal Hydraulic Lab Moves	Light Green
2ROBE	1ETFX	X094	1	1ETFX-X094-2ROBE	10/23/03	E			McFee Final Move		Light Green
NTRC	1ROBE	X089	1	1ROBE-X089-NTRC	10/23/03	E			Burnette		Pink
1060C	1ROBE	X094	1	1ROBE-X094-1060C	10/23/03	E			Rader	ROB-1E Furniture	Pink
3CSBN	2ETFX	X092	1	2ETFX-X092-3CSBN	10/23/03	E			Kaldenbach		Light Green
1060C	2ETFX	X071	4	2ETFX-X071-1060C	10/23/03	E			Reproduction personnel & equipment; Johnson moving into 3 offices	ETF-2 Furniture	Light Green
3500	2ETFX	X092	13	2ETFX-X092-3500-1	10/23/03	E			Move Hutchinson, Lafferty, McNeany, Schaich, D-Urso, Simpson and Simpson (13 total to move now), others to move on 3/9/04		Light Green
3606	2ETFX	X092	1	2ETFX-X092-3606	10/23/03	E			Allington	ETF-2 Furniture; Can move anytime	Light Green
4500N	2ETFX	X092	3	2ETFX-X092-4500N	10/23/03	E			ESH&Q Staff supporting ESTD	Move with first ESTD ETF move to provide oversight.	Light Green
4500S	2ETFX	X092	3	2ETFX-X092-4500S-1	10/23/03	E			Associated w/ MEMS/NEMS & Ion Milling Lab Moves	ETF -2 Furniture & Lab Move	Light Green
NTRC	2ETFX	X092	17	2ETFX-X092-NTRC	10/23/03	E			Associated w/ Photonics & Hybrid Lighting Labs	ETF-2 Furniture & Lab Move	Light Green
4500N	2ETFX	X024	1	2ETFX-X024-4500N	10/23/03	E			Miller		Light Green
1060C	2ETFX	X094	0	2ETFX-X094-1060C-1	10/24/03	I			Move 1 safe with a couple of other pieces requiring rigger support - sometime around 10/23/03 - Stapler and Hole punch		
2ROBE	2ETFX	X094	3	2ETFX-X094-2ROBE	10/28/03	I			Associated with Thermal Hydraulics or Capsule Assembly Lab Move	ETF-2 Furniture & Lab Moves	Orange
92013	2ETFX	X092	1	2ETFX-X092-92013	10/30/03	I			Cunningham	ETF-2 Furniture; Timing not critical	Light Green
3156	NTRC	X092	14	NTRC-X092-3156	10/30/03	E			Move in 11/03 with other NTRC	Moves out of NTRC (2ETFX-X092-NTRC)	Yellow

Table B.1 (continued)

From	To	Division	Number of People	Move ID	Date	Internal/ External Moves	Backfill Spaces	Open Spaces	Comments	Predecessor	Label Color Scheme (background)
4500N	NTRC	X092	2	NTRC-X092-4500N	10/30/03	E			Move Transportation Technology Computer Lab (consists of 3 computers) with personnel.	After NTRC moves out	Yellow
92041	2ETFX	X092	4	2ETFX-X092-92041	11/06/03	E			Associated w/ Advanced Thermal Hydraulic Lab Moves & Aircraft Lab (Welch)	ETF-2 Furniture & Lab Move	Light Green
3147	3156	X092	3	3156-X092-3147	11/11/03	I				Moves out of 3156 (NTRC-X092-3156)	Light Green
9725	2ROBE	X094	0	2ROBE-X094-9725	11/11/03	I			Eleven safe moves to R-H204B (Echols); Security required for move	ROB-2E & Lab Moves	Yellow
92012	1ETFX	X019	1	1ETFX-X019-92012	11/17/03	I			Foust		
4500N	4500N	X065	11	4500N-X065-4500N	11/20/03	I			Brown must be out by 11/24/03 - 2 days Thurs and Fri	Start of 4500N Headhouse Renovation	Light Green
4500N	SALVAGE	X065	0	SALVAGE-X065-4500N	11/24/03	I			Space for Tech. Trans.	Marilyn Brown vacating space (4500N-X065-4500N)	Light Blue
1000	3546	X064	4	3546-X064-1000	11/25/03	E			Work for Others Program		Light Green
1000	3546	X079	8	3546-X079-1000	11/25/03	E			Property (Will Mentor)		Light Green
1000	3546	X112	3	3546-X112-1000	11/25/03	E			Export/Import Controls	3546 Renovation	Light Green
4500N	1000	X064	14	1000-X064-4500N	12/04/03	I			PROCUREMENT	3546 Renovation	Light Green
4500S	2ETFX	X092	1	2ETFX-X092-4500S-2	12/11/03	I			Datskos		
4500N	3156	X092	9	3156-X092-4500N	12/16/03	I			Not associate w/ lab moves; move 12/16 per Wheeler	3156 move to NTRC	Orange
4508	2ETFX	X092	3	2ETFX-X092-4508	12/16/03	E			Associated w/ Building Insulation Lab	Coord. w/ Lab Moves	Light Green
4500N	SALVAGE	X071	0	SALVAGE-X071-4500N	01/05/04	I			Library Expansion		Yellow
92041	2ETFX	X094	2	2ETFX-X094-92041	01/12/04	E			Coordinate w/Johnson; FSAR Library Room 200 to E-F205; with 2 people	ETF-1 Furniture (Mike is pricing book cases) & Lab Move	Orange
92041	2ETFX	X011	9	2ETFX-X011-92041	01/13/04	I				ETF-2 Furniture & Lab Move	Light Blue
92041	1ETFX	X011	10	1ETFX-X011-92041	01/27/04	I				ETF-1 Furniture & Lab Move	Light Green
1060C	2ETFX	X094	0	2ETFX-X094-1060C-2	01/27/04	I			Tech Standards File Room		Light Green
92043	5500	X094	4	5500-X094-92043	02/03/04	I			Wet Chem. Lab Personnel; Confirm w/Aaron	5500 Wet Chemistry Renovations	Orange
111UV	4500N	X031	19	4500N-X031-111UV	02/06/04	E			Tech Transfer; Furniture vendor will disassemble/reassemble & move furniture; Put furniture move on separate contract by furniture vendor; Move furniture on 2/6 - 2/8 to disassemble & move	4500N Headhouse Renovation	Orange

Table B.1 (continued)

From	To	Division	Number of People	Move ID	Date	Internal/ External Moves	Backfill Spaces	Open Spaces	Comments	Predecessor	Label Color Scheme (background)
111UV	4500N	X085	13	4500N-X085-111UV	02/06/04	E			Lease Terminated 5/04; Legal; Furniture vendor will disassemble/reassemble & move furniture; Put furniture move on separate contract by furniture vendor; Move furniture on 2/6 - 2/8 to disassemble & move	4500N Headhouse Renovation	Light Green
4500N	2ETFX	X024	1	2ETFX-X024-4500N	02/24/04	I			Quality Testing Lab	Move with lab	Yellow
3500	2ETFX	X092	3	2ETFX-X092-3500-2	03/09/04	I			Associated w/Optics Lab Move		
3606	3500	X092	17	3500-X092-3606	04/27/04	I			Associated with Analog/Digital Systems Lab	Close coordination with Analog/Digital Systems Lab not required because of close proximity of old & new locations.	Orange
4500N	4500N	X019	0	4500N-X019-4500N	05/03/04	I			Fusion Energy Library - Move from temporary to permanent space	4500N Library Expansion	
3CSBN	JICS	X012	6	JICS-X012-3CSBN	05/04/04	I				JICS Completion	Yellow
7606A	7601	X089	9	7601-X089-7606A	08/03/04	I			Relocation of FMD support staff (Denton)		Light Green
92012	7606A	X019	15	7606A-X019-92012	10/29/04	I				7601-X089-7606A	Gray
3500	3156	X092	5	3156-X092-3500	12/03/04	I				May need to move someone out - 12/04	Orange
1037	1ETFX	X011	6	1ETFX-X011-1037	04/15/05	I			Coordinate w/ Membrane Tech. Lab	Renovations to ETF	Light Blue
Total:			1010								

Table B.2. Personnel Move Data Sheets

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
NSTD	X094	Furniture	na	5500		SALVAGE		SALVAGE-X094-5500	03/17/03
NSTD	X094	Furniture	na	5510		SALVAGE		SALVAGE-X094-5510	05/05/03
CSM	X012	Move Equipment	na	3546	112	CSB		2CSBN-X012-3546	06/02/03
OVH	X099	AG Node	na	7601	14	CSB	C-F307A	3CSBN-X099-7601	06/24/03
NCTD	X054	Move Equip. (Turpin)	na	7601	102	CSB	C-F307D	3CSBN-X054-7601	06/28/03
LSD	X001	Move Files	na	9210		7601M	10, 10A, 11, 11A	7601M-X001-9210	07/08/03
NCTD	X054	CALLOWAY, JC	746268	1062	213	CSB	C-C312-06	3CSBN-X054-1062	07/10/03
NCTD	X054	CROSS, BR	722771	1062	211	CSB	C-C312-08	3CSBN-X054-1062	07/10/03
NCTD	X054	FRIEND, SA	37689	1062	213	CSB	C-C312-04	3CSBN-X054-1062	07/10/03
NCTD	X054	GREEN, JA	30060	1062	214	CSB	C-C312-07	3CSBN-X054-1062	07/10/03
NCTD	X054	GREENWOOD, JM	29746	1062	212	CSB	C-C312-03	3CSBN-X054-1062	07/10/03
NCTD	X054	SILL, DE	30817	1062	211	CSB	C-C312-02	3CSBN-X054-1062	07/10/03
NCTD	X054	SIMMONS, JW	24623	1062	208	CSB	C-H304	3CSBN-X054-1062	07/10/03
NCTD	X054	WILLOUGHBY, SW	27033	1062	210	CSB	C-C305	3CSBN-X054-1062	07/10/03
NCTD	X054	WINFREE, JG	18822	1062	216	CSB	C-C312-05	3CSBN-X054-1062	07/10/03
NCTD	X054	ARWOOD, PC	604114	3546	211	CSB	C-F306	3CSBN-X054-3546	07/10/03
NCTD	X054	DYKAS JR, WP	28519	3546	208	CSB	C-F310	3CSBN-X054-3546	07/10/03
NCTD	X054	EASH, KE	37969	3546	201	CSB	C-J311-01	3CSBN-X054-3546	07/10/03
NCTD	X054	FLOYD, MA	22929	3546	207	CSB	C-J306	3CSBN-X054-3546	07/10/03
NCTD	X054	GERBER, JJ	722749	3546	213	CSB	C-J313-01	3CSBN-X054-3546	07/10/03
NCTD	X054	HINKEL, GC	28212	3546	203	CSB	C-F304	3CSBN-X054-3546	07/10/03
NCTD	X054	SCOTT, AR	31918	3546	205	CSB	C-F314	3CSBN-X054-3546	07/10/03
NCTD	X054	SMITH, MD	604382	3546	215	CSB	C-H302	3CSBN-X054-3546	07/10/03
NCTD	X054	THOMAS, CE	13732	3546	206	CSB	C-F308	3CSBN-X054-3546	07/10/03
NCTD	X054	BROOKS, KM	604180	4500N	E208	CSB	C-J317-03	3CSBN-X054-4500N	07/10/03
NCTD	X054	CAUSBY, SL	602042	4500N	E204	CSB	C-J317-01	3CSBN-X054-4500N	07/10/03
NCTD	X054	CHANG, SL	25291	4500N	E230	CSB	C-B309	3CSBN-X054-4500N	07/10/03
NCTD	X054	DEPP, DM	34456	4500N	E222	CSB	C-J315-07	3CSBN-X054-4500N	07/10/03
NCTD	X054	DIPPO, JL	23060	4500N	259	CSB	C-C301	3CSBN-X054-4500N	07/10/03
NCTD	X054	FARRAR, AK	22051	4500N	265	CSB	C-C307	3CSBN-X054-4500N	07/10/03
NCTD	X054	GILES, DC	18592	4500N	E228	CSB	C-H310	3CSBN-X054-4500N	07/10/03
NCTD	X054	HAND, RE JR	9357	4500N	E216	CSB	C-H312	3CSBN-X054-4500N	07/10/03
NCTD	X054	HILL, GW	27659	4500N	G012	CSB	C-J313-06	3CSBN-X054-4500N	07/10/03
NCTD	X054	JAMES, LA	29388	4500N	E210	CSB	C-J317-02	3CSBN-X054-4500N	07/10/03
NCTD	X054	LINDSEY, R	25363	4500N	E214	CSB	C-H306	3CSBN-X054-4500N	07/10/03
NCTD	X054	MCCURDY, NK	33140	4500N	B232	CSB	C-C312-01	3CSBN-X054-4500N	07/10/03
NCTD	X054	MILBURN, KA	29196	4500N	E212	CSB	C-C301-B	3CSBN-X054-4500N	07/10/03
NCTD	X054	PEACHER, KD	27248	4500N	I205F	CSB	C-C311	3CSBN-X054-4500N	07/10/03
NCTD	X054	ROSENBAUM, LM	18301	4500N	E218	CSB	C-B311	3CSBN-X054-4500N	07/10/03
NCTD	X054	SHARP, JC	10950	4500N	E232	CSB	C-J315-05	3CSBN-X054-4500N	07/10/03
NCTD	X054	SMELCER, D	25481	4500N	E220	CSB	C-C303	3CSBN-X054-4500N	07/10/03
NCTD	X054	SWAIL, BK	28120	4500N	E236	CSB	C-C309	3CSBN-X054-4500N	07/10/03
NCTD	X054	TREADWAY, LL	604410	4500N	B224	CSB	C-J315-03	3CSBN-X054-4500N	07/10/03
NCTD	X054	VERASTEGUI, RJ	18431	4500N	257	CSB	C-C301-A	3CSBN-X054-4500N	07/10/03
NCTD	X054	WALLACE, BS	28757	4500N	E234	CSB	C-C313	3CSBN-X054-4500N	07/10/03
NCTD	X054	WALLS, D	21424	4500N	B224	CSB	C-J315-06	3CSBN-X054-4500N	07/10/03
NCTD	X054	WOODS, SD	604436	4500N	G004	CSB	C-J313-04	3CSBN-X054-4500N	07/10/03
NCTD	X054	ALVARO, DR	37873	4500S	G056-05-	CSB	C-J303-05	3CSBN-X054-4500S	07/10/03
NCTD	X054	BARRY, KT	25311	4500S	T003-4	CSB	C-A307	3CSBN-X054-4500S	07/10/03
NCTD	X054	BRADSHAW, JN	34479	4500S	G056-06	CSB	C-J311-08	3CSBN-X054-4500S	07/10/03
NCTD	X054	CHAVEZ-BECKER, LM	29335	4500S	T003-2	CSB	C-J313-07	3CSBN-X054-4500S	07/10/03
NCTD	X054	CROSS, DA	35022	4500S	G056-05(	CSB	C-J303-06	3CSBN-X054-4500S	07/10/03
NCTD	X054	CUNNINGHAM, CW	35698	4500S	G047-01	CSB	C-J317-05	3CSBN-X054-4500S	07/10/03
NCTD	X054	DRAKE, JR	14106	4500S	G056-03	CSB	C-B317	3CSBN-X054-4500S	07/10/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
NCTD	X054	GETSI, NC	26698	4500S	G56-8	CSB	C-A305	3CSBN-X054-4500S	07/10/03
NCTD	X054	HENRY, MF (changed 7/8)	604233	4500S	S234	CSB	C-J313-06	3CSBN-X054-4500S	07/10/03
NCTD	X054	HIGHT, DG	604236	4500S	G56-10	CSB	C-J303-04	3CSBN-X054-4500S	07/10/03
NCTD	X054	HOVEY, DN	27991	4500S	G56-B	CSB	C-J311-09	3CSBN-X054-4500S	07/10/03
NCTD	X054	KARAUS, TJ	33611	4500S	G047-3	CSB	C-J315-02	3CSBN-X054-4500S	07/10/03
NCTD	X054	LATHAM, C	691554	4500S	T003	CSB	C-J313-03	3CSBN-X054-4500S	07/10/03
NCTD	X054	MOODY, JB	9789	4500S	E204	CSB	C-C315-04	3CSBN-X054-4500S	07/10/03
NCTD	X054	PARHAM, ST	677011	4500S	G056-11	CSB	C-J303-03	3CSBN-X054-4500S	07/10/03
NCTD	X054	PARR, RL	13551	4500S	G56-1	CSB	C-B319	3CSBN-X054-4500S	07/10/03
NCTD	X054	PATE, KH	19656	4500S	G047-1	CSB	C-J317-06	3CSBN-X054-4500S	07/10/03
NCTD	X054	PEARCE, JW	32648	4500S	T003-5	CSB	C-B315	3CSBN-X054-4500S	07/10/03
NCTD	X054	PHILLIPS, RD	24594	4500S	G056-05I	CSB	C-A303	3CSBN-X054-4500S	07/10/03
NCTD	X054	SEAY, AO	32585	4500S	G047-2	CSB	C-J317-04	3CSBN-X054-4500S	07/10/03
NCTD	X054	STEPHENS, RC	22012	4500S	G056-02-	CSB	C-A301	3CSBN-X054-4500S	07/10/03
NCTD	X054	STOOKSBURY, FE	18892	4500S	T003-3-C	CSB	C-J313-05	3CSBN-X054-4500S	07/10/03
NCTD	X054	WILLOUGHBY, TG	30148	4500S	F056	CSB	C-J313-10	3CSBN-X054-4500S	07/10/03
NCTD	X054	ZISMAN, J	901407	4500S	G056-04	CSB	C-J303-02	3CSBN-X054-4500S	07/10/03
NCTD	X054	DMT Student-ALLEN	901204	7601	121	CSB	C-J311-04	3CSBN-X054-7601	07/10/03
NCTD	X054	DMT Student--FIELDS	903194	7601	121	CSB	C-J311-03	3CSBN-X054-7601	07/10/03
NCTD	X054	DMT Student--SHARP	902971	7601		CSB	C-J311-05	3CSBN-X054-7601	07/10/03
NCTD	X054	DMT Student--WATKINS	903195	7601	121	CSB	C-J311-02	3CSBN-X054-7601	07/10/03
NCTD	X054	DUNCAN, JL	14511	7601	10A	CSB	C-A315	3CSBN-X054-7601	07/10/03
NCTD	X054	DUNCAN, RE	24084	7601	110	CSB	C-A313	3CSBN-X054-7601	07/10/03
NCTD	X054	EVERETT, DW	13695	7601	16	CSB	C-J309-10	3CSBN-X054-7601	07/10/03
NCTD	X054	EVON, JM	26777	7601	17	CSB	C-J309-03	3CSBN-X054-7601	07/10/03
NCTD	X054	FISHER, CD	20107	7601	109	CSB	C-A319	3CSBN-X054-7601	07/10/03
NCTD	X054	FOUST, JD	19346	7601	117	CSB	C-J309-08	3CSBN-X054-7601	07/10/03
NCTD	X054	HICKS, SE	29236	7601	108	CSB	C-A317	3CSBN-X054-7601	07/10/03
NCTD	X054	JERNIGAN, JJ	12616	7601	24	CSB	C-J309-06	3CSBN-X054-7601	07/10/03
NCTD	X054	JOHNSON, BA	24905	7601	18	CSB	C-J309-04	3CSBN-X054-7601	07/10/03
NCTD	X054	JOHNSTON, RB	13999	7601	15	CSB	C-J309-05	3CSBN-X054-7601	07/10/03
NCTD	X054	KALDENBACH, BJ	30375	7601	107	CSB	C-J310	3CSBN-X054-7601	07/10/03
NCTD	X054	LONG, JS	20222	7601	26	CSB	C-J309-02	3CSBN-X054-7601	07/10/03
NCTD	X054	LUSHBAUGH, RC	22478	7601	103	CSB	C-A309	3CSBN-X054-7601	07/10/03
NCTD	X054	Network Lab	na	7601	10	CSB	C-F307-C	3CSBN-X054-7601	07/10/03
NCTD	X054	Network Staging	na	7601	11	CSB	C-F307-D	3CSBN-X054-7601	07/10/03
NCTD	X054	PFLEGER, CM	24474	7601	115	CSB	C-J309-09	3CSBN-X054-7601	07/10/03
NCTD	X054	SANFORD, KT	27708	7601	111	CSB	C-A311	3CSBN-X054-7601	07/10/03
NCTD	X054	SMITH, JB	8608	7601	105	CSB	C-J312	3CSBN-X054-7601	07/10/03
NCTD	X054	STAFFORD, PL	37885	7601	113	CSB	C-J303-01	3CSBN-X054-7601	07/10/03
NCTD	X054	TURPIN, DM	18960	7601	102	CSB	C-J308	3CSBN-X054-7601	07/10/03
NCTD	X054	WANTLAND, DM	37925	7601	119	CSB	C-J309-01	3CSBN-X054-7601	07/10/03
NCTD	X054	Furniture	na	1062		SALVAGE		SALVAGE-X054-1062	07/11/03
NSTD	X094	Furniture	na	3546		SALVAGE		SALVAGE-X094-3546	07/11/03
NSTD	X094	Furniture	na	7601		SALVAGE		SALVAGE-X094-7601	07/11/03
NCTD	X054	Move 30 computers	na	1062		CSB	C-H308	3CSBN-X054-1062	07/14/03
NCTD	X054	Equipment	na	7601		CSB	C-H308	3CSBN-X054-7601-2	07/14/03
NCTD	X054	Equipment	na	3546		CSB	C-F307B	3CSBX-X054-3546	07/14/03
CSM	X012	AG Node	na	3546		CSB	C-B206B	2CSBX-X012-3546	07/15/03
M&C	X011	BATTISTE, R	14594	9204-1	191	4500S	T20	4500S-X011-92041	07/15/03
M&C	X011	HENDRICH, WR	14035	9204-1	335	4500S	T24	4500S-X011-92041	07/15/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
M&C	X011	RUGGLES-WRENN, MB	28554	9204-1	331	4500S	T22	4500S-X011-92041	07/15/03
NSTD	X094	RAFFO-CAIADO, Anna	902911	1099COM	NE11	CSB	C-A323	3CSBS-X094-1060C	07/17/03
NSTD	X064	BRADLEY, KM	013694	1099COM	N19	CSB	C-G303	3CSBS-X094-1099C	07/17/03
NSTD	X094	BUNTROCK, PA	026844	1099COM	N36	CSB	C-E302	3CSBS-X094-1099C	07/17/03
NSTD	X094	CENTRAL PRINTERS	tbd	1099COM	N11	CSB	C-D313	3CSBS-X094-1099C	07/17/03
NSTD	X094	CHRISTMAN, JC	036081	1099COM	N25	CSB	C-E303	3CSBS-X094-1099C	07/17/03
NSTD	X064	CLAIBORNE, HM	037758	1099COM	N23	CSB	C-G301	3CSBS-X094-1099C	07/17/03
NSTD	X064	COBB, LL	030957	1099COM	NE09	CSB	C-G302	3CSBS-X094-1099C	07/17/03
NSTD	X094	COMPUTER/SERVER	tbd	1099COM	NE03	CSB	C-I318	3CSBS-X094-1099C	07/17/03
NSTD	X094	CONFERENCE ROOM	na	1099COM	N01	CSB	C-I311	3CSBS-X094-1099C	07/17/03
NSTD	X094	GOULDY, BC	018808	1099COM	N32	CSB	C-D325	3CSBS-X094-1099C	07/17/03
NSTD	X094	HALLMAN, BOYD	tbd	1099COM	E20	CSB	C-D315	3CSBS-X094-1099C	07/17/03
NSTD	X094	HAYES, SM	034076	1099COM	NW08	CSB	C-A321	3CSBS-X094-1099C	07/17/03
NSTD	X094	HEMBREE, DM	026729	1099COM	N21	CSB	C-D323	3CSBS-X094-1099C	07/17/03
NSTD	X094	HOPWOOD, WH	009250	1099COM	N16	CSB	C-D317	3CSBS-X094-1099C	07/17/03
NSTD	X094	JOHNSON, JL	035246	1099COM	N17	CSB	C-E305	3CSBS-X094-1099C	07/17/03
NSTD	X094	KALDENBACH, KY	027571	1099COM	N22	CSB	C-D307	3CSBS-X094-1099C	07/17/03
NSTD	X094	KELLY, ML	027306	1099COM	N34	CSB	C-D327	3CSBS-X094-1099C	07/17/03
NSTD	X094	KOVACIC, DON	617633	1099COM	E31	CSB	C-D333	3CSBS-X094-1099C	07/17/03
NSTD	X094	LAMBERT, LD	017922	1099COM	N20	CSB	C-D309	3CSBS-X094-1099C	07/17/03
NSTD	X094	LETOURNEAU, Volena	031048	1099COM	N13	CSB	C-D303	3CSBS-X094-1099C	07/17/03
NSTD	X094	MCCOWAN, OJ	011591	1099COM	NE05	CSB	C-A324	3CSBS-X094-1099C	07/17/03
NSTD	X094	MCKINNEY, TL	028345	1099COM	N26	CSB	C-D305	3CSBS-X094-1099C	07/17/03
NSTD	X094	NATIONS JR, JO	018329	1099COM	N38	CSB	C-A325	3CSBS-X094-1099C	07/17/03
NSTD	X107	PATTY, SD	023352	1099COM	N14	CSB	C-I312	3CSBS-X094-1099C	07/17/03
NSTD	X092	PILLAI, REKHA	036179	1099COM	NE18	CSB	C-D316	3CSBS-X094-1099C	07/17/03
NSTD	X094	ROLLEN JR, HY	031145	1099COM	N03	CSB	C-I326	3CSBS-X094-1099C	07/17/03
NSTD	X094	ROSE, LJ	023937	1099COM	NE07	CSB	C-A326	3CSBS-X094-1099C	07/17/03
NSTD	X094	RUTHERFORD, LM	019672	1099COM	N15	CSB	C-E301	3CSBS-X094-1099C	07/17/03
NSTD	X094	SATKOWIAK, LJ	035921	1099COM	N28	CSB	C-D301	3CSBS-X094-1099C	07/17/03
NSTD	X094	SHETH, YV	028557	1099COM	NE15	CSB	C-D319	3CSBS-X094-1099C	07/17/03
NSTD	X037	SHOPE, VC (Fin. Off.)	024265	1099COM	NE13	CSB	C-F316	3CSBS-X094-1099C	07/17/03
NSTD	X094	SMITH, SE	020285	1099COM	N05	CSB	C-I324	3CSBS-X094-1099C	07/17/03
NSTD	X094	SNEED, DS	022342	1099COM	NE12	CSB	C-I306	3CSBS-X094-1099C	07/17/03
NSTD	X094	SUPPLIES & FILES	na	1099COM	NE14	CSB	C-D314	3CSBS-X094-1099C	07/17/03
NSTD	X094	TOTH, WJ	31158	1099COM	NW06	CSB	C-D311	3CSBS-X094-1099C	07/17/03
NSTD	X094	TOWNSEND, SHERRY	22431	1099COM	E03	CSB	C-C317	3CSBS-X094-1099C	07/17/03
NSTD	X094	WHITAKER, JM	024638	1099COM	N18	CSB	C-D337-D339	3CSBS-X094-1099C	07/17/03
NSTD	X094	WHITE, BG	034267	1099COM	N30	CSB	C-E304	3CSBS-X094-1099C	07/17/03
NSTD	X094	WYNN, TG	036383	1099COM	N12	CSB	C-I310	3CSBS-X094-1099C	07/17/03
NSTD	X094	FILE ROOM	na		na	CSB	C-D330	3CSBS-X094-1099C	07/17/03
NSTD	X094	IS FILES/PRINTERS	tbd	tbd	tbd	CSB	C-I328	3CSBS-X094-1099C	07/17/03
ESD	X042	Furniture	na	1059		SALVAGE		SALVAGE-X042-1059	07/18/03
NSTD	X094	Boxes	na	113UNV	22	CSB		3CSBS-X094-113CUNV	07/21/03
NSTD	X094	RIEDY, ALEX	25511	9114	2601	CSB	C-C315	3CSBS-X094-9114	07/21/03
ESD	X042	DOWNING, MARK	35443	1059	213	1062	111	1062-X042-1059	07/23/03
ESD	X042	EDWARDS, NELSON	10428	1059	214	1062	214	1062-X042-1059	07/23/03
ESD	X042	GUNDERSON, CARLA	25885	1059	204	1062	202	1062-X042-1059	07/23/03
ESD	X042	HANSON, PAUL	29602	1059	203	1062	201	1062-X042-1059	07/23/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
ESD	X042	MCLAUGHLIN, SANDY	900888	1059	202	1062	102	1062-X042-1059	07/23/03
ESD	X042	NORBY, RICH	27150	1059	205	1062	203	1062-X042-1059	07/23/03
ESD	X042	POPHAM, KAREN	18042	1059	212	1062	212	1062-X042-1059	07/23/03
ESD	X042	TOLBERT, VIRGINIA	22142	1059	210	1062	102	1062-X042-1059	07/23/03
ESD	X042	TSCHAPLINSKI, TIM	31205	1059	208	1062	216	1062-X042-1059	07/23/03
ESD	X042	WAN, SHIQIANG	902011	1059	201	1062	208	1062-X042-1059	07/23/03
ESD	X042	WULLSCHLEGER, STAN	34406	1059	215	1062	213	1062-X042-1059	07/23/03
ESD	X042	YIN, TONG MING	900668	1062	102	1062	210	1062-X042-1059	07/23/03
ESD	X042	TUSKAN, JERRY	30576	1059	216	1062	215	1062-X042-1062	07/23/03
CSM	X012	ROME, JA	11971	3546	109	CSB	C-A215	2CSBX-X012-3546	07/24/03
CSM	X012	BARHEN, J	20678	6010	215	CSB	C-D201	2CSBX-X012-6010	07/24/03
CSM	X012	BRAIMAN,Y	37741	6010	211	CSB	C-D207	2CSBX-X012-6010	07/24/03
CSM	X012	D'HELON,C	691392	6010	204	CSB	C-D227	2CSBX-X012-6010	07/24/03
CSM	X012	GAO,J	901436	6010		CSB	C-B203	2CSBX-X012-6010	07/24/03
CSM	X012	GLOVER,CW	25910	6010	221	CSB	C-D213	2CSBX-X012-6010	07/24/03
CSM	X012	GRICE, WP	691092	6010	203-A	CSB	C-D229	2CSBX-X012-6010	07/24/03
CSM	X012	GRIMMELL,WC	35397	6010	217	CSB	C-A221	2CSBX-X012-6010	07/24/03
CSM	X012	IMAM,N	902139	6010	220	CSB	C-D233	2CSBX-X012-6010	07/24/03
CSM	X012	JUNG,DL	745279	6010	205	CSB	C-A217	2CSBX-X012-6010	07/24/03
CSM	X012	KIM, Y	900088	6010	204-B	CSB	C-D231	2CSBX-X012-6010	07/24/03
CSM	X012	KIREEV,VA	902016	6010	206	CSB	C-D237	2CSBX-X012-6010	07/24/03
CSM	X012	LANNING, TP	746178	6010	214	CSB	C-D225	2CSBX-X012-6010	07/24/03
CSM	X012	LENHART, SM	27803	6010	206-A	CSB	C-D209	2CSBX-X012-6010	07/24/03
CSM	X012	LIU,Y	691523	6010	206	CSB	C-D235	2CSBX-X012-6010	07/24/03
CSM	X012	PARKER, LE	25710	6010	213	CSB	C-D221	2CSBX-X012-6010	07/24/03
CSM	X012	RAO, NS	34903	6010	210	CSB	C-D239	2CSBX-X012-6010	07/24/03
CSM	X012	REISTER,DB	27149	6010	212	CSB	C-A225	2CSBX-X012-6010	07/24/03
CSM	X012	WELLS, JC	36413	6010	208	CSB	C-A219	2CSBX-X012-6010	07/24/03
CSM	X012	WU,Q	900194	6010	250	CSB	C-D241	2CSBX-X012-6010	07/24/03
CSM	X012	BERNHOLDT, DE	37998	6012	202-A	CSB	C-C211	2CSBX-X012-6012	07/24/03
CSM	X012	BRANSTETTER, ML	900585	6012	208	CSB	C-C213	2CSBX-X012-6012	07/24/03
CSM	X012	CHANCHIO, K	900424	6012	200-A	CSB	C-C209	2CSBX-X012-6012	07/24/03
CSM	X012	DICKSON,SP	901442	6012	212-A	CSB	C-B205	2CSBX-X012-6012	07/24/03
CSM	X012	DRAKE, JB	22209	6012	201	CSB	C-C205	2CSBX-X012-6012	07/24/03
CSM	X012	DUNIGAN JR, TH	14468	6012	204-A	CSB	C-C221	2CSBX-X012-6012	07/24/03
CSM	X012	ERICKSON III, DJ	38030	6012	215	CSB	C-C217	2CSBX-X012-6012	07/24/03
CSM	X012	GEIST II, GA	25505	6012	205	CSB	C-C201	2CSBX-X012-6012	07/24/03
CSM	X012	HERNANDEZ FIGUEROA,J	747498	6012	213	CSB	C-C215	2CSBX-X012-6012	07/24/03
CSM	X012	KOHL, JA	35106	6012	203	CSB	C-C207	2CSBX-X012-6012	07/24/03
CSM	X012	MUGLER, JL	900065	6012	107A-A	CSB	C-A211	2CSBX-X012-6012	07/24/03
CSM	X012	NAUGHTON, III, TJ	900066	6012	107A-B	CSB	C-A205	2CSBX-X012-6012	07/24/03
CSM	X012	SCOTT, SL	37593	6012	219	CSB	C-A203	2CSBX-X012-6012	07/24/03
CSM	X012	SHUKLA, HD	900322	6012	211-E	CSB	C-A207	2CSBX-X012-6012	07/24/03
CSM	X012	TOEDTE, RJ	24580	6012	216	CSB	C-B209	2CSBX-X012-6012	07/24/03
CSM	X012	WING, WR	12047	6012	209	CSB	C-A209	2CSBX-X012-6012	07/24/03
CSM	X012	WOLFE, LM	35378	6012	206	CSB	C-C203	2CSBX-X012-6012	07/24/03
CSM	X012	WORLEY, PH	27562	6012	217	CSB	C-C219	2CSBX-X012-6012	07/24/03
CSM	X012	CARTER, RJ	25985	6025	011W-B	CSB	C-D219	2CSBX-X012-6025	07/24/03
CSM	X012	HAM,MW	901859	6025	3M	CSB	C-A213	2CSBX-X012-6025	07/24/03
CSM	X012	LIU,HK	745162	6025	14W	CSB	C-D217	2CSBX-X012-6025	07/24/03
CSM	X012	PROTOPOPESCU, VA	26946	6025	008E	CSB	C-A227	2CSBX-X012-6025	07/24/03
CSM	X012	TUFANO, DR	35573	6025	010W	CSB	C-A223	2CSBX-X012-6025	07/24/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
CSM	X012	Barhen CESAR files	20678	6025	na	CSB	C-D203	2CSBX-X012-6025	07/24/03
CSM	X012	Barhen Local Secure Area	na	6025	na	CSB	C-D223	2CSBX-X012-6025	07/24/03
LPD	X026	WATSON, JH	35442	4512		CSB	C-E204-E	2CSBX-X026-4512	07/24/03
CSM	X012	Telecom Room Library	na	6012		CSB	C-E202A	2CSBX-X099-6012	07/24/03
CSE	X107	BHADURI, BL	37611	4500N	261	CSB	C-B231	2CSBX-X107-4500N	07/24/03
CSE	X107	BRIGHT, EA	28438	4500N	245	CSB	C-B227	2CSBX-X107-4500N	07/24/03
CSE	X107	COLEMAN, PR	9644	4500N	243	CSB	C-B225	2CSBX-X107-4500N	07/24/03
CSE	X107	KING, AL	34361	4500N	H040-A	CSB	C-B229	2CSBX-X107-4500N	07/24/03
CSE	X107	LEWIS, AA	902148	4500N	G027	CSB	C-B223	2CSBX-X107-4500N	07/24/03
CSE	X107	TINNEL, EP	21082	4500N	H025B	CSB	C-B221	2CSBX-X107-4500N	07/24/03
CSE	X107	WOMBLE, RL	35256	4500N	263	CSB	C-B215	2CSBX-X107-4500N	07/24/03
CSE	X107	FLANERY JR, RE	28339	6012	104	CSB	C-B219	2CSBX-X107-6012	07/24/03
CSE	X107	LIU, C	31800	NTRC	I18	CSB	C-B217	2CSBX-X107-NTRC	07/29/03
M&C	X011	RUGGLES-WRENN, MB	28554	9204-1	331	4515	209	4515-X011-92041	07/29/03
M&C	X011	THOMSEN, SM	604659	9204-1	325	4515	110	4515-X011-92041	07/29/03
M&C	X011	WARREN, CD	32014	9204-1	321C	4515	238	4515-X011-92041	07/29/03
CSM	X012	HALLOY, CP	626741	3546	107	CSB	C-B115	1CSBX-X012-3546	07/31/03
CSM	X012	WONG, KL	745512	3546	105	CSB	C-B111	1CSBX-X012-3546	07/31/03
CSM	X012	ALEXANDER, RA	36302	4500N	I110	CSB	C-C109	1CSBX-X012-4500N	07/31/03
CSM	X054	ANDERSON, MR	604110	4500N	H205D	CSB	C-B105	1CSBX-X012-4500N	07/31/03
CSM	X012	BARRON JR, TO	38104	4500N	I114-B	CSB	C-B123	1CSBX-X012-4500N	07/31/03
CSM	X012	BLAND, AS	26766	4500N	I108	CSB	C-C107	1CSBX-X012-4500N	07/31/03
CSM	X012	BURRIS, RD	9079	4500N	I102	CSB	C-C113	1CSBX-X012-4500N	07/31/03
CSM	X012	CARTER, SM	902395	4500N	G23	CSB	C-C117	1CSBX-X012-4500N	07/31/03
CSM	X012	CRAY CE	na	4500N	G1	CSB	C-E100-F	1CSBX-X012-4500N	07/31/03
CSM	X054	DOBBS, MW	604173	4500N	273	CSB	C-B103	1CSBX-X012-4500N	07/31/03
CSM	X012	FAHEY, MR	900690	4500N	G001-A	CSB	C-A109	1CSBX-X012-4500N	07/31/03
CSM	X012	FAHEY, RA	900618	4500N	G001-E	CSB	C-A113	1CSBX-X012-4500N	07/31/03
CSM	X012	FOWLER, FM	691378	4500N	G001-C	CSB	C-B113	1CSBX-X012-4500N	07/31/03
CSM	X012	HARRIS, AD	747348	4500N	I106-A	CSB	C-C105	1CSBX-X012-4500N	07/31/03
CSM	X012	HATHAWAY, NR	900656	4500N	I112-B	CSB	C-B117	1CSBX-X012-4500N	07/31/03
CSM	X012	IBM/STK CE's	na	4500N	E3	CSB	C-E100-E	1CSBX-X012-4500N	07/31/03
CSM	X012	JONES, TK	31110	4500N	I113	CSB	C-A103	1CSBX-X012-4500N	07/31/03
CSM	X012	MATNEY SR, KD	37904	4500N	I114-B	CSB	C-C119	1CSBX-X012-4500N	07/31/03
CSM	X012	MAXWELL, DE	27887	4500N	I107-B	CSB	C-A111	1CSBX-X012-4500N	07/31/03
CSM	X012	MILLION, DL	15245	4500N	I111	CSB	C-A119	1CSBX-X012-4500N	07/31/03
CSM	X012	PIKE, G	902396	4500N	G23	CSB	C-A105	1CSBX-X012-4500N	07/31/03
CSM	X012	SHPANSKIY, S	902225	4500N	I114-B	CSB	C-A115	1CSBX-X012-4500N	07/31/03
CSM	X012	WHITE III, JB	37649	4500N	I105	CSB	C-C111	1CSBX-X012-4500N	07/31/03
CSM	X012	WHITE, SR	36457	4500N	I109	CSB	C-A107	1CSBX-X012-4500N	07/31/03
CSM	X012	STK	na	4500N		CSB		1CSBX-X012-4500N-1	07/31/03
CSM	X012	ARNOLD, MW	36261	4500S	R207A	CSB	C-A125	1CSBX-X012-4500S	07/31/03
CSM	X060	MAYA,L	13455	4500S	E256A	CSB	C-C129	1CSBX-X012-4500S	07/31/03
CSM	X012	STEINERT, DA	24622	4500S	R207B	CSB	C-A123	1CSBX-X012-4500S	07/31/03
CSM	X001	THUNDAT,TG	34530	4500S	G148	CSB	C-C127	1CSBX-X012-4500S	07/31/03
CSM	X012	WHITE, VL	29011	4500S	R207	CSB	C-A121	1CSBX-X012-4500S	07/31/03
CSM	X012	DUNNING JR, TH	690789	6010	103	CSB	C-B125-A	1CSBX-X012-6010	07/31/03
CSM	X012	JEON,S	902030	6010	217	CSB	C-C131	1CSBX-X012-6010	07/31/03
CSM	X012	ZHONG,J	626658	6010	203-A	CSB	C-C125	1CSBX-X012-6010	07/31/03
CSM	X012	BOYD, PA	35835	6025	006N	CSB	C-B125	1CSBX-X012-6025	07/31/03
CSM	X012	Protopopescu editors office	na	6025	18W	CSB	C-C123	1CSBX-X012-6025	07/31/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
CSM	X012	RADHAKRISHNAN, B	35572	6025	008W	CSB	C-C135	1CSBX-X012-6025	07/31/03
CSM	X012	SARMA, GB	37579	6025	012W	CSB	C-C133	1CSBX-X012-6025	07/31/03
LSD	X001	Johnson, Dabney	34476	9210		1061	111	1061-X001-9210	08/04/03
LSD	X001	Kerley, Marilyn	23993	9210		1061	213	1061-X001-9210	08/04/03
LSD	X001	Rinchik, Gene	27199	9210		1061		1061-X001-9210	08/04/03
LSD	X001	Lori A Hughes	28472	9210	233B	1061	213	1061-X001-9210	08/04/03
LSD	X001	Lori L Easter	37637	9210	223	1061	201	1061-X001-9210	08/04/03
CSM	X012	Misc	na	6012		CSB		1CSBX-X012-6012	08/05/03
F&O	X089	FRAKER, GL	26612	2652B	5	CSB	C-D115	1CSBX-X089-2652B	08/05/03
F&O	X089	WOOD, SE	27478	2652B	1A	CSB	C-D117	1CSBX-X089-2652B	08/05/03
LSD	X001	Betty Lou Alspaugh	604107	9210	222	1059	204	1059-X001-9210	08/06/03
LSD	X001	Darla R Miller	37647	9210	223	1059	206	1059-X001-9210	08/06/03
LSD	X001	Debra J S Carpenter	32206	9210	342	1059	109	1059-X001-9210	08/06/03
LSD	X001	Gene Barker	31747	9210	122	1059	216	1059-X001-9210	08/06/03
LSD	X001	Ginger Shaw	741992	9210	223	1059	201	1059-X001-9210	08/06/03
LSD	X001	Kay J Houser	28147	9210	342	1059	109	1059-X001-9210	08/06/03
LSD	X001	Kristen A Kerber	37935	9210	100A	1059	214	1059-X001-9210	08/06/03
LSD	X001	Liane B Russell	900782	9210	149	1059		1059-X001-9210	08/06/03
LSD	X001	Linda H White	26296	9210	148	1059	208	1059-X001-9210	08/06/03
LSD	X001	Lisa R Branstetter	37587	9210	342	1059	201	1059-X001-9210	08/06/03
LSD	X001	Madhu Shivshankar Dhar	624048	9210	342	1059		1059-X001-9210	08/06/03
LSD	X001	Mary Jo Kreger	36191	9210	147	1059	105	1059-X001-9210	08/06/03
LSD	X001	Nestor L Cacheiro	36325	9210	148	1059		1059-X001-9210	08/06/03
LSD	X001	Robert Edward Olszewski	35806	9210	236E	1059	203	1059-X001-9210	08/06/03
LSD	X001	Sarah G Shinpock	8607	9210	140	1059	109	1059-X001-9210	08/06/03
LSD	X001	Amanda Dalton	900651	9210	??	1059	109	1059-X001-9210	08/06/03
LSD	X001	KT Cain	8757	9210	B233	1059	201	1059-X001-9210	08/06/03
LSD	X001	Wendy Packan	677171	9210	??	1059	201	1059-X001-9210	08/06/03
LSD	X001	Don Carpenter	16575	9210	C236	1059	203	1059-X001-9210	08/06/03
LSD	X001	Jason Spence	691226	9210	??	1059	203	1059-X001-9210	08/06/03
LSD	X001	Faith Baumann	901354	9210	??	1059	203	1059-X001-9210	08/06/03
LSD	X001	Pat Hunsicker	7054	9210	222	1059	202	1059-X001-9210	08/06/03
LSD	X001	Vet Staff		9210	??	1059	215	1059-X001-9210	08/06/03
NSTD	X094	Locked file cabinet w/ DOE files	na	6011	219	ROB		3ROBE-X094-6011	08/06/03
NSTD	X094	BROWN, VB	31902	4500N	A30	ROB	R-N305	3ROBE-X094-4500N	08/07/03
NSTD	X094	COLLINS, ED	8574	4500N	A032	ROB	R-N305-A	3ROBE-X094-4500N	08/07/03
NSTD	X094	MCGARVEY, MA	624930	4500N	B018	ROB	R-N306	3ROBE-X094-4500N	08/07/03
NSTD	X094	WILLIAMS, DF	19852	4500N	B16	ROB	R-N308	3ROBE-X094-4500N	08/07/03
NSTD	X094	GUBER, K	036420	6010	105	ROB	R-H309	3ROBE-X094-6010	08/07/03
NSTD	X094	VALENTINE, TE	030978	6010	110	ROB	R-H315	3ROBE-X094-6010	08/07/03
NSTD	X094	ALPAN, ARZU	tbd	6011	104	ROB	R-H302	3ROBE-X094-6011	08/07/03
NSTD	X094	ANDERSON, JB	30325	6011	205	ROB	R-N321	3ROBE-X094-6011	08/07/03
NSTD	X094	BOWMAN, SM	30378	6011	217	ROB	R-N321-B	3ROBE-X094-6011	08/07/03
NSTD	X094	BROADHEAD, BL	24976	6011	214	ROB	R-N329	3ROBE-X094-6011	08/07/03
NSTD	X094	BUCHOLZ, JA	015483	6011	127	ROB	R-O307	3ROBE-X094-6011	08/07/03
NSTD	X094	CARTER, WC	19945	6011	201	ROB	R-J309	3ROBE-X094-6011	08/07/03
NSTD	X094	Copy Room (printer HP4200)	na	6011	202	ROB	R-N322	3ROBE-X094-6011	08/07/03
NSTD	X094	DEHART, MD	34794	6011	204	ROB	R-N323	3ROBE-X094-6011	08/07/03
NSTD	X094	DUNN, ME	34206	6011	222	ROB	R-H325	3ROBE-X094-6011	08/07/03
NSTD	X094	ELAM, KR	34229	6011	218	ROB	R-H327	3ROBE-X094-6011	08/07/03
NSTD	X094	EMMETT, MB	7554	6011	101	ROB	R-N333	3ROBE-X094-6011	08/07/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
NSTD	X094	FOX, PB	12824	6011	223	ROB	R-J307	3ROBE-X094-6011	08/07/03
NSTD	X094	FU, C	012218	6011	121	ROB	R-H305	3ROBE-X094-6011	08/07/03
NSTD	X094	GAULD, IC	37742	6011	208	ROB	R-N325	3ROBE-X094-6011	08/07/03
NSTD	X094	GOLUOGLU, S	37920	6011	220	ROB	R-J302	3ROBE-X094-6011	08/07/03
NSTD	X094	HENDERSON, DG	27532	6011	212	ROB	R-J308	3ROBE-X094-6011	08/07/03
NSTD	X094	HOLLENBACH, DF	34355	6011	226	ROB	R-H331	3ROBE-X094-6011	08/07/03
NSTD	X094	HOPPER, CM	22717	6011	219	ROB	R-H329	3ROBE-X094-6011	08/07/03
NSTD	X094	HORWEDEL, JE	20639	6011	224	ROB	R-H333	3ROBE-X094-6011	08/07/03
NSTD	X094	Lateral File cabinet, Green Tables	na	6011	200	ROB	R-M301	3ROBE-X094-6011	08/07/03
NSTD	X094	LICHTENWALTER, SK	17403	6011	203	ROB	R-H332	3ROBE-X094-6011	08/07/03
NSTD	X094	MURPHY, BD	13755	6011	125	ROB	R-N331	3ROBE-X094-6011	08/07/03
NSTD	X094	PARKS, CV	19993	6011	207	ROB	R-N321-A	3ROBE-X094-6011	08/07/03
NSTD	X094	PETRIE JR, LM	9514	6011	225	ROB	R-H323	3ROBE-X094-6011	08/07/03
NSTD	X094	REARDEN, BT	37822	6011	206	ROB	R-N326	3ROBE-X094-6011	08/07/03
NSTD	X094	SCALE LIBRARY	na	6011	209	ROB	R-I302	3ROBE-X094-6011	08/07/03
NSTD	X094	SCALE Res Ct (4Si)	na	6011	109	ROB	R-H330	3ROBE-X094-6011	08/07/03
NSTD	X094	SCALE Res Ct (4Si)	na	6011	202	ROB	R-H330	3ROBE-X094-6011	08/07/03
NSTD	X094	SCALE Res Ct (Color Printer)	na	6011	203	ROB	R-H330	3ROBE-X094-6011	08/07/03
NSTD	X094	SCALE RESOURCE CNTR	na	6011	203	ROB	R-H330	3ROBE-X094-6011	08/07/03
NSTD	X094	Small Conf. Room (TV with cart)	na	6011	209	ROB	R-J306	3ROBE-X094-6011	08/07/03
NSTD	X094	Supply Cabinet	na	6011	130	ROB	R-N322	3ROBE-X094-6011	08/07/03
NSTD	X094	Tek Color Printer	na	6011	223	ROB	R-N322	3ROBE-X094-6011	08/07/03
NSTD	X094	WAGNER, JC	37727	6011	216	ROB	R-N327	3ROBE-X094-6011	08/07/03
NSTD	X094	WAGSCHAL, J	745641	6011	202	ROB	R-H320	3ROBE-X094-6011	08/07/03
NSTD	X094	WEBER, CF	20654	6011	123	ROB	R-H335	3ROBE-X094-6011	08/07/03
NSTD	X094	WILLIAMS, ML	654983	6011	210	ROB	R-J301	3ROBE-X094-6011	08/07/03
NSTD	X094	DERRIEN, H	037612	6011	105	ROB	R-H321	3ROBE-X094-6011	08/07/03
NSTD	X094	GREENE, NM	008238	6011	107	ROB	R-H307	3ROBE-X094-6011	08/07/03
NSTD	X094	LARSON, NM	012389	6011	117	ROB	R-H311	3ROBE-X094-6011	08/07/03
NSTD	X094	LEAL, LC	035232	6011	103	ROB	R-H317	3ROBE-X094-6011	08/07/03
NSTD	X094	SAYER, RO	012844	6011	241	ROB	R-H313	3ROBE-X094-6011	08/07/03
NSTD	X094	WESTFALL, RM	12748	6011	221	ROB	R-H319	3ROBE-X094-6011	08/07/03
NSTD	X094	4-drawer file	na	6025	30W	ROB	R-H345	3ROBE-X094-6025	08/07/03
NSTD	X094	5-drawer and 3 drawer file	na	6025	32W	ROB	R-H345	3ROBE-X094-6025	08/07/03
NSTD	X094	Copier		6025	2K	ROB	R-N339	3ROBE-X094-6025	08/07/03
NSTD	X094	DOCUMENT LIB	na	6025	4K	ROB	R-I302	3ROBE-X094-6025	08/07/03
NSTD	X087	DUVAL, AW (COMP. TECH.)	33306	6025	16L	ROB	R-I306	3ROBE-X094-6025	08/07/03
NSTD	X094	FILE ROOM	na	6025		ROB	R-H345	3ROBE-X094-6025	08/07/03
NSTD	X094	HP4500 Printer	na	6025	2K	ROB	R-M301	3ROBE-X094-6025	08/07/03
NSTD	X094	RSICC DOCUMENT LIB	na	6025	12E-15W	ROB	R-I304-A	3ROBE-X094-6025	08/07/03
NSTD	X094	RSICC IMAGING CNTR	na	6025	13W-14E	ROB	R-I306	3ROBE-X094-6025	08/07/03
NSTD	X094	Supply Cabinet	na	6025	2K	ROB	R-N339	3ROBE-X094-6025	08/07/03
NSTD	X094	WOLLABER, Allen	901008	6025	8K	ROB	R-J303	3ROBE-X094-6025	08/07/03
NSTD	X094	ALFORD, AC	021781	6025	32W	ROB	R-N339	3ROBE-X094-6025	08/07/03
NSTD	X094	ARWOOD, JW	013333	6025	15W	ROB	R-I301	3ROBE-X094-6025	08/07/03
NSTD	X094	BARNES, JM	012219	6025	13E	ROB	R-H341	3ROBE-X094-6025	08/07/03
NSTD	X094	BLAKEMAN, ED	017957	6025	15E	ROB	R-O303	3ROBE-X094-6025	08/07/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
NSTD	X094	CRAMER, SN	010083	6025	12E	ROB	R-H306	3ROBE-X094-6025	08/07/03
NSTD	X094	DIFILIPPO, FC	025464	6025	1K	ROB	R-O305	3ROBE-X094-6025	08/07/03
NSTD	X094	ELLIS, RJ	037644	6025	28W	ROB	R-O309	3ROBE-X094-6025	08/07/03
NSTD	X094	FINCH, SY	021385	6025	13W1	ROB	R-I305	3ROBE-X094-6025	08/07/03
NSTD	X094	GARNER, DL	025405	6025	12E	ROB	R-I303	3ROBE-X094-6025	08/07/03
NSTD	X094	GEHIN, JC	034449	6025	7K	ROB	R-N337	3ROBE-X094-6025	08/07/03
NSTD	X094	HATMAKER, na	012738	6025	15W5	ROB	R-H303	3ROBE-X094-6025	08/07/03
NSTD	X094	HUNTER, HT	025952	6025	15W4	ROB	R-N301	3ROBE-X094-6025	08/07/03
NSTD	X094	HUTSON, EA	038148	6025	1M1	ROB	R-H343	3ROBE-X094-6025	08/07/03
NSTD	X094	INGERSOLL, DT	017827	6025	30W	ROB	R-N339-A	3ROBE-X094-6025	08/07/03
NSTD	X094	JOHNSON, JO	027533	6025	1M	ROB	R-O301	3ROBE-X094-6025	08/07/03
NSTD	X094	KIRK, BL	014721	6025	15W1	ROB	R-H301	3ROBE-X094-6025	08/07/03
NSTD	X094	LILLIE, RA	013351	6025	17E	ROB	R-H339	3ROBE-X094-6025	08/07/03
NSTD	X094	MANNESCHMIDT, JB	017490	6025	15W2	ROB	R-N303	3ROBE-X094-6025	08/07/03
NSTD	X094	PEPLOW, DE	037784	6025	5K	ROB	R-N328	3ROBE-X094-6025	08/07/03
NSTD	X094	REMEC, I	035539	6025	26W	ROB	R-O311	3ROBE-X094-6025	08/07/03
NSTD	X094	RENIER, JP	018564	6025	3K	ROB	R-N335	3ROBE-X094-6025	08/07/03
NSTD	X094	RICE, AF	022047	6025	14E	ROB	R-N304	3ROBE-X094-6025	08/07/03
NSTD	X094	SANTORO, RT	006751	6025	19E	ROB	R-H343-A	3ROBE-X094-6025	08/07/03
NSTD	X094	SLATER, CO	014474	6025	21E	ROB	R-H337	3ROBE-X094-6025	08/07/03
NSTD	X094	SNOW, BJ	028011	6025	14E	ROB	R-N302	3ROBE-X094-6025	08/07/03
NSTD	X094	WANG, J	029395	6025	15W3	ROB	R-H304	3ROBE-X094-6025	08/07/03
NSTD	X094	YUGO, JJ	030756	6025	24W	ROB	R-H334	3ROBE-X094-6025	08/07/03
NSTD	X094	Furniture	na	6025		SALVAGE		SALVAGE-X094-6025	08/12/03
CSM	X012	AV Furniture	na	3546	114	CSB		2CSBX-X012-3546	08/13/03
Physics	X013	Arbanas, G	620368	6011	122	6025	3M	6025-X013-6011	08/14/03
Physics	X013	Barnes, FE	30272	6011	126	6025	14W	6025-X013-6011	08/14/03
Physics	X013	Dean, DJ	36042	6011	108	6025	8W	6025-X013-6011	08/14/03
Physics	X013	Juodagalvis, A	747216	6011	106	6025	7M	6025-X013-6011	08/14/03
Physics	X013	Michel, NL	902336	6011	106	6025	17W	6025-X013-6011	08/14/03
Physics	X013	Nazarewicz, W	36333	6011	116	6025	12W	6025-X013-6011	08/14/03
Physics	X013	Papenbrock, TF	38105	6011	110	6025	11W	6025-X013-6011	08/14/03
Physics	X013	Stoitcheva, GS	901042	6011	114	6025	8M	6025-X013-6011	08/14/03
Physics	X013	Stoitsov, MV	744541	6011	114	6025	22W	6025-X013-6011	08/14/03
Physics	X013	Strayer, MR	25401	6011	118	6025	7N	6025-X013-6011	08/14/03
Physics	X013	Tate, AS	7098	6011	119	6025	9W	6025-X013-6011	08/14/03
Physics	X013	Terasaki, J	900706	6011	122	6025	5M	6025-X013-6011	08/14/03
Physics	X013	Wong, C	8693	6011	124	6025	18W	6025-X013-6011	08/14/03
NSTD	X094	Furniture	na	6011		SALVAGE		SALVAGE-X094-6011	08/16/03
CSM	X012	CHEN, M	900504	4500N	I112-A	CSB	C-C129	1CSBX-X012-4500N	08/18/03
NSTD	X094	FLANAGAN, GF	12237	1060COM	127-12	ROB	R-N207	2R0BE-X094-1060C	08/21/03
ESTD	X037	DAVIS, DR	034830	4500N	154	ROB	R-H227	2ROBE-X037-3500-1	08/21/03
ESTD	X037	HENDERSON, UF	025721	4500N	158A	ROB	R-H225	2ROBE-X037-4500N	08/21/03
ESTD	X037	WAGONER, R	014234	4500N	156	ROB	R-H229	2ROBE-X037-4500N	08/21/03
ESTD	X092	FILES	Wheeler	4500N	162/164	ROB	R-M201	2ROBE-X092-4500N	08/21/03
ESTD	X092	FERGUSON, TD	023247	4500N	151	ROB	R-N227	2ROBE-X092-4500N	08/21/03
ESTD	X092	HUMMEL, S	018129	4500N	149	ROB	R-N229	2ROBE-X092-4500N	08/21/03
ESTD	X092	BUSH, BL	019915	4500N	159-A	ROB	R-O201	2ROBE-X092-4500N	08/21/03
ESTD	X092	SHELTON, RB	023435	4500N	153	ROB	R-O201A	2ROBE-X092-4500N	08/21/03
ESTD	X092	CZACHOWSKI, JB	033664	4500N	E4	ROB	R-O203	2ROBE-X092-4500N	08/21/03
ESTD	X092	MARKHAM, NA	019062	4500N	159-C	ROB	R-O204	2ROBE-X092-4500N	08/21/03
ESTD	X092	MCINTYRE, K	032420	4500N	167	ROB	R-O207	2ROBE-X092-4500N	08/21/03
ESTD	X092	WHEELER, JA	029035	4500N	163	ROB	R-O207A	2ROBE-X092-4500N	08/21/03
ESTD	X092	FOX, EC	015270	4500N	165	ROB	R-O207B	2ROBE-X092-4500N	08/21/03
ESTD	X092	BYRD, S	35729	4500N	161	ROB	R-O208	2ROBE-X092-4500N	08/21/03
ESTD	X092	BIBLE, L	22934	4500N	159	ROB	R-O210	2ROBE-X092-4500N	08/21/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
ESTD	X092	FILES	Wheeler	4500N	162/164	ROB	R-O202	2ROBE-X092-4500N	08/21/03
ESTD	X092	STORAGE	Wheeler	4500N	159/162	ROB	R-O206	2ROBE-X092-4500N	08/21/03
NSTD	X094	1 Classified computer	na	1060COM	127-3	ROB	R-H204-D	2ROBE-X094-1060C	08/21/03
NSTD	X094	BEATTY, R	034720	1060COM	127-11	ROB	R-J208	2ROBE-X094-1060C	08/21/03
NSTD	X094	CLETCHER II, JW	034011	1060COM	127-17	ROB	R-J205	2ROBE-X094-1060C	08/21/03
NSTD	X094	COPINGER, DA	030651	1060COM	127-18	ROB	R-J209	2ROBE-X094-1060C	08/21/03
NSTD	X094	DOCKERY, LB	021140	1060COM	127-13	ROB	R-H203	2ROBE-X094-1060C	08/21/03
NSTD	X094	ECHOLS, JB	022838	1060COM	127-19/2	ROB	R-H213	2ROBE-X094-1060C	08/21/03
NSTD	X094	FILE ROOM	tbd	1060COM	127-3/4	ROB	R-N203	2ROBE-X094-1060C	08/21/03
NSTD	X094	Files		1060COM	127-7	ROB	R-H204-A	2ROBE-X094-1060C	08/21/03
NSTD	X094	Files	na	1060COM	177	ROB	R-H204-A	2ROBE-X094-1060C	08/21/03
NSTD	X094	FUTURE	tbd	1060COM	124	ROB	R-J207	2ROBE-X094-1060C	08/21/03
NSTD	X094	GREENE, SR	020941	1060COM	122	ROB	R-H205	2ROBE-X094-1060C	08/21/03
NSTD	X094	HOLDAWAY, RF	008250	1060COM	121	ROB	R-H207	2ROBE-X094-1060C	08/21/03
NSTD	X094	Large Printer/Plotter	na	1060COM	124	ROB	R-H202	2ROBE-X094-1060C	08/21/03
NSTD	X094	MAYS, GT	013855	1060COM	123	ROB	R-H203-A	2ROBE-X094-1060C	08/21/03
NSTD	X094	MOSES, RJ	024663	1060COM	129	ROB	R-J201	2ROBE-X094-1060C	08/21/03
NSTD	X094	MUHLHEIM, MD	032211	1060COM	127-02	ROB	R-J203	2ROBE-X094-1060C	08/21/03
NSTD	X094	NELSON, WR	18731	1060COM	127-16	ROB	R-I205	2ROBE-X094-1060C	08/21/03
NSTD	X094	POORE III, WP	021717	1060COM	125	ROB	R-H217	2ROBE-X094-1060C	08/21/03
NSTD	X094	QUEENER, DS	012019	1060COM	127-01	ROB	R-H216	2ROBE-X094-1060C	08/21/03
NSTD	X094	REID, RL	015134	1060COM	128	ROB	R-N216	2ROBE-X094-1060C	08/21/03
NSTD	X094	WILLIAMS JR, DL	030097	1060COM	126	ROB	R-H215	2ROBE-X094-1060C	08/21/03
NSTD	X094	Work Room	na	1060COM	127-14	ROB	R-H202	2ROBE-X094-1060C	08/21/03
NSTD	X094	Work Room	na	1060COM	127-5/6	ROB	R-H202	2ROBE-X094-1060C	08/21/03
NSTD	X094	Work Room	na	1060COM	127-5/6	ROB	R-H204-A	2ROBE-X094-1060C	08/21/03
NSTD	X094	Work Room	na	1060COM	127-5/6	ROB	R-I203	2ROBE-X094-1060C	08/21/03
NSTD	X094	Work Table	na	1060COM	124	ROB	R-I201	2ROBE-X094-1060C	08/21/03
NSTD	X094	BELLES, R	035223	1099COM	NE19	ROB	R-N213	2ROBE-X094-1099C	08/21/03
NSTD	X094	BEVARD, B	034137	1099COM	NE17	ROB	R-N211	2ROBE-X094-1099C	08/21/03
NSTD	X094	BYERLY, S	030976	1099COM	NE21	ROB	R-H201	2ROBE-X094-1099C	08/21/03
NSTD	X094	CARBAJO, J (Interim)	024430	1099COM	N09	ROB	R-M205	2ROBE-X094-1099C	08/21/03
NSTD	X094	COWELL, B	030883	1099COM	E37	ROB	R-H221	2ROBE-X094-1099C	08/21/03
NSTD	X094	DUNCAN, E	030614	1099COM	E33	ROB	R-I209	2ROBE-X094-1099C	08/21/03
NSTD	X094	FILES - Hallway Outside E-11	na	1099COM	Hall/E11	ROB	R-I201	2ROBE-X094-1099C	08/21/03
NSTD	X094	FISHER, S	031809	1099COM	E39	ROB	R-H219	2ROBE-X094-1099C	08/21/03
NSTD	X094	Four File Cabinets	na	1099COM	NE-21 &	ROB	R-M204	2ROBE-X094-1099C	08/21/03
NSTD	X094	Hallway Outside E-37	na	1099COM	na	ROB	R-H204-A	2ROBE-X094-1099C	08/21/03
NSTD	X094	Hallway Outside NE-17	na	1099COM	na	ROB	R-H204-A	2ROBE-X094-1099C	08/21/03
NSTD	X094	Hallway Outside NE-21	na	1099COM	na	ROB	R-H201	2ROBE-X094-1099C	08/21/03
NSTD	X094	HODGE, S	022404	1099COM	N24	ROB	R-N221	2ROBE-X094-1099C	08/21/03
NSTD	X094	HOGAN, MD	035403	1099COM	E22	ROB	R-H206	2ROBE-X094-1099C	08/21/03
NSTD	X094	HORNING, T	030776	1099COM	NE25	ROB	R-N205	2ROBE-X094-1099C	08/21/03
NSTD	X094	MCGINNIS, M	018411	1099COM	NE23	ROB	R-J210	2ROBE-X094-1099C	08/21/03
NSTD	X094	OTT, L	015335	1099COM	N07	ROB	R-N223	2ROBE-X094-1099C	08/21/03
NSTD	X094	PATT, E	902917	1099COM	NE24	ROB	R-I203	2ROBE-X094-1099C	08/21/03
NSTD	X094	PUGLISI, R	029296	1099COM	E35	ROB	R-H223	2ROBE-X094-1099C	08/21/03
NSTD	X094	SPELLMAN, D	032757	1099COM	N08	ROB	R-N209	2ROBE-X094-1099C	08/21/03
NSTD	X094	Three File Cabinets	na	1099COM	outside N	ROB	R-M204	2ROBE-X094-1099C	08/21/03
NSTD	X094	WILLIAMS, K	010999	1099COM	E41	ROB	R-N219	2ROBE-X094-1099C	08/21/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
NSTD	X094	Work Room	na	1099COM	NE-22	ROB	R-H204-A	2ROBE-X094-1099C	08/21/03
NSTD	X094	Work Room	na	1099COM	NE-28	ROB	R-I203	2ROBE-X094-1099C	08/21/03
NSTD	X094	Work Room/FMDP Library	na	1099COM	NE-20	ROB	R-H201	2ROBE-X094-1099C	08/21/03
NSTD	X094	WRENN, G	021928	1099COM	E24	ROB	R-I207	2ROBE-X094-1099C	08/21/03
NSTD	X087	CORNETT, WR (Comp. Tech.)	34581	4500N	B230	ROB	R-M203	2ROBE-X094-4500N	08/21/03
NSTD	X094	FERRADA, JJ	029206	4500N	125A	ROB	R-N214	2ROBE-X094-4500N	08/21/03
NSTD	X094	FORSBERG, CW	014815	4500N	E008	ROB	R-N201	2ROBE-X094-4500N	08/21/03
NSTD	X094	HAIRE, MJ	019701	4500N	120B	ROB	R-H211-A	2ROBE-X094-4500N	08/21/03
NSTD	X094	HERMES, WH	18568	4500N	125Q	ROB	R-H218	2ROBE-X094-4500N	08/21/03
NSTD	X094	MEEK, TT	645762	4500N	125G	ROB	R-J204	2ROBE-X094-4500N	08/21/03
NSTD	X094	MEnaKO, CR	745785	4500N	125G	ROB	R-J204	2ROBE-X094-4500N	08/21/03
NSTD	X094	MORRIS, MI	025243	4500N	125K	ROB	R-N217	2ROBE-X094-4500N	08/21/03
NSTD	X094	PERETZ, F	18910	4500N	125M	ROB	R-M208	2ROBE-X094-4500N	08/21/03
NSTD	X094	ROWLEY, KD	027404	4500N	120A	ROB	R-H211	2ROBE-X094-4500N	08/21/03
NSTD	X094	STORCH, SN	018410	4500N	B28	ROB	R-H220	2ROBE-X094-4500N	08/21/03
NSTD	X094	STUDENT	tbd	4500N	125B/C/D	ROB	R-N206	2ROBE-X094-4500N	08/21/03
NSTD	X094	FELDE, DK	021920	9204-1	210	ROB	R-M207	2ROBE-X094-92041	08/21/03
NSTD	X094	JENNINGS, SD	017254	9204-1	214	ROB	R-N202	2ROBE-X094-92041	08/21/03
NSTD	X094	KIM, S (Interim)	033087	9204-1	321B	ROB	R-M206	2ROBE-X094-92041	08/21/03
NSTD	X094	MCFEE, MT (Interim)	020613	9204-1	218	ROB	R-M207	2ROBE-X094-92041	08/21/03
NSTD	X094	PATRICK, CM	028029	9204-1	207	ROB	R-H209	2ROBE-X094-92041	08/21/03
NSTD	X094	POPOVA, E	691543	9204-1	219B	ROB	R-M209	2ROBE-X094-92041	08/21/03
NSTD	X094	QUALLS, AL (Interim)	035188	9204-1	333	ROB	R-J202	2ROBE-X094-92041	08/21/03
NSTD	X094	THOMS, KR	008648	9204-1	329	ROB	R-N225	2ROBE-X094-92041	08/21/03
NSTD	X094	YODER JR, GL	022999	9204-1	209	ROB	R-H209-A	2ROBE-X094-92041	08/21/03
NSTD	X094	DOLE, LR	017550	3500	D24	ROB	R-N215	2ROBE-X094-3500	08/26/03
NSTD	X094		I	3500		ROB		2ROBE-X094-3500	08/26/03
NSTD	X094			6025		ROB		2ROBE-X094-6025	08/26/03
NSTD	X094	FLANAGAN, GF	12237	7917	122	ROB	R-N207	2ROBE-X094-7917	08/26/03
NSTD	X094	OWENS, RS	30202	7918	214	ROB	R-M210	2ROBE-X094-7918	08/26/03
Physics	X013	Furniture	na	4500N		6010	124	6010-X013-4500S	08/26/03
NSTD	X094	Furniture	na	4500N		SALVAGE		SALVAGE-094-4500N	08/26/03
CCOD	X071	DOLE, JM	26266	4500N	148B	4500S	T3-4	4500S-X071-4500N	08/28/03
CCOD	X071	MOSER, CI	29462	4500N	146	4500S	G56-3	4500S-X071-4500N	08/28/03
NSTD	X094	AARON, WS	16997	92043		5510	109	5510-X094-92043	08/28/03
NSTD	X094	AUSMUS, C	34123	92043		5510	116	5510-X094-92043	08/28/03
NSTD	X094	MONTCALM, GF	20849	92043		5510	104	5510-X094-92043	08/28/03
NSTD	X094	WHITE, JA	13426	92043		5510	107	5510-X094-92043	08/28/03
NSTD	X094	ZEVENBERGEN, L	19398	92043		5510	120	5510-X094-92043	08/28/03
Physics	X013	Bertrand, FE	10573	6000	234	6010	111	6010-X013-6000	08/28/03
Physics	X013	Vane, CR	23810	6000	B202	6010	207	6010-X013-6000	08/28/03
Physics	X013	Meyer, FW	17098	6000	B202	6010	208	6010-X013-6000	08/28/03
Physics	X013	Krause, HF	11602	6000	B202	6010	209	6010-X013-6000	08/28/03
Physics	X013	Havener, CC	27134	6000	B202	6010	210	6010-X013-6000	08/28/03
Physics	X013	Bannister, ME	35662	6000	B202	6010	211	6010-X013-6000	08/28/03
Physics	X013	Ownby, FM	11386	6000	B202	6010	216	6010-X013-6000	08/28/03
Physics	X013	Al-Rejoub, RA	901744	6000	B202	6010	219	6010-X013-6000	08/28/03
Physics	X013	Minami, T	746552	6000	B202	6010	219	6010-X013-6000	08/28/03
Physics	X013	Hale, JW	8706	6000	B202	6010	220	6010-X013-6000	08/28/03
Physics	X013	Schultz, DR	34356	6000	B203	6010	215	6010-X013-6000	08/28/03
Physics	X013	Macek, JH	659370	6000	M207	6010	221	6010-X013-6000	08/28/03
Physics	X013	Reinhold-Larsson, CO	35742	6000	M208	6010	213	6010-X013-6000	08/28/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
Physics	X013	Krstic, PS	36438	6000	M210	6010	212	6010-X013-6000	08/28/03
Physics	X013	Saddiq, L	9772	6000	M211	6010	214	6010-X013-6000	08/28/03
Physics	X013	Stankus		6007	101	6010	120	6010-X013-6007	08/28/03
Physics	X013	FAX Printer	na	6007	102	6010	124	6010-X013-6007	08/28/03
Physics	X013	Read		6007	103	6010	113	6010-X013-6007	08/28/03
Physics	X013	Young		6007	104	6010	lab C	6010-X013-6007	08/28/03
Physics	X013	Awes, T		6007	105	6010	120	6010-X013-6007	08/28/03
Physics	X013	Cianciolo,		6007	107	6010	116	6010-X013-6007	08/28/03
Physics	X013	Vergara, LI	902369	6007	109	6010	205 E	6010-X013-6007	08/28/03
Physics	X013	Efremenko		6007	111	6010	115	6010-X013-6007	08/28/03
Physics	X013	Plasil		6007	106,109	6010	lab C	6010-X013-6007	08/28/03
Physics	X013	Neutron Students		6008	121	6010	102	6010-X013-6008	08/28/03
Physics	X013	Desai, D		6008	121	6010	107	6010-X013-6008	08/28/03
Physics	X013	Ovchinnikov, SY	623489	6008	121	6010	205 E	6010-X013-6008	08/28/03
Physics	X013	Greene, G		6008	124	6010	101	6010-X013-6008	08/28/03
Physics	X013	Valentine, T		6010	105	6010	108	6010-X013-6010	08/28/03
Physics	X013	Lewis, TA		6010	111	6010	100	6010-X013-6010	08/28/03
Physics	X013	Guber, K		6010	112	6010	112	6010-X013-6010	08/28/03
Physics	X013	Koehler, P		6010	115	6010	110	6010-X013-6010	08/28/03
CSM	X001	student: RAZUMOVSKAYA, Y	747410	1060com	259-01	CSB	C-E203	2CSBX-X001-1060C-1	09/04/03
CSM	X001	student: SHANAFIELD, H	901687	1060com		CSB	C-E203	2CSBX-X001-1060C-1	09/04/03
CSM	X001	student: TEBBE, A	901686	1060com	259-15	CSB	C-E203	2CSBX-X001-1060C-1	09/04/03
CSM	X001	student: WANG, H-N	900465	1060com	259-14	CSB	C-E203	2CSBX-X001-1060C-1	09/04/03
CSM	X001	student: PENG, X	900466	1061	212	CSB	C-E203	2CSBX-X001-1061	09/04/03
CSM	X012	CHOPPELLA,V	901898	6012	211	CSB	C-D223	2CSBX-X012-6012	09/04/03
CSM	X001	Printers	25916	1060com	259-19	ROB	R-xxx	2ROBW-X001-1060C	09/04/03
CSM	X001	BAKTASH, S	new	1060com		ROB	R-B204	2ROBW-X001-1060C	09/04/03
CSM	X001	CHEN, G-L	24948	1060com	194	ROB	R-G231	2ROBW-X001-1060C	09/04/03
CSM	X001	GALLOWAY, MD	25610	1060com	181	ROB	R-A203	2ROBW-X001-1060C	09/04/03
CSM	X001	HAUSER, LJ	657553	1060com	217	ROB	R-G229	2ROBW-X001-1060C	09/04/03
CSM	X001	KIROV, SA	691080	1060com	232	ROB	R-G220	2ROBW-X001-1060C	09/04/03
CSM	X001	LAND, ML	32576	1060com	199	ROB	R-A205	2ROBW-X001-1060C	09/04/03
CSM	X001	LARIMER, FW	15614	1060com	211	ROB	R-A201	2ROBW-X001-1060C	09/04/03
CSM	X001	LOCASCIO, PF	36015	1060com	192	ROB	R-G217	2ROBW-X001-1060C	09/04/03
CSM	X001	NARASIMHAN, C	746946	1060com	259-03	ROB	R-G225	2ROBW-X001-1060C	09/04/03
CSM	X001	PASSOVETS, SV	626436	1060com	262	ROB	R-G218	2ROBW-X001-1060C	09/04/03
CSM	X001	SHAH, MB	659277	1060com	189	ROB	R-G227	2ROBW-X001-1060C	09/04/03
CSM	X001	SNODDY, JR	744082	1060com	233	ROB	R-G221	2ROBW-X001-1060C	09/04/03
CSM	X001	TABB, D	new	1060com	185	ROB	R-B204	2ROBW-X001-1060C	09/04/03
CSM	X001	THURSTON, L	25916	1060com	114	ROB	R-A202	2ROBW-X001-1060C	09/04/03
CSM	X001	UBERBACHER, EC	33478	1060com	265	ROB	R-G215	2ROBW-X001-1060C	09/04/03
CSM	X001	VOKLER, IE	745437	1060com	191	ROB	R-G219	2ROBW-X001-1060C	09/04/03
CSM	X001	WANG, L	690946	1060com	261	ROB	R-B201	2ROBW-X001-1060C	09/04/03
CSM	X001	ZHANG, B	902295	1060com	239	ROB	R-G220	2ROBW-X001-1060C	09/04/03
CSM	X001	THURSTON, L	25916	1061	203	ROB	R-A202	2ROBW-X001-1061	09/04/03
CSM	X012	postdoc: Xu, Ying	new	1060com		ROB	R-B206	2ROBW-X012-1060C	09/04/03
CSM	X012	FRIDMAN, T	901363	1060com	240	ROB	R-B202	2ROBW-X012-1060C	09/04/03
CSM	X012	SCHMOYER, D	24097	1060com	195	ROB	R-A207	2ROBW-X012-1060C	09/04/03
CSM	X011	EISENBACH,M	747162	4500S	A260	ROB	R-A206	2ROBW-X012-4500S	09/04/03
CSM	X012	ENDRES,RG	901897	4500S	A278	ROB	R-A210	2ROBW-X012-4500S	09/04/03
CSM	X012	FUENTES-CABRERA,MA	901853	4500S	S258	ROB	R-B205	2ROBW-X012-4500S	09/04/03
CSM	X012	HAGUE,JP	902417	4500S	A260	ROB	R-A208	2ROBW-X012-4500S	09/04/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
CSM	X012	KENT,PR	901746	4500S	A260	ROB	R-A204	2ROBW-X012-4500S	09/04/03
CSM	X012	LU, Z	902587	4500S		ROB	R-B207	2ROBW-X012-4500S	09/04/03
CSM	X012	MAIER, TA	902467	4500S		ROB	R-A211	2ROBW-X012-4500S	09/04/03
CSM	X012	NICHOLSON, DM	27387	4500S	S268	ROB	R-F227	2ROBW-X012-4500S	09/04/03
CSM	X012	PETIT, L	902232	4500S	A264	ROB	R-B209	2ROBW-X012-4500S	09/04/03
CSM	X012	SCHULTHESS, TC	37642	4500S	A276	ROB	R-F231	2ROBW-X012-4500S	09/04/03
CSM	X011	UJFALUSSY,B	744135	4500S	A264	ROB	R-F223	2ROBW-X012-4500S	09/04/03
CSM	X012	ZHANG,X	35830	4500S	A278	ROB	R-F225	2ROBW-X012-4500S	09/04/03
CSM	X012	CHANDRAMOHAN, P	902029	6010	122	ROB	R-G216	2ROBW-X012-6010	09/04/03
CSM	X012	KORA, GH	901721	6010	122	ROB	R-E207	2ROBW-X012-6010	09/04/03
CSM	X012	LEUZE, MR	29010	6010	210	ROB	R-G223	2ROBW-X012-6010	09/04/03
CSM	X012	SAMATOVA, NF	38209	6010	107	ROB	R-G201	2ROBW-X012-6010	09/04/03
CSM	X012	SHEVLIN,SA	901815	6010	205	ROB	R-B210	2ROBW-X012-6010	09/04/03
CSM	X012	WATKINS, I-PG	901158	6010	106	ROB	R-E207	2ROBW-X012-6010	09/04/03
CSM	X012	YU, G-X	901925	6010	122	ROB	R-G206	2ROBW-X012-6010	09/04/03
CSM	X012	AGARWAL, PK	901096	6012	102	ROB	R-G216	2ROBW-X012-6010	09/04/03
CSM	X012	DONGARRA, JJ	37861	6012	113	ROB	R-G207	2ROBW-X012-6010	09/04/03
CSM	X012	ELWASIF, WR	38004	6012	207	ROB	R-G209	2ROBW-X012-6010	09/04/03
CSM	X012	ENGELMANN, C	747338	6012	211-B	ROB	R-G203	2ROBW-X012-6010	09/04/03
CSM	X012	GORIN, A	900563	6012	101	ROB	R-A209	2ROBW-X012-6010	09/04/03
CSM	X012	PARK, B-H	901535	6012	211	ROB	R-G208	2ROBW-X012-6010	09/04/03
CSM	X012	SCHWIDDER,J	746313	6012	207	ROB	R-G205	2ROBW-X012-6010	09/04/03
CSM	X012	WILDE, T	746309	6012	211-G	ROB	R-G211	2ROBW-X012-6012	09/04/03
CSM	X012	ARAMAYO, GA	13500	6025	11W	ROB	R-F219	2ROBW-X012-6025	09/04/03
CSM	X012	HAMBY,C	691587	6025	6N	ROB	R-F211	2ROBW-X012-6025	09/04/03
CSM	X012	LOCKED FILE ROOM		6025	3-8N	ROB	R-F216	2ROBW-X012-6025	09/04/03
CSM	X012	NICHOLS,JA	690904	6025	4N	ROB	R-F211-A	2ROBW-X012-6025	09/04/03
CSM	X012	NUKALA, PK	900608	6025	002M	ROB	R-F215	2ROBW-X012-6025	09/04/03
CSM	X012	RILEY, BA	13255	6025	003N	ROB	R-F213	2ROBW-X012-6025	09/04/03
CSM	X012	SIMUNOVIC, S	35489	6025	009W	ROB	R-F217	2ROBW-X012-6025	09/04/03
CSM	X037	SPENCE, KR	23170	6025	011E	ROB	R-F211-B	2ROBW-X012-6025	09/04/03
CCSD	X037	HOLTZCLAW, MA	13065	4500N	J230	ROB	R-F201	2ROBW-X110-4500N	09/04/03
CCSD	X029	JOHNSON, K	19998	4500N	269	ROB	R-F205	2ROBW-X110-4500N	09/04/03
CCSD	X110	MALONE, LT	24421	4500N	251	ROB	R-E201	2ROBW-X110-4500N	09/04/03
CCSD	X012	MANNING, N	647131	4500N	267	ROB	R-E205	2ROBW-X110-4500N	09/04/03
CCSD	X110	MCCOY, D	25324	4500N	253	ROB	R-E201-B	2ROBW-X110-4500N	09/04/03
CCSD	X110	WRIGHT, NY	16750	4500N	273A	ROB	R-F203	2ROBW-X110-4500N	09/04/03
CCSD	X110	ZACHARIA, T	29558	4500N	249	ROB	R-E201D	2ROBW-X110-4500N	09/04/03
CSM	X012	student: Munavalli, RV	901940	6010	122	CSB	C-C316-04	3CSBN-X012-6010	09/04/03
CSM	X012	student: CHOI, H-S	902260	6012	211	CSB	C-C316-02	3CSBN-X012-6012	09/04/03
CSM	X012	student: DAY, RM	742845	6012	211	CSB	C-C316-02	3CSBN-X012-6012	09/04/03
CSM	X012	student: MITCHOM, J	901308	6025	1L	CSB	C-C316-04	3CSBN-X012-6025	09/04/03
CSM	X012	HORWEDEL,B	14932	1505	354	6012	116	6012-X012-1505	09/10/03
CSM	X012	JACKSON, BL	9814	1505	384	6012	118	6012-X012-1505	09/10/03
CSM	X012	BAYNE, CK	13370	6011	243	6012	107A	6012-X012-6011	09/10/03
CSM	X012	Bookcases		6011	209	6012	107A	6012-X012-6011	09/10/03
CSM	X012	COUNTS,RW	12677	6011	246	6012	115	6012-X012-6011	09/10/03
CSM	X012	WOLF,D	19204	6011	248	6012	119	6012-X012-6011	09/10/03
CSM	X012	FANN,GI	901969	6012	104	6012	101	6012-X012-6012	09/10/03
CSM	X012	MEUNIER,V	900972	6012	116	6012	206	6012-X012-6012	09/10/03
CSM	X012	NOID, DW	19185	6012	115	6012	207	6012-X012-6012	09/10/03
CSM	X012	SHELTON JR, WA	34113	6012	119	6012	203	6012-X012-6012	09/10/03
CSM	X012	SMIRNOV, AV	900581	6012	118-B	6012	204	6012-X012-6012	09/10/03
CSM	X012	SUMPTER,BG	34533	6012	115	6012	205	6012-X012-6012	09/10/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
CSM	X012	YAnaI,T	902065	6010	102	6012	202	6012-X012-6012	09/10/03
CSM	X012		I	6012		6012		6012-X012-6012	09/10/03
CSM	X012	GAN, Z	902459	6012	211	6012	200	6012-X012-6012	09/10/03
CSM	X012	HARRISON,RJ	690902	6012	112	6012	201	6012-X012-6012	09/10/03
CSM	X012	HATHORN, BC	747269	6012	110-B	6012	209	6012-X012-6012	09/10/03
CSM	X012	CHAKRAVARTHY, VK	626818	6025	002L	6012	104	6012-X012-6025	09/10/03
CSM	X012	PARKS, Alan (visitor)	na	6025	1L	6012	216	6012-X012-6025	09/10/03
CSM	X012	RYAN, Jennifer (Householder 1)	904176	6025	8W	6012	100	6012-X012-6025	09/10/03
~~CSE~~	~~X107~~	~~BOWMAN, K~~	~~741073~~	~~4500N~~	~~H31~~	~~ROB~~	~~R-E103~~	~~1ROBW-X107-4500N~~	~~09/11/03~~
CSE	X107	STEWART, KA	11660	4500N	F036	ROB	R-G118	1ROBW-X107-4500N-1	09/11/03
CSE	X107	TERRY, CL	33604	4500N	E020	ROB	R-G119	1ROBW-X107-4500N-1	09/11/03
CSE	X107	MCNEILLY, GS	690926	4500N	H023	ROB	R-G120	1ROBW-X107-4500N-1	09/11/03
CSE	X107	RATLEDGE, PM	23685	4500N	H25-C	ROB	R-G121	1ROBW-X107-4500N-1	09/11/03
CSE	X107	MORRIS, GJ	8749	4500N	H33	ROB	R-G123	1ROBW-X107-4500N-1	09/11/03
CSE	X107	SEXTON, AK	28254	4500N	H29	ROB	R-G125	1ROBW-X107-4500N-1	09/11/03
CSE	X107	FISCHER, KJ	13584	4500N	H023	ROB	R-G127	1ROBW-X107-4500N-1	09/11/03
CSE	X107	RASCH, KA	36011	4500N	255	ROB	R-G129	1ROBW-X107-4500N-1	09/11/03
CSE	X107	ROBBINS, IF	15274	4500N	G010	ROB	R-G131	1ROBW-X107-4500N-1	09/11/03
CSE	X107	REID, RW	27717	4500N	241	ROB	R-G135	1ROBW-X107-4500N-1	09/11/03
CSE	X107	SUMMERS, MS	35622	6010	100	ROB	R-E109	1ROBW-X107-6010	09/11/03
CSE	X107	KIRKPATRICK, JR	16456	6011	136	ROB	R-A101	1ROBW-X107-6011	09/11/03
CSE	X107	SJOREEN, AL	24044	6011	237	ROB	R-A103	1ROBW-X107-6011	09/11/03
CSE	X107	BASS, BR	16520	6011	144	ROB	R-A105	1ROBW-X107-6011	01/27/04
CSE	X107	Yin, S	902018	6011	206	ROB	R-A108	1ROBW-X107-6011	09/11/03
CSE	X107	ROSE, AI	22878	6011	133	ROB	R-A111	1ROBW-X107-6011	09/11/03
CSE	X107	MAHFOUZ, MR	903823	6011	144	ROB	R-B102	1ROBW-X107-6011	09/11/03
CSE	X107	JACKSON, WL	18866	6011	146	ROB	R-B103	1ROBW-X107-6011	09/11/03
CSE	X107	SHANKAR, M	901921	6011	201	ROB	R-B104	1ROBW-X107-6011	09/11/03
CSE	X107	BIRDWELL, KR	28741	6011	231	ROB	R-B106	1ROBW-X107-6011	09/11/03
CSE	X107	KRUSE, KL	27865	6011	140	ROB	R-B109	1ROBW-X107-6011	09/11/03
CSE	X107	STRAND, JA	902202	6011	142	ROB	R-E101	1ROBW-X107-6011	09/11/03
CSE	X107	KULESZ, JJ	23529	6011	138	ROB	R-F102	1ROBW-X107-6011	09/11/03
CSE	X107	GORMAN, BL	902859	6011	141	ROB	R-F104	1ROBW-X107-6011	09/11/03
CSE	X107	KOMISTEK, RD	902820	6011	144	ROB	R-F111	1ROBW-X107-6011	09/11/03
CSE	X107	STRICKLER, DJ	13398	6011	208	ROB	R-F112	1ROBW-X107-6011	09/11/03
CSE	X107	GILES JR, GE	12534	6011	137	ROB	R-F113	1ROBW-X107-6011	09/11/03
CSE	X107	WARD, RC	25731	6011	141	ROB	R-F119	1ROBW-X107-6011	09/11/03
CSE	X107	CHILDS, KW	14313	6011	131	ROB	R-F121	1ROBW-X107-6011	09/11/03
CSE	X107	TAYLOR, MJ	14858	6011	143	ROB	R-F123	1ROBW-X107-6011	09/11/03
CSE	X107	SMITH, CY	14259	6011	132	ROB	R-F125	1ROBW-X107-6011	09/11/03
CSE	X107	ALLGOOD, GO	17103	6011	139	ROB	R-F127	1ROBW-X107-6011	09/11/03
CSE	X107	HETRICK, DM	15721	6011	135	ROB	R-F129	1ROBW-X107-6011	09/11/03
CSE	X107	TOLLIVER, JS	16509	6011	239	ROB	R-G103	1ROBW-X107-6011	09/11/03
CSE	X107	SHIPE, PC	32481	6025	10L	ROB	R-A102	1ROBW-X107-6025	09/11/03
CSE	X107	LOEBL, AS	12804	6025	009E	ROB	R-A109	1ROBW-X107-6025	09/11/03
CSE	X107	SCHRYVER, JC	27393	6025	22W	ROB	R-A110	1ROBW-X107-6025	09/11/03
CSE	X107	GOLDFINGER, RC	17581	6025	12L	ROB	R-B101	1ROBW-X107-6025	09/11/03
CSE	X107	SULFREDGE, CD	35153	6025	005M	ROB	R-B108	1ROBW-X107-6025	09/11/03
CSE	X107	SANDERS, RL	32611	6025	17-W	ROB	R-B110	1ROBW-X107-6025	09/11/03
CSE	X107	PALATHINGAL, PJ	902000	6025	14-L	ROB	R-E107	1ROBW-X107-6025	09/11/03
CSE	X107	POOLE, D	25329	6025	002N	ROB	R-F109	1ROBW-X107-6025	09/11/03
CSE	X107	WORLEY, BA	19074	6025	001N	ROB	R-F109-A	1ROBW-X107-6025	09/11/03
CSE	X107	LU, JM	36386	6025	12K	ROB	R-F109-B	1ROBW-X107-6025	09/11/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
CSE	X107	MORRIS, RH	16986	6025	10E	ROB	R-F115	1ROBW-X107-6025	09/11/03
CSE	X107	Treadwell, Jim N	9348	6025	011K	ROB	R-G105	1ROBW-X107-6025	09/11/03
CSE	X107	SHELDON, FT	901916	6025	10K	ROB	R-G109	1ROBW-X107-6025	09/11/03
CSE	X107	ELMORE, MT	22622	6025	20W	ROB	R-G111	1ROBW-X107-6025	09/11/03
CSE	X107	REED, JW	35545	6025	006M	ROB	R-G113	1ROBW-X107-6025	09/11/03
CSE	X107	POTOK, TE	36397	6025	11E	ROB	R-G117	1ROBW-X107-6025	09/11/03
CSE	X107	O'HATNICK, R	18806	6025	8L	ROB	R-G122	1ROBW-X107-6025	09/11/03
CSE	X107	PATTON, RM	627236	6025	005L	ROB	R-G107	1ROBW-X107-6025	09/11/03
CSE	X107	PCs and Chairs	na	6011	129	CSB	C-A216	2CSBX-X107-6011	09/11/03
CSE	X107	CRAWFORD, OH	15966	1060COM	245	ROB	??	1ROBW-X107-1060C	09/16/03
CSE	X107	DICKSON, TL	29014	9204-1	206	ROB	R-A106	1ROBW-X107-92041	09/16/03
CSE	X107	WILLIAMS, PT	12485	9204-1	213-A	ROB	R-A107	1ROBW-X107-92041	09/16/03
EESD	X065	Move furniture to storage ST-2E	na	4500N		4500N		4500N-X065-4500N	09/16/03
NSTD	X094	SERVER	na	7606A	008	ROB	R-R108	1ROBE-X094-7606A-1	09/22/03
CCOD	X071	BOUDREAU, GD	28486	4500N	I-175B	4500N	I-102	4500N-X071-4500N	09/22/03
CCOD	X071	COLE, DJ	28427	4500N	I-175B	4500N	??	4500N-X071-4500N	09/22/03
CCOD	X071	CONRAD, B	29327	4500N	I-101A	4500N	I-112	4500N-X071-4500N	09/22/03
CCOD	X071	DICKEY, MW	29190	4500N	F-13	4500N	I-168	4500N-X071-4500N	09/22/03
CCOD	X071	ELLIOTT, DL	12994	4500N	I-103	4500N	I-111	4500N-X071-4500N	09/22/03
CCOD	X071	JOHNSON, K	16207	4500N	I-101B	4500N	I-108	4500N-X071-4500N	09/22/03
CCOD	X071	KINKEAD, BL	746188	4500N	I-103	4500N	??	4500N-X071-4500N	09/22/03
CCOD	X071	LEE, KB	23009	4500N	I-101	4500N	I-106	4500N-X071-4500N	09/22/03
CCOD	X071	LIU, T-C	19089	4500N	I-168	4500N	I-104	4500N-X071-4500N	09/22/03
CCOD	X071	MANLEY, C	26737	4500N	I-103	4500N	??	4500N-X071-4500N	09/22/03
CCOD	X071	MAYS, GB	16164	4500N	I-103	4500N	I-114	4500N-X071-4500N	09/22/03
CCOD	X071	MOORE, L	13182	4500N	I-103	4500N	I-199	4500N-X071-4500N	09/22/03
CCOD	X071	MYERS, WF	29691	4500N	F-13	4500N	??	4500N-X071-4500N	09/22/03
CCOD	X071	RUPPE, MJ	12026	4500N	I-103	4500N	??	4500N-X071-4500N	09/22/03
CCOD	X071	STRICKLER, CS	13967	4500N	I-175A	4500N	I-170	4500N-X071-4500N	09/22/03
CCOD	X071	WILSON, KT	27242	4500N	I-103	4500N	I-110	4500N-X071-4500N	09/22/03
CCOD	X071	WRIGHT, VR	13039	4500N	I-103	4500N	I-113	4500N-X071-4500N	09/22/03
CCOD	X071	LIBRARY MOVE	na	4500N		4500N		4500N-X071-4500N	09/22/03
F&O	X089	JUSTICE, M	28989	2652B	7	ROB	R-J104	1ROBE-X089-2652B	09/25/03
F&O	X089	MATHYS, JW	13284	2652B	3	ROB	R-J101	1ROBE-X089-2652B	09/25/03
F&O	X089	O'CONNOR, DG	22189	2652B	2	ROB	R-J103	1ROBE-X089-2652B	09/25/03
NSTD	X043	ANDREWS, AG	035132	4500N	120C	ROB	R-N119	1ROBE-X094-4500N	09/25/03
NSTD	X037	AULT, DH (Fin. Off.)	029211	4500N	B012	ROB	R-R116	1ROBE-X094-4500N	09/25/03
NSTD	X094	BINDER, JL	902783	4500N	B008	ROB	R-R115	1ROBE-X094-4500N	09/25/03
NSTD	X094	CRAIG, DF	018584	4500N	124A	ROB	R-N117-A	1ROBE-X094-4500N	09/25/03
NSTD	X094	DUNCAN, LD	021107	4500N	125D	ROB	R-N113-A	1ROBE-X094-4500N	09/25/03
NSTD	X094	FILE ROOM	na	4500N	A036	ROB	R-I102-A	1ROBE-X094-4500N	09/25/03
NSTD	X094	FILE ROOM	na	4500N	A034	ROB	R-I102-A	1ROBE-X094-4500N	09/25/03
NSTD	X094	FILE ROOM	na	4500N	200	ROB	R-N104	1ROBE-X094-4500N	09/25/03
NSTD	X043	FILE/SUPPLY ROOM	na	4500N	124A 124	ROB	R-P102	1ROBE-X094-4500N	09/25/03
NSTD	X094	HIGHTOWER JR, JR	008416	4500N	125H	ROB	R-R104	1ROBE-X094-4500N	09/25/03
NSTD	X094	HILL, DAVID	901380	4500N	200A	ROB	R-N107-A	1ROBE-X094-4500N	09/25/03
NSTD	X094	HOLDER, AC	035158	4500N	A034	ROB	R-I102-B	1ROBE-X094-4500N	09/25/03
NSTD	X094	JERNIGAN, JJ	017267	4500N	C232	ROB	R-I103	1ROBE-X094-4500N	09/25/03
NSTD	X094	JONES, TR	032665	4500N	125C	ROB	R-J105	1ROBE-X094-4500N	09/25/03
NSTD	X043	KLEIN, JA	012156	4500N	B014	ROB	R-R111-B	1ROBE-X094-4500N	09/25/03
NSTD	X037	LEWIS, PG (Fin. Off.)	030685	4500N	120F	ROB	R-O101	1ROBE-X094-4500N	09/25/03
NSTD	X094	MCGINNIS, CP	018352	4500N	A028	ROB	R-R109	1ROBE-X094-4500N	09/25/03
NSTD	X094	MELTON, LK	015787	4500N	124B	ROB	R-N117	1ROBE-X094-4500N	09/25/03
NSTD	X043	MICHAELS, GE	018886	4500N	130B	ROB	R-P101-A	1ROBE-X094-4500N	09/25/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
NSTD	X037	MOATES, DL (Fin. Off.)	023203	4500N	125F	ROB	R-O104	1ROBE-X094-4500N	09/25/03
NSTD	X043	MOSES, DL	024188	4500N	124C	ROB	R-P101-B	1ROBE-X094-4500N	09/25/03
NSTD	X094	PATTON, BD	019373	4500N	200B	ROB	R-O106	1ROBE-X094-4500N	09/25/03
NSTD	X094	PHIPPS, MA	033990	4500N	C214	ROB	R-N102	1ROBE-X094-4500N	09/25/03
NSTD	X094	PLUMMER, KL	029126	4500N	C222	ROB	R-I105	1ROBE-X094-4500N	09/25/03
NSTD	X071	SAVAGE, MK	028374	4500N	C204	ROB	R-I101	1ROBE-X094-4500N	09/25/03
NSTD	X043	SIMPSON, JJ	019269	4500N	120D	ROB	R-N121	1ROBE-X094-4500N	09/25/03
NSTD	X043	STRATMAN, ED	031850	4500N	130A	ROB	R-P101	1ROBE-X094-4500N	09/25/03
NSTD	X094	SUPPLY ROOM		4500N	200	ROB	R-N112	1ROBE-X094-4500N	09/25/03
NSTD	X094	THACKER, KK	016033	4500N	200	ROB	R-N107	1ROBE-X094-4500N	09/25/03
NSTD	X094	TULL, SL	027160	4500N	A036	ROB	R-I102-C	1ROBE-X094-4500N	09/25/03
NSTD	X094	TUNSTALL, LG	027672	4500N	200	ROB	R-N107	1ROBE-X094-4500N	09/25/03
NSTD	X094	WILLIAMS, JE	034176	4500N	125F	ROB	R-O102	1ROBE-X094-4500N	09/25/03
NSTD	X094	POLLARD, CM	034181	757BGRD	D-3	ROB	R-R105	1ROBE-X094-4500N	09/25/03
NSTD	X094	BENTON, BA	019317	7606A	001	ROB	R-R114	1ROBE-X094-7606A	09/25/03
NSTD	X094	CLINE, RL	017869	7606A	005	ROB	R-R111-A	1ROBE-X094-7606A	09/25/03
NSTD	X094	COTTER, LJ	032502	7606A	002	ROB	R-R111	1ROBE-X094-7606A	09/25/03
NSTD	X094	FERREN, DM	020204	7606A	003	ROB	R-R112	1ROBE-X094-7606A	09/25/03
NSTD	X094	FILE/FAX ROOM	na	7606A	4	ROB	R-R110	1ROBE-X094-7606A	09/25/03
NSTD	X094	WEBSTER, CS	017142	7606A	008	ROB	R-R108	1ROBE-X094-7606A	09/25/03
NSTD	X094	WAGGONER JR, CC	028563	7606A	223	ROB	R-R106	1ROBE-X094-7606A	09/25/03
NSTD	X094	CANNON, RM	013174	7918	215	ROB	R-N113-B	1ROBE-X094-7918	09/25/03
NSTD	X094	HUSKEY, LS	034039	7918	216	ROB	R-N113	1ROBE-X094-7918	09/25/03
NSTD	X094	LAY, SL	028666	7918	109	ROB	R-R107	1ROBE-X094-7918	09/25/03
NSTD	X094	WHAM, RM	021080	7918	113	ROB	R-R107-A	1ROBE-X094-7918	09/25/03
NSTD	X094	SHAFFER, JT	015235	9204-1	204	ROB	R-R105-A	1ROBE-X094-92041	09/25/03
NSTD	X094	WAGGONER JR, CC	028563	9204-3	223	ROB	R-R106	1ROBE-X094-92043	09/25/03
CSE	X107	FILES	na	4500N	G10	ROB		1ROBW-X107-4500N-2	09/25/03
NSTD	X094	TUCKER, DL	025164	4500N	125E	CSB	C-D335	3CSBS-X094-4500N	09/25/03
NSTD	X094	One Safe	na	4500N	164	ETF	E-B101	1ROBE-X094-4500N	09/27/03
NSTD	X094	FILE ROOM	na	7606A	4	ROB	R-I102-A	1ROBE-X094-7606A	09/27/03
NSTD	X094	FILE ROOM	na	7606A	7	ROB	R-I102-A	1ROBE-X094-7606A	09/27/03
NSTD	X094	FILE ROOM	na	7606A	9	ROB	R-I102-A	1ROBE-X094-7606A	09/27/03
Physics	X013	Cardall, C	626600	6008	126	6025	17E	6025-X013-6008	09/29/03
Physics	X013	Smith, MS	35114	6010	109	6025	3N	6025-X013-6010	09/29/03
Physics	X013	Wright, AK	646759	6010	112	6025	1M1	6025-X013-6010	09/29/03
Physics	X013	Bardayan, D	38110	6010	116	6025	11E	6025-X013-6010	09/29/03
Physics	X013	Blackmon, JC	36422	6010	117	6025	8E	6025-X013-6010	09/29/03
Physics	X013	Mezzacappa, T	36272	6010	209	6025	1N	6025-X013-6010	09/29/03
Physics	X013	Ma, Z	744182	6010	C102	6025	2M	6025-X013-6010	09/29/03
Physics	X013	Hix, WR	743820	6010	lab D	6025	10N	6025-X013-6010	09/29/03
Physics	X013	Guidry, MW	19165	6010	lab D	6025	13E	6025-X013-6010	09/29/03
Physics	X013	Dessieux, L	746318	6010	lab D	6025	15W2	6025-X013-6010	09/29/03
Physics	X013	Messer, OE	620078	6010	lab D	6025	15W5	6025-X013-6010	09/29/03
Physics	X013	Moazen, BH	901148	6010	lab F	6025	14E	6025-X013-6010	09/29/03
Physics	X013	Parete-Koon, ST	747218	6010	lab F	6025	15W2	6025-X013-6010	09/29/03
Physics	X013	Jones, KL	901322	6010	lab F	6025	9E	6025-X013-6010	09/29/03
Physics	X013	Nesaraja, CD	900562	6010		6025	15W	6025-X013-6010	09/29/03
Physics	X013	Kozub, RL	651746	6010		6025	1M	6025-X013-6010	09/29/03
PHY	X013	ARBANAS, G	620368	6025	5K	6025	7M	6025-X013-6025	09/29/03
NSTD	X094	PRINTER	na	7918	109	ROB	R-R107	1ROBE-X094-7918	10/01/03
NSTD	X094	Boxes	na	4500N	125E	CSB	C-D335	3CSBS-X094-4500N-2	10/01/03
ESD	X042	LEE, DW	18051	4500N	144A	1505	376	1505-X042-4500N	10/02/03
ESD	X042	HAGAN, C	25072	4500N	144B	4500N	H-11D	4500N-X042-4500N	10/02/03
ESD	X042	Hallway (29 boxes)	na	4500N	144A	4500N	H-001	4500N-X042-4500N	10/02/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
CSD	X060	SANDERS, CA	27520	4500N	125L	4500N	124-A	4500N-X060-4500N	10/02/03
FED	X019	30 servers	na	92012		ROB	R-G305	3ROBW-X019-92012-1	10/06/03
Physics	X013	ERVIN, F	26970	6000	230	6025	*7N*	6025-X013-6000	10/08/03
Physics	X013	Milan, S	25463	6000	231	6025	*6N*	6025-X013-6000	10/08/03
Physics	X013	Young, GR	20535	6000	232	6025	4N	6025-X013-6000	10/08/03
Physics	X013	McBRIDE, J		6000	205C	6025	4M	6025-X013-6000	10/08/03
Physics	X013	ALTON, G		6000	205D	6010	205	6025-X013-6000	10/08/03
Physics	X013	KENNEDY, S		6010	118	6010	203	6025-X013-6000	10/08/03
FED	X107	Strickler, DJ	13398	9201-2	0209D	ROB	R-F112	1ROBW-X107-92012-2	10/09/03
FED	X019	Library/Reading Room	na	9201-2	117	ROB	R-D311	3ROBW-X019-92011	10/09/03
FED	X019	Copy Room	na	9201-2	0116A	ROB	R-F322	3ROBW-X019-92011	10/09/03
FED	X019	AKERS, DL	22802	9201-2	0228D	ROB	R-A301	3ROBW-X019-92012-2	10/09/03
FED	X019	BAITY JR, FW	16306	9201-2	250	ROB	R-F335	3ROBW-X019-92012-2	10/09/03
FED	X019	BATCHELOR, DB	15798	9201-2	204	ROB	R-F301A	3ROBW-X019-92012-2	10/09/03
FED	X019	BAYLOR, LR	24569	9201-2	258	ROB	R-F325	3ROBW-X019-92012-2	10/09/03
FED	X019	BENSON, RD	21997	9201-2	104	ROB	R-D312	3ROBW-X019-92012-2	10/09/03
FED	X019	BERRY, LA	11424	9201-2	208	ROB	R-F304	3ROBW-X019-92012-2	10/09/03
FED	X019	BIGELOW, TS	25238	9201-2	238	ROB	R-B305	3ROBW-X019-92012-2	10/09/03
FED	X019	CARRERAS, BA	23430	9201-2	106	ROB	R-F303	3ROBW-X019-92012-2	10/09/03
FED	X019	CARTER, MD	27133	9201-2	214	ROB	R-F308	3ROBW-X019-92012-2	10/09/03
FED	X019	CAUGHMAN, JB	26412	9201-2	272	ROB	R-F329	3ROBW-X019-92012-2	10/09/03
FED	X019	COLCHIN, RJ	8816	9201-2	230	ROB	R-G319	3ROBW-X019-92012-2	10/09/03
FED	X019	COLCHIN, RJ (2nd office)	8816	9201-2	0228C	ROB	R-G319	3ROBW-X019-92012-2	10/09/03
FED	X019	COLE, MJ	12902	9201-2	310	ROB	R-G306	3ROBW-X019-92012-2	10/09/03
FED	X019	COMBS, SK	12460	9201-2	273	ROB	R-F337	3ROBW-X019-92012-2	10/09/03
FED	X019	DEL-CASTILLO-NEGRETE	37874	9201-2	226	ROB	R-F321	3ROBW-X019-92012-2	10/09/03
FED	X019	ELLIOTT, EG	24281	9201-2	102	ROB	R-F317	3ROBW-X019-92012-2	10/09/03
FED	X019	FEHLING, DT	25260	9201-2	230	ROB	R-G317	3ROBW-X019-92012-2	10/09/03
FED	X019	FEHLING, DT (LAB)	25260	9201-2	230	ROB	R-G315	3ROBW-X019-92012-2	10/09/03
FED	X019	FOGARTY, PJ	13585	9201-2	303	ROB	R-B302	3ROBW-X019-92012-2	10/09/03
FED	X019	FORTIER, G	604550	9201-2	220	ROB	R-B306	3ROBW-X019-92012-2	10/09/03
FED	X019	FREELS, MR	31327	9201-2	200	ROB	R-F301	3ROBW-X019-92012-2	10/09/03
FED	N515	FREUDENBERG,	38704	9201-2	314	ROB	R-D302	3ROBW-X019-92012-2	10/09/03
FED	X019	GARDNER, WL	16891	9201-2	0255B	ROB	R-F327	3ROBW-X019-92012-2	10/09/03
FED	N515	GORANSON, PL	17071	9201-2	312	ROB	R-G311	3ROBW-X019-92012-2	10/09/03
FED	X019	GOULDING, RH	27839	9201-2	260	ROB	R-F333	3ROBW-X019-92012-2	10/09/03
FED	X019	GREEN, GA	28237	9201-2	254	ROB	R-A313	3ROBW-X019-92012-2	10/09/03
FED	X019	GREENWOOD, DE	22608	9201-2	0201B	ROB	R-E307-B	3ROBW-X019-92012-2	10/09/03
FED	X019	Guest	tbd	9201-2	0261C	ROB	R-B308	3ROBW-X019-92012-2	10/09/03
FED	X019	Guest	tbd	9201-2	0209B	ROB	R-D310	3ROBW-X019-92012-2	10/09/03
FED	X019	Guest	tbd	9201-2	212	ROB	R-E301-01	3ROBW-X019-92012-2	10/09/03
FED	X019	HARGROVE, T	626554	9201-2	205	ROB	R-B304	3ROBW-X019-92012-2	10/09/03
FED	X037	HICKEY, LJ	23168	9201-2	103	ROB	R-F319	3ROBW-X019-92012-2	10/09/03
FED	X019	HILLIS, DL	22287	9201-2	0228A	ROB	R-A309	3ROBW-X019-92012-2	10/09/03
FED	X019	HIRSHMAN, SP	19977	9201-2	224	ROB	R-F314	3ROBW-X019-92012-2	10/09/03
FED	X019	HOGAN, JT	11440	9201-2	241	ROB	R-A307	3ROBW-X019-92012-2	10/09/03
FED	X019	HOULBERG, WA	18456	9201-2	210	ROB	R-F302	3ROBW-X019-92012-2	10/09/03
FED	X019	ISLER, RC	14977	9201-2	236	ROB	R-G321	3ROBW-X019-92012-2	10/09/03
FED	X019	JAEGER, EF	14008	9201-2	218	ROB	R-F310	3ROBW-X019-92012-2	10/09/03
FED	X019	JERNIGAN, TC	11986	9201-2	231	ROB	R-A305	3ROBW-X019-92012-2	10/09/03
FED	N515	JONES, GH	23563	9201-2	0304A	ROB	R-G313	3ROBW-X019-92012-2	10/09/03
FED	X019	LOVETT, G	900468	9201-2	220	ROB	R-B303	3ROBW-X019-92012-2	10/09/03
FED	X107	LYNCH, VE	21826	9201-2	113	ROB	R-E307-A	3ROBW-X019-92012-2	10/09/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
FED	X019	LYON, JF	8350	9201-2	0228B	ROB	R-A303	3ROBW-X019-92012-2	10/09/03
FED	X019	MARTIN, JD	746161	9201-2	0257A	ROB	R-A310	3ROBW-X019-92012-2	10/09/03
FED	X019	MILORA, SL	12207	9201-2	101	ROB	R-F317A	3ROBW-X019-92012-2	10/09/03
FED	X019	MIODUSZEWSKI, PK	23482	9201-2	0228E	ROB	R-A301A	3ROBW-X019-92012-2	10/09/03
FED	X019	MOORE, TC	32388	9201-2	109	ROB	R-F324	3ROBW-X019-92012-2	10/09/03
FED	X019	MURAKAMI, M	10982	9201-2	0228C	ROB	R-A306	3ROBW-X019-92012-2	10/09/03
FED	X019	NELSON, BE	28566	9201-2	306	ROB	R-G308A	3ROBW-X019-92012-2	10/09/03
FED	X019	OVERBEY, DR	13859	9201-2	206	ROB	R-E301-A	3ROBW-X019-92012-2	10/09/03
FED	X107	OWEN, LW	11168	9201-2	242	ROB	R-A304	3ROBW-X019-92012-2	10/09/03
FED	X019	Printer Room	na	9201-2	209	ROB	R-G308	3ROBW-X019-92012-2	10/09/03
FED	X019	RASMUSSEN, DA	24860	9201-2	252	ROB	R-A313A	3ROBW-X019-92012-2	10/09/03
FED	X019	RENFRO, RS	604347	9201-2	332	ROB	R-G309	3ROBW-X019-92012-2	10/09/03
FED	X019	RYAN, PM	12896	9201-2	0201A	ROB	R-F331	3ROBW-X019-92012-2	10/09/03
FED	X019	SERVER ROOM	na	9201-2	201	ROB	R-G305	3ROBW-X019-92012-2	10/09/03
FED	X019	SPONG, DA	14566	9201-2	216	ROB	R-F312	3ROBW-X019-92012-2	10/09/03
FED	X019	Storage Room	na	9201-2	201	ROB	R-E301-B	3ROBW-X019-92012-2	10/09/03
FED	X019	Storage Room	na	9201-2	0288A &	ROB	R-G304	3ROBW-X019-92012-2	10/09/03
FED	X019	SWAIN, DW	15600	9201-2	0274B	ROB	R-B309	3ROBW-X019-92012-2	10/09/03
FED	X019	TATE, DJ	23394	9201-2	105	ROB	R-F306	3ROBW-X019-92012-2	10/09/03
FED	X019	TINDALL, JA	604405	9201-2	334	ROB	R-G309	3ROBW-X019-92012-2	10/09/03
FED	X019	TSAI, C	13559	9201-2	270	ROB	R-A308	3ROBW-X019-92012-2	10/09/03
FED	X019	UCKAN, na	14908	9201-2	222	ROB	R-F323	3ROBW-X019-92012-2	10/09/03
FED	X019	WHITE, TL	17338	9201-2	239	ROB	R-B310	3ROBW-X019-92012-2	10/09/03
FED	X019	Williamson, DE	22971	9201-2	308	ROB	R-G307	3ROBW-X019-92012-2	10/09/03
FED	X019	Guest	tbd			ROB	R-B307	3ROBW-X019-92012-2	10/09/03
FED	X019	Guest	tbd			ROB	R-D304	3ROBW-X019-92012-2	10/09/03
ENV	X035	HALL, JA	21963	4500N	144F			4500N-X035-4500N	10/14/03
ENV	X035	RUTHERFORD, K	23877	4500N	144C			4500N-X035-4500N	10/14/03
ESTD	X092	WALKER, BA	23335	4500N	144D	4500N	162	4500N-X092-4500N	10/14/03
NSTD	X094	Fire Kings (~6)	na	7606A	3 or 5	5510	??	5510-X094-7606A	10/14/03
NSTD	X094	HEATHERLY, DW	019268	4508	271	ETF	E-A123	1ETFX-X094-4508	10/16/03
NSTD	X094	SITTERSON, RG	020729	4508	274	ETF	E-A121	1ETFX-X094-4508	10/16/03
NSTD	X094	35 Classified Files (FireKings)	na	9204-3	basemen	ROB	R-I102-A	1ROBE-X094-4500N	10/20/03
LSD	X001	Servers	na	1060C	235	CSB	C-E204	2CSBX-X001-1060C-2	10/20/03
Physics	X013	Misc		6000		6025		6025-X013-6000-2	10/20/03
NSTD	X094	MCFEE, MT (Final destination)	020613	ROB	R-O205	ETF	E-A119	1ETFX-X094-2ROBE	10/23/03
F&O	X089	~~WILSON, SG~~ BURNETT, R	18314	NTRC	106	ROB	R-J102	1ROBE-X089-NTRC	10/23/03
NSTD	X037	RADER, PN (Fin. Off.)	012662	1060COM	127-08	ROB	R-O103	1ROBE-X094-1060C	10/23/03
ESTD	X024	MILLER, WA	10141	4500N	162	ETF	E-I203	2ETFX-X024-4500N	10/23/03
ESTD	X071	SOUTHMAYD CC	22885	1060COM	127-10	ETF	E-C205	2ETFX-X071-1060C	10/23/03
ESTD	X071	SMITH BJ	19447	1060COM	127-09	ETF	E-C207	2ETFX-X071-1060C	10/23/03
ESTD	X071	JOHNSON CH	19980	1060COM	132-05	ETF	E-C209	2ETFX-X071-1060C	10/23/03
ESTD	X071	REPRODUCTION		1060COM	141	ETF	E-G207	2ETFX-X071-1060C	10/23/03
ESTD	X071	SHARP, DG	19265	1060COM	141	ETF	E-G208	2ETFX-X071-1060C	10/23/03
ESTD	X071	JOHNSON CH	19980	1060COM	132-05	ETF	E-G209	2ETFX-X071-1060C	10/23/03
ESTD	X071	JOHNSON CH	19980	1060COM	132-05	ETF	E-H212	2ETFX-X071-1060C	10/23/03
ESTD	X092	SCHAICH, CR	19097	3500	22	ETF	E-A218	2ETFX-X092-3500	10/23/03
ESTD	X092	JOHNSON, KL	33679	3500	29	ETF	E-H209	2ETFX-X092-3500	10/23/03
ESTD	X092	CHAIRO, PJ	29778	3500	30	ETF	E-H211	2ETFX-X092-3500	10/23/03
ESTD	X092	HUTCHINSON, DP	13309	3500	A008	ETF	E-I201	2ETFX-X092-3500	10/23/03
ESTD	X092	SIMPSON, ML	23671	3500	004A	ETF	E-I211	2ETFX-X092-3500	10/23/03
ESTD	X092	MC NEANY, SR	13522	3500	003A	ETF	E-I215	2ETFX-X092-3500	10/23/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
ESTD	X092	LAFFERTY, SL	34488	3500	3	ETF	E-I216	2ETFX-X092-3500	10/23/03
ESTD	X092	SHOURBAJI, AA	13595	3500	16	ETF	E-J206	2ETFX-X092-3500	10/23/03
ESTD	X092	GIBSON, FR	8212	3500	B034	ETF	E-J208	2ETFX-X092-3500	10/23/03
ESTD	X092	PHILLIPS, LD	18229	3500	C024	ETF	E-J210	2ETFX-X092-3500	10/23/03
ESTD	X092	JEAN-PIERRE, R	902833	3500	16	ETF	E-K201	2ETFX-X092-3500	10/23/03
ESTD	X092	D'URSO, BR	903218	3500	A026	ETF	E-I208	2ETFX-X092-3500	10/23/03
ESTD	X092	SIMPSON, JT	37806	3500	D004	ETF	E-I209	2ETFX-X092-3500	10/23/03
ESTD	X092	ALLINGTON, WJ	24386	3606	214	ETF	E-H202	2ETFX-X092-3606	10/23/03
ESTD	X092	KALDENBACH, BJ	30375	5600	J310	ETF	E-C203	2ETFX-X092-3CSBN	10/23/03
ESTD	X092	HEATHERLY, TL	19283	4500N	F001	ETF	E-C201	2ETFX-X092-4500N	10/23/03
ESTD	X092	STORAGE	Wheeler	4500N		ETF	E-G210	2ETFX-X092-4500N	10/23/03
ESTD	X092	MONTGOMERY, R	22131	4500N	162	ETF	E-I205	2ETFX-X092-4500N	10/23/03
ESTD	X092	DINSMORE, TV	15098	4500N	G11	ETF	E-I207	2ETFX-X092-4500N	10/23/03
ESTD	X092	SENESAC, L	746542	4500S	R-123	ETF	E-I212	2ETFX-X092-4500S	10/23/03
ESTD	X092	RAJIC, S	32440	4500S	S258	ETF	E-I213	2ETFX-X092-4500S	10/23/03
ESTD	X092	LAVRIK, NV	900033	4500S	H151	ETF	E-I214	2ETFX-X092-4500S	10/23/03
ESTD	X092	FILES	Datskos	4500S	S254	ETF	E-I219	2ETFX-X092-4500S	10/23/03
ESTD	X092	EARL, DD	36099	NTRC	I05	ETF	E-A209	2ETFX-X092-NTRC	10/23/03
ESTD	X092	BESHEARS, DL	16514	NTRC	G04	ETF	E-A211	2ETFX-X092-NTRC	10/23/03
ESTD	X092	CATES. MR	23878	NTRC	G05	ETF	E-A213	2ETFX-X092-NTRC	10/23/03
ESTD	X092	GOEDEKE, SM	746642	NTRC	G02	ETF	E-A214	2ETFX-X092-NTRC	10/23/03
ESTD	X092	ALLISON, SW	20919	NTRC	B22	ETF	E-A215	2ETFX-X092-NTRC	10/23/03
ESTD	X092	SANDERS, AJ	635154	NTRC	I04	ETF	E-A216	2ETFX-X092-NTRC	10/23/03
ESTD	X092	HAYNES, HD	21840	NTRC	I35	ETF	E-A217	2ETFX-X092-NTRC	10/23/03
ESTD	X092	MUHS, JD	28917	NTRC	G03	ETF	E-A219	2ETFX-X092-NTRC	10/23/03
ESTD	X092	PARKS, RR	29779	NTRC	G02	ETF	E-A220	2ETFX-X092-NTRC	10/23/03
ESTD	X092	RABY, A	33979	NTRC	J32	ETF	E-B213	2ETFX-X092-NTRC	10/23/03
ESTD	X092	STORAGE	Muhs	NTRC		ETF	E-F201	2ETFX-X092-NTRC	10/23/03
ESTD	X092	OLSZEWSKI, M	15190	NTRC	J34	ETF	E-H201	2ETFX-X092-NTRC	10/23/03
ESTD	X092	LEACH, R	35643	NTRC	I38	ETF	E-H203	2ETFX-X092-NTRC	10/23/03
ESTD	X092	JALLOUK, PA	21959	NTRC	I24	ETF	E-H204	2ETFX-X092-NTRC	10/23/03
ESTD	X092	MCELHANEY, KL	30286	NTRC	I36	ETF	E-H205	2ETFX-X092-NTRC	10/23/03
ESTD	X092	MARTIN, J	27510	NTRC	I27	ETF	E-H207	2ETFX-X092-NTRC	10/23/03
ESTD	X092	OLAND, CB	15611	NTRC	I32	ETF	E-H213	2ETFX-X092-NTRC	10/23/03
ESTD	X092	WRIGHT, AL	16739	NTRC	K01	ETF	E-H215	2ETFX-X092-NTRC	10/23/03
ESTD	X092	COX, D	31489	NTRC	I29	ETF	E-H217	2ETFX-X092-NTRC	10/23/03
ESTD	X092	FILES	Olszewski	NTRC	J32	ETF	E-C213	2ETFX-X092-NTRC	10/23/03
NSTD	X094	CARBAJO, J (Final destination)	24430	ROB	R-M205	ETF	E-A203	2ETFX-X094-2ROBE	10/28/03
NSTD	X094	KIM, S (Final destination)	033087	ROB	R-M206	ETF	E-A205	2ETFX-X094-2ROBE	10/28/03
NSTD	X094	QUALLS, AL (Final destination)	035188	ROB	R-J202	ETF	E-A207	2ETFX-X094-2ROBE	10/28/03
ESTD	X092	Workstations	na	4500N		ETF	E-D209	2ETFX-X092-4500N	10/30/03
ESTD	X092	CUNNINGHAM, JP	18219	9201-3	245D	ETF	E-A222	2ETFX-X092-92013	10/30/03
ESTD	X092	Chairs	na	ETF	E-C202/2	NTRC		NTRC-X092-2ETFX	10/30/03
ESTD	X092	BOUNDY, RG	745021	3156	202	NTRC	I37	NTRC-X092-3156	10/30/03
ESTD	X092	CAMPBELL, KL	900297	3156	110	NTRC	I34	NTRC-X092-3156	10/30/03
ESTD	X092	DAGLEY, CL	34752	3156	113	NTRC	K04	NTRC-X092-3156	10/30/03
ESTD	X092	DAS, S	26930	3156	213	NTRC	I05	NTRC-X092-3156	10/30/03
ESTD	X092	DAVIS, SC	31052	3156	211	NTRC	I29	NTRC-X092-3156	10/30/03
ESTD	X092	DIEGEL, SW	17340	3156	212	NTRC	I35	NTRC-X092-3156	10/30/03
ESTD	X092	GOELTZ, R	23580	3156	215	NTRC	I27	NTRC-X092-3156	10/30/03
ESTD	X092	HU, PS	25115	3156	109	NTRC	J32	NTRC-X092-3156	10/30/03
ESTD	X092	HWANG, HL	27137	3156	105	NTRC	I06	NTRC-X092-3156	10/30/03
ESTD	X092	MOORE, SA	32856	3156	111	NTRC	J34	NTRC-X092-3156	10/30/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
ESTD	X092	PETERSON, BE	21935	3156	201	NTRC	I38	NTRC-X092-3156	10/30/03
ESTD	X092	REUSCHER, T	746314	3156	206	NTRC	K01	NTRC-X092-3156	10/30/03
ESTD	X092	SCHMOYER, RL	23351	3156	205	NTRC	I24	NTRC-X092-3156	10/30/03
ESTD	X092	TRUETT, LF	15240	3156	203	NTRC	I32	NTRC-X092-3156	10/30/03
ESTD	X092	Lab	na	3156	103	NTRC	L204C	NTRC-X092-3156	10/30/03
ESTD	X092	Lab	na	3156	210	NTRC	L204C	NTRC-X092-3156	10/30/03
ESTD	X092	Lab	na	3156	216	NTRC	L204C	NTRC-X092-3156	10/30/03
ESTD	X092	SOUTHWORTH, F	26108	4500N	H012	NTRC	I36	NTRC-X092-4500N	10/30/03
ESTD	X092	XIONG, D	36287	4500N	G014	NTRC	I04	NTRC-X092-4500N	10/30/03
ESTD	X092	XIONG, D (2nd office)	36287	4500N	G015	NTRC	L204B	NTRC-X092-4500N	10/30/03
ESTD	X092	TALEYARKHAN, RP	28742	9204-1	321A	ETF	E-A221	2ETFX-X092-92041	11/06/03
ESTD	X092	CHO, JS	746577	9204-1	321E	ETF	E-B205	2ETFX-X092-92041	11/06/03
ESTD	X092	WEST, C	18573	9204-1	113	ETF	E-B207	2ETFX-X092-92041	11/06/03
ESTD	X092	WELCH, DE	24423	9204-1	338	ETF	E-H206	2ETFX-X092-92041	11/06/03
NSTD	X094	11 File Repositories (Safes)	na	9725	na	ROB	R-H204-B	2ROBE-X094-9725	11/11/03
ESTD	X092	CRADDICK, WG	16947	3147	103	3156	105	3156-X092-3147	11/11/03
ESTD	X092	CHILDS, PW	12989	3147	214	3156	204	3156-X092-3147	11/11/03
ESTD	X092	MADGETT, MG	33492	3147	129	3156	212	3156-X092-3147	11/11/03
TTED	X031	Furniture	na	4500N		SALVAGE		SALVAGE-X049-4500N	11/12/03
FED	X019	FOUST, CR	16184	9201-2	273	ETF	E-D110	1ETFX-X019-92012	11/17/03
EnergyE	X065	ASHDOWN, BG	20863	4500N	G035	4500N	273A	4500N-X065-4500N	11/20/03
EnergyE	X065	BROWN, MA	26023	4500N	131	4500N	249	4500N-X065-4500N	11/20/03
EnergyE	X037	FOUST, K	10785	4500N	152	4500N	263	4500N-X065-4500N	11/20/03
EnergyE	X065	HACKETT, L	27798	4500N	125	4500N	251	4500N-X065-4500N	11/20/03
EnergyE	X065	HAWSEY, B	23883	4500N	139	4500N	265	4500N-X065-4500N	11/20/03
EnergyE	X065	HUMPHREYS, P	31484	4500N	137	4500N	253	4500N-X065-4500N	11/20/03
EnergyE	X065	JAMISON, D	30128	4500N	143	4500N	269	4500N-X065-4500N	11/20/03
EnergyE	X065	JOHNSEN, S	14740	4500N	145	4500N	259	4500N-X065-4500N	11/20/03
EnergyE	X065	KARNITZ, M	16523	4500N	147	4500N	261	4500N-X065-4500N	11/20/03
EnergyE	X065	MURPHY, C	26820	4500N	141	4500N	267	4500N-X065-4500N	11/20/03
EnergyE	X065	ARMSTRONG, T	37783	4508	117	4500N	257	4500N-X065-4508	11/20/03
WFO	X064	HARRIS, EB	10760	1000	217C	3546	206	3546-X064-1000	11/25/03
WFO	X064	SAUNDERS, SA	31053	1000	219C	3546	208	3546-X064-1000	11/25/03
WFO	X064	BRADFORD, DW	29343	1000	221C	3546	204	3546-X064-1000	11/25/03
WFO	X064	RICE, CT	24895	1000	223C	3546	210	3546-X064-1000	11/25/03
PROP	X079	BISHOP, RD	35679	1000	101A	3546	111	3546-X079-1000	11/25/03
PROP	X079	BROOKS, ME	28656	1000	107A	3546	105	3546-X079-1000	11/25/03
PROP	X079	CROSS, CL	22377	1000	103A	3546	113	3546-X079-1000	11/25/03
PROP	X079	DAVIS, BF	16409	1000	100A	3546	110	3546-X079-1000	11/25/03
PROP	X079	GRAY, DL	35020	1000	110A	3546	109	3546-X079-1000	11/25/03
PROP	X079	HUDAK, DJ	32097	1000	106A	3546	106	3546-X079-1000	11/25/03
PROP	X079	ROSENBERG, JL	32678	1000	111A	3546	107	3546-X079-1000	11/25/03
PROP	X079	WEST, KP	19910	1000	108A	3546	108	3546-X079-1000	11/25/03
Contract	X112	BESANCENEZ, W	32988	1000	115A	3546		3546-X112-1000	11/25/03
Contract	X112	ERVIN, KP	31500	1000	113A	3546		3546-X112-1000	11/25/03
Contract	X112	MIGUN, RP	22771	1000	117A	3546		3546-X112-1000	11/25/03
ESTD	X092	GREGG, ML	26185	3500	B8	3156	211	3156-X092-3500	12/03/03
ESTD	X092	PIERCE, FP	18101	3500	B10	3156	213	3156-X092-3500	12/03/03
ESTD	X092	WILCHER, KL	28044	3500	B2	3156	214	3156-X092-3500	12/03/03
ESTD	X092	BAUGH, RN	28051	3500	B4	3156	215	3156-X092-3500	12/03/03
ESTD	X092	CAMPBELL,JM	33276	3500	B6	3156	216	3156-X092-3500	12/03/03
ESTD	X092	DATSKOS, PG	36435	4500S	H160	ETF	E-I202	2ETFX-X092-4500S	12/11/03
ESTD	X092	WILKES, KE	27699	4508	239	ETF	E-B209	2ETFX-X092-4508	12/16/03
ESTD	X092	NELSON, GE	23834	4508	265D-4	ETF	E-G203	2ETFX-X092-4508	12/16/03

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
ESTD	X092	YARBOROUGH, DW	21075	4508	238	ETF	E-G205	2ETFX-X092-4508	*12/16/03*
ESTD	X092	EISENBERG, JF	35795	4500N	H5	3156	103	3156-X092-4500N	12/18/03
ESTD	X092	LOVE, PM	9721	4500N	D2	3156	109	3156-X092-4500N	12/18/03
ESTD	X092	WAGNER, LW	14143	4500N	D30	3156	111	3156-X092-4500N	12/18/03
ESTD	X092	PALMER, JA	37798	4500N	D5	3156	112	3156-X092-4500N	12/18/03
ESTD	X092	BERRY, LG	25448	4500N	G28	3156	201	3156-X092-4500N	12/18/03
ESTD	X092	WALKER, BA	23335	4500N	162	3156	202	3156-X092-4500N	12/18/03
ESTD	X092	LAPSA, MV	35222	4500N	D34	3156	203	3156-X092-4500N	12/18/03
ESTD	X092	GRUBB, KR	28007	4500N	D36	3156	205	3156-X092-4500N	12/18/03
ESTD	X092	EADY, MT	23256	4500N	H5	3156	206	3156-X092-4500N	12/18/03
ESTD	X092	TAPLEY, JK	625271	4500N	H7	3156	210	3156-X092-4500N	12/18/03
CCOD	X071	Library Expansion	na	4500N		SALVAGE		SALVAGE-X071-4500N	01/05/04
NSTD	X094	FSAR/LER ROOM	na	9204-1	200	ETF	E-F205	2ETFX-X094-92041	01/12/04
M&C	X011	BOEMAN, RG	31640	9204-1	272	ETF	E-K209	2ETFX-X011-92041	01/13/04
M&C	X011	CAMPBELL, VW	28740	9204-1	291M	ETF	E-K208	2ETFX-X011-92041	01/13/04
M&C	X011	Eberle, C. C.	26651	9204-1	290M	ETF	E-K206	2ETFX-X011-92041	01/13/04
M&C	X011	Hoseck, T. M.	900566	9204-1		ETF	E-K207	2ETFX-X011-92041	01/13/04
M&C	X011	Howell, D.	33453	9204-1		ETF	E-K205	2ETFX-X011-92041	01/13/04
M&C	X011	KUNC, V	690996	9204-1	173-B	ETF	E-K203	2ETFX-X011-92041	01/13/04
M&C	X011	Leitten, C. F.	31534	9204-1	111B	ETF	E-K210	2ETFX-X011-92041	01/13/04
M&C	X011	LOMAX, RD	17428	9204-1	298M	ETF	E-K204	2ETFX-X011-92041	01/13/04
M&C	X011	YARBOROUGH, KD	11423	9204-1	296M	ETF	E-K202	2ETFX-X011-92041	01/13/04
M&C	X011	ERDMAN III, DL	37858	9204-1	173-A	ETF	E-A120	1ETFX-X011-92041	01/27/04
M&C	X011	FRAME, BJ	23499	9204-1	293M	ETF	E-A115	1ETFX-X011-92041	01/27/04
M&C	X011	HANSEN, JG	34567	9204-1	328	ETF	E-A117	1ETFX-X011-92041	01/27/04
M&C	X011	JANKE, CJ	29027	9204-1	295M	ETF	E-A111	1ETFX-X011-92041	01/27/04
M&C	X011	KLETT, LB	35621	9204-1	277	ETF	E-A109	1ETFX-X011-92041	01/27/04
M&C	X011	NAUS, DJ	14372	9204-1	202A	ETF	E-A118	1ETFX-X011-92041	01/27/04
M&C	X011	NORRIS JR, RE	25418	9204-1	287	ETF	E-A103	1ETFX-X011-92041	01/27/04
M&C	X011	PAULAUSKAS, FL	30758	9204-1	275	ETF	E-A107	1ETFX-X011-92041	01/27/04
M&C	X011	PHILLIPS, JR	35377	9204-1	285	ETF	E-A105	1ETFX-X011-92041	01/27/04
M&C	X011	STARBUCK, JM	30488	9204-1	273	ETF	E-A113	1ETFX-X011-92041	01/27/04
NSTD	X094	Tech. Standards File Room	na	1060COM	177	ETF	E-F205	2ETFX-X094-1060C	01/27/04
NSTD	X094	Wet Chem. Lab Personnel (3)		92043		5500		5500-X094-92043	02/03/04
TTED	X031	Ashok Choudhury	29403	111UNV	102B	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Susan M. Collins	37881	111UNV	107	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Linda I. Croff	13716	111UNV	103	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Frank V. Damiano	22791	111UNV	109B	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Larry M. Dickens	23996	111UNV	104B	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Louise B. Dunlap	26344	111UNV	100D	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Cheryl M. Edwards	32753	111UNV	109C	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	James E. Ferguson	690868	111UNV	118	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Alexander R. Fischer	721521	111UNV	100C	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Jane R. Lowe	33569	111UNV	100	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Russ Miller	31699	111UNV	102A	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Terry L. Payne	22186	111UNV	100B	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Robert D. Quinn	902038	111UNV	100A	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Mark E. Reeves	27465	111UNV	101	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Joyce W. Shepherd	32007	111UNV	109A	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Margaret Saunders Spurlin	24685	111UNV	104A	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Vicki J. Stone	33827	111UNV	113A	4500N		4500N-X031-111UNV	02/06/04

Table B.2 (continued)

				FROM location		TO location			
Resp.				**Revised**		**Revised**			
Div.	DIV. #	**NAME**	BADGE #	**Bldg. #**	**Room #**	**Bldg. #**	**Room #**	MOVE ID	**DATE**
TTED	X031	Grady S. Vanderhoofven	31567	111UNV	104A	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Carolyn S. Walls	744798	111UNV	118	4500N		4500N-X031-111UNV	02/06/04
TTED	X031	Kim Wilson	35514	111UNV	106	4500N		4500N-X031-111UNV	02/06/04
LEGAL	X085	Helen R. Atchley	2842	111UNV	128	4500N		4500N-X085-111UNV	02/06/04
LEGAL	X085	George L. Craig	30596	111UNV	128A	4500N		4500N-X085-111UNV	02/06/04
LEGAL	X085	Karen D. Drew	902986	111UNV	122	4500N		4500N-X085-111UNV	02/06/04
LEGAL	X085	Stephen D. Hamel	601364	111UNV	122	4500N		4500N-X085-111UNV	02/06/04
LEGAL	X085	Judson R. Hightower	902341	111UNV	128	4500N		4500N-X085-111UNV	02/06/04
LEGAL	X085	Joseph A. Marasco	16211	111UNV	124A	4500N		4500N-X085-111UNV	02/06/04
LEGAL	X085	James M. Spicer	22081	111UNV	130	4500N		4500N-X085-111UNV	02/06/04
LEGAL	X085	Shelley L. Stafford	29380	111UNV	122A	4500N		4500N-X085-111UNV	02/06/04
LEGAL	X085	Anne Elizabeth Warfield	38189	111UNV	126	4500N		4500N-X085-111UNV	02/06/04
LEGAL	X085	Kirk A. Wilson	34938	111UNV	114	4500N		4500N-X085-111UNV	02/06/04
QA	X024	Quality Testing Lab & Personnel (1)		4500N		ETF		2ETFX-X024-4500N	02/24/04
ESTD	X092	RICHARDS, RK	21087	3500	D016	ETF	E-I204	2ETFX-X092-3500	03/09/04
ESTD	X092	MAXEY, LC	24047	3500	D019	ETF	E-I206	2ETFX-X092-3500	03/09/04
ESTD	X092	EVANS, BM	23339	3500	20	ETF	E-I210	2ETFX-X092-3500	03/09/04
ESTD	X092	Optics Lab Personnel (3)		3500		ETF		2ETFX-X092-3500-2	03/09/04
ESTD	X092	Analog/Digital Systems Lab Personnel (17)		3606		3500		3500-X092-3606	04/27/04
FED	X019	Fusion Energy Library - Final Move		4500N		4500N		4500N-X019-4500N	05/03/04
CSM	X012	CSM Personnel		3CSBN		JICS		JICS-X012-3CSBN	05/04/04
FED	X019	DEMKO, JA	36441	9201-2	232	7606A		7606A-X019-92012	10/26/04
FED	X019	DEMPS, BE	33446	9201-2	0274A	7606A		7606A-X019-92012	10/26/04
FED	X019	DUCKWORTH, RC	746773	9201-2	0257B	7606A		7606A-X019-92012	10/26/04
FED	X019	ELLIS, AR	22787	5500		7606A		7606A-X019-92012	10/26/04
FED	X019	FADNEK, A	9438	9201-2	285	7606A		7606A-X019-92012	10/26/04
FED	X019	FISHER, PW	14535	9201-2	0261A	7606A		7606A-X019-92012	10/26/04
FED	X019	FORRESTER, SC	17911	9201-2	292	7606A		7606A-X019-92012	10/26/04
FED	X019	GOUGE, MJ	27479	9201-2	256	7606A		7606A-X019-92012	10/26/04
FED	X019	JAMES, DR	16091	4500S	H154	7606A		7606A-X019-92012	10/26/04
FED	X019	LUE, JW	15226	9201-2	234	7606A		7606A-X019-92012	10/26/04
FED	X019	MORI, Y ("guest")	900583	9201-2	203			7606A-X019-92012	10/26/04
FED	X019	RICHARDSON, JO	14579	9201-2	129	7606A		7606A-X019-92012	10/26/04
FED	X019	SAUERS, I	20628	4500S	H158	7606A		7606A-X019-92012	10/26/04
FED	X019	SCHWENTERLY, SW	12141	9201-2	233	7606A		7606A-X019-92012	10/26/04
FED	X019	SEARLE, DE	32057	9201-2	0130-B	7606A		7606A-X019-92012	10/26/04
FED	X019	SPARKS,DO	11355	9201-2	287	7606A		7606A-X019-92012	10/26/04
M&C	X011	Adcock, K.D.	12861	K-1037	333	ETF	E-A114	1ETFX-X011-1037	04/15/05
M&C	X011	Bischoff, B.L.	34579	K-1037	115	ETF	E-A108	1ETFX-X011-1037	04/15/05
M&C	X011	Miller, B.S.	13685	K-1037	111	ETF	E-A106	1ETFX-X011-1037	04/15/05
M&C	X011	Miller, C.J.	22680	K-1037	303	ETF	E-A116	1ETFX-X011-1037	04/15/05
M&C	X011	Powell, L.E.	13947	K-1037	332	ETF	E-A112	1ETFX-X011-1037	04/15/05
M&C	X011	Sutton, T.G.	10697	K-1037	116	ETF	E-A110	1ETFX-X011-1037	04/15/05

APPENDIX C

LABORATORY MOVE PACKAGES

Equipment to be moved to Thermal Hydraulics Lab E-D111:

TAG E-D111-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
MERCURY LOOP					
M1	Enclosure (walls, ceiling, windows, double personnel doors and roll up door)	15' x 16'	Y-12 9204-1, 2nd Floor High Bay	SK-E-D111-3	SK-E-D111-12
M2	Mercury Loop	150 sq. ft. with 45 liters of Hg	Y-12 9204-1, 2nd Floor High Bay	SK-E-D111-3	SK-E-D111-11 & 12
M3	Variac, GE (Y256009)	54" x 36" x 66"	Y-12 9204-1, 2nd Floor High Bay	SK-E-D111-2	SK-E-D111-11
M4	DC Power Supply and 480V Receptacle	36" x 48" x 66" mounted on wheels	Y-12 9204-1, 2nd Floor High Bay	SK-E-D111-2	SK-E-D111-11
M5	Control Cabinet (Y272866)	28" x 33" x 85"	Y-12 9204-1, 2nd Floor High Bay	SK-E-D111-2	SK-E-D111-11
M6	Cooling Water Flow Switch, Controls & Control Valve	28" x 33" x 85"	Y-12 9204-1, 2nd Floor High Bay	SK-E-D111-3	SK-E-D111-12
M7	Supporting Equipment	Various	Y-12 9204-1, 2nd Floor High Bay	NA	NA
THERMAL HYDRAULICS TEST LOOP					
TH1	Enclosure	180" x 240" x 120"	Y-12 9204-1, 1st Floor	SK-E-D111-5	SK-E-D111-11 & 12
TH2	Test Loop	180" x 240" x 120"	Y-12 9204-1, 1st Floor	SK-E-D111-5	SK-E-D111-11 & 12
~~TH3~~	~~DC Power Supply (#4) Euraton~~	~~84" x 66" x 96"~~	~~Y-12 9204-1, 1st Floor~~	~~SK-E-D111-4~~	~~SK-E-D111-11 & 12~~
~~TH4~~	~~DC Power Supply (#3) Westinghouse~~	~~84" x 66" x 96"~~	~~Y-12 9204-1, 1st Floor~~	~~SK-E-D111-4~~	~~SK-E-D111-11 & 12~~
TH5	Electrical Bus and Enclosure	Approx 60' length total	Y-12 9204-1, 1st Floor, Supported from ceiling	SK-E-D111-5	SK-E-D111-11 & 12
TH6	Instrument Cabinet	24" x 22" x 86"	Y-12 9204-1, 1st Floor Control Room	SK-E-D111-7	SK-E-D111-11 & 12
~~TH7~~	~~DC Power Supply Instrument Cabinet~~	~~22" x 30" x 70"~~	~~Y-12 9204-1, 1st Floor Control Room~~	~~SK-E-D111-7~~	~~SK-E-D111-11 & 12~~
TH8	Instrument Rack	5' wide	Y-12 9204-1, 1st Floor	SK-E-D111-5	SK-E-D111-11 & 12
TH9	Inverter for Monyo Pump Lancer	24" x 12" x 30"	Y-12 9204-1, 1st Floor	SK-E-D111-6	SK-E-D111-11 & 12
TH10	Monyo Pump and Motor Robbins	36" x 168" x 120"	Y-12 9204-1, 1st Floor	SK-E-D111-6	SK-E-D111-11 & 12
TH11	Auxiliary Stand	6' x 2' x 8'	Y-12 9204-1, 1st Floor	SK-E-D111-5	SK-E-D111-11 & 12
TH12	Supporting Equipment	Various	Y-12 9204-1, 1st Floor	NA	NA
FLOW BLOCKAGE TEST LOOP					
FB1	Test Loop	6' x 5' x 5'	Y-12 9204-1, 1st Floor	SK-E-D111-8	Do not reconnect
FB2	DC Power Supply	30" x 30" x 48" mounted on wheels	Y-12 9204-1, 1st Floor	SK-E-D111-8	Do not reconnect
FB3	Control Panel	28" x 33" x 85"	Y-12 9204-1, 1st Floor	SK-E-D111-8	Do not reconnect
FB4	Pump/Motor US Electric/Worthington	24" x 72" x 18"	Y-12 9204-1, Basement	SK-E-D111-8	Do not reconnect
~~FB5~~	~~600 Gal Tank (Stainless Steel)~~	~~5" dia vertical mount, 5' tall~~	~~Y-12 9204-1, Basement~~	~~SK-E-D111-8~~	~~Do not reconnect~~
FB6	Supporting Equipment	Various	Y-12 9204-1, 1st Floor	NA	NA
~~**CRYOGENIC TEST LOOP**~~					
~~CY1~~	~~Test Loop~~	~~6' x 6' x 15'~~	~~Y-12 9204-1, 2nd Floor High Bay~~	~~SK-E-D111-9~~	~~SK-E-D111-11 & 12~~
~~CY2~~	~~Supporting Equipment~~	~~Various~~		~~NA~~	~~NA~~
~~**CORROSION TEST LOOP**~~ ~~(Current Plans are that the Corrosion Test Loop Equipment will not be moved)~~					
~~CO1~~	~~Test Loop~~	~~6' x 6' x 15'~~	~~Y-12 9204-1, 2nd Floor High Bay~~	~~SK-E-D111-10~~	~~NA~~
~~CO2~~	~~Instrument Cabinet~~	~~30" x 30" x 84"~~	~~Y-12 9204-1, 2nd Floor High Bay~~	~~SK-E-D111-10~~	~~NA~~
~~CO3~~	~~DC Power Supply~~	~~30" x 30" x 48" mounted on wheels~~	~~Y-12 9204-1, 2nd Floor High Bay~~	~~SK-E-D111-10~~	~~NA~~
~~CO4~~	~~Supporting Equipment~~	~~Various~~	~~Y-12 9204-1, 2nd Floor High Bay~~	~~NA~~	~~NA~~
GENERAL					
G1	Laser Doppler Velocimeter is sensitive equipment & will be moved & installed by lab personnel			NA	NA
G2	Storage Cabinets (Total of 6)	36" x 18" x 78"	Y-12 9204-1	NA	NA
G3	Boxed Equipment	50 Cu. Ft.	Y-12 9204-1	NA	NA
NEW EQUIPMENT					
N1	Fume Hood for Hg Vapors	3' x 6' w/cup sink (bench)		NA	NA
N2	Various Heat Exchangers for Loops (future)			NA	NA
N3	Additional Pumps/Motors (future)			NA	NA

ENGINEERING TECHNOLOGY FACILITY
THERMAL HYDRAULICS LABORATORY E-D111
MOVE PACKAGE

THERMAL HYDRAULICS LAB E-D111 DRAWING INDEX

Drawing No.	Title
SK-E-D111-1	Drawing Index and Equipment List
SK-E-D111-2	Mercury Loop Disassembly Drawing No. 1
SK-E-D111-3	Mercury Loop Disassembly Drawing No. 2
SK-E-D111-4	Thermal Hydraulics Test Loop Disassembly Drawing No. 1
SK-E-D111-5	Thermal Hydraulics Test Loop Disassembly Drawing No. 2
SK-E-D111-6	Thermal Hydraulics Test Loop Disassembly Drawing No. 3
SK-E-D111-7	Thermal Hydraulics Test Loop Disassembly Drawing No. 4
SK-E-D111-8	Flow Blockage Test Loop Disassembly Drawing
SK-E-D111-9	Cryogenic Facility Disassembly Drawing
SK-E-D111-10	Corrosion Test Loop Disassembly Drawing
SK-E-D111-11	Thermal Hydraulics Lab E-D111 Electrical Installation Drawing
SK-E-D111-12	Thermal Hydraulics Lab E-D111 Mechanical Installation Drawing

NOTES:

1. Dave Felde (241-2653) will field direct the interconnection of equipment being moved to the Thermal Hydraulics Laboratory E-D111.
2. Use E-D111 Suffix for all equipment tags.
3. All electrical equipment shall be protected from rain while outdoors.
4. NSTD will package all loose equipment and will label all equipment and boxes to be moved.
5. NSTD will identify and label all points required to be disconnected or disassembled. Both sides of the disconnect will be tagged and NSTD will provide sketches, drawings, etc. to facilitate reconnection and reassembly.
6. NSTD will provide all safety support (IH, H&S, etc.) required for the move. NSTD will provide HP surveys or use process knowledge to obtain any required green tags for equipment to be moved to ETF.
7. Equipment lined through or X'd out has been removed from the scope of the move.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1062

SHEET TITLE
THERMAL HYDRAULICS LAB E-D111
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111-1**

1

M4-DC POWER SUPPLY AND 480V RECEPTACLE

1. DC POWER SUPPLY IS MOUNTED ON WHEELS. REMOVE PLUG FROM 480V RECEPTACLE.
2. REMOVE 480V RECEPTACLE AND WIRING TO DISCONNECT SWITCH.

2

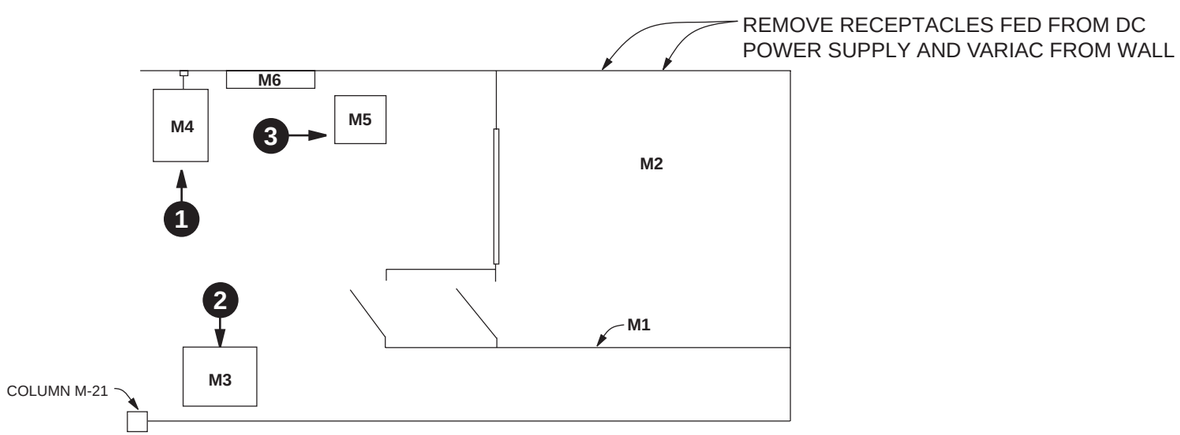
M3-VARIAC

1. REMOVE 480V SUPPLY FROM DISCONNECT SWITCH.
2. DISCONNECT ALL OTHER WIRING.

3

M5-CONTROL CABINET

1. VERIFY EXISTING CABLE TAGGING FOR IDENTIFICATION OF TERMINATIONS .
2. LIFT WIRING, REMOVE FROM CONDUIT AND COIL AT Hg LOOP.
3. DISCONNECT AND PACKAGE DEDICATED PC.



EXISTING MERCURY LOOP
Y-12 BUILDING 9204-1 SECOND FLOOR

NOTES:

1. USE E-D111 SUFFIX FOR ALL EQUIPMENT TAGS

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1062

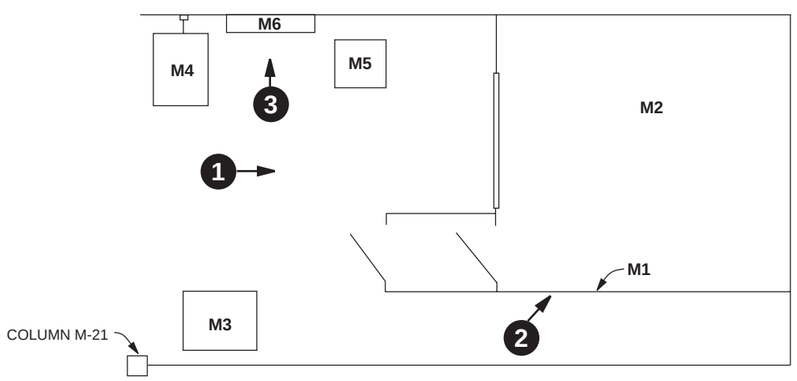
SHEET TITLE
THERMAL HYDRAULICS LAB E-D111
MERCURY LOOP
DISASSEMBLY DRAWING NO. 1

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111-2**

1

M1-ENCLOSURE

1. CHECK ENCLOSURE FOR CONTAMINATION.
2. DECONTAMINATE OR BAG AS NECESSARY.
3. DISCONNECT 120V ELECTRICAL POWER WIRING IN PANELS.
4. DISASSEMBLE ENCLOSURE.
5. COST OF MOVING ENCLOSURE VERSUS PURCHASING NEW ENCLOSURE IS BEING EXAMINED.

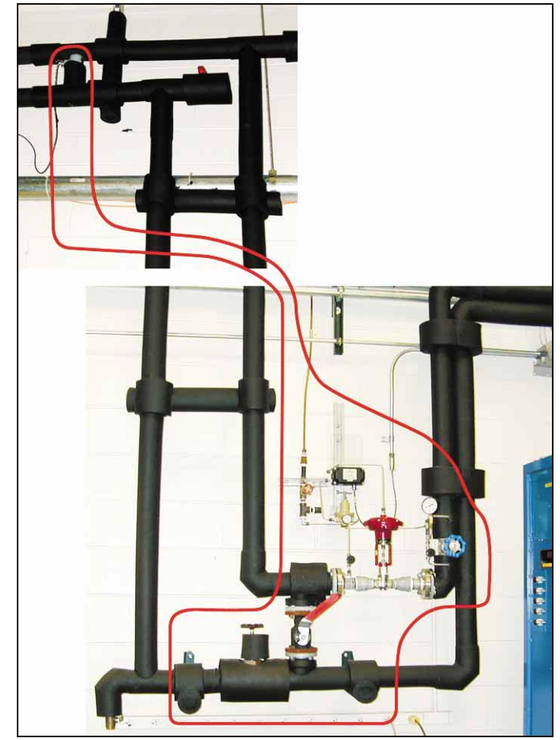


EXISTING MERCURY LOOP
Y-12 BUILDING 9204-1 SECOND FLOOR

2

M2-MERCURY LOOP

1. CHECK FOR CONTAMINATION.
2. DECONTAMINATE OR BAG AS NECESSARY.
3. REMOVE MERCURY AND CONTAIN FOR RELOCATION TO E-D111.
4. DISCONNECT COOLING WATER PIPING.
5. DISCONNECT INSTRUMENT AIR.
6. DISCONNECT ELECTRICAL WIRING. COIL WIRING TO CONTROL CABINET ON TOP OF MERCURY LOOP ASSEMBLY.
7. REMOVE AND TAG ITEMS OUTSIDE OF UNISTRUT STRUCTURE.
8. UNISTRUT STRUCTURE TO BE MOVED INTACT WITH ITEMS INSIDE OF STRUCTURE.



3

M6-COOLING WATER CONTROLS

1. REMOVE FLOW SWITCH, CONTROLS AND CONTROL VALVE.

NOTES:

1. USE E-D111 SUFFIX FOR ALL EQUIPMENT TAGS

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1062

SHEET TITLE
THERMAL HYDRAULICS LAB E-D111
MERCURY LOOP
DISASSEMBLY DRAWING NO. 2

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111-3**

1

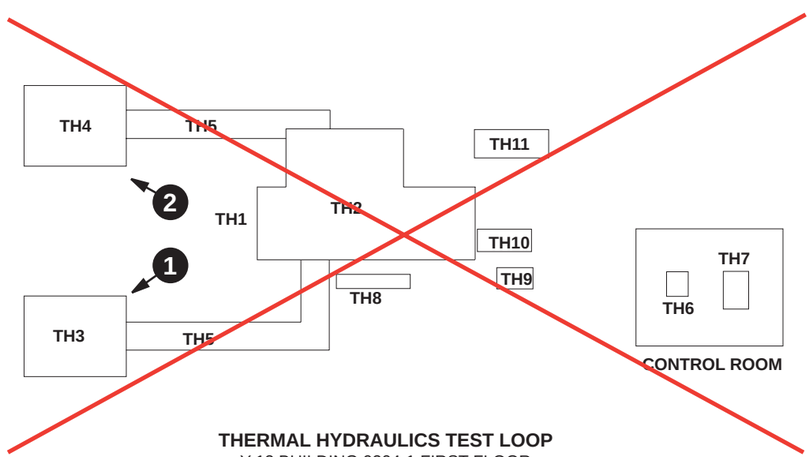
TH3-DC POWER SUPPLY 2 (EURATON)

1. REMOVE 480V FROM DISCONNECT SWITCH.
2. REMOVE COOLING WATER SUPPLY AND RETURN.
3. UNIT WEIGHS APPROXIMATELY 10,000 POUNDS.

2

TH4-DC POWER SUPPLY 1 (WESTINGHOUSE)

1. REMOVE 480V FROM DISCONNECT SWITCH.
2. REMOVE COOLING WATER SUPPLY AND RETURN.
3. UNIT WEIGHS APPROXIMATELY 10,000 POUNDS.



THERMAL HYDRAULICS TEST LOOP
Y-12 BUILDING 9204-1 FIRST FLOOR

NOTES:

1. USE E-D111 SUFFIX FOR ALL EQUIPMENT TAGS

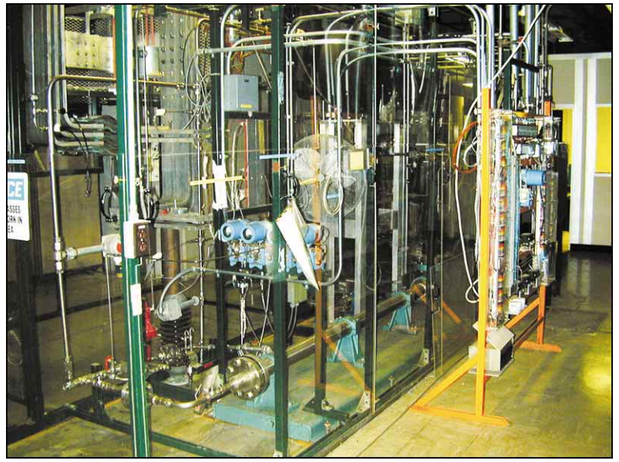
NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1062

SHEET TITLE
THERMAL HYDRAULICS LAB E-D111
THERMAL HYDRAULIC TEST LOOP (THTL)
DISASSEMBLY DRAWING

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111-4**



1

TH2-TEST LOOP

1. DISCONNECT COOLING WATER
2. DISCONNECT INSTURMENT AIR
3. DISCONNECT ELECTRICAL WIRING

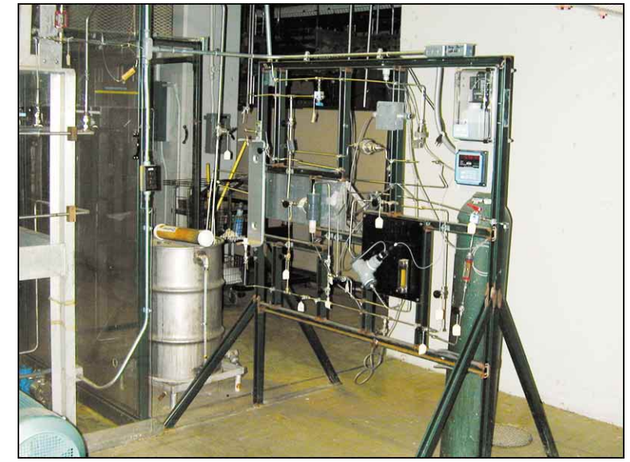
TH1-ENCLOSURE

1. DISASSEMBLE IN SECTIONS.

2

TH8-THTL INSTRUMENT RACK

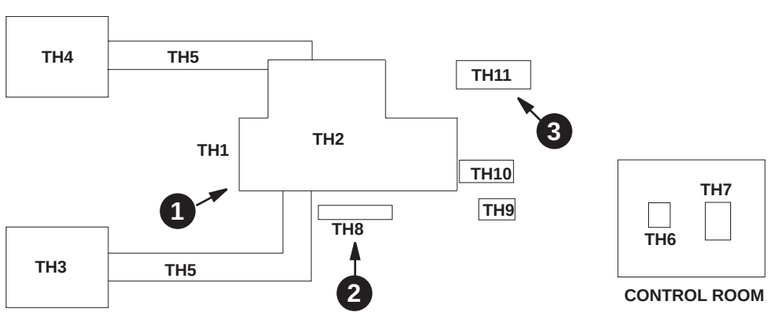
1. DISCONNECT INSTRUMENT AIR.
2. REMOVE ELECTRICAL WIRING.
3. DISCONNECT EXTERNAL TUBING



3

TH11-THTL AUXILIARY STAND

1. DISCONNECT INSTRUMENT AIR.
2. DISCONNECT EXTERNAL TUBING
3. DISCONNECT DEMINERALIZED WATER TANK.
4. DISCONNECT OXYGEN TANK.



THERMAL HYDRAULICS TEST LOOP
Y-12 BUILDING 9204-1 FIRST FLOOR

NOTES:

1. USE E-D111 SUFFIX FOR ALL EQUIPMENT TAGS

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1062

SHEET TITLE

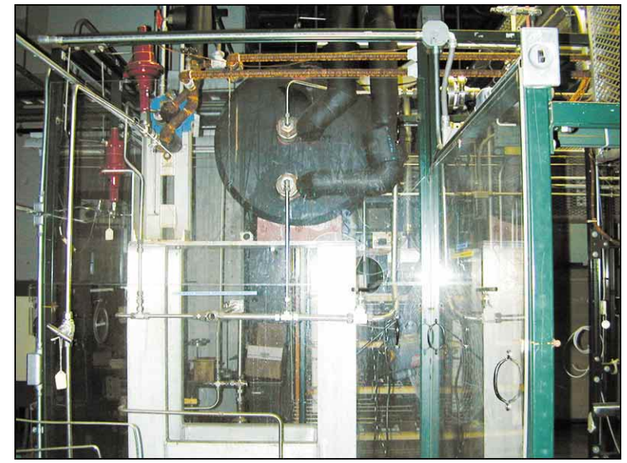
THERMAL HYDRAULICS LAB E-D111
THERMAL HYDRAULIC TEST LOOP (THTL)
DISASSEMBLY DRAWING

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111-5**

1

COOLING WATER CONTROL VALVE FOR THTL

1. REMOVE VALVE AND RELOCATE WITH THTL.
2. BLANK OFF COOLING WATER.



2

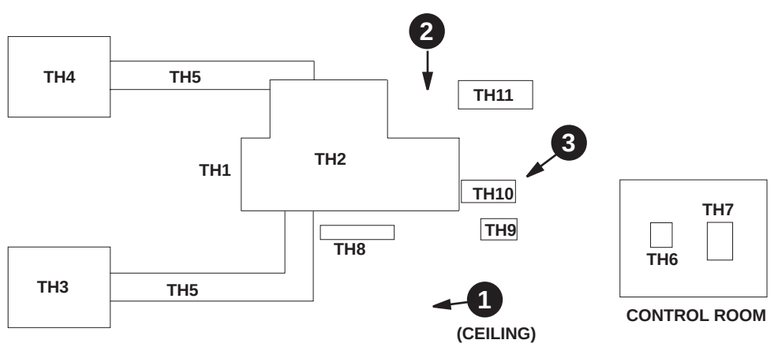
THTL HEAT EXCHANGER

1. DISCONNECT PIPING

3

TH9-INVERTER FOR MOYNO PUMP
TH10-MOYNO PUMP AND MOTOR

1. REMOVE 480V TO INVERTER FROM DISCONNECT SWITCH.
2. REMOVE ELECTRICAL WIRING FROM INVERTER TO PUMP
3. DISCONNECT PIPING FROM PUMP.



THERMAL HYDRAULICS TEST LOOP
Y-12 BUILDING 9204-1 FIRST FLOOR

NOTES:

1. USE E-D111 SUFFIX FOR ALL EQUIPMENT TAGS

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

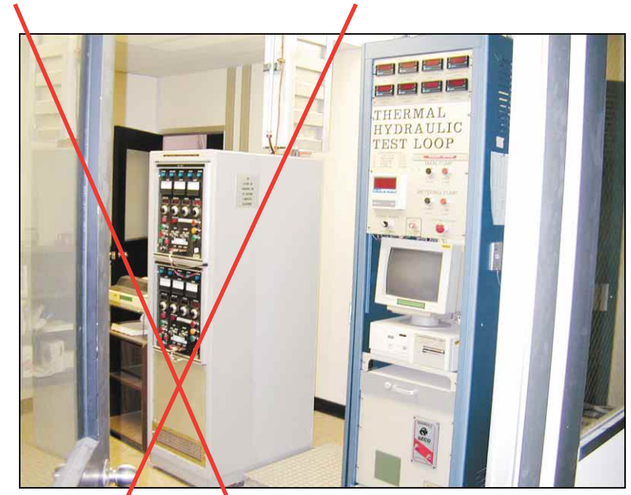
OLD ROOM NUMBER: E1062

SHEET TITLE
THERMAL HYDRAULICS LAB E-D111
THERMAL HYDRAULIC TEST LOOP (THTL)
DISASSEMBLY DRAWING

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111-6**

1

2



3

TH5-ALUMINUM BUS

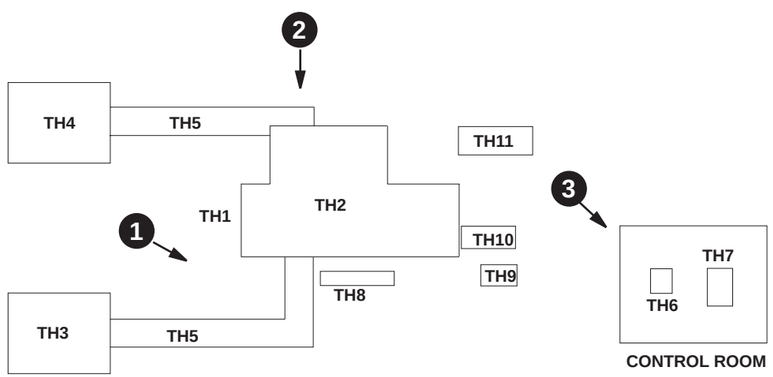
1. DISASSEMBLE BUS AND PROTECTIVE CAGE IN SECTIONS SUITABLE FOR MOVING.
2. BUS WILL BE MOVED TO ETF BUT NOT REASSEMBLED.

TH7-DC POWER SUPPLY INSTRUMENT CABINET

1. REMOVE EXTERNAL WIRING.

TH6-THTL INSTRUMENT CABINET

1. REMOVE EXTERNAL WIRING.
2. DISCONNECT AND PACKAGE DEDICATED PC.



THERMAL HYDRAULICS TEST LOOP
Y-12 BUILDING 9204-1 FIRST FLOOR

NOTES:

1. USE E-D111 SUFFIX FOR ALL EQUIPMENT TAGS

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1062

SHEET TITLE
THERMAL HYDRAULICS LAB E-D111
THERMAL HYDRAULIC TEST LOOP (THTL)
DISASSEMBLY DRAWING

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111-7**

1

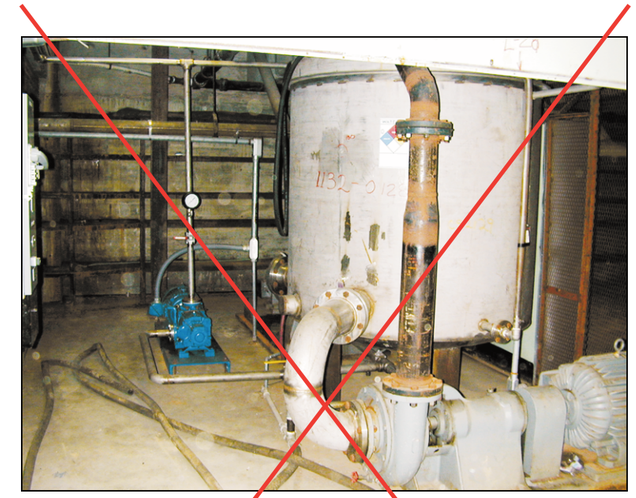
FB1-TEST LOOP
FB2-DC POWER SUPPLY
FB3-CONTROL PANEL

1. DISCONNECT COOLING WATER FROM HEAT EXCHANGER.
2. DISCONNECT ELECTRICAL POWER.

2

FB4-PUMP/MOTOR LOCATED IN BASEMENT OF Y-12 BLDG. 9204-1

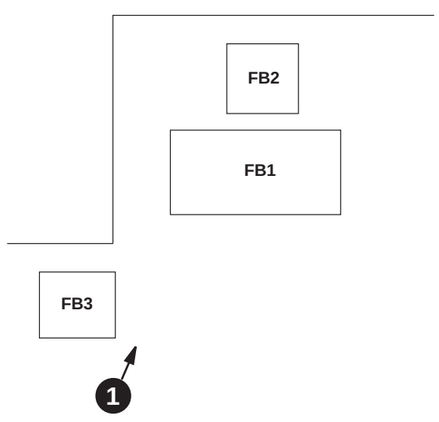
1. DISCONNECT PIPING FROM PUMP.
2. DISCONNECT ELECTRICAL POWER FROM PUMP.



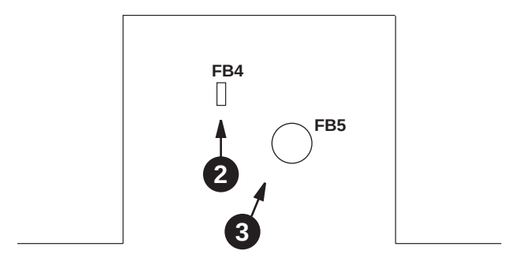
3

FB5-TANK LOCATED IN BASEMENT OF Y-12 BLDG. 9204-1

1. DISCONNECT PIPING FROM TANK.
2. REMOVE ITEMS AS REQUIRED TO MOVE TANK OUT OF BUILDING.



FLOW BLOCKAGE TEST LOOP
Y-12 BUILDING 9204-1 FIRST FLOOR



FLOW BLOCKAGE TEST LOOP
Y-12 BUILDING 9204-1 BASEMENT

NOTES:

1. USE E-D111 SUFFIX FOR ALL EQUIPMENT TAGS

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1062

SHEET TITLE
THERMAL HYDRAULICS LAB E-D111
FLOW BLOCKAGE TEST LOOP
DISASSEMBLY DRAWING

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111-8**

CY1-CRYOGENIC FACILITY
LOCATED IN Y-12 BLDG. 9204-1
2ND FLOOR, HIGH BAY

1. DISCONNECT 480V SUPPLY AT DISCONNECT SWITCH
2. DISCONNECT TANKS FROM PIPING.
3. DISCONNECT TANKS FROM SUPPORTING STRUCTURE.
4. REMOVE TANKS.
5. DISCONNECT APPARATUS ON WEST SIDE OF STRUCTURE.
6. DISCONNECT INSTRUMENT AIR.
7. REMOVE HANDRAILS

NOTES:

1. USE E-D111 SUFFIX FOR ALL EQUIPMENT TAGS

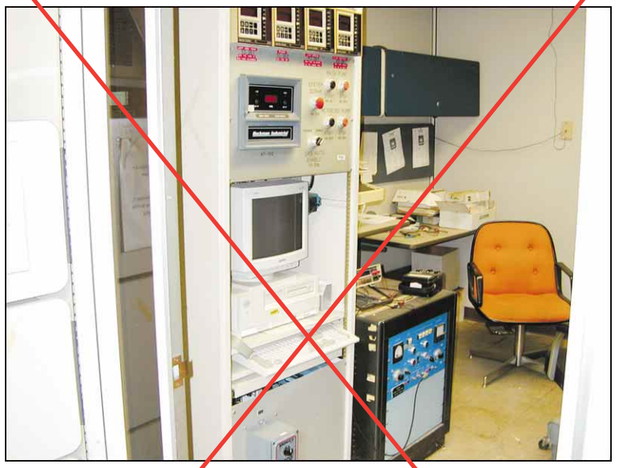
NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1062

SHEET TITLE
THERMAL HYDRAULICS LAB E-D111
CRYOGENIC FACILITY
DISASSEMBLY DRAWING

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111-9**



1

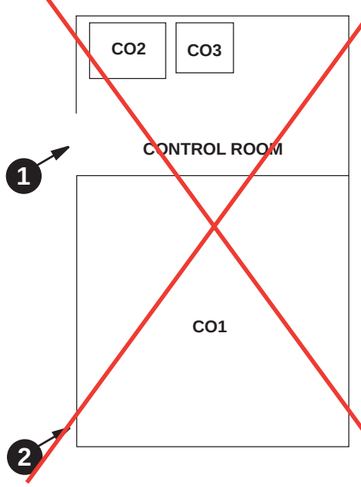
CO2-INSTRUMENT CABINET
CO3-DC POWER SUPPLY

1. SEE NOTE 1.

2

CO1-TEST LOOP

1. SEE NOTE 1.



CORROSION TEST LOOP
Y-12 BUILDING 9204-1 SECOND FLOOR HIGH BAY

NOTES:

1. CURRENT PLANS ARE THAT THE CORROSION TEST LOOP EQUIPMENT WILL NOT BE MOVED TO ETF
2. USE E-D111 SUFFIX FOR ALL EQUIPMENT TAGS

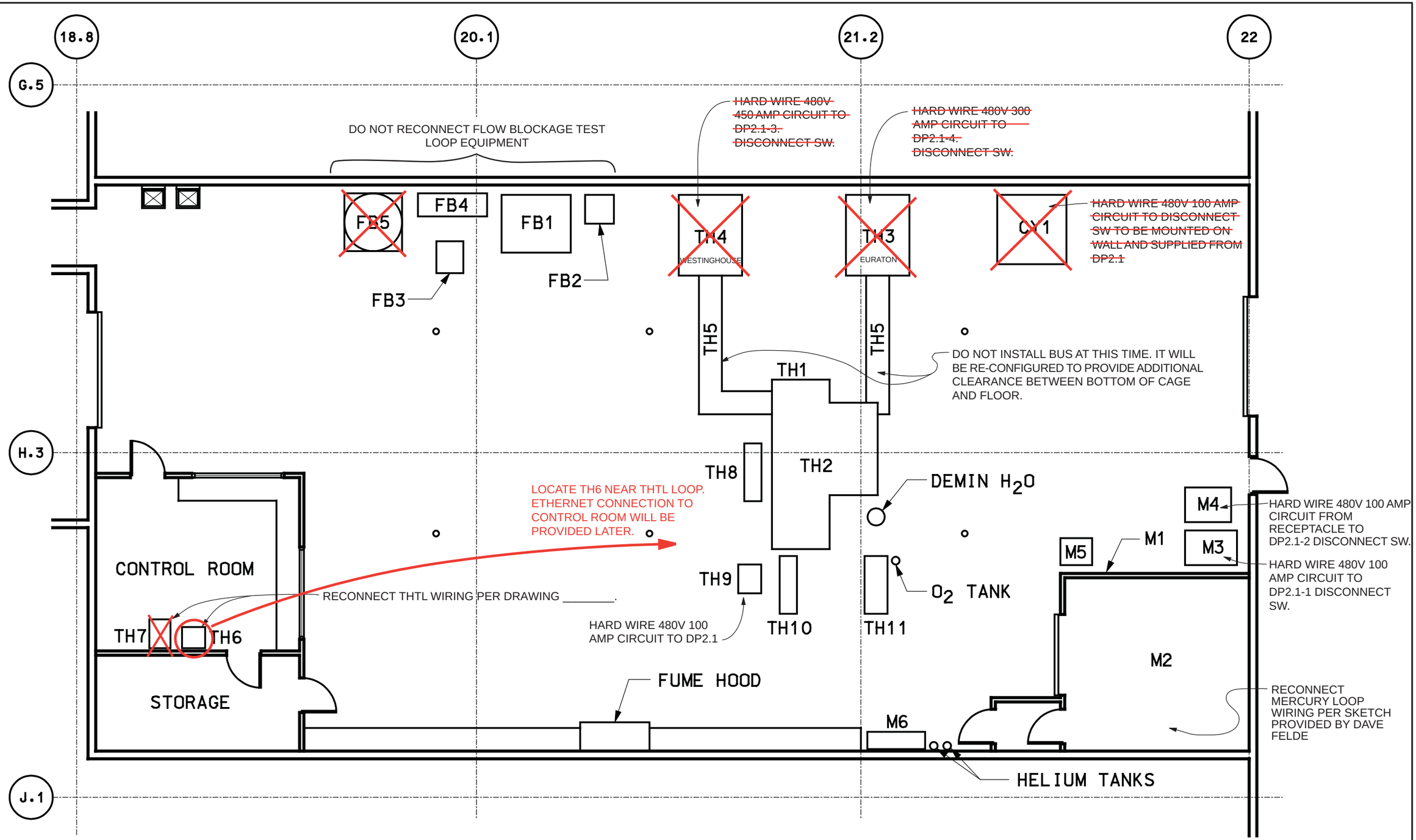
NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1062

SHEET TITLE
THERMAL HYDRAULICS LAB E-D111
CORROSION TEST LOOP
DISASSEMBLY DRAWING

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111-10**



NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1062

SHEET TITLE

THERMAL HYDRAULICS LAB E-D111
ELECTRICAL
INSTALLATION DRAWING

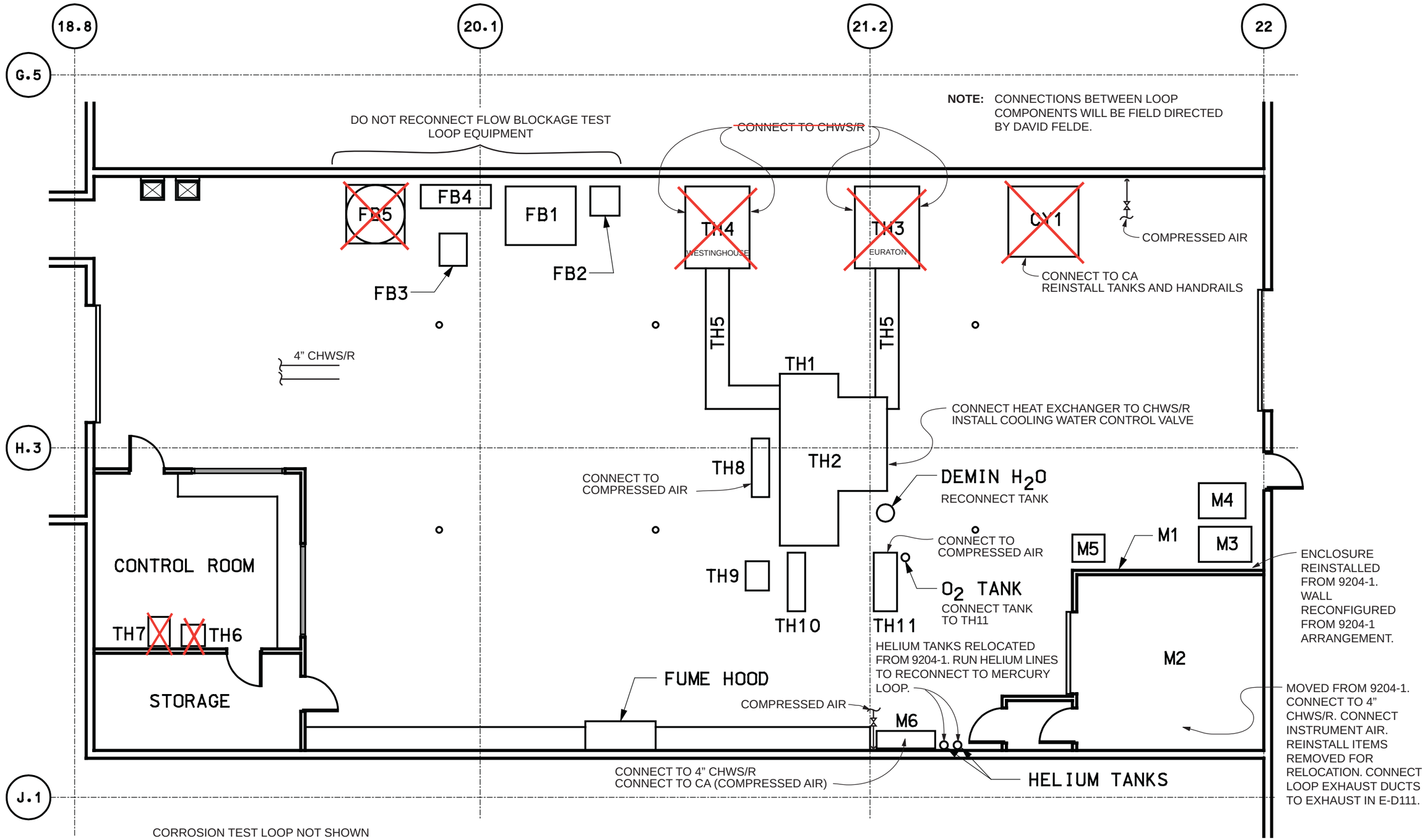
JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE 1/8" = 1'-0"

DWG NO **SK-E-D111-11**



NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: E1062

SHEET TITLE

THERMAL HYDRAULICS LAB E-D111
MECHANICAL
INSTALLATION DRAWING

JOB NO PDC 0214	DATE 06/16/03
	REV NO 2
SCALE 1/8" = 1'-0"	DWG NO **SK-E-D111-12**

Equipment to be moved to Flow Test Loop Lab E-D111 FTL:

TAG E-D111 FTL-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
~~FT1~~	~~Pump/Motor - 125 hp~~	~~3' x 6' x 3'~~	~~Y-12 9201-2, 1st Floor~~	~~SK E-D111 FTL-2~~	~~SK E-D111 FTL-5~~
~~FT2~~	~~Motor Starter - Westinghouse (CJ2W2)~~	~~3' x 4' x 7' (floor mounted)~~	~~Y-12 9201-2, 1st Floor~~	~~SK E-D111 FTL-2~~	~~SK E-D111 FTL-5~~
FT3	Pump/Motor - 15 hp	2' x 4' x 2.5'	Y-12 9201-2, 1st Floor	SK E-D111 FTL-4	SK E-D111 FTL-5
FT4	Variable Speed Drive - Robicon	3' x 1' x 2' (Wall Mounted)	Y-12 9201-2, 1st Floor	SK E-D111 FTL-2	SK E-D111 FTL-5
FT5	Motor Starter - Cutler Hammer	21" x 12" x 32" (wall mounted)	Y-12 9201-2, 1st Floor	SK E-D111 FTL-2	SK E-D111 FTL-5
FT6	Pump/Motor - 1.5 hp	2' x 4' x 2' (portable on cart)	Y-12 9201-2, 1st Floor	NA	SK E-D111 FTL-5
~~FT7~~	~~Data Acquisition Panel~~	~~4' x 2' x 6' (floor mounted rack)~~	~~Y-12 9201-2, 1st Floor~~	~~SK E-D111 FTL-2~~	~~SK E-D111 FTL-5~~
~~FT8~~	~~500 Gallon Tank - polyethylene~~	~~Horizontal 8' x 5' x 5'~~	~~Y-12 9201-2, 1st Floor~~	~~SK E-D111 FTL~~	~~SK E-D111 FTL-5~~
~~FT9~~	~~500 Gallon Tank - polyethylene~~	~~Horizontal 8' x 5' x 5'~~	~~Y-12 9201-2, 1st Floor~~	~~SK E-D111 FTL-3~~	~~SK E-D111 FTL-5~~
FT10	300 Gallon Tank - polyethylene	Vertical 3' x 3' x 8'	Y-12 9201-2, 1st Floor	SK E-D111 FTL-4	SK E-D111 FTL-5
FT11	Piping Spool Pieces and Fittings (PVC)	Maximum length - 14'	Y-12 9201-2, 1st Floor	SK E-D111 FTL-3	SK E-D111 FTL-5

FLOW TEST LOOP LAB E-D111 FTL DRAWING INDEX

Drawing No.	Title
SK E-D111 FTL-1	Drawing Index and Equipment List
SK E-D111 FTL-2	Flow Test Loop Lab Disassembly Drawing No. 1
SK E-D111 FTL-3	Flow Test Loop Lab Disassembly Drawing No. 2
SK E-D111 FTL-4	Flow Test Loop Lab Disassembly Drawing No. 3
SK E-D111 FTL-5	Flow Test Loop Lab Installation Drawing

NOTES:

1. David Felde (241-2653) will field direct the connection of equipment being moved to the Flow Test Loop Lab in E-D111.
2. Use E-D111 FTL Suffix for all equipment tags.
3. All electrical equipment shall be protected from rain while outdoors.
4. NSTD will package all loose equipment and will label all equipment and boxes to be moved.
5. NSTD will identify and label all points required to be disconnected or disassembled. Both sides of the disconnect will be tagged and NSTD will provide sketches, drawings, etc. to facilitate reconnection and reassembly.
6. NSTD will provide all safety support (IH, H&S, etc.) required for the move. NSTD will provide HP surveys or use process knowledge to obtain any required green tags for equipment to be moved to ETF.
7. Equipment lined through or X'd out has been removed from the scope of the move.

ENGINEERING TECHNOLOGY FACILITY
FLOW TEST LOOP LABORATORY E-D111 FTL
MOVE PACKAGE

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1082

SHEET TITLE
FLOW TEST LOOP LAB E-D111 FTL
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111 FTL-1**

1

~~FT-2 (WESTINGHOUSE)~~ FT5 (CUTLER HAMMER)

MOTOR STARTERS

1. REMOVE 480V SUPPLY FROM ~~SWITCHGEAR.~~ STARTER
2. DISCONNECT ALL OTHER WIRING.

PICTURE NOT AVAILABLE

2

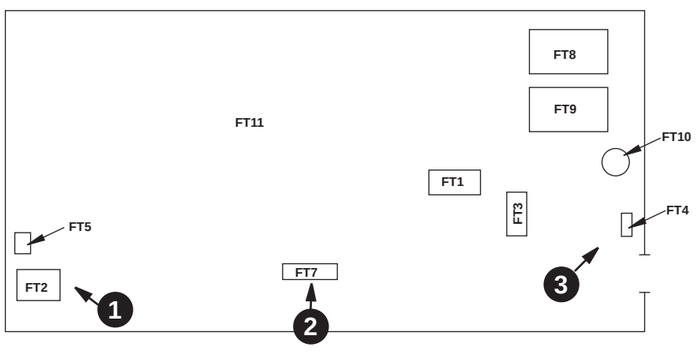
FT7 DATA ACQUISITION PANEL

1. DISCONNECT ALL WIRING.

3

FT4 VARIABLE SPEED DRIVE

1. DISCONNECT ALL WIRING.



FLOW TEST LOOP LABORATORY
Y-12 BUILDING 9201-2, 1ST FLOOR

NOTES:

1. USE E-D111 FTL SUFFIX FOR ALL EQUIPMENT TAGS

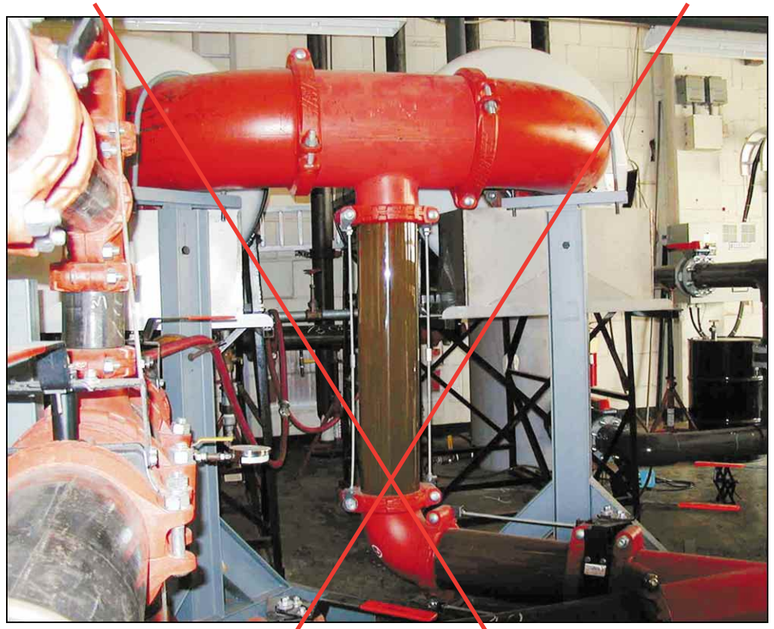
NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1082

SHEET TITLE
FLOW TEST LOOP LAB E-D111 FTL DISASSEMBLY DRAWING NO. 1

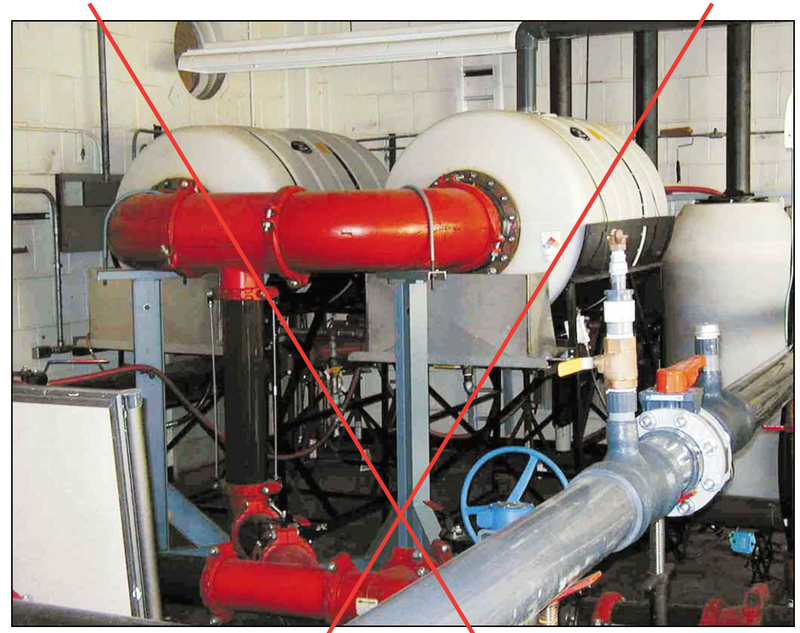
JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111 FTL-2**



1

FT-8 & FT-9 DISCHARGE PIPING

1. DISASSEMBLE ALL PIPING AT FLANGES.
2. RETAIN GASKETS, BOLTS, AND FLANGES FOR REASSEMBLY IN ROOM E-D111 FTL.
3. SEE SKETCH SK-E-D111 FTL-5 FOR REASSEMBLY.



2

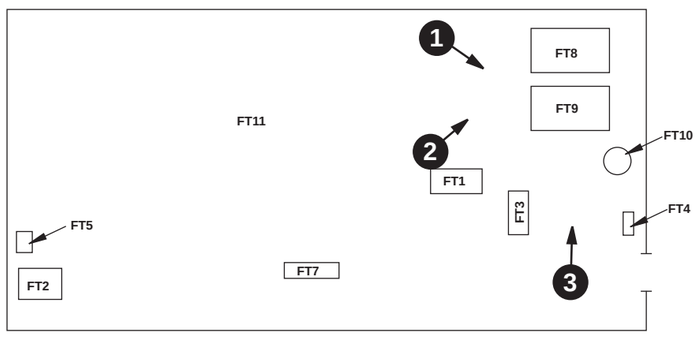
FT-8 & FT-9 500 GALLON POLY TANKS

1. DISCONNECT TANKS AT FLANGES - RETAIN BOLTS AND FLANGES FOR REASSEMBLY IN ROOM E-D111 FTL.
2. REMOVE TANKS AND SUPPORT STRUCTURE FOR RELOCATION TO ROOM E-D111 FTL.
3. WATER HAS BEEN REMOVED FROM ALL PIPING AND TANKS.

3

FT-11 PIPING SPOOL PIECES AND FITTINGS (PVC ONLY)

1. PACKAGE ENTIRE INVENTORY OF PVC PIPE SPOOL PIECES AND FITTINGS ON PALLETS OR CRATES FOR RELOCATION TO ROOM E-D111 FTL.
2. DISCONNECT ~~125 HP PUMP,~~ 15 HP PUMP AT FLANGES AND RELOCATE TO ROOM E-D111 FTL FOR REASSEMBLY.



FLOW TEST LOOP LABORATORY
Y-12 BUILDING 9201-2, 1ST FLOOR

NOTES:

1. USE E-D111 FTL SUFFIX FOR ALL EQUIPMENT TAGS

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1082

SHEET TITLE
FLOW TEST LOOP LAB E-D111 FTL DISASSEMBLY DRAWING NO. 2

JOB NO: PDC 0214
DATE: 06/16/03
REV NO: 2
SCALE: NONE
DWG NO: **SK-E-D111 FTL-3**

1

FT-3 15 HP PUMP AND MOTOR

1. DISONNECT 480V SUPPLY.

PICTURE NOT AVAILABLE

2

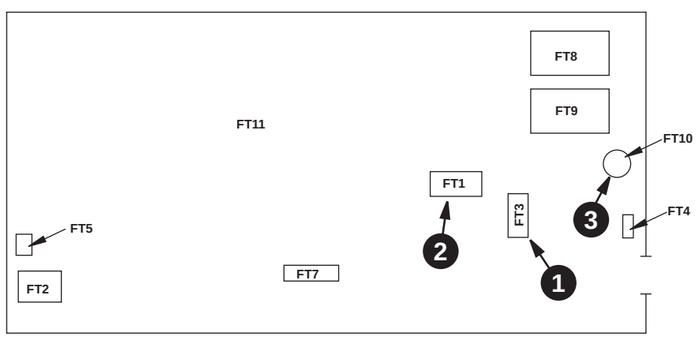
FT-4 125 HP PUMP AND MOTOR

1. DISCONNECT 480V SUPPLY

3

FT-10 300 GALLON TANK

1. DISCONNECT TANK AT FLANGES



FLOW TEST LOOP LABORATORY
Y-12 BUILDING 9201-2, 1ST FLOOR

NOTES:

1. USE E-D111 FTL SUFFIX FOR ALL EQUIPMENT TAGS

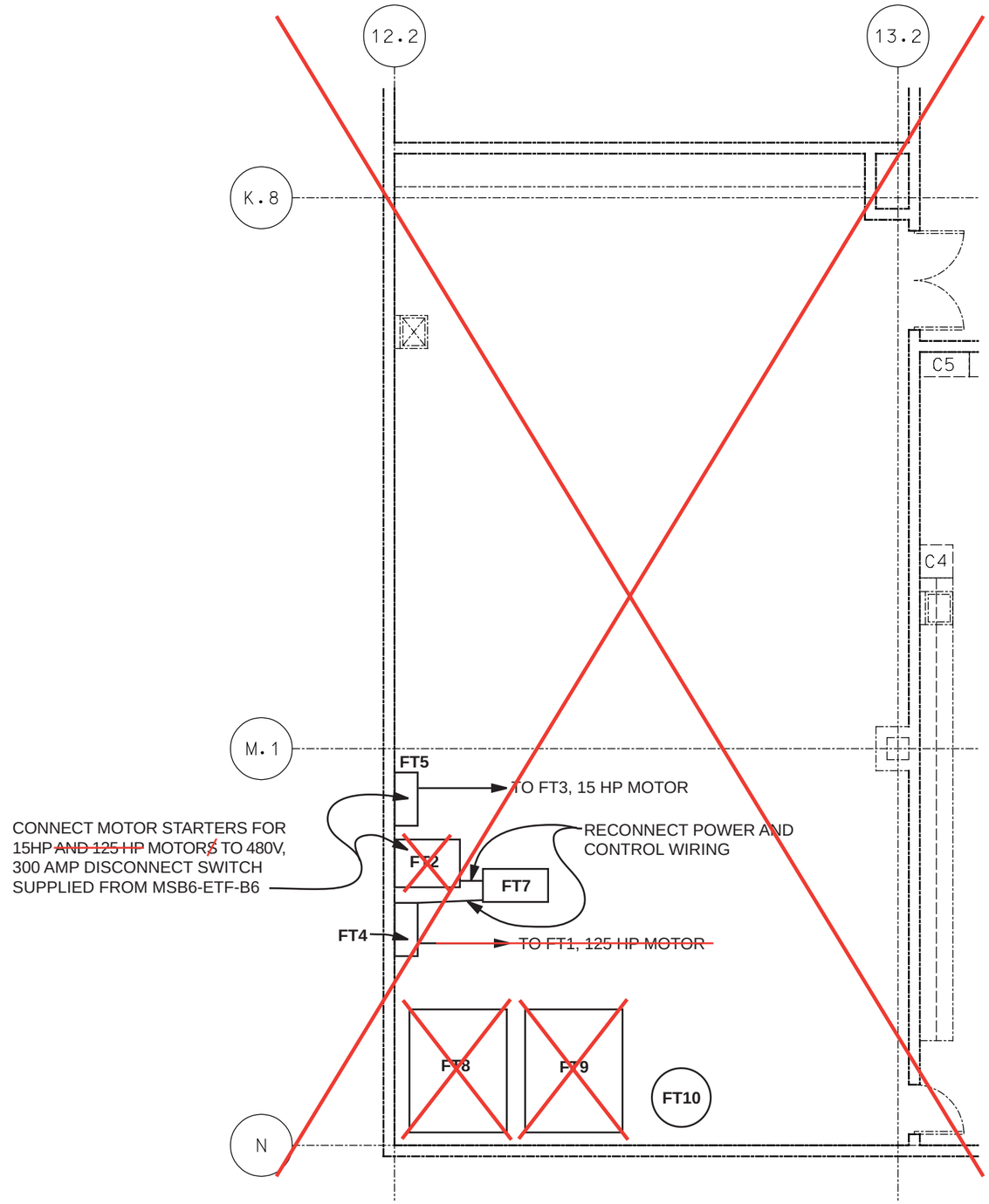
NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1082

SHEET TITLE
FLOW TEST LOOP LAB E-D111 FTL DISASSEMBLY DRAWING NO. 3

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D111 FTL-4**



NOTES:

1. ~~PIPING WILL BE INSTALLED IN THE ETF IN ACCORDANCE WITH SKETCHES TO BE PROVIDED BY DARYL COX.~~

1. INSTALLATION OF PIPES AND TANKS IS NOT IN THE SCOPE OF THIS MOVE.

2. EQUIPMENT SHOWN WILL BE RELOCATED TO THERMAL HYDRAULICS LAB E-D111 INSTEAD OF E-B103.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1082

SHEET TITLE

FLOW TEST LOOP LAB E-D111 FTL INSTALLATION DRAWING NO. 1

JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE 1/8"=1'-0"

DWG NO **SK-E-D111 FTL-5**

Equipment to be moved to Capsule Assembly Lab E-E101:

TAG E-E101-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
~~C1~~	~~Magniform Machine (X152300)~~	~~40" x 48" x 38"~~	~~ORNL 4508 - Rm 274~~	~~SK E-E101-2~~	~~SK E-E101-3~~
C2	Bakeout Furnace	30" x 72" x 48"	ORNL 4508 - Rm 274	SK E-E101-2	SK E-E101-3
C3	Bench Type Milling Machine (ENCO Model 105-1280) and Table	30" x 30" x 48" Table - 50" x 31" x 38"	ORNL 4508 - Rm 274	SK E-E101-2	SK E-E101-3
C4	Refrigerator	28" x 25" x 72"	ORNL 4508 - Rm 274	NA	SK E-E101-3
C5	Storage Cabinets (Total of 10)	36" x 18" x 78"	ORNL 4508 - Rm 274	NA	SK E-E101-3
C6	Misc Lab Equipment-boxes and pallets	40 cu. ft.	ORNL 4508 - Rm 274	NA	SK E-E101-3
C7	Misc Tubing, Bar Stock and Plates (Approx 20 Items) See Note 3	Random Size - 14' Max Length	ORNL 4508 - Rm 274	NA	SK E-E101-3
C8	Flammable Storage Cabinet ~~(If new cabinet is not furnished)~~	43" x 18" x 60"	ORNL 4508 - Rm 274	NA	SK E-E101-3
NEW EQUIPMENT					
N1	Fume Hood	6' Long w/ Cup Sink (Bench)	Provide 120V 15 Amp circuit, domestic hot and cold water, process waste drain and exhaust vent.		
N2	Small Furnace (Future)	16" x 20" x 16"	Provide 120V 15 Amp circuit		
N3	Small Furnace (Future)	16" x 20" x 16"	Provide 208V Single phase circuit		

Design Concerns:
~~Add Ckt #7 to PP16 on drawing D-6002 for Magniform supply to agree with drawing E-P.01-6.~~
Design does not provide ventilation for confined space (10' deep pit) - will need to administratively control.
Design does not provide high pressure air (90 - 100 psig) for air tools in Welding Room E-E103 as requested by user.

CAPSULE ASSEMBLY LAB E-E101 DRAWING INDEX

Drawing No.	Title
SK E-E101-1	Drawing Index and Equipment List
SK E-E101-2	Capsule Assembly Lab Disassembly Drawing
SK E-E101-3	Capsule Assembly Lab Installation Drawing

NOTES:

1. Dennis Heatherly (576-7892) will field direct the connection of equipment being moved to the Capsule Assembly Lab E-E101.
2. Use E-E101 Suffix for all equipment tags.
3. Several additional pieces of stainless steel and aluminum tubing, bar stock, and plate will be moved from outside shed adjacent to Y-12, Building 9204-1 after this move is completed and is not in the scope of this move.
4. All electrical equipment shall be protected from rain while outdoors.
5. NSTD will package all loose equipment and will label all equipment and boxes to be moved.
6. NSTD will identify and label all points required to be disconnected or disassembled. Both sides of the disconnect will be tagged and NSTD will provide sketches, drawings, etc. to facilitate reconnection and reassembly.
7. NSTD will provide all safety support (IH, H&S, etc.) required for the move. NSTD will provide HP surveys or use process knowledge to obtain any required green tags for equipment to be moved to ETF.
8. Equipment lined through or X'd out has been removed from the scope of the move.

ENGINEERING TECHNOLOGY FACILITY
CAPSULE ASSEMBLY LABORATORY E-E101
MOVE PACKAGE

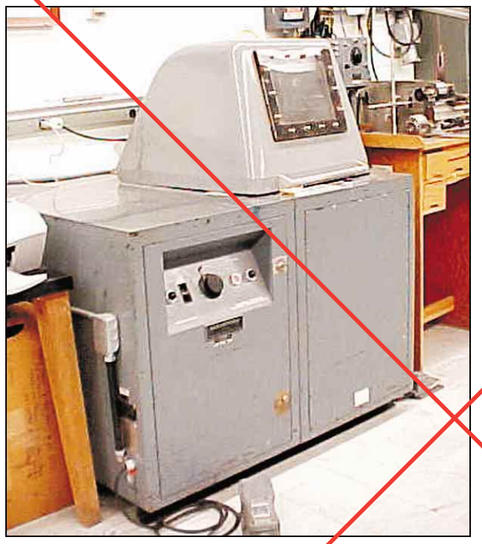
NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

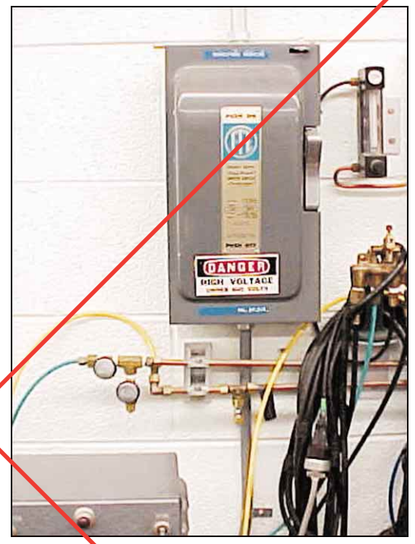
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1081

SHEET TITLE
CAPSULE ASSEMBLY LABORATORY E-E101
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-E101-1**

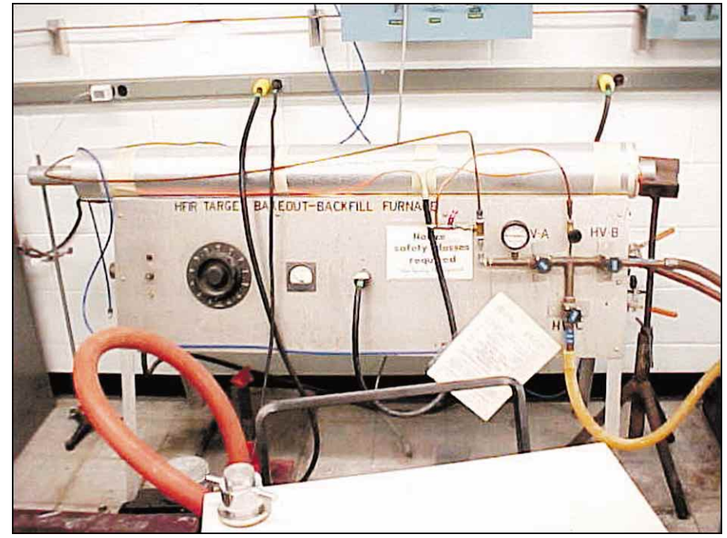




1

C1 - MAGNIFORM MACHINE, DISCONNECT SWITCH & COOLING WATER CONNECTIONS

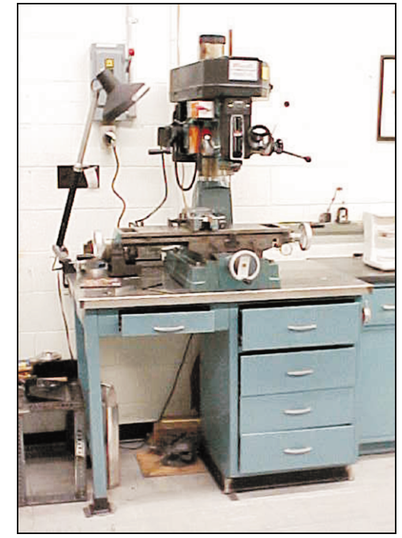
1. DISCONNECT 480V SUPPLY FROM DISCONNECT SWITCH.
2. DISCONNECT 3/8" COOLING WATER SUPPLY AND RETURN.
3. UNIT WEIGHS APPROXIMATELY 600 - 800 POUNDS - REQUIRES SMALL FORK LIFT.



2

C2 - BAKEOUT FURNACE

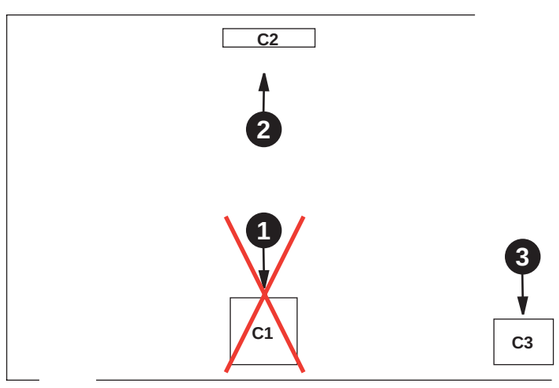
1. REMOVE 120V PLUG FROM RECEPTACLE.
2. DISCONNECT 3/8" COOLING WATER SUPPLY AND RETURN.



3

C3 - MILLING MACHINE

1. REMOVE 208V, 3 PHASE 30 AMP NEMA L 15-20 PLUG FROM RECEPTACLE.
2. REMOVE MILLING MACHINE FROM TABLE.



CAPSULE ASSEMBLY LABORATORY
ORNL BUILDING 4508, ROOM 274

NOTES:

1. USE E-E101 SUFFIX FOR ALL EQUIPMENT TAGS

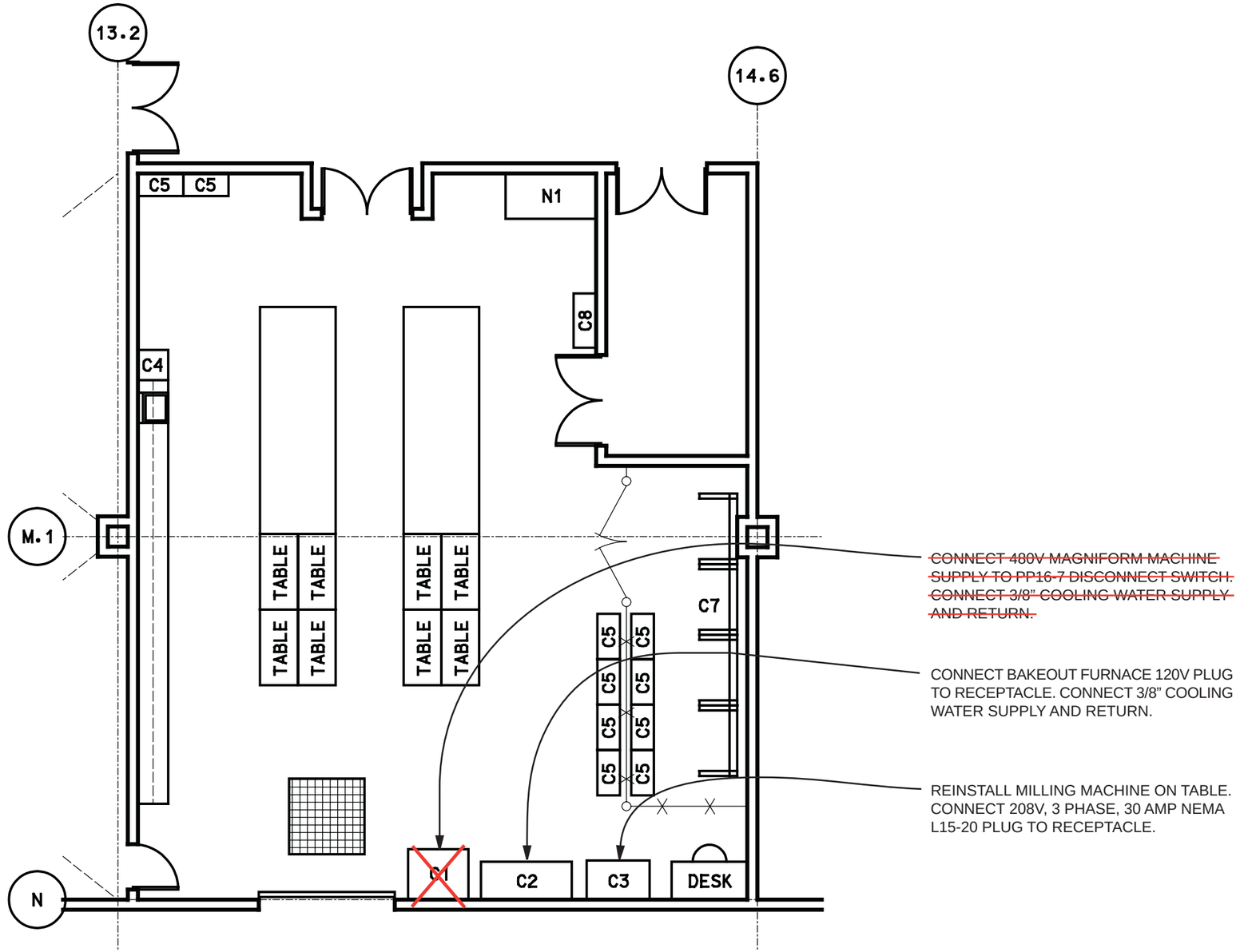
NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1081

SHEET TITLE
CAPSULE ASSEMBLY LABORATORY E-E101 DISASSEMBLY DRAWING

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-E101-2**



NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1081

SHEET TITLE

CAPSULE ASSEMBLY LABORATORY E-E101 INSTALLATION DRAWING

JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE 1/8"=1'-0"

DWG NO **SK-E-E101-3**

Equipment to be moved to Aircraft Lab OSTI:

TAG OSTI-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
A1	Fuel Pump Test Tank and Rupture Basin, 2 of each	48” x 72” x 48”	Y-12 9401-1 Col A-13	SK-OSTI-2	SK-OSTI-3
A2	400 Hz Power Supply	18” x 32” x 60”	Y-12 9401-1 Col A-13	SK-OSTI-2	SK-OSTI-3
A3	Exhaust Fan and Cabinet	22” x 28” x 78”	Y-12 9401-1 Col A-13	SK-OSTI-2	SK-OSTI-3
A4	Control Cabinet	22” x 24” x 72”	Y-12 9401-1 Col A-13	SK-OSTI-2	SK-OSTI-3
A7	Four Barrel Outdoor Fuel Containment	57” x 54” x 60”	Y-12 9401-1 Outdoors East Side	SK-OSTI-2	SK-OSTI-3
A8	Two Barrel Outdoor Fuel Containment	57” x 30” x 60”	Y-12 9401-1 Outdoors East Side	SK-OSTI-2	SK-OSTI-3
GENERAL					
G1	Fifty Boxes	12” x 12” x 16”	Y-12 9401-1	NA	NA
G2	Four 55 gal. drums of aircraft fuel				

AIRCRAFT LAB OSTI DRAWING INDEX

Drawing No.	Title
SK-OSTI-1	Drawing Index and Equipment List
SK-OSTI-2	Aircraft Lab Disassembly Drawing

NOTES:

1. THIS EQUIPMENT WILL BE MOVED TO STORAGE AT OSTI.

ENGINEERING TECHNOLOGY FACILITY
AIRCRAFT LABORATORY OSTI
MOVE PACKAGE

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

AIRCRAFT LABORATORY OSTI
DRAWING INDEX AND EQUIPMENT LIST

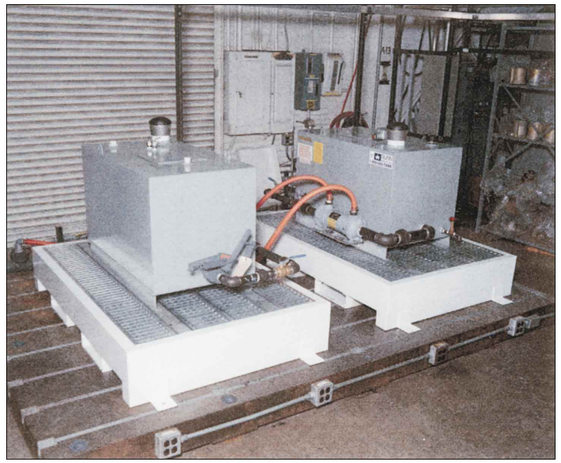
JOB NO PDC 0214

DATE 09/04/03

REV NO 0

SCALE NONE

DWG NO **SK-OSTI-1**



1 (A3 NOT SHOWN)

A1 (2 UNITS) FUEL PUM TEST TANK AND RUPTURE BASIN

1. DRAIN FUEL FROM TANKS.
2. DISCONNECT ELECTRICAL POWER.
3. TAG AND DISCONNECT CONTROL WIRING.
4. DISCONNECT COOLING WATER HOSE FROM HEADER; LEAVE HOSES ON HEAT EXCHANGERS.
5. BASE PLATES ARE NOT TO BE MOVED.

2

A2-400 HZ POWER SUPPLY

1. TAG AND DISCONNECT WIRING.
2. COIL WIRING INTERCONNECTING A1, A2 AND A3.

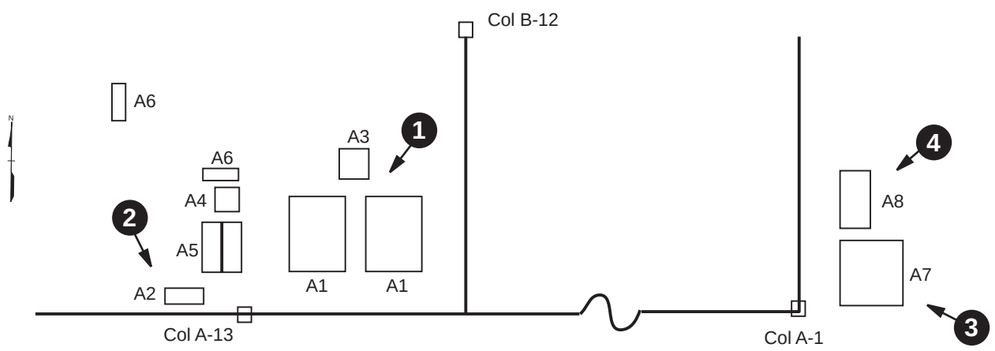
3

A7 - FOUR BARREL OUTDOOR FUEL CONTAINMENT

4

A8 - TWO BARREL OUTDOOR FUEL CONTAINMENT

1. DRUMS CONTAIN FUEL.
2. REMOVE DRUMS AND MOVE THEM PER SAFETY GUIDELINES.
3. THE FUEL CONTAINMENT ENCLOSURE IS LIGHT WEIGHT PLASTIC MATERIAL.



AIRCRAFT LABORATORY OSTI
Y-12 BUILDING 9401-1

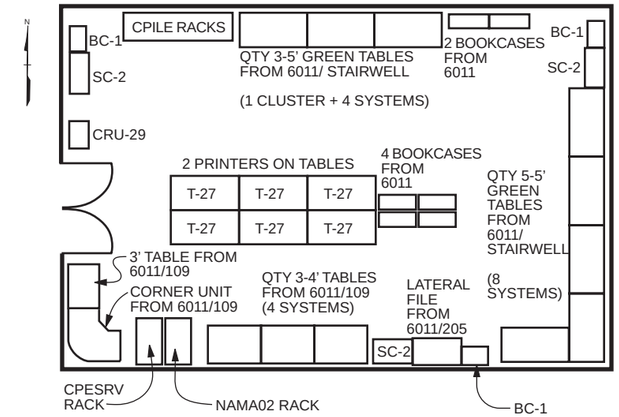
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

AIRCRAFT LAB OSTI DISASSEMBLY DRAWING

JOB NO PDC 0214	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO **SK-OSTI-2**



ROB R-M301

Items to move to the Nuclear Simulations Laboratory R-M301
Revision 1

System/Item	Current Location	Network Connection
CPILE Cluster	6025/7-L	Cat5/100Mb
Old CPILE Cluster	6025/7-L	Cat5/100Mb
NAS7	6025/7-L	Cat5/100Mb
NAS8	6025/7-L	Cat5/100Mb
B/W Printer	6025/7-L	Cat5/100Mb
Wigner	6025/7-L	Cat5/100Mb
Szilard	6025/7-L	Cat5/100Mb
Boxes (20)	6025/7-L	
Chairs (8)	6025/7-L	
rsicws	6025/13-W	Cat5/100Mb
rsiccws	6025/13-W	Cat5/100Mb
rsiccsun	6025/13-W	Cat5/100Mb
rsiccalf	6025/13-W	Cat5/100Mb
rsiccsgi	6025/13-W	Cat5/100Mb
cmonet	6025/13-W	Cat5/100Mb
vivaldi	6025/13-W	Cat5/100Mb
rsicclinux	6025/13-W	Cat5/100Mb
Boxes (20)	6025/13-W	
B/W Printer	6011/109	Cat5/100Mb
cpesrv	6011/109	Fiber/GigE
nama02	6011/109	Cat5/100Mb
ca28	6011/109	Cat5/100Mb
Corner unit	6011/109	
3' table (1)	6011/109	
4' tables (3)	6011/109	
ca32	6011/129	Cat5/100Mb
ca35	6011/129	Cat5/100Mb
ca02	6011/129	Cat5/10Mb
ca29	6011/129	Cat5/10Mb
Boxes (20)	6011/129	
5' green tables (8)	6011/west stairwell	
Lateral File	6011/205	
Bookcases (2)	6011/209	
Bookcases (2)	6011/216	
Bookcases (2)	6011/217	

1

MISCELLANEOUS COMPUTER EQUIPMENT MOVED FROM BUILDING 6025 ROOM 13W

NOTES:
1. CONTACT JEFF JOHNSON, 574-5262 OR SUZANNE WILLOUGHBY, 574-1855.
2. USE R-M301 SUFFIX FOR ALL EQUIPMENT TAGS.
3. DISCONNECTS AND RECONNECTS WILL BE MADE BY JEFF OR SUZANNE.
4. 60 BOXES WILL BE REQUIRED FOR THE MOVE.
5. THE MOVE FROM BUILDING 6011 MUST BE COMPLETED FIRST.
6. CPESRV WILL NEED TO BE MOVED AFTER HOURS.
7. WILL NEED DEDICATED 20 AMP CIRCUIT AND GIGABIT OVER FIBER DROP NEAR CPESRV RACK.

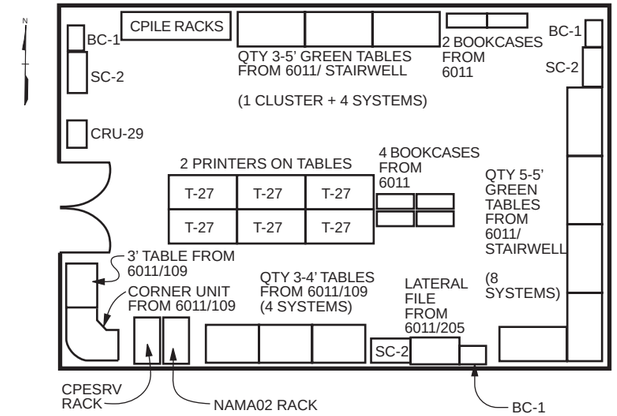
NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: R3068

SHEET TITLE
NUCLEAR SIMULATION LABORATORY R-M301

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-R-M301-1**



ROB R-M301

2

MISCELLANEOUS COMPUTER EQUIPMENT MOVED FROM BUILDING 6025 ROOM 7-L

NOTES:
1. CONTACT JEFF JOHNSON, 574-5262 OR SUZANNE WILLOUGHBY, 574-1855.
2. USE R-M301 SUFFIX FOR ALL EQUIPMENT TAGS.
3. DISCONNECTS AND RECONNECTS WILL BE MADE BY JEFF OR SUZANNE.
4. 60 BOXES WILL BE REQUIRED FOR THE MOVE.
5. THE MOVE FROM BUILDING 6011 MUST BE COMPLETED FIRST.
6. CPESRV WILL NEED TO BE MOVED AFTER HOURS.
7. WILL NEED DEDICATED 20 AMP CIRCUIT AND GIGABIT OVER FIBER DROP NEAR CPESRV RACK.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: R3068

SHEET TITLE

NUCLEAR SIMULATION LABORATORY R-M301

JOB NO 0214-00001

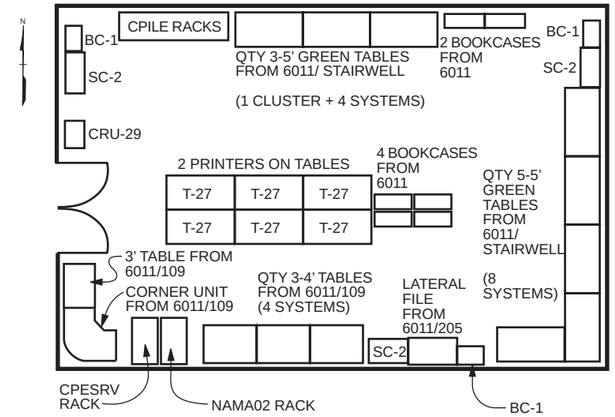
DATE 06/16/03

REV NO 1

SCALE NONE

DWG NO **SK-R-M301-2**

CONTENTS MOVE BUT NOT THE CABINET. THE MONITOR IS PART OF THE SYSTEM.



ROB R-M301

3

MISCELLANEOUS COMPUTER EQUIPMENT MOVED FROM BUILDING 6011 ROOM 109

NOTES:
1. CONTACT JEFF JOHNSON, 574-5262 OR SUZANNE WILLOUGHBY, 574-1855.
2. USE R-M301 SUFFIX FOR ALL EQUIPMENT TAGS.
3. DISCONNECTS AND RECONNECTS WILL BE MADE BY JEFF OR SUZANNE.
4. 60 BOXES WILL BE REQUIRED FOR THE MOVE.
5. THE MOVE FROM BUILDING 6011 MUST BE COMPLETED FIRST.
6. CPESRV WILL NEED TO BE MOVED AFTER HOURS.
7. WILL NEED DEDICATED 20 AMP CIRCUIT AND GIGABIT OVER FIBER DROP NEAR CPESRV RACK.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

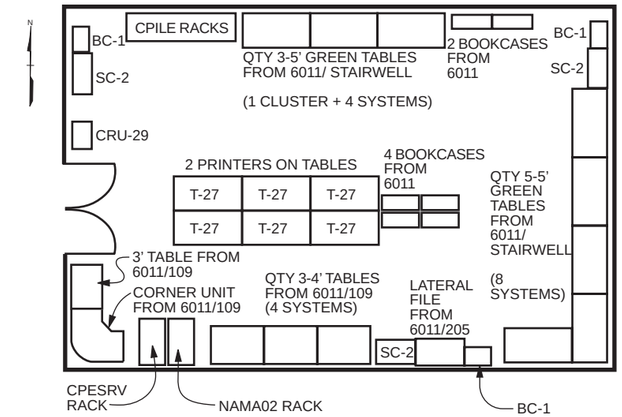
PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: R3068

SHEET TITLE

NUCLEAR SIMULATION LABORATORY R-M301

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-R-M301-3**



ROB R-M301

4

MISCELLANEOUS COMPUTER EQUIPMENT MOVED FROM BUILDING 6011 ROOM 129

NOTES:
1. CONTACT JEFF JOHNSON, 574-5262 OR SUZANNE WILLOUGHBY, 574-1855.
2. USE R-M301 SUFFIX FOR ALL EQUIPMENT TAGS.
3. DISCONNECTS AND RECONNECTS WILL BE MADE BY JEFF OR SUZANNE.
4. 60 BOXES WILL BE REQUIRED FOR THE MOVE.
5. THE MOVE FROM BUILDING 6011 MUST BE COMPLETED FIRST.
6. CPESRV WILL NEED TO BE MOVED AFTER HOURS.
7. WILL NEED DEDICATED 20 AMP CIRCUIT AND GIGABIT OVER FIBER DROP NEAR CPESRV RACK.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

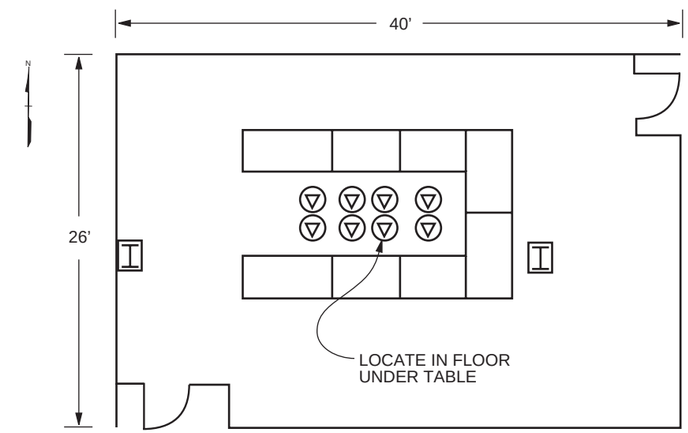
PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: R3068

SHEET TITLE

NUCLEAR SIMULATION LABORATORY R-M301

JOB NO 0214-00001	DATE 06/16/03
	REV NO 0
SCALE NONE	DWG NO **SK-R-M301-4**



ROB R-O304

NOTES:
1. CONTACT JEFF JOHNSON, 574-5262 OR SUZANNE WILLOUGHBY, 574-1855.
2. USE R-O304 SUFFIX FOR ALL EQUIPMENT TAGS.
3. 2 BOXES WILL BE REQUIRED FOR THE MOVE.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: R3081

SHEET TITLE

SCALE TRAINING LABORATORY R-O304

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-R-O304-1**

COMPUTATION SCIENCES BUILDING AND RESEARCH OFFICE BUILDING
LABORATORY MOVES

New Room No.	Previous Room No.	Name	Contacts	Phone	Present Location	Sketch Number
C-D108	C1065	Optical Lab	Yoon-Ho Kim	241-0192	6010	SK-C-D108-1, SK-C-D108-2, SK-C-D108-3, SK-C-D108-4
C-C122	C1093	Nanoparticle Lab				SK-C-C122-1
C-C124	C1094	Biomolecular Programmed Assembly Lab	Thomas Thundat	574-6021	4500S	SK-C-C124-1
C-C126-A	C1095	Nanofabrication Lab	Thomas Thundat	574-2061	4500S	SK-C-C126-A-1
C-D230	C2062	Optical Lab	Vassili Kireev	241-2063	6010	SK-C-D230-1, SK-C-D230-2, SK-C-D230-3
C-D228	C2063	Optical Lab	Yun Liu	241-2063	6010	SK-C-D228-1, SK-C-D228-2
C-D224	C2064	Optical Lab	Warren Grice	241-2061	6010	SK-C-D224-1, SK-C-D224-2, SK-C-D224-3, SK-C-D224-4
C-B228	C2078	CAVE Lab	Ross Toedte	574-1912	6010	SK-C-B228-1, SK-C-B228-2, SK-C-B228-3, SK-C-B228-4, SK-C-B228-5, SK-C-B228-6, SK-C-B228-7, SK-C-B228-8, SK-C-B228-9, SK-C-B228-10, SK-C-B228-11
C-B208	C2081	Viz Lab	Ross Toedte	574-1912	4500N	SK-C-B208-1
C-B210	C2082	Video Lab	Ross Toedte	574-1912	4500N	SK-C-B210-1
C-B210-A	C2083	Audio Lab	Ross Toedte	574-1912	4500N	SK-C-B210-A-1
C-B216	C2084	Robotics Lab	David Reister	574-2272	6010	SK-C-B216-1, SK-C-B216-2, SK-C-B216-3, SK-C-B216-4, SK-C-B216-5
C-B224	C2085	GIS Lab	Ed Tinnel	574-4637	4500N	SK-C-B224-1, SK-C-B224-2
C-E204-B	C2087	Computer Science Lab	John Mugler	574-9539	6012	SK-C-E204-B-1, SK-C-E204-B-2
C-A216	C2093	Modeling and Simulation Lab	Richard Ward	574-5449	6011	SK-C-A216-1
R-M301	R3068	Nuclear Simulation Lab	David Hetrick	576-7556		SK-R-M301-1, SK-R-M301-2, SK-R-M301-3, SK-R-M301-4
R-O304	R3081	Scale Training Lab	Jeff Johnson	574-5262		SK-R-O304-1

All lab personnel will disconnect, package, and label material and equipment that is moving except for the following:

- Facilities Revitalization Project (FRP) will package the CD's in the GIS Lab.
- FRP will disconnect and package computer cables for the Computer Science Lab. They will be packaged by cable type. Reassembly will be by lab personnel.

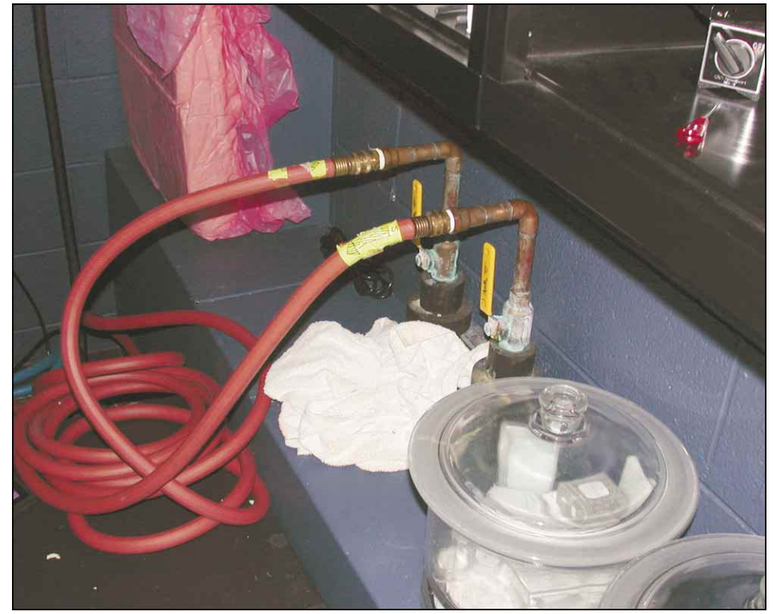
REFER TO THIS INDEX FOR NEW ROOM NUMBERS WHEN USING THE SKETCHES IN THESE PACKAGES.

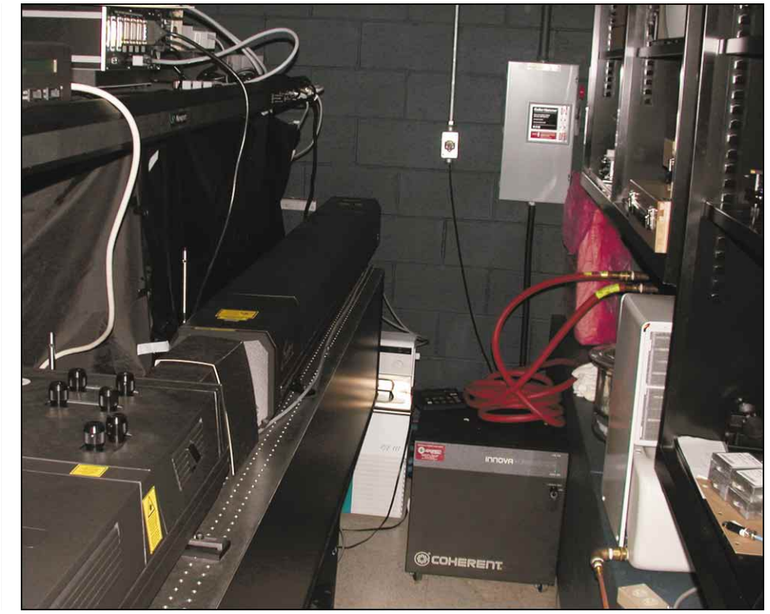
June 16, 2003

1

OPTICAL TABLE

DESCRIPTION: NEWPORT RS-400 SERIES, SIZE - 5’ X 12’ X 18” THICK
WEIGHT: TOP - 2600 POUNDS, LEGS - 400 POUNDS
UTILITIES: COMPRESSED AIR
SPECIAL MOVING REQUIREMENTS: THE TABLE TOP CAN BE TRANSPORTED VERTICALLY FOR **SHORT** PERIODS OF TIME.

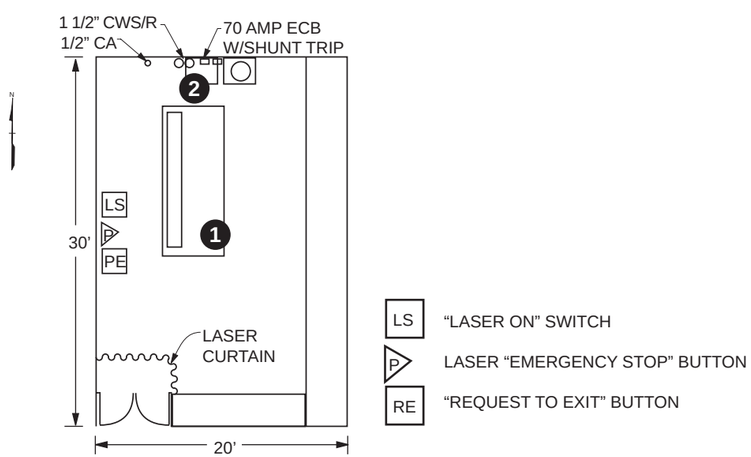




2

HEAT EXCHANGER

DESCRIPTION: COHERENT, SABRE INNOVA, 19” X 23” X 20” HIGH, 225 POUNDS
UTILITIES: SUPPLY WATER, RETURN WATER



C-D108

NOTES:

1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 219 TO CSB ROOM C-D108.
2. THE INDIVIDUAL CONTRIBUTOR IS YOON-HO KIM, 241-0912.
3. THE DISCONNECTS AND RECONNECTS OF POWER AND WATER TO THE LASER HEADS WILL BE MADE BY THE INDIVIDUAL CONTRIBUTOR.
4. THERE WILL BE APPROXIMATELY 33 BOXES OF MISCELLANEOUS EQUIPMENT TO BE MOVED, 30 WILL BE CRATES (LOTS OF BUBBLE WRAP) AND 3 WILL BE REGULAR BOXES.
5. USE C-D108 SUFFIX FOR ALL EQUIPMENT TAGS.

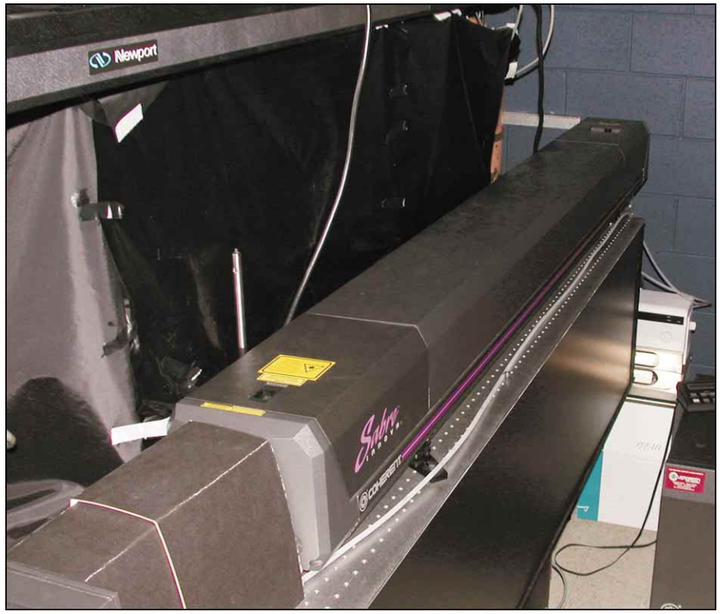
NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C1065

SHEET TITLE
OPTICAL LABORATORY C-D108

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-D108-1**

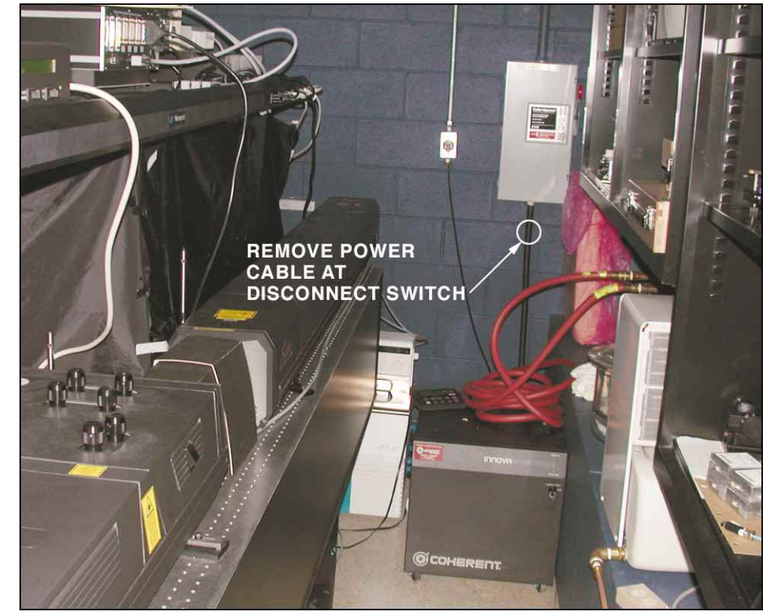


3

LASER HEAD

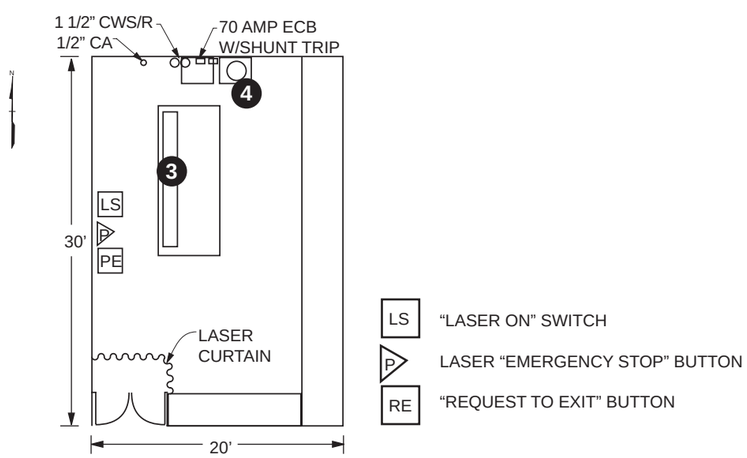
DESCRIPTION: COHERENT, SABRE INNOVA 8' X 8' X 85".
CRATED WEIGHT: 430 POUNDS
UTILITIES: POWER SUPPLY CONNECTION, HEAT EXCHANGER CONNECTION.
MOVING REQUIREMENTS: **EXTREMELY FRAGILE!!** A CRATE TO PACKAGE THE LASER HEAD WILL BE FURNISHED BY THE INDIVIDUAL CONTRIBUTOR. THEY WILL ASSIST IN PACKAGING AND MOVING.

4



POWER SUPPLY

DESCRIPTION: COHERENT, SABRE INNOVA 19" X 23" X 20" HIGH
WEIGHT: 295 POUNDS
UTILITIES: 480 V, 3 PHASE, 60 HZ



C-D108

NOTES:

1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 219 TO CSB ROOM C-D108.
2. THE INDIVIDUAL CONTRIBUTOR IS YOON-HO KIM, 241-0912.
3. THE DISCONNECTS AND RECONNECTS OF POWER AND WATER TO THE LASER HEADS WILL BE MADE BY THE INDIVIDUAL CONTRIBUTOR.
4. THERE WILL BE APPROXIMATELY 33 BOXES OF MISCELLANEOUS EQUIPMENT TO BE MOVED, 30 WILL BE CRATES (LOTS OF BUBBLE WRAP) AND 3 WILL BE REGULAR BOXES.
5. USE C-D108 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C1065

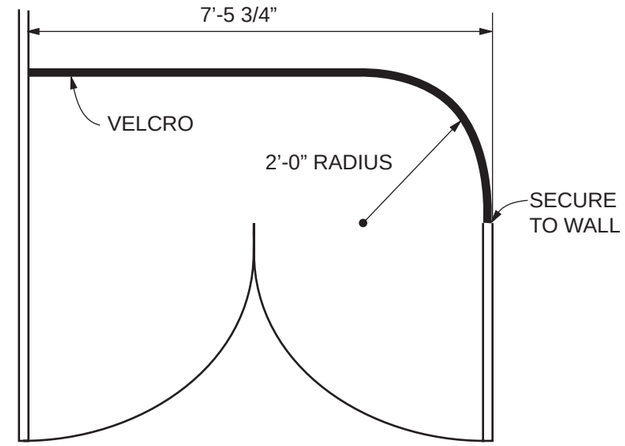
SHEET TITLE
OPTICAL LABORATORY C-D108

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-D108-2**

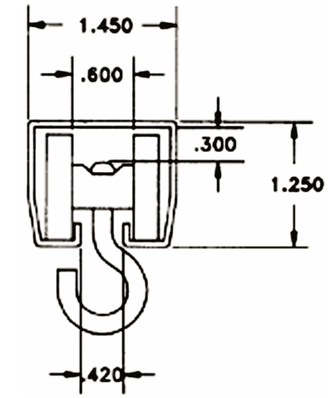
5

LASER CURTAIN WITH VALANCE

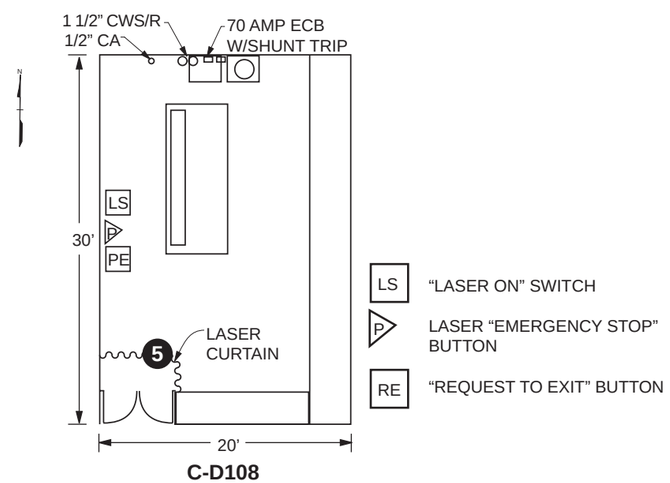
SIZE: 9 X 9 (2 SECTIONS), 11 X 9 (ONE SECTION)
LOCATION: BUILDING 6010 ROOM 250.



REMOVE TWO 9-FOOT SECTIONS OF LASER CURTAIN W/VALANCE AND INSTALL IN BUILDING CSB, ROOM C-D108.



THE CURTAINS HAVE GROMMETS AT THE TOP AND ARE MOUNTED ON THE HOOK.



C-D108

NOTES:

1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 219 TO CSB ROOM C-D108.
2. THE INDIVIDUAL CONTRIBUTOR IS YOON-HO KIM, 241-0912.
3. THE DISCONNECTS AND RECONNECTS OF POWER AND WATER TO THE LASER HEADS WILL BE MADE BY THE INDIVIDUAL CONTRIBUTOR.
4. THERE WILL BE APPROXIMATELY 33 BOXES OF MISCELLANEOUS EQUIPMENT TO BE MOVED, 30 WILL BE CRATES (LOTS OF BUBBLE WRAP) AND 3 WILL BE REGULAR BOXES.
5. USE C-D108 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C1065

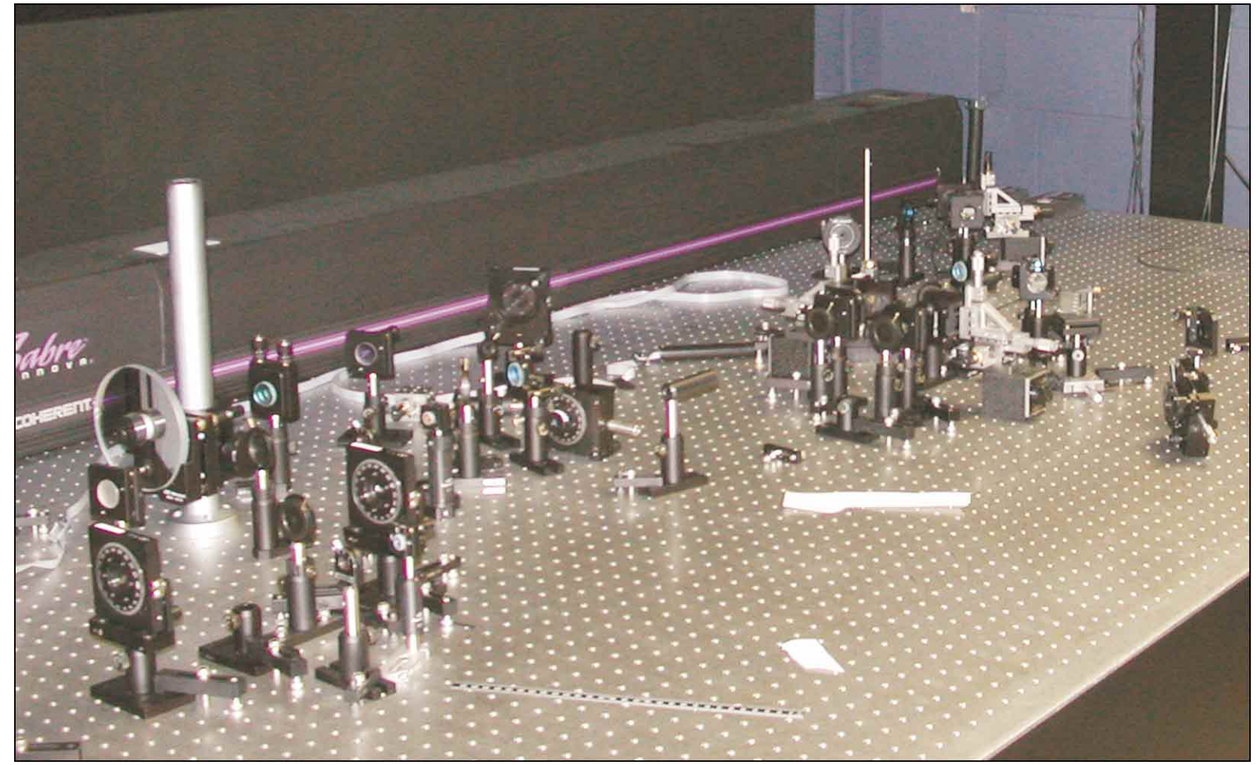
SHEET TITLE

OPTICAL LABORATORY C-D108

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-C-D108-3**

6

COMPUTER, DESK AND CHAIR



7

DELICATE INSTRUMENTS

CRATES AND BUBBLE WRAP WILL BE REQUIRED FOR PACKAGING. INDIVIDUAL CONTRIBUTOR WILL PACKAGE.

NOTES:

1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 219 TO CSB ROOM C-D108.
2. THE INDIVIDUAL CONTRIBUTOR IS YOON-HO KIM, 241-0912.
3. THE DISCONNECTS AND RECONNECTS OF POWER AND WATER TO THE LASER HEADS WILL BE MADE BY THE INDIVIDUAL CONTRIBUTOR.
4. THERE WILL BE APPROXIMATELY 33 BOXES OF MISCELLANEOUS EQUIPMENT TO BE MOVED, 30 WILL BE CRATES (LOTS OF BUBBLE WRAP) AND 3 WILL BE REGULAR BOXES.
5. USE C-D108 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C1065

SHEET TITLE

OPTICAL LABORATORY C-D108

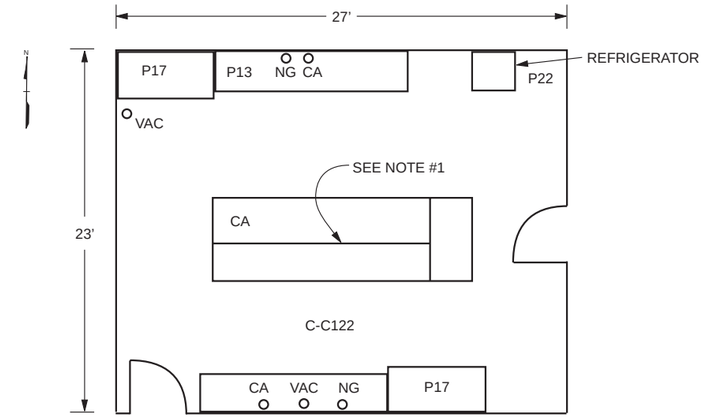
JOB NO 0214-00001

DATE 06/16/03

REV NO 1

SCALE NONE

DWG NO **SK-C-D108-4**



C-C122

KEY:
P13 - SINGLE COMPARTMENT SS SINK
P17 - LAB CUP SINK IN FUME HOOD
P22 - FLOOR MOUNTED EYEWASH AND SHOWER

RESEARCH PROJECT CANCELLED
NO CURRENT NEED FOR LAB

NOTES:
1. DOMESTIC COLD AND HOT WATER STUBBED UP IN CABINET.
2. THIS LAB WAS ORIGINALLY PLANNED AS THE NANOPARTICLE LABORATORY. INDIVIDUAL CONTRIBUTOR LEON MAYA, 574-4943.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C1093

SHEET TITLE
LABORATORY C-C122
NANOPARTICLE LAB C-C122

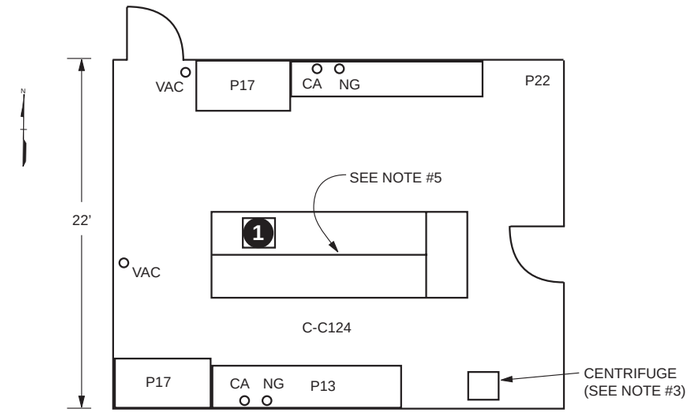
JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-C122-1**

1

AUTOCLAVE

DESCRIPTION: VWR SCIENTIFIC PRODUCTS SITE ON COUNTER TOP 24” X 24” X 18” HIGH

UTILITIES: 120 V



C-C124

KEY:
P13 - SINGLE COMPARTMENT SS SINK
P17 - LAB CUP SINK IN FUME HOOD
P22 - FLOOR MOUNTED EYEWASH AND SHOWER

NOTES:
1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 4500S, ROOM F1-11.
2. THE INDIVIDUAL CONTRIBUTOR FOR ROOM C-C124 IS THOMAS THUNDATE, 574-6201.
3. THERE WILL BE APPROXIMATELY 2 BOXES OF MISCELLANEOUS EQUIPMENT TO BE MOVED TO C-C124.
4. USE C-C124 SUFFIX FOR ALL EQUIPMENT TAGS FOR EQUIPMENT MOVING TO C-C124.
5. DOMESTIC COLD AND HOT WATER STUBBED UP IN CABINET.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C1094

SHEET TITLE

BIOMOLECULAR PROGRAMMED ASSEMBLY LAB C-C124

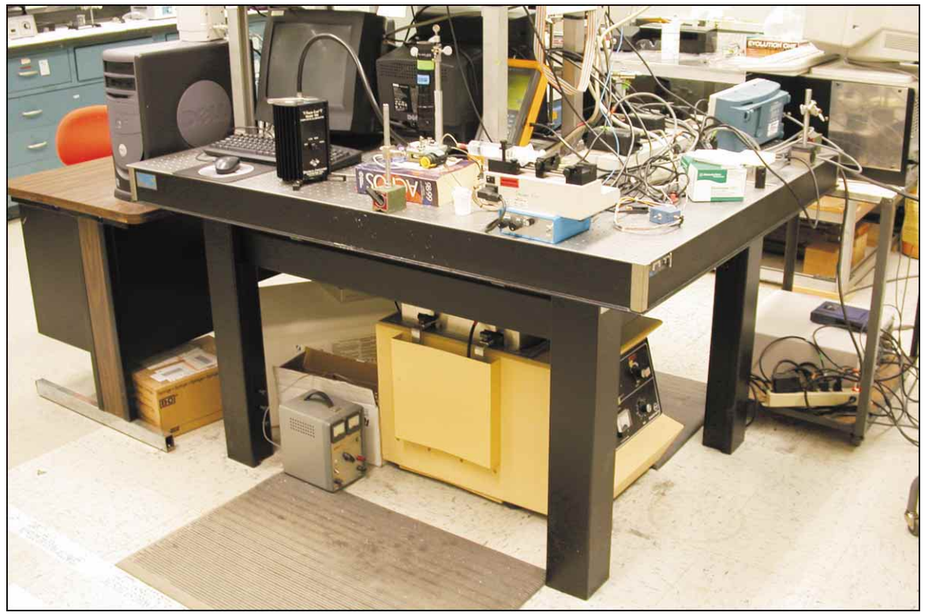
JOB NO 0214-00001

DATE 06/16/03

REV NO 1

SCALE NONE

DWG NO **SK-C-C124-1**



1 2

OPTICAL TABLE

DESCRIPTION: TMC MODEL 77-249-09
SIZE: 5’ X 5’ X 4” THICK
WEIGHT: TOP - APPROX 800 POUNDS, LEGS - LESS THAN 400 POUNDS
UTILITIES: COMPRESSED AIR

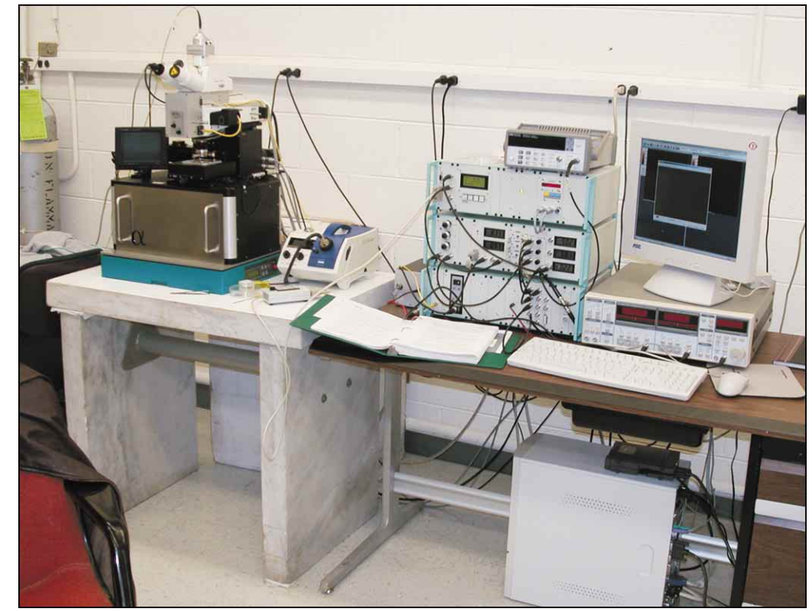
SPECIAL MOVING REQUIREMENTS: THE TABLE TOP CAN BE TRANSPORTED VERTICALLY FOR **SHORT** PERIODS OF TIME. REMOVE PEGS PRIOR TO MOVING.

3

EVAPORATOR

DESCRIPTION: 45” X 25” X 63” HIGH
THE EVAPORATOR WILL BE DISASSEMBLED AND PACKAGED BY ANDREW WIG.
AFTER IT IS MOVED TO C-C126-A IT WILL BE REASSEMBLED BY ANDREW WIG.

UTILITIES: SUPPLY WATER, RETURN WATER, VENT (INTO HOOD)

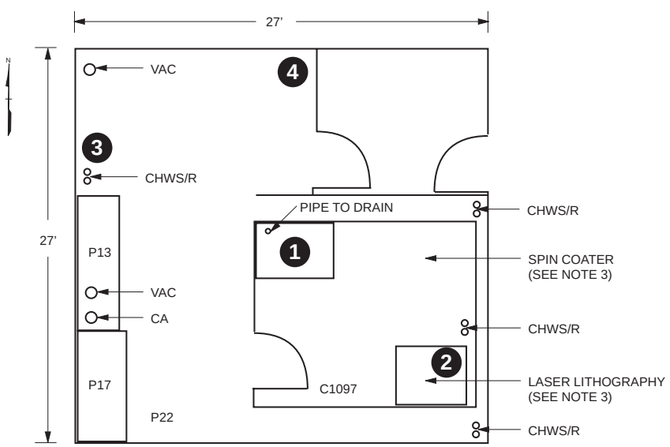


4

ATOMIC FORCE MICROSCOPE

DESCRIPTION: MARBLE TABLE - 3’ X 2’ X 32” HIGH
EQUIPMENT LOCATED ON THE TABLES WILL REQUIRE SPECIAL HANDLING DUE TO DELICATE NATURE.

UTILITIES: 120 V POWER



ROOM C-C126-A

KEY:

P13 - SINGLE COMPARTMENT SS SINK
P17 - LAB CUP SINK IN FUME HOOD
P22 - FLOOR MOUNTED EYEWASH AND SHOWER

NOTES:

1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 4500S, ROOM F1-11 TO CSB ROOM C-C126-A.
2. THE INDIVIDUAL CONTRIBUTOR IS THOMAS THUNDATE, 574-6201.
3. THERE WILL BE APPROXIMATELY 10 CRATES (WITH BUBBLE WRAP) AND 5 BOXES OF MISCELLANEOUS EQUIPMENT TO BE MOVED.
4. USE C-C126-A SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C1095

SHEET TITLE

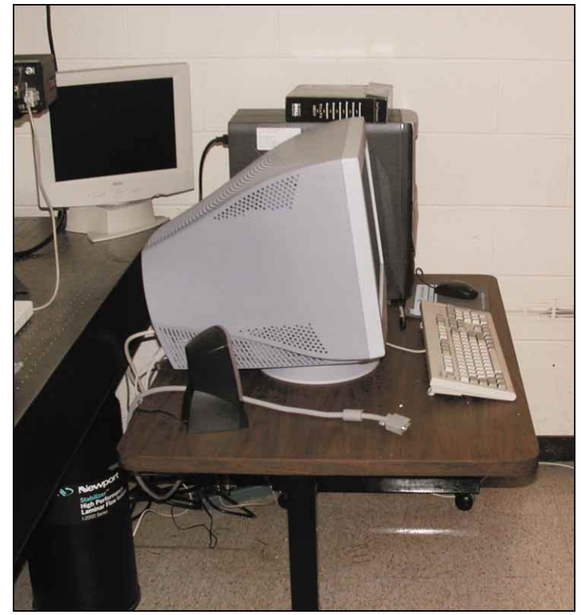
NANOFABRICATION LABORATORY C-C126-A

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-C-C126-A-1**

1

OPTICAL TABLE

DESCRIPTION: NEWPORT RS-2000 SERIES
SIZE: 4’ X 8’ X 8” THICK
WEIGHT: TOP - 1000 POUNDS, LEGS - 400 POUNDS
UTILITIES: COMPRESSED AIR
SPECIAL MOVING REQUIREMENTS: THE TABLE TOP CAN BE TRANSPORTED VERTICAL FOR **SHORT** PERIODS OF TIME. REMOVE LEGS PRIOR TO MOVING.



2

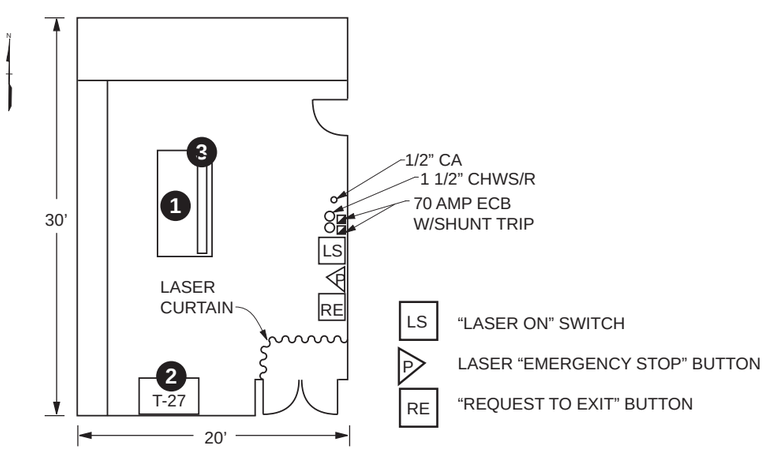
CONTROLLER

THE INDIVIDUAL CONTRIBUTOR WILL PACKAGE THE CONTROLLER FOR MOVING TO C-D230.

3

PACKAGED EQUPMENT

THESE TWO BOXES WILL BE LABELED AND MOVED TO CSB C-D230.



C-D230

NOTES:
1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-D230.
2. THE INDIVIDUAL CONTRIBUTOR IS VASSILI KIREEV, 241-2063.
3. ALL DISCONNECTS AND RECONNECTIONS WILL BE MADE BY THE INDIVIDUAL CONTRIBUTOR.
4. THERE WILL BE APPROXIMATELY 30 BOXES OF MISCELLANEOUS EQUIPMENT TO BE MOVED. 27 WILL BE CRATES (WITH LOTS OF BUBBLE WRAP) AND 3 REGULAR MOVING BOXES.
5. USE C-D230 SUFFIX FOR ALL EQUIPMENT TAGS.

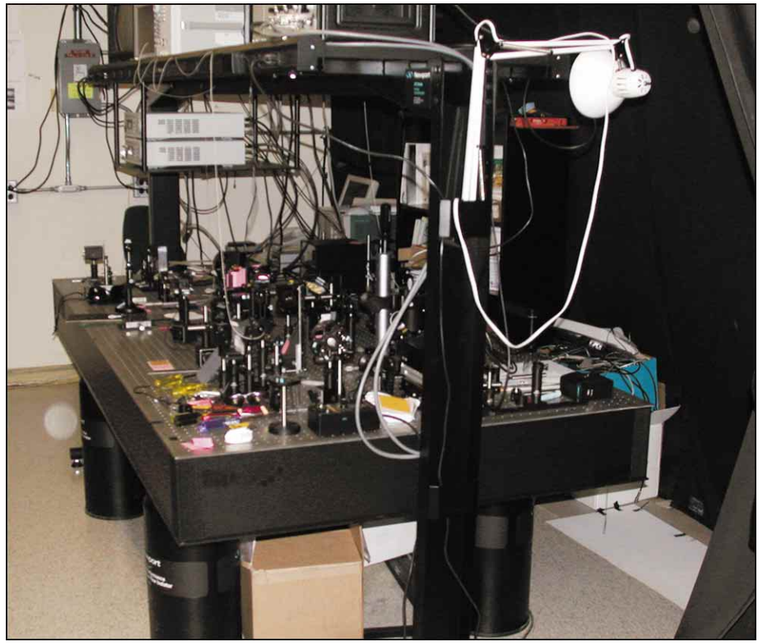
NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2062

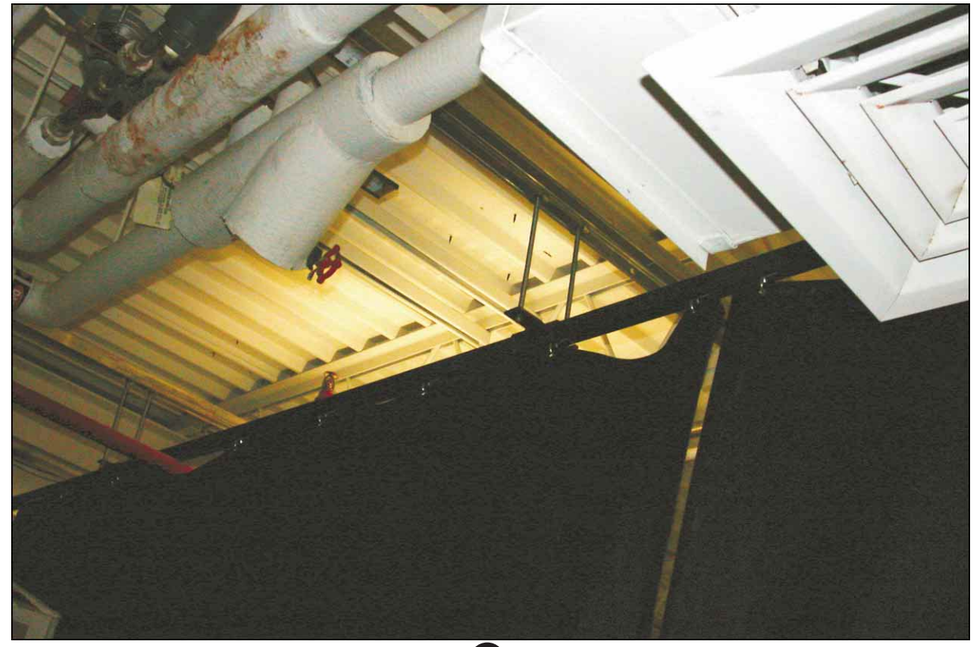
SHEET TITLE
OPTICAL LABORATORY C-D230

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-D230-1**



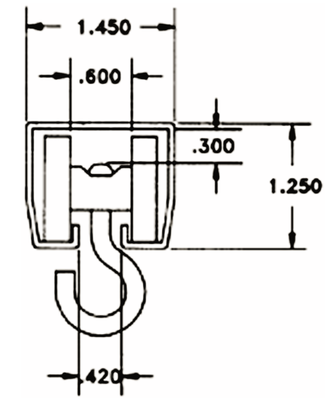
DELICATE INSTRUMENTS

CRATES AND BUBBLE WRAP WILL BE REQUIRED FOR PACKAGING.
INDIVIDUAL CONTRIBUTOR WILL PACKAGE.



4

LASER CURTAIN

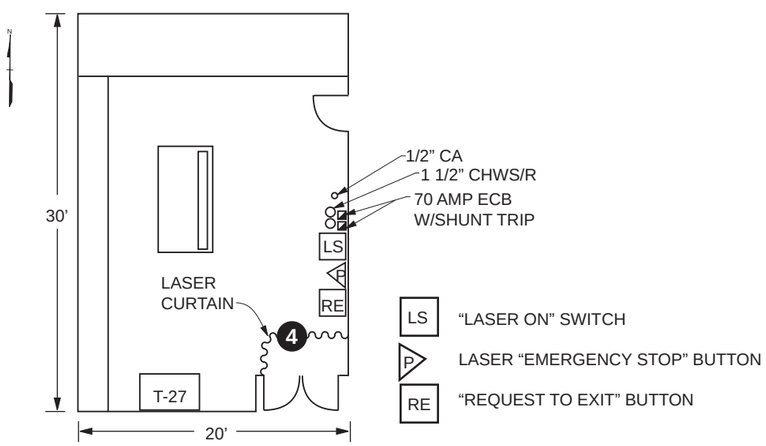


THE CURTAINS HAVE GROMMETS AT THE TOP AND ARE MOUNTED ON THE HOOKS.

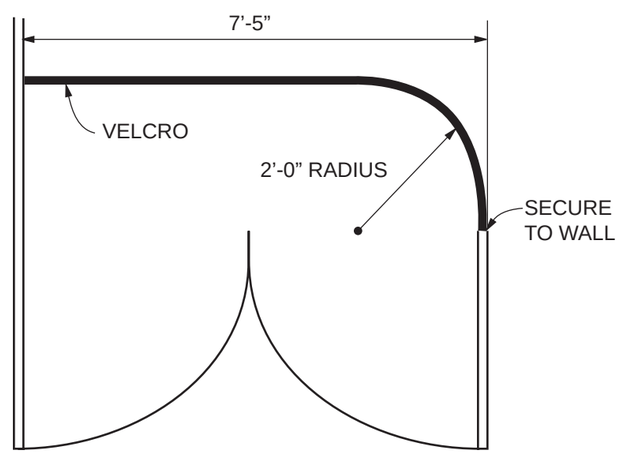
SIZE: 9 X 9 (4 SECTIONS)

LOCATION: BUILDING 6010 ROOM 250

REMOVE TWO 9 FOOT SECTIONS OF LASER CURTAIN INSTALL IN BUILDING CBS ROOM C-D228.
EACH 9 FOOT SECTION WEIGHS 25 PUNDS.



C-D230



NOTES:
1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-D230.
2. THE INDIVIDUAL CONTRIBUTOR IS VASSILI KIREEV, 241-2063.
3. ALL DISCONNECTS AND RECONNECTIONS WILL BE MADE BY THE INDIVIDUAL CONTRIBUTOR.
4. THERE WILL BE APPROXIMATELY 30 BOXES OF MISCELLANEOUS EQUIPMENT TO BE MOVED. 27 WILL BE CRATES (WITH LOTS OF BUBBLE WRAP) AND 3 REGULAR MOVING BOXES.
5. USE C-D230 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2062

SHEET TITLE

OPTICAL LABORATORY C-D230

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-D230-2**

5

BOOK CASES, BENCH AND CONTENTS

NOTES:
1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-D230.
2. THE INDIVIDUAL CONTRIBUTOR IS VASSILI KIREEV, 241-2063.
3. ALL DISCONNECTS AND RECONNECTIONS WILL BE MADE BY THE INDIVIDUAL CONTRIBUTOR.
4. THERE WILL BE APPROXIMATELY 30 BOXES OF MISCELLANEOUS EQUIPMENT TO BE MOVED. 27 WILL BE CRATES (WITH LOTS OF BUBBLE WRAP) AND 3 REGULAR MOVING BOXES.
5. USE C-D230 SUFFIX FOR ALL EQUIPMENT TAGS.

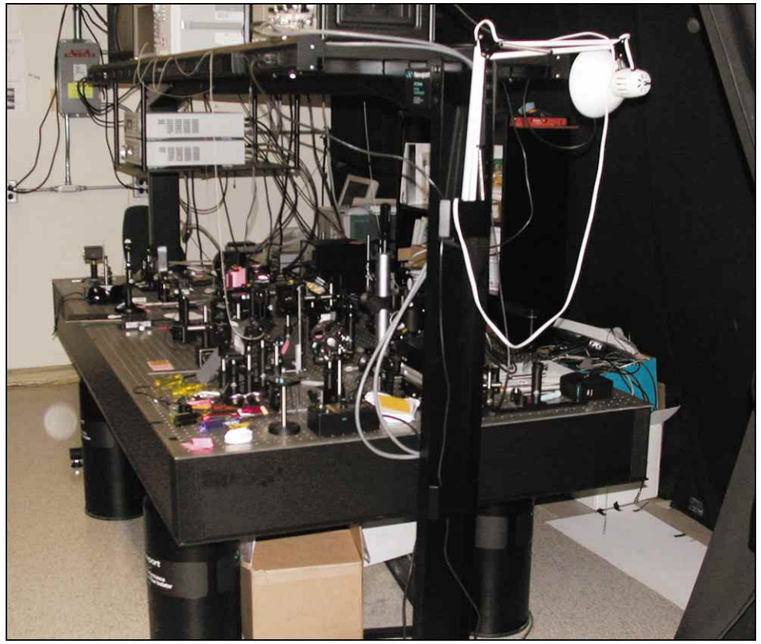
NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2062

SHEET TITLE
OPTICAL LABORATORY C-D230

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-D230-3**



1

OPTICAL TABLE

DESCRIPTION: NEWPORT RS-2000 SERIES
SIZE: 4’ X 8’ X 8” THICK
WEIGHT: TOP - 1000 POUNDS, LEGS – 400 POUNDS

UTILITIES: COMPRESSED AIR

SPECIAL MOVING REQUIREMENTS: THE TABLE TOP CAN BE TRANSPORTED VERTICAL FOR **SHORT** PERIODS OF TIME. REMOVE LEGS PRIOR TO MOVING.

2

OPTICAL TABLE

DESCRIPTION: NEWPORT RS-2000 SERIES
SIZE: 4’ X 6’ X 8” THICK
WEIGHT: TOP - 800 POUNDS, LEGS – 400 POUNDS

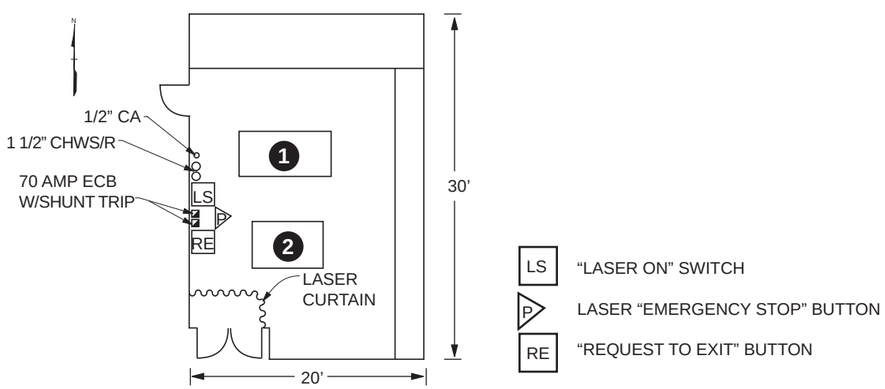
UTILITIES: COMPRESSED AIR

SPECIAL MOVING REQUIREMENTS: THE TABLE TOP CAN BE TRANSPORTED VERTICALLY FOR **SHORT** PERIODS OF TIME. REMOVE LEGS PRIOR TO MOVING.

3

CONTROLLER

THE CONTROLLER WILL BE PACKAGED FOR MOVING BY YUN LIU.



C-D228

NOTES:

1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-D228.
2. THE INDIVIDUAL CONTRIBUTOR IS YUN LIU, 241-2063.
3. ALL DISCONNECTS AND RECONNECTIONS WILL BE MADE BY YUN LIU.
4. THERE WILL BE APPROXIMATELY 30 BOXES, 27 CRATES (WITH LOTS OF BUBBLE WRAP), AND 3 REGULAR MOVING BOXES OF MISCELLANEOUS EQUIPMENT TO BE MOVED.
5. USE C-D228 SUFFIX FOR ALL EQUIPMENT TAGS.

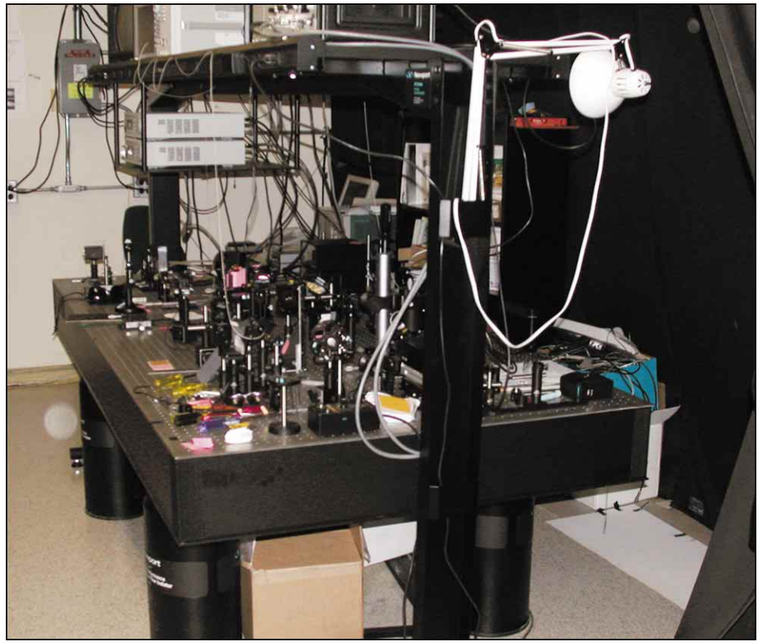
NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2063

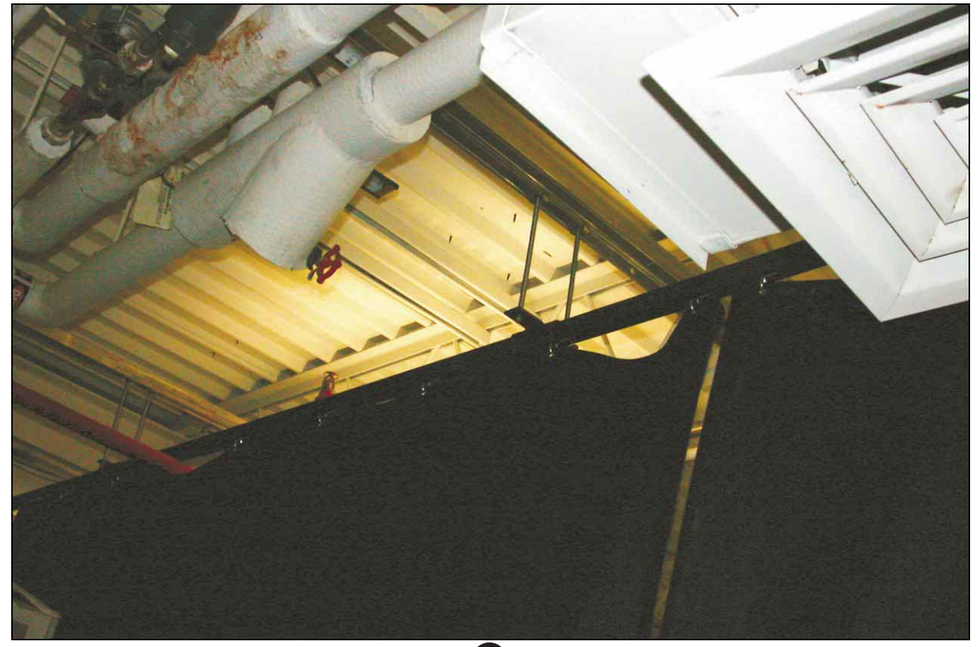
SHEET TITLE
OPTICAL LABORATORY C-D228

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-D228-1**



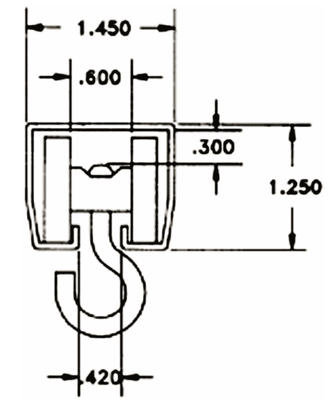
DELICATE INSTRUMENTS

CRATES AND BUBBLE WRAP WILL BE REQUIRED FOR PACKAGING.
INDIVIDUAL CONTRIBUTOR WILL PACKAGE.



4

LASER CURTAIN

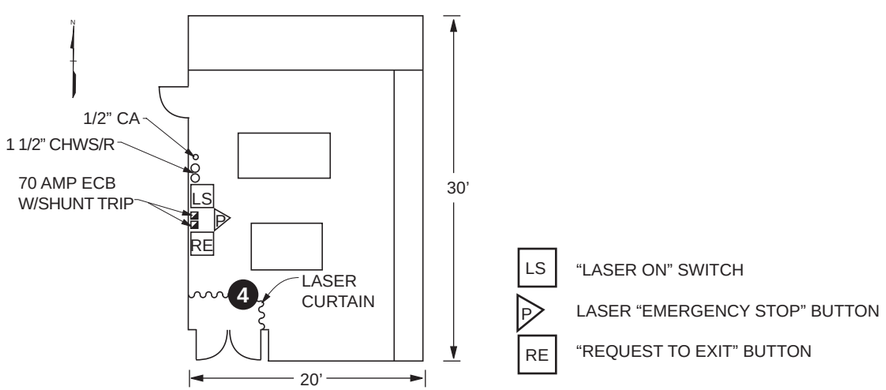


THE CURTAINS HAVE GROMMETS AT THE TOP AND ARE MOUNTED ON THE HOOKS.

SIZE: 9 X 9 (4 SECTIONS)

LOCATION: BUILDING 6010 ROOM 250

REMOVE TWO 9 FOOT SECTIONS OF LASER CURTAIN INSTALL IN BUILDING CBS ROOM C-D228.
EACH 9 FOOT SECTION WEIGHS 25 POUNDS.

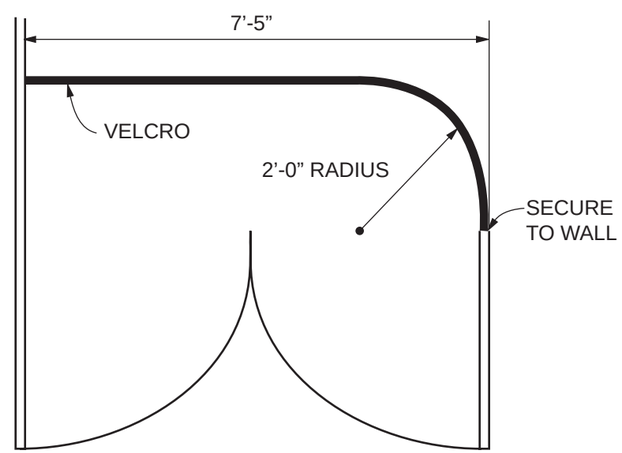


C-D228

LS "LASER ON" SWITCH

P LASER "EMERGENCY STOP" BUTTON

RE "REQUEST TO EXIT" BUTTON



NOTES:

1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-D228.
2. THE INDIVIDUAL CONTRIBUTOR IS YUN LIU, 241-2063.
3. ALL DISCONNECTS AND RECONNECTIONS WILL BE MADE BY YUN LIU.
4. THERE WILL BE APPROXIMATELY 30 BOXES, 27 CRATES (WITH LOTS OF BUBBLE WRAP), AND 3 REGULAR MOVING BOXES OF MISCELLANEOUS EQUIPMENT TO BE MOVED.
5. USE C-D228 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2063

SHEET TITLE

OPTICAL LABORATORY C-D228

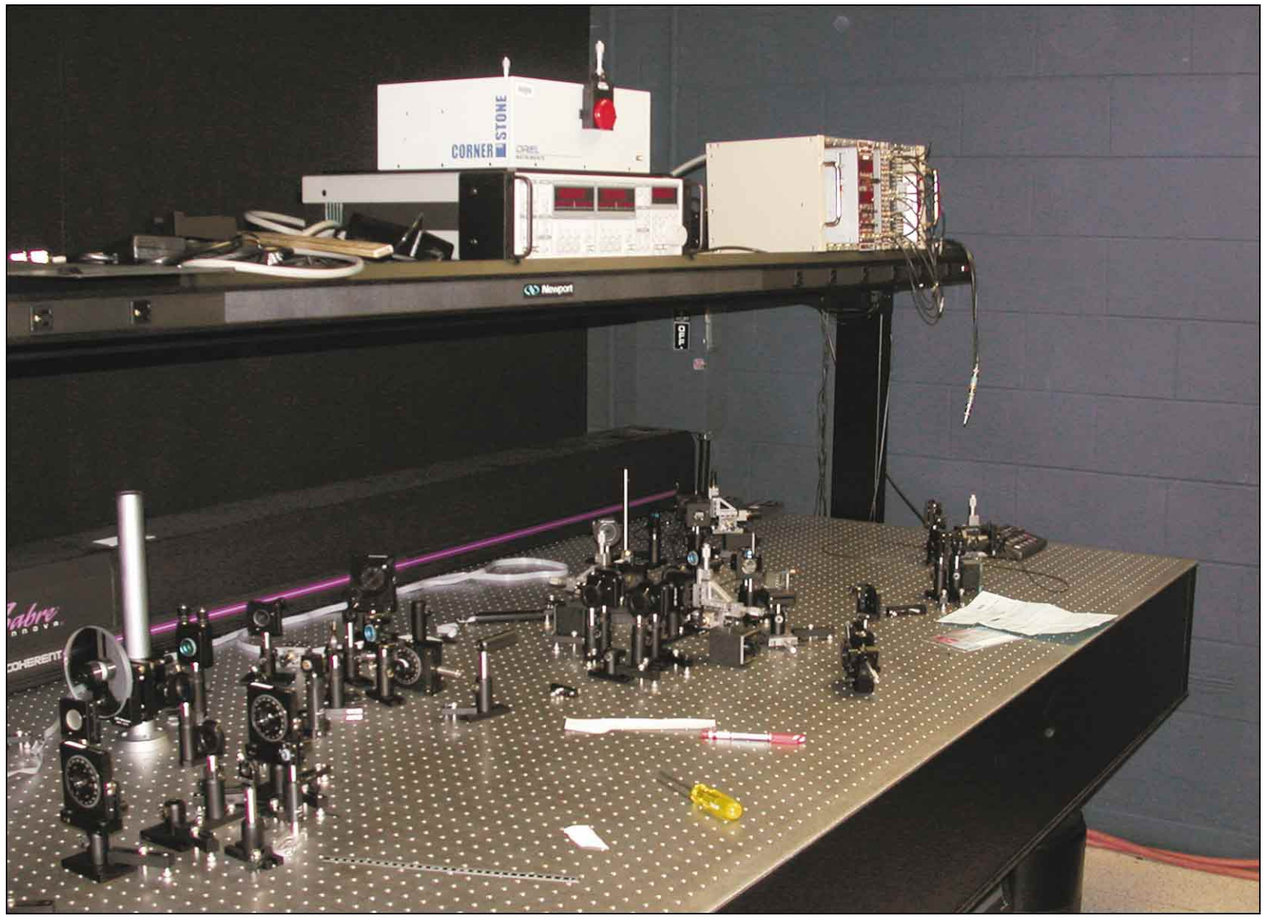
JOB NO 0214-00001

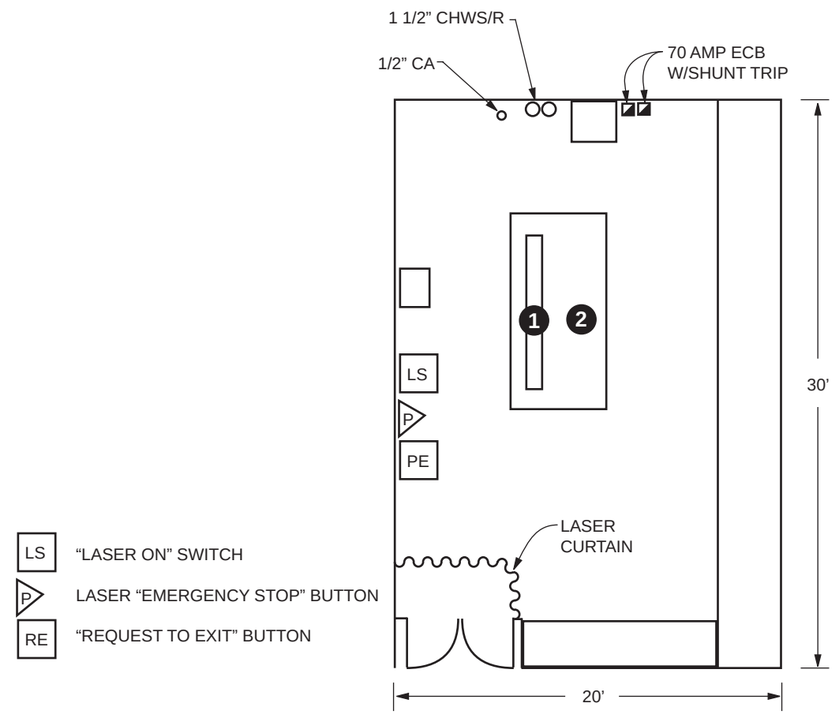
DATE 06/16/03

REV NO 1

SCALE NONE

DWG NO **SK-C-D228-2**





C-D224

1

LASER HEAD

DESCRIPTION: COHERENT, SABRE INNOVA
SIZE: 8' X 8' X 85"
CRATED WEIGHT: 430 POUNDS

UTILITIES: POWER SUPPLY CONNECTION, HEAT EXCHANGER CONNECTION

MOVING REQUIREMENTS: **EXTREMELY FRAGILE!!** A CRATE TO PACKAGE THE LASER HEAD WILL BE FURNISHED BY THE INDIVIDUAL CONTRIBUTOR. THEY WILL ASSIST IN PACKAGING AND MOVING.

2

OPTICAL TABLE

DESCRIPTION: NEWPORT RS-4000 SERIES
SIZE: 5' X 10' X 12" THICK
CRATED WEIGHT: TOP 1800 POUNDS, LEGS 400 POUNDS

UTILITIES: COMPRESSED AIR

SPECIAL MOVING REQUIREMENTS: THE TABLE TOP CAN BE TRANSPORTED VERTICALLY FOR **SHORT** PERIODS OF TIME.

NOTES:

1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-D224.
2. THE INDIVIDUAL CONTRIBUTOR IS WARREN GRICE, 241-2061.
3. THE DISCONNECTS AND RECONNECTIONS OF POWER AND WATER TO THE LASER HEAD WILL BE MADE BY THE INDIVIDUAL CONTRIBUTOR.
4. THERE WILL BE APPROXIMATELY 3 BOXES AND 27 CRATES OF MISCELLANEOUS EQUIPMENT TO BE MOVED.
5. USE C-D224 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2064

SHEET TITLE
OPTICAL LABORATORY C-D224

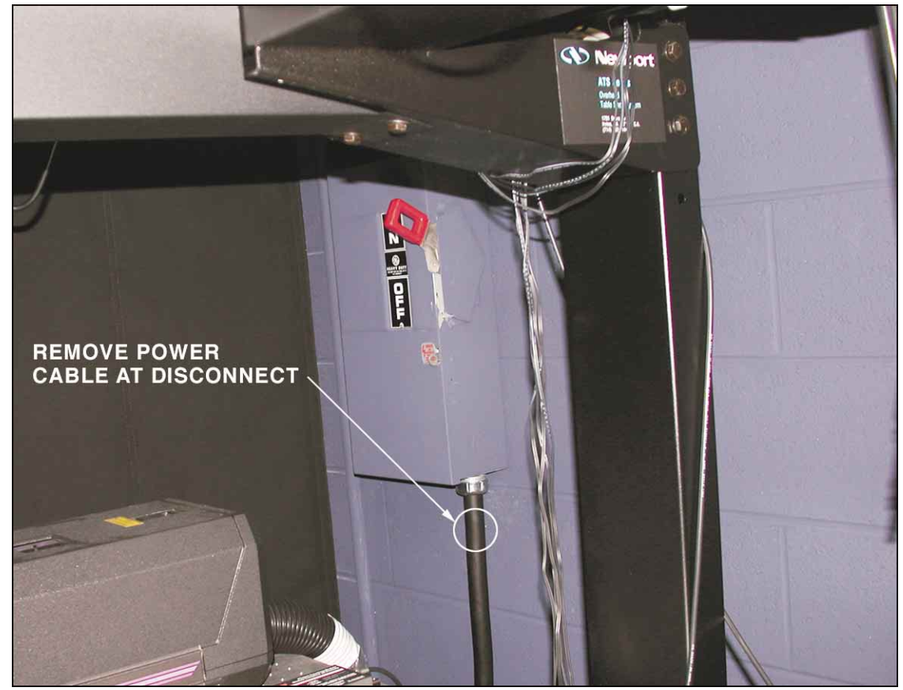
JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-D224-1**

3

HEAT EXCHANGER

DESCRIPTION: COHERENT, SABRE INNOVA
SIZE: 19” X 23” X 20” HIGH
WEIGHT: 225 POUNDS

UTILITIES: SUPPLY WATER, RETURN WATER

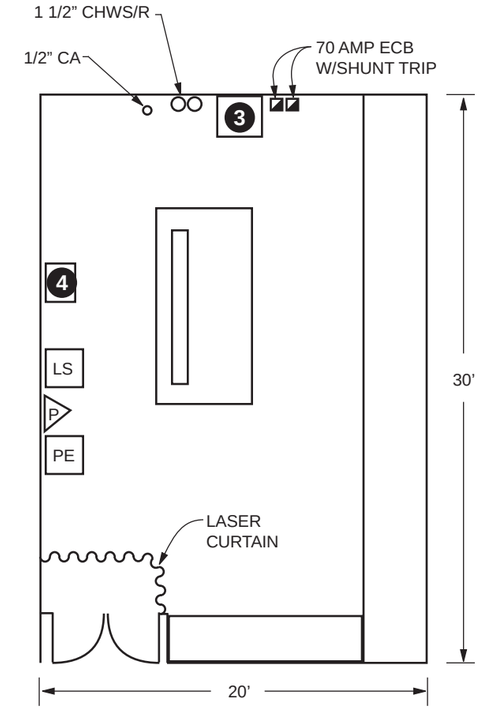


4

POWER SUPPLY

DESCRIPTION: COHERENT, SABRE INNOVA
SIZE: 19” X 23” X 20” HIGH
WEIGHT: 295 POUNDS

UTILITIES: 480 V, 3 PHASE, 60 HZ



C-D224

LS	“LASER ON” SWITCH
P	LASER “EMERGENCY STOP” BUTTON
RE	“REQUEST TO EXIT” BUTTON

CLOSE VALVE, REMOVE HOSE AND PLUG PIPE

NOTES:

1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-D224.
2. THE INDIVIDUAL CONTRIBUTOR IS WARREN GRICE, 241-2061.
3. THE DISCONNECTS AND RECONNECTIONS OF POWER AND WATER TO THE LASER HEAD WILL BE MADE BY THE INDIVIDUAL CONTRIBUTOR.
4. THERE WILL BE APPROXIMATELY 3 BOXES AND 27 CRATES OF MISCELLANEOUS EQUIPMENT TO BE MOVED.
5. USE C-D224 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2064

SHEET TITLE

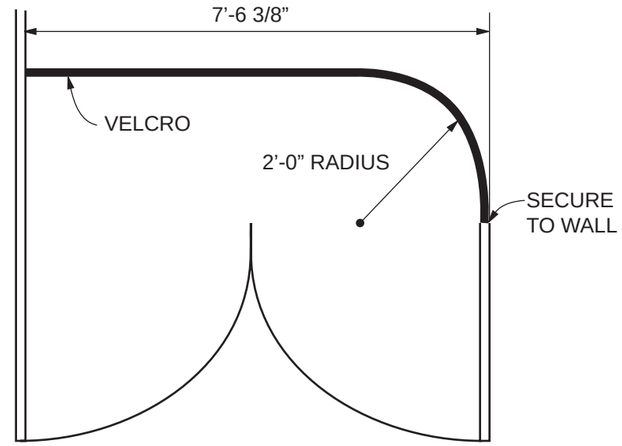
OPTICAL LABORATORY C-D224

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-D224-2**

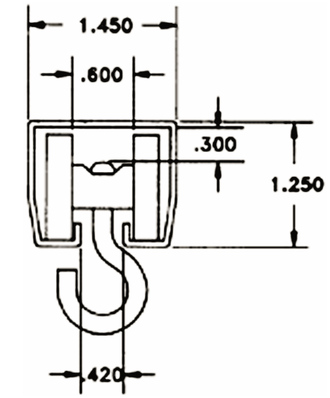
5

LASER CURTAIN WITH VALANCE

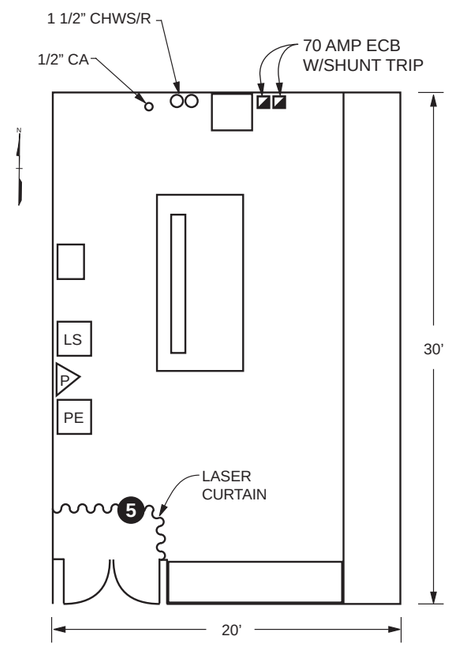
SIZE: 9 X 9 (2 SECTIONS), 11 X 9 (ONE SECTION)
LOCATION: BUILDING 6010 ROOM 250.



REMOVE ONE 11-FOOT SECTIONS OF LASER CURTAIN W/VALANCE AND INSTALL IN BUILDING CSB, ROOM 1065.



THE CURTAINS HAVE GROMMETS AT THE TOP AND ARE MOUNTED ON THE HOOK.



LS "LASER ON" SWITCH
P LASER "EMERGENCY STOP" BUTTON
RE "REQUEST TO EXIT" BUTTON

C-D224

NOTES:

1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-D224.
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5. USE C-D224 SUFFIX FOR ALL EQUIPMENT TAGS.

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1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2064

SHEET TITLE
OPTICAL LABORATORY C-D224

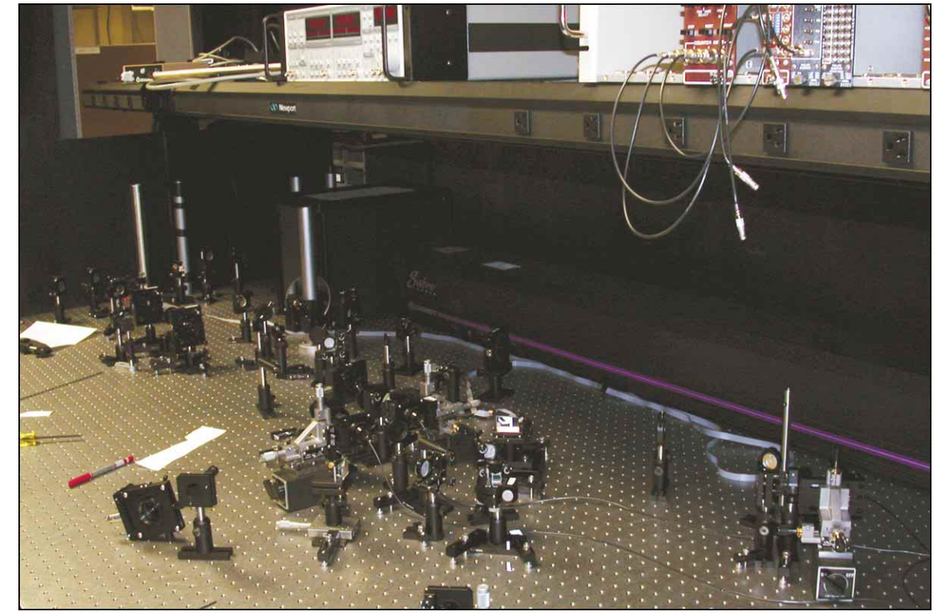
JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-D224-3**

3

TABLE AND MISCELLANEOUS EQUIPMENT

4

PC, DESK AND CHAIR



DELICATE INSTRUMENTS

CRATES AND BUBBLE WRAP WILL BE REQUIRED FOR PACKAGING.

INDIVIDUAL CONTRIBUTOR WILL PACKAGE.

NOTES:

1. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-D224.
2. THE INDIVIDUAL CONTRIBUTOR IS WARREN GRICE, 241-2061.
3. THE DISCONNECTS AND RECONNECTIONS OF POWER AND WATER TO THE LASER HEAD WILL BE MADE BY THE INDIVIDUAL CONTRIBUTOR.
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1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C2064

SHEET TITLE

OPTICAL LABORATORY C-D224

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-C-D224-4**

Equipment to be moved to CAVE Lab C-B228:

TAG C-B228-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
CAVE1	Projector 1 w/stand (Electrohome serial #3134-00005	28 1/2” x 30” x 23 1/2”	ORNL Building 6010	SK-C-B228-5	SK-C-B228-11
CAVE2	Projector 2 w/stand (Electrohome serial #3105-00005)	28 1/2” x 30” x 23 1/2”	ORNL Building 6010	SK-C-B228-5	SK-C-B228-11
CAVE3	Projector 3 w/stand (Electrohome serial #3134-00007)	28 1/2” x 30” x 23 1/2”	ORNL Building 6010	SK-C-B228-5	SK-C-B228-11
CAVE4	Projector 4 w/overhead mounting (Electrohome serial #3134-00001)	28 1/2” x 30” x 17 1/2”	ORNL Building 6010	SK-C-B228-6	SK-C-B228-11
CAVE1	Mirror 1 w/stand (Mirrorlite)	60” x 72”	ORNL Building 6010	SK-C-B228-5	SK-C-B228-11
CAVE2	Mirror 2 w/stand (Mirrorlite)	60” x 72”	ORNL Building 6010	SK-C-B228-5	SK-C-B228-11
CAVE3	Mirror 3 w/stand (Mirrorlite)	60” x 72”	ORNL Building 6010	SK-C-B228-5	SK-C-B228-11
CAVE4	Mirror 4 w/overhead mounting	60” x 56”	ORNL Building 6010	SK-C-B228-6	SK-C-B228-11
BOX	Box - Plywood base, unistrut frame and screen on 3 sides	96” x 96” x 97”	ORNL Building 6010	SK-C-B228-4	SK-C-B228-11
5	Onyx computer cabinet	30” x 24” x 60”	ORNL Building 6010	SK-C-B228-2	SK-C-B228-11
6	Computer Rack	24” x 30” x 84”	ORNL Building 6010	SK-C-B228-2	SK-C-B228-11
7	Electronic Rack	24” x 24” x 86”	ORNL Building 6010	SK-C-B228-3	SK-C-B228-11
8	Work Stations w/Computer Equipment	144” x 30” x 30”	ORNL Building 6010	SK-C-B228-2	SK-C-B228-11
9	I-Desk w/Blue Equipment Rack	9’ x 9’ x 9’	ORNL Building 6012	SK-C-B228-3	SK-C-B228-11
10	Filing Cabinet, Lateral File			SK-C-B228-3	SK-C-B228-11
11	Monitor, Modular Furniture			SK-C-B228-3	SK-C-B228-11
12	2 Transport Boxes	2’ x 2’ x 2’	ORNL Building 6012		
13	Fouton		Offsite		

CAVE LAB C-B228 DRAWING INDEX

Drawing No.	Title
SK-C-B228-1	Drawing Index and Equipment List
SK-C-B228-2	CAVE Lab Disassembly Drawing No. 1
SK-C-B228-3	CAVE Lab Disassembly Drawing No. 2
SK-C-B228-4	CAVE Lab Disassembly Drawing No. 3
SK-C-B228-5	CAVE Lab Disassembly Drawing No. 4
SK-C-B228-6	CAVE Lab Disassembly Drawing No. 5
SK-C-B228-7	CAVE Lab - Front View
SK-C-B228-8	CAVE Lab - Isometric View
SK-C-B228-9	CAVE Lab - Right Side View
SK-C-B228-10	CAVE Lab - Top View
SK-C-B228-11	CAVE Lab Installation Drawing

NOTES:
1. ROSS TOEDTE (574-1912) WILL FIELD DIRECT THE CONNECTION OF EQUIPMENT BEING MOVED TO THE CAVE LAB C-B228.
2. USE C-B228 SUFFIX FOR ALL EQUIPMENT TAGS.
3. MATERIAL AND EQUIPMENT STORED IN CABINETS AND CASES AND ON BENCHES WILL BE BOXED PRIOR TO THE MOVE.
4. PROTECT ELECTRICAL EQUIPMENT FROM RAIN DURING MOVE.
5. THERE WILL BE APPROXIMATELY 30 BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.

COMPUTATIONAL SCIENCE BUILDING
CAVE LAB C-B228

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

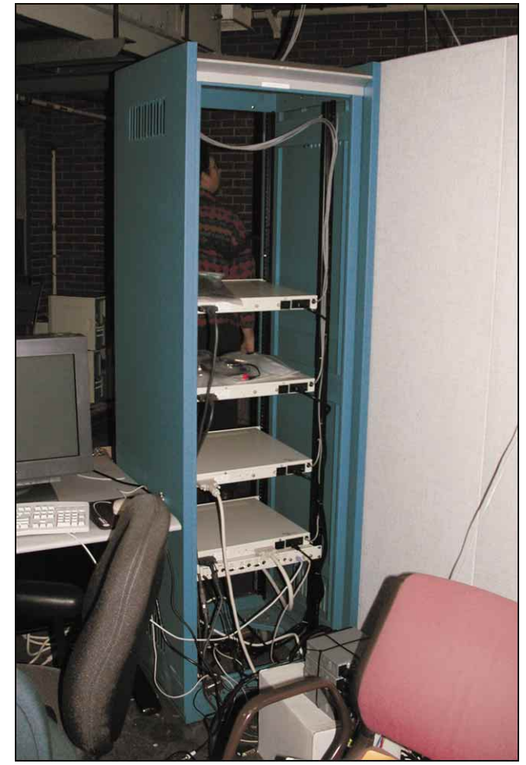
OLD ROOM NUMBER: C2078

SHEET TITLE
CAVE LABORATORY C-B228
DRAWING INDEX AND EQUIPMENT LIST

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-B228-1**

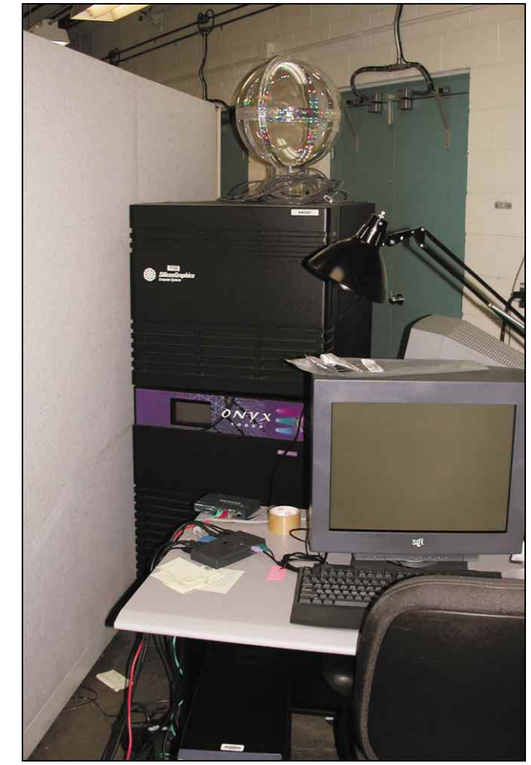
1

WORKSTATIONS



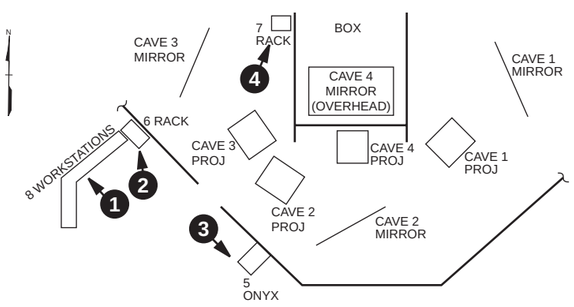
2

COMPUTER RACK

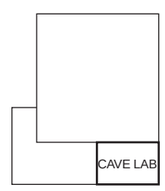


3

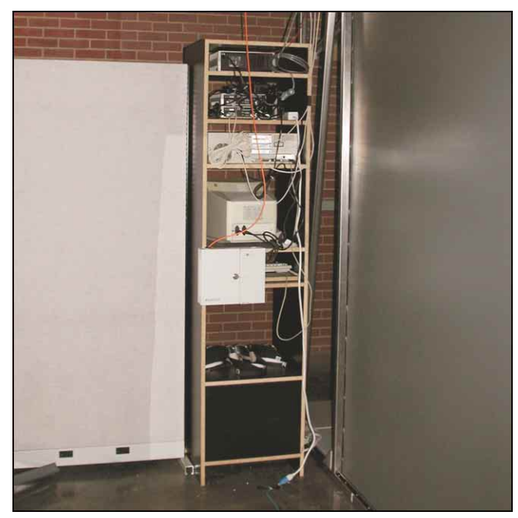
ONYX



COMPUTATIONAL SCIENCE BUILDING
CAVE LAB C-B228



BUILDING 6010



4

ELECTRONIC RACK
(REAR VIEW)

NOTES:
1. USE C-B228 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C2078

SHEET TITLE

CAVE LABORATORY C-B228
DISASSEMBLY DRAWING NO. 1

JOB NO 0214-00001

DATE 06/16/03

REV NO 1

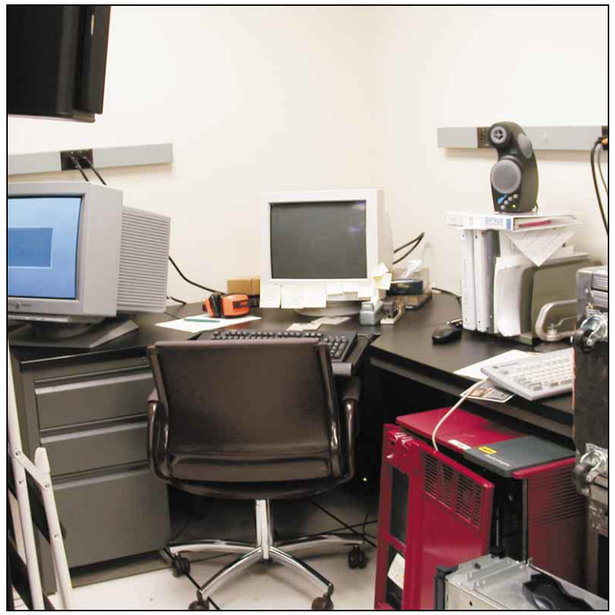
SCALE NONE

DWG NO **SK-C-B228-2**

1

FILING CABINET, LATERAL FILE

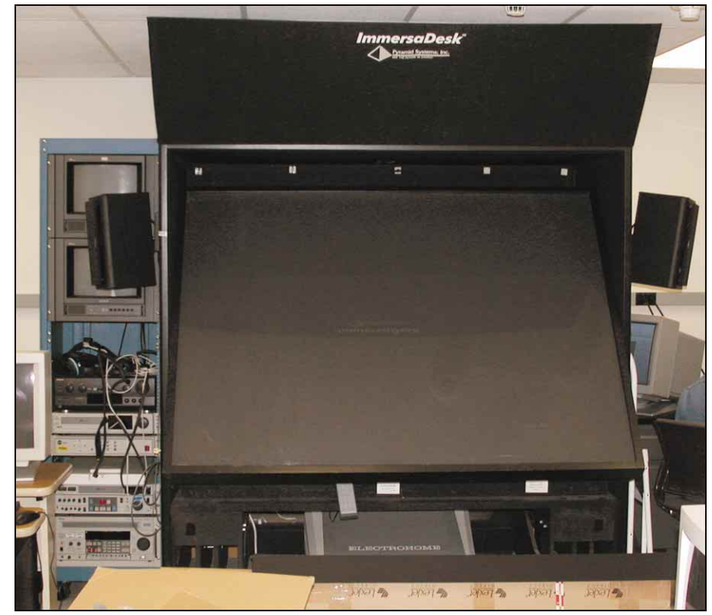
LOCATED IN ROOM 216, BLDG. 6012. (AN ADDITIONAL BLACK, 7 DRAWER LATERAL FILE TO BE MOVED FROM BUILDING 6012 LOCATED IN THE HALLWAY ACROSS FROM ROOM 222).



2

LARGE MONITOR, MODULAR FURNITURE AND CHEST

LOCATED IN THE COMPUTER ROOM, BLDG. 6012



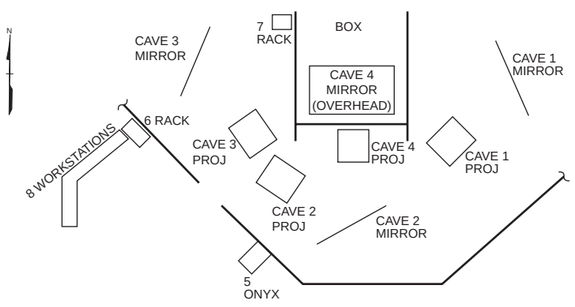
3

BLUE EQUIPMENT RACK

IMMERSA DESK (FRONT VIEW)

IMMERSA DESK (SIDE VIEW)

LOCATED IN THE COMPUTER ROOM, BLDG. 6012



COMPUTATIONAL SCIENCE BUILDING
CAVE LAB C-B228

NOTES:
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NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2078

SHEET TITLE
CAVE LABORATORY C-B228
DISASSEMBLY DRAWING NO. 2

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-B228-3**

1

BOX - 8' x 8' WITH SCREEN ON THREE SIDES

ROLL SCREEN AROUND CARDBOARD TUBE. DO NOT FOLD OR CREASE

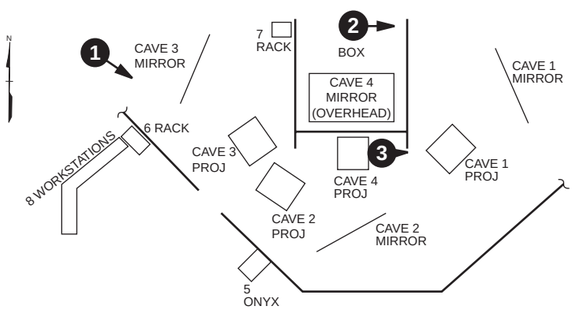
2

BOX - FRAMING AND SCREEN DETAIL

DISCONNECT UNISTRUT FRAME AT MINIMUM NUMBER OF PLACES TO PERMIT MOVING. CLEARLY IDENTIFY POINTS OF DISCONNECTION TO ASSIST INSTALLATION IN ROOM C-B228.

3

BOX - FRAMING AND SCREEN DETAIL



COMPUTATIONAL SCIENCE BUILDING
CAVE LAB C-B228

NOTES:
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CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2078

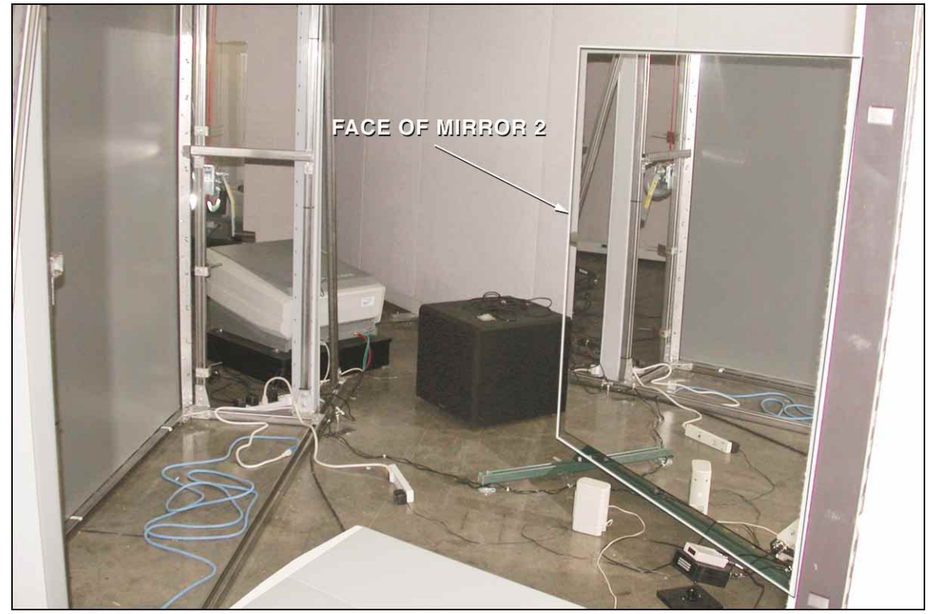
SHEET TITLE
CAVE LABORATORY C-B228
DISASSEMBLY DRAWING NO. 3

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-B228-4**

1

CAVE 2 MIRROR

MIRRORLITE MIRROR FRAME



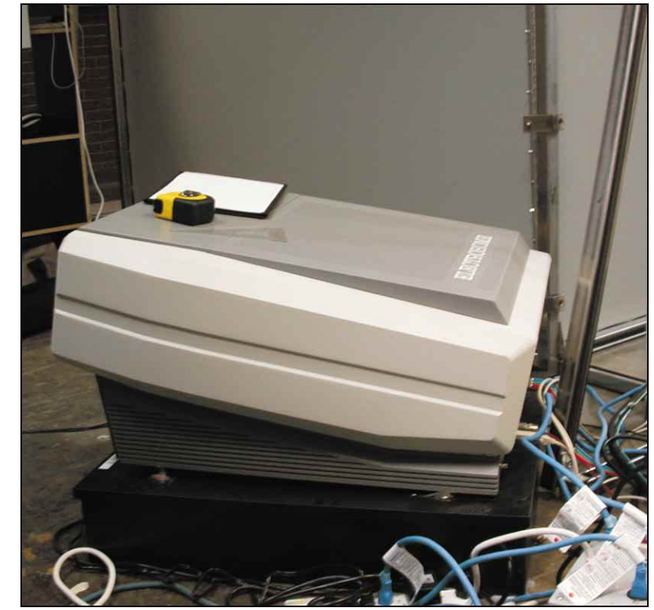
2

CAVE 2 MIRROR

MIRRORLITE MIRROR
TYPICAL FOR THREE 60” X 72” MIRRORS ON FLOOR MOUNTED FRAMES

SHARP OBJECTS (TOOLS, FINGERNAILS, ETC.) MUST NOT BE ALLOWED TO TOUCH FACE OF MIRRORS.

(OTHER MOVING REQUIREMENTS/RECOMMENDATIONS HAVE BEEN REQUESTED FROM MIRRORLITE)

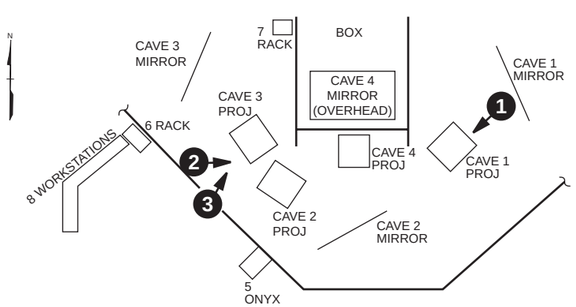


3

CAVE 2 PROJECTOR

ELECTROHOME PROJECTOR
TYPICAL FOR THREE PROJECTORS MOUNTED ON WOODEN BOXES.

DO NOT REMOVE PROJECTOR FROM BOX FOR MOVE.



COMPUTATIONAL SCIENCE BUILDING
CAVE LAB C-B228

NOTES:
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NO	DATE	REVISION	BY	CK	APPR
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CHECKED BY	
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PM APPR	
CLIENT APPR	

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SHEET TITLE
CAVE LABORATORY C-B228
DISASSEMBLY DRAWING NO. 4

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-C-B228-5**

1

CAVE 4 PROJECTOR

ELECTROHOME PROJECTOR SUPPORTED BY OVERHEAD FRAME

2

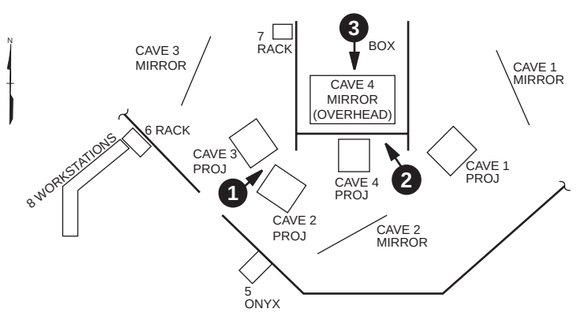
CAVE 4 MIRROR

MIRRORLITE MIRROR
60” X 56” MIRROR SUPPORTED BY OVERHEAD FRAME.

3

CAVE 4 PROJECTOR

MECHANISM FOR ADJUSTING OVERHEAD ELECTROHOME PROJECTOR.



COMPUTATIONAL SCIENCE BUILDING
CAVE LAB C-B228

NOTES:
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NO	DATE	REVISION	BY	CK	APPR
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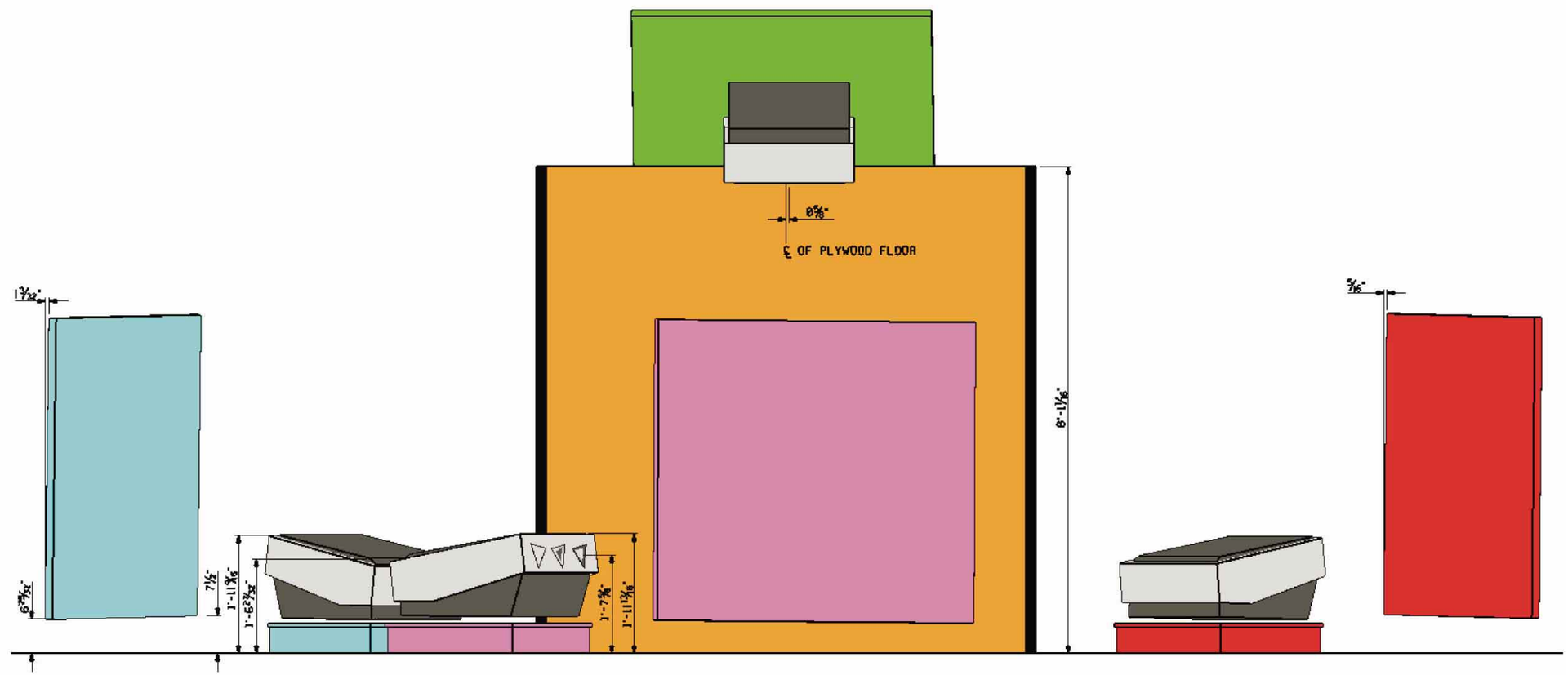
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2078

SHEET TITLE
CAVE LABORATORY C-B228
DISASSEMBLY DRAWING NO. 5

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-B228-6**



NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2078

SHEET TITLE

CAVE LABORATORY C-B228
FRONT VIEW

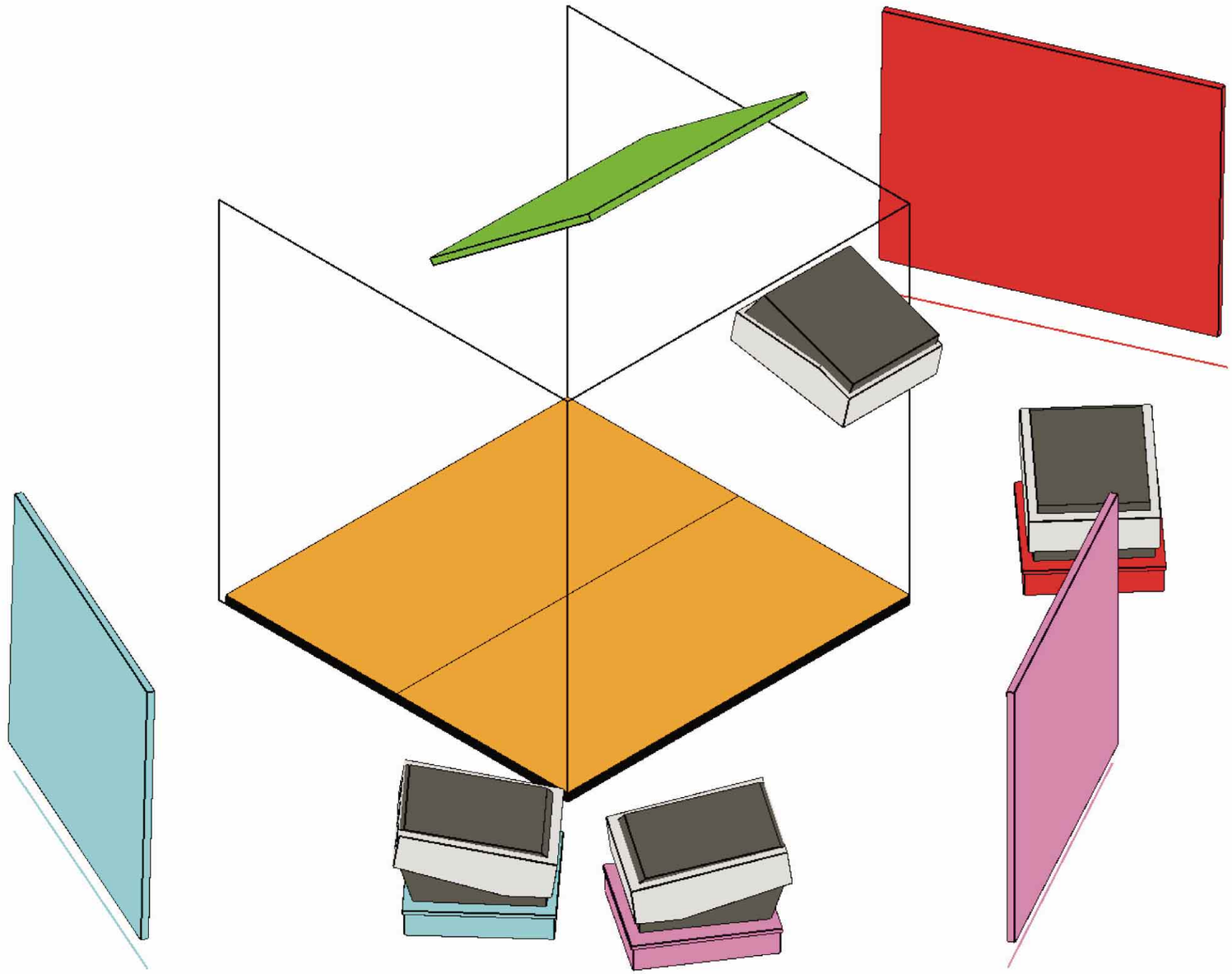
JOB NO 0214-00001

DATE 06/16/03

REV NO 1

SCALE NONE

DWG NO **SK-C-B228-7**



NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2078

SHEET TITLE

CAVE LABORATORY C-B228
ISOMETRIC VIEW

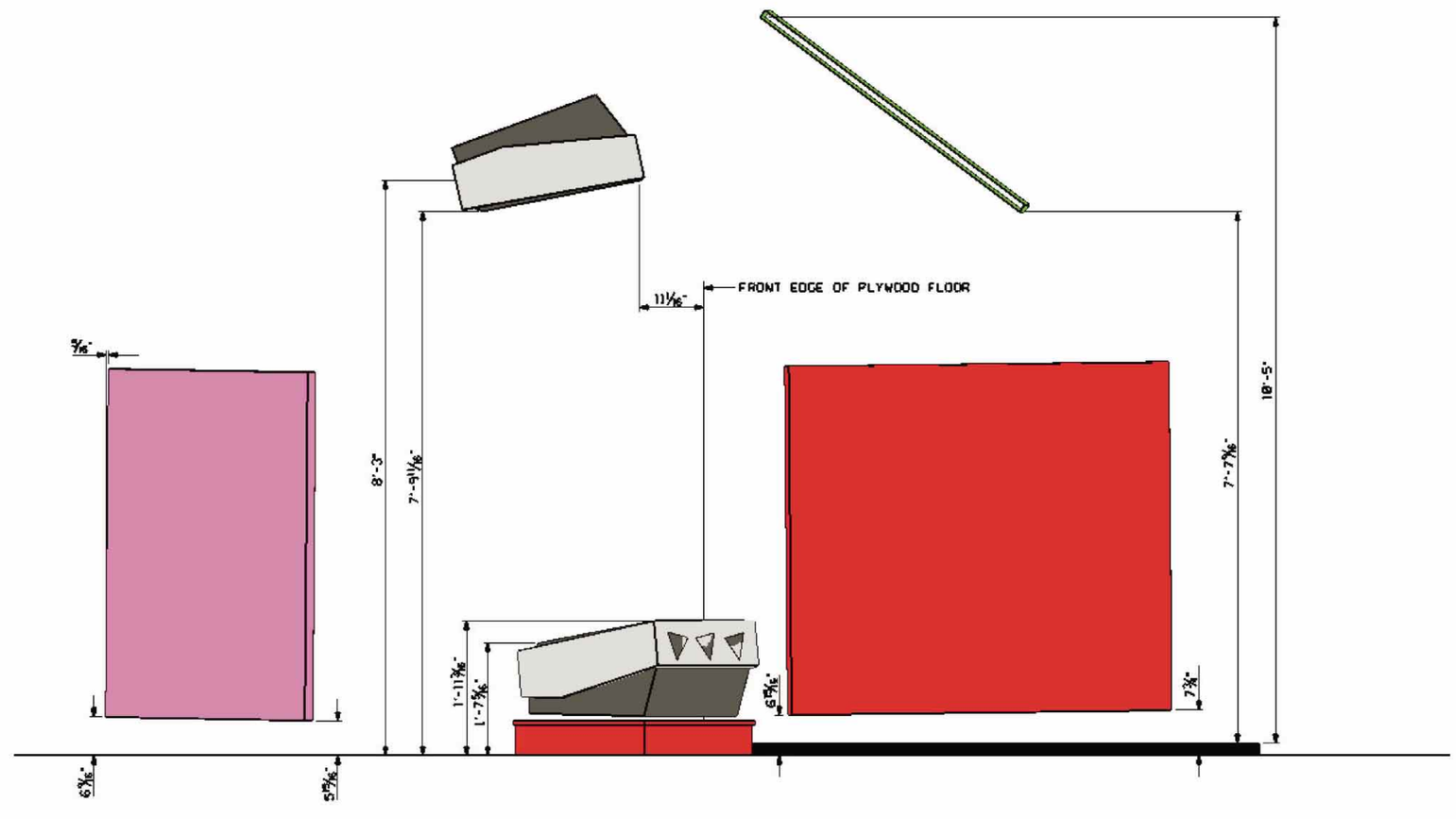
JOB NO 0214-00001

DATE 06/16/03

REV NO 1

SCALE NONE

DWG NO **SK-C-B228-8**



NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

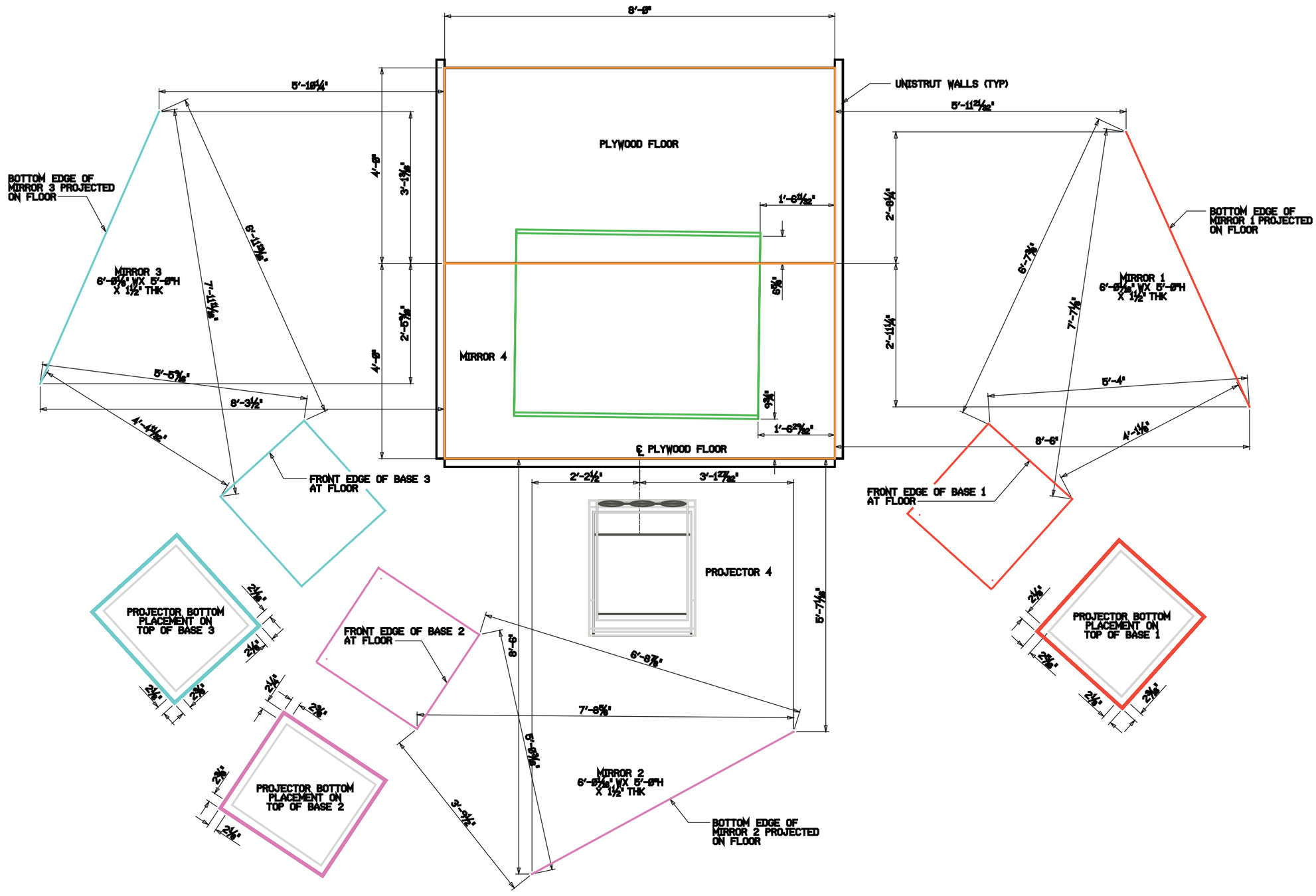
PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C2078

SHEET TITLE

CAVE LABORATORY C-B228
RIGHT SIDE VIEW

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-C-B228-9**



NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

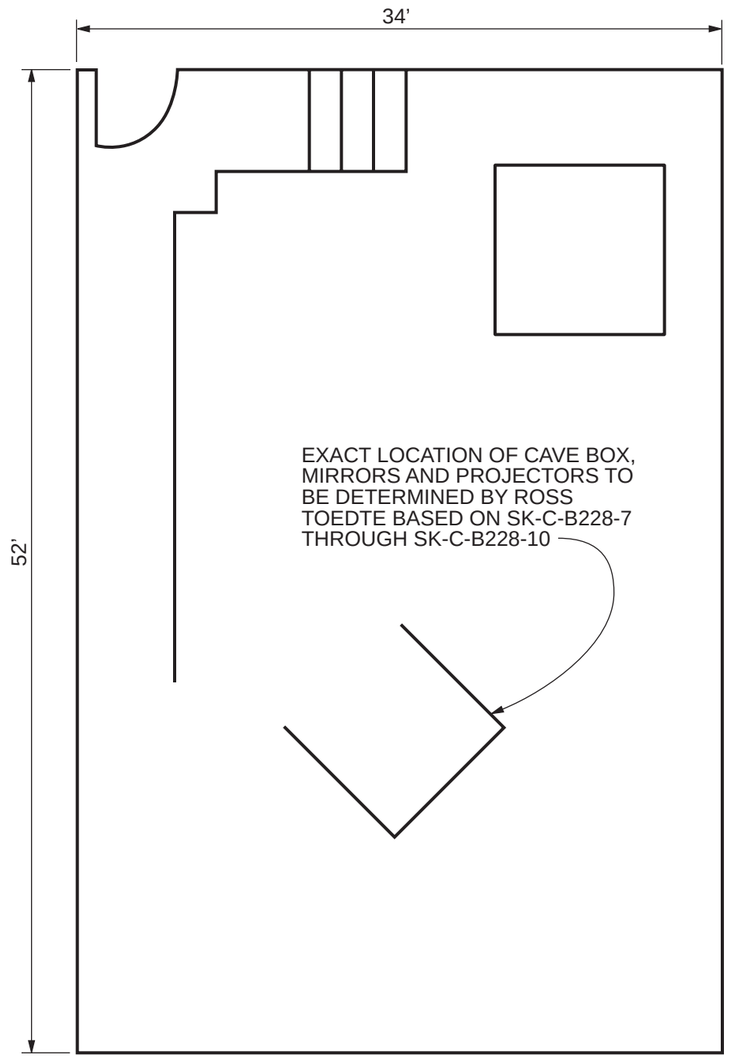
PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C2078

SHEET TITLE

CAVE LABORATORY C-B228
TOP VIEW

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-C-B228-10**



CAVE LAB FLOOR PLAN

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2078

SHEET TITLE

CAVE LABORATORY C-B228 INSTALLATION DRAWING

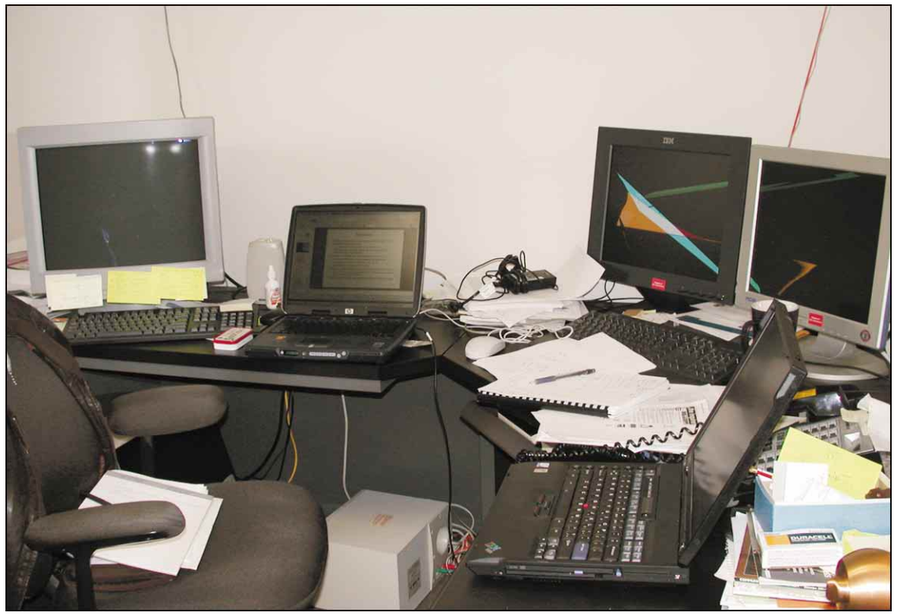
JOB NO 0214-00001

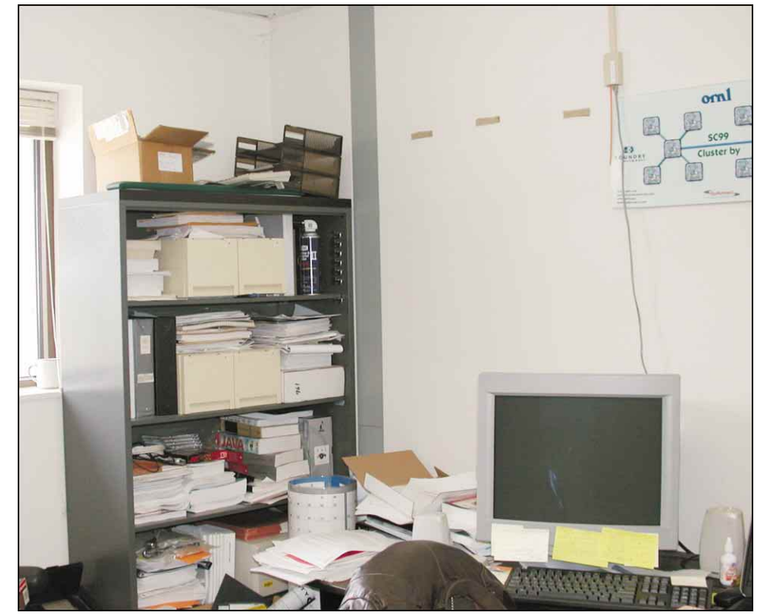
DATE 06/16/03

REV NO 1

SCALE 1/8"=1'-0"

DWG NO **SK-C-B228-11**

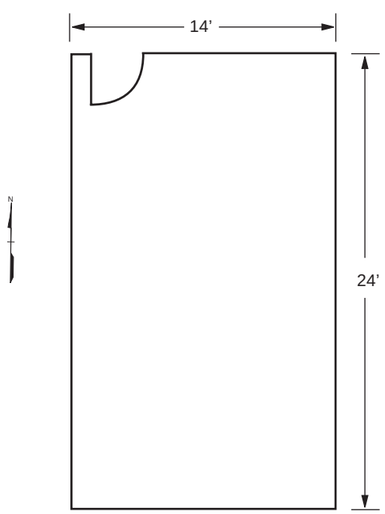




1

3 BOOK CASES, 1 VERTICAL FILE, MODULAR FURNITURE

FURNITURE ONLY TO BE MOVED



C-B208

NOTES:
1. CONTACT ROSS TOEDTE, 574-1912, FOR ADDITIONAL INFORMATION.
2. USE C-B208 SUFFIX FOR ALL EQUIPMENT TAGS.
3. THE EQUIPMENT IS BEING MOVED FROM BUILDING 6012.
4. THERE WILL BE NO BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2081

SHEET TITLE

VIZ LABORATORY C-B208

JOB NO 0214-00001

DATE 06/16/03

REV NO 1

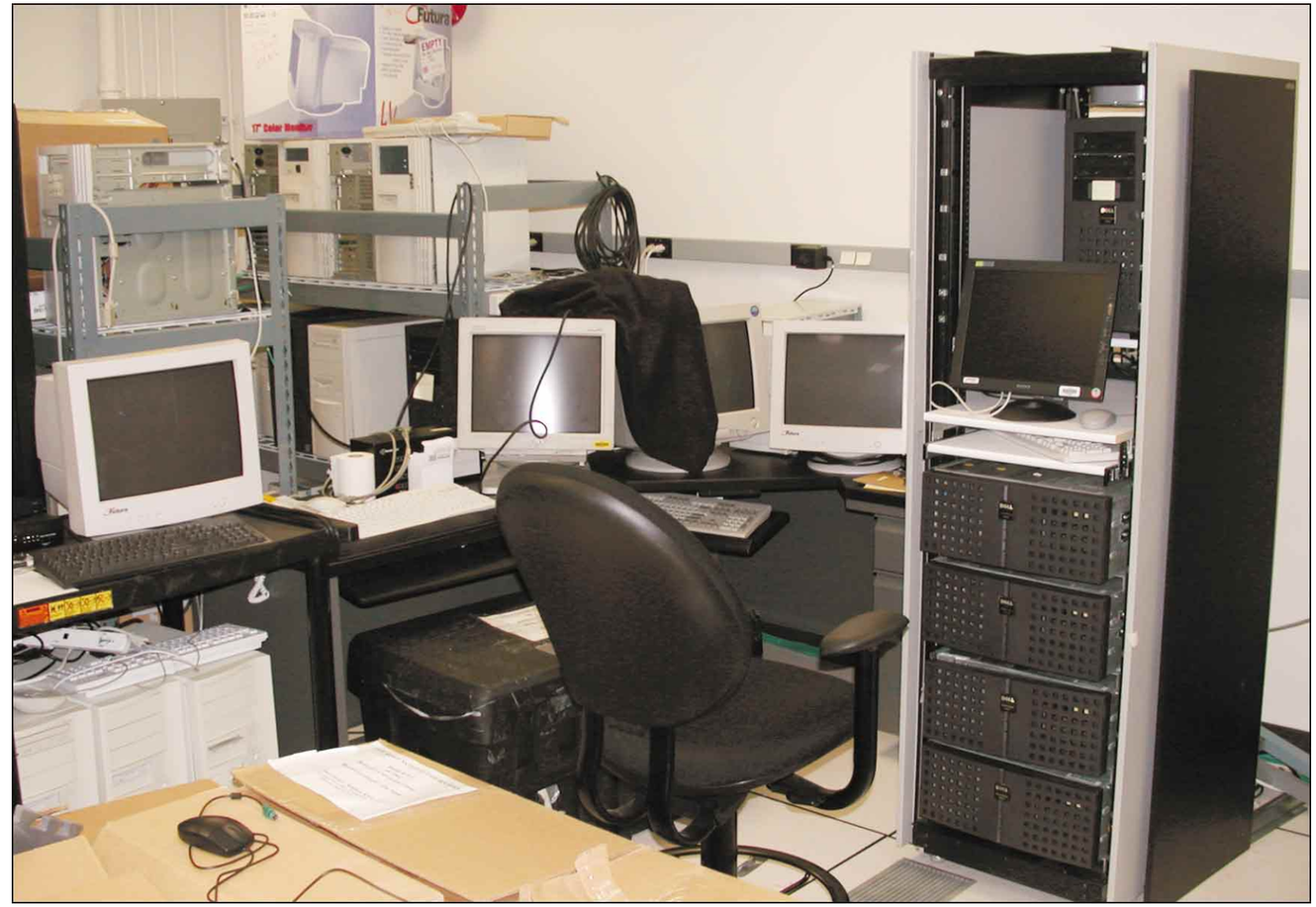
SCALE NONE

DWG NO **SK-C-B208-1**

1

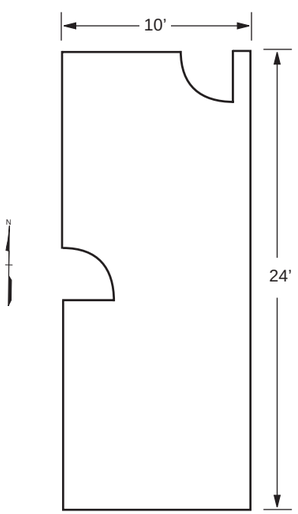
EQUIPMENT RACKS

SIZE: 24” W X 7’ TALL



2

MODULAR FURNITURE ONLY TO BE MOVED



C-B210

NOTES:
1. CONTACT ROSS TOEDTE, 574-1912, FOR ADDITIONAL INFORMATION.
2. USE C-B210 SUFFIX FOR ALL EQUIPMENT TAGS.
3. THE EQUIPMENT IS BEING MOVED FROM THE COMPUTER ROOM, BUILDING 6012.
4. THERE WILL BE APPROXIMATELY 1 BOX TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C2082

SHEET TITLE

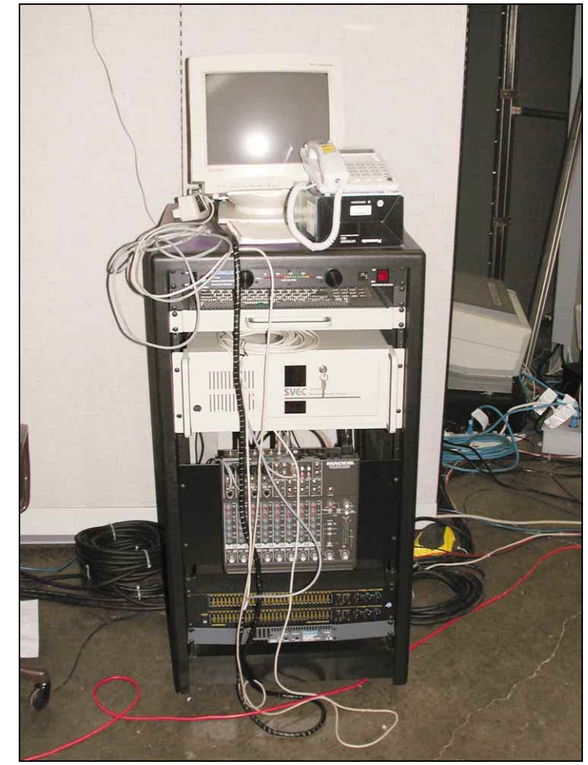
VIDEO LABORATORY C-B210

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-C-B210-1**

1

FURNITURE ONLY

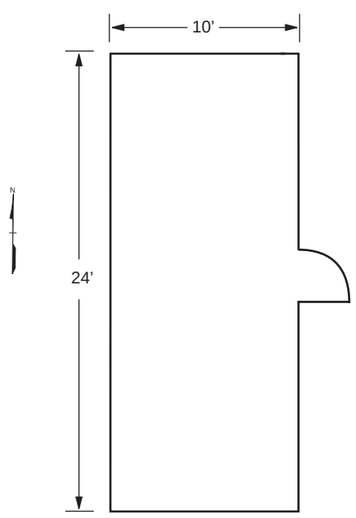
MOVED FROM THE COMPUTER ROOM, BUILDING 6012



2

MIXER

MOVED FROM THE CAVE LAB, BUILDING 6010



C-B210-A

NOTES:
1. CONTACT ROSS TOEDTE, 574-1912, FOR ADDITIONAL INFORMATION.
2. USE C-B210-A SUFFIX FOR ALL EQUIPMENT TAGS.
3. THE EQUIPMENT IN PHOTO NUMBER 1 IS BEING MOVED FROM THE COMPUTER ROOM, BUILDING 6012. THE EQUIPMENT IN PHOTO 2 IS BEING MOVED FROM THE CAVE IN BUILDING 6010.
4. THERE WILL BE APPROXIMATELY 2 BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C2083

SHEET TITLE

AUDIO LABORATORY C-B210-A

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-C-B210-A-1**

1

HERMIES III

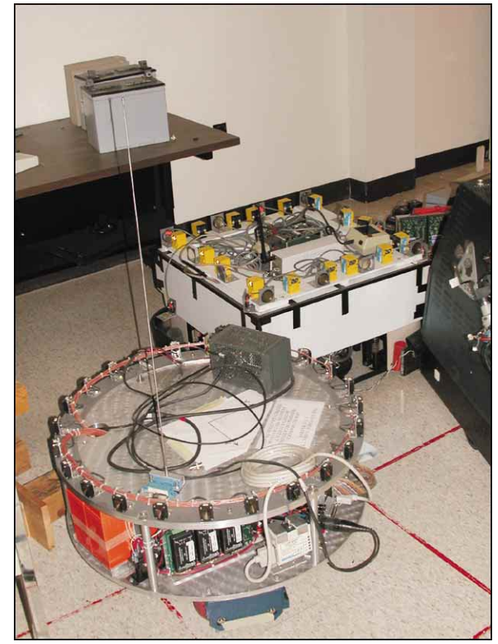
SIZE: 50” X 62” X 64” HIGH
WEIGHT: 2000 POUNDS
MOBILITY: 4 CASTERS, ONE AT EACH CORNER AND TWO WHEELS IN THE CENTER SECTION.
SPECIAL PACKAGING: NONE, BUT 4 EXTRA BOXES FOR MISCELLANEOUS EQUIPMENT.

SEE NOTE 5

2

HERMIES IIB

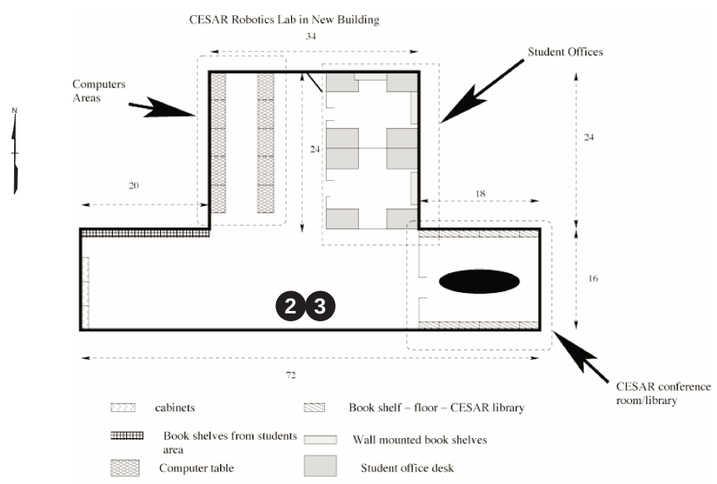
SIZE: 24” X 24” X 41” HIGH
MOBILITY: ON WHEELS



3

OSCAR, LABMATE AND OHP

SIZE: 33” IN DIAMETER, 30” SQUARE, 31” IN DIAMETER
MOBILITY: ALL ARE ON WHEELS, BUT OSCAR AND OHP CAN NOT BE ROLLED.
SPECIAL PACKAGING: CRATE OR MONITOR TRANSPORT



ROBOTICS

NOTES:

1. CONTACT DAVID REISTER, 574-2272, OR BETSY RILEY, 574-5452 FOR ADDITIONAL INFORMATION.
2. USE C-B216 SUFFIX FOR ALL EQUIPMENT TAGS.
3. THIS EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-B216.
4. THERE WILL BE APPROXIMATELY 250 BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.
5. DISPOSITION OF HERMIES III HAS NOT BEEN DETERMINED.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

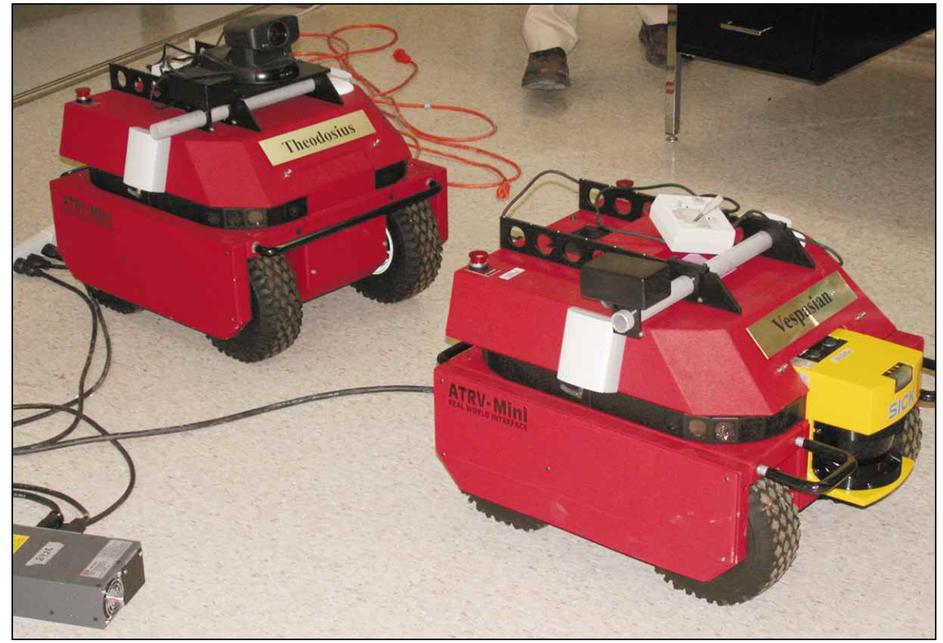
PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

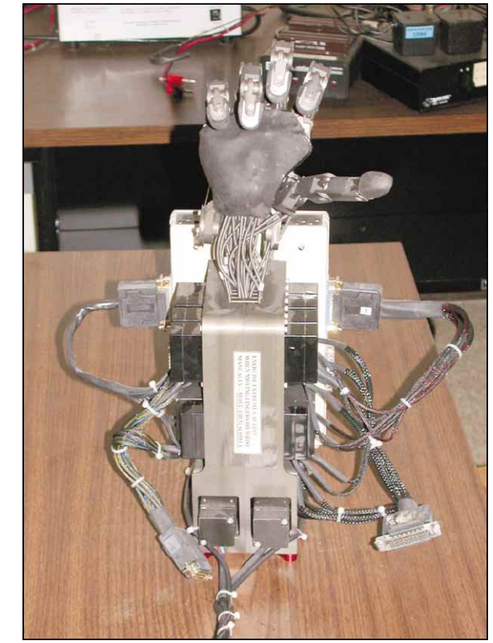
OLD ROOM NUMBER: C2084

SHEET TITLE

ROBOTICS LABORATORY C-B216

JOB NO 0214-00001	DATE 06/16/03
	REV NO 2
SCALE NONE	DWG NO **SK-C-B216-1**





4

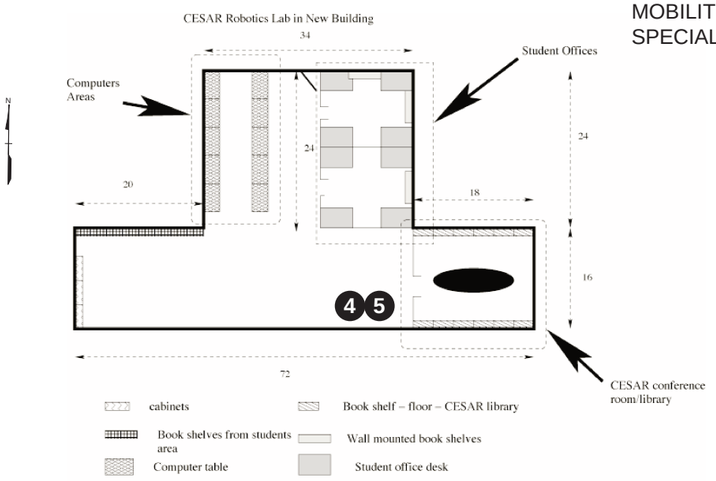
ATRV-MINI

QUANTITY: THREE
SIZE: HADRIAN, 17” X 21” X 22”
VESPASIAN, 28” X 19” X 22”
THEODOSIUS, 23” X 25” X 23”
MOBILITY: ON WHEELS
SPECIAL PACKAGING: CRATE OR MONITOR TRANSPORT.

5

ATLAS HAND

QUANTITY: 1
SIZE: LARGE HAND
SPECIAL PACKAGING:
CRATE OR MONITOR TRANSPORT.



ROBOTICS

NOTES:
1. CONTACT DAVID REISTER, 574-2272, OR BETSY RILEY, 574-5452 FOR ADDITIONAL INFORMATION.
2. USE C-B216 SUFFIX FOR ALL EQUIPMENT TAGS.
3. THIS EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-B216.
4. THERE WILL BE APPROXIMATELY 250 BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.

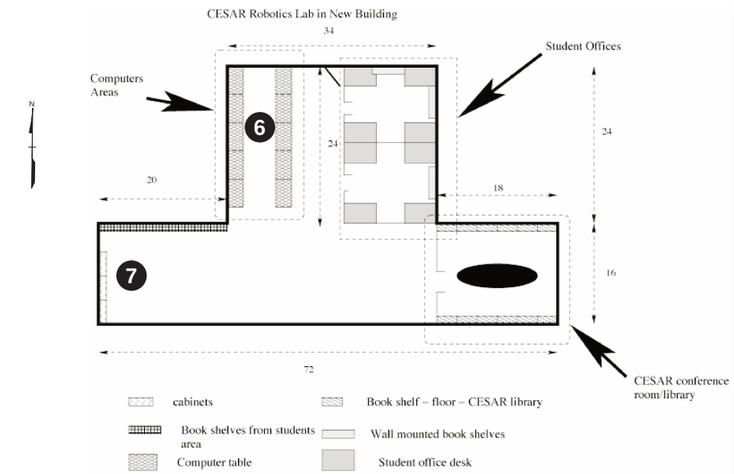
NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C2084

SHEET TITLE
ROBOTICS LABORATORY C-B216

JOB NO 0214-00001
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-C-B216-2**



ROBOTICS

6

COMPUTERS AND PRINTERS

QUANTITY: 14 COMPUTERS, 3 PRINTERS
TABLES NEED TO BE MOVED ALSO.

7

STORAGE CABINETS

QUANTITY: 8 EACH
ASSUME BOXES PER CABINET TO HOLD CONTENTS.

NOTES:
1. CONTACT DAVID REISTER, 574-2272, OR BETSY RILEY, 574-5452 FOR ADDITIONAL INFORMATION.
2. USE C-B216 SUFFIX FOR ALL EQUIPMENT TAGS.
3. THIS EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-B216.
4. THERE WILL BE APPROXIMATELY 250 BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C2084

SHEET TITLE

ROBOTICS LABORATORY C-B216

JOB NO 0214-00001	DATE 06/16/03
	REV NO 2
SCALE NONE	DWG NO **SK-C-B216-3**

8

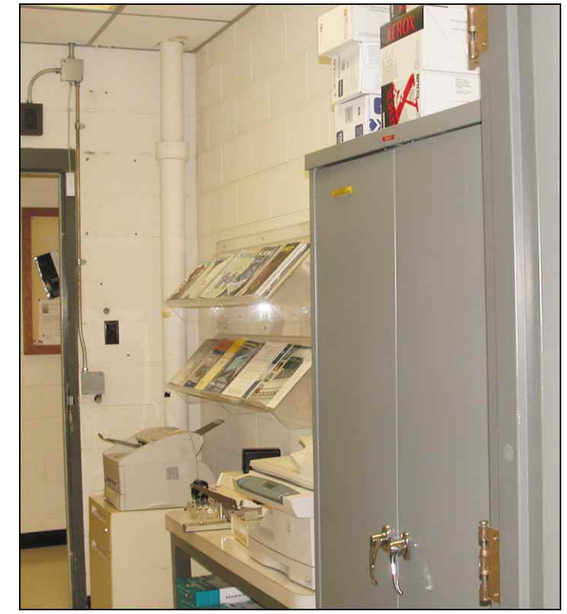
FURNITURE

(TYPICAL 8 OFFICES)

9

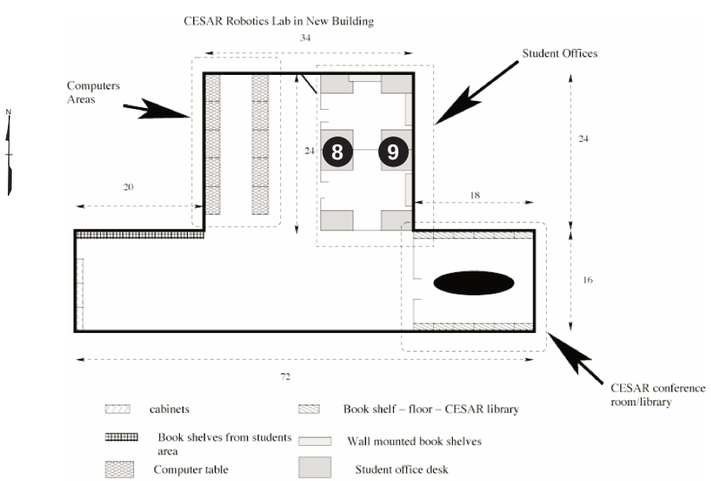
BLUE PARTITIONS

(ENOUGH TO FORM 4 OFFICES)
LITERATURE RACKS TO BE MOVED.



10

FILING CABINET, STORAGE CABINET, LITERATURE RACKS, COPYING EQUIPMENT



ROBOTICS

NOTES:

1. CONTACT DAVID REISTER, 574-2272, OR BETSY RILEY, 574-5452 FOR ADDITIONAL INFORMATION.
2. USE C-B216 SUFFIX FOR ALL EQUIPMENT TAGS.
3. THIS EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-B216.
4. THERE WILL BE APPROXIMATELY 250 BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C2084

SHEET TITLE

ROBOTICS LABORATORY C-B216

JOB NO 0214-00001	DATE 06/16/03
	REV NO 2
SCALE NONE	DWG NO **SK-C-B216-4**

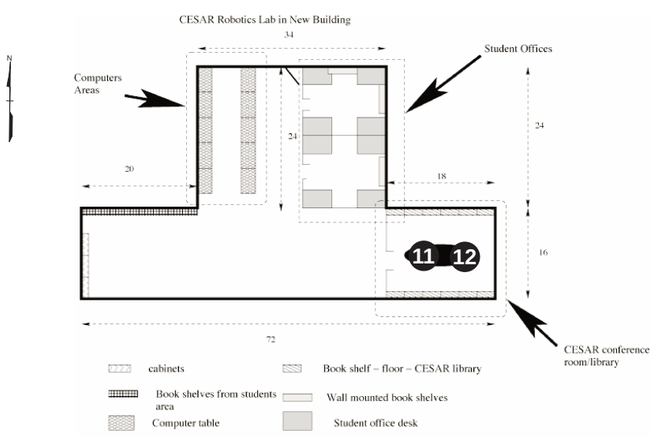
11

BOOK SHELVES

(TYPICAL BOTH SIDES OF THE CONFERENCE ROOM), ALL CHAIRS

12

VIDEO EQUIPMENT, CONFERENCE ROOM TABLE



ROBOTICS

NOTES:

1. CONTACT DAVID REISTER, 574-2272, OR BETSY RILEY, 574-5452 FOR ADDITIONAL INFORMATION.
2. USE C-B216 SUFFIX FOR ALL EQUIPMENT TAGS.
3. THIS EQUIPMENT IS BEING MOVED FROM BUILDING 6010, ROOM 250 TO CSB ROOM C-B216.
4. THERE WILL BE APPROXIMATELY 250 BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C2084

SHEET TITLE

ROBOTICS LABORATORY C-B216

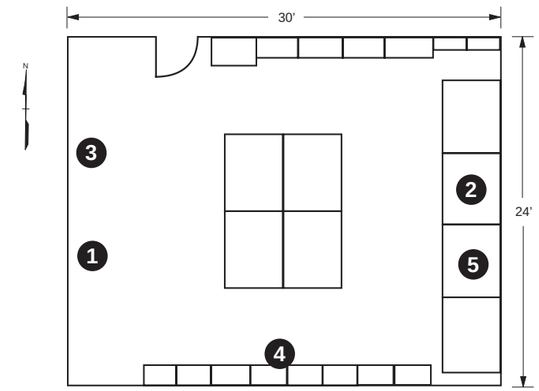
JOB NO 0214-00001	DATE 06/16/03
	REV NO 2
SCALE NONE	DWG NO **SK-C-B216-5**

1

PLOTTERS, QUANTITY - 2

2

MONITORS, PRINTERS, CPU'S, QUANTITY - APPROXIMATELY 12



C-B224

3

METAL RACKS, QUANTITY - 2 (SOME DISASSEMBLY WILL BE REQUIRED).

NOTES:
1. CONTACT ED TINNEL, 574-4637, FOR ADDITIONAL INFORMATION.
2. USE C-B224 SUFFIX FOR ALL EQUIPMENT TAGS.
3. THIS EQUIPMENT IS BEING MOVED FROM BUILDING 4500N, ROOM H25A TO CSB ROOM C-B224.
4. THERE WILL BE APPROXIMATELY 38 BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C2085

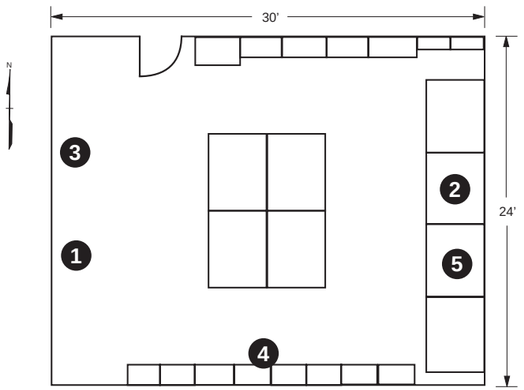
SHEET TITLE

GIS LABORATORY C-B224

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-C-B224-1**

4

COMPACT DISCS, QUANTITY - 12,000



C-B224

5

COMPUTERS, QUANTITY - 3 STATIONS

NOTES:
1. CONTACT ED TINNEL, 574-4637, FOR ADDITIONAL INFORMATION.
2. USE C-B224 SUFFIX FOR ALL EQUIPMENT TAGS.
3. THIS EQUIPMENT IS BEING MOVED FROM BUILDING 4500N, ROOM H25A TO CSB ROOM C-B224.
4. THERE WILL BE APPROXIMATELY 38 BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

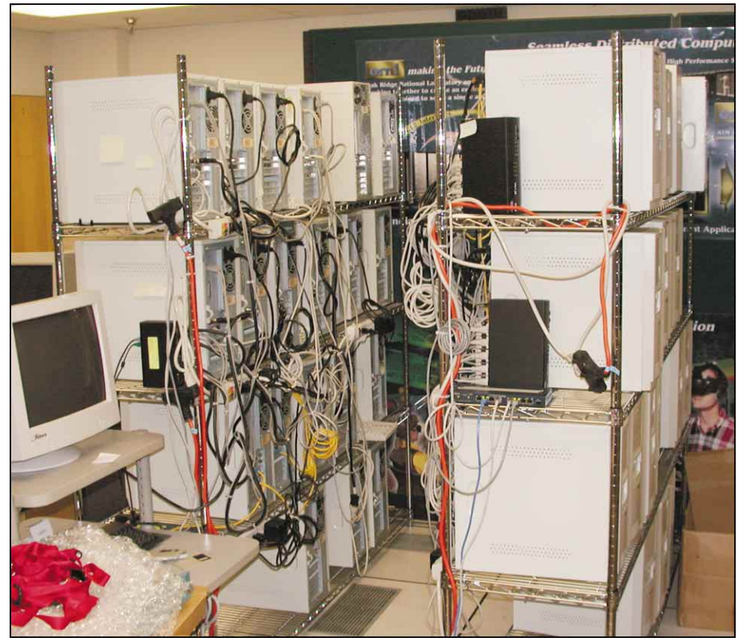
PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

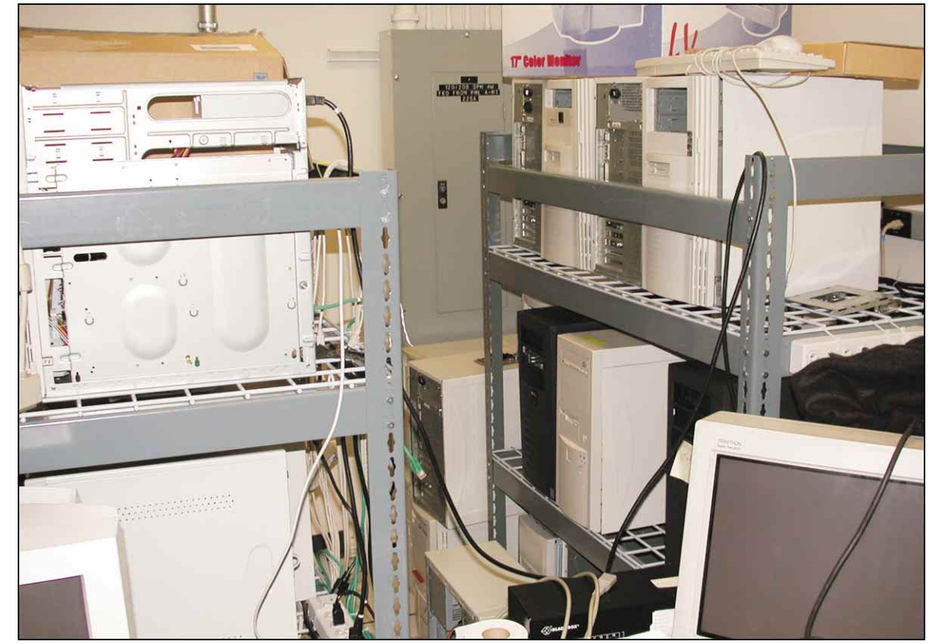
OLD ROOM NUMBER: C2085

SHEET TITLE

GIS LABORATORY C-B224

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-C-B224-2**

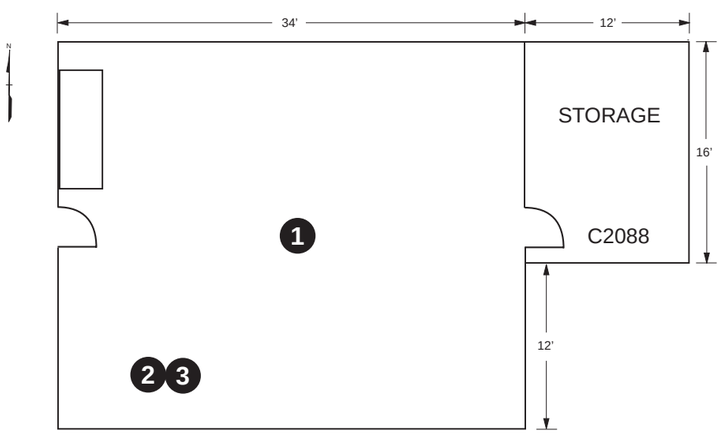




1

RACKS OF COMPUTERS

QUANTITY: 4 RACKS
SIZE: 8 CPU'S/RACK TO 22 CPU'S/RACK
LOCATION: BUILDING 6012



C-E204-B

NOTES:
1. CONTACT STEVEN SCOTT, 574-3144 OR JOHN MUGLER, 574-9539 FOR ADDITIONAL INFORMATION.
2. USE C-E204-B SUFFIX FOR ALL EQUIPMENT TAGS.
3. THIS EQUIPMENT IS BEING MOVED FROM BUILDING 6012 EXCEPT FOR THE EQUIPMENT SHOWN IN PHOTOGRAPH 3 ON SK-C-E204-B-2.
4. THERE WILL BE APPROXIMATELY 6 BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.
5. AN ADDITIONAL 6 TABLES (60"x24") AND 13 ROLLING TASK CHAIRS WILL BE MOVED FROM BUILDING 3546, ROOM 114. 8 SIDE CHAIRS NEED TO BE MOVED FROM BUILDING 3546 IN A ROOM ACROSS THE HALL FROM ROOM 114. THIS MOVE CAN NOT HAPPEN UNTIL THE "ACCESS GRID" TELECONFERENCING EQUIPMENT IS MOVED. CONTACT DAVID BERNHOLDT, 574-3147, FOR ADDITIONAL INFORMATION.

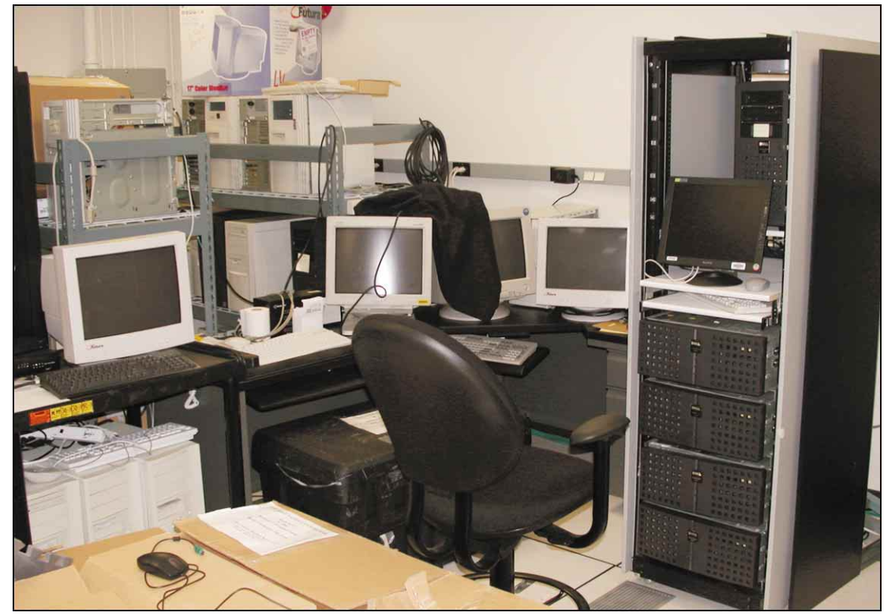
NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2087

SHEET TITLE
COMPUTER SCIENCE LABORATORY C-E204-B

JOB NO 0214-00001
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-C-E204-B-1**



2

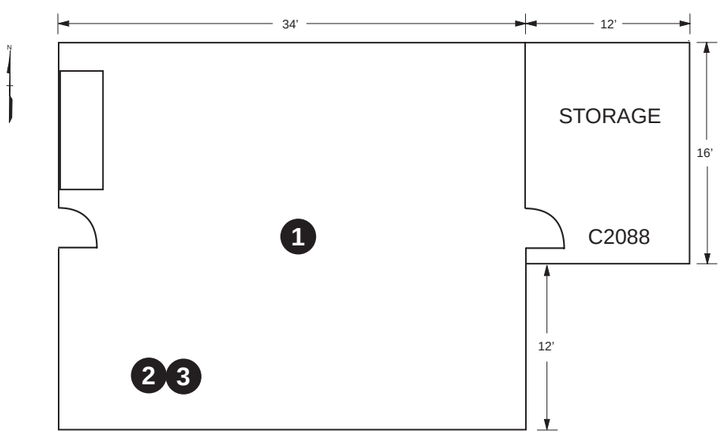
WORK STATIONS AND CABINETS

QUANTITY: APPROXIMATELY 13 WORK STATIONS, TWO CABINETS (EQUIPMENT ONLY)
LOCATION: COMPUTER ROOM BUILDING 6012

3

COMPUTERS

QUANTITY: 13 PIECES
LOCATION: THE CAVE ROOM IN BUILDING 6010.



C-E204-B

NOTES:

1. CONTACT STEVEN SCOTT, 574-3144 OR JOHN MUGLER, 574-9539 FOR ADDITIONAL INFORMATION.
2. USE C-E204-B SUFFIX FOR ALL EQUIPMENT TAGS.
3. THIS EQUIPMENT IS BEING MOVED FROM BUILDING 6012 EXCEPT FOR THE EQUIPMENT SHOWN IN PHOTOGRAPH 3 ON SK-C-E204-B-2.
4. THERE WILL BE APPROXIMATELY 6 BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.
5. AN ADDITIONAL 6 TABLES (60”x24”) AND 13 ROLLING TASK CHAIRS WILL BE MOVED FROM BUILDING 3546, ROOM 114. 8 SIDE CHAIRS NEED TO BE MOVED FROM BUILDING 3546 IN A ROOM ACROSS THE HALL FROM ROOM 114. THIS MOVE CAN NOT HAPPEN UNTIL THE “ACCESS GRID” TELECONFERENCING EQUIPMENT IS MOVED. CONTACT DAVID BERNHOLDT, 574-3147, FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: C2087

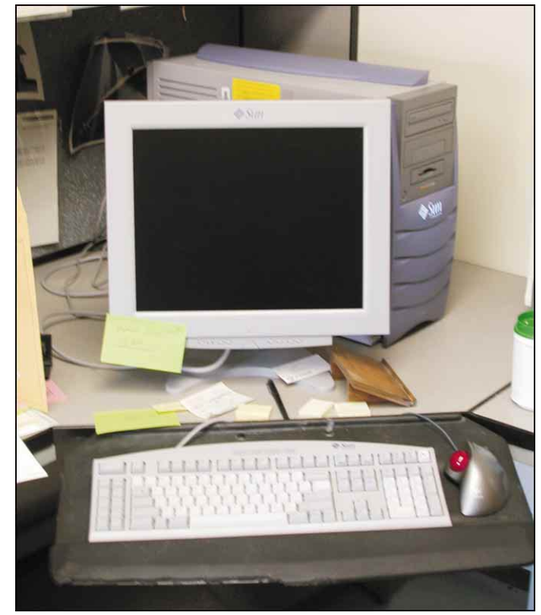
SHEET TITLE

COMPUTER SCIENCE LABORATORY C-E204-B

JOB NO 0214-00001	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-C-E204-B-2**

1

SERVER CA-30, MONITOR, KEYBOARD AND UPS MOVED FROM BUILDING 6011, ROOM 129



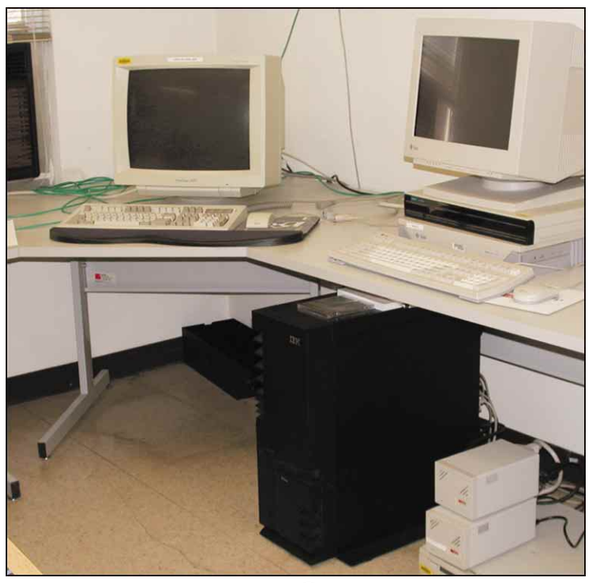
2

STUDENT WORK STATIONS

QUANTITY: 9

3

SERVER CA-02, MONITOR, KEYBOARD AND UPS MOVED FROM BUILDING 6011, ROOM 129

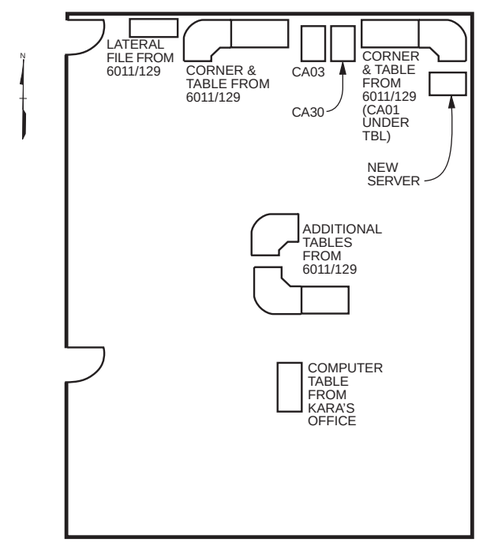


3

SERVER CA-02, MONITOR, KEYBOARD AND UPS MOVED FROM BUILDING 6011, ROOM 129

Items to move to the Biomedical Modeling Laboratory C-A216

System/Item	Current Location	Network Connection
CA01	6011/109	Cat5/100Mb
CA03	6011/129	Cat5/100Mb
CA30	6011/129	Cat5/100Mb
Printer	6011/129	Cat5/100Mb
Corner Units (4)	6011/129	
5' Tables (3)	6011/129	
Lateral File	6011/129	
Boxes (30)	6011/129	
Chairs (6)	6011/129	
CA34	6011/137	Cat5/100Mb
Computer Table	6011/140	



NOTES:

1. CONTACT SUZANNE WILLOUGHBY, 574-1855, FOR ADDITIONAL INFORMATION.
2. USE C-A216 SUFFIX FOR ALL EQUIPMENT TAGS.
3. THIS EQUIPMENT IS BEING MOVED FROM BUILDING 6011 TO CSB ROOM C-A216.
4. THERE WILL BE APPROXIMATELY 30 BOXES TO BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN.
5. NEW SERVER WILL NEED A DEDICATED 20 AMP CIRCUIT AND MAY REQUIRE A GIGABIT OVER FIBER CONNECTION.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: C2093

SHEET TITLE

MODELING AND SIMULATION LABORATORY C-A216

JOB NO 0214-00001

DATE 06/16/03

REV NO 1

SCALE NONE

DWG NO **SK-C-A216-1**

Equipment to be moved to IRM Lab 5510:

TAG 5510-	Equipment Name Description/Model	Foot Print	Present Location	Disassembly Drawing	Installation Drawing
IRML Level 1 Lab Equipment					
IRML1	4-High Fenn Rolling Mill	3' x 8'	Y-12 9204-3, 1st Flr Room 111	SK-5510-2	SK-5510-10
IRML2	2-High Stanat Rolling Mill	2.25' x 5'	Y-12 9204-3, 2nd Flr Room 216	SK-5510-2	SK-5510-10
IRML3	Arc Melter	3' x 8'	Y-12 9204-3, 2nd Flr Room 216	SK-5510-2	SK-5510-10
IRML4	Mini-Arc Melter	1.75' x 2.5'	Y-12 9204-3, 2nd Flr Room 216	SK-5510-2	SK-5510-10
IRML5	Inert Atmosphere Dry Box	4.5' x 6'	Y-12 9204-3, 2nd Flr Room 216	SK-5510-2	SK-5510-10
IRML6	Veeco RF Sputter System	3' x 9'	Y-12 9204-3, 2nd Flr Room 217	SK-5510-3	SK-5510-10
IRML7	EB Evap. Sys./Power Supply, EB Evap. Sys./Vacuum System	3.5' x 8'	Y-12 9204-3, 2nd Flr Room 216	SK-5510-3	SK-5510-10
IRML8	Resistance Evap. Sys./Pwr. Supply Resistance Evap. Sys./Vacuum Sys.	3.75' x 5'	Y-12 9204-3, 2nd Flr Room 217	SK-5510-3	SK-5510-10
IRML9	RFC RF Pr. Supply/Metal Reduction, Vacuum System/Metal Reduction System	4' x 7.5'	Y-12 9204-3, 2nd Flr Room 216	SK-5510-3	SK-5510-10
IRML10	Northern Hydraulic Press	3' x 4.75'	Y-12 9204-3, 2nd Flr Room 217	SK-5510-3	SK-5510-10
IRML11	Dake Press	2' x 2.75'	Y-12 9204-3, 2nd Flr Room 216	SK-5510-4	SK-5510-10
IRML12	Swager	1.75' x 2.25'	Y-12 9204-3, 2nd Flr Room 216	SK-5510-4	SK-5510-10
IRML13	Welder Pr. Supply/Welding Table	2.5' x 4.5'	Y-12 9204-3, 1st Flr Room 111	SK-5510-4	SK-5510-10
IRML14	Punch	1.3' x 2.25'	Y-12 9204-3, 2nd Flr Room 217	SK-5510-4	SK-5510-10
IRML15	X-Ray Machine	2' x 2'	Y-12 9204-3, 2nd Flr Room 217	SK-5510-5	SK-5510-10
IRML16	Furnace	2' x 3'	Y-12 9204-3, Basement	SK-5510-5	SK-5510-10
IRML17	Balances/Tables (3)	2' x 3'	Y-12 9204-3, 2nd Flr Room 216 & 217	SK-5510-5	SK-5510-10
IRML18	Mini-Lathe (To be acquired)	2' x 4'	To be Acquired	SK-5510-5	SK-5510-10
~~IRML19~~	~~Benches/Tables (3)~~	~~3' x 6'~~		~~SK-5510-5~~	~~SK-5510-10~~
IRML20	Glass Tube Sealing Station	3' x 4'		SK-5510-5	SK-5510-10
IRML21	Fluoridation System (Hood)	3' x 8'		SK-5510-5	SK-5510-10
IRML22	Storage Cabinets (3)	1.5' x 3'		SK-5510-5	SK-5510-10

IRM LAB 5510 DRAWING INDEX

Drawing No.	Title
SK-5510-1	Drawing Index and Equipment List Page 1 and Page 2
SK-5510-2	IRML Lab Composite Storage Disassembly Drawing No. 1
SK-5510-3	IRML Lab Composite Storage Disassembly Drawing No. 2
SK-5510-4	IRML Lab Composite Storage Disassembly Drawing No. 3
SK-5510-5	IRML Lab Composite Storage Disassembly Drawing No. 4
SK-5510-6	IRML Lab Composite Storage Disassembly Drawing No. 5
SK-5510-7	IRML Lab Composite Storage Disassembly Drawing No. 6
SK-5510-8	IRML Lab Composite Storage Disassembly Drawing No. 7
SK-5510-9	IRML Lab Composite Storage Disassembly Drawing No. 8
SK-5510-10	IRML Lab Composite Storage Installation Drawing
SK-5510-11	IRML Lab Preparation Drawing No. 1
SK-5510-12	IRML Lab Preparation Drawing No. 2
SK-5510-13	IRML Lab Preparation Drawing No. 3
SK-5510-14	IRML Lab Preparation Drawing No. 4
SK-5510-15	IRML Lab Preparation Drawing No. 5
SK-5510-16	IRML Lab Preparation Drawing No. 6
SK-5510-17	IRML Lab Preparation Drawing No. 7
SK-5510-18	IRML Lab Preparation Drawing No. 8
SK-5510-19	IRML Lab Preparation Drawing No. 9
SK-5510-20	IRML Lab Preparation Drawing No. 10

NOTES:
1. The importance of IRM Laboratory equipment is indicated by the designated level. Level 1 equipment is more important than Level 2, Level 2 is more important than Level 3, and Level 3 is more important then the equipment designated "Excess".

ISOTOPES RESEARCH MATERIAL LABORATORY 5510
MOVE PACKAGE

NO	DATE	REVISION	BY	CK	APPR
2	07/08/03	Deleted Items			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE
ISOTOPES RESEARCH MATERIAL LABORATORY 5510
DRAWING INDEX AND EQUIPMENT LIST PAGE 1

JOB NO 0021-00129
DATE 07/08/03
REV NO 2
SCALE NONE
DWG NO **SK-5510-1**

Equipment to be moved to IRM Lab 5510 (continued):

TAG 5510-	Equipment Name Description/Model	Foot Print	Present Location	Disassembly Drawing	Installation Drawing
IRML Level 2 Lab Equipment					
IRML23	4-High Stanat Rolling Mill	2' x 5.5'	Y-12 9204-3, 2nd Flr Room 216	SK-5510-6	SK-5510-10
IRML24	Metal Reduction Sys. Vac. Sys. Lepel 7.5 KW Pwr. Supply (Metal Reduction Systems)	4' x 9'	Y-12 9204-3, 1st Flr Room 111	SK-5510-6	SK-5510-10
IRML25	Crystal Bar System (Future)	3' x 6'	To be Acquired	SK-5510-6	SK-5510-10
~~IRML26~~	~~Microscope Table~~	~~3' x 6'~~		~~SK-5510-6~~	~~SK-5510-10~~
IRML27	Specimen Prep Table	2.5' x 5'	Y-12 9204-3, 2nd Flr Room 217	SK-5510-6	SK-5510-10
IRML28	Bench Space (2)	3' x 6'		SK-5510-6	SK-5510-10
IRML29	Storage Cabinets (3)	1.5' x 3'		SK-5510-6	SK-5510-10
IRML Level 3 Lab Equipment					
IRML30	EB Vacuum Evap. Sys. (4 pkt., Power Supply)	4' x 9'	Y-12 9204-3, 2nd Flr Room 216	SK-5510-7	SK-5510-10
IRML31	Control Arc Melt	3' x 6'	Y-12 9204-3, 2nd Flr Room 217	SK-5510-7	SK-5510-10
~~IRML32~~	~~Vacuum Furnace~~	~~6' x 8'~~	~~Y-12 9204-3, 1st Flr Room 111~~	~~SK-5510-7~~	~~SK-5510-10~~
IRML33	Inert Box-Evaporator System Cyropump & Compressor	3' x 3.5'	Stored Item	SK-5510-7	SK-5510-10
IRML34	Vacuum Hot Press, Vac Pump, Power Supply	3' x 6'	Stored Item	SK-5510-7	SK-5510-10
IRML Excess Equipment					
~~IRML35~~	~~48" Box Coater/Vacuum System~~		~~Y-12 9204-3, Bsmt High Bay~~	~~SK-5510-8~~	~~SK-5510-10~~
IRML36	30" Box Coater/Vacuum System	6' x 12'	Y-12 9204-3, Bsmt Room 217B	SK-5510-8	SK-5510-10
~~IRML37~~	~~Lepel RF Power Supply~~		~~Y-12 9204-3, Bsmt Room 217B~~	~~SK-5510-8~~	~~SK-5510-10~~
~~IRML38~~	~~Airco Power Supply Welding (2)~~		~~Y-12 9204-3, Bsmt~~	~~SK-5510-8~~	~~SK-5510-10~~
IRML39	P.E. Vac. Sys. (Rod Feed EB)/Controls		Y-12 9204-3, Bsmt	SK-5510-8	SK-5510-10
IRML40	Miller Power Supply Welding (2)		Y-12 9204-3, Bsmt	SK-5510-9	SK-5510-10
~~IRML41~~	~~Venco Vac. Sys/Arc Melter~~		~~Y-12 9204-3, Bsmt~~	~~SK-5510-9~~	~~SK-5510-10~~
IRML42	Harrop Furnace/Controller		Y-12 9204-3, Bsmt	SK-5510-9	SK-5510-10
~~IRML43~~	~~2" Tube Furnace~~		~~Y-12 9204-3, Bsmt~~	~~SK-5510-9~~	~~SK-5510-10~~
~~IRML44~~	~~Hobart TIG Welder~~		~~Y-12 9204-3, Bsmt~~	~~SK-5510-9~~	~~SK-5510-10~~
~~IRML45~~	~~Airco Power Supply EB~~		~~Y-12 9204-3, Bsmt~~	~~SK-5510-9~~	~~SK-5510-10~~
~~IRML46~~	~~Vacuum Oven~~		~~Y-12 9204-3, Bsmt~~	~~SK-5510-9~~	~~SK-5510-10~~
IRML47	Furnace Controllers (2)		Y-12 9204-3, Bsmt	SK-5510-9	SK-5510-10
~~IRML48~~	~~Unitron Microscope~~		~~Y-12 9204-3, Bsmt~~	~~SK-5510-9~~	~~SK-5510-10~~
~~IRML49~~	~~Elec. Bonmardment Power Supply~~		~~Y-12 9204-3, Bsmt~~	~~SK-5510-9~~	~~SK-5510-10~~
~~IRML50~~	~~EB Gun Controllers (2)~~		~~Y-12 9204-3, Bsmt~~	~~SK-5510-9~~	~~SK-5510-10~~
~~IRML51~~	~~Li Glovebox~~		~~Y-12 9204-3, 1st Floor Dock Area~~	~~SK-5510-9~~	~~SK-5510-10~~
IRML52	Magnation Sputter Unit		Y-12 9204-3, 2nd Floor	–	–
IRML53	Flammable Storage Cabinet	3' x 1'	Y-12 9204-3	–	–

ISOTOPES RESEARCH MATERIAL LABORATORY 5510
MOVE PACKAGE

NO	DATE	REVISION	BY	CK	APPR
2	07/08/03	Deleted Items			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE
ISOTOPES RESEARCH MATERIAL LABORATORY 5510
DRAWING INDEX AND EQUIPMENT LIST PAGE 2

JOB NO 0021-00129
DATE 07/08/03
REV NO 2
SCALE NONE
DWG NO **SK-5510-1**

1

IRML1 - 4 HIGH FENN ROLLING MILL

1. DISCONNECT 480V, 3 PHASE ELECTRICAL POWER.
2. WEIGHS ____ POUNDS.

2

IRML2 - 2 HIGH STANAT ROLLING MILL

1. DISCONNECT 480V, 3 PHASE ELECTRICAL POWER.
2. WEIGHS ____ POUNDS.

3

IRML3 - ARC MELTER

1. DISCONNECT 480V, 3 PHASE AND 240V ELECTRICAL POWER.
2. DISCONNECT COOLING WATER.
3. DISCONNECT COMPRESSED AIR.
4. DISCONNECT INERT GAS.

NO PICTURE AVAILABLE

4

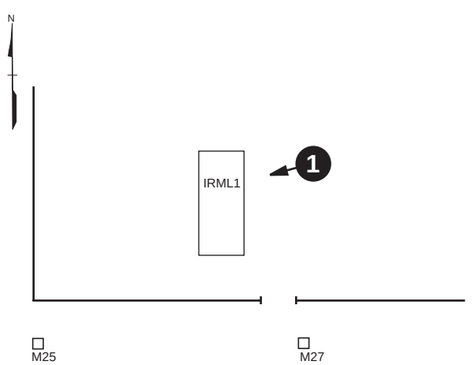
IRML4 - MINI ARC MELTER

1. DISCONNECT COOLING WATER.
2. DISCONNECT INERT GAS.

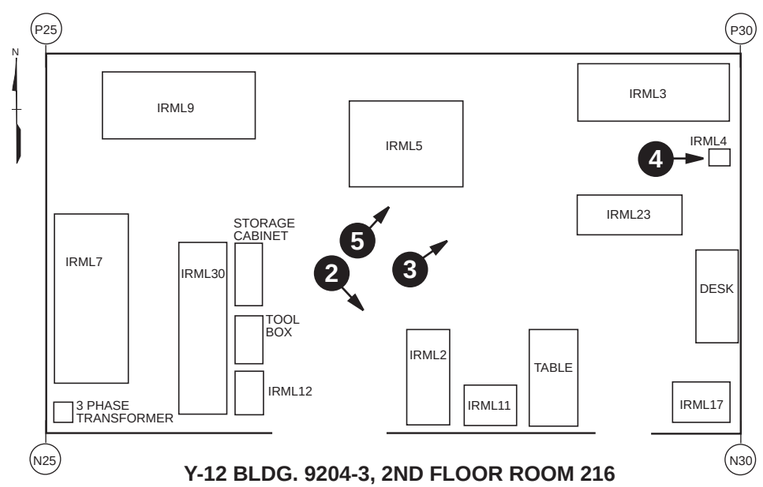
5

IRML5 - INERT ATMOSPHERE DRY BOX

1. DISCONNECT 240V ELECTRICAL POWER.
2. DISCONNECT COOLING WATER.
3. DISCONNECT INERT GAS.



Y-12 BLDG. 9204-3, 1ST FLOOR ROOM 111



Y-12 BLDG. 9204-3, 2ND FLOOR ROOM 216

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510 DISASSEMBLY DRAWING

JOB NO 0021-00129	DATE 04/02/03
	REV NO 1
SCALE NONE	DWG NO **SK-5510-2**

1

IRML7 - EB EVAPORATOR SYSTEM

1. DISCONNECT 280V, 3 PHASE ELECTRICAL POWER FROM POWER SUPPLY.
2. DISCONNECT 208V, 3 PHASE ELECTRICAL POWER FROM VACUUM SYSTEM.
3. DISCONNECT COOLING WATER FROM POWER SUPPLY AND VACUUM SYSTEM.
4. DISCONNECT COMPRESSED AIR.
5. DISCONNECT INERT GAS.

IRML9 - RFC METAL REDUCTION SYSTEM

1. DISCONNECT 208V ELECTRICAL POWER FROM POWER SUPPLY.
2. DISCONNECT 208V, 3 PHASE ELECTRICAL POWER FROM VACUUM SYSTEM.
3. DISCONNECT COOLING WATER.
4. DISCONNECT COMPRESSED AIR.
5. DISCONNECT INERT GAS.

NO PICTURE AVAILABLE
(ROOM 217)

2

IRML8 - RESISTANCE EVAPORATOR SYSTEM

1. DISCONNECT 240V ELECTRICAL POWER.
2. DISCONNECT COOLING WATER.
3. DISCONNECT INERT GAS.

3

IRML6 - VEECO RF SPUTTER SYSTEM

1. DISCONNECT 480V, 3 PHASE, AND 240V ELECTRICAL POWER.
2. DISCONNECT COOLING WATER.
3. DISCONNECT COMPRESSED AIR.

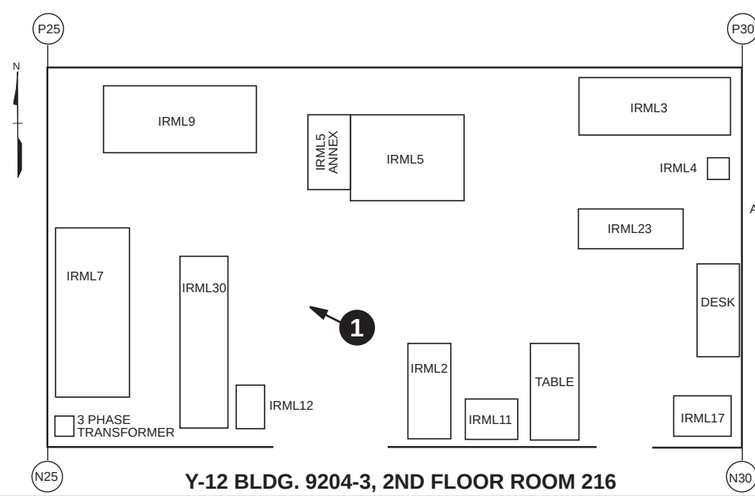
4

IRML10 - NORTHERN HYDRAULIC PRESS

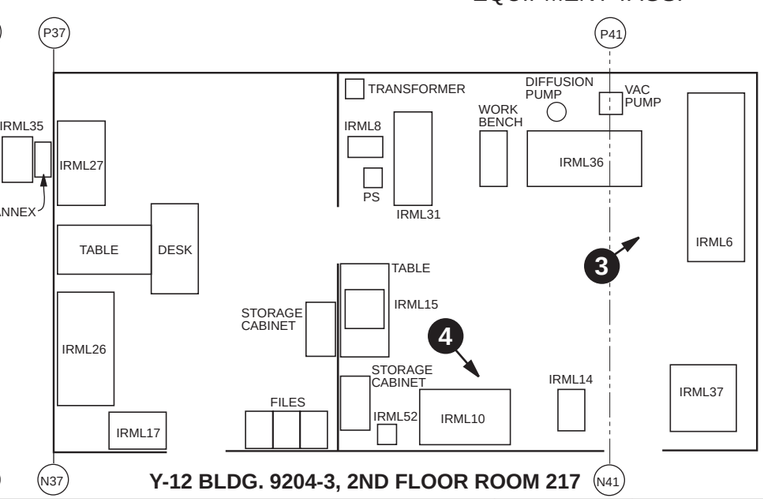
1. DISCONNECT 480V, 3 PHASE ELECTRICAL POWER.

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.



Y-12 BLDG. 9204-3, 2ND FLOOR ROOM 216



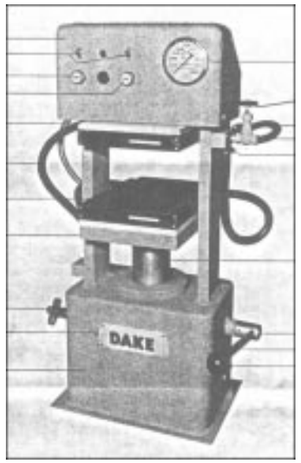
Y-12 BLDG. 9204-3, 2ND FLOOR ROOM 217

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510 DISASSEMBLY DRAWING

JOB NO	DATE 04/02/03
0021-00129	REV NO 1
SCALE NONE	DWG NO SK-5510-3



1

IRML11 - DAKE PRESS

2

IRML12 - SWAGER

1. DISCONNECT 120V ELECTRICAL POWER.

NO PICTURE AVAILABLE

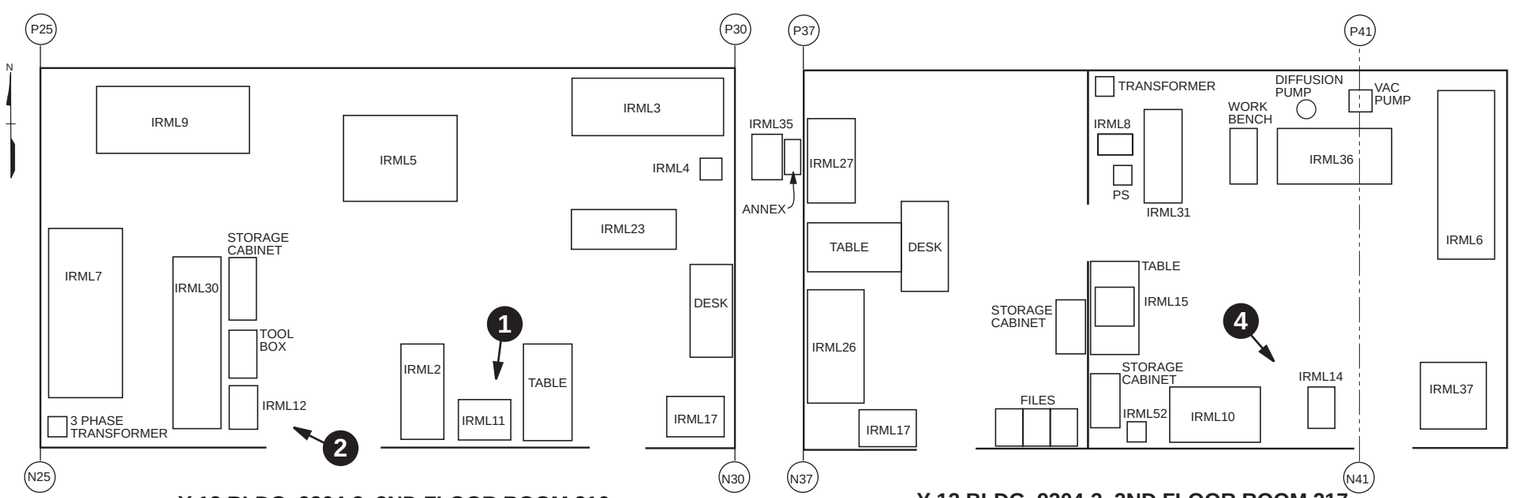
3

IRML13 - WELDER POWER SUPPLY AND WELDING TABLE

1. DISCONNECT 480V, 3 PHASE ELECTRICAL POWER.
2. DISCONNECT INERT GAS.

4

IRML14 - PUNCH



Y-12 BLDG. 9204-3, 2ND FLOOR ROOM 216

Y-12 BLDG. 9204-3, 2ND FLOOR ROOM 217

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510 DISASSEMBLY DRAWING

JOB NO	DATE 04/02/03
0021-00129	REV NO 1
SCALE NONE	DWG NO **SK-5510-4**

1

IRML15 - X-RAY MACHINE

1. DISCONNECT 120V ELECTRICAL POWER.

2

IRML16 - LINDBERG FURNACE

1. DISCONNECT 240V ELECTRICAL POWER.

NO PICTURE AVAILABLE

3

IRML17 - BALANCE/TABLE

1. DISCONNECT 120V POWER.

NO PICTURE AVAILABLE

4

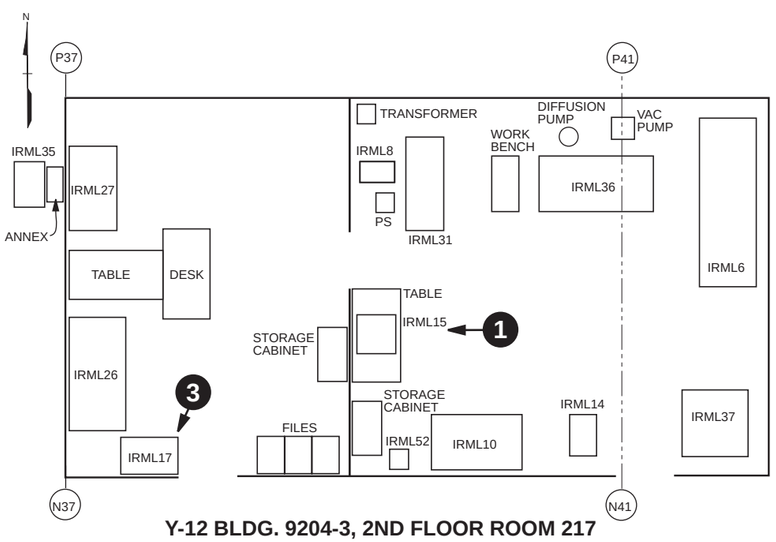
IRML18 - MINI LATHE

1. DISCONNECT 120V ELECTRICAL POWER.

NO PICTURE AVAILABLE

5

IRML19 - BENCHES/TABLES



Y-12 BLDG. 9204-3, 2ND FLOOR ROOM 217

NO PICTURE AVAILABLE

6

IRML20 - GLASS TUBE SEALING STATION

NO PICTURE AVAILABLE

7

IRML21 - FLUORIDATION SYSTEM (HOOD)

1. DISCONNECT 208V ELECTRICAL POWER.
2. DISCONNECT INERT GAS.

NO PICTURE AVAILABLE

8

IRML22 - STORAGE CABINETS (3)

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510 DISASSEMBLY DRAWING

JOB NO 0021-00129	DATE 04/02/03
	REV NO 1
SCALE NONE	DWG NO **SK-5510-5**

1

IRML23 - 4-HIGH STANAT ROLLING MILL

1. DISCONNECT 240V, 3 PHASE ELECTRICAL POWER.
2. MACHINE WEIGHS ____ POUNDS.

2

IRML24 - METAL REDUCTION SYSTEM

1. DISCONNECT 240V AND 208V ELECTRICAL POWER FROM VACUUM SYSTEM.
2. DISCONNECT 240V, 3 PHASE ELECTRICAL POWER FROM POWER SUPPLY.
3. DISCONNECT COOLING WATER.
4. DISCONNECT COMPRESSED AIR.
5. DISCONNECT INERT GAS.

NO PICTURE AVAILABLE

3

IRML25 - CRYSTAL BAR SYSTEM

1. DISCONNECT 480V, 3 PHASE ELECTRICAL POWER FROM FURNACE.
2. DISCONNECT 240V ELECTRICAL POWER.

NO PICTURE AVAILABLE

4

IRML26 - MICROSCOPE TABLE

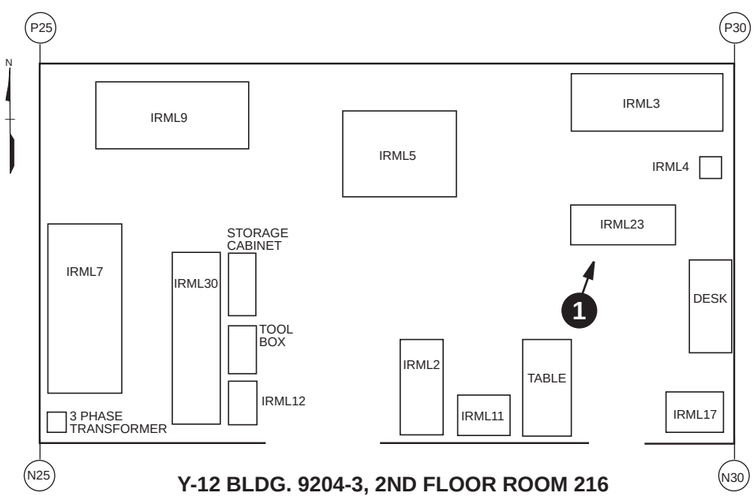
1. DISCONNECT 120V POWER.

NO PICTURE AVAILABLE

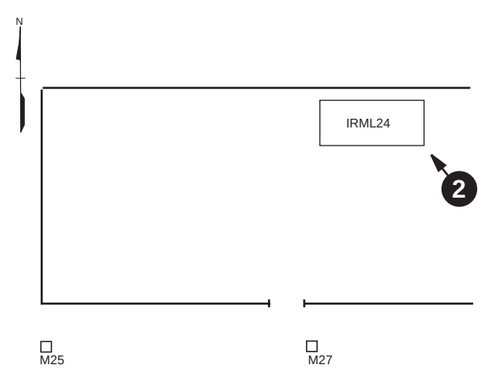
5

IRML27 - SPECIMEN PREP TABLE

1. DISCONNECT 120V POWER.
2. DISCONNECT COOLING WATER.



Y-12 BLDG. 9204-3, 2ND FLOOR ROOM 216



Y-12 BLDG. 9204-3, 1ST FLOOR ROOM 111

NO PICTURE AVAILABLE

6

IRML28 - BENCH SPACE

NO PICTURE AVAILABLE

7

IRML29 - STORAGE CABINETS

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510 DISASSEMBLY DRAWING

JOB NO 0021-00129	DATE 04/02/03
	REV NO 1
SCALE NONE	DWG NO **SK-5510-6**

1

IRML30 - EB VACUUM EVAPORATOR SYSTEM (4 PKT.)

1. DISCONNECT 120V ELECTRICAL POWER.
2. DISCONNECT TWO 208V, 3 PHASE ELECTRICAL POWER.
3. DISCONNECT COOLING WATER.
4. DISCONNECT COMPRESSED AIR.
5. DISCONNECT INERT GAS.

2

IRML31 - SPUTTER BELL

1. CONVERT TO AN ARC MELTER (CENTORR)

3

IRML32 - VACUUM FURANCE

1. DISCONNECT 240V ELECTRICAL POWER.

4

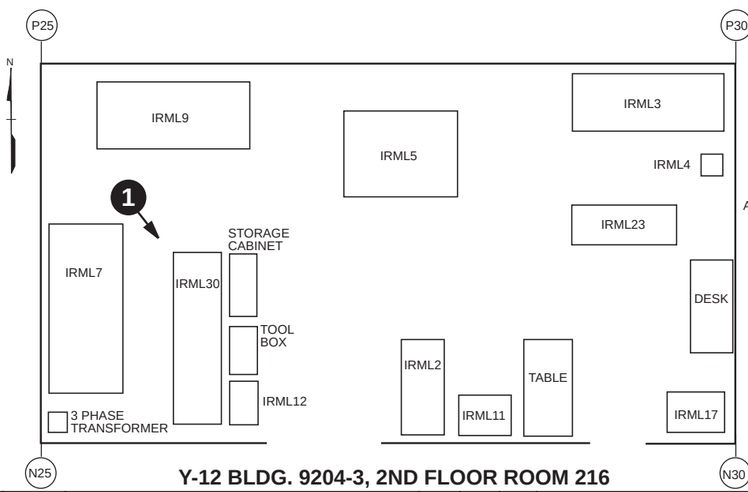
IRML33 - INERT BOX EVAPORATOR SYSTEM

1. DISCONNECT 208V AND 240V ELECTRICAL POWER.
2. DISCONNECT COOLING WATER.
3. DISCONNECT COMPRESSED AIR.
4. DISCONNECT INERT GAS.

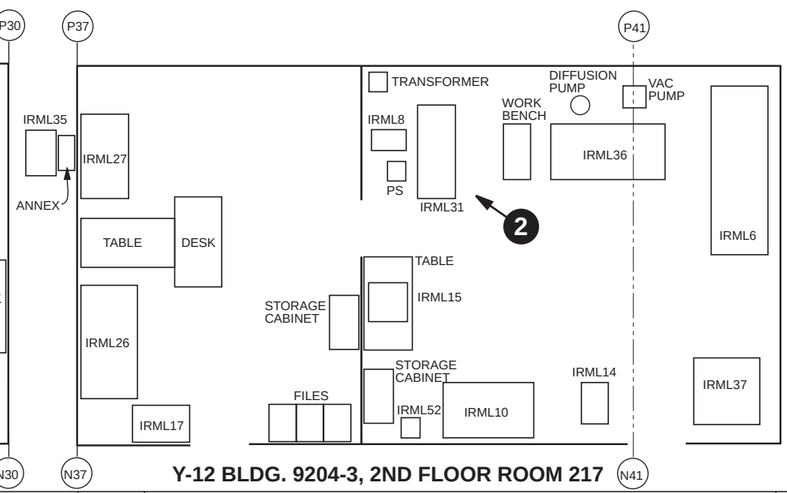
5

IRML34 - VACUUM HOT PRESS

1. DISCONNECT 480V, 3 PHASE AND 240V ELECTRICAL POWER.
2. DISCONNECT COOLING WATER.
3. DISCONNECT COMPRESSED AIR.
4. DISCONNECT INERT GAS.



Y-12 BLDG. 9204-3, 2ND FLOOR ROOM 216



Y-12 BLDG. 9204-3, 2ND FLOOR ROOM 217

NOTES:

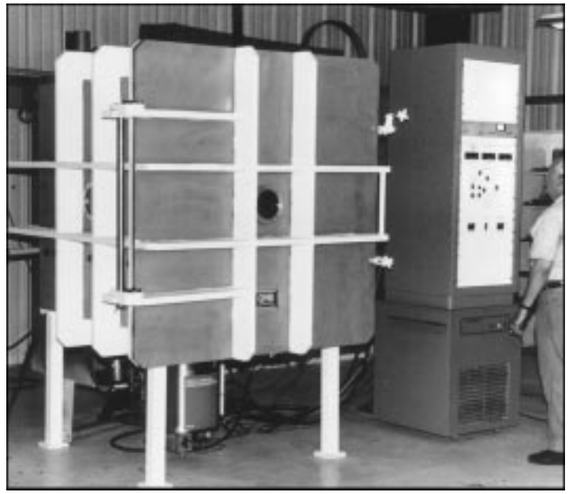
1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR	
						PREPARED BY
						CHECKED BY
						DISCIPL APPR
						INTERFACE CK
						PM APPR
						CLIENT APPR

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510 DISASSEMBLY DRAWING

JOB NO	DATE 04/02/03
0021-00129	REV NO 1
SCALE NONE	DWG NO **SK-5510-7**



1

IRML35 - 48” BOX COATER/VACUUM SYSTEM

2

IRML36 - 30” BOX COATER/VACUUM SYSTEM

1. DISCONNECT 240V, 3 PHASE AND 208V, 3 PHASE CIRCUITS.

3

IRML37 - LEPEL RF POWER SUPPLY

1. DISCONNECT _____ ELECTRICAL POWER.

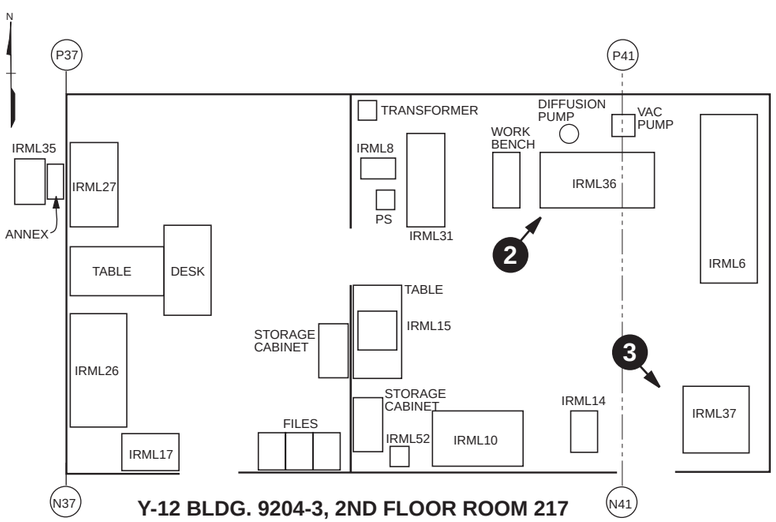
NO PICTURE AVAILABLE

4

IRML38 - AIRCO POWER SUPPLY

5

IRML39 - P. E. VACUUM SYSTEM



Y-12 BLDG. 9204-3, 2ND FLOOR ROOM 217

NOTE:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.
2. ITEMS IRML35, IRML38, AND IRML39 ARE LOCATED IN STORAGE IN THE BASEMENT OF 9204-3.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510 DISASSEMBLY DRAWING

JOB NO 0021-00129	DATE 04/02/03
	REV NO 1
SCALE NONE	DWG NO **SK-5510-8**

1

IRML41 - VENCO VACUUM SYSTEM/ARC MELTER

1. CURRENTLY LOCATED IN STORAGE IN THE BASEMENT OF 9204-3.

NO PICTURES ARE AVAILABLE FOR THE FOLLOWING ITEMS.
THEY ARE LOCATED IN STORAGE IN 9204-3.

IRML42	Harrop Furnace/Controller	Y-12 9204-3, Bsmt
IRML43	2” Tube Furnace	Y-12 9204-3, Bsmt
IRML44	Hobart TIG Welder	Y-12 9204-3, Bsmt
IRML45	Airco Power Supply-EB	Y-12 9204-3, Bsmt
IRML46	Vacuum Oven	Y-12 9204-3, Bsmt
IRML47	Furnace Controllers (2)	Y-12 9204-3, Bsmt
IRML48	Unitron Microscope	Y-12 9204-3, Bsmt
IRML49	Elec. Bonmardment Power Supply	Y-12 9204-3, Bsmt
IRML50	EB Gun Controllers (2)	Y-12 9204-3, Bsmt
IRML51	Li Glovebox	Y-12 9204-3, 1st Fl Dock Area

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.

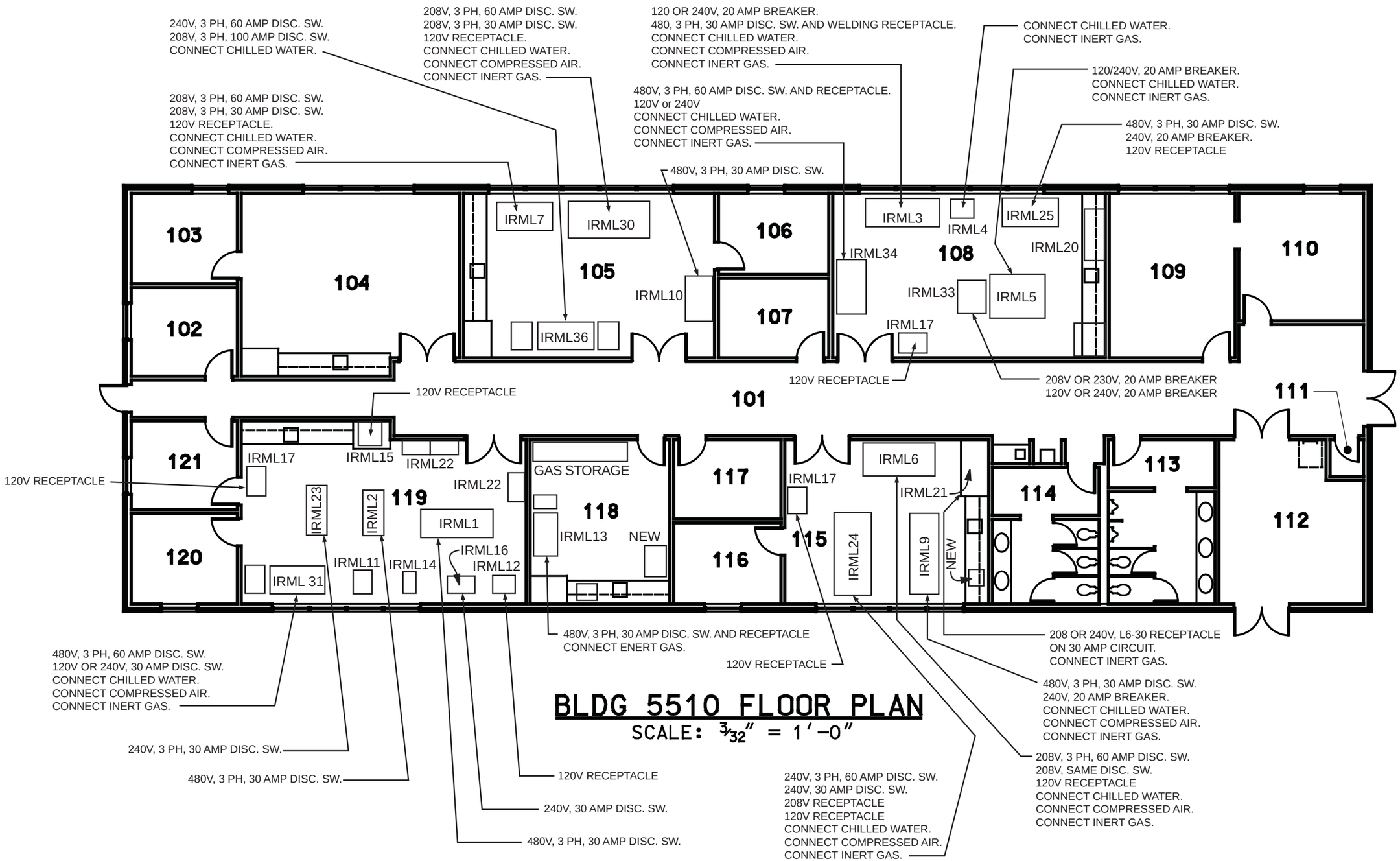
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510 DISASSEMBLY DRAWING

JOB NO 0021-00129
DATE 04/02/03
REV NO 1
SCALE NONE
DWG NO **SK-5510-9**



BLDG 5510 FLOOR PLAN

SCALE: 3/32" = 1'-0"

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510
INSTALLATION DRAWING NO. 1

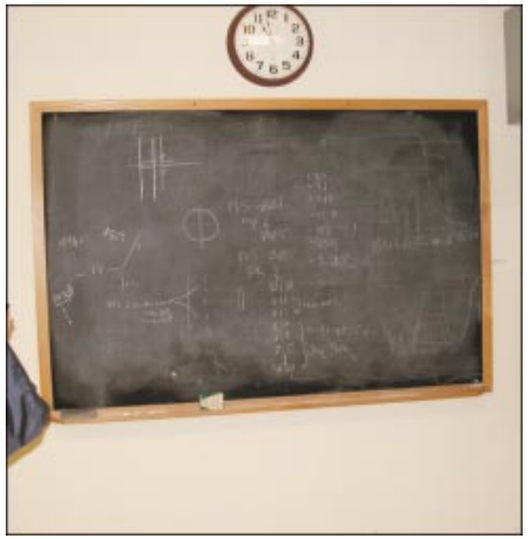
JOB NO	DATE 04/02/03
0021-00129	REV NO 1
SCALE 3/32"=1'-0"	DWG NO **SK-5510-10**

1

1. DISCONNECT ELECTRICAL POWER FROM FUME HOOD.
2. DISCONNECT AIR AND WATER FROM FUME HOOD.
3. DISCONNECT DUCTWORK FROM FUME HOOD.
4. REMOVE FUME HOOD.
5. BLANK OFF DUCT WORK.
6. INSTALL COUNTER TOP ON BASE CABINET.

2

1. DISCONNECT ELECTRICAL POWER FROM FUME HOOD.
2. DISCONNECT AIR AND WATER FROM FUME HOOD.
3. DISCONNECT DUCTWORK FROM FUME HOOD.
4. REMOVE FUME HOOD.
5. BLANK OFF DUCT WORK.
6. INSTALL COUNTER TOP ON BASE CABINET.

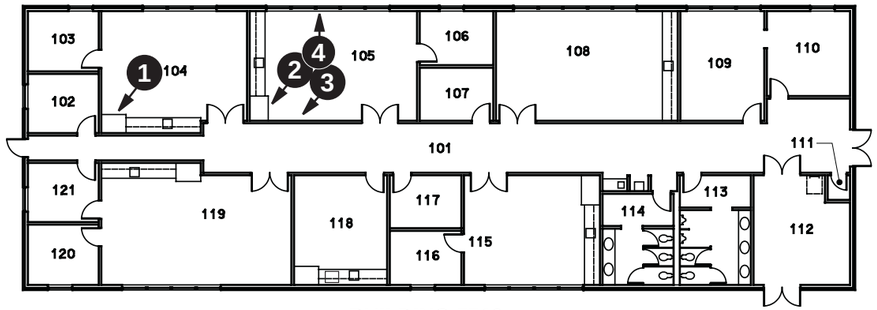


3

1. REMOVE CHALK BOARD.

4

1. DISCONNECT ELECTRICAL POWER FROM RECEPTACLE TRACK.
2. REMOVE RECEPTACLE TRACK AND SUPPORTING FRAME WORK.



BUILDING 5510

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.
2. REMOVE ITEMS AS INDICATED ON SK-5510-11 THRU SK-5510-20.
3. CLEAN FLOOR TILE.
4. PATCH AND PAINT WALLS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510
PREPARATION DRAWING NO. 1

JOB NO 0021-00129	DATE 04/02/03
	REV NO 1
SCALE NONE	DWG NO **SK-5510-11**

1

1. DISCONNECT ELECTRICAL POWER FROM RECEPTACLE TRACK.
2. REMOVE RECEPTACLE TRACK AND SUPPORTING FRAME WORK.

2

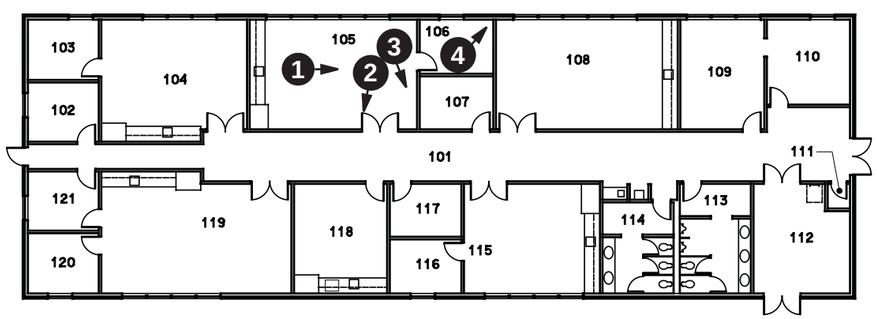
1. DISCONNECT ELECTRICAL POWER FROM THE LASER ALARM SYSTEM.
2. REMOVE THE LASER ALARM SYSTEM, INCLUDING THE LIGHT IN THE HALL.
3. REMOVE CURTAIN BAR AND SUPPORT.

3

1. REMOVE BOOKCASES (3) FROM WALL.
2. SAVE ONE BOOKCASE TO BE USED IN ROOM 116.

4

1. REMOVE BOOKCASE FROM WALL.



BUILDING 5510

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.
2. REMOVE ITEMS AS INDICATED ON SK-5510-11 THRU SK-5510-20.
3. CLEAN FLOOR TILE.
4. PATCH AND PAINT WALLS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510
PREPARATION DRAWING NO. 2

JOB NO 0021-00129	DATE 04/02/03
	REV NO 1
SCALE NONE	DWG NO **SK-5510-12**

1

1. DISCONNECT ELECTRICAL POWER FROM FUME HOOD.
2. DISCONNECT AIR AND WATER FROM FUME HOOD.
3. DISCONNECT DUCTWORK FROM FUME HOOD.
4. REMOVE FUME HOOD.
5. BLANK OFF DUCT WORK.
6. INSTALL COUNTER TOP ON BASE CABINET.

2

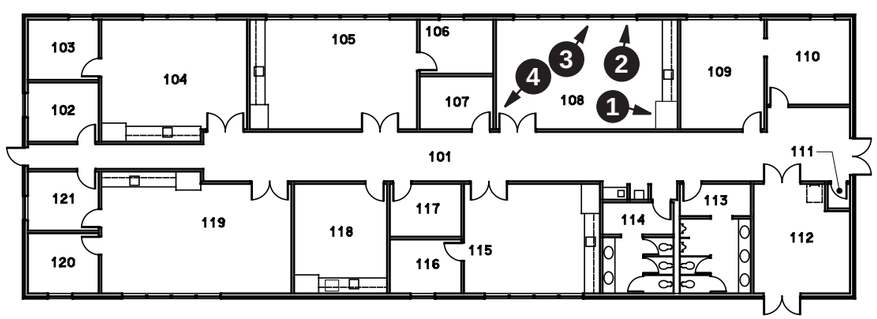
1. REMOVE THE COPPER AND TYGON TUBING VENT LINE BACK TO THE PVC PIPE.
2. INSTALL A PVC VENT LINE WITH A SINGLE NIPPLE BACK TO THE SAME LOCATION AS THE FOUR NIPPLE HEADER.

3

1. REMOVE THE COPPER TUBING AND SEAL THE HOLE THROUGH THE WALL.

4

1. DISCONNECT ELECTRICAL POWER FROM THE LASER ALARM SYSTEM.
2. REMOVE THE LASER ALARM SYSTEM, INCLUDING THE LIGHT IN THE HALL.



BUILDING 5510

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.
2. REMOVE ITEMS AS INDICATED ON SK-5510-11 THRU SK-5510-20.
3. CLEAN FLOOR TILE.
4. PATCH AND PAINT WALLS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510
PREPARATION DRAWING NO. 3

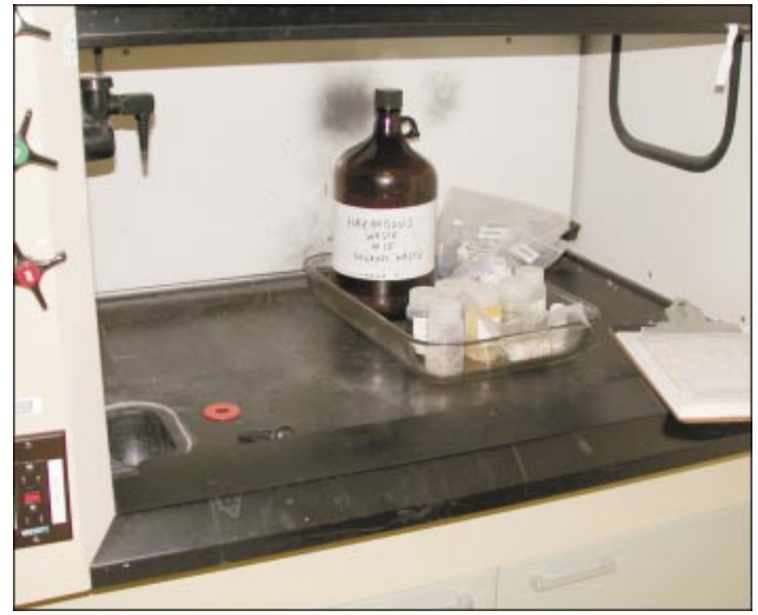
JOB NO 0021-00129	DATE 04/02/03
	REV NO 1
SCALE NONE	DWG NO **SK-5510-13**

1

1. REMOVE THE COPPER TUBING.

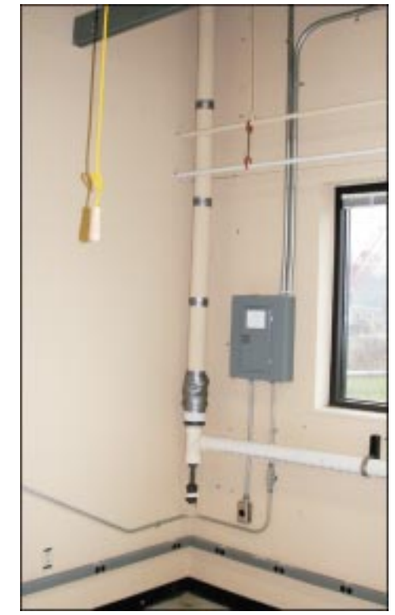
2

1. REMOVE THE COPPER BAR AND ASSOCIATED PARTS FROM THE WALL.
2. REMOVE THE ELECTRICAL WIRING FROM THE FLOOR AND WALL.



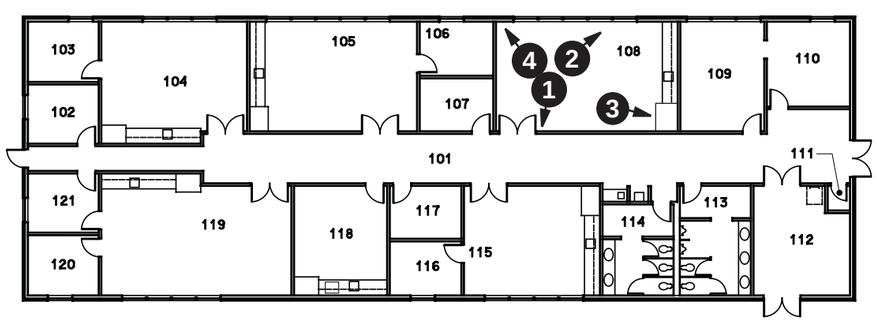
3

1. REMOVE THE HAZARDOUS WASTE FROM THE HOOD.



4

1. REMOVE THE METAL PORTION OF THE VENT PIPE.
2. REPLACE THE VENT PIPE WITH PVC PIPING.



BUILDING 5510

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.
2. REMOVE ITEMS AS INDICATED ON SK-5510-11 THRU SK-5510-20.
3. CLEAN FLOOR TILE.
4. PATCH AND PAINT WALLS.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510
PREPARATION DRAWING NO. 4

JOB NO	DATE 04/02/03
0021-00129	REV NO 1
SCALE NONE	DWG NO **SK-5510-14**

1

1. REMOVE CARPET AND REPLACE WITH TILE.
2. REMOVE SHEET ROCK WALL UNDER THE WINDOW FOR MOLD REMEDIATION.

CAUTION:
TAKE PROPER PRECAUTIONS FOR MOLD REMEDIATION.

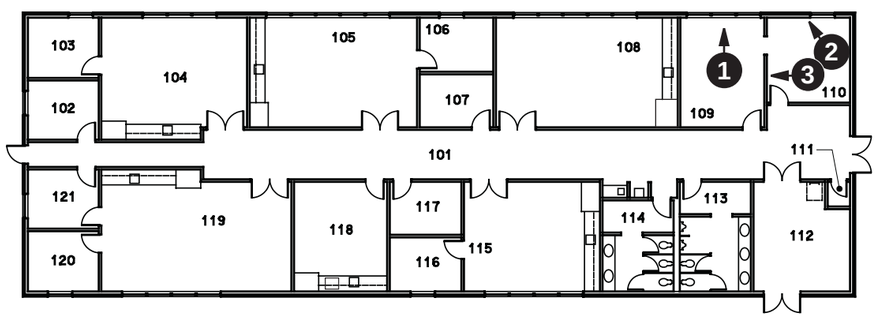
2

1. REMOVE CARPET AND REPLACE WITH TILE.
2. REMOVE SHEET ROCK WALL UNDER THE WINDOW FOR MOLD REMEDIATION.

CAUTION:
TAKE PROPER PRECAUTIONS FOR MOLD REMEDIATION.

3

1. PAINT WALLS IN ROOMS 109 & 110.



BUILDING 5510

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.
2. REMOVE ITEMS AS INDICATED ON SK-5510-11 THRU SK-5510-20.
3. CLEAN FLOOR TILE.
4. PATCH AND PAINT WALLS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510
PREPARATION DRAWING NO. 5

JOB NO 0021-00129	DATE 04/02/03
	REV NO 1
SCALE NONE	DWG NO **SK-5510-15**

1

1. DISCONNECT ELECTRICAL POWER FROM FUME HOOD.
2. DISCONNECT AIR AND WATER FROM FUME HOOD.
3. DISCONNECT DUCTWORK FROM FUME HOOD.
4. REMOVE FUME HOOD.
5. REMOVE ONE SECTION OF WALL CABINET.
6. REMOVE CONDUIT TRAY AND RECEPTACLES TO ALLOW INSTALLATION OF A SIX FOOT HOOD.
7. REMOVE COUNTER TOP TO ALLOW INSTALLATION OF A SIX FOOT HOOD.

2

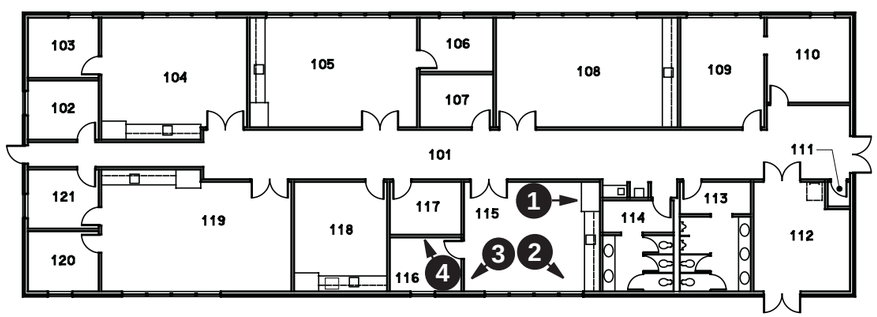
1. DISCONNECT ELECTRICAL POWER FROM RECEPTACLE TRACK.
2. REMOVE RECEPTACLE TRACK AND SUPPORTING FRAME WORK.

3

1. REMOVE METAL PORTION OF THE VENT PIPE.
2. REPLACE THE VENT PIPE WITH PVC PIPING.

4

1. REMOVE THE BOOK CASE ON THE RIGHT AND REPLACE WITH ONE FROM ROOM 105. SEE SK-5510-12



BUILDING 5510

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.
2. REMOVE ITEMS AS INDICATED ON SK-5510-11 THRU SK-5510-20.
3. CLEAN FLOOR TILE.
4. PATCH AND PAINT WALLS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510
PREPARATION DRAWING NO. 6

JOB NO 0021-00129	DATE 04/02/03
	REV NO 1
SCALE NONE	DWG NO **SK-5510-16**

1

1. REMOVE WALL CABINET.

2

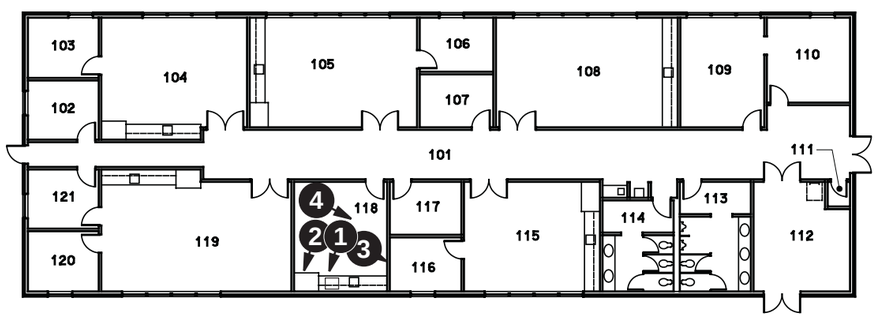
1. DISCONNECT ELECTRICAL POWER FROM FUME HOOD.
2. DISCONNECT AIR AND WATER FROM FUME HOOD.
3. DISCONNECT DUCTWORK FROM FUME HOOD.
4. REMOVE FUME HOOD.
5. INSTALL COUNTER TOP ON BASE CABINET.

3

1. REMOVE WALL CABINET.

4

1. DISCONNECT ELECTRICAL POWER FROM RECEPTACLE TRACK.
2. REMOVE RECEPTACLE TRACK AND SUPPORTING FRAME WORK.



BUILDING 5510

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.
2. REMOVE ITEMS AS INDICATED ON SK-5510-11 THRU SK-5510-20.
3. CLEAN FLOOR TILE.
4. PATCH AND PAINT WALLS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

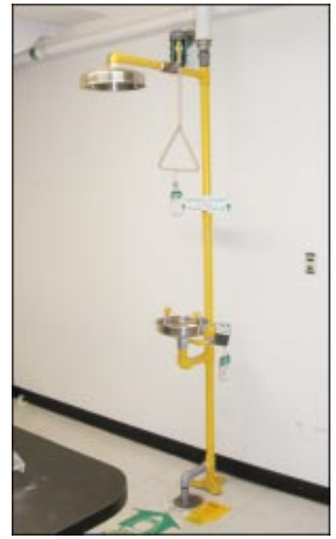
SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510
PREPARATION DRAWING NO. 7

JOB NO 0021-00129	DATE 04/02/03
	REV NO 1
SCALE NONE	DWG NO **SK-5510-17**

1

1. REMOVE FLOOR CABINET AND TOP.



2

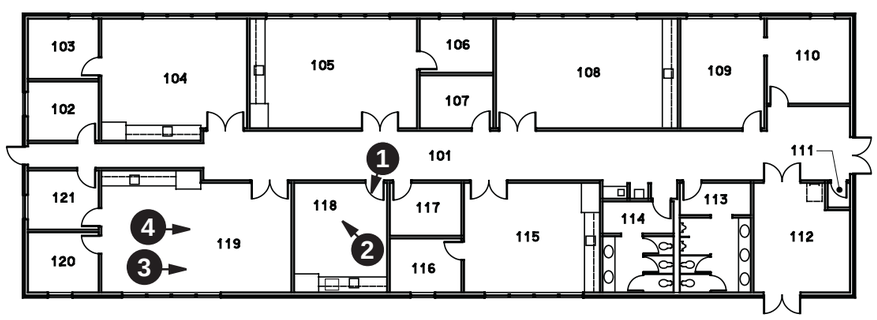
1. REMOVE EMERGENCY SHOWER AND EYEWASH FOUNTAIN.

3

1. DISCONNECT ELECTRICAL POWER FROM FLOOR RECEPTACLE POLE.
2. REMOVE RECEPTACLE POLE AND SUPPORTS.

4

1. DISCONNECT ELECTRICAL POWER FROM RECEPTACLE TRACK.
2. REMOVE RECEPTACLE TRACK AND SUPPORTING FRAME WORK.



BUILDING 5510

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.
2. REMOVE ITEMS AS INDICATED ON SK-5510-11 THRU SK-5510-20.
3. CLEAN FLOOR TILE.
4. PATCH AND PAINT WALLS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510
PREPARATION DRAWING NO. 8

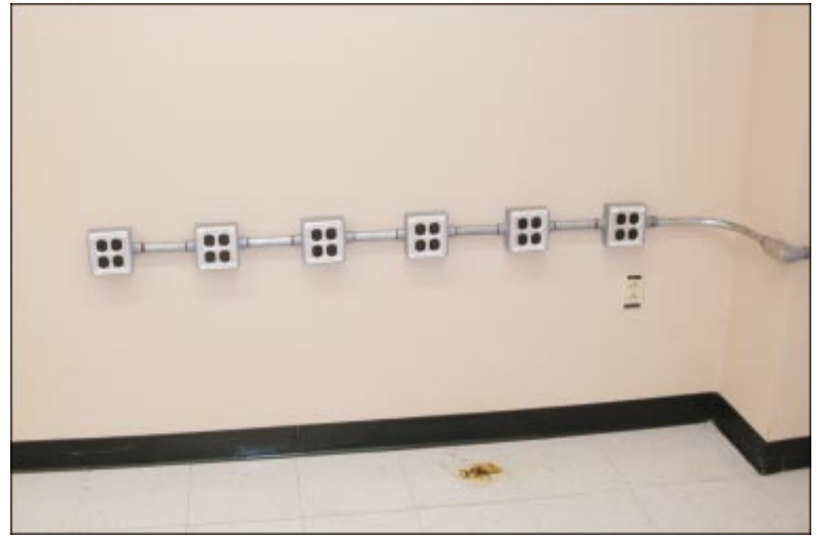
JOB NO 0021-00129	DATE 04/02/03
	REV NO 1
SCALE NONE	DWG NO **SK-5510-18**

1

1. DISCONNECT ELECTRICAL POWER FROM SUSPENDED RECEPTACLES.
2. REMOVE SUSPENDED RECEPTACLES AND SUPPORTING FRAME WORK.

2

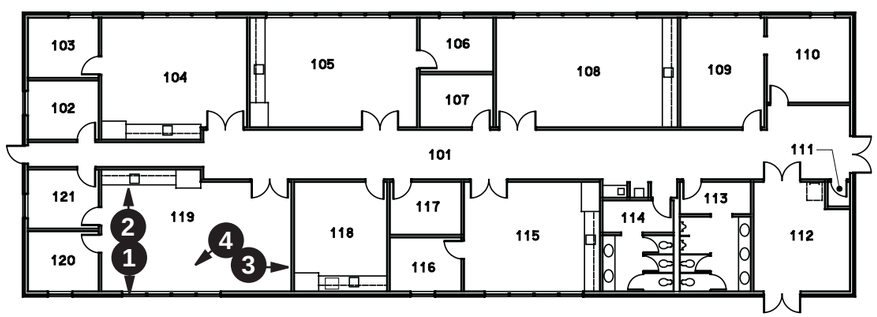
1. DISCONNECT ELECTRICAL POWER FROM SUSPENDED RECEPTACLES.
2. REMOVE SUSPENDED RECEPTACLES AND SUPPORTING FRAME WORK.



3

1. TAG OUT ELECTRICAL POWER FROM RECEPTACLES.
2. RELOCATE RECEPTACLES, EVENLY SPACED, ALONG THE WALL SHOWN IN 4.

4



BUILDING 5510

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.
2. REMOVE ITEMS AS INDICATED ON SK-5510-11 THRU SK-5510-20.
3. CLEAN FLOOR TILE.
4. PATCH AND PAINT WALLS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510
PREPARATION DRAWING NO. 9

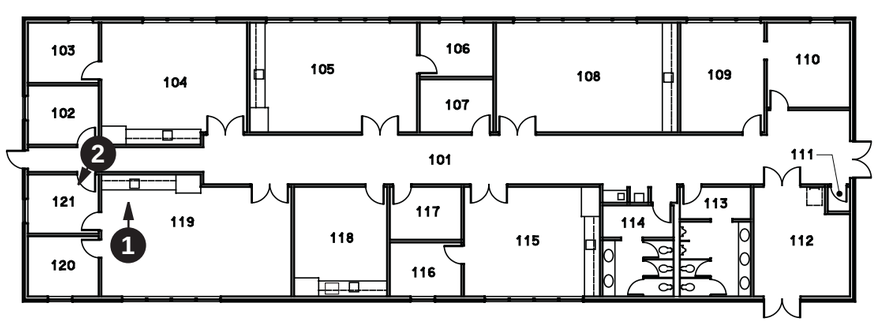
JOB NO 0021-00129	DATE 04/02/03
	REV NO 1
SCALE NONE	DWG NO **SK-5510-19**

1

1. PAINT THE WALL.

2

1. REMOVE SLATS ON WALL.
2. PAINT THE WALL.



BUILDING 5510

NOTES:

1. USE SUFFIX 5510 FOR ALL EQUIPMENT TAGS.
2. REMOVE ITEMS AS INDICATED ON SK-5510-11 THRU SK-5510-20.
3. CLEAN FLOOR TILE.
4. PATCH AND PAINT WALLS.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

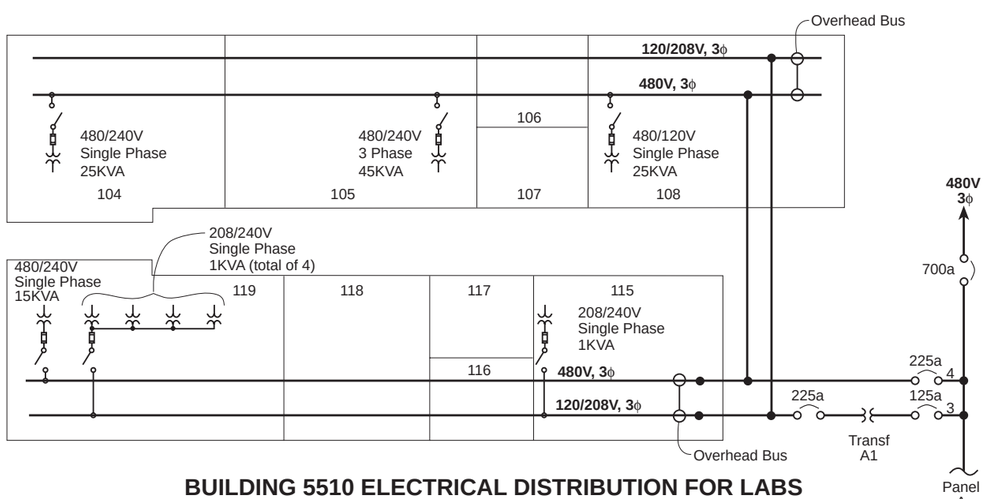
SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB 5510
PREPARATION DRAWING NO. 10

JOB NO	DATE 04/02/03
0021-00129	REV NO 1
SCALE NONE	DWG NO **SK-5510-20**

TAG E5510-	System Description	Voltage	Supply From	Connected Load
Room 105				
IRML-7	EB Evap. Sys./Power Supply, EB Evap. Sys./Vacuum System	208 V, 3 Phase	60 A Fused Disc	40 Amps
		208 V, 3 Phase	30 A Fused Disc	10 Amps
		120 V	Recp	
IRML-10	Northern Hydraulic Press	480 V, 3 Phase	30 A Fused Disc	12 Amps
IRML-30	EB Vacuum Evap. Sys. (4 pkt, Power Supply)	208 V, 3 Phase	60 A Fused Disc	50 Amps
		208 V, 3 Phase	30 A Fused Disc	10 Amps
		120 V	Recp	
IRML-36	30” Box Coater/Vacuum System	240 V, 3 Phase	60 A Fused Disc	20 Amps
		208 V, 3 Phase	100 A Fused Disc	67 Amps
Room 108				
IRML-3	Arc Melter	120 or 240 V	20 A Breaker	550 Watts
		480 V, 3 Phase	30 A Fused Disc and Recp	5 Amps
IRML-4	Mini-Arc Melter	Fed from IRML-3		
IRML-5	Inert Atmosphere Dry Box	120/240 V	20 A Breaker	9.3 Amps
IRML-17	Balances/Tables (3)	120 V	Recp	
IRML-25	Crystal Bar System (Future)	480 V, 3 Phase	30 A Fused Disc	15 Amps
		240 V	20 Amp Bkr	10.6 Amps
		120 V	Recp	
IRML-32	Vacuum Furnace	240 V	10-30P Recp, 30 A Ckt	23 Amps
IRML-33	Inert Box-Evaporator System Cyropump & Compressor	208 or 230 V	20 A Bkr	1,500 Watts
		120 or 240 V	20 A Bkr	
		240 V		
IRML-34	Vacuum Hot Press, Vac Pump, Power Supply	480 V, 3 Phase	60 A Fused Disc and Recp	
		120 or 240 V		
IRML-8	Resistance Evap. Sys./Pwr. Supply Resistance Evap. Sys./Vacuum Sys.	240 V	30 A Fused Disc	

TAG E5510-	System Description	Voltage	Supply From	Connected Load
Room 115				
IRML-6	Veeco RF Sputter System	208 V, 3 Phase	60 A Fused Disc	15 Amps
		208 V	Same Fused Disc	8 Amps
		120 V	Recp	
IRML-9	RFC RF Pr. Supply/Metal Reduction, Vacuum System/Metal Reduction System	480 V, 3 Phase	30 A Fused Disc and Recp	25 Amps
		240 V	20 A Bkr, Rm 108	13.2 Amps
IRML-17	Balances/Tables (3)	120 V	Recp	
IRML-21	Fluoridation System (Hood)	208 or 240 V	L6-30 Recp on 30 A Ckt	
IRML-24	Metal Reduction Sys. Vac. Sys. Lepel 7.5 KW Pwr. Supply (Metal Reduction Systems)	240 V, 3 Phase	60 A Fused Disc, Rm 105	42 Amps
		240 V	30 A Fused Disc	14 Amps
		208 V	Recp	
		120 V	Recp	
Room 118				
IRML-13	Welder Pr. Supply/Welding Table	480 V, 3 Phase	30 A Fused Disc and Recp	4.2 Amps
IRML	Gas Dispensing	480 V, 3 Phase	30 A Fused Disc	5 Amps
		120 V	Recp	
Room 119				
IRML-1	4-High Fenn Rolling Mill	480 V, 3 Phase	30 A Fused Disc	4 Amps
IRML-2	2-High Stanat Rolling Mill	480 V, 3 Phase	30 A Fused Disc	5 Amps
IRML-11	Dake Press	No Electrical		
IRML-12	Swager	120 V	Recp	
IRML-14	Punch	No Electrical		
IRML-15	X-Ray Machine	120 V	Recp	
IRML-16	Furnace	240 V	30 A Fused Disc	20 Amps
IRML-17	Balances/Tables (3)	120 V	Receptacle	
IRML-23	4-High Stanat Rolling Mill	240 V, 3 Phase	30 A Fused Disc, Rm 105	6 Amps
IRML-31	Centorr Arc Melt	120 or 240 V	30 A Fused Disc	1,785 Watts
		480 V, 3 Phase	60 A Fused Disc and Recp	



BUILDING 5510 ELECTRICAL DISTRIBUTION FOR LABS

NOTES:
1. Voltages are single phase unless noted.
2. Fused disconnect switches are to be located on overhead bus. Fuse ratings will be documented when disconnecting equipment.
3. Where equipment can be fed from different voltages (shown as “or”), the higher voltage was previously used.
4. All 120 Volt receptacles are supplies from 20 amp circuit breakers in distribution panels.
5. 120 Volt receptacles for miscellaneous bench top equipment are not shown.
6. Refer to SK-5510-10 for location of equipment in each room.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ISOTOPES RESEARCH MATERIAL LAB E5510
INSTALLATION DRAWING NO. 2

JOB NO 0214-00001	DATE 02/24/03
	REV NO DRAFT 0A
SCALE NONE	DWG NO **SK-5510-21**

Equipment to be moved to Life Sciences Lab:

ITEM NUMBER	TAG	Equipment Name Description/Model Number	W X L X H (inches)	Present Location	Disassembly Drawing	Assembly Drawing
1	1059RM102	Stackable Incubator	30 x 30 x 48	9210	SK-1059-1	SK-1059-5
2	1059RM102	Stackable Incubator	30 x 30 x 48	9210	SK-1059-2	SK-1059-5
3	1059RM102	LN2 FREEZER	20 X 20 X 45	9210	SK-1059-2	SK-1059-5
4	1059RM102	LN2 FREEZER	20 X 20 X 45	9210	SK-1059-2	SK-1059-5
5	1059RM102	LN2 FREEZER	20 X 20 X 45	9210	SK-1059-2	SK-1059-5
6	1059RM102	LN2 FREEZER	30 X 30 X 45	9210	SK-1059-2	SK-1059-5
7	1059RM102	LN2 FREEZER	30 X 30 X 45	9210	SK-1059-2	SK-1059-5
8	1059RM102	Ice Maker	30 x 30 x 36	9210	SK-1059-3	SK-1059-5
9	1059RM102	Control Rate Freezer - Alcohol	24 x 24 x 24	9210	SK-1059-3	SK-1059-5
10	1059RM102	Control Rate Freezer - LN2	24 x 24 x 24	9210	SK-1059-3	SK-1059-5
11	1059RM102	Power Supply Backup	24 x 24 x 24	9210	SK-1059-3	SK-1059-5
12	1059RM102	Oven -Blue M (benchtop)	24 x 24 x 24	9210	SK-1059-4	SK-1059-5
13	1059RM102	Five Microscopes	12 x 12 x 18	9210	SK-1059-4	SK-1059-5
14	1059RM102	PC's and Miscellaneous bench top equipment		9210		SK-1059-5
15	1060RM105	Centrifuge	32 x 36 x 42	9210	SK-1059-11	SK-1059-12
16	1061RM102	Chest Freezer -80 Degree C	70 x 34 x 42	9210	SK-1059-7	SK-1059-10
17	1061RM102	Chest Freezer -80 Degree C	72 x 31 x 42	9210	SK-1059-7	SK-1059-10
18	1061RM102	Chest Freezer -80 Degree C	94 x 31 x 42	9210	SK-1059-7	SK-1059-10
19	1061RM102	Upright Freezer -80 Degree C	34 x 37 x 80	9210	SK-1059-7	SK-1059-10
20	1061RM102	Centrifuge	32 x 36 x 42	9210	SK-1059-7	SK-1059-10
21	1061RM110	Refrigerator	30 x 30 x 72	9210	SK-1059-8	SK-1059-9
22	1061RM110	Refrigerator	30 x 30 x 72	9210	SK-1059-8	SK-1059-9
23	1061RM110	Refrigerator	30 x 30 x 72	9210	SK-1059-8	SK-1059-9
24	1061RM110	Refrigerator	30 x 30 x 72	9210	SK-1059-8	SK-1059-9
25	1061RM110	Chest Freezer	66 x 30 x 42	9210	SK-1059-8	SK-1059-9
26	1061RM110	Glass Door Refrigerator	36 x 30 x 75	9210	SK-1059-8	SK-1059-9
27	1061RM110	Glass Door Refrigerator	36 x 30 x 75	9210	SK-1059-8	SK-1059-9
28	1061RM110	Glass Door Refrigerator	53 x 30 x 75	9210	SK-1059-8	SK-1059-9
29	1061RM110	LN2 Freezer - XLC 1110	35 x 41 x 42	1061 Room 102	SK-1059-6	SK-1059-9
30	1061RM110	LN2 Freezer - XLC 511	23 x 36 x 42	1061 Room 102	SK-1059-6	SK-1059-9
31	1061RM110	LN2 Freezer - Cryo Plus	34 x 48 x 42	1061 Room 102	SK-1059-6	SK-1059-9
32	1061RM110	LN2 Freezer - XLC 511	23 x 36 x 45	1061 Room 102	SK-1059-6	SK-1059-9
33	1060RM108	Ice Maker	30 x 30 36	9210	SK-1059-11	SK-1059-12
34	1060RM101	Table Top Freezer	24 x 24 x 36	9210	SK-1059-11	SK-1059-12
35	1060RM101	Side by Side Refrigerator/Freezer	45 x 36 x 72	9210	SK-1059-11	SK-1059-12
36	STORAGE	Film Processor		9210		
37	STORAGE	Incubator Shaker	24 x 48 x 24	9210		
38	STORAGE	Single Incubator	18 x 24 x 30	9210		

NOTES:
1. CONTACT GENE BARKER AT 574-0865 OR PAGER 417-6312 FOR ADDITIONAL INFORMATION.
2. APPROXIMATELY 300 BOXES WILL BE MOVED IN ADDITION TO THE EQUIPMENT SHOWN IN THIS PACKAGE.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

LIFE SCIENCE DIVISION LABORATORY 1059
DRAWING INDEX AND EQUIPMENT LIST

JOB NO 0214-00001
DATE 04/02/03
REV NO 0A
SCALE NONE
DWG NO **SK-1059-1**

1 2

STACKABLE INCUBATORS

LOCATED IN ROOM 137.

MOVE TO BLDG. 1059, ROOM 102.

3 4 5

LIQUID NITROGEN FREEZERS - MODEL MVE XLC 511 20 INCHES DIAMETER

LOCATED IN 1ST FLOOR HALLWAY NEXT TO ELEVATOR #2.

MOVE TO BUILDING 1059, ROOM 102

6 7

LIQUID NITROGEN FREEZERS - MODEL MVE XLC 1211 30 INCHES DIAMETER

LOCATED IN 1ST FLOOR HALLWAY NEXT TO ELEVATOR #2.

MOVE TO BUILDING 1059, ROOM 102

NOTES:

1. USE SUFFIX 1059 FOR ALL EQUIPMENT TAGS.
2. CONTACT GENE BARKER AT 574-0865 OR PAGER NUMBER 417-6312 FOR ADDITIONAL INFORMATION.
3. THE FREEZERS SHOWN ON DRAWING SK-1059-2 MAY BE DISCONNECTED FROM A NITROGEN SUPPLY FOR A **MAXIMUM OF 48 HOURS**.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

LIFE SCIENCE DIVISION LABORATORY 1059

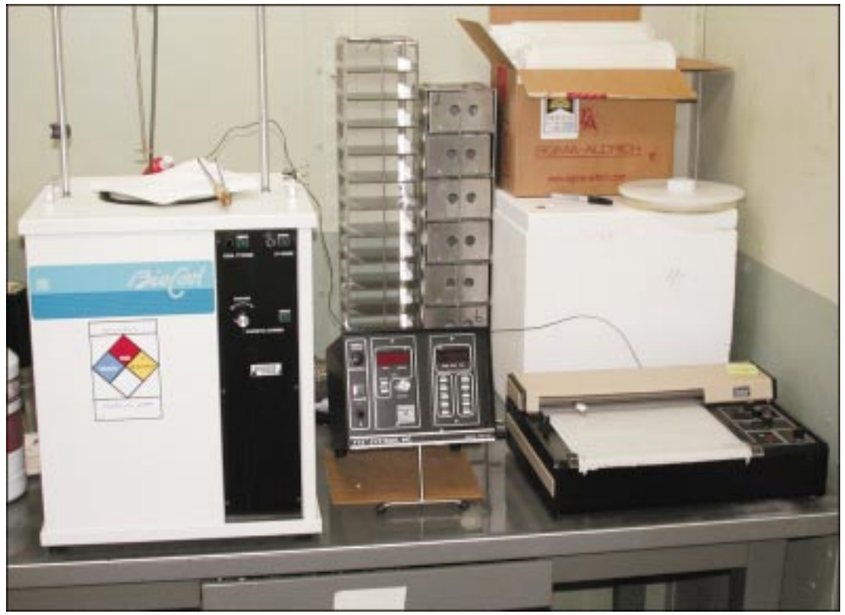
JOB NO 0214-00001	DATE 04/02/03
	REV NO 0
SCALE NONE	DWG NO **SK-1059-2**

8

ICEMAKER

LOCATED NEXT TO ROOM 342.

MOVE TO BUILDING 1059,
ROOM 102.



9

CONTROL RATE FREEZER - ALCOHOL

LOCATED IN ROOM 137.

MOVE TO BUILDING 1059, ROOM 102

10

11

CONTROL RATE FREEZER - NITROGEN AND POWER SUPPLY BACK UP

LOCATED IN ROOM 141.

MOVE TO BUILDING 1059, ROOM 102

NOTES:
1. USE SUFFIX 1059 FOR ALL EQUIPMENT TAGS.
2. CONTACT GENE BARKER AT 574-0865 OR PAGER NUMBER 417-6312 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

LIFE SCIENCE DIVISION LABORATORY 1059

JOB NO 0214-00001	DATE 04/02/03
	REV NO 0
SCALE NONE	DWG NO **SK-1059-3**

12

BLUE M OVEN

LOCATED IN ROOM 137.

MOVE TO BUILDING 1059, ROOM 102.

13

MICROSCOPES - (TYPICAL OF 5)

MOVE TO BUILDING 1059, ROOM 102

NOTES:
1. USE SUFFIX 1059 FOR ALL EQUIPMENT TAGS.
2. CONTACT GENE BARKER AT 574-0865 OR PAGER NUMBER 417-6312 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

LIFE SCIENCE DIVISION LABORATORY 1059

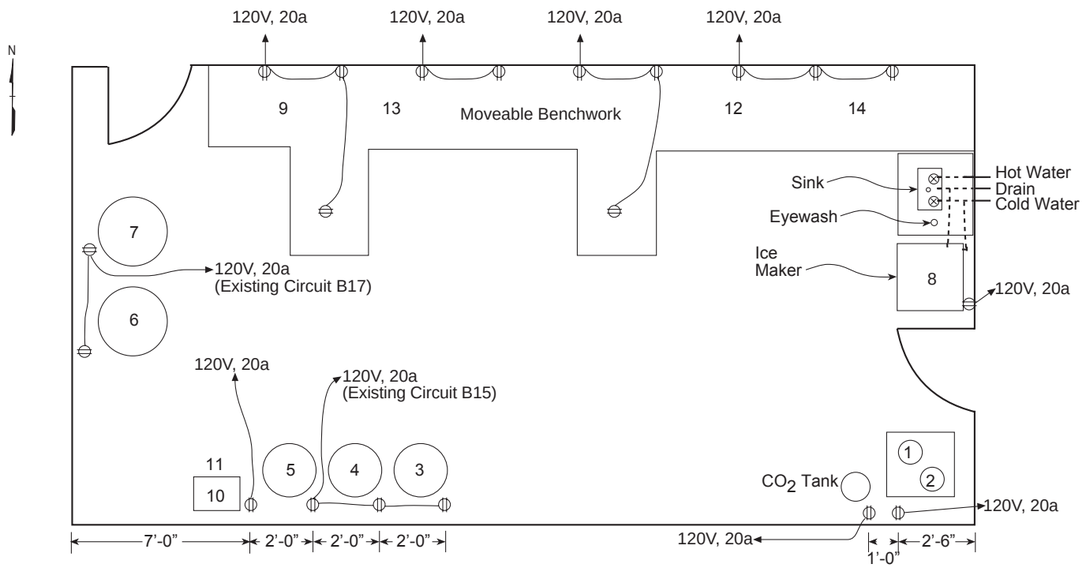
JOB NO 0214-00001

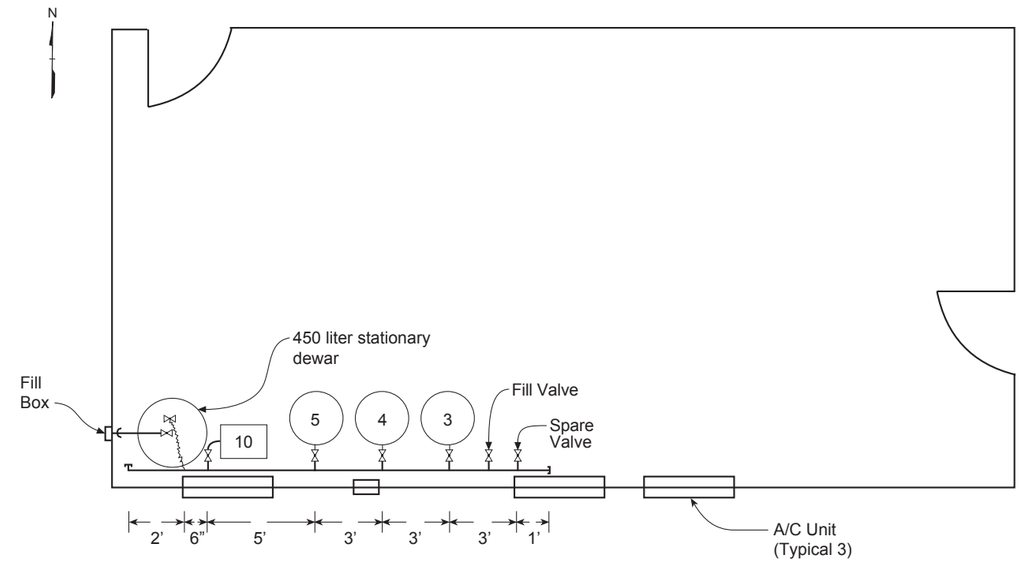
DATE 04/02/03

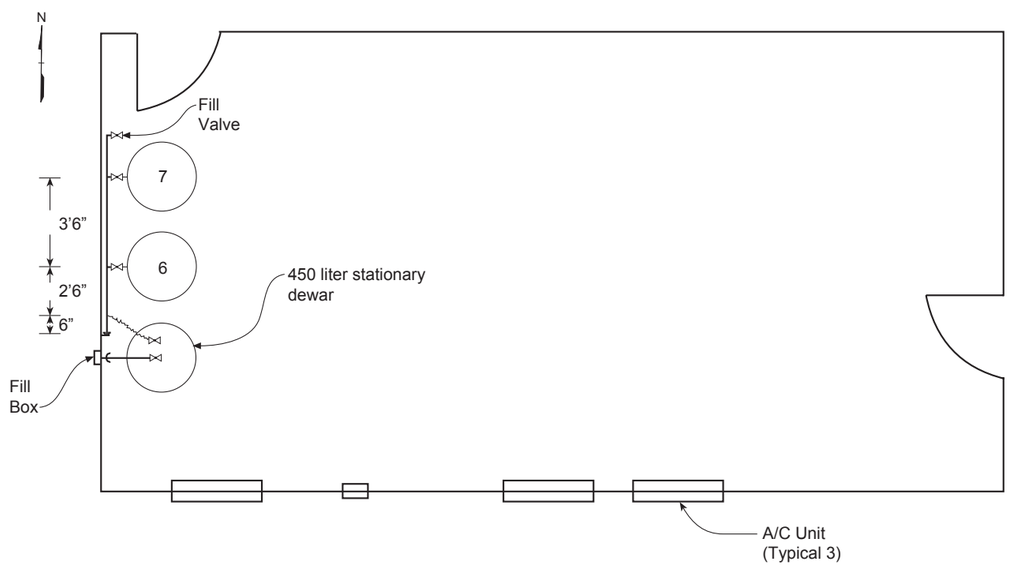
REV NO 0

SCALE NONE

DWG NO **SK-1059-4**







BUILDING 1059, ROOM 102

NOTES:
1. USE SUFFIX 1059 FOR ALL EQUIPMENT TAGS.
2. CONTACT GENE BARKER AT 574-0865 OR PAGER NUMBER 417-6312 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

LIFE SCIENCE DIVISION LABORATORY 1059

JOB NO 0214-00001	DATE 04/09/03
	REV NO 1
SCALE NONE	DWG NO **SK-1059-5**

29

LIQUID NITROGEN FREEZER - MODEL VLC 110

30

LIQUID NITROGEN FREEZER - MODEL MVE XLC 110

31

LIQUID NITROGEN FREEZER - MODEL CRYOPLUS

32

LIQUID NITROGEN FREEZER - MODEL MVE XLC 511

LOCATED IN BUILDING 1061, ROOM 102
MOVE TO BUILDING 1061, ROOM 110

NOTES:
1. USE SUFFIX 1061 FOR ALL EQUIPMENT TAGS.
2. CONTACT GENE BARKER AT 574-0865 OR PAGER NUMBER 417-6312 FOR ADDITIONAL INFORMATION.
3. THIS EQUIPMENT SHOWN ON SK-1059-6 MUST BE MOVED PRIOR TO MOVING THE EQUIPMENT SHOWN ON SK-1059-7.
4. THE FREEZERS SHOWN ON SK-1059-7 MAY BE DISCONNECTED FROM POWER FOR A **MAXIMUM OF 2 HOURS**.
5. THE CENTRIFUGE, ITEM 20, MAY REQUIRE REBALANCING AFTER THE MOVE. USE CARE WHEN TRANSPORTING.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

LIFE SCIENCE DIVISION LABORATORY 1059

JOB NO 0214-00001	DATE 03/28/03
	REV NO 0
SCALE NONE	DWG NO **SK-1059-6**

16

17
(NOT SHOWN)

-80°C CHEST FREEZERS

LOCATED 1ST FLOOR HALLWAY NEXT TO ELEVATOR #2.

LOCATED 3RD FLOOR NEXT TO STAIR #5.

MOVE TO BUILDING 1061, ROOM 102.

18

19

-80°C UPRIGHT FREEZER

LOCATED 2ND FLOOR NEAR ELEVATOR #2.

MOVE TO BUILDING 1061, ROOM 102.

20

CENTRIFUGE

LOCATED IN ROOM 342.

MOVE TO BUILDING 1061, ROOM 102.

NOTES:
1. USE SUFFIX 1061 FOR ALL EQUIPMENT TAGS.
2. CONTACT GENE BARKER AT 574-0865 OR PAGER NUMBER 417-6312 FOR ADDITIONAL INFORMATION.
3. THIS EQUIPMENT SHOWN ON SK-1059-6 MUST BE MOVED PRIOR TO MOVING THE EQUIPMENT SHOWN ON SK-1059-7.
4. THE FREEZERS SHOWN ON SK-1059-7 MAY BE DISCONNECTED FROM POWER FOR A **MAXIMUM OF 2 HOURS**.
5. THE CENTRIFUGE, ITEM 20, MAY REQUIRE REBALANCING AFTER THE MOVE. USE CARD WHEN TRANSPORTING.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

LIFE SCIENCE DIVISION LABORATORY 1059

JOB NO	DATE 04/02/03
0214-00001	REV NO 0
SCALE NONE	DWG NO **SK-1059-7**

21

REFRIGERATOR - (TYPICAL ITEMS 22, 23, 24)

LOCATED VARIOUS LOCATIONS IN BUILDING 9210.

MOVE TO BUILDING 1061, ROOM 110.

25

CHEST FREEZER

LOCATED IN ROOM 131.

MOVE TO BUILDING 1061, ROOM 110.

26

SINGLE GLASS DOOR REFRIGERATOR (TYPICAL ITEM 27)

LOCATED IN ROOM 141.

MOVE TO BUILDING 1061, ROOM 110.

28

DOUBLE GLASS DOOR REFRIGERATOR

LOCATED IN ROOM 342.

MOVE TO BUILDING 1061, ROOM 110.

NOTES:

1. USE SUFFIX 1061 FOR ALL EQUIPMENT TAGS.
2. CONTACT GENE BARKER AT 574-0865 OR PAGER NUMBER 417-6312 FOR ADDITIONAL INFORMATION.
3. THIS EQUIPMENT SHOWN ON SK-1059-6 MUST BE MOVED PRIOR TO MOVING THE EQUIPMENT SHOWN ON SK-1059-7.
4. THE FREEZERS SHOWN ON SK-1059-7 MAY BE DISCONNECTED FROM POWER FOR A **MAXIMUM OF 2 HOURS**.
5. THE CENTRIFUGE, ITEM 20, MAY REQUIRE REBALANCING AFTER THE MOVE. USE CARD WHEN TRANSPORTING.

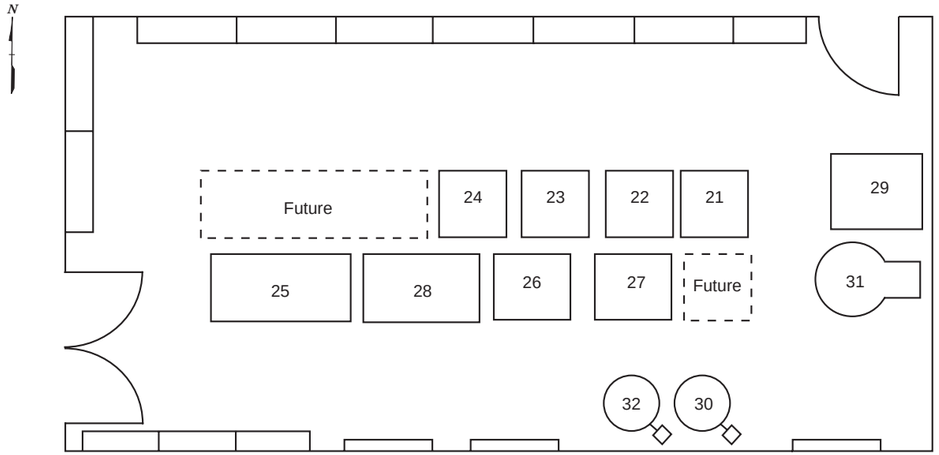
NO	DATE	REVISION	BY	CK	APPR

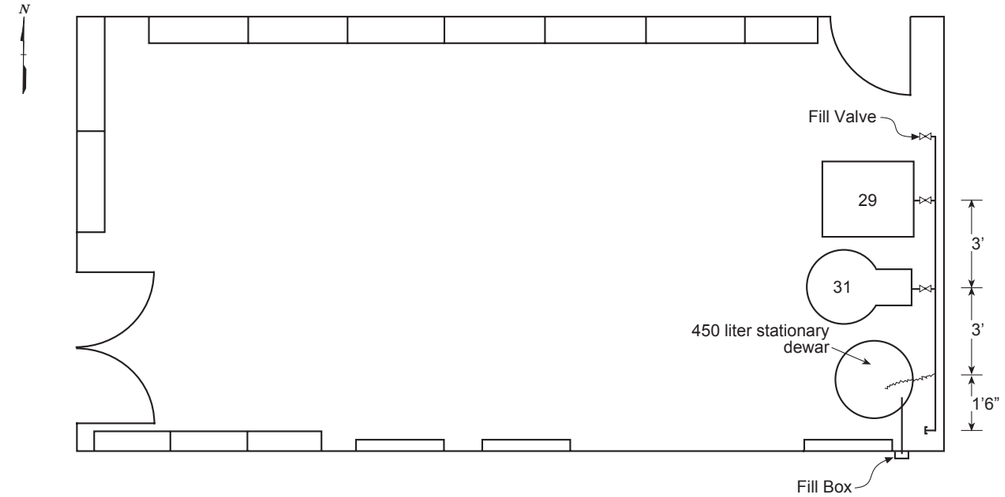
PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

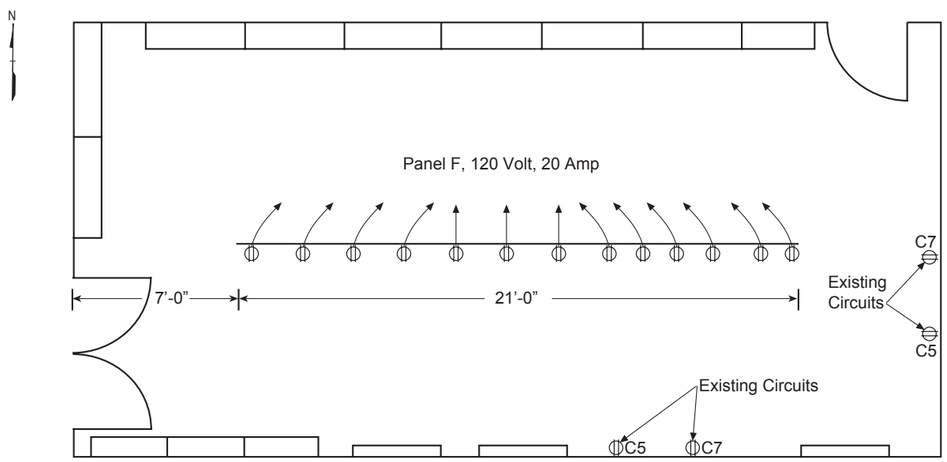
SHEET TITLE

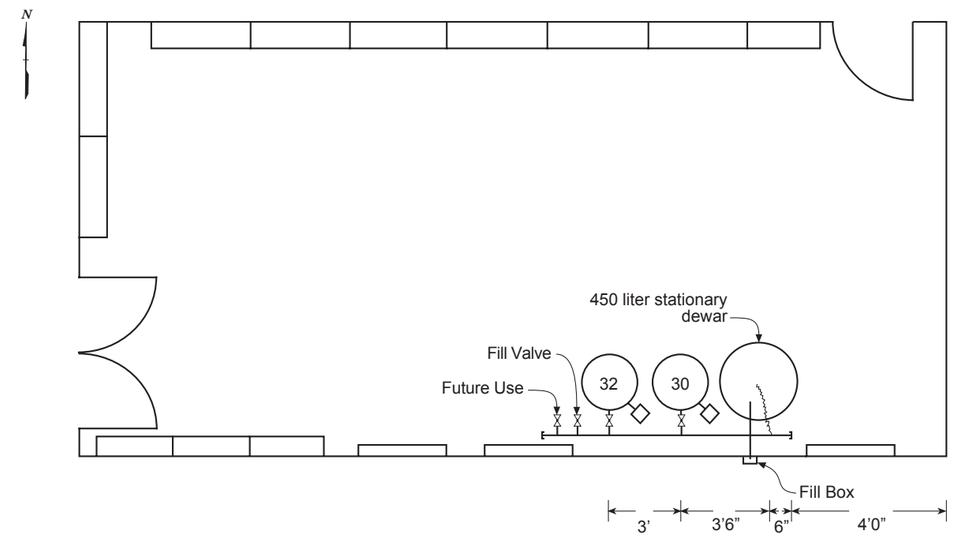
LIFE SCIENCE DIVISION LABORATORY 1059

JOB NO 0214-00001	DATE 04/02/03
	REV NO 0
SCALE NONE	DWG NO **SK-1059-8**









BUILDING 1061, ROOM 110

NOTES:
1. CONTACT GENE BARKER AT 574-0865 OR PAGER NUMBER 417-6312 FOR ADDITIONAL INFORMATION.

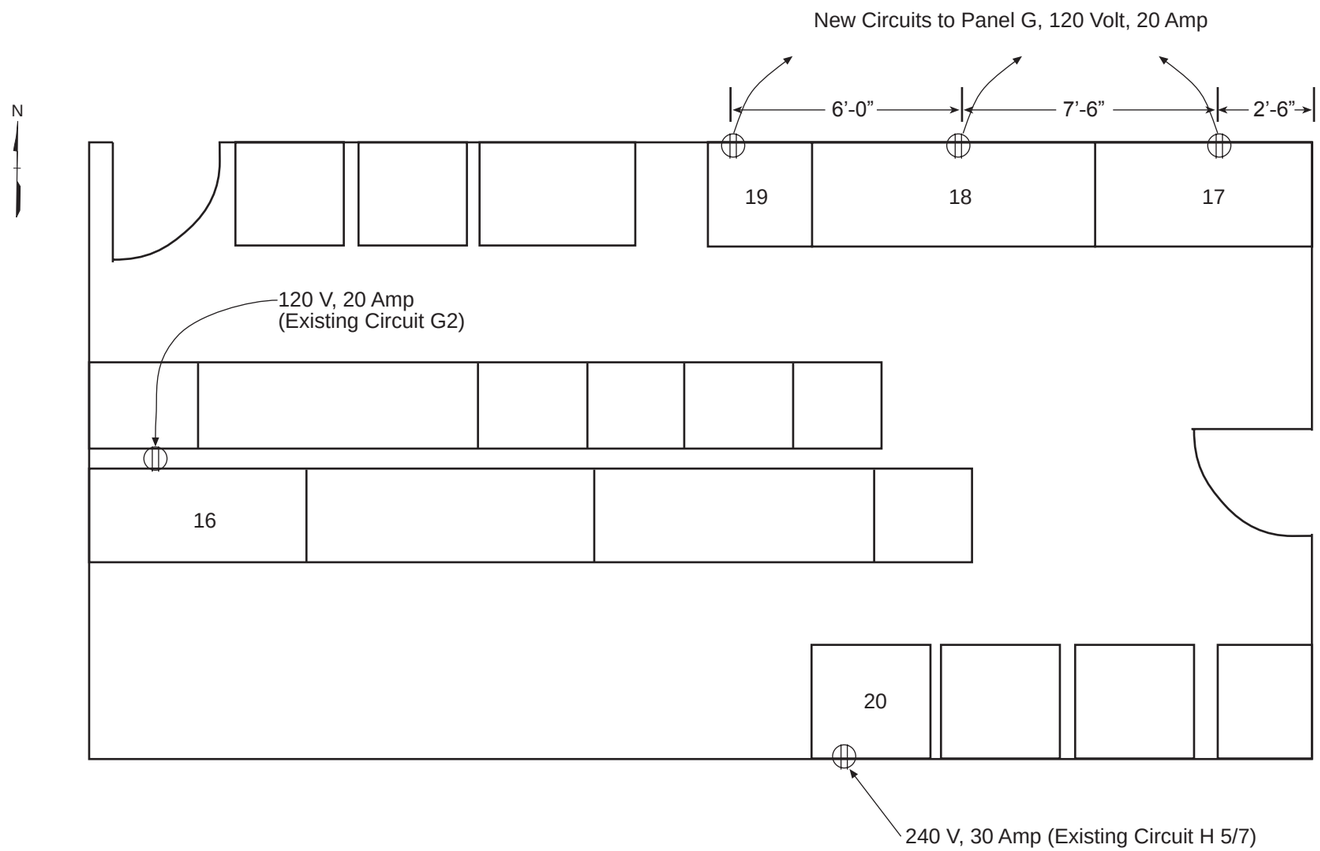
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

LIFE SCIENCE DIVISION LABORATORY 1059

JOB NO 0214-00001	DATE 04/09/03
	REV NO 1
SCALE NONE	DWG NO **SK-1059-9**



BUILDING 1061, ROOM 102

NOTES:

1. CONTACT GENE BARKER AT 574-0865 OR PAGER NUMBER 417-6312 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

LIFE SCIENCE DIVISION LABORATORY 1059

JOB NO 0214-00001	DATE 03/28/03
	REV NO 0
SCALE NONE	DWG NO **SK-1059-10**

33

ICEMAKER

LOCATED NEXT TO ROOM 233A.

MOVE TO BUILDING 1060, ROOM 108.

34

TABLE TOP FREEZER

LOCATED IN ROOM 226.

MOVE TO BUILDING 1060, ROOM 101.

35

REFRIGERATOR

LOCATED IN ROOM 226.

MOVE TO BUILDING 1060, ROOM 101.

15

CENTRIFUGE

LOCATED IN ROOM 342.

MOVE TO BUILDING 1060, ROOM 105.

BALANCING BY THE FACTORY MAY BE REQUIRED AFTER THE MOVE.

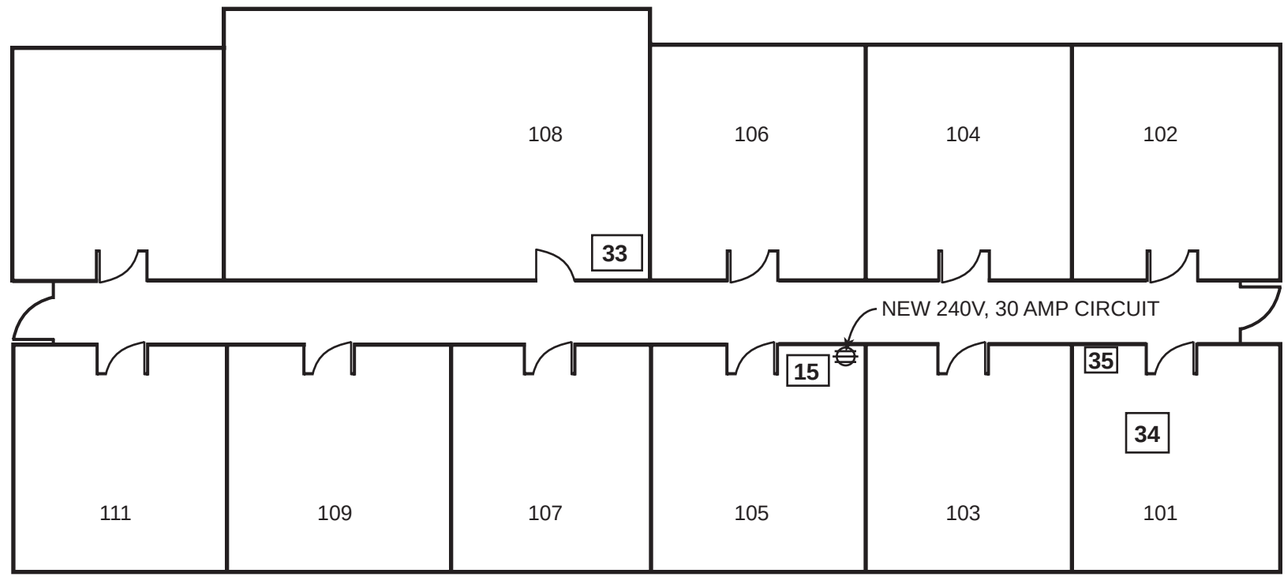
NOTES:
1. USE SUFFIX 1060 FOR ALL EQUIPMENT TAGS.
2. CONTACT GENE BARKER AT 574-0865 OR PAGER NUMBER 417-6312 FOR ADDITIONAL INFORMATION.
3. THE CENTRIFUGE MAY REQUIRE BALANCING AFTER THE MOVE. USE CARE WHEN TRANSPORTING.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

LIFE SCIENCE DIVISION LABORATORY 1059

JOB NO	DATE 04/02/03
0214-00001	REV NO 0
SCALE NONE	DWG NO **SK-1059-11**



BUILDING 1060

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

LIFE SCIENCE DIVISION LABORATORY 1059

JOB NO 0214-00001

DATE 04/02/03

REV NO 0

SCALE NONE

DWG NO **SK-1059-12**

36

FILM PROCESSOR

LOCATED IN ROOM 224.

MOVE TO STORAGE.

UTILITIES: WATER

37

INCUBATOR SHAKER

LOCATED OUTSIDE ROOM 342.

MOVE TO STORAGE.

38

SINGLE INCUBATOR

LOCATED IN ROOM 342.

MOVE TO STORAGE

NOTES:
1. USE SUFFIX 1059 FOR ALL EQUIPMENT TAGS.
2. CONTACT GENE BARKER AT 574-0865 OR PAGER NUMBER 417-6312 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

LIFE SCIENCE DIVISION LABORATORY 1059

JOB NO 0214-00001

DATE 04/02/03

REV NO 0

SCALE NONE

DWG NO **SK-1059-13**

Equipment to be moved to Mechanical Properties Lab 4508:

TAG 4508-	Equipment Name Description/Model	Present Location	Disassembly Drawing	Installation Drawing
MTS-3	1-Loadframe Available for early move	9204-1	SK-4508-2	SK-4508-18
	2-DAS Available for early move	9204-1	SK-4508-2	SK-4508-18
	3-Controller Available for early move	9204-1	SK-4508-2	SK-4508-18
MTS-2	1-Loadframe	9204-1	SK-4508-3	SK-4508-18
	2-DAS	9204-1	SK-4508-3	SK-4508-18
	3-Controller	9204-1	SK-4508-3	SK-4508-18
	4-Heater	9204-1	SK-4508-3	SK-4508-18
	5-Grip Supply	9204-1	SK-4508-3	SK-4508-18
MTS-G	1-Loadframe Available for early move	9204-1	SK-4508-4	SK-4508-18
Blue M Oven	2-Oven Available for early move	9204-1	SK-4508-4	SK-4508-18
K25-220	3-Loadframe Available for early move	9204-1	SK-4508-4	SK-4508-18
MTS-110	1-Loadframe Available for early move	7026	SK-4508-5	SK-4508-18
	2-Heater	9204-1	SK-4508-5	SK-4508-18
BOE #3	1-Loadframe Available for early move	9204-1	SK-4508-6	SK-4508-18
	2-Controller Available for early move	9204-1	SK-4508-6	SK-4508-18
	3-DAS Available for early move	9204-1	SK-4508-6	SK-4508-18
MTS #1	1-Loadframe Available for early move	9204-1	SK-4508-7	SK-4508-18
	2-Grip Supply Available for early move	9204-1	SK-4508-7	SK-4508-18
	3-Controller Available for early move	9204-1	SK-4508-7	SK-4508-18
	4-Das Available for early move	9204-1	SK-4508-7	SK-4508-18
BOE #2	1-Loadframe	9204-1	SK-4508-8	SK-4508-18
	2-DAS	9204-1	SK-4508-8	SK-4508-18
	3-Controller	9204-1	SK-4508-8	SK-4508-18
MTS-HG	1-Loadframe Available for early move	9204-1	SK-4508-9	SK-4508-18
	2-Oven Available for early move	9204-1	SK-4508-9	SK-4508-18
	3-Heater	9204-1	SK-4508-9	SK-4508-18
INSTRON 1332	1-Loadframe Available for early move	4515, Room L-100	SK-4508-10	SK-4508-18
	2-Controller Available for early move	4515, Room L-100	SK-4508-10	SK-4508-18
INSTRON High Rate	1-Loadframe	4500S, Room 269	SK-4508-11	SK-4508-18
	2-DAS	4500S, Room 269	SK-4508-11	SK-4508-18
	3-Controller	4500S, Room 269	SK-4508-11	SK-4508-18
	4-Heater	4500S, Room 269	SK-4508-11	SK-4508-18

Equipment to be moved to Mechanical Properties Lab 4508 (cont'd):

TAG 4508-	Equipment Name Description/Model	Present Location	Disassembly Drawing	Installation Drawing
K-25 10 KIP	1-Loadframe Available for early move	NTRC Room L-111	SK-4508-12	SK-4508-18
	2-DAS	4500S B54	SK-4508-12	SK-4508-18
BOE #1	1-Loadframe	9204-1	SK-4508-13	SK-4508-18
	2-DAS	9204-1	SK-4508-13	SK-4508-18
	3-Controller	9204-1	SK-4508-13	SK-4508-18
MISC DAS	1-HYD-06 DAS Available for early move	9204-1	SK-4508-14	SK-4508-18
	2-HYD-07 DAS Available for early move	9204-1	SK-4508-14	SK-4508-18
	3-Unassigned DAS Available for early move	9204-1	SK-4508-14	SK-4508-18
INSTRON 550 KIP	1-Loadframe	9204-1	SK-4508-15	SK-4508-18
	2-Controller	9204-1	SK-4508-15	SK-4508-18
	3-Hydraulic Pump	9204-1	SK-4508-15	SK-4508-18
	4-Accoustical Enclosure	9204-1	SK-4508-15	SK-4508-18
Misc Equipment	1-Gas Gun and Pendulum	9204-1	SK-4508-16	SK-4508-18
	2-Vacuum System	9204-1	SK-4508-16	SK-4508-18
	3-Optical Table	9204-1	SK-4508-16	SK-4508-18
MTS-6	1-Loadframe	4508, Room 121	SK-4508-17	SK-4508-18
	2-DAS	9204-1	SK-4508-17	SK-4508-18

NOTES:

1. Rick Battiste (574-0736) will field direct the connection of equipment being moved to the Mechanical Properties Lab Room 121, Building 4508.
2. Use 4508 room suffix for all equipment tags.
3. M&CD will package all loose equipment and will label all equipment and boxes to be moved.
4. M&CD will provide all safety support (IH, H&S, etc.) required for the move. M&CD will provide HP surveys or use process knowledge to obtain any required green tags for equipment to be moved to ETF.
5. M&CD will remove all interconnecting wiring between lab equipment prior to the move and will reconnect this wiring after the move.
6. Equipment lined through or X'd out has been removed from the scope of the move.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 04/30/03
REV NO 1
SCALE NONE
DWG NO **SK-4508-1**

1

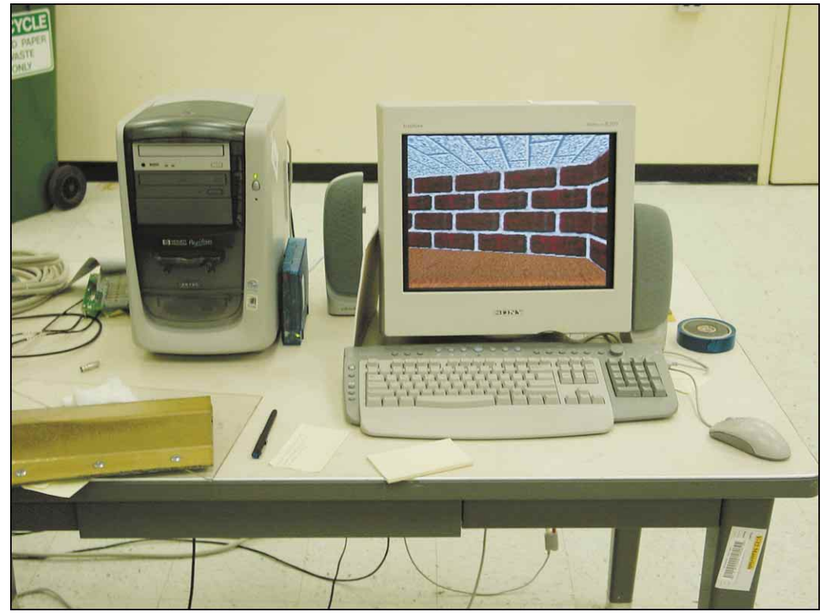
MTS-3

CAPACITY: 50 KIP
HEIGHT: 13' 9"
DISCONNECT THE FOLLOWING UTILITIES:

1/2 INCH AIR LINE
40 AMP, 240 V/SINGLE PHASE CIRCUIT
1/2 INCH PROCESS WATER SUPPLY
1/2 INCH PROCESS WATER RETURN
10 AMP, 120 V CIRCUIT
3 EACH, 3/4 INCH HYDRAULIC LINE

SPECIAL INSTRUCTIONS: WILL REQUIRE DISASSEMBLY. STANDARD TORQUE WRENCH NEEDED.

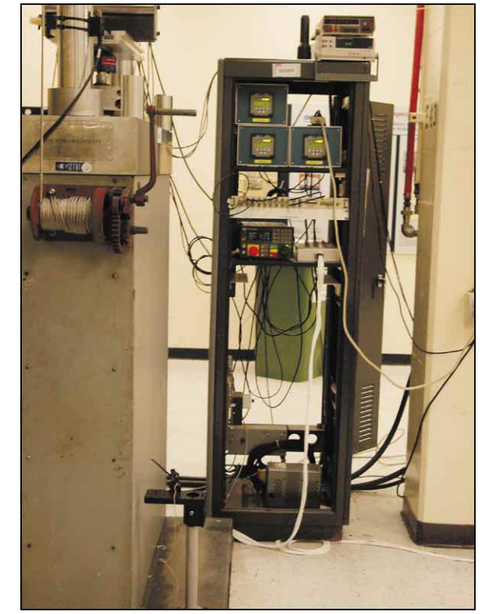
AVAILABLE FOR EARLY MOVE



2

DAS
MTS-3

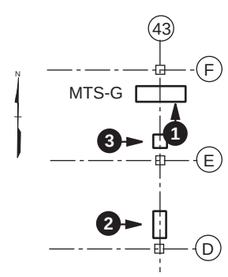
AVAILABLE FOR EARLY MOVE



3

CONTROLLER
MTS-3

AVAILABLE FOR EARLY MOVE



BUILDING 9204-1
FIRST FLOOR

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
MTS-3

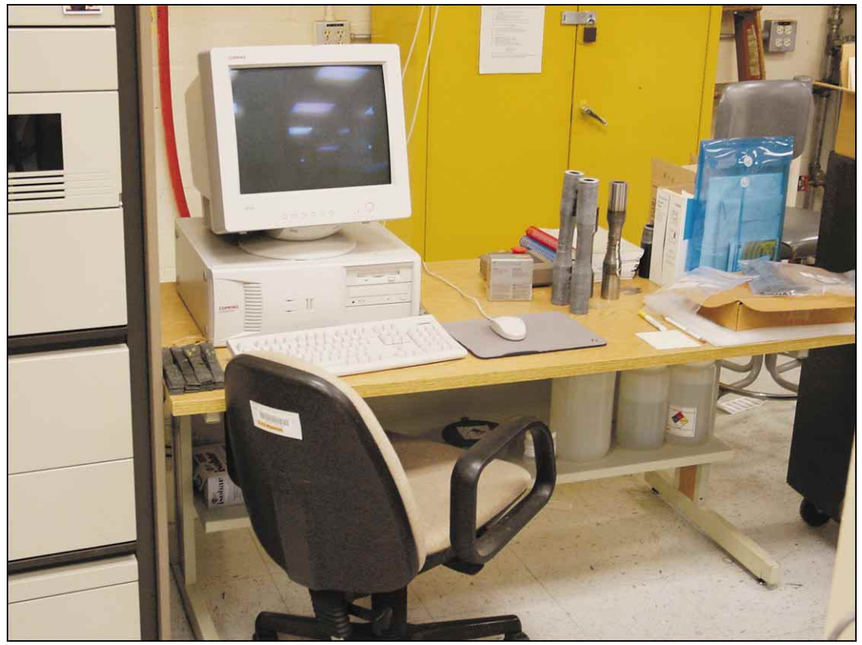
JOB NO	PDC 0214-00001	DATE	04/30/03
		REV NO	1
SCALE	NONE	DWG NO	**SK-4508-2**

1

MTS-2
TEST STAR A/T

CAPACITY: 50 KIP/20K IN LB
HEIGHT: 11' 7"
WEIGHT: 3-4000 POUNDS
DISCONNECT THE FOLLOWING UTILITIES:

1/2 INCH AIR LINE
40 AMP, 240 V/SINGLE PHASE CIRCUIT
1/2 INCH PROCESS WATER SUPPLY
1/2 INCH PROCESS WATER RETURN
20 AMP, 120 V/SINGLE PHASE CIRCUIT

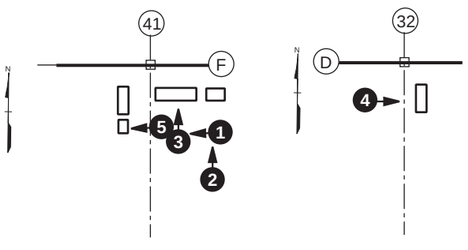


2

DAS
MTS 2
TEST START A/T

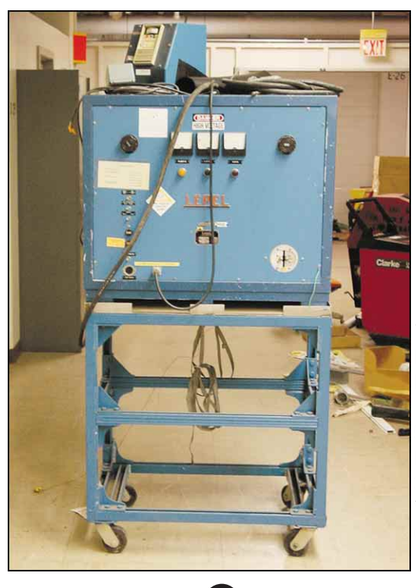
3

CONTROLLER
MTS 2
TEST STAR A/T



BUILDING 9204-1
FIRST FLOOR

BUILDING 9204-1
FIRST FLOOR



THESE UTILITIES HAVE BEEN DISCONNECTED:

5 AMP, 240 V/SINGLE PHASE CIRCUIT
32 AMP, 240 VOLT/THREE PHASE CIRCUIT

4

LEPEL HEATER AND WATER COOLER MTS-2 TEST STAR A/T

5

GRIP SUPPLY

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
MTS-2

JOB NO 0214-00001
DATE 04/30/03
REV NO 1
SCALE NONE
DWG NO **SK-4508-3**

1

MTS-G

CAPACITY: 110 KIPS
HEIGHT: 13' 4"
WEIGHT: 5000 POUNDS

DISCONNECT THE FOLLOWING UTILITIES:

1/2 INCH AIR LINE
40 AMP, 240 V/SINGLE PHASE CIRCUIT
1/2 INCH PROCESS WATER SUPPLY
1/2 INCH PROCESS WATER RETURN
10 AMP, 120 V CIRCUIT
3 EACH, 1 INCH HYDRAULIC LINE

SPECIAL INSTRUCTIONS: WILL REQUIRE DISASSEMBLY. HYDRAULIC TORQUE WRENCH NEEDED.

AVAILABLE FOR EARLY MOVE

2

BLUE M OVEN

WELDING RECEPTACLE CONNECTION
JUST UNPLUG

AVAILABLE FOR EARLY MOVE

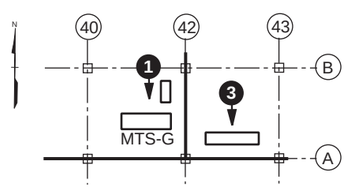
3

K25 - 220K

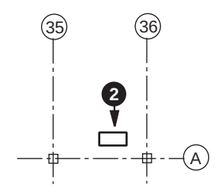
CAPACITY: 220 KIP
HEIGHT: 12' 2"
WEIGHT: 8-10,000 POUNDS

DISCONNECTED.

AVAILABLE FOR EARLY MOVE



BUILDING 9204-1
FIRST FLOOR



BUILDING 9204-1
FIRST FLOOR

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGE AT 873-5048 FOR ADDITIONAL INFORMATION.
3. A NEW DAS WILL BE REQUIRED.

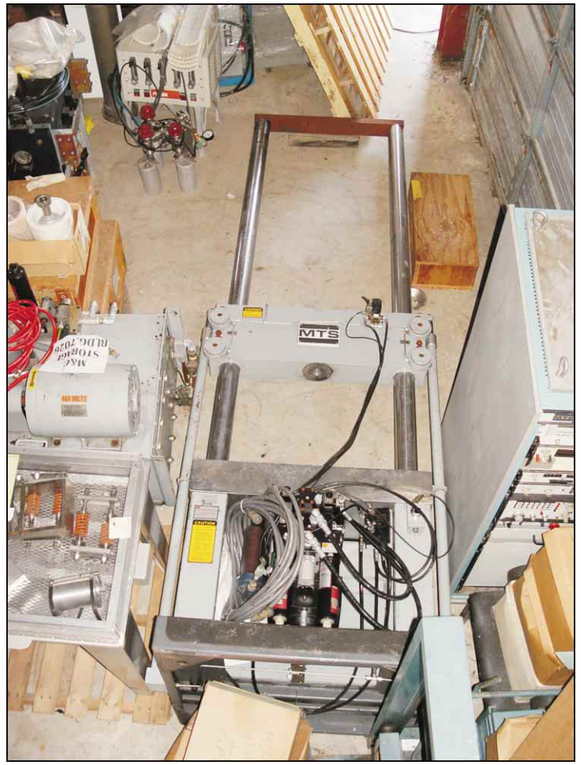
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
MTS-G, K25-220

JOB NO PDC 0214-00001	DATE 04/30/03
	REV NO 1
SCALE NONE	DWG NO **SK-4508-4**



1

MTS 110
2 - POST

CAPACITY: 110 KIP
HEIGHT: 12' 5"
WEIGHT: 5000 POUNDS

UTILITIES ARE DISCONNECTED

LOCATION: BUILDING 7026 (IN STORAGE)

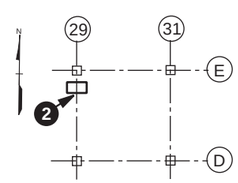
AVAILABLE FOR EARLY MOVE

2

LEPEL
30 KW
RF HEATER
MTS 110

UTILITIES HAVE BEEN DISCONNECTED

SITS ON CASTERS



BUILDING 9204-1
FIRST FLOOR

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.
3. A NEW DAS WILL BE REQUIRED.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
MTS 110

JOB NO PDC 0214-00001	DATE 04/30/03
	REV NO 1
SCALE NONE	DWG NO **SK-4508-5**

1

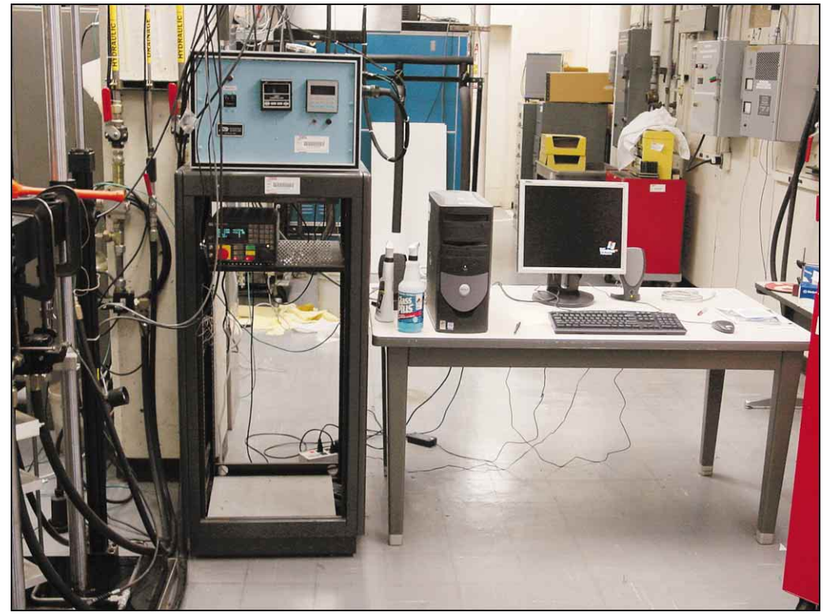
BOE #3

CAPACITY: 10 KIP
HEIGHT: 10' 3"
WEIGHT: 2500 POUNDS

DISCONNECT THE FOLLOWING UTILITIES:

1/2 INCH AIR LINE
10 AMP, 120 V CIRCUIT
1/2 INCH PROCESS WATER SUPPLY
1/2 INCH PROCESS WATER RETURN
3 EACH, 3/4 INCH HYDRAULIC LINE

AVAILABLE FOR EARLY MOVE



2

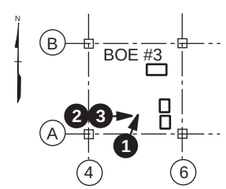
CONTROLLER
BOE #2

AVAILABLE FOR EARLY MOVE

3

DAS
BOE #2

AVAILABLE FOR EARLY MOVE



BUILDING 9204-1
FIRST FLOOR

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
BOE#3

JOB NO PDC 0214-00001	DATE 04/30/03
	REV NO 1
SCALE NONE	DWG NO **SK-4508-6**

1

MTS#1
A/T

CAPACITY: 50 KIP, 20K IN LB
HEIGHT: 11' 7"
WEIGHT: 3-4000 POUNDS

DISCONNECT THE FOLLOWING UTILITIES:

1/2 INCH AIR LINE
40 AMP, 120 V CIRCUIT
10 AMP, 120 V CIRCUIT
1/2 INCH PROCESS WATER SUPPLY
1/2 INCH PROCESS WATER RETURN
3 EACH, 3/4 INCH HYDRAULIC LINE

SPECIAL INSTRUCTIONS: OVEN IS TO BE REMOVED.

AVAILABLE FOR EARLY MOVE

2

GRIP SUPPLY
MTS#1
A/T

AVAILABLE FOR EARLY MOVE

3

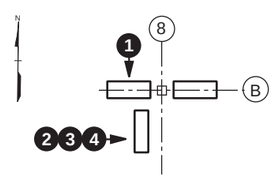
CONTROLLER
MTS#1
A/T

AVAILABLE FOR EARLY MOVE

4

DAS
MTS#1
A/T

AVAILABLE FOR EARLY MOVE



BUILDING 9204-1
FIRST FLOOR

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
MTS#1

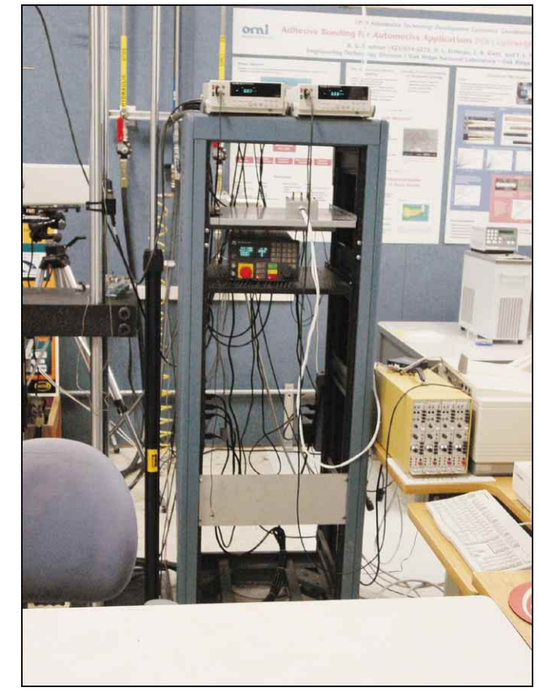
JOB NO PDC 0214-00001	DATE 04/30/03
	REV NO 1
SCALE NONE	DWG NO **SK-4508-7**

1

BOE #2

2

DAS
BOE #2



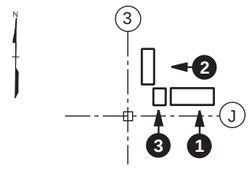
3

CONTROLLER
BOE #2

CAPACITY: 10 KIP
HEIGHT: 10'-3"
WEIGHT: 2500 POUNDS

DISCONNECT THE FOLLOWING UTILITIES:

1/2 INCH AIR LINE
40 AMP, 240 V CIRCUIT
10 AMP, 120 V CIRCUIT
20 AMP, 120 V CIRCUIT
1/2 INCH PROCESS WATER SUPPLY
1/2 INCH PROCESS WATER RETURN
3 EACH, 3/4 INCH HYDRAULIC LINE



BUILDING 9204-1
SECOND FLOOR (ROOM 246)

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
BOE#2

JOB NO PDC 0214-00001	DATE 04/30/03
	REV NO 1
SCALE NONE	DWG NO **SK-4508-8**

1

MTS-HG

CAPACITY: 110 KIP
HEIGHT: 10' 2"

DISCONNECT THE FOLLOWING UTILITIES:

1/2 INCH AIR LINE
40 AMP, 240 V CIRCUIT
10 AMP, 120 V CIRCUIT
1/2 INCH PROCESS WATER SUPPLY
1/2 INCH PROCESS WATER RETURN
3 EACH, 1 INCH HYDRAULIC LINE

NOTE: A NEW DAS AND CONTROL CABINET WILL BE PURCHASED. EXISTING CONTROLLER NEEDS TO BE DISCONNECTED.

AVAILABLE FOR EARLY MOVE

2

OVEN MTS-HG

REMOVE OVEN FROM MTS-HG.
MOVE TO BLDG. 4508 ROOM 121.

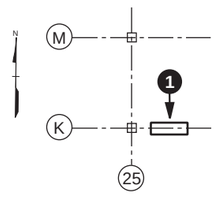
3

LEPEL 50 KW RF HEATER
MTS-HG

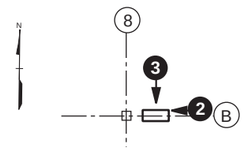
DISCONNECT THE FOLLOWING UTILITIES:

1-1/2" INCH WATER LINE, SUPPLY AND RETURN.
150 AMP, 440 VOLT. (2" CONDUIT)

MOVE TO STORAGE, BUILDING 7026



BUILDING 9204-1
FIRST FLOOR



BUILDING 9204-1
FIRST FLOOR

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.
3. NEW DAS REQUIRED.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
MTS-HG

JOB NO PDC 0214-00001	DATE 04/30/03
	REV NO 1
SCALE NONE	DWG NO **SK-4508-9**

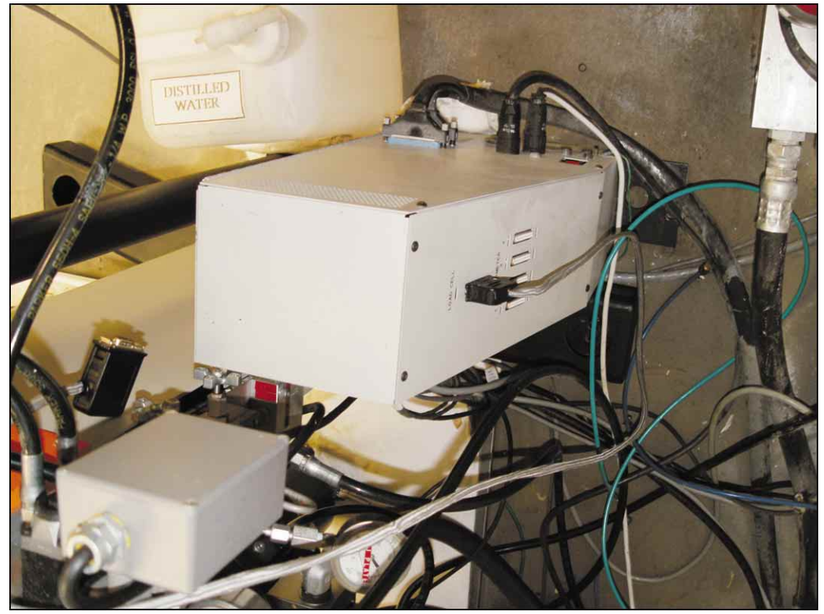
1

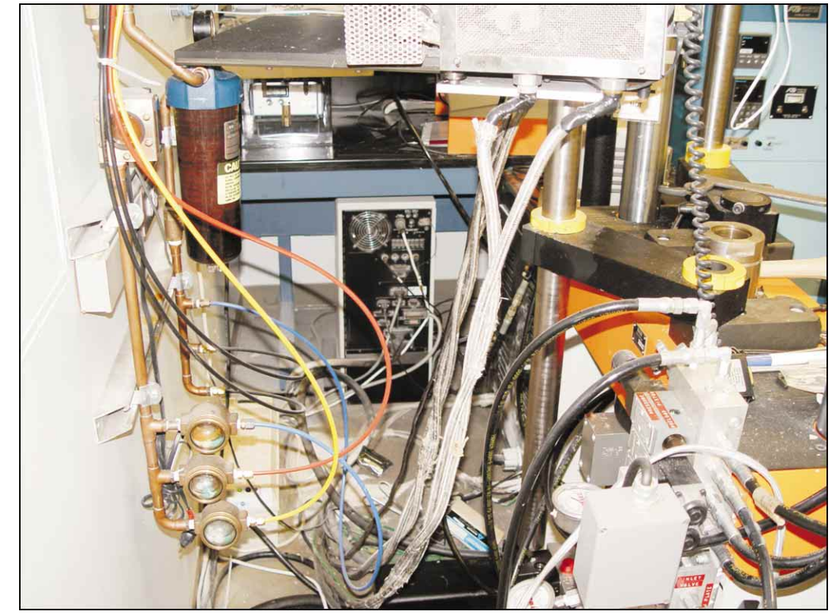
INSTRON 1332 LOAD FRAME, DAS, GRIP SUPPLY AND TEMPERATURE CONTROLLER

CAPACITY: 50 KIPS
HEIGHT: 10’ 3”
WEIGHT: 4000 POUNDS
DISCONNECT THE FOLLOWING UTILITIES:
INCH AIR LINE
AMP, 240 V/SINGLE PHASE CIRCUIT
INCH PROCESS WATER SUPPLY
INCH PROCESS WATER RETURN
AMP, 120 V CIRCUIT
3 EACH, INCH HYDRAULIC LINE

AVAILABLE FOR EARLY MOVE

PRESENT LOCATION:
BUILDING 4515 (HTML)
ROOM L-100





2

CONTROLLER

IT IS IN TWO PARTS.

AVAILABLE FOR EARLY MOVE

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.
3. PUMP AND SERVICE MANIFOLD ARE TO BE DISPOSED.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
INSTRON 1332

JOB NO PDC 0214-00001	DATE 04/30/03
	REV NO 1
SCALE NONE	DWG NO **SK-4508-10**

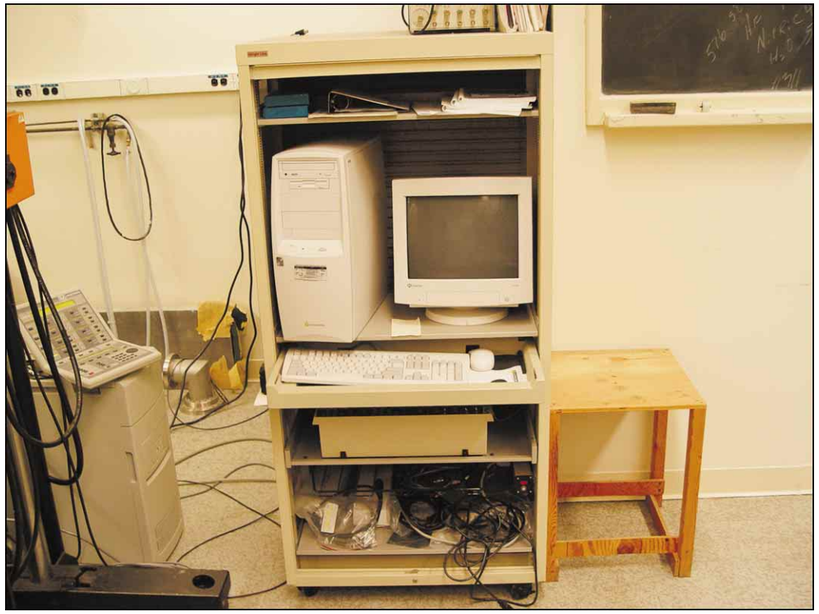
1

INSTRON HIGH RATE MODEL 1321

CAPACITY: 10 - 20 KIP
HEIGHT: 10’
WEIGHT: 4000 #
DISCONNECT THE FOLLOWING UTILITIES:
INCH AIR LINE
AMP, 240 V/SINGLE PHASE CIRCUIT
INCH PROCESS WATER SUPPLY
INCH PROCESS WATER RETURN
AMP, 120 V CIRCUIT
3 EACH, INCH HYDRAULIC LINE
LOCATION: BUILDING 4500S, ROOM S-269

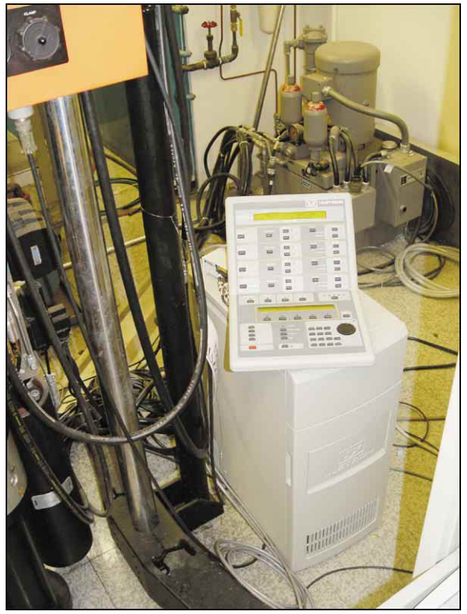
SPECIAL INSTRUCTIONS: BASE OF LOAD FRAME WILL HAVE TO BE REMOVED. PUMP IS TO BE DISPOSED.

PRESENT LOCATION:
BUILDING 4500S
ROOM S-269



2

DAS INSTRON HIGH RATE



3

CONTROLLER INSTRON HIGH RATE

PRESENTLY LOCATED IN
STORAGE AT ORNL 4500S, B54

4

LEPEL HEATER

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.
3. ADDITIONAL CONTACT IS C.T. LIU, 574-4459.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
INSTRON HIGH RATE

JOB NO PDC 0214-00001	DATE 04/30/03
	REV NO 1
SCALE NONE	DWG NO **SK-4508-11**

PRESENTLY LOCATED IN STORAGE AT
ORNL 4500S, B54

1

K-25
10 KIP

2

DAS

CAPACITY: 10 KIP
HEIGHT: 8'
WEIGHT:
UTILITIES ARE DISCONNECTED.
LOCATION: NTRC, ROOM L-111

AVAILABLE FOR EARLY MOVE

PRESENT LOCATION:
NTRC
ROOM L-111

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
K-25 10 KIP

JOB NO PDC 0214-00001

DATE 04/30/03

REV NO 1

SCALE NONE

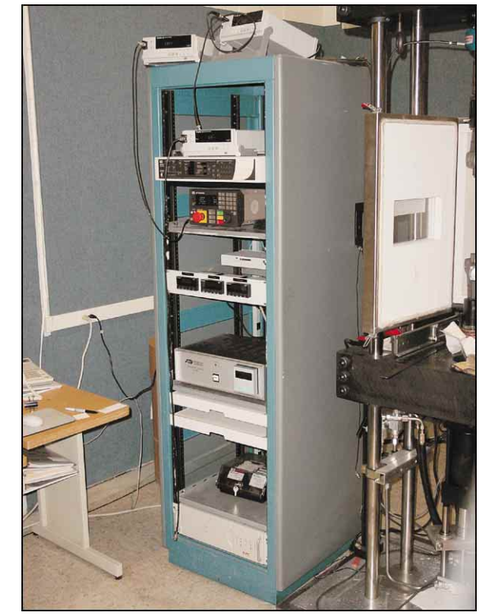
DWG NO **SK-4508-12**

1

LOAD FRAME
BOE#1

2

DAS
BOE#1



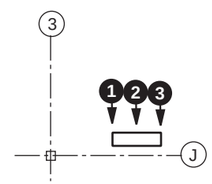
3

CONTROLLER
BOE#1

CAPACITY: 20 KIP
HEIGHT: 10’
WEIGHT: 3500 POUNDS

DISCONNECT THE FOLLOWING UTILITIES:

INCH AIR LINE
AMP, 240 V/SINGLE PHASE CIRCUIT
IINCH PROCESS WATER SUPPLY
IINCH PROCESS WATER RETURN
3 EACH, INCH HYDRAULIC LINE



BUILDING 9204-1
SECOND FLOOR (ROOM 246)

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.

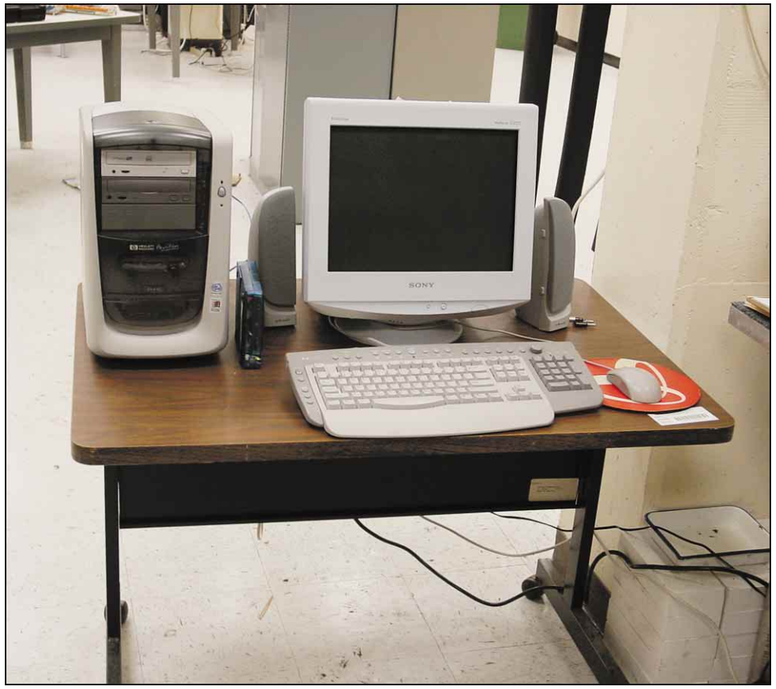
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
BOE#1

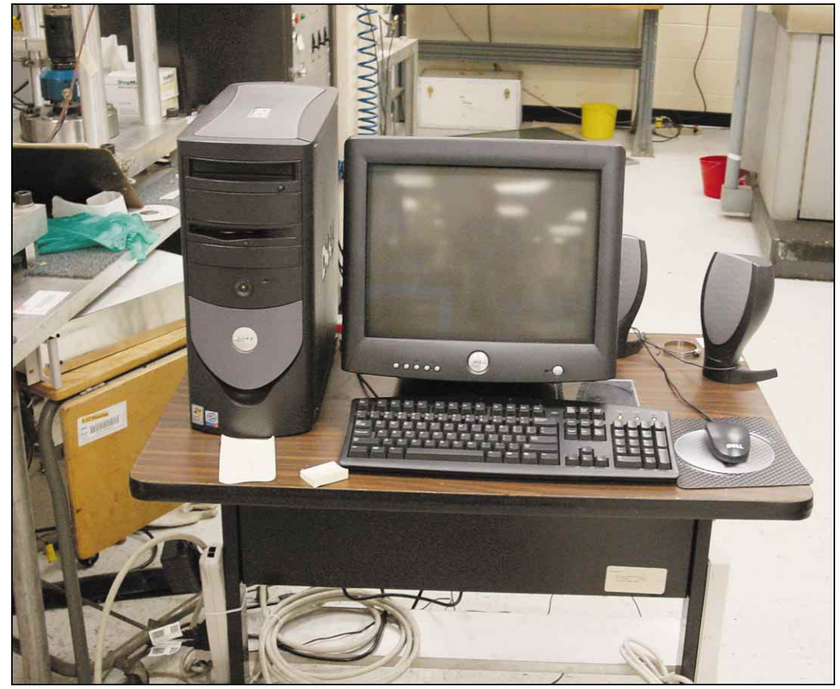
JOB NO PDC 0214-00001	DATE 04/30/03
	REV NO 1
SCALE NONE	DWG NO **SK-4508-13**



1

HYD-06 DAS

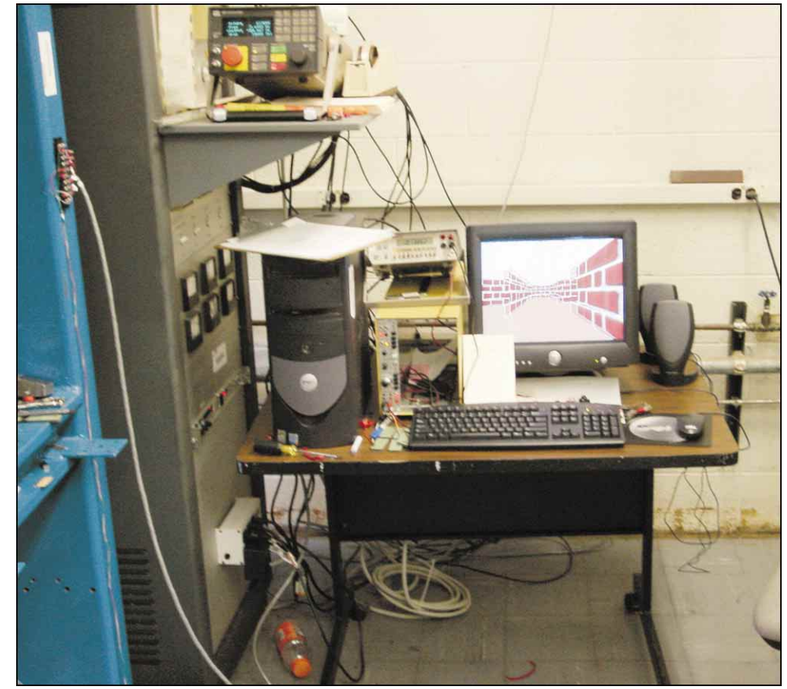
AVAILABLE FOR EARLY MOVE



2

HYD-07 DAS

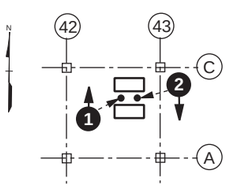
AVAILABLE FOR EARLY MOVE



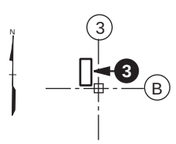
3

UNASSIGNED DAS

AVAILABLE FOR EARLY MOVE



BUILDING 9204-1
FIRST FLOOR



BUILDING 9204-1
FIRST FLOOR

NOTES:

1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
MISCELLANEOUS DAS

JOB NO PDC 0214-00001

DATE 04/30/03

REV NO 1

SCALE NONE

DWG NO **SK-4508-14**

1

INSTRON

CAPACITY: 550 KIP
HEIGHT: 25 FEET
WEIGHT: 38-40,000 POUNDS

DISCONNECT THE FOLLOWING UTILITIES

SEE NOTE 3

2

CONTROLLER INSTRON

SEE NOTE 3

3

HYDRAULIC PUMP INSTRON

CAPACITY: 5000 PSI, 85 GPM

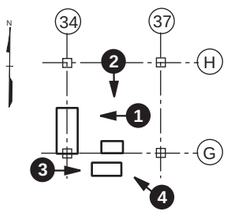
SEE NOTE 3

4

ACCOUSTICAL ENCLOSURE FOR HYDRAULIC PUMP INSTRON

SEE NOTE 3

MOVE TO BUILDING 4508, HIGH BAY



BUILDING 9204-1
FIRST FLOOR

NOTES:

1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.
3. DISPOSITION OF INSTRON HAS NOT BEEN DETERMINED.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
INSTRON 550 KIP

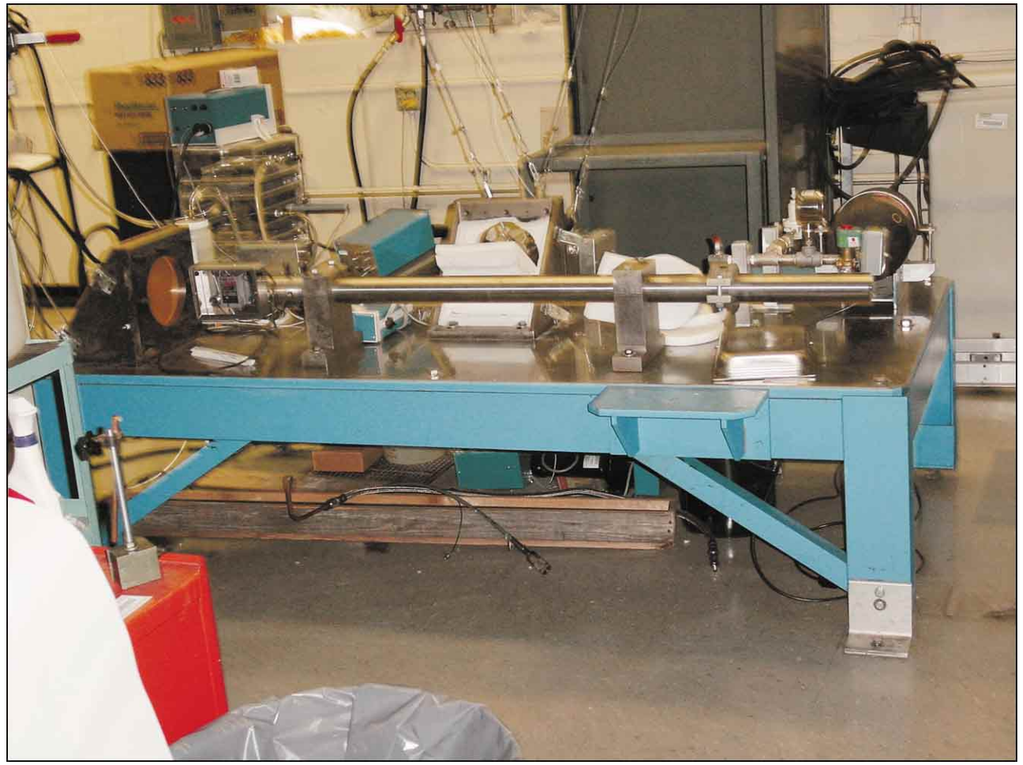
JOB NO PDC 0214-00001

DATE 04/30/03

REV NO 1

SCALE NONE

DWG NO **SK-4508-15**



1

GAS GUN AND PENDULUM

SIZE: 4' X 8' TABLE, 11' TALL WITH PENDULUM

DISCONNECT THE FOLLOWING UTILITIES:

120 V CIRCUIT
90 PSIG AIR

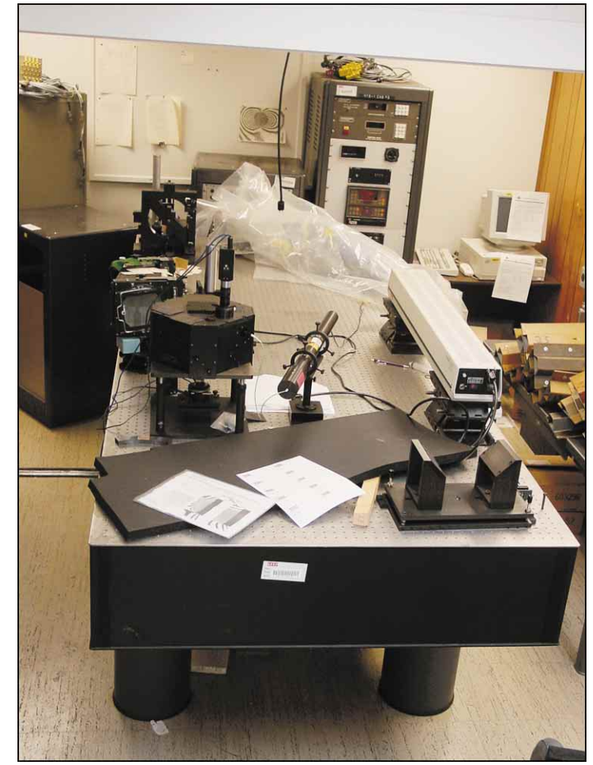
MOVE TO ORNL

2

SP-100 VACUUM SYSTEM

IN 121 OR STORAGE.
TOP HEAVY - DISASSEMBLE & LOWER.

MOVE TO ORNL

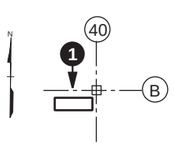


3

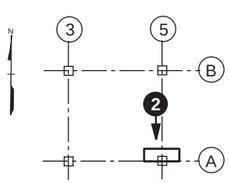
OPTICAL TABLE

MODEL: NEWPORT
SIZE: 4' X 8' X 12"
WEIGHT: TOP - 1200 POUNDS, LEGS - 400 POUNDS MAX.

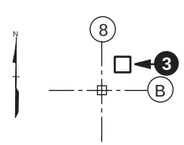
MOVE TO ORNL



BUILDING 9204-1
FIRST FLOOR



BUILDING 9204-1
FIRST FLOOR



BUILDING 9204-1
FIRST FLOOR

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

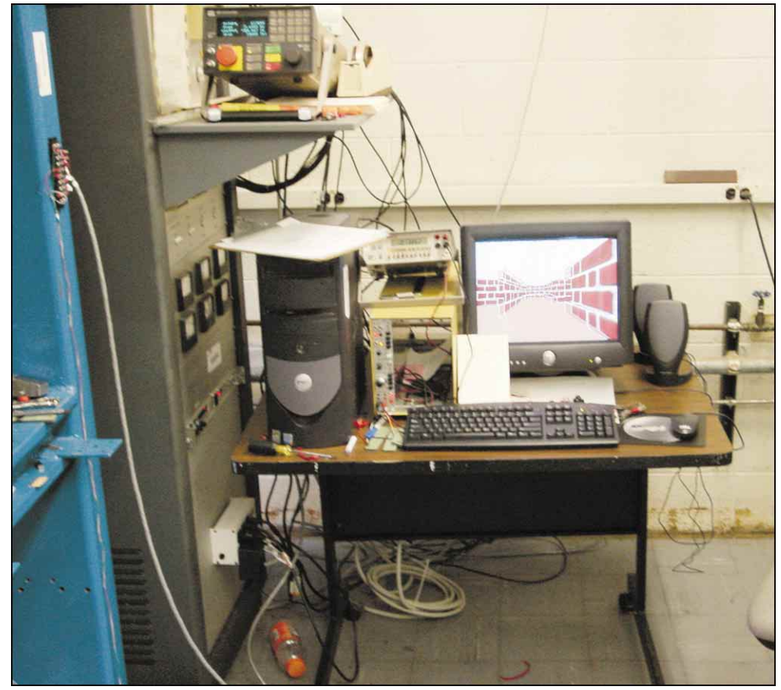
SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
MISCELLANEOUS EQUIPMENT

JOB NO PDC 0214-00001	DATE 04/30/03
	REV NO 1
SCALE NONE	DWG NO **SK-4508-16**

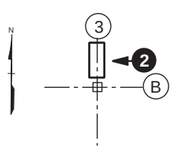
1

PRESENTLY LOCATED IN 4508, ROOM 121.
UTILITIES ARE DISCONNECTED.



2

DAS
MTS-6



BUILDING 9204-1
FIRST FLOOR

NOTES:
1. USE 4508 SUFFIX FOR ALL EQUIPMENT TAGS.
2. CONTACT RICK BATTISTE AT 574-0736 OR PAGER 873-5048 FOR ADDITIONAL INFORMATION.

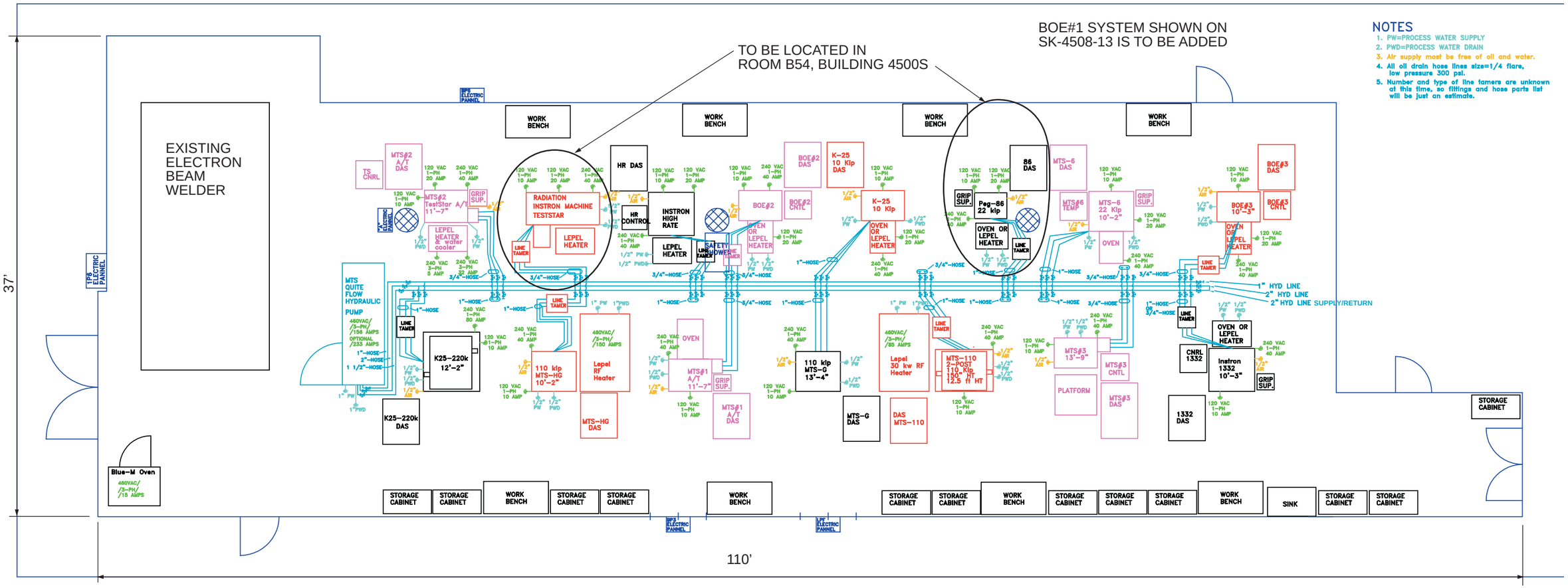
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
MTS-6

JOB NO PDC 0214-00001	DATE 04/30/03
	REV NO 1
SCALE NONE	DWG NO **SK-4508-17**



NOTES

1. PW=PROCESS WATER SUPPLY
2. PWD=PROCESS WATER DRAIN
3. Air supply must be free of oil and water.
4. All oil drain hose lines size=1/4 flare, low pressure 300 psi.
5. Number and type of line tamers are unknown at this time, so fittings and hose parts list will be just an estimate.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MECHANICAL PROPERTIES LABORATORY 4508
BUILDING 4508, ROOM 121

JOB NO PDC 0214-00001	DATE 04/30/03
	REV NO 1
SCALE NONE	DWG NO **SK-4508-18**

Equipment to be moved to Solid State Lab, Rooms C001, C005, C009, and D009 in 4500N:

TAG	Equipment Name Description/Model	Present Location (See Note 4)	Disassembly Drawing	Installation Drawing
C103	Hot Press	ORNL Building 2024, Room 42	SK-4500-2	SK-4500-7
C104	Magnetameter System	ORNL Building 2024, Room 42	SK-4500-2	SK-4500-7
C501	Marshall Furnace #95156	ORNL Building 2024, Room 42	SK-4500-3	SK-4500-7
C502	Marshall Furnace #961130A	ORNL Building 2024, Room 42	SK-4500-3	SK-4500-7
C503	Marshall Furnace #961130B	ORNL Building 2024, Room 42	SK-4500-3	SK-4500-7
C504	Pumping Station	ORNL Building 2024, Room 42	SK-4500-5	SK-4500-7
C505	Glove Box	ORNL Building 2024, Room 41	SK-4500-2	SK-4500-7
C506	HPLC System	ORNL Building 2024, Room 41	SK-4500-5	SK-4500-7
C901	Bridgman Furnace	ORNL Building 2024, Room 40	SK-4500-3	SK-4500-7
C902	Bridgman Furnace	ORNL Building 2024, Room 40	SK-4500-3	SK-4500-7
C903	Bridgman Furnace	ORNL Building 2024, Room 42	SK-4500-3	SK-4500-7
C905	Lindberg Pot Furnace	ORNL Building 2024, Room 42	SK-4500-4	SK-4500-7
C906	Lindberg Furnace Cart #151660	ORNL Building 2024, Room 42	SK-4500-4	SK-4500-7
C907	Lindberg Furnace #X10785	ORNL Building 2024, Room 42	SK-4500-4	SK-4500-7
C908	Lindberg Furnace #X151664	ORNL Building 2024, Room 42	SK-4500-4	SK-4500-7
C909	Lindberg Furnace #X151662	ORNL Building 2024, Room 42	SK-4500-4	SK-4500-7
C910	Lindberg Furnace #X157097	ORNL Building 2024, Room 42	SK-4500-4	SK-4500-7
C912	Marshall Furnace #94518	ORNL Building 2024, Room 42	SK-4500-3	SK-4500-7
C913	Computer Controller	ORNL Building 2024, Room 42	SK-4500-4	SK-4500-7
D903	Lindberg Furnace w/Controller	ORNL Building 2024, Room 40	SK-4500-4	SK-4500-7
D904	Astro Furnace	ORNL Building 2024, Room 42	SK-4500-2	SK-4500-7
D905	Sybran Furnace #151669	ORNL Building 2024, Room 41	SK-4500-5	SK-4500-7
D906	Lindberg Tube Furnace #151657	ORNL Building 2024, Room 42	SK-4500-4	SK-4500-7
D907	Lindberg Furnace #X183934	ORNL Building 2024, Room 42	SK-4500-4	SK-4500-7
D908	Lindberg Furnace #X868114	ORNL Building 2024, Room 42	SK-4500-4	SK-4500-7
D909	Lindberg Furnace	ORNL Building 2024, Room 42	SK-4500-4	SK-4500-7
X1	Portable Pumping Station	ORNL Building 2024, Room 41	SK-4500-5	SK-4500-7
X2	Water Filter System	ORNL Building 2024, Room 41	SK-4500-5	SK-4500-7
X3	Lead Lined Cabinet	ORNL Building 2024, Room 51	SK-4500-6	SK-4500-7
X4	Lead Lined Cabinet	ORNL Building 2024, Room 40	SK-4500-6	SK-4500-7
X5	Corrosive Storage Cabinet	ORNL Building 2024, Hall	SK-4500-6	SK-4500-7
X6	Flammable Storage Cabinet	ORNL Building 2024, Hall	SK-4500-6	SK-4500-7
X7	Hydraulic Press	ORNL Building 2024, Room 40	SK-4500-6	SK-4500-7
X8	Rolling Machine (Move to Building 3025)	ORNL Building 2024, Room 40	SK-4500-6	NA
X9	Swager (Move to Building 3025)	ORNL Building 2024, Room 40	SK-4500-6	NA

NOTES:

1. JIM KOLOPUS (574-5498) WILL DIRECT ACTIVITIES ASSOCIATED WITH THE MOVE OF THE SOLID STATE LAB FROM BUILDING 2024 TO 4500N. THE MOVE DURATION WILL BE APPROXIMATELY 2 TO 3 WEEKS TO ALLOW ONGOING EXPERIMENTS TO BE COMPLETED.
2. MUCH OF THE LAB EQUPMENT IS EXTREMELY SENSITIVE, INCLUDING THE SILICATE CARBIDE OVEN ELEMENTS, AND WILL REQUIRE INSTRUMENT TECHNICIAN SUPPORT. JIM KOLOPUS WILL COORDINATE THESE REQUIREMENTS WITH FRANK RAU.
3. ALL ELECTRICAL CIRCUITS ARE PLUG-IN WITH THE EXCEPTION OF THE SYBRAN FURNACE (D905) WHICH IS HARD WIRED TO A 240VAC CIRCUIT.
4. THE EXACT LOCATION OF OVENS VARIES DEPENDING ON THE EXPERIMENTS IN PROCESS AND MAY NOT AGREE FROM THAT DEFINED IN THESE DRAWINGS. JIM KOLOPUS WILL DETERMINE THE EXACT LOCATION FOR EACH OVEN IN 4500N AT THE TIME OF THE MOVE.
5. LAB PERSONNEL WILL PACKAGE AND LABEL ALL LOOSE EQUIPMENT AND SUPPLIES PRIOR TO THE MOVE.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

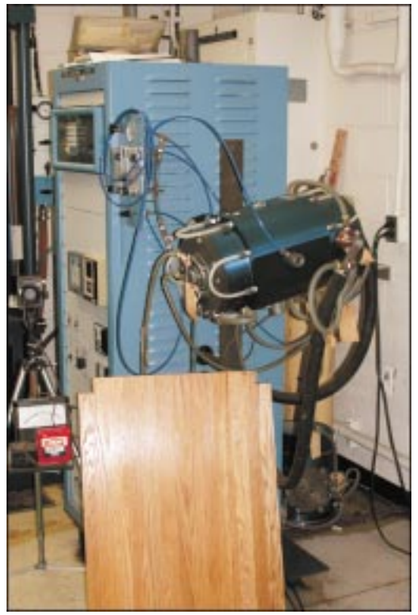
CONDENSED MATTER SCIENCE DIVISION
LABORATORY 4500
DRAWING INDEX AND EQUIPMENT LIST

JOB NO 0214-00001
DATE 04/01/03
REV NO 0
SCALE NONE
DWG NO **SK-4500-1**

1

C103 - HOT PRESS

1. DISCONNECT COOLING WATER.
2. REMOVE 120V PLUG.
3. LAB PERSONNEL TO REMOVE HYDRAULIC FLUID, DISASSEMBLE AND REASSEMBLE.



2

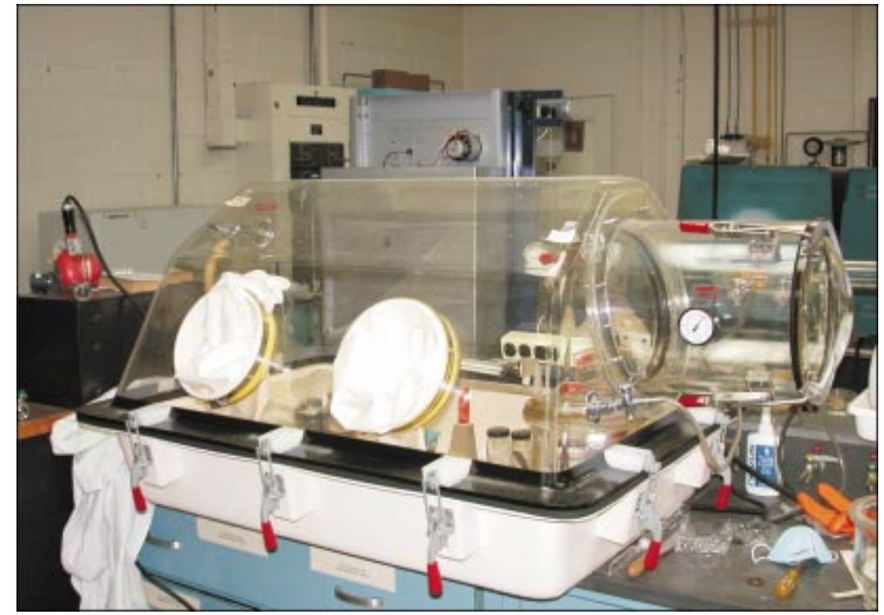
D904 - ASTRO FURANCE

1. DISCONNECT COOLING WATER.
2. REMOVE 120V PLUG.
3. LAB PERSONNEL TO DISASSEMBLE AND REASSEMBLE.

3

C104 - MAGNETOMETER SYSTEM

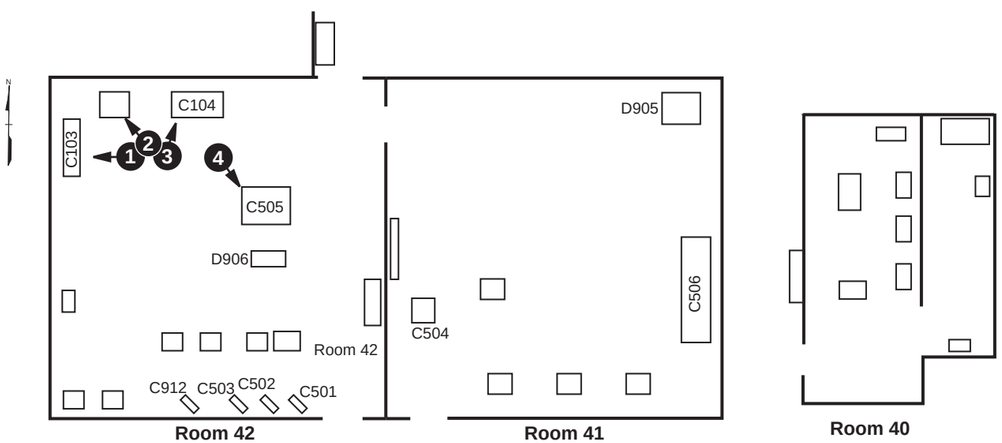
1. DISCONNECT COOLING WATER.
2. REMOVE 120V PLUG.
3. LAB PERSONNEL TO DISASSEMBLE AND REASSEMBLE.



4

C505 - GLOVE BOX

1. MOVE REQUIREMENTS TO BE ESTABLISHED DEPENDENT ON CONTENTS AT TIME OF MOVE.



ORNL BUILDING 2024

ORNL BUILDING 2024

NOTES:
1. USE 4500 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

CONDENSED MATTER SCIENCE DIVISION
LABORATORY 4500N
DISASSEMBLY DRAWING

JOB NO 0214-00001	DATE 04/01/03
	REV NO 0
SCALE NONE	DWG NO **SK-4500-2**

5

MARSHALL FURNACE

6

C501, C502, C503, AND C912 MARSHALL FURNACES

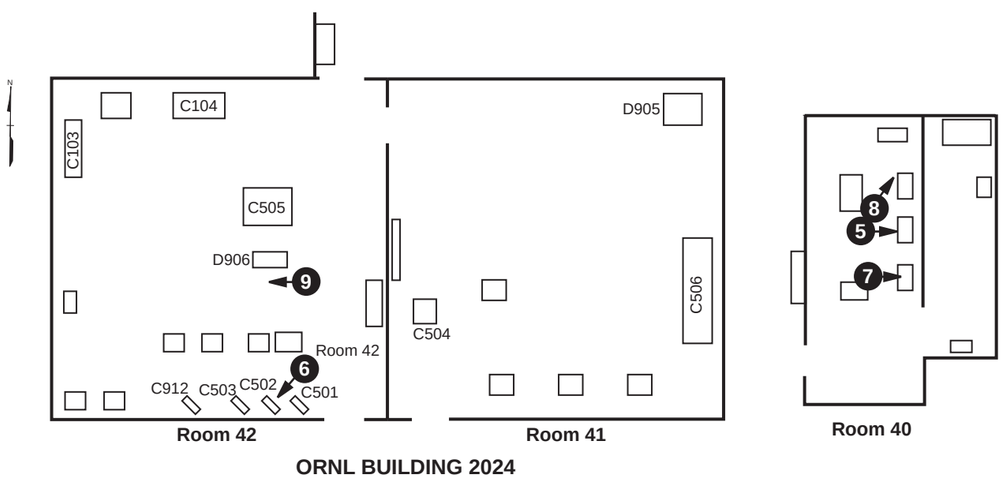
7

BRIDGEMAN FURNACE

8

LINDBERG FURNACE

BRIDGEMAN FURNACE



ORNL BUILDING 2024

LINDBERG FURNACE 9 BRIDGEMAN FURNACE

NOTES:
1. USE 4500 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

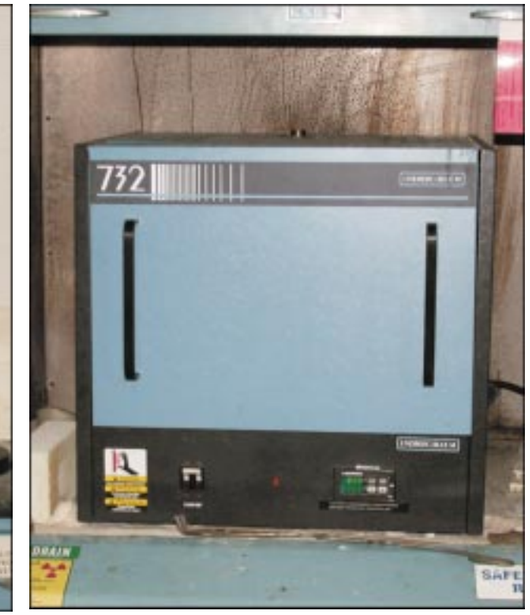
CONDENSED MATTER SCIENCE DIVISION
LABORATORY 4500N
DISASSEMBLY DRAWING

JOB NO 0214-00001	DATE 04/01/03
	REV NO 0
SCALE NONE	DWG NO **SK-4500-3**

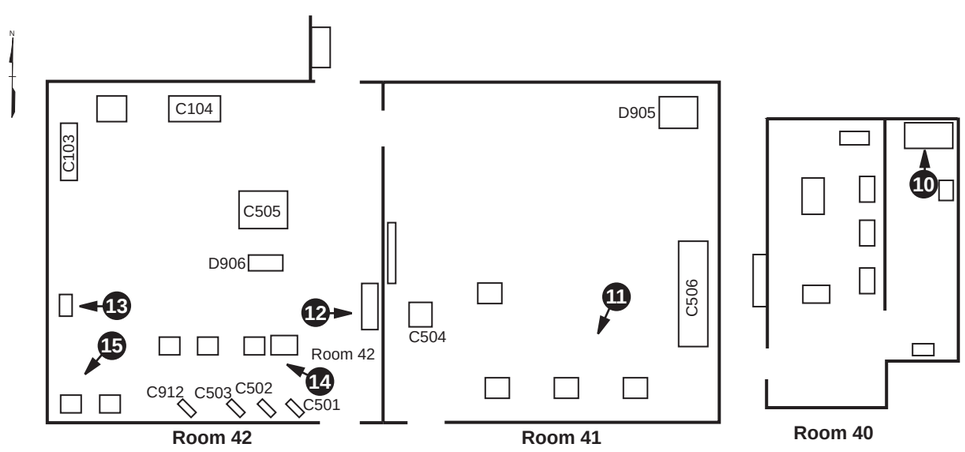
10
LINDBERG FURNACE

11
LINDBERG FURNACES

12
LINDBERG FURNACE



13
LINDBERG FURNACE



ORNL BUILDING 2024

14
LINDBERG FURNACES

15
LINDBERG FURNACES

NOTES:
1. USE 4500 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

CONDENSED MATTER SCIENCE DIVISION
LABORATORY 4500N
DISASSEMBLY DRAWING

JOB NO	DATE 04/01/03
0214-00001	REV NO 0
SCALE NONE	DWG NO **SK-4500-4**

16

C504 - PUMPING STATION

17

X1 - PORTABLE PUMPING STATION

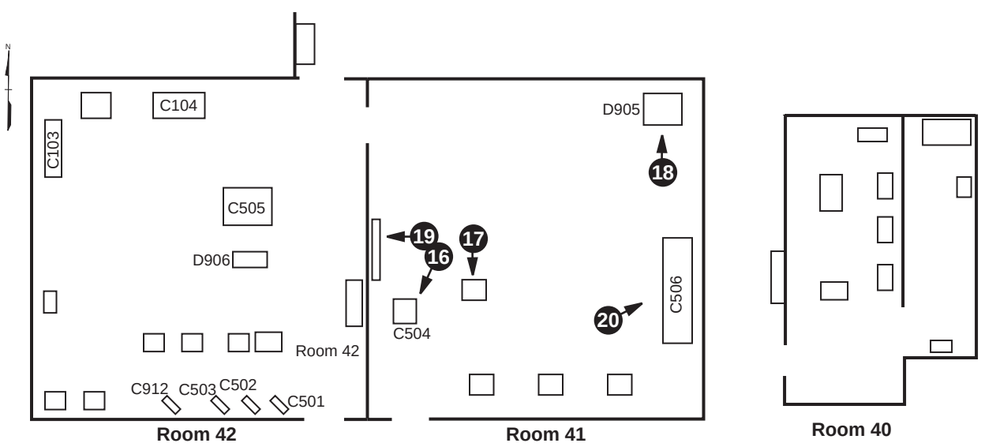
18

D905 - SYBRAN FURNACE

1. REMOVE 240V AC SUPPLY (HARD WIRED).

19

X2 - WATER FILTER SYSTEM



ORNL BUILDING 2024

20

C506 - HPLC SYSTEM

1. LAB PERSONNEL TO DISCONNECT, MOVE AND RECONNECT.

NOTES:
1. USE 4500 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

CONDENSED MATTER SCIENCE DIVISION
LABORATORY 4500N
DISASSEMBLY DRAWING

JOB NO 0214-00001	DATE 04/01/03
	REV NO 0
SCALE NONE	DWG NO **SK-4500-5**

X3 - LEAD LINED CABINET

1. LOCATED IN ROOM 51, 2ND FLOOR, BLDG. 2024. CONTAINS PRECIOUS METALS.

21

X4 - LEAD LINED CABINET

1. CONTAINS NATURAL RADIOACTIVE MATERIALS.

22

X5 - CORROSIVES STORAGE CABINET

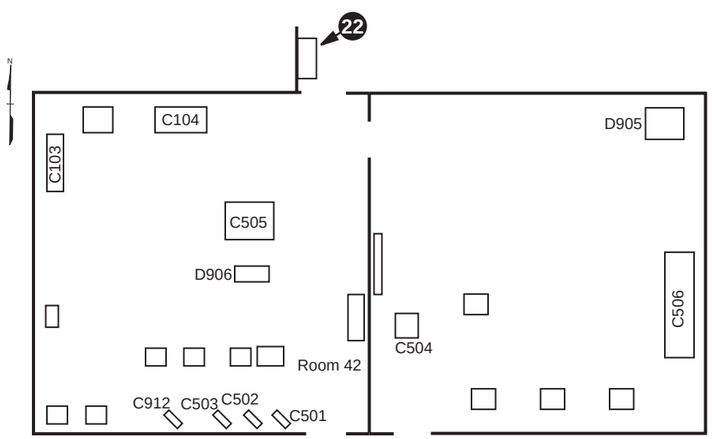
23

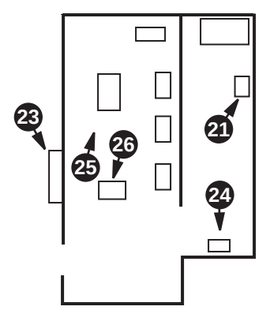
X6 - FLAMMABLE STORAGE CABINET

1. REMOVE GROUND WIRE.

24

X7 - HYDRAULIC PRESS





ORNL BUILDING 2024

25

X8 - ROLLING MACHINE

1. ELECTRICAL IS NOT CONNECTED. MOVE TO BUILDING 3025.

26

X9 - SWAGER

1. ELECTRICAL IS NOT CONNECTED. MOVE TO BUILDING 3025.

NOTES:
1. USE 4500 SUFFIX FOR ALL EQUIPMENT TAGS.

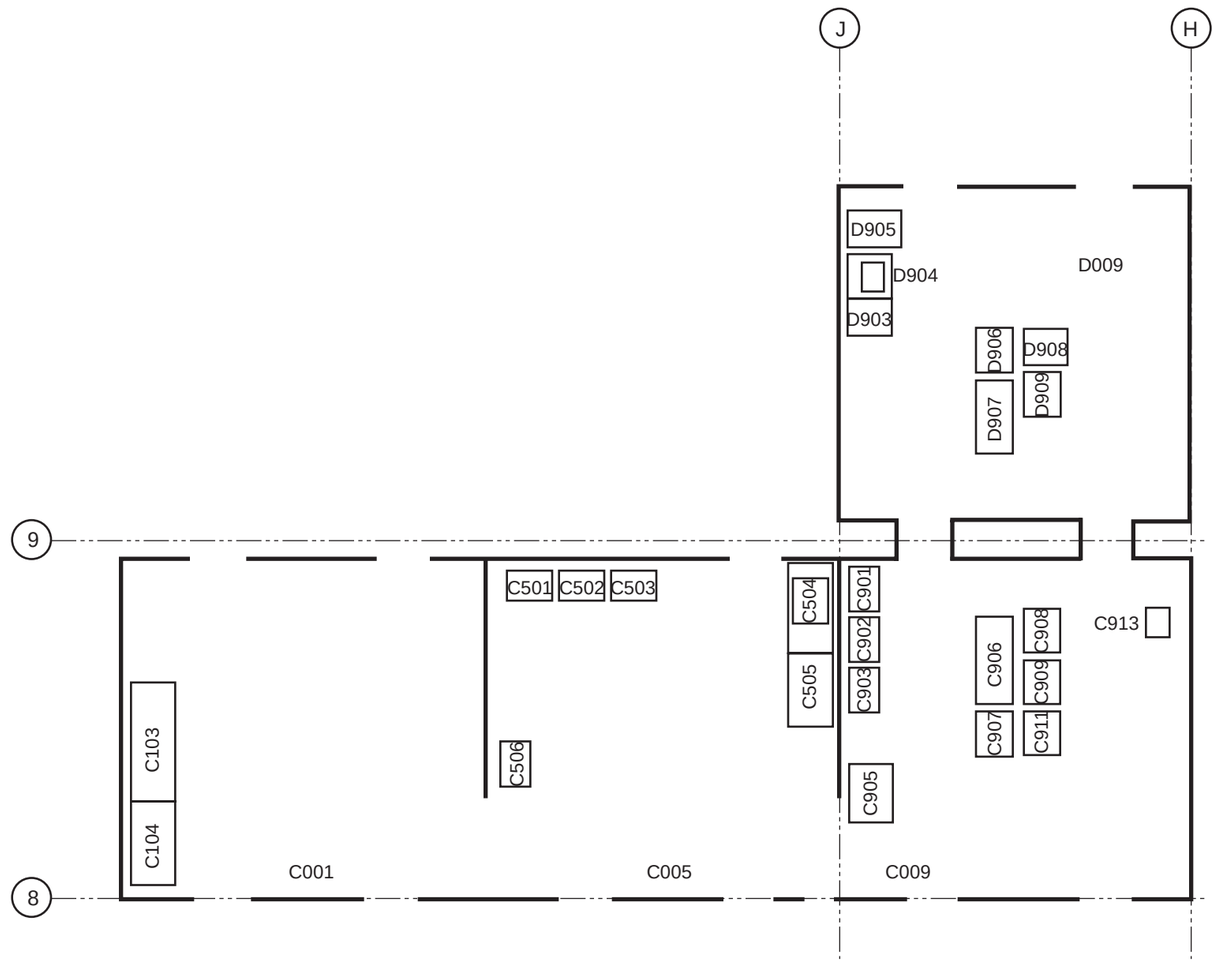
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

CONDENSED MATTER SCIENCE DIVISION
LABORATORY 4500N
DISASSEMBLY DRAWING

JOB NO 0214-00001	DATE 04/01/03
	REV NO 0
SCALE NONE	DWG NO **SK-4500-6**



SOLID STATE LAB FLOOR PLAN
BUILDING 4500N

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

CONDENSED MATTER SCIENCE DIVISION
LABORATORY 4500N
INSTALLATION DRAWING

JOB NO 0214-00001

DATE 04/01/03

REV NO 0

SCALE NONE

DWG NO **SK-4500-7**

Equipment to be moved to MEMS/NEMS Testing Lab E-D202, E-D204, & ED-206:

TAG	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
MNT1	Optical Table 1000#	48” x 120” x 36”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206-3	SK-E-D202-14
MNT2	Optical Table 800#	48” x 96” x 36”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206-3	SK-E-D202-14
MNT3	Instrument Cabinet	24” x 26” x 72”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206-3	SK-E-D202-14
MNT4	Dry Box (2)	24” x 24” x 36”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206-3	SK-E-D202-14
MNT5	Table	30” x 24” x 30”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206-4	SK-E-D202-14
MNT8	Work Bench (Desk)	62” x 30” x 48”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206-4	SK-E-D202-14
MNT10	Work Bench (2)	96” x 30” x 53”, 72” x 30” x 53”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206-4/5	SK-E-D202-14
MNT11	Instrument Cabinet	24” x 24” x 52”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206-5	SK-E-D202-14
MNT12	Portable Chalk Board	60” x 24” x 72”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206-5	SK-E-D202-14
MNT13	Tool Box	26” x 18” x 20”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206-5	SK-E-D202-14
MNT14	Optical Table 750#	36” x 120” x 41”	ORNL 4500S 2nd Floor Rm R103	SK-E-D206-5	SK-E-D202-14
MNT16	Work Bench	62” x 30” x 50”	ORNL 4500S 2nd Floor Rm R103	SK-E-D206-6	SK-E-D202-14
IMNT17	Instrument Rack	26” x 26” x 72”	ORNL 4500S 2nd Floor Rm R103	SK-E-D206-6	SK-E-D202-14
MNT18	Computer and Table	36” x 27” x 48”	ORNL 4500S 2nd Floor Rm R103	SK-E-D206-6	SK-E-D202-14
MNT20	Optical Table 600#	72” x 48” x 38”	ORNL 4500S 2nd Floor Rm H151	SK-E-D204-7	SK-E-D202-14
MNT21	Instrument Rack	24” x 22” x 76”	ORNL 4500S 2nd Floor Rm H151	SK-E-D204-7	SK-E-D202-14
MNT22	Glass Front Cabinet	48” x 22” x 26”	ORNL 4500S 2nd Floor Rm H151	SK-E-D204-7	SK-E-D202-14
MNT25	Spectrum Analyzer	25” x 20” x 48”	ORNL 4500S 2nd Floor Rm H151	SK-E-D204-7	SK-E-D202-14
MNT26	Work Bench	72” x 30” x 53”	ORNL 4500S 2nd Floor Rm H151	SK-E-D204-7	SK-E-D202-14
MNT28	Desk	60” x 32” x 60”	ORNL 4500S 2nd Floor Rm H151	SK-E-D204-7	SK-E-D202-14
MNT33	Laser	84” x 36” x 50”	ORNL 4500S 2nd Floor Rm R103	SK-E-D202-9/10	SK-E-D202-14
MNT34	Laser Cylinder Cabinet	38” x 19” x 78”	ORNL 4500S 2nd Floor Rm R103	SK-E-D202-9	SK-E-D202-14
MNT35	Instrument Rack	26” x 26” x 72”	ORNL 4500S 2nd Floor Rm R103	SK-E-D202-9	SK-E-D202-14
MNT36	Optical Table 200#	24” x 48” x 33”	ORNL 4500S 2nd Floor Rm R103	SK-E-D202-9	SK-E-D202-14
MNT37	Optical Table 500#	36” x 48” x 33”	ORNL 4500S 2nd Floor Rm R103	SK-E-D202-10	SK-E-D202-14
MNT38	Optical Table 200#	36” x 30” x 30”	ORNL 4500S 2nd Floor Rm R103	SK-E-D202-10	SK-E-D202-14
MNT39	Laser Ablation Chamber	23” x 36” x 52”	ORNL 4500S 2nd Floor Rm R103	SK-E-D202-10	SK-E-D202-14
MNT40	Flammable Cabinet	20” x 18” x 36”	ORNL 4500S 2nd Floor Rm R103	SK-E-D202-10	SK-E-D202-14
MNT41	Tool Box (3)	27” x 18” x 56”	ORNL 4500S 2nd Floor Rm R103	SK-E-D202-10	SK-E-D202-14
MNT42	Cryofab Tank (2)	22” dia x 56” h	ORNL 4500S 2nd Floor Rm R103	SK-E-D202-11	SK-E-D202-14
MNT45	Work Bench	72” x 30” x 52”	ORNL 4500S 2nd Floor Rm S123	SK-E-D202-11	SK-E-D202-14
MNT49	Instrument Rack	26” x 26” x 78”	ORNL 4500S 2nd Floor Rm S123	SK-E-D202-12	SK-E-D202-14
MNT50	Storage Rack	26” x 26” x 60”	ORNL 4500S 2nd Floor Rm S123	SK-E-D202-12	SK-E-D202-14

MEMS/NEMS TESTING LAB E-D202 DRAWING INDEX

Drawing No.	Title
SK-E-D202-1 & 2	Drawing Index and Equipment List
SK-E-D202-3	MEMS/NEMS Testing Lab Disassembly Drawing No. 1
SK-E-D202-4	MEMS/NEMS Testing Lab Disassembly Drawing No. 2
SK-E-D202-5	MEMS/NEMS Testing Lab Disassembly Drawing No. 3
SK-E-D202-6	MEMS/NEMS Testing Lab Disassembly Drawing No. 4
SK-E-D202-7	MEMS/NEMS Testing Lab Disassembly Drawing No. 5
SK-E-D202-8	MEMS/NEMS Testing Lab Disassembly Drawing No. 6
SK-E-D202-9	MEMS/NEMS Testing Lab Disassembly Drawing No. 7
SK-E-D202-10	MEMS/NEMS Testing Lab Disassembly Drawing No. 8
SK-E-D202-11	MEMS/NEMS Testing Lab Disassembly Drawing No. 9
SK-E-D202-12	MEMS/NEMS Testing Lab Disassembly Drawing No. 10
SK-E-D202-13	MEMS/NEMS Testing Lab Disassembly Drawing No. 11
SK-E-D202-14	MEMS/NEMS Testing Lab Installation Drawing No. 1

NOTES:

1. PANOS DATSKOS (574-6205) WILL FIELD DIRECT THE CONNECTION OF EQUIPMENT BEING MOVED TO THE MEMS/NEMS LAB E-D206.
2. USE E-D202, E-D204, OR E-D206 SUFFIX FOR ALL EQUIPMENT TAGS TO REFLECT THE ROOM THAT THE EQUIPMENT WILL BE MOVING TO.
3. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
4. ESTD WILL PROVIDE ALL SAFETY SUPPORT (IH, H&S, ETC.) REQUIRED FOR THE MOVE. ESTD WILL PROVIDE HP SURVEYS OR USE PROCESS KNOWLEDGE TO OBTAIN ANY REQUIRED GREEN TAGS FOR EQUIPMENT TO BE MOVED TO ETF.
5. ESTD WILL REMOVE ALL INTERCONNECTING INSTRUMENTATION AND CONTROL WIRING PRIOR TO THE MOVE AND WILL RECONNECT THIS WIRING AFTER THE MOVE.
6. EQUIPMENT LINED THROUGH OR X’D OUT HAS BEEN REMOVED FROM THE SCOPE OF THE MOVE.

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204, & E-D206
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214-00001
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-D202-1**

Equipment to be moved to MEMS/NEMS Testing Lab E-D202, E-D204, & E-D206:

TAG	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
MNT51	Storage Unit (4)	18” x 12” x 24”	ORNL 4500S 2nd Floor Rm S123	SK-E-D202-12	SK-E-D202-14
MNT52	Work Bench	60” x 30” x 52”	ORNL 4500S 2nd Floor Rm S123	SK-E-D202-12	SK-E-D202-4
MNT53	Cabinet (3)	36” x 18” x 72”	ORNL 4500S 2nd Floor Rm S123	SK-E-D202-12	SK-E-D202-14
MNT54	Optical Table 800#	48” x 96” x 34”	ORNL 4500S 2nd Floor Rm S123	SK-E-D202-13	SK-E-D202-14
MNT55	Instrument Shelf (over Optical Table)	120” x 26” x 60”	ORNL 4500S 2nd Floor Rm S123	SK-E-D202-13	SK-E-D202-14
MNT56	Optical Table 100#	24” x 36” x 4”	ORNL 4500S 2nd Floor Rm S123	SK-E-D202-13	SK-E-D202-14
MNT59	Table and Shelf	60” x 34” x 72”	ORNL 4500S 2nd Floor Rm S123	SK-E-D202-13	SK-E-D202-14
MNT60	Work Bench	72” x 30” x 52”	ORNL 4500S 2nd Floor Rm S123	SK-E-D202-13	SK-E-D202-14
MNT62	Dry Box	24” x 24” x 36”	ORNL 4500S 2nd Floor Rm S123	SK-E-D202-13	SK-E-D202-14
MNT63	Work Bench (2)	72” x 30” x 50”	ORNL 4500S 2nd Floor Rm R103	SK-E-D204-8	SK-E-D202-14
MNT64	N_2 Laser PRA Model LN1000	24” x 20” x 12”	ORNL 4500S 2nd Floor Rm H151	SK-E-D204-7	SK-E-D202-14

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204, & E-D206
DRAWING INDEX AND EQUIPMENT LIST

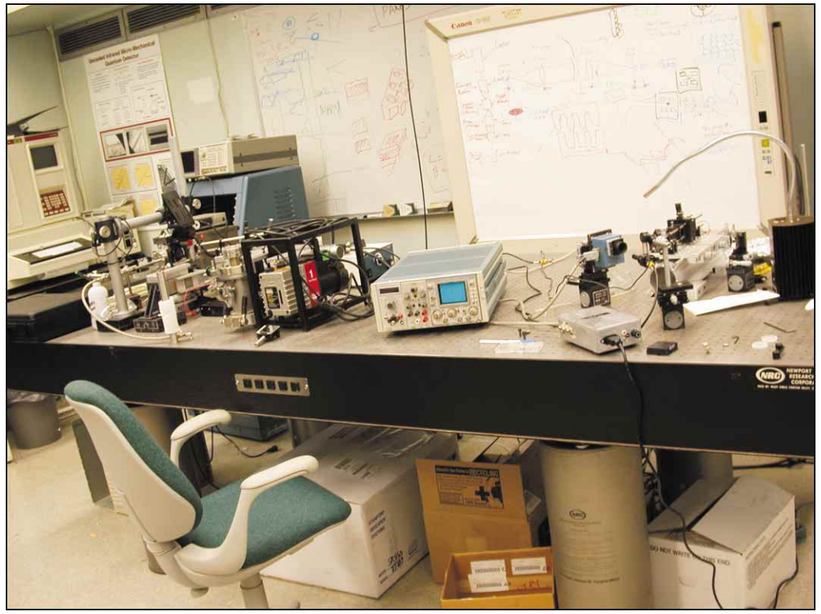
JOB NO PDC 0214-00001

DATE 10/13/03

REV NO 3

SCALE NONE

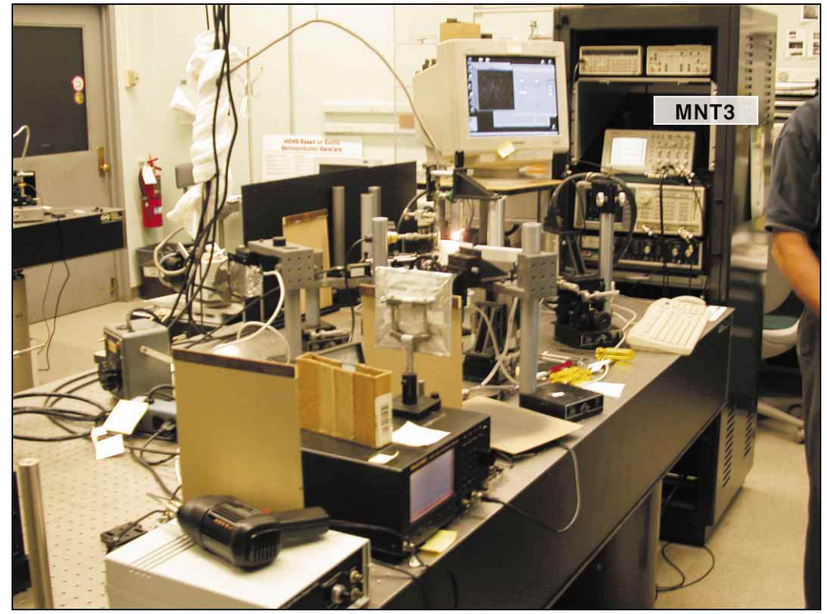
DWG NO **SK-E-D202-2**



1

MNT1 - OPTICAL TABLE

1. TABLE IS 48” x 120” x 36” AND WEIGHS APPROXIMATELY 1000 POUNDS.



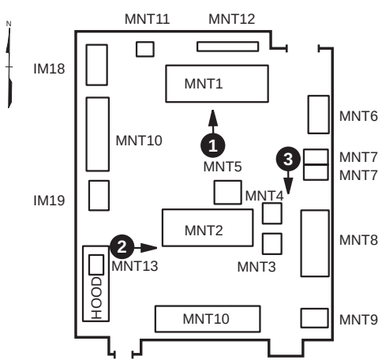
2

MNT2 - OPTICAL TABLE

1. TABLE IS 48” x 96” x 36” AND WEIGHS APPROXIMATELY 800 POUNDS.

3

MNT4 - DRY BOX (2)



R123
BUILDING 4500S ORNL

MNT3 - INSTRUMENT CABINET

1. DISCONNECT 110 V ELECTRICAL POWER.
2. DISCONNECT COMPUTER CABLES.
3. DISCONNECT INSTRUMENTATION WIRING.

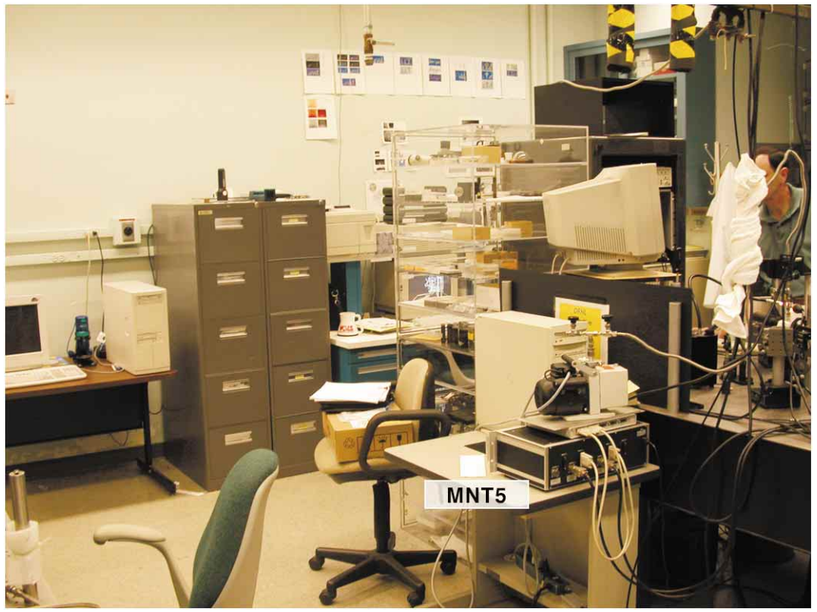
NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

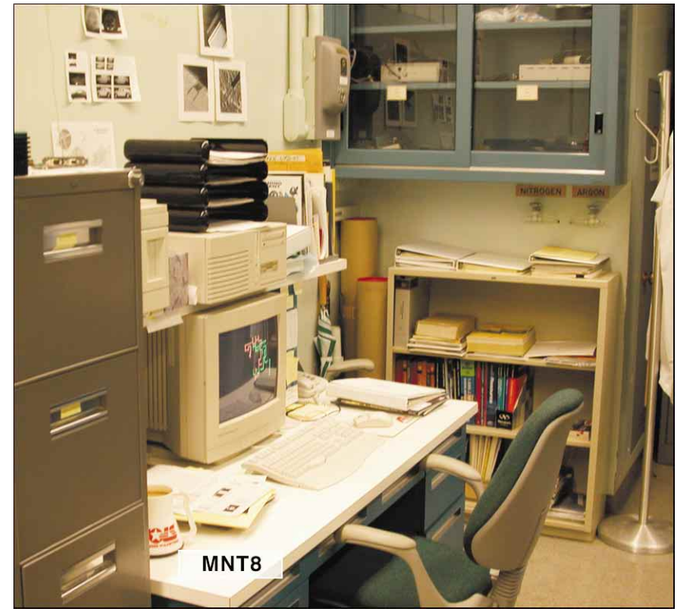
MEMS/NEMS LABORATORY
E-D202, E-D204, & E-D206
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-D202-3**



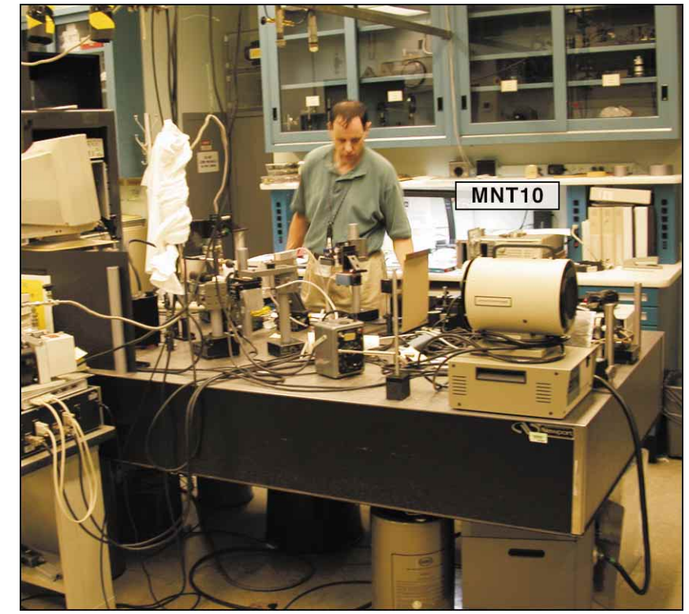
1

MNT5 - TABLE



2

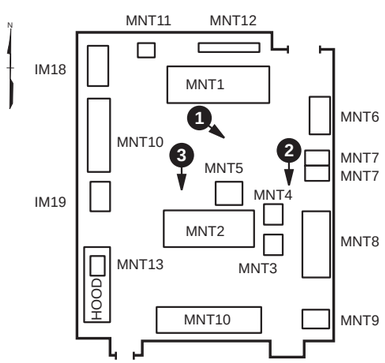
MNT8 - WORK BENCH (DESK)



3

MNT0 - WORK BENCH (2)

1. DISCONNECT 110 V ELECTRICAL POWER.



R123
BUILDING 4500S ORNL

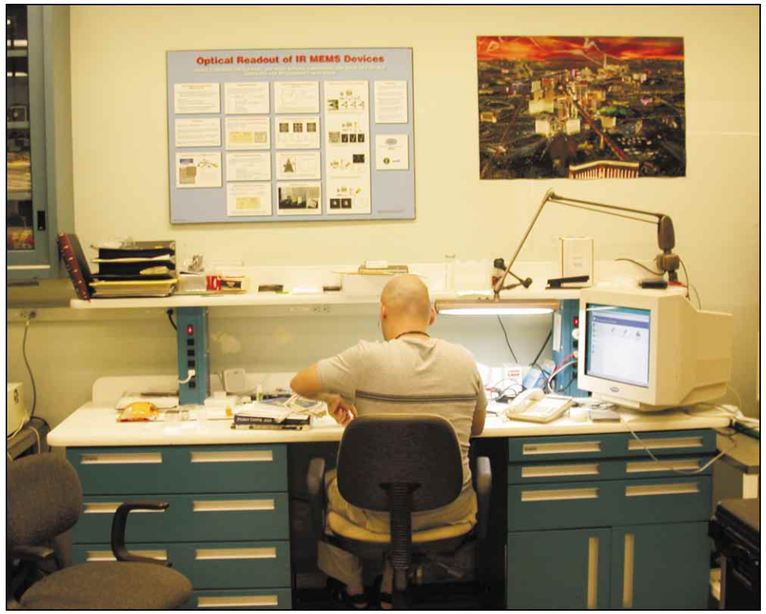
NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204, & E-D206
DISASSEMBLY DRAWING

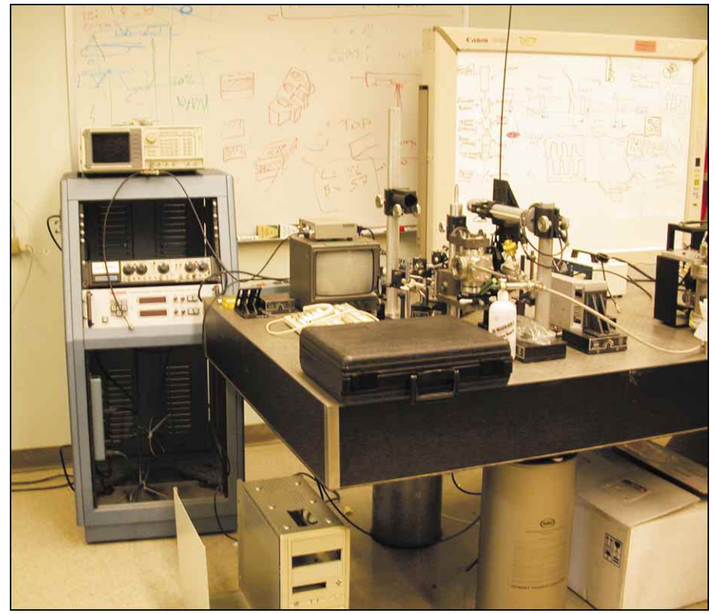
JOB NO PDC 0214-00001
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-D202-4**



1

MNT10 - WORK BENCH (2)

1. DISCONNECT 110 V ELECTRICAL POWER.



2

MNT11 - INSTRUMENT CABINET

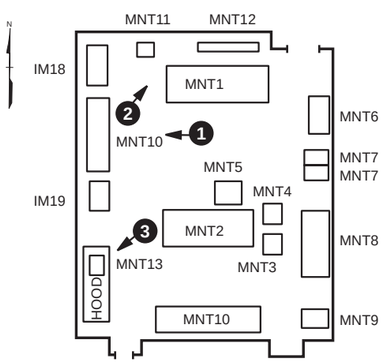
1. DISCONNECT 110 V ELECTRICAL POWER.

MNT12 - PORTABLE CHALK BOARD

1. DISCONNECT 110 V ELECTRICAL POWER.

3

MNT13 - TOOL BOX



R123
BUILDING 4500S ORNL

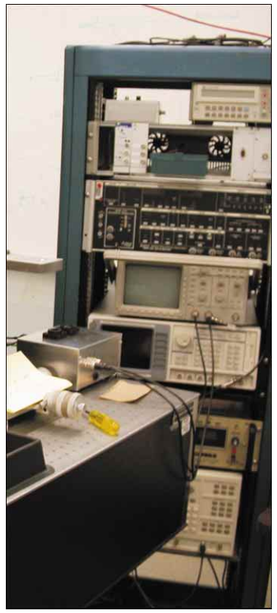
NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204, & E-D206
DISASSEMBLY DRAWING

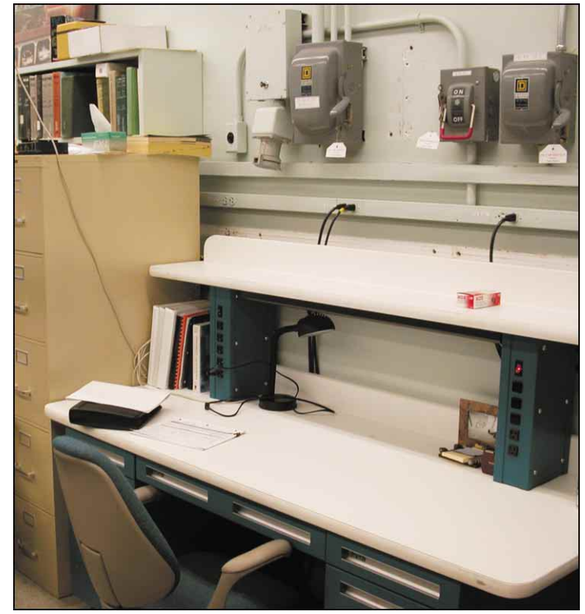
JOB NO PDC 0214-00001
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-D202-5**



1

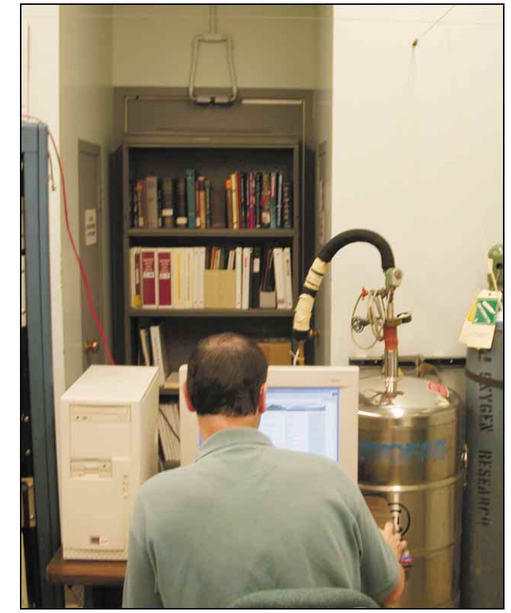
MNT17 - INSTRUMENT RACK

1. DISCONNECT 110 V ELECTRICAL POWER.
2. DISCONNECT COMPUTER CABLES.
3. DISCONNECT INSTRUMENTATION WIRING.



2

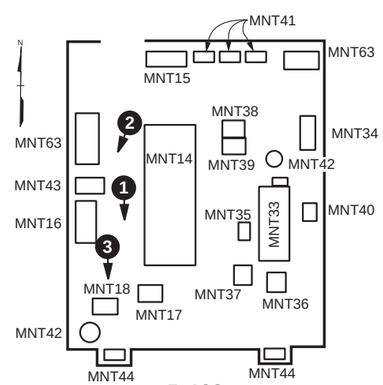
MNT16 - WORK BENCH



3

MNT18 - COMPUTER

1. DISCONNECT 110 V ELE
2. DISCONNECT COMPUTER CABLES.



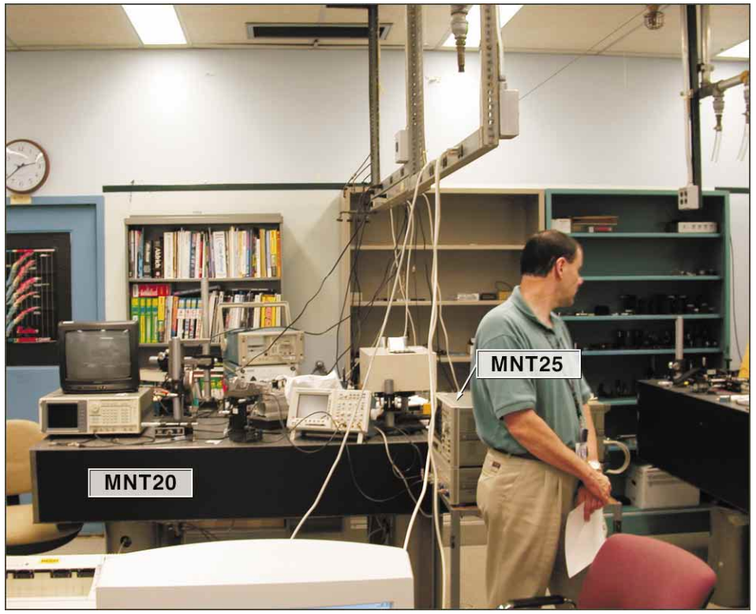
NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204, & E-D206
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-D202-6**



1

MNT20 - OPTICAL TABLE

1. TABLE IS 72” x 48” x 38” AND WEIGHS APPROXIMATELY 800 POUNDS.

MNT25 - SPECTRUM ANALYZER

1. DISCONNECT 110 V ELECTRICAL POWER.

2

MNT21 - INSTRUMENT RACK

1. DISCONNECT 110 V ELECTRICAL POWER.

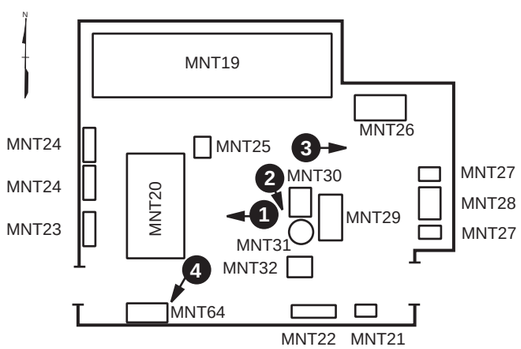
MNT22 - GLASS FRONT CABINET

3

MNT26 - WORK BENCH

1. DISCONNECT 110 V ELECTRICAL POWER.

MNT28 - DESK



H 151
BUILDING 4500S ORNL

4

MNT64 - N_2 LASER

1. PRA MODEL LN1000 TO E-D204-2 H151.

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204, & E-D206
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-D202-7**

1

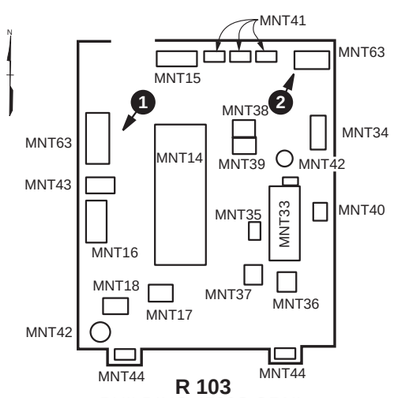
MNT63 - WORK BENCH

1. DISCONNECT 110 V ELECTRICAL POWER.

2

MNT63 - WORK BENCH

1. DISCONNECT 110 V ELECTRICAL POWER.



R 103
BUILDING 4500S ORNL

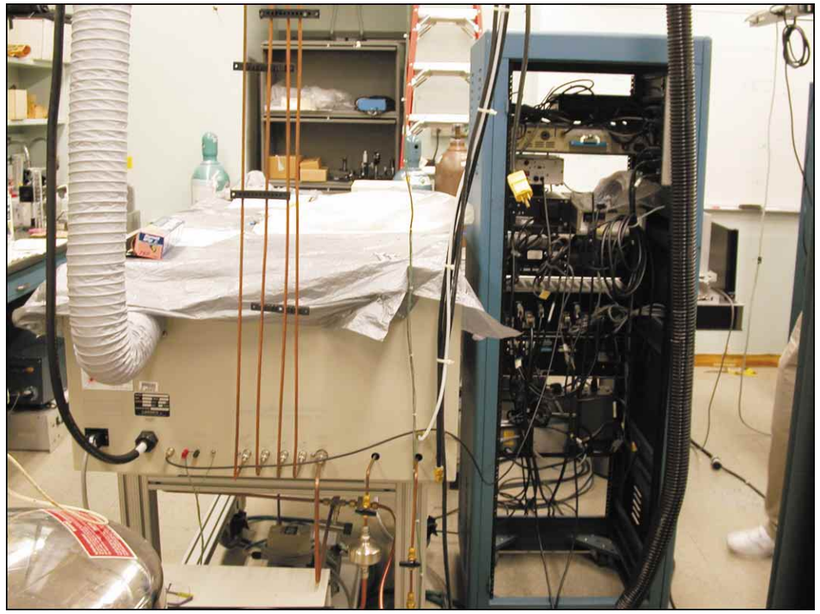
NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204, & E-D206
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 10/13/03
	REV NO 3
SCALE NONE	DWG NO **SK-E-D202-8**



1

MNT33 - LASER

1. DISCONNECT ELECTRICAL POWER.

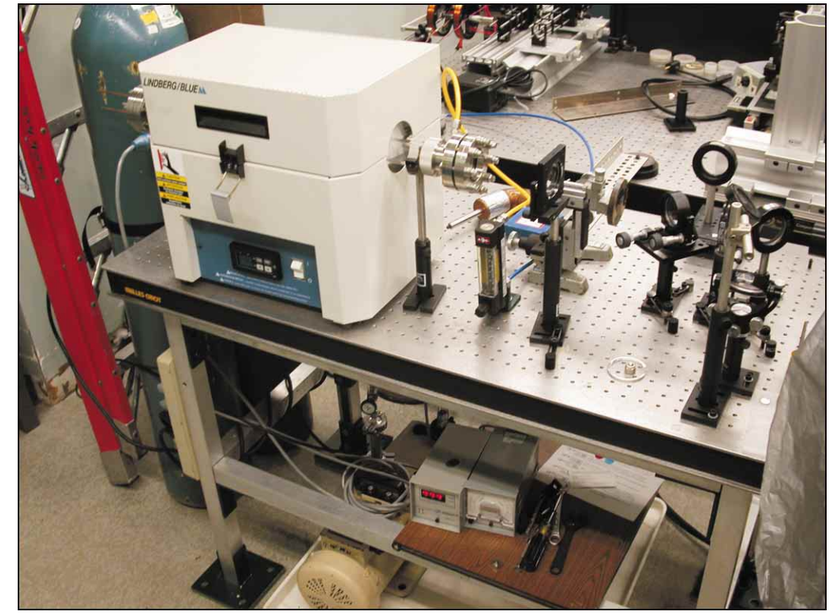
MNT35 - INSTRUMENT RACK

1. DISCONNECT 110 V ELECTRICAL POWER.
2. DISCONNECT INSTRUMENTATION WIRING.

2

MNT34 - LASER CYLINDER CABINET

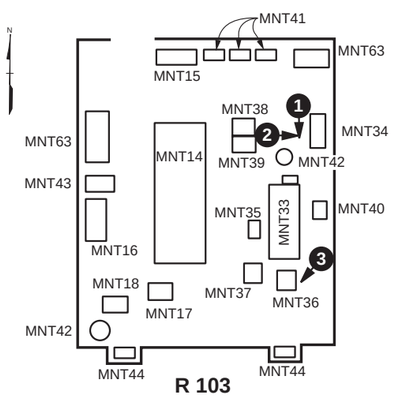
1. DISCONNECT EXHAUST VENTILATION.



3

MNT36 - OPTICAL TABLE

1. TABLE IS 24” x 48” x 33” AND WEIGHS APPROXIMATELY 200 POUNDS.



R 103
BUILDING 4500S ORNL

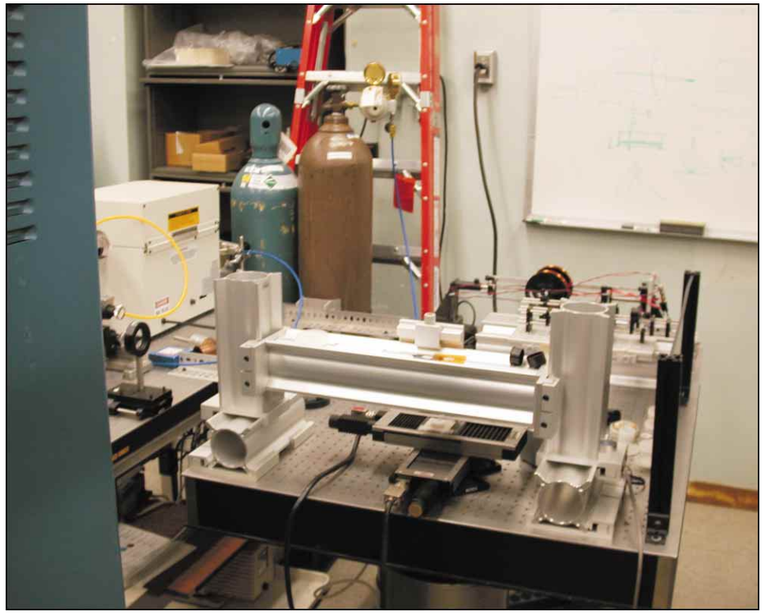
NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204, & E-D206
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-D202-9**



1

MNT37 - OPTICAL TABLE

1. TABLE IS 36” x 48” x 33” AND WEIGHS APPROXIMATELY 500 POUNDS.

2

MNT38 - OPTICAL TABLE

1. TABLE IS 36” x 30” x 30” AND WEIGHS APPROXIMATELY 200 POUNDS.

MNT39 - LASER ABLATION CHAMBER

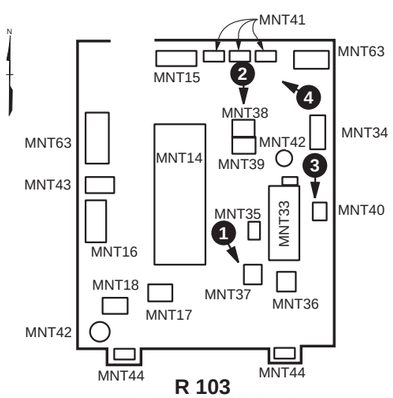
1. DISCONNECT ELECTRICAL POWER.

3

MNT40 - FLAMMABLE STORAGE CABINET

4

MNT41 - TOOL BOX (3)



R 103
BUILDING 4500S ORNL

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

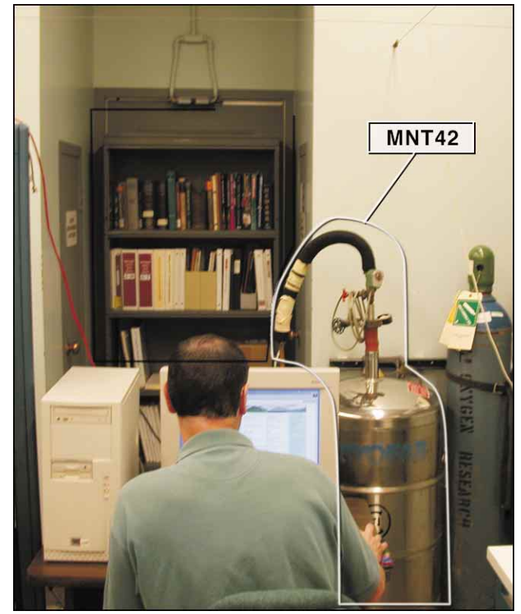
SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204, & E-D206
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-D202-10**

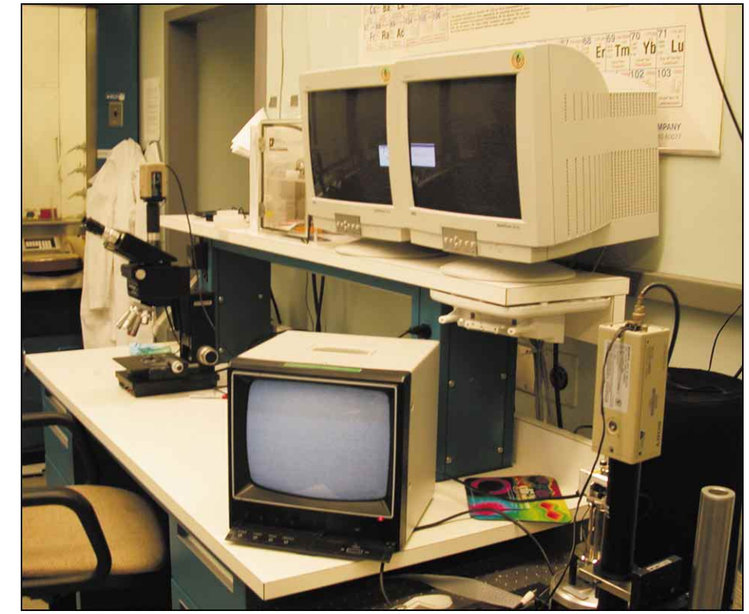
1

MNT33 - LASER



2

MNT42 - CRYOFAB TANK (2)

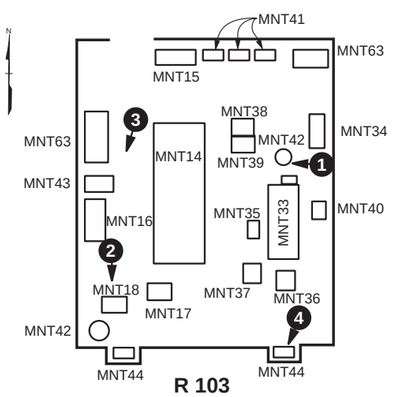


3

MNT45 - WORK BENCH - LOCATED IN ROOM S123

1. DISCONNECT 110 V ELECTRICAL POWER.

MNT42 - CRYOFAB TANK (2)



R 103
BUILDING 4500S ORNL

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204, & E-D206
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-D202-11**

1

MNT50 - STORAGE RACK

2

MNT49 - INSTRUMENT RACK

3

MNT51 - STORAGE UNITS (4)

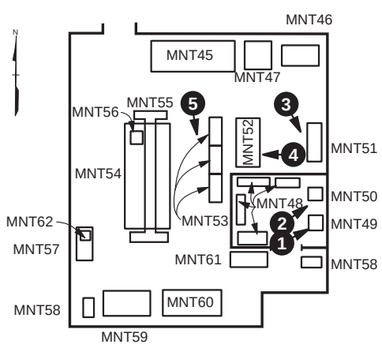
NEED PICTURE

4

MNT52 - WORK BENCH

5

MNT53 - CABINET (3)



S123
BUILDING 4500S ORNL

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204, & E-D206
DISASSEMBLY DRAWING

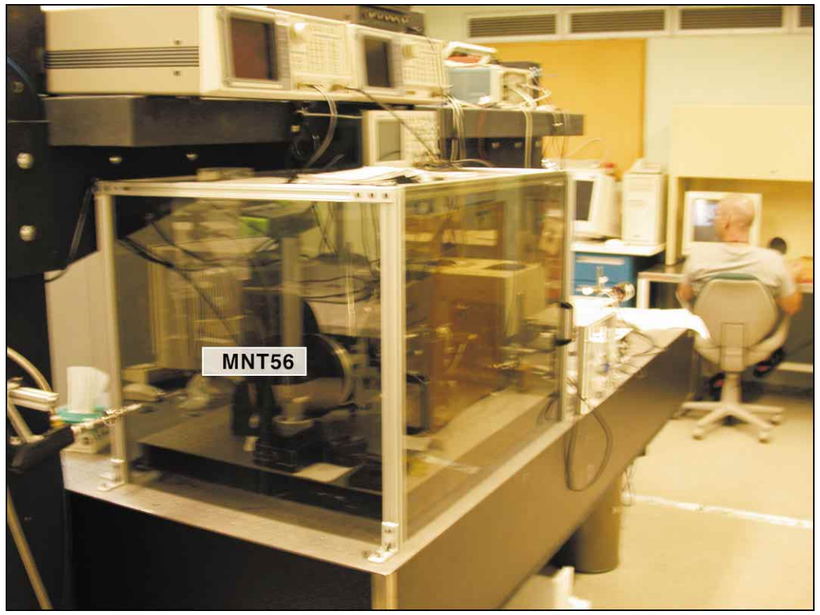
JOB NO PDC 0214-00001

DATE 10/13/03

REV NO 3

SCALE NONE

DWG NO **SK-E-D202-12**



1

MNT54 - OPTICAL TABLE

1. TABLE IS 48” x 96” x 34” AND WEIGHS APPROXIMATELY 1000 POUNDS.

MNT56 - OPTICAL TABLE TOP

1. TABLE IS 24” x 36” x 4” AND WEIGHS APPROXIMATELY 100 POUNDS.

2

MNT55 - INSTRUMENT SHELF

3

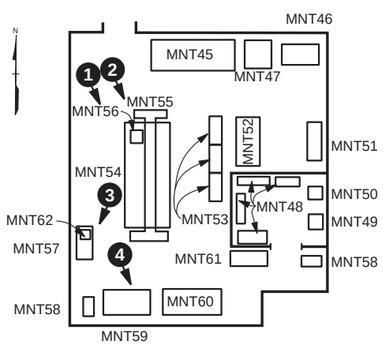
MNT57 - FLAMMABLE CABINET

MNT62 - DRY BOX

4

MNT59 - TABLE AND SHELF UNIT

MNT60 - WORK BENCH



S123
BUILDING 4500S ORNL

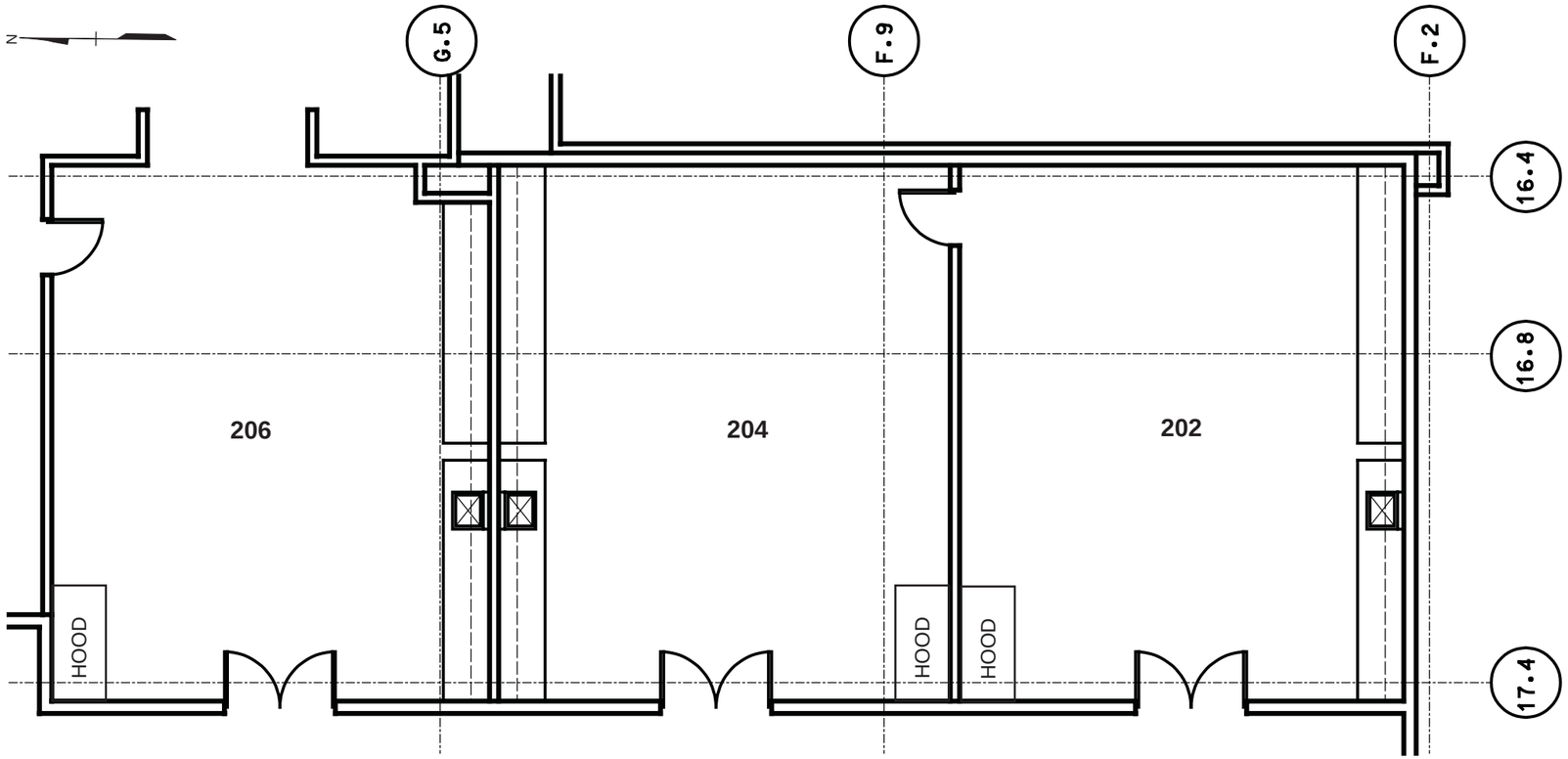
NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204, & E-D206
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-D202-13**



MEMS/NEMS TESTING LAB FLOOR PLAN

SCALE: 1/8" = 1'-0"

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	General Revision			
2	06/16/03	Added New Room Number			
1	03/28/03	Management Walkthrough			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

MEMS/NEMS TESTING LABORATORY
E-D202, E-D204 & E-D206
ASSEMBLY DRAWING NO. 1

JOB NO PDC 0214-00001	DATE 10/13/03
	REV NO 3
SCALE 1/8"=1'-0"	DWG NO **SK-E-D202-14**

Equipment to be moved to Clean Room (Ion Milling Lab) E-D206A, E-D208A & E-D210A:

TAG	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
IM1	Focused Ion Mill	96” x 96” x 60”	ORNL 4500S 2nd Floor Rm R107	SK-E-D206A-2	SK-E-D206A-7
IM2	Broad Ion Mill	96” x 54” x 78”	ORNL 4500S 2nd Floor Rm R107	SK-E-D206A-2	SK-E-D206A-7
IM3	Small Oven	22” x 28” x 25”	ORNL 4500S 2nd Floor Rm R103	SK-E-D206A-3	NA
IM4	Small Oven	36” x 36” x 24”	ORNL 4500S 2nd Floor Rm R107	SK-E-D206A-3	NA
IM5	Aneal. Oven	36” x 24” x 24”	ORNL 4500S 2nd Floor Rm R107	SK-E-D206A-3	SK-E-D206A-7
IM6	Thermal Evaporator	24” x 60” x 60”	ORNL 4500S 2nd Floor Rm R107	SK-E-D206A-3	SK-E-D206A-7
IM7	Profilometer Dektak 8000	36” x 60” x 62”	ORNL 4500S 2nd Floor Rm R107	SK-E-D206A-4	SK-E-D206A-7
IM8	Profilometer MP 2000 & Stone Tabe	36” x 24” x 62”	ORNL 4500S 2nd Floor Rm R107	SK-E-D206A-4	SK-E-D206A-7
IM9	Diffusion System	48” x 96” x 65”	ORNL 4500S 2nd Floor Rm R107	SK-E-D206A-4	SK-E-D206A-7
IM10	Profilometer Taylor-Hobson	18” x 26” x 26”	ORNL 4500S 2nd Floor Rm R107	SK-E-D206A-4	NA
IM11	Drybox	42” x 24” x 36”	ORNL 4500S 2nd Floor Rm R107	SK-E-D206A-5	NA
IM12	Tool Box	27” x 18” x 41”	ORNL 4500S 2nd Floor Rm R107	SK-E-D206A-5	SK-E-D206A-7
IM13	Lateral File	36” x 18” x 53”	ORNL 4500S 2nd Floor Rm R107	SK-E-D206A-5	SK-E-D206A-7
IM14	Infrared Spectrometer	40” x 30” x 56”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206A-5	SK-E-D206A-7
IM15	Infrared Spectrometer Carr 2300	60” x 36” x 68”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206A-5	SK-E-D206A-7
IM16	AFM - Atomic Microscope with Computeron Table	36” x 30” x 36”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206A-6	SK-E-D206A-7
IM17	Optical Table	36” x 120” x 41”	ORNL 4500S 2nd Floor Rm R103	SK-E-D206A-6	SK-E-D206A-7
IM18	Flammable Cabinet	43” x 19” x 45”	ORNL 4500S 2nd Floor Rm R123	SK-E-D206A-6	SK-E-D206A-7
IM19	Glass Front Closet (total of 2)	36” x 18” x 72”	Y-12, Building 9201-3	NA	SK-E-D206A-7
IM20	Stainless Steel Top Table (total of 3)	36” x 60” x 34”	Y-12, Building 9201-3	NA	SK-E-D206A-7
IM21	Stainless Steel Rack	16” x 60” x 60”	ORNL 4500S Rm H151	SK-E-D206A-6	SK-E-D206A-7
IM22	Misc. Items in Boxes 100 -150 Boxes	16” x 12” x 10”	Miscellaneous Rooms	SK-E-D206A-5	SK-E-D206A-7

CLEAN ROOM (ION MILLING LAB) E-D201 DRAWING INDEX

Drawing No.	Title
SK-E-D206A-1	Drawing Index and Equipment List
SK-E-D206A-2	Clean Room (Ion Milling Lab) Disassembly Drawing No. 1
SK-E-D206A-3	Clean Room (Ion Milling Lab) Disassembly Drawing No. 2
SK-E-D206A-4	Clean Room (Ion Milling Lab) Disassembly Drawing No. 3
SK-E-D206A-5	Clean Room (Ion Milling Lab) Disassembly Drawing No. 4
SK-E-D206A-6	Clean Room (Ion Milling Lab) Disassembly Drawing No. 5
SK-E-D206A-7	Clean Room (Ion Milling Lab) Installation Drawing No. 1

NOTES:

1. PANOS DATSKOS (574-6205) WILL FIELD DIRECT THE CONNECTION OF EQUIPMENT BEING MOVED TO THE CLEAN ROOM E-D206A, E-D208A, & E-D210A. SOME OF THE EQUIPMENT SHOWN ON THESE SKETCHES WILL BE LOCATED IN ANOTHER ESTD ETF LAB. EXACT LOCATION TO BE DETERMINED LATER.
2. USE E-D206A, E-D208A OR E-D210A SUFFIX FOR ALL EQUIPMENT TAGS.
3. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
4. ESTD WILL PROVIDE ALL SAFETY SUPPORT (IH, H&S, ETC.) REQUIRED FOR THE MOVE. ESTD WILL PROVIDE HP SURVEYS OR USE PROCESS KNOWLEDGE TO OBTAIN ANY REQUIRED GREEN TAGS FOR EQUIPMENT TO BE MOVED TO ETF.
5. ESTD WILL REMOVE ALL INTERCONNECTING INSTRUMENTATION AND CONTROL WIRING PRIOR TO THE MOVE AND WILL RECONNECT THIS WIRING AFTER THE MOVE.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

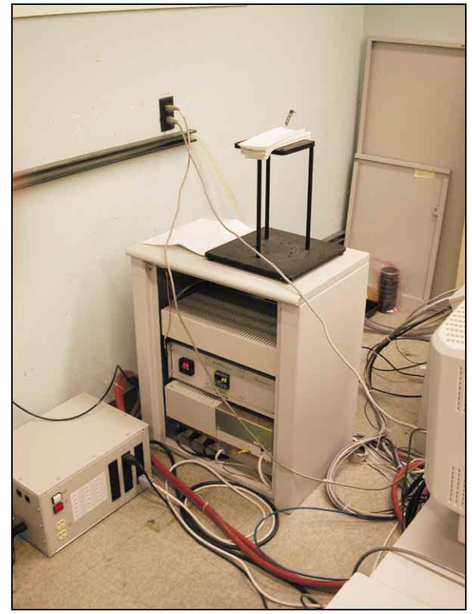
CLEAN ROOM (ION MILLING)
E-D206A, E-D208A, & E-D210A
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214-00001
DATE 10/13/03
REV NO 0
SCALE NONE
DWG NO **SK-E-D206A-1**

1

IM1 - FOCUSED ION MILL

1. THE ION FOCUSED MILL MUST BE DISASSEMBLED AND PACKED FOR MOVING BY THE MANUFACTURER AND IT WILL BE REASSEMBLED BY THE MANUFACTURER.



2

IM1 - FOCUSED ION MILL

3

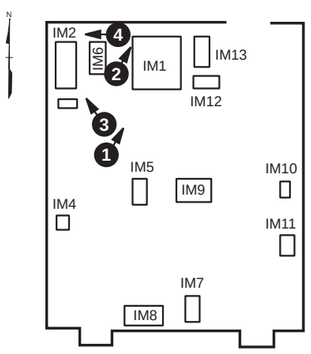
IM2 - BROAD ION MILL

1. DISCONNECT 110 V ELECTRICAL POWER.
2. DISCONNECT COMPRESSED AIR.
3. DISCONNECT GASES.

4

IM2 - BROAD ION MILL

1. DISCONNECT GASES.



R107
BUILDING 4500S ORNL

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

CLEAN ROOM (ION MILLING)
E-D206A, E-D208A, & E-D210A
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001

DATE 10/13/03

REV NO

SCALE NONE

DWG NO **SK-E-D206A-2**

1

IM3 - SMALL OVEN

1. DISCONNECT 208 V ELECTRICAL POWER.

2

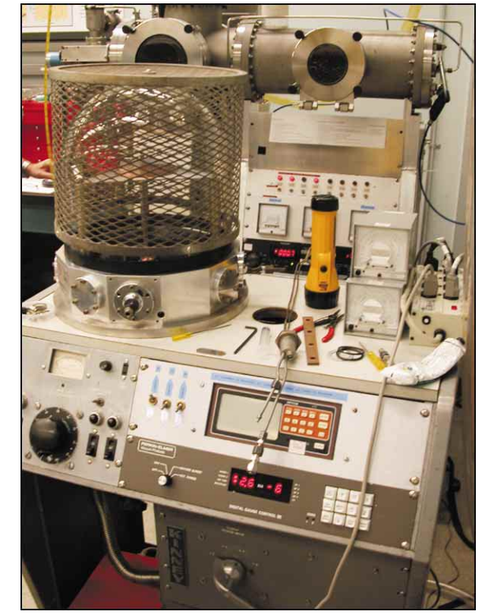
IM4 - SMALL OVEN

1. DISCONNECT 110 V ELECTRICAL POWER.

3

IM5 - ANEAL OVEN

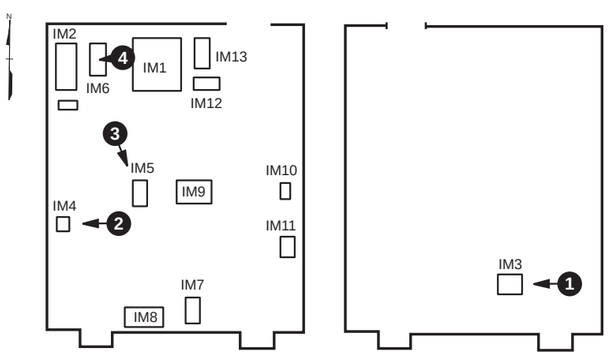
1. DISCONNECT 110 V ELECTRICAL POWER.



4

IM6 - THERMAL EVAPORATOR

1. DISCONNECT 110 V ELECTRICAL POWER.



R107
BUILDING 4500S ORNL

R103
BUILDING 4500S ORNL

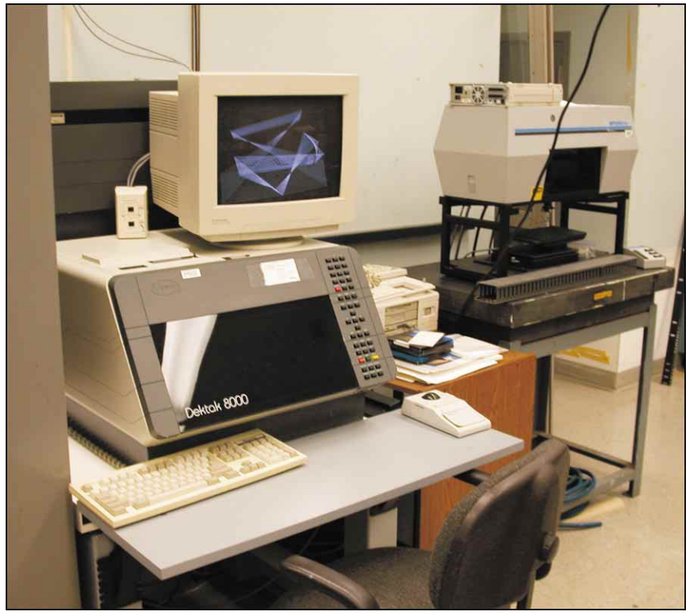
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

CLEAN ROOM (ION MILLING)
E-D206A, E-D208A, & E-D210A
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 10/13/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-D206A-3**



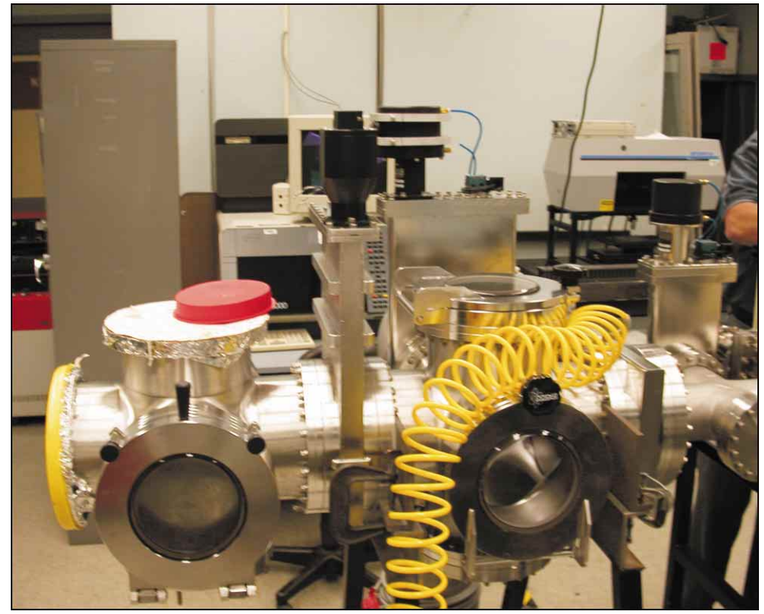
1

IM7 - PROFILOMETER DEKTAK 8000

1. DISCONNECT 110 V ELECTRICAL POWER.

IM8 - PROFILOMETER MP 2000 ON STONE TABLE

1. DISCONNECT 110 V ELECTRICAL POWER.



2

IM9 - DIFFUSION SYSTEM

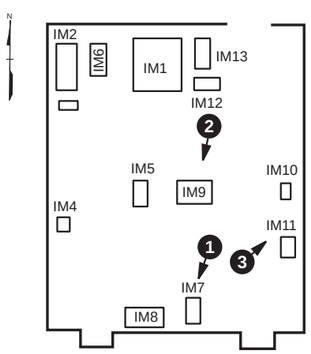
1. DISCONNECT 110 V ELECTRICAL POWER.

3

IM10 - PROFILOMETER TAYLOR-HOBSON

1. DISCONNECT 110 V ELECTRICAL POWER.

IM11 - DRY BOX



R107
BUILDING 4500S ORNL

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

CLEAN ROOM (ION MILLING)
E-D206A, E-D208A, & E-D210A
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 10/13/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-D206A-4**

1

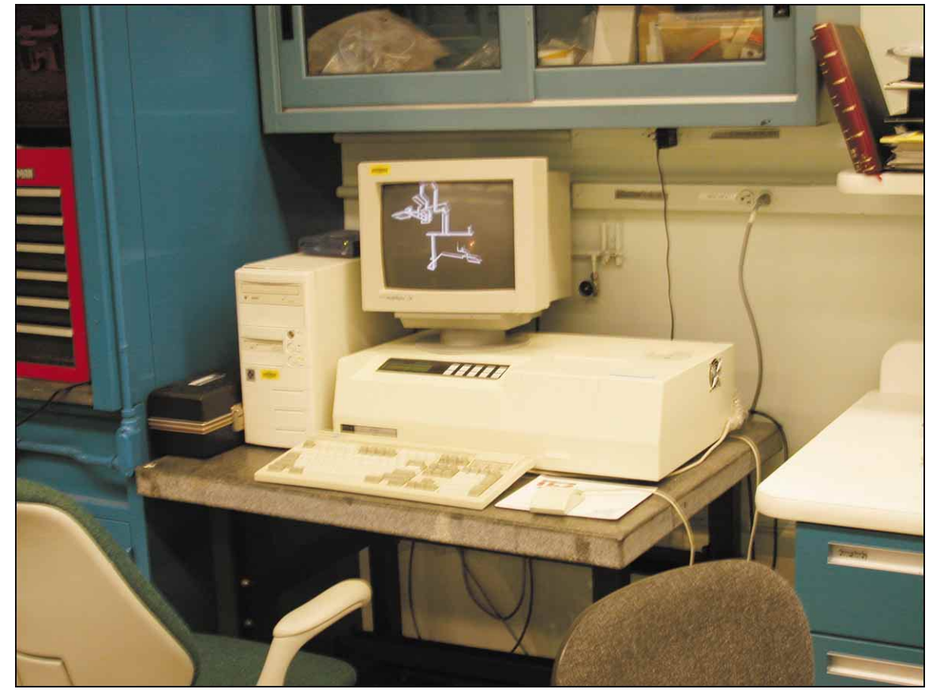
IM12- TOOL BOX

IM13 - LATERAL FILE

2

IM14 - INFRARED SPECTROMETER

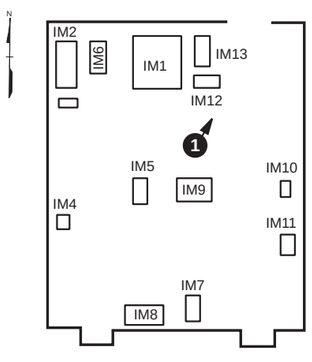
1. DISCONNECT 110 V ELECTRICAL POWER.
2. TABLE TO BE MOVED.



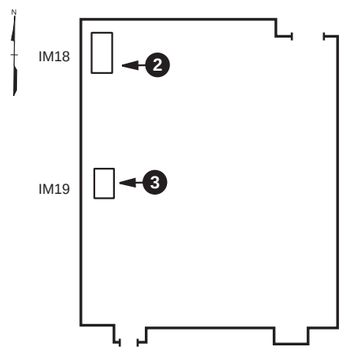
3

IM15 - INFRARED SPECTROMETER CARR 2300

1. DISCONNECT 110 V ELECTRICAL POWER.
2. DISCONNECT COMPUTER CABLES.
3. TABLE TO BE MOVED.



R107
BUILDING 4500S ORNL



R123
BUILDING 4500S ORNL

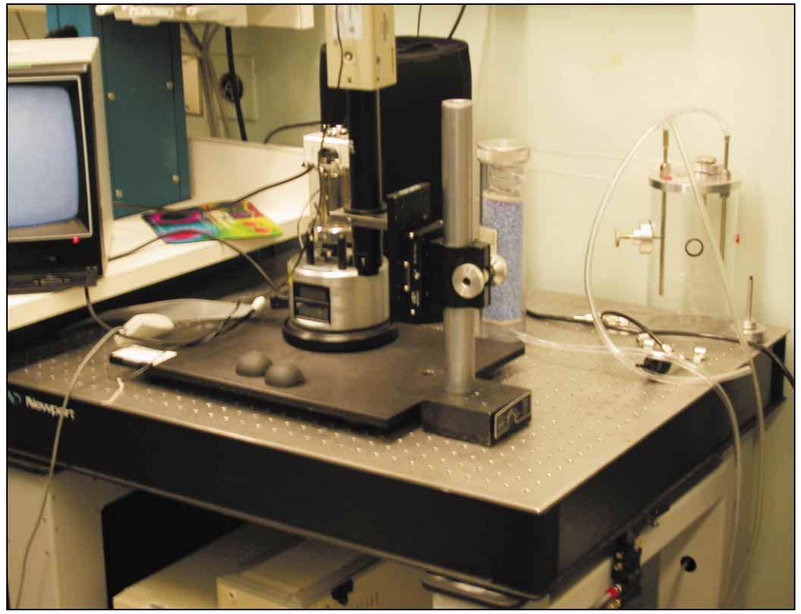
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

CLEAN ROOM (ION MILLING)
E-D206A, E-D208A, & E-D210A
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 10/13/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-D206A-5**



1

IM16 - AFM & OPTICAL TABLE

1. TABLE IS 36” x 30” x 31” AND WEIGHS APPROXIMATELY 175 POUNDS.

2

IM17 - OPTICAL TABLE

1. TABLE IS 36” x 120” x 41” AND WEIGHS APPROXIMATELY 750 POUNDS.

3

IM18 - FLAMMABLE CABINET

4

IM21 - STAINLESS STEEL RACK

1. DISCONNECT 110 V ELECTRICAL POWER.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

CLEAN ROOM (ION MILLING)
E-D206A, E-D208A, & E-D210A
DISASSEMBLY DRAWING

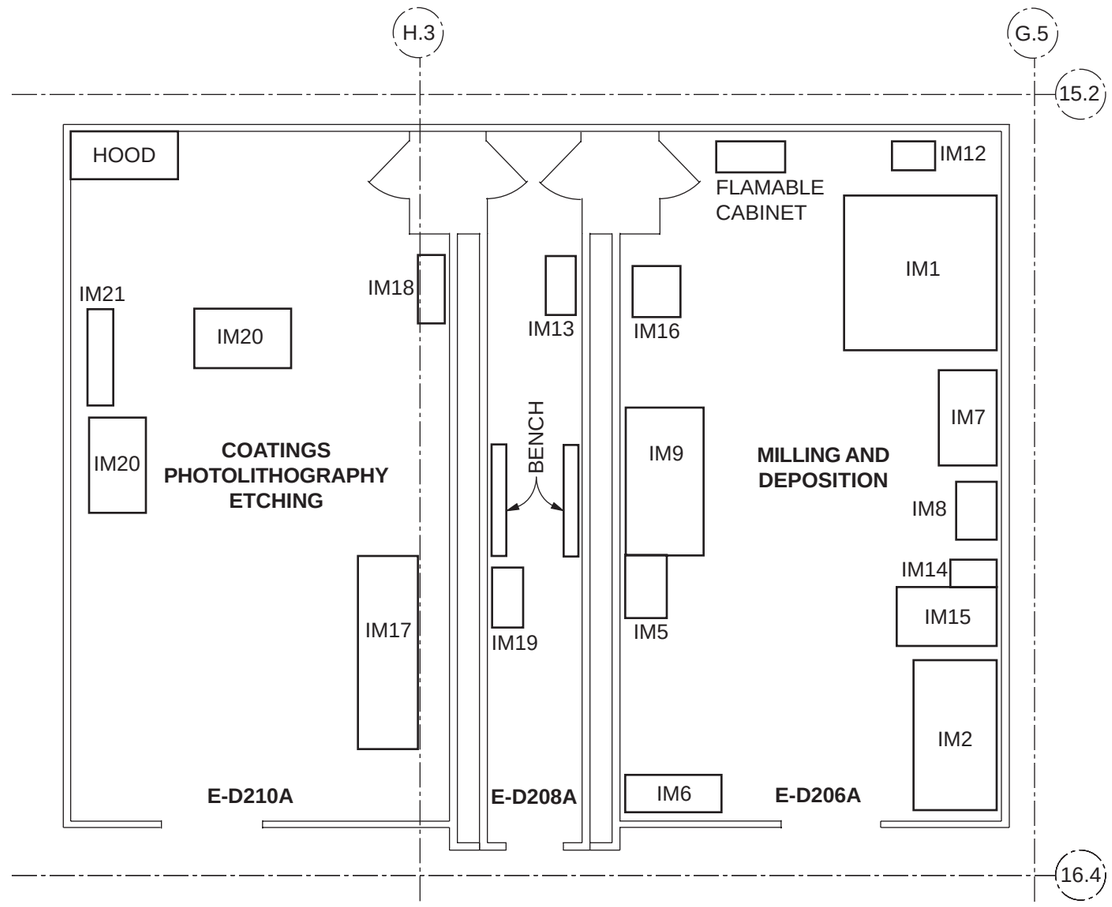
JOB NO PDC 0214-00001

DATE 10/13/03

REV NO 0

SCALE NONE

DWG NO **SK-E-D206A-6**



CLEAN ROOM (ION MILLING)

SCALE: 1/8”= 1’-0”

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

CLEAN ROOM (ION MILLING)
E-D206A, E-D208A, & E-D210A
ASSEMBLY DRAWING NO. 1

JOB NO PDC 0214-00001	DATE 10/13/03
	REV NO 0
SCALE 1/8”=1’-0”	DWG NO **SK-E-D206A-7**

Equipment to be moved to ESTD Optics Labs E-D203:

TAG E-D203-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
O1	Optical Table with Laser Equipment	48” x 72” x 30”	Building 3500, Room 15	SK-E-D203-2	SK-E-D203-4
O2	Optical Table with Laser Equipment	48” x 96” x 30”	Building 3500, Room 15	SK-E-D203-2	SK-E-D203-4
O3	Optical Table with Laser Equipment	48” x 144” x 30”	Building 3500, Room 36	SK-E-D203-3	SK-E-D203-4
O4	Computer Stand	24” x 24” x 60”	Building 3500, Room 36	SK-E-D203-3	SK-E-D203-4
O5	Tool Cabinets	24” x 16” x 48”	Building 3500, Room 36	SK-E-D203-3	SK-E-D203-4
O6	Optical Table with Laser Equipment	24” x 144” x 30”	Building 3500, Room 36	SK-E-D203-3	SK-E-D203-4
O7	Optical Table with Laser Equipment	36” x 120” x 30”	Building 3500, Room 36	SK-E-D203-3	SK-E-D203-4
O8	Optical Table	48” x 120” x 40”	Y-12, 9201-3, Room 245D	SK-E-D203-3	SK-E-D203-4
O9	Boxes on Pallets - Quantity TBD				

ESTD OPTICS LABS E-D203 DRAWING INDEX

Drawing No.	Title
SK-E-D203-1	Drawing Index and Equipment List
SK-E-D203-2	ESTD Optics Labs Disassembly Drawing No. 1
SK-E-D203-3	ESTD Optics Labs Disassembly Drawing No. 2
SK-E-D203-4	ESTD Optics Labs Installation Drawing

NOTES:

1. DON HUTCHINSON WILL FIELD DIRECT THE CONNECTION OF EQUIPMENT BEING MOVED TO THE ESTD OPTICS LAB.
2. USE E-D203 OR E-D205 SUFFIX FOR EQUIPMENT TAGS.
3. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
4. ESTD WILL PROVIDE ALL SAFETY SUPPORT (IH, H&S, ETC.) REQUIRED FOR THE MOVE. ESTD WILL PROVIDE HP SURVEYS OR USE PROCESS KNOWLEDGE TO OBTAIN ANY REQUIRED GREEN TAGS FOR EQUIPMENT TO BE MOVED TO ETF.
5. ESTD WILL REMOVE ALL INTERCONNECTING INSTRUMENTATION AND CONTROL WIRING PRIOR TO THE MOVE AND WILL RECONNECT THIS WIRING AFTER THE MOVE.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

ESTD OPTICS LABS E-D203 & E-D205
DRAWING INDEX AND EQUIPMENT LIST

JOB NO 0214-00001
DATE 09/04/03
REV NO 0
SCALE NONE
DWG NO **SK-E-D203-1**

1

O1 - 4’ x 6’ OPTICAL TABLE WITH LASER EQUIPMENT

2

O2 - 4’ x 8’ OPTICAL TABLE WITH LASER EQUIPMENT

BUILDING 3500, ROOM 15
OPTICAL INTERFERENCE LAB
JOHN SIMPSON

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ESTD OPTICS LABS E-D203 & E-D205
DISASSEMBLY DRAWING

JOB NO 0214-00001

DATE 09/04/03

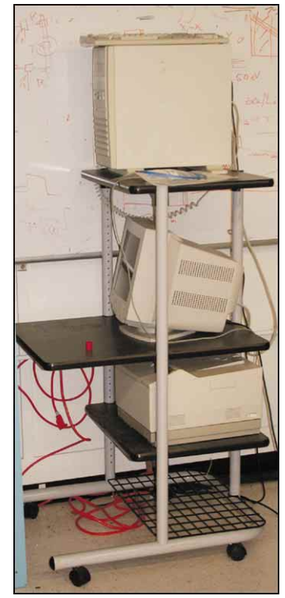
REV NO 0

SCALE NONE

DWG NO **SK-E-D203-2**

4

O3 - 4' X 12' OPTICAL TABLE



5

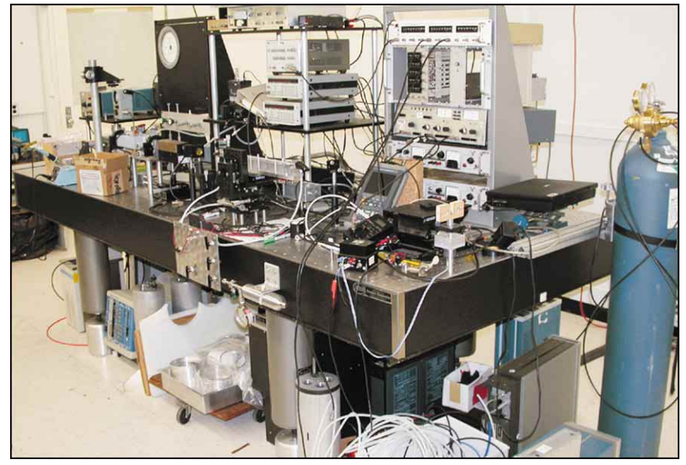
O4 - COMPUTER STAND

6

O5 - TOOL CABINET

7

O6 - 2' X 12' OPTICAL TABLE



8

O7 - 3' X 10' OPTICAL TABLE

9

O8 - OPTICAL TABLE
MOVE FROM RM 245D, BLDG. 9201-3

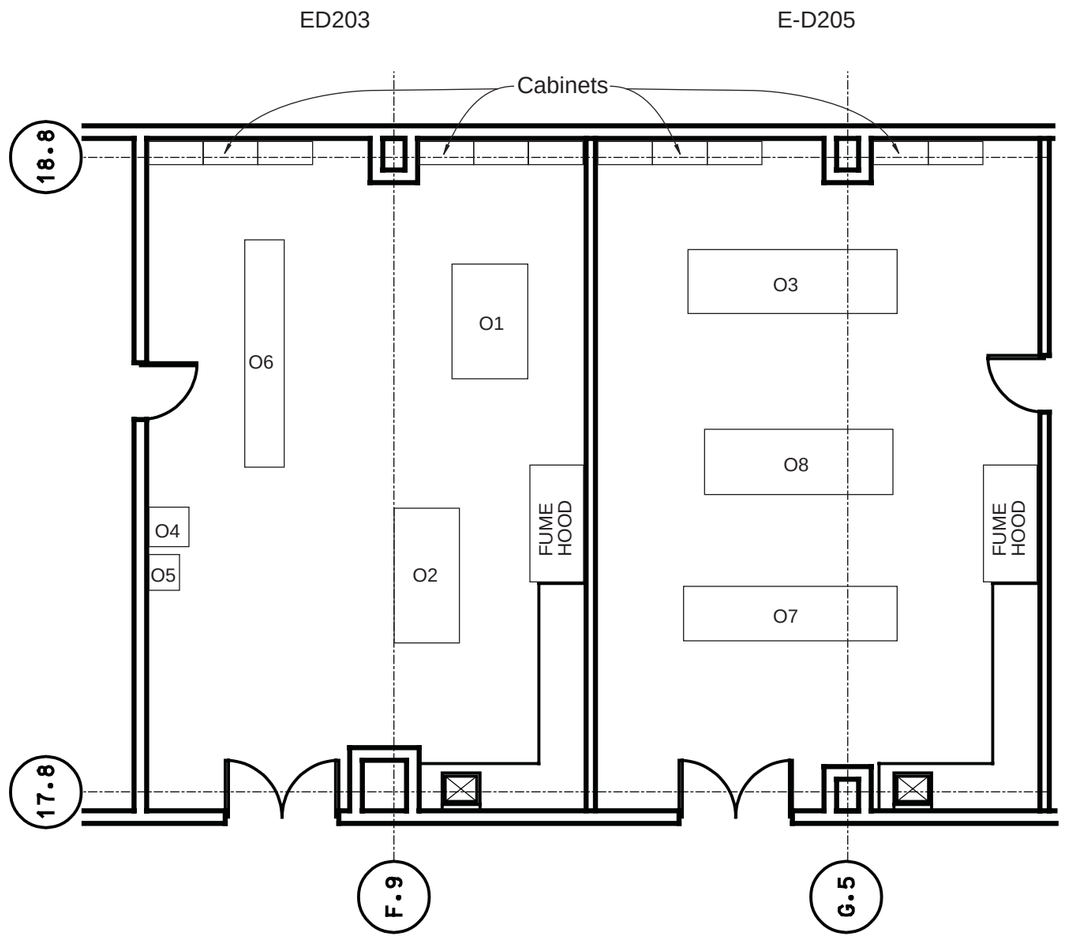
BUILDING 3500, ROOM 36
OPTICAL INFRARED LAB
DON HUTCHINSON

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

ESTD OPTICS LABS E-D203 & E-D205
DISASSEMBLY DRAWING

JOB NO	DATE	09/04/03
0214-00001	REV NO	0
SCALE	DWG NO	
NONE	SK-E-D203-3	



OPTICS LABS FLOOR PLAN

SCALE: 1/8" = 1'-0"

NO	DATE	REVISION	BY	CK	APPR
1	04/07/03	Management Walkthrough			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ESTD OPTICS LABS E-D203 & E-D205
INSTALLATION DRAWING NO. 1

JOB NO	PDC 0214	DATE	09/04/03
		REV NO	0
SCALE	3/32"=1'-0"	DWG NO	**SK-E-D203-4**

Equipment to be moved to the Environmental Effects Lab E-C102:

TAG E-C102-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
EE1	**TENNEY EQUIPMENT CHAMBER**	65” x 115” x 92”	Building 3500 High Bay	SK-E-C102-2	SK-E-C102-9
	GTEN CHAMBER EQUIPMENT				
EE2	Environmental Chamber	112” x 216” x 90”	Building 3500 High Bay	SK-E-C102-3	SK-E-C102-9
EE3	Electronic Cabinet	24” x 30” x 80”	Building 3500 High Bay	SK-E-C102-3	SK-E-C102-9
EE4	Test Stand	48” x 156” x 52”	Building 3500 High Bay	SK-E-C102-3	SK-E-C102-9
	VIBRATION TEST EQUIPMENT				
EE5	Computer	60” x 30” x 30”	Building 3500 High Bay	SK-E-C102-4	SK-E-C102-9
EE6	Shaker	23” x 16” x 40”	Building 3500 High Bay	SK-E-C102-4	SK-E-C102-9
EE7	Shaker	12” x 18” x 24”	Building 3500 High Bay	SK-E-C102-4	SK-E-C102-9
EE8	Shaker Controller	24” x 26” x 58”	Building 3500 High Bay	SK-E-C102-4	SK-E-C102-9
EE9	Shaker Table	42” x 28” x 40”	Building 3500 High Bay	SK-E-C102-4	SK-E-C102-9
EE10	Shaker Amplifier	40” x 28” x 70”	Building 3500 High Bay	SK-E-C102-4	SK-E-C102-9
EE11	Shock Monitor for Drop Test	24” x 30” x 62”	Building 3500 High Bay	SK-E-C102-5	SK-E-C102-9
EE12	Shower	29” x 35” x 86”	Building 3500 High Bay	SK-E-C102-5	SK-E-C102-9
EE13	Drop Test Stand	28” x 33” x 129”	Building 3500 High Bay	SK-E-C102-5	SK-E-C102-9
	RUSSELS CHAMBER EQUIPMENT				
EE14	Computer	60” x 30” x 30”	Building 3500 High Bay	SK-E-C102-6	SK-E-C102-9
EE15	Bud Rack	22” x 20” x 70”	Building 3500 High Bay	SK-E-C102-6	SK-E-C102-9
EE16	Chamber	76” x 107” x 96”	Building 3500 High Bay	SK-E-C102-6	SK-E-C102-9
EE17	Load Bank	37” x 24” x 62”	Building 3500 High Bay	SK-E-C102-6	SK-E-C102-9
EE18	Frequency Converter	10” x 24” x 28”	Building 3500 High Bay	SK-E-C102-6	SK-E-C102-9
EE19	PCs and Test Instruments (8 pieces)	24” x 12” x 18”	Building 3500 High Bay	SK-E-C102-6	SK-E-C102-9
EE20	Condenser	66” x 48” x 40”	South side of 3500	SK-E-C102-7	SK-E-C102-9
EE21	Power Transformer	26” x 20” x 40”	South side of 3500	SK-E-C102-7	SK-E-C102-9
EE22	Compressor	42” x 62” x 84”	South side of 3500	SK-E-C102-7	SK-E-C102-9
EE23	Electronic Cabinet	23” x 24” x 55”	Building 3500 High Bay	SK-E-C102-8	SK-E-C102-9
EE24	Test Enclosure	42” x 42” x 68”	Building 3500 High Bay	SK-E-C102-8	SK-E-C102-9
EE25	PCs and Test Instruments	100” x 30” x 30”	Building 3500 High Bay	SK-E-C102-8	SK-E-C102-9
EE26	Storage Cabinets (Total of 4)	36” x 18” x 72”	Building 3500 High Bay	SK-E-C102-8	SK-E-C102-9

ENVIRONMENTAL EFFECTS LAB E-C102 DRAWING INDEX

Drawing No.	Title
SK-E-C102-1	Environmental Effects Lab Drawing Index and Equipment List
SK-E-C102-2	Environmental Effects Lab Disassembly Drawing
SK-E-C102-3	Environmental Effects Lab Disassembly Drawing
SK-E-C102-4	Environmental Effects Lab Disassembly Drawing
SK-E-C102-5	Environmental Effects Lab Disassembly Drawing
SK-E-C102-6	Environmental Effects Lab Disassembly Drawing
SK-E-C102-7	Environmental Effects Lab Disassembly Drawing
SK-E-C102-8	Environmental Effects Lab Disassembly Drawing
SK-E-C102-9	Environmental Effects Lab Installation Drawing

NOTES:

1. PETER CHIARO (576-4598) WILL FIELD DIRECT THE INTERCONNECTION OF EQUIPMENT BEING MOVED TO THE ENVIRONMENTAL EFFECTS LABORATORY E-C102.

NO	DATE	REVISION	BY	CK	APPR
1	10/16/03	REVISED LAB FLOOR PLAN EQUIPMENT LAYOUT			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

ENVIRONMENTAL EFFECTS LAB E-C102
DRAWING INDEX AND EQUIPMENT LIST

JOB NO 0214-00001
DATE 10/16/03
REV NO 1
SCALE NONE
DWG NO **SK-E-C102-1**

EE1

FRONT VIEW (ON CASTERS)

CONTROL PANEL (RIGHT SIDE)

1. DISCONNECT 480V, 3 PHASE, 60 AMP RECEPTACLE (53 AMPS CONNECTED LOAD)

DISCONNECT 1” PROCESS WATER SUPPLY & RETURN

DISCONNECT INSTRUMENT AIR

DISCONNECT DRAIN

TENNEY ENVIRONMENTAL CHAMBER

NOTES:

1. USE SUFFIX E-C102 FOR ALL EQUIPMENT TAGS.

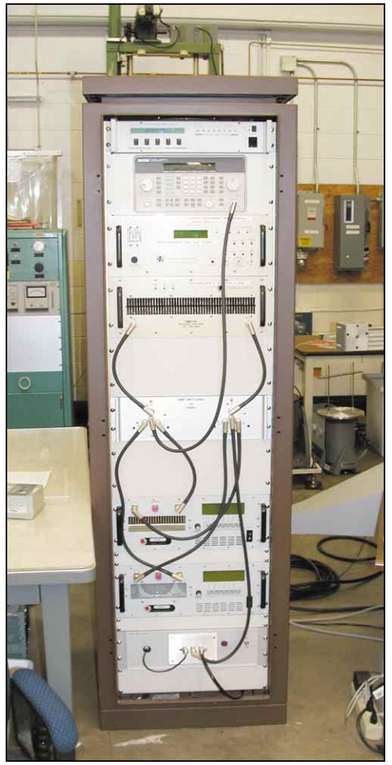
NO	DATE	REVISION	BY	CK	APPR
1	10/16/03	REVISED LAB FLOOR PLAN EQUIPMENT LAYOUT			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ENVIRONMENTAL EFFECTS LAB E-C102 DISASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 10/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-E-C102-2**



EE3

GTEN ELECTRONIC CABINET

1. DISCONNECT 120V, 15 AMP RECEPTACLE

EE2

CHAMBER WITH PC EQUIPMENT (ON CASTERS)
CHAMBER IS EXTREMELY SENSITIVE
CHAMBER CAN BE DISASSEMBLED BUT PREFER TO MOVE ASSEMBLED

1. DISCONNECT 120V, 15 AMP RECEPTACLE

EE4

TEST STAND (ON CASTERS)

GTEN ENVIRONMENTAL CHAMBER

NOTES:

1. USE SUFFIX E-C102 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	10/16/03	REVISED LAB FLOOR PLAN EQUIPMENT LAYOUT			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ENVIRONMENTAL EFFECTS LAB E-C102
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 10/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-E-C102-3**

EE5

COMPUTER

1. 120V, 12 AMP RECEPTACLE

EE6 & EE7

SHAKERS

1. DISCONNECT 208V SUPPLIED FROM CONTROLLER

EE8

CONTROLLER

1. DISCONNECT 208V, SINGLE PHASE, 20 AMP RECEPTACLE

EE9

SHAKER TABLE

1. SUPPLIED FROM AMPLIFIER

EE10

AMPLIFIER

1. DISCONNECT 480V, 3 PHASE 30 AMP RECEPTACLE (FUSED AT 20 AMPS)

VIBRATION TEST STAND

NOTES:

1. USE SUFFIX E-C102 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	10/16/03	REVISED LAB FLOOR PLAN EQUIPMENT LAYOUT			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ENVIRONMENTAL EFFECTS LAB E-C102 DISASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 10/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-E-C102-4**

EE11

SHOCK MONITOR
(MONITORS DROP TEST)

1. DISCONNECT 120V AC, 15 AMP RECEPTACLE

EE12

SHOWER

1. DISCONNECT PROCESS WATER & DRAIN

EE13

DROP TEST STAND
CONTAINS 2000 POUND WEIGHT IN BASE

1. DISCONNECT 480V, 3 PHASE, 30 AMP RECEPTACLE (FUSED AT 25 AMPS)

NOTES:

1. USE SUFFIX E-C102 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	10/16/03	REVISED LAB FLOOR PLAN EQUIPMENT LAYOUT			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ENVIRONMENTAL EFFECTS LAB E-C102
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 10/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-E-C102-5**

EE14

COMPUTER

1. DISCONNECT 120V, 15 AMP RECEPTACLE

EE15

BUD RACK

1. DISCONNECT 120V, 15 AMP RECEPTACLE

EE16

RUSSELLS CHAMBER

1. DISCONNECT 230V, 3 PHASE, 127 AMPS SUPPLIED FROM COMPRESSOR AND REMOVE CONDUIT
2. DISCONNECT REFRIGERATION PIPING
3. DISCONNECT DRAIN
4. DISCONNECT INSTRUMENT AIR

EE17

LOAD BANK (ON CASTERS)

1. DISCONNECT 120V, 20 AMP RECEPTACLE

RUSSELLS ENVIRONMENTAL CHAMBER

EE19

PCS AND TEST INSTRUMENTS

1. DISCONNECT 120V, 15 AMP RECEPTACLES

EE18

FREQUENCY CONVERTER

1. DISCONNECT 208V, SINGLE PHASE, 30 AMP RECEPTACLE

NOTES:

1. USE SUFFIX E-C102 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	10/16/03	REVISED LAB FLOOR PLAN EQUIPMENT LAYOUT			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

ENVIRONMENTAL EFFECTS LAB E-C102 DISASSEMBLY DRAWING

JOB NO PDC 0214-00001

DATE 10/16/03

REV NO 1

SCALE NONE

DWG NO **SK-E-C102-6**

EE20

CONDENSER

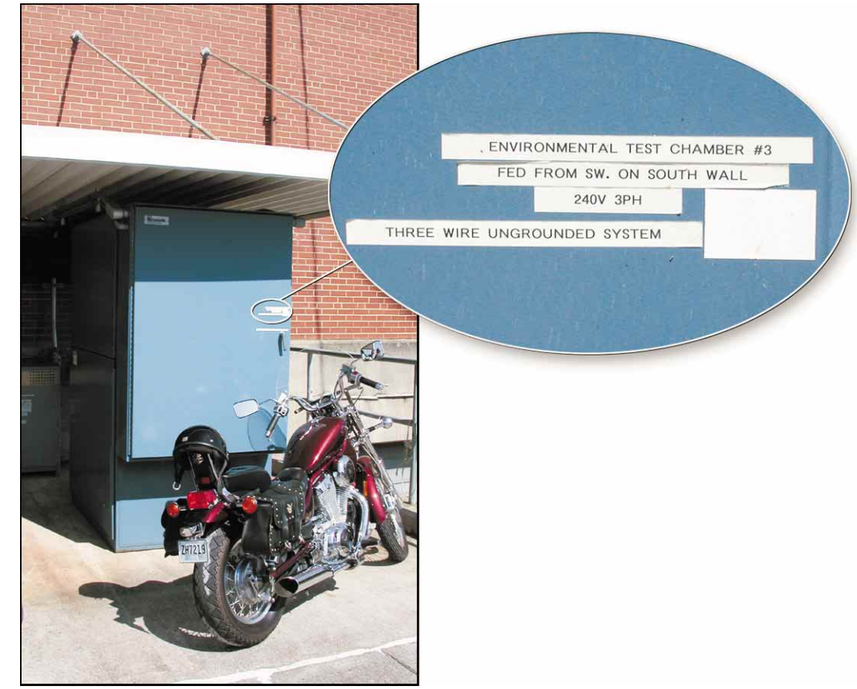
1. DISCONNECT 230V, 15 AMP CIRCUIT AND REMOVE CONDUIT (2 FANS @ 4.2 AMPS EACH)

2. DISCONNECT REFRIGERATION PIPING

EE21

POWER TRANSFORMER

1. DISCONNECT 480V-240V, 3 PHASE, 75 KVA SUPPLIED FROM 100 AMP DISCONNECT AND REMOVE CONDUIT



EE22

COMPRESSOR

1. DISCONNECT 240V, 3 PHASE, SUPPLIED FROM TRANSFORMER AND REMOVE CONDUIT

2. DISCONNECT REFRIGERATION PIPING

OUTDOOR EQUIPMENT FOR RUSSELLS ENVIRONMENTAL CHAMBER
(LOCATED ON THE SOUTH SIDE OF BUILDING 3500)

NOTES:

1. USE SUFFIX E-C102 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
1	10/16/03	REVISED LAB FLOOR PLAN EQUIPMENT LAYOUT			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

ENVIRONMENTAL EFFECTS LAB E-C102 DISASSEMBLY DRAWING

JOB NO PDC 0214-00001

DATE 10/16/03

REV NO 1

SCALE NONE

DWG NO **SK-E-C102-7**

EE23

ELECTRONIC CABINET

1. DISCONNECT 120V, 15 AMP RECEPTACLE

EE24

TEST ENCLOSURE

1. ELECTRONIC EQUIPMENT (BEHIND TEST ENCLOSURE)
   32” W X 43” D X 30” H TABLE
   DISCONNECT 120V, 15 AMP RECEPTACLE

EE25

PCS AND TEST INSTRUMENTS

1. DISCONNECT 120V, 15 AMP RECEPTACLE

EE26

STORAGE CABINETS (TOTAL OF 4)

36’ W X 18” D X 72” H

NOTES:

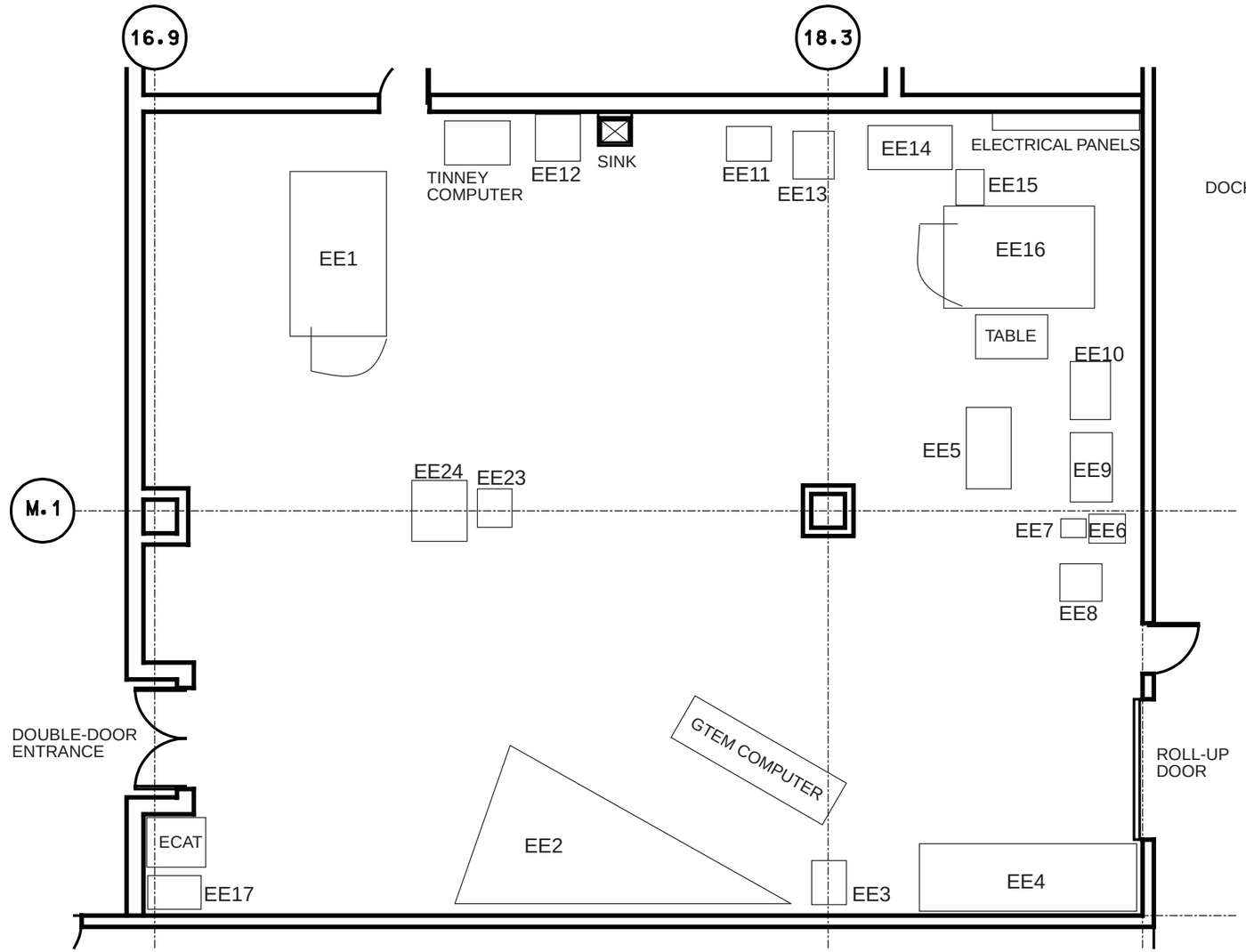
1. USE SUFFIX E-C102 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
1	10/16/03	REVISED LAB FLOOR PLAN EQUIPMENT LAYOUT				PM APPR	
						CLIENT APPR	

SHEET TITLE

ENVIRONMENTAL EFFECTS LAB E-C102 DISASSEMBLY DRAWING

JOB NO	DATE 10/16/03
PDC 0214-00001	REV NO 1
SCALE NONE	DWG NO **SK-E-C102-8**



ENVIRONMENTAL EFFECTS LAB FLOOR PLAN

SCALE: 1/8" = 1'-0"

NOTES:

1. ELECTRICAL REQUIREMENTS OTHER THAN 120V, 15 AMP RECEPTACLES FOR THE ENVIRONMENTAL EFFECTS LAB ARE:

   A. TENNEY ENVIRONMENTAL CHAMBER (EE1) 480V, 3 PHASE, 60 AMP RECEPTACLE (53 AMPS CONNECTED LOAD)

   B. VIBRATION CONTROLLER/SHAKER (EE8) 208V, SINGLE PHASE, 2O AMP RECEPTACLE

   C. SHAKER AMPLIFIER/TABLE (EE10) 480V, 3 PHASE, 30 AMP RECEPTACLE (FUSED AT 20 AMPS)

   D. DROP TEST STAND/MONITOR (EE13) 480V, 3PHASE, 30 AMP RECEPTACLE (FUSED AT 25 AMPS)

   E. FREQUENCY CONVERTER (EE18) 208V, SINGLE PHASE, 30 AMP RECEPTACLE

   F. RUSSELL CHAMBER EQUIPMENT (EE16) (CONDENSER, COMPRESSER & CHAMBER) 480V, 3 PHASE, 100 AMP DISCONNECT SWITCH SUPPLY TO A 480V-240V, 3 PHASE, 75 KVA TRANSFORMER

NO	DATE	REVISION	BY	CK	APPR
1	10/16/03	REVISED LAB FLOOR PLAN EQUIPMENT LAYOUT			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ENVIRONMENTAL EFFECTS LAB E-C102 INSTALLATION DRAWING

JOB NO PDC 0214-00001	DATE 10/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-E-C102-9**

Equipment to be moved to Advanced Thermal Hydraulics Lab E-F116:

TAG	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
Room E-F117 Equipment					
A1-1	SC-1 Gun System	2'-7" x 2'-7" x 5'-10"	Y-12 9204-1 Mezzanine Lab Room B	SK E-F116-2	SK E-F116-10
A1-2	SC-1 Shield	9' x 3' x 9'	Y-12 9204-1 Mezzanine Lab Room B	SK E-F116-2	SK E-F116-10
A1-3	SC-1 Target	1'-6" x 4' x 4'-8"	Y-12 9204-1 Mezzanine Lab Room B	SK E-F116-2	SK E-F116-10
A1-4	HEPA Filter System	2'-9" x 2'-1" x 8"	Y-12 9204-1 Mezzanine Lab Room B	SK E-F116-3	SK E-F116-10
A1-5	Table Top Drill Press	2' x 2' x 3'	Y-12 9204-1 Mezzanine Lab Room B	NA	SK E-F116-10
Room E-F118 Equipment					
A2-1	SETS	5' x 4' x 10'	Y-12 9204-1 Mezzanine Lab Room A	SK E-F116-4	SK E-F116-10
A2-2	Portable Heater	4' x 4'-7" x 6'-8"	Y-12 9204-1 Mezzanine Lab Room A	SK E-F116-4	SK E-F116-10
A2-3	Control Box	1'-10" x 2'-3" x 7'-2"	Y-12 9204-1 Mezzanine Lab Room A	SK E-F116-4	SK E-F116-10
A2-5	Var. Thrust Gun System (total of 2 systems)	2' x 4' x 5' (each)	Y-12 9204-1 Mezzanine Lab Room A	SK E-F116-5	SK E-F116-10
A2-6	Gun Target	1'-6" x 4' x 4'-8"	Y-12 9204-1 Mezzanine Lab Room A	SK E-F116-5	SK E-F116-10
A2-7	Classified Safe (Empty)	1'-9" x 2'-4" x 2'-4"	Y-12 9204-1 Mezzanine Lab Room A	SK E-F116-3	SK E-F116-10
A2-8	OICW Chamber & Rail	2' x 4' x 5'	Y-12 9204-1 Mezzanine	SK E-F116-6	SK E-F116-10
A2-9	Steel Shield	9' x 1' x 9'	Y-12 9204-1 Mezzanine	SK E-F116-6	SK E-F116-10
A2-10	Flammable Storage Cabinet	3'-7" x 1'-7" x 5'-6"	Y-12 9204-1 Mezzanine Lab Room A	SK E-F116-4	SK E-F116-10
Room E-F116 Equipment					
A3-1	Microwave Oven	1'-10" x 1'-4" x 1'	Y-12 9204-1 Mezzanine Lab Room A	NA	SK E-F116-10
A3-2	Freezer	2'-10" x 2'-6" x 5'-6"	Y-12 9204-1 Mezzanine	SK E-F116-6	SK E-F116-10
A3-3	Refrigerator	2'-10" x 2'-6" x 5'-6"	Y-12 9204-1 Ground Floor Col N37	SK E-F116-9	SK E-F116-10
A3-4	Neutron Generator N-550 (2 sections)	2'-1" x 1'-8" x 1'-3", 2' x 2' x 1'	Y-12 9204-1 Ground Floor Col N37	SK E-F116-7	SK E-F116-10
A3-5	Freezer for Neutron Generator	2' x 2' x 3'	Y-12 9204-1 Ground Floor Col N37	SK E-F116-7	SK E-F116-10
A3-6	Instrument Racks	1'-10" x 2'-3" x 6'-6"	Y-12 9204-1 Ground Floor Col N37	SK E-F116-8	SK E-F116-10
A3-7	Electric Oven 3-550	1'-4" x 1'-4" x 1'-4"	Y-12 9204-1 Mezzanine Lab Room A	SK E-F116-3	SK E-F116-10
A3-8	Spinner System	2' x 2' x 4'	Y-12 9204-1 Ground Floor Col N37	SK E-F116-8	SK E-F116-10
A3-9	Ultrasonic Processor - Sonicator	2' x 2' x 1'	Y-12 9204-1 Ground Floor Col N37	SK E-F116-8	SK E-F116-10
A3-10	Tool Box	2'-3" x 1' x 3'-8"	Y-12 9204-1 Ground Floor Col N37	NA	SK E-F116-10
A3-12	Flammable Storage Cabinet	3'-7" x 1'-7" x 5'-6"	Y-12 9204-1 Ground Floor Col N37	SK E-F116-8	SK E-F116-10
A3-13	Optical Table (Top Only)	5' x 2' x 4"	Y-12 9204-1 Ground Floor Col N37	SK E-F116-7	SK E-F116-10
A3-15	Wall Mounted Eyewash				
A3-16	Beckmann L55000TD				
EQUIPMENT FROM DIAMOND TURNING LAB					
D1	Granite Table	4' x 6' x 30"	Y-12 9201-3, Room 245D	SK E-F116-9	SK E-F116-10
D2	Tool Storage Cabinet w/Drawers & Craftsman Tool Box	28" x 30" x 48", 28" x 18" x 24"	Y-12 9201-3, Room 245D	SK E-F116-9	SK E-F116-10
D3	7 Glass Front Cabinets	48" x 18" x 84"	Y-12 9201-3, Rm 245C, Rm 245D, & High Bay	SK E-F116-9	SK E-F116-10
D4	Flammable Storage Cabinet	44" x 18" x 66"	Y-12 9201-3, High Bay	SK E-F116-9	SK E-F116-10

ADVANCED THERMAL HYDRAULICS LABORATORY E-F116, E-F117 AND E-F118 MOVE PACKAGE

ADVANCED THERMAL HYDRAULICS LAB E-F116, E-F117, AND E-F118 DRAWING INDEX

Drawing No.	Title
SK E-F116-1	Drawing Index and Equipment List
SK E-F116-2	Advanced Thermal Hydraulics Lab Disassembly Drawing No. 1
SK E-F116-3	Advanced Thermal Hydraulics Lab Disassembly Drawing No. 2
SK E-F116-4	Advanced Thermal Hydraulics Lab Disassembly Drawing No. 3
SK E-F116-5	Advanced Thermal Hydraulics Lab Disassembly Drawing No. 4
SK E-F116-6	Advanced Thermal Hydraulics Lab Disassembly Drawing No. 5
SK E-F116-7	Advanced Thermal Hydraulics Lab Disassembly Drawing No. 6
SK E-F116-8	Advanced Thermal Hydraulics Lab Disassembly Drawing No. 7
SK E-F116-9	Advanced Thermal Hydraulics Lab Disassembly Drawing No. 8
SK E-F116-10	Advanced Thermal Hydraulics Lab Installation Drawing

NOTES:

1. Seoko Kim (574-0314) will field direct the connection of equipment being moved to the Advanced Thermal Hydraulics Lab E-F116, E-F117 and E-F118.
2. Use ETF room suffix for all equipment tags (E-F116, E-F117 and E-F118)
3. ESTD will package all loose equipment and will label all equipment and boxes to be moved.
4. ESTD will provide all safety support (IH, H&S, etc.) required for the move. ESTD will provide HP surveys or use process knowledge to obtain any required green tags for equipment to be moved to ETF.
5. ESTD will remove all interconnecting wiring between lab equipment prior to the move and will reconnect this wiring after the move.
6. Equipment lined through or X'd out has been removed from the original scope of the move.
7. Electronic lab equipment is very sensitive and care must be given to ensure that physical shock or vibration to the equipment is minimized.

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	Added Equipment from Diamond Turning Lab			
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1064, E1069 AND E1071

SHEET TITLE

ADVANCED THERMAL HYDRAULICS LABORATORY E-F116, E-F117 AND E-F118 DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-F116-1**

1

A1-3 SC-1 TARGET AND SAND BAGS

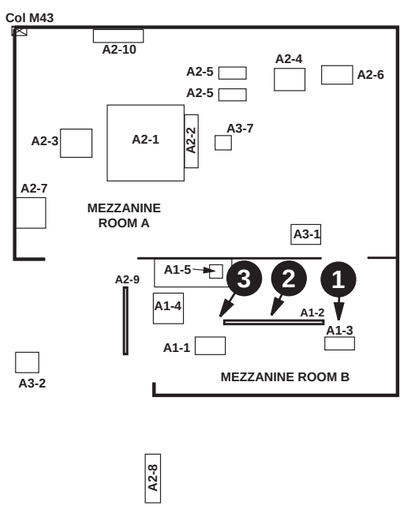
2

A1-2 SC-1 SHIELD

3

A1-1 SC-1 GUN SYSTEM

1. DISCONNECT ELECTRICAL POWER.



ADVANCED THERMAL HYDRAULICS LABORATORY
Y-12 BUILDING 9204-1

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	Added Equipment from Diamond Turning Lab			
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

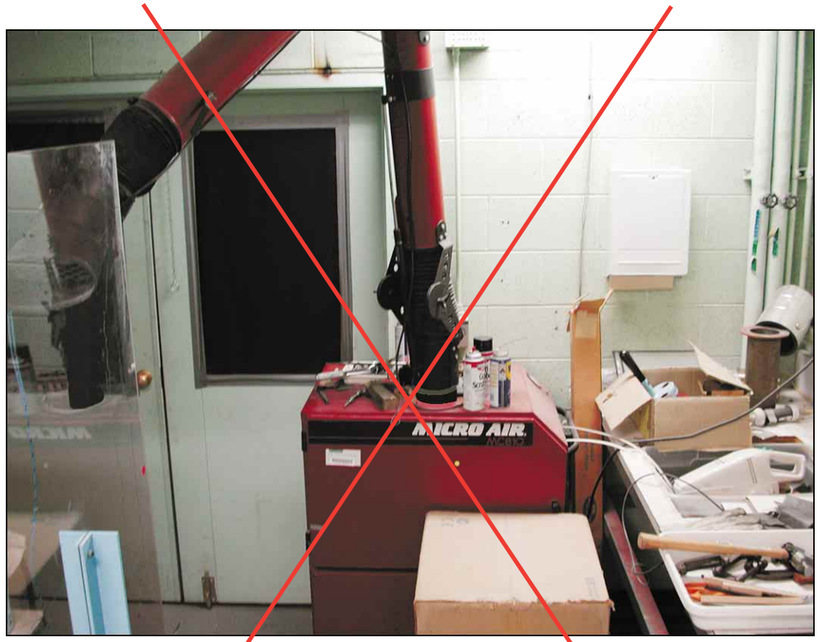
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1064, E1069 AND E1071

SHEET TITLE

ADVANCED THERMAL HYDRAULICS LABORATORY
E-F116, E-F117 AND E-F118
DISASSEMBLY DRAWING NO. 1

JOB NO PDC 0214
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-F116-2**



1

A1-4 HEPA FILTER SYSTEM

1. DISCONNECT ELECTRICAL POWER.

2

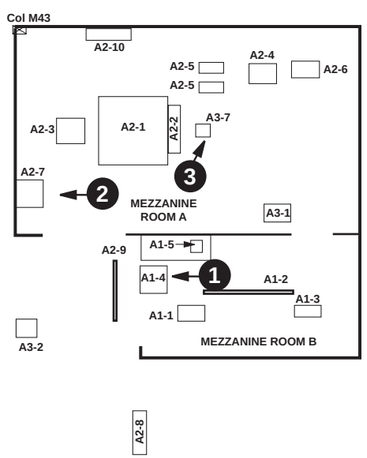
A2-7 CLASSIFIED SAFE

CONTENTS WILL BE MOVED BY ESTD PRIOR TO MOVE

3

A3-7 ELECTRIC OVEN

1. DISCONNECT ELECTRICAL POWER.



ADVANCED THERMAL HYDRAULICS LABORATORY
Y-12 BUILDING 9204-1

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	Added Equipment from Diamond Turning Lab			
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1064, E1069 AND E1071

SHEET TITLE

ADVANCED THERMAL HYDRAULICS LABORATORY
E-F116, E-F117 AND E-F118
DISASSEMBLY DRAWING NO. 2

JOB NO PDC 0214

DATE 10/13/03

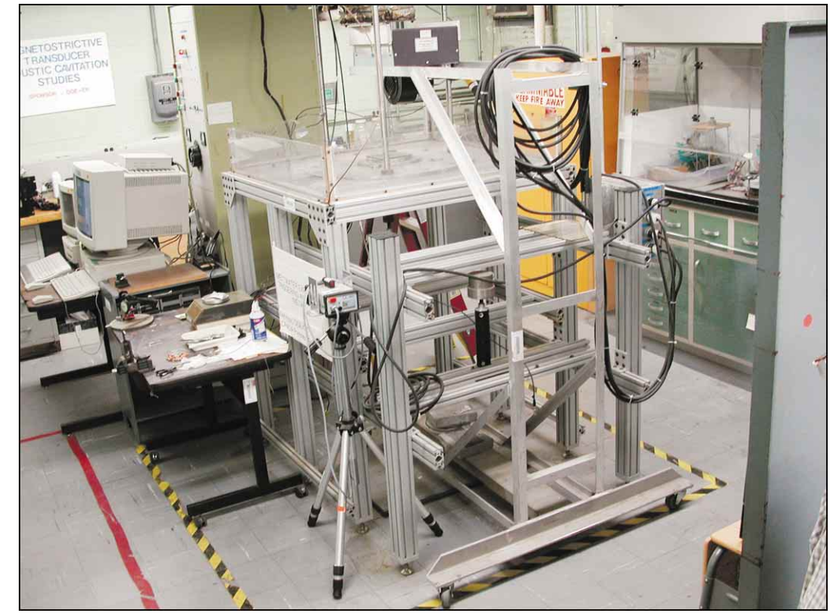
REV NO 3

SCALE NONE

DWG NO **SK-E-F116-3**

1

2



3

A2-3 CONTROL BOX FOR SETS

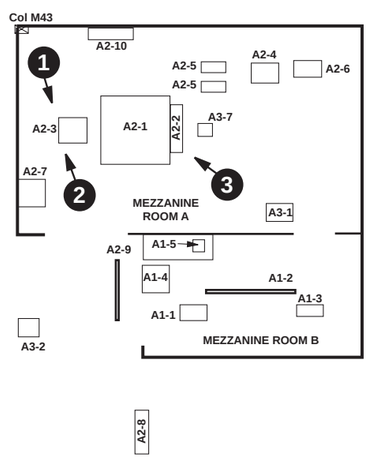
1. DISCONNECT ELECTRICAL POWER.

2 TAG AND DISCONNECT INSTRUMENTATION AND CONTROL WIRING BETWEEN CONTROL BOX AND SETS.

A2-1 SETS
A2-2 PORTABLE HEATER
A2-10 FLAMABLE STORAGE CABINET

1. DISCONNECT ELECTRICAL POWER.

2 DISCONNECT COMPRESSED AIR.



ADVANCED THERMAL HYDRAULICS LABORATORY
Y-12 BUILDING 9204-1

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	Added Equipment from Diamond Turning Lab			
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

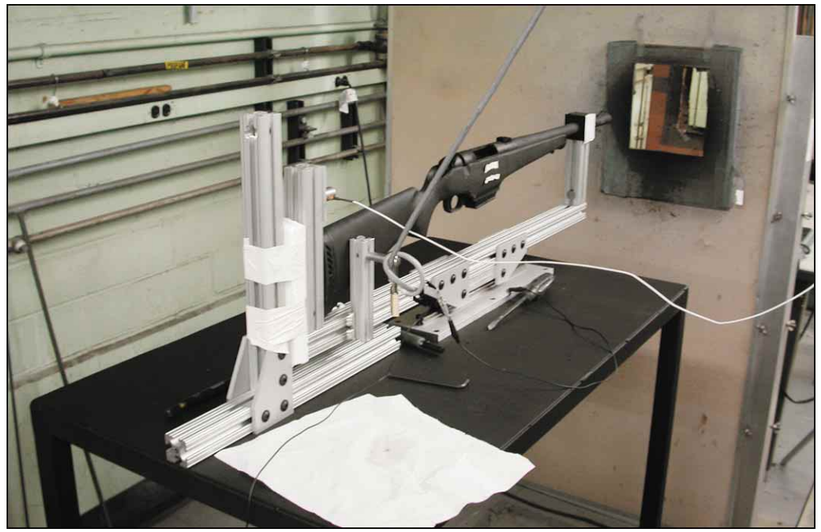
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1064, E1069 AND E1071

SHEET TITLE

ADVANCED THERMAL HYDRAULICS LABORATORY
E-F116, E-F117 AND E-F118
DISASSEMBLY DRAWING NO. 3

JOB NO PDC 0214
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-F116-4**



1

2

A2-5 VARIABLE THRUST GUN SYSTEMS

1. DISCONNECT ELECTRICAL POWER.

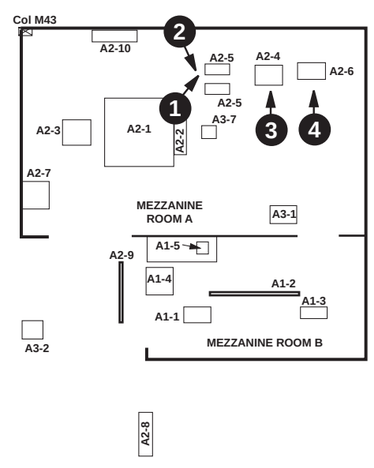
3

A2-4 CHRONOMETER SYSTEM

1. DISCONNECT ELECTRICAL POWER.

4

A2-6 GUN TARGET



ADVANCED THERMAL HYDRAULICS LABORATORY
Y-12 BUILDING 9204-1

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	Added Equipment from Diamond Turning Lab			
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1064, E1069 AND E1071

SHEET TITLE

ADVANCED THERMAL HYDRAULICS LABORATORY
E-F116, E-F117 AND E-F118
DISASSEMBLY DRAWING NO. 4

JOB NO PDC 0214

DATE 10/13/03

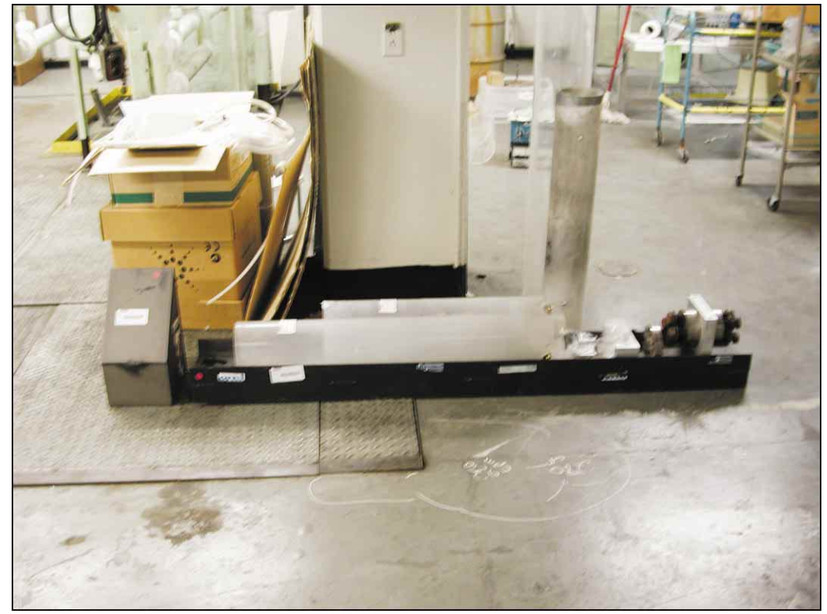
REV NO 3

SCALE NONE

DWG NO **SK-E-F116-5**

1

A2-9 STEEL SHIELD



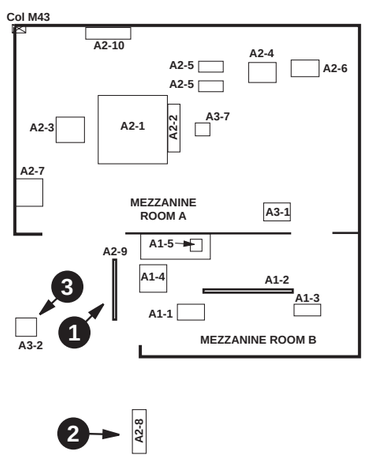
2

A2-8 OICW CHAMBER AND RAIL

3

A3-2 FREEZER

1. DISCONNECT ELECTRICAL POWER.



ADVANCED THERMAL HYDRAULICS LABORATORY
Y-12 BUILDING 9204-1

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	Added Equipment from Diamond Turning Lab			
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1064, E1069 AND E1071

SHEET TITLE

ADVANCED THERMAL HYDRAULICS LABORATORY
E-F116, E-F117 AND E-F118
DISASSEMBLY DRAWING NO. 5

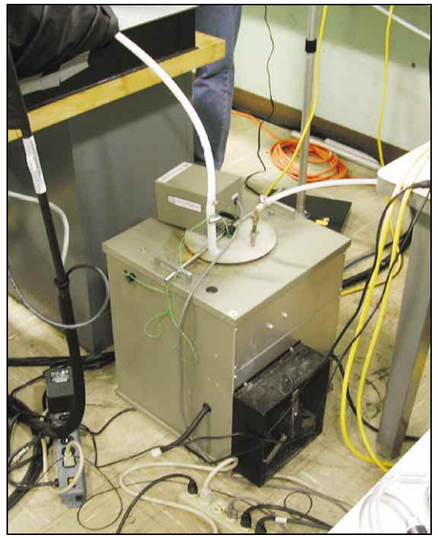
JOB NO PDC 0214
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-F116-6**

1

A3-4 NEUTRON GENERATOR
A3-13 OPTICAL TABLE

1. DISCONNECT ELECTRICAL POWER.

NOTE: CONTAINS NEUTRON SOURCE



2

A3-5 FREEZER FOR NEUTRON GENERATOR

1. DISCONNECT ELECTRICAL POWER.
2. TAG AND DISCONNECT TUBING BETWEEN FREEZER AND GENERATOR.

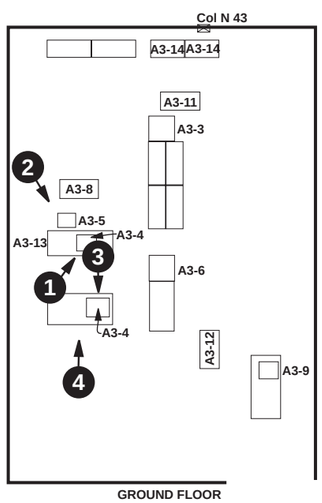
3

A3-4 CONTROLS FOR NEUTRON GENERATOR

1. DISCONNECT ELECTRICAL POWER.
2. TAG AND DISCONNECT ELECTRICAL CIRCUITS TO GENERATOR.

4

GROUND FLOOR LAB



GROUND FLOOR

ADVANCED THERMAL HYDRAULICS LABORATORY
Y-12 BUILDING 9204-1

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	Added Equipment from Diamond Turning Lab			
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1064, E1069 AND E1071

SHEET TITLE

ADVANCED THERMAL HYDRAULICS LABORATORY
E-F116, E-F117 AND E-F118
DISASSEMBLY DRAWING NO. 6

JOB NO PDC 0214
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-F116-7**

1

A3-6 INSTRUMENT RACKS
A3-12 FLAMMABLE STORAGE CABINET

1. DISCONNECT ELECTRICAL POWER.
2. TAG AND REMOVE ELECTRICAL WIRING.

2

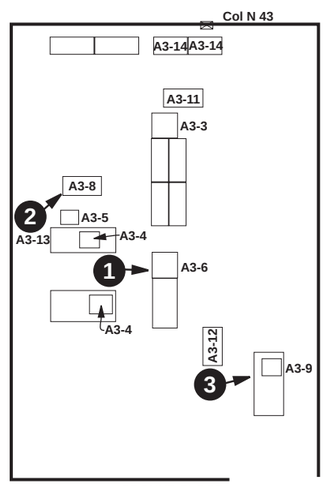
A3-8 SPINNER SYSTEM

1. DISCONNECT ELECTRICAL POWER.

3

A3-9 ULTRASONIC PROCESSOR

1. DISCONNECT ELECTRICAL POWER.



GROUND FLOOR
ADVANCED THERMAL HYDRAULICS LABORATORY
Y-12 BUILDING 9204-1

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	Added Equipment from Diamond Turning Lab			
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: E1064, E1069 AND E1071

SHEET TITLE

ADVANCED THERMAL HYDRAULICS LABORATORY
E-F116, E-F117 AND E-F118
DISASSEMBLY DRAWING NO. 7

JOB NO PDC 0214	DATE 10/13/03
	REV NO 3
SCALE NONE	DWG NO **SK-E-F116-8**

1

D1 GRANITE TABLE

2

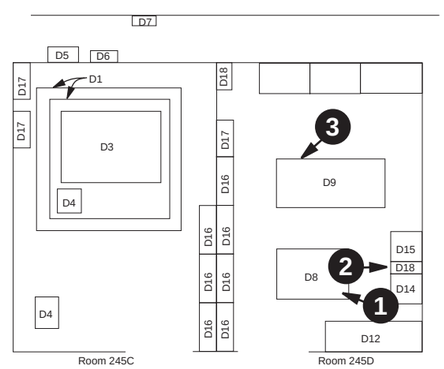
D2 STORAGE CABINET W/DRAWERS AND CRAFTSMAN TOOL BOX

3

D3 GLASS FRONT CABINETS

4

D4 FLAMMABLE STORAGE CABINET



DIAMOND TURNING LABORATORY
Y-12 BUILDING 9201-3

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	Added Equipment from Diamond Turning Lab			
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

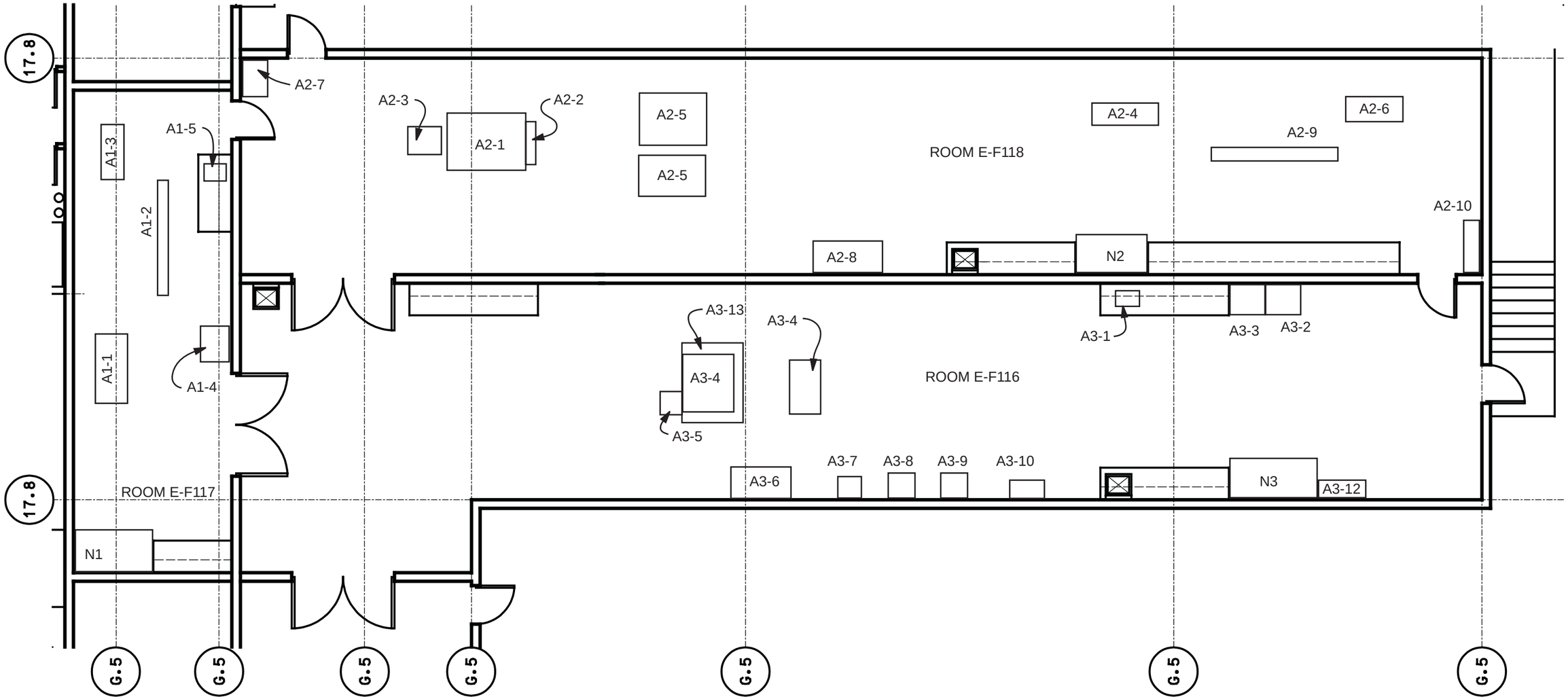
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1064, E1069 AND E1071

SHEET TITLE

ADVANCED THERMAL HYDRAULICS LABORATORY
E-F116, E-F117 AND E-F118
DISASSEMBLY DRAWING NO. 8

JOB NO PDC 0214
DATE 10/13/03
REV NO 3
SCALE NONE
DWG NO **SK-E-F116-9**



NOTE:
ADD JOE CUNNINGHAM'S TOOL BOXES, GRANITE TABLE, FLAMMABLE STORAGE CABINET AND GLASS FRONT CABINETS FROM DIAMOND TURNING LAB AT Y-12. (SEE SK-E-F116-9).

NO	DATE	REVISION	BY	CK	APPR
3	10/13/03	Added Equipment from Diamond Turning Lab			
2	06/16/03	Added New Room Number			
1	03/17/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1064, E1069 AND E1071

SHEET TITLE

ADVANCED THERMAL HYDRAULICS LABORATORY
E-F116, E-F117 AND E-F118
INSTALLATION DRAWING NO. 1

JOB NO PDC 0214
DATE 10/13/03
REV NO 3
SCALE 1/8"=1'-0"
DWG NO **SK-E-F116-10**

Equipment to be moved to ESTD Lab E-B103:

TAG E-B103-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
1	Helium Leak Detector	On Cart	Bldg 3500, Rm 22	SK E-B103-2	SK E-B103-3
2	Work Bench	30” x 96” x 32”	Bldg 3500, Rm 22	SK E-B103-2	SK E-B103-3
3	Pulse Power Coil		Already moved	SK E-B103-2	SK E-B103-3
4	Optical Table	48” x 96”	Bldg 5500, High Bay	SK E-B103-2	SK E-B103-3
5	Optical Table	48” x 96”	Bldg 5500, High Bay	SK E-B103-2	SK E-B103-3
6	Optical Table	48” x 96”	NTRC, RM L116	SK E-B103-2	SK E-B103-3
7	Boxes and Misc Small Equipment		Diamond Turning Lab in 9201-3	SK E-B103-2	SK E-B103-3

ESTD LAB E-B103 DRAWING INDEX

Drawing No.	Title
SK E-B103-1	Drawing Index and Equipment List
SK E-B103-2	ESTD Lab Disassembly Drawing
SK E-B103-3	ESTD Lab Installation Drawing

NOTES:

1. USE E-B103 SUFFIX FOR ALL EQUIPMENT TAGS.
2. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
3. ESTD WILL PROVIDE ALL SAFETY SUPPORT (IH, H&S, ETC.) REQUIRED FOR THE MOVE. ESTD WILL PROVIDE HP SURVEYS OR USE PROCESS KNOWLEDGE TO OBTAIN ANY REQUIRED GREEN TAGS FOR EQUIPMENT TO BE MOVED TO ETF.
4. ESTD WILL REMOVE ALL INTERCONNECTING WIRING BETWEEN LAB EQUIPMENT PRIOR TO THE MOVE AND WILL RECONNECT THIS WIRING AFTER THE MOVE.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

ESTD LAB E-B103

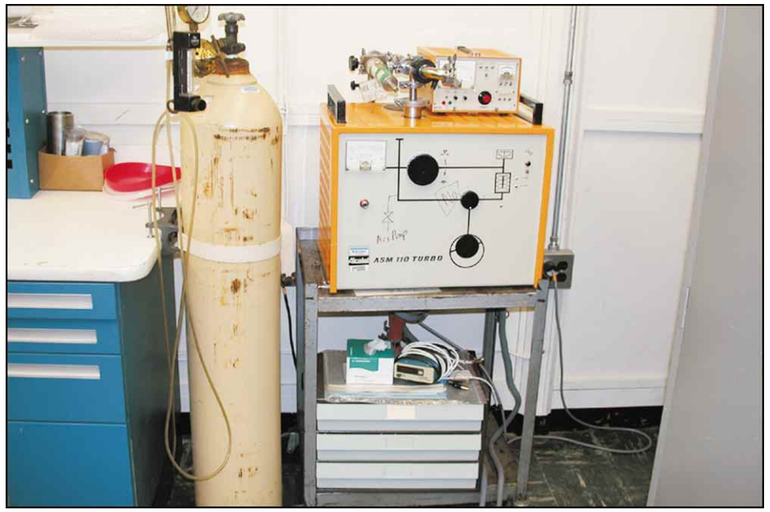
JOB NO 0214-00001

DATE 09/04/03

REV NO 0

SCALE NONE

DWG NO **SK-E-B103-1**

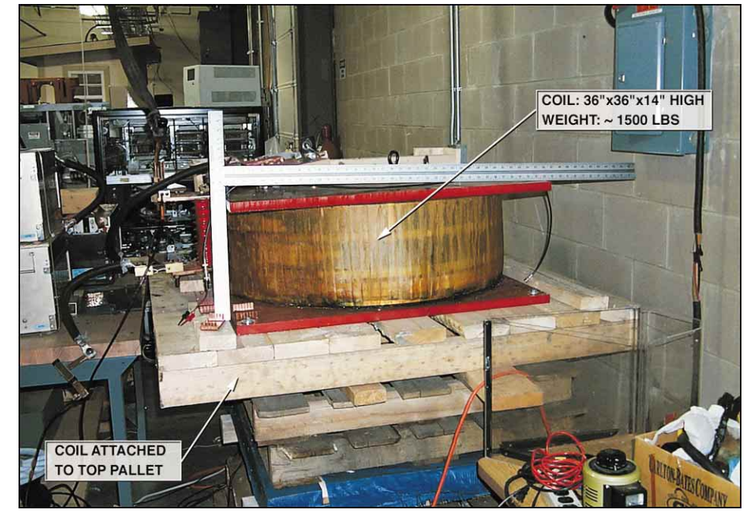


1

HELIUM LEAK DETECTOR
MOVE FROM BUILDING 3500, ROOM 22

2

WORK BENCH
MOVE FROM BUILDING 3500, ROOM 22



3

PULSE POWER COIL
(ALREADY MOVED)

4

NO PICTURE AVAILABLE
OPTICAL TABLE 48" X 96"
MOVE FROM BUILDING 5500, HIGH BAY

5

NO PICTURE AVAILABLE
OPTICAL TABLE 48" X 96"
MOVE FROM BUILDING 5500, HIGH BAY

6

OPTICAL TABLE
TABLE IS 48" X 96" X 36" AND WEIGHS APPROXIMATELY 800 POUNDS. MOVE FROM NTRC, ROOM L116.

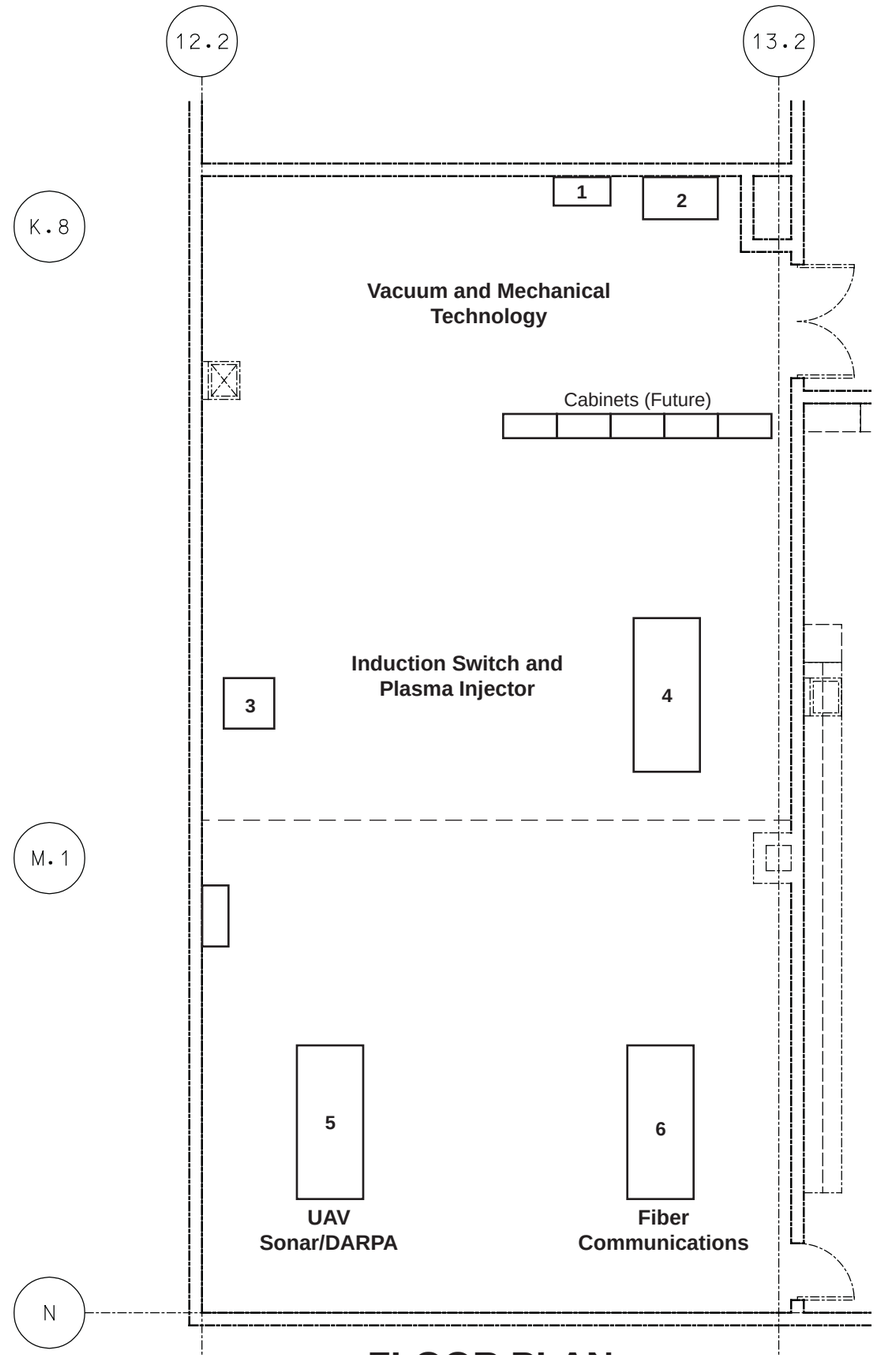
BUILDING 3500, ROOM 22
VACUUM LAB
CHUCK SCHAICH

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

ESTD LAB E-B103

JOB NO	DATE	09/04/03
0214-00001	REV NO	0
SCALE	DWG NO	
NONE		**SK-E-B103-2**



FLOOR PLAN

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ESTD LAB E-B103

JOB NO	PDC 0214	DATE	09/04/03
		REV NO	0
SCALE	1/8"=1'-0"	DWG NO	**SK-E-B103-3**

Equipment to be moved to Hybrid Lighting Lab E-D210:

TAG E-D210-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
HL1	Solar Collector	48” x 48” x 48”	~~Room 201~~ NTRC Roof	SK E-D210-2 & 5	SK E-D210-7
HL2	Optical Table 800#	48” x 96” x 36”	Room 201 NTRC	SK E-D210-2	SK E-D210-7
HL3	Integrating Sphere	36” x 24” x 32”	Room 201 NTRC	SK E-D210-2	SK E-D210-7
HL4	Optical Table 400#	36” x 60” x 36”	Room 201 NTRC	SK E-D210-2	SK E-D210-7
HL5	Lighting Test Chamber	78” x 78” x 78”	Room 201 NTRC	SK E-D210-2	SK E-D210-7
HL6	~~Collectors~~ Rack	~~48” x 48” x 24”~~ 72” x 30” x 72”	Room 201 NTRC	SK E-D210-2	SK E-D210-7
HL7	Tool Chest	18” x 30” x 48”	Room 201 NTRC	SK E-D210-3	SK E-D210-7
HL8	Light Fixtures	24” x 48” x 6”	Room 201 NTRC	SK E-D210-3	SK E-D210-7
HL9	Optical Fibers/Holding Rack	96” x 12” x 48”	Room 201 NTRC	SK E-D210-3	SK E-D210-7
HL10	Storage Cabinets (2)	18” x 36” x 72”	Room 201 NTRC	SK E-D210-4	SK E-D210-7
HL11	Work Station	70” x 96” x 60”	Room 201 NTRC	SK E-D210-4	SK E-D210-7
~~HL12~~	~~Bookcase~~	~~18” x 36” x 48”~~	~~Room 201 NTRC~~	~~SK E-D210-4~~	~~SK E-D210-7~~
~~HL13~~	~~Bookcase~~	~~16” x 48” x 60”~~	~~Room 201 NTRC~~	~~SK E-D210-4~~	~~SK E-D210-7~~
HL14	Miscellaneous	150 cu ft	Room 201 NTRC in Cabinets		
HL15	Solar Shades	48” x 48” x 8”	Room 111 NTRC	SK E-D210-5	SK E-D210-7
HL16	Bollards	8” x 8” x 48”	~~Room 111~~ NTRC Roof	SK E-D210-5	SK E-D210-7
HL17	Drive Over Cord Protectors	24” x 48” x 12”	Room 111 NTRC	SK E-D210-5	SK E-D210-7
HL18	Crates (3-4)	66” x 66” x 20”	Room 111 NTRC	SK E-D210-5	SK E-D210-7
HL19	Tracking Solar Collection Frame	96” x 96” x 60”	~~Outside~~ NTRC High Bay	SK E-D210-6	
HL20	Miscellaneous Storage	96” x 120” x 36”	Room ~~107~~ I07 NTRC	SK E-D210-6	SK E-D210-7
HL21	Light Source	24” x 60” x 48”	Room I07 NTRC	SK E-D210-6	SK E-D210-7
HL22	Bookcase	36” x 12” x 72”	Room 201 NTRC	SK E-D210-4	SK E-D210-7
HL23	Weight-in-Motion Equipment	60” x 60” x 36”	NTRC High Bay	SK E-D210-5	SK E-D210-7
HL24	Hall Display	72” x 24” x 72”	Outside Room 201 NTRC	SK E-D210-3	SK E-D210-7
GENERAL					
NEW EQUIPMENT					
N1	Fume Hood	36” x 72” Bench type w/cabinets			

HYBRID LIGHTING LAB E-D210 DRAWING INDEX

Drawing No.	Title
SK E-D210-1	Drawing Index and Equipment List
SK E-D210-2	Hybrid Lighting Lab Disassembly Drawing No. 1
SK E-D210-3	Hybrid Lighting Lab Disassembly Drawing No. 2
SK E-D210-4	Hybrid Lighting Lab Disassembly Drawing No. 3
SK E-D210-5	Hybrid Lighting Lab Disassembly Drawing No. 4
SK E-D210-6	Hybrid Lighting Lab Disassembly Drawing No. 5
SK E-D210-7	Hybrid Lighting Lab Installation Drawing

NOTES:
1. David Beshears (946-1288) will field direct the connection of equipment being moved to the Hybrid Lighting Lab E-D210.
2. Use E-D210 Suffix for all equipment tags.
3. ESTD will package all loose equipment and will label all equipment and boxes to be moved.
4. ESTD will provide all safety support (IH, H&S, etc.) required for the move. ESTD will provide HP surveys or use process knowledge to obtain any required green tags for equipment to be moved to ETF.
5. ESTD will remove all interconnecting wiring between lab equipment prior to the move and will reconnect this wiring after the move.
6. Equipment lined through or X’d out has been removed from the original scope of the move.
7. Electronic lab equipment is very sensitive and care must be given to ensure that physical shock or vibration to the equipment is minimized.

HYBRID LIGHTING LABORATORY E-D210
MOVE PACKAGE

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2084

SHEET TITLE
HYBRID LIGHTING LABORATORY E-D210
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D210-1**

1

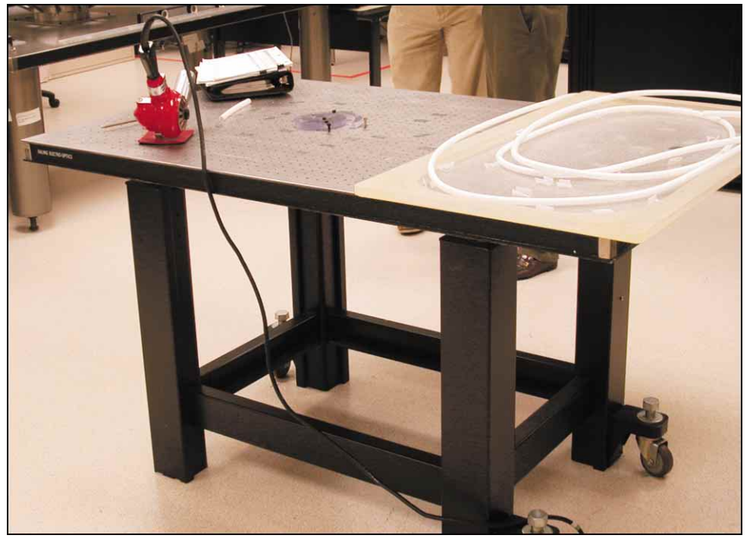
HL1 SOLAR COLLECTOR (NOW ON ROOF)

1. **CAUTION:** HANDLE SOLAR COLLECTOR WITH CARE TO AVOID DAMAGE TO COLLECTOR.

HL2 OPTICAL TABLE

1. TABLE WEIGHT IS APPROXIMATELY 800 POUNDS.

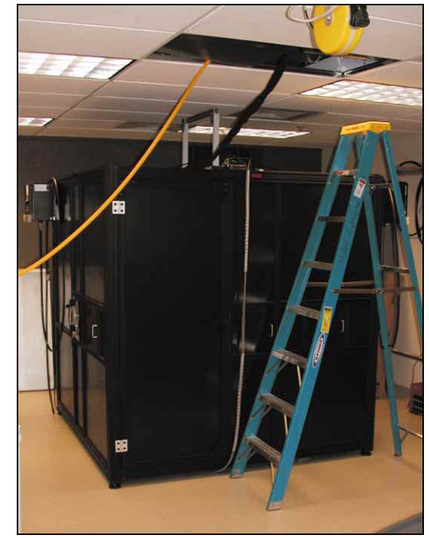
HL3 INTEGRATING SPHERE



2

HL4 OPTICAL TABLE

1. TABLE WEIGHT IS APPROXIMATELY 400 POUNDS.



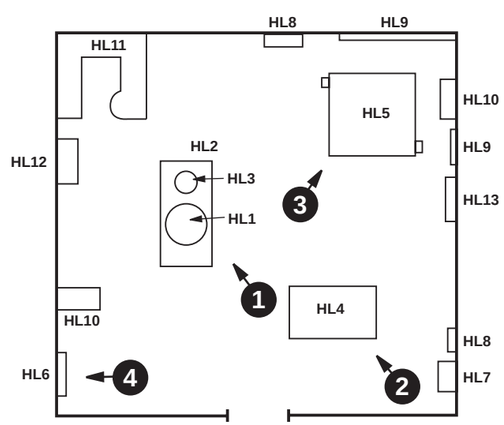
3

HL5 LIGHTING TEST CHAMBER

1. DISCONNECT ELECTRICAL POWER.
2. DISCONNECT INSTRUMENTATION WIRING.
3. ~~DISASSEMBLE HOUSING.~~ CHAMBER TO BE DISASSEMBLED, MOVED AND REASSEMBLED BY VENDOR.

4

HL6 RACK



ROOM 201, NTRC

NOTES:

1. USE SUFFIX E-D210 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2084

SHEET TITLE

HYBRID LIGHTING LABORATORY E-D210 DISASSEMBLY DRAWING NO. 1

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D210-2**

1

HL7 TOOL CHEST

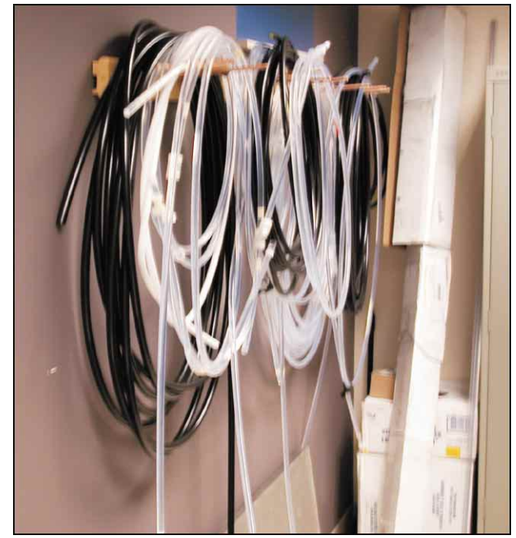
2

HL8 LIGHT FIXTURES

3

HL8 LIGHT FIXTURES

1. FOUR FIXTURES MOUNTED IN CEILING OF ROOM 201.



4

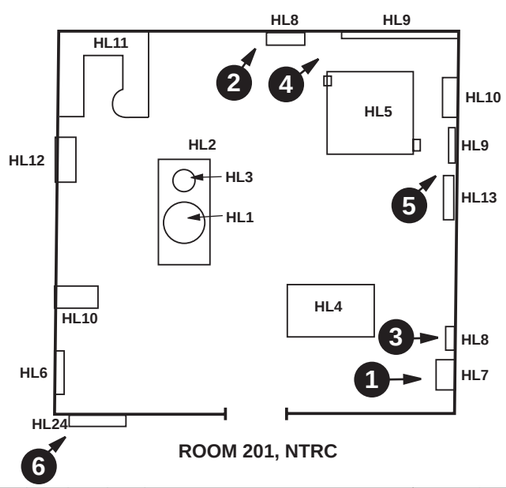
HL9 OPTICAL FIBERS/HOLDING RACK

5

HL9 OPTICAL FIBERS/ HOLDING RACK

6

HL24 HALL DISPLAY



ROOM 201, NTRC

NOTES:

1. USE SUFFIX E-D210 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2084

SHEET TITLE

HYBRID LIGHTING LABORATORY E-D210 DISASSEMBLY DRAWING NO. 2

JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE NONE

DWG NO **SK-E-D210-3**

1

HL7 STORAGE CABINET

2

HL7 STORAGE CABINET

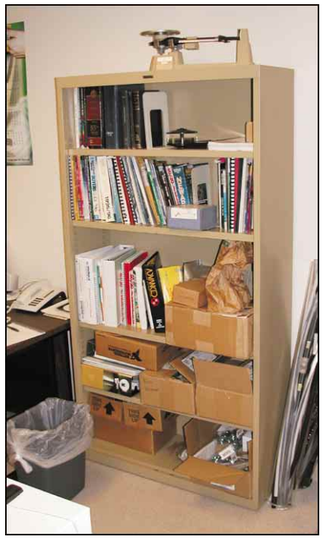
3

HL11 WORK STATION

~~HL12 BOOK CASE~~

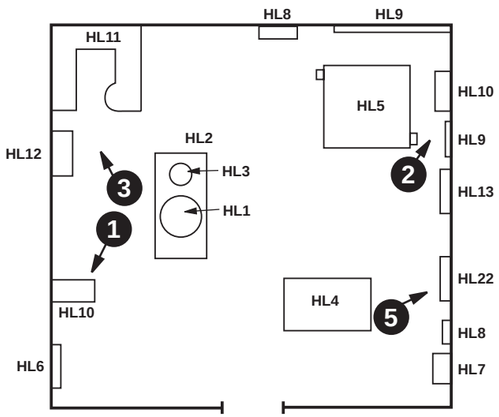
4

HL13 BOOK CASE



5

HL22 BOOK CASE



ROOM 201, NTRC

NOTES:

1. USE SUFFIX E-D210 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2084

SHEET TITLE

HYBRID LIGHTING LABORATORY E-D210
DISASSEMBLY DRAWING NO. 3

JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE NONE

DWG NO **SK-E-D210-4**

HL15 SOLAR COLLECTORS AND ASSEMBLY
HL16 BOLLARDS

1. CRANE WILL BE REQUIRED TO REMOVE FROM NTRC ROOF.

NTRC HIGH BAY

HL18 CRATES

HL23 WEIGHT-IN-MOTION EQUIPMENT

NTRC HIGH BAY

HL23 WEIGHT-IN-MOTION CONTROL AND MONITORING SYSTEM

HL17 DRIVE OVER CORD PROTECTORS

NOTES:

1. USE SUFFIX E-D210 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2084

SHEET TITLE

HYBRID LIGHTING LABORATORY E-D210 DISASSEMBLY DRAWING NO. 4

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D210-5**

1

HL19 TRACKING SOLAR COLLECTION FRAME

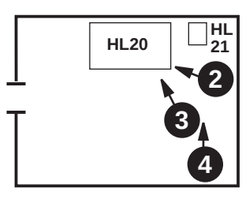
1. LOCATED IN HIGH BAY

2

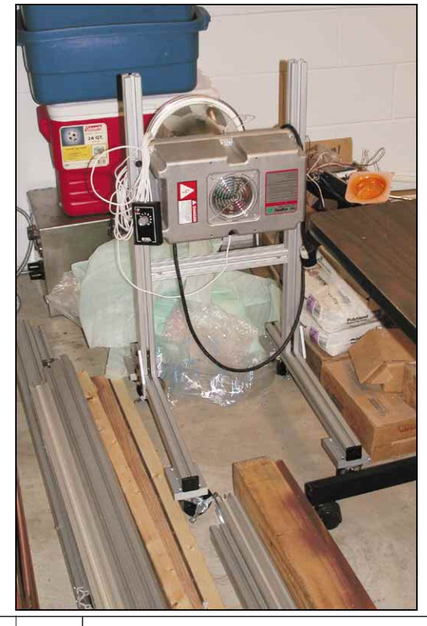
3

HL20 MISCELLANEOUS STORAGE

1. APPROXIMATELY 400 POUNDS.



ROOM I07, NTRC



4

HL21 LIGHT SOURCE

NOTES:

1. USE SUFFIX E-D210 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2084

SHEET TITLE

HYBRID LIGHTING LABORATORY E-D210 DISASSEMBLY DRAWING NO. 5

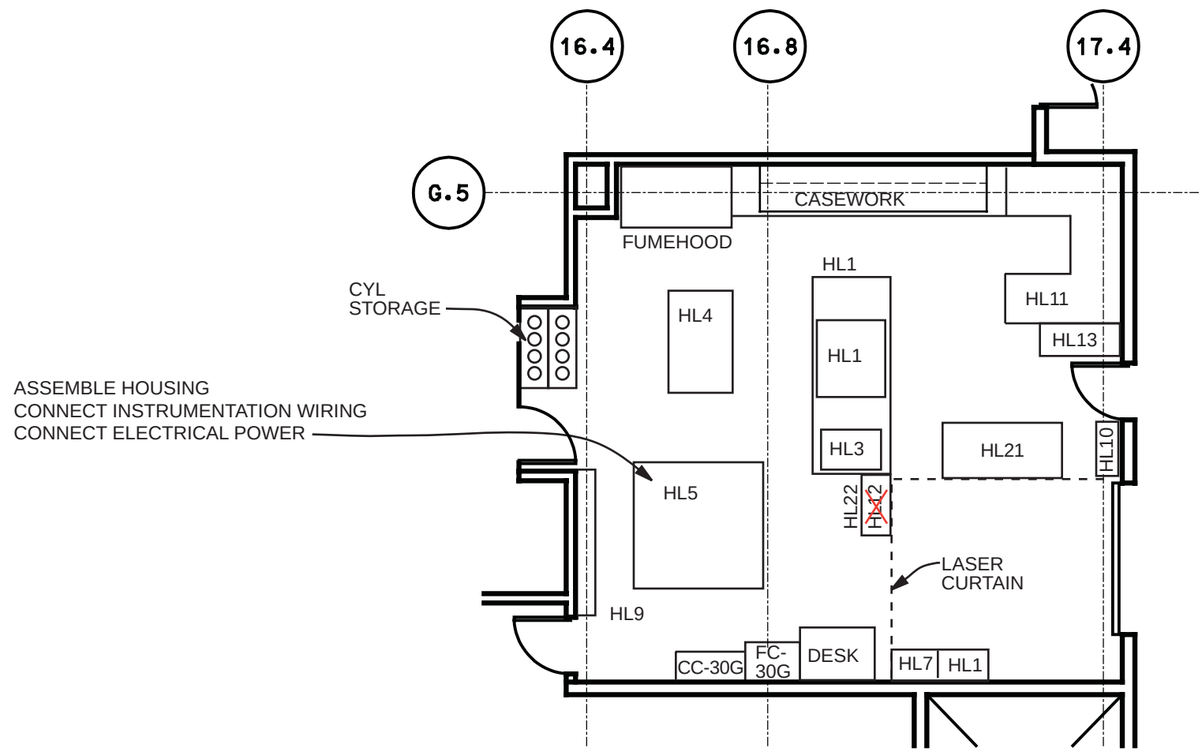
JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE NONE

DWG NO **SK-E-D210-6**



HYBRID LIGHTING LAB FLOOR PLAN

SCALE: 1/8" = 1'-0"

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2084

SHEET TITLE

HYBRID LIGHTING LABORATORY E-D210
INSTALLATION DRAWING NO. 1

JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE 1/8"=1'-0"

DWG NO **SK-E-D210-7**

Equipment to be moved to Photonics Lab E-D207:

TAG E-D207-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
Room 121, NTRC					
PL1	Optical Table 1500#	12’ x 5’ x 30”	Room 121 NTRC	SK-E-D207-2	SK-E-D207-10
PL2	Optical Table 400#	5’ x 3’ x 3’	Room 121 NTRC	SK-E-D207-2	SK-E-D207-10
PL3	Optical Table 300#	4’ x 3’ x 30”	Room 121 NTRC	SK-E-D207-2	SK-E-D207-10
PL4	Lab Work Bench	96” x 30” x 32”	Room 121 NTRC	SK-E-D207-2	SK-E-D207-10
PL5	Butcher Block Work Bench	72” x 36” x 30”	Room 121 NTRC	SK-E-D207-3	SK-E-D207-10
PL6	Laser 2 Pieces	36” x 12” x 6” 21” x 22” x 27” (PS)	Room 121 NTRC	SK-E-D207-3	SK-E-D207-10
PL7	Optical Test Equipment 20 each room	Varies	Room 121 NTRC	SK-E-D207-3	SK-E-D207-10
PL8	Oven	24” x 36” x 24”	Room 121 NTRC	SK-E-D207-3	SK-E-D207-10
PL9	Oven	18” x 16” x 12”	Room 121 NTRC	SK-E-D207-4	SK-E-D207-10
	Gas Cylinder Cabinet		Room 121 NTRC		
PL10	Cabinets w/Glass Doors (3)	16” x 48” x 84”	Room 121 NTRC	SK-E-D207-4	SK-E-D207-10
PL11	Fluormeter	60” x 30” x 48” (computer, etc.)	Room 121 NTRC	SK-E-D207-4	SK-E-D207-10
PL12	Cabinets (3)	16” x 48” x 84”	Room 121 NTRC	SK-E-D207-2	SK-E-D207-10
PL13	Storage Files (2)	30” x 30” x 48”	Room 121 NTRC	SK-E-D207-5	SK-E-D207-10
PL14	Tool Box	18” x 30” x 48”	Room 121 NTRC	SK-E-D207-5	SK-E-D207-10
PL15	Cabinets (3)	24” x 48” x 84”	Room 121 NTRC	SK-E-D207-5	SK-E-D207-10
PL16	PC/Work Station	36” x 60” x 30”	Room 121 NTRC	SK-E-D207-5	SK-E-D207-10
High Bay, NTRC					
PL17	Lateral Files (3)	18” x 36” x 52”	High Bay NTRC	SK-E-D207-6	SK-E-D207-10
PL18	Cabinets (9)	18” x 36” x 72”	High Bay NTRC	SK-E-D207-6	SK-E-D207-10
PL19	High Powered Laser (2 Pieces)	24” x 33” x 43” 18” x 60” x 12”	High Bay NTRC	SK-E-D207-6	SK-E-D207-10
PL20	High Powered Laser (2 Pieces)	23” x 33” x 24”	High Bay NTRC	SK-E-D207-6	SK-E-D207-10
PL20A	WIM System	24” x 36” x 42”	High Bay NTRC	SK-E-D207-6	SK-E-D207-10
PL20B	Ramps (4)	24” x 36” x 15”	High Bay NTRC	SK-E-D207-6	SK-E-D207-10

PHOTONICS LAB E-D207 DRAWING INDEX

Drawing No.	Title
SK-E-D207-1	Drawing Index and Equipment List
SK-E-D207-2	Photonics Labs Disassembly Drawing No. 1
SK-E-D207-3	Photonics Labs Disassembly Drawing No. 2
SK-E-D207-4	Photonics Labs Disassembly Drawing No. 3
SK-E-D207-5	Photonics Labs Disassembly Drawing No. 4
SK-E-D207-6	Photonics Labs Disassembly Drawing No. 5
SK-E-D207-7	Photonics Labs Installation Drawing

NOTES:

1. DAVID BESHEARS (946-1288) WILL FIELD DIRECT THE CONNECTION OF EQUIPMENT BEING MOVED TO THE PHOTONICS LAB E-D207.
2. USE ETF ROOM SUFFIX FOR ALL EQUIPMENT TAGS (E-D207).
3. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
4. ESTD WILL PROVIDE ALL SAFETY SUPPORT (IH, H&S, ETC.) REQUIRED FOR THE MOVE. ESTD WILL PROVIDE HP SURVEYS OR USE PROCESS KNOWLEDGE TO OBTAIN ANY REQUIRED GREEN TAGS FOR EQUIPMENT TO BE MOVED TO ETF.
5. ESTD WILL REMOVE ALL INTERCONNECTING WIRING BETWEEN LAB EQUIPMENT PRIOR TO THE MOVE AND WILL RECONNECT THIS WIRING AFTER THE MOVE.
6. ELECTRONIC LAB EQUIPMENT IS VERY SENSITIVE AND CARE MUST BE GIVEN TO ENSURE THAT PHYSICAL SHOCK OR VIBRATION TO THE EQUIPMENT IS MINIMIZED.

PHOTONICS LABORATORY E-D207
MOVE PACKAGE

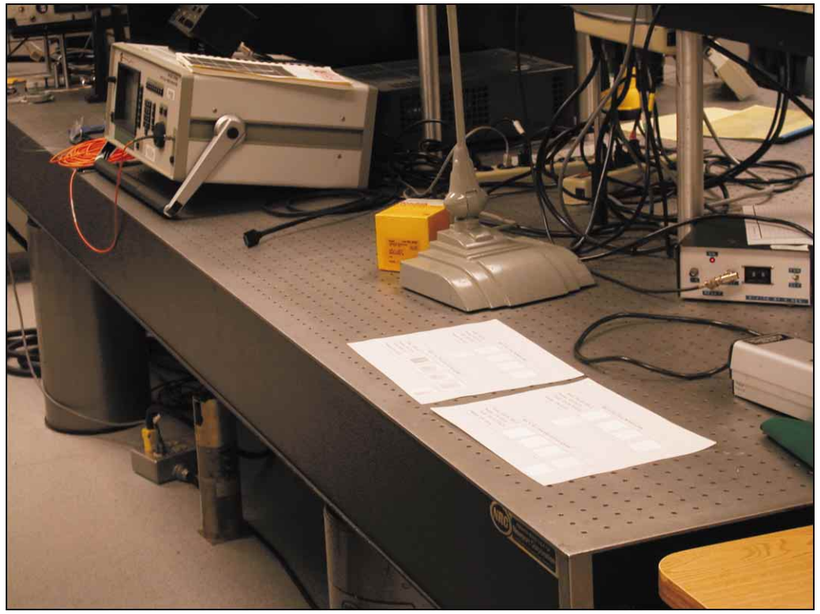
NO	DATE	REVISION	BY	CK	APPR
4	09/04/03	Revised per Client Comments			
3	09/04/03	Move Scope Reduced			
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2079

SHEET TITLE
PHOTONICS LABORATORY E-D207
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 09/04/03
REV NO 4
SCALE NONE
DWG NO **SK-E-D207-1**



1

PL1 - OPTICAL TABLE

1. TABLE WEIGHS APPROXIMATELY 1500 POUNDS.

2

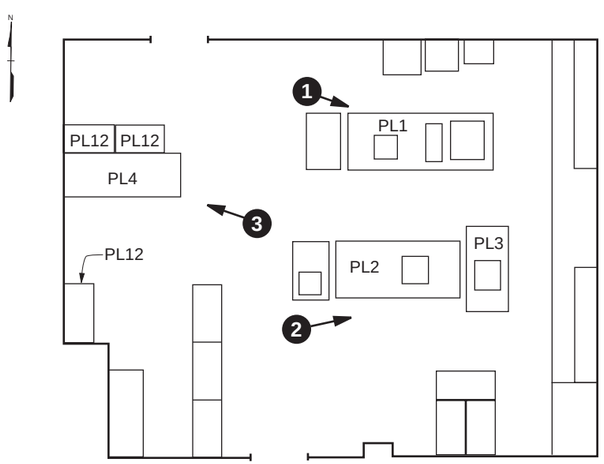
PL2 AND PL3 - OPTICAL TABLES

1. PL2 WEIGHS APPROXIMATELY 400 POUNDS.
2. PL3 WEIGHS APPROXIMATELY 300 POUNDS.

3

PL4 - LAB WORK BENCH

1. DISCONNECT ELECTRICAL POWER TO BENCH. PL12 - CABINETS (3).



NTRC
ROOM 121

NOTES:
1. USE E-D207 SUFFIX FOR ALL EQUIPMENT TAGS.

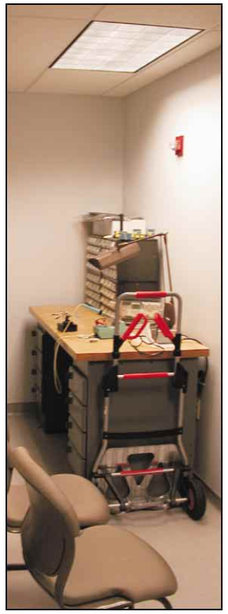
NO	DATE	REVISION	BY	CK	APPR
4	09/04/03	Revised per Client Comments			
3	09/04/03	Move Scope Reduced			
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2079

SHEET TITLE
PHOTONICS LABORATORY E-D207 DISASSEMBLY DRAWING

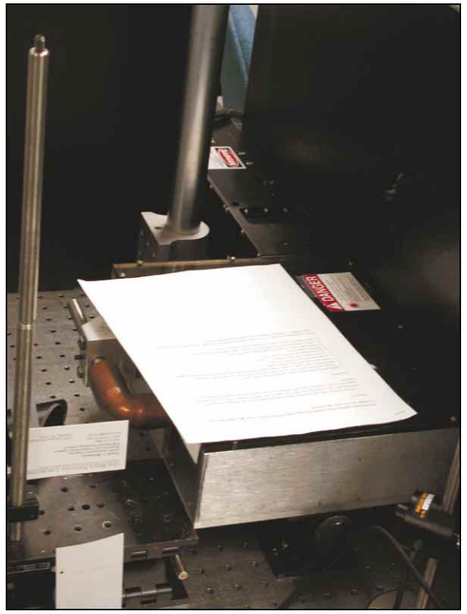
JOB NO PDC 0214
DATE 09/04/03
REV NO 4
SCALE NONE
DWG NO **SK-E-D207-2**



1

PL5 - BUTCHER BLOCK WORK BENCH

1. DISCONNECT ELECTRICAL POWER TO BENCH.



2

PL6 - LASER (2 PIECES)

1. DISCONNECT ELECTRICAL POWER.
2. POWER SUPPLY FOR THE LASER IS LOCATED UNDER THE TABLE.

3

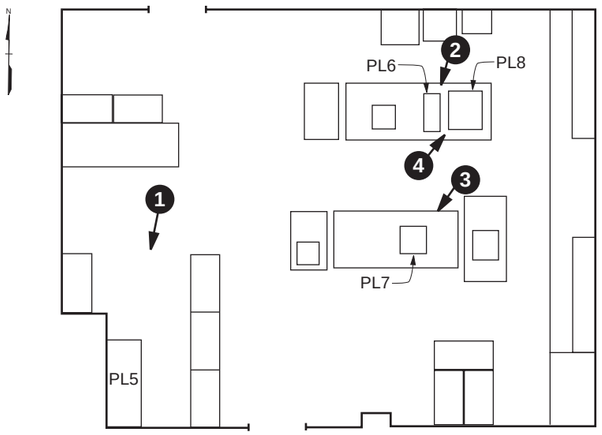
PL7 - OPTICAL TEST EQUIPMENT (TYPICAL)

1. THERE WILL BE APPROXIMATELY 20 ITEMS SUCH AS THE ABOVE. THEY WILL VARY IN SIZE AND SHAPE.
2. DISCONNECT AS APPROPRIATE.

4

PL8 - OVEN

1. DISCONNECT ELECTRICAL POWER.



NTRC
ROOM 121

NOTES:
1. USE E-D207 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
4	09/04/03	Revised per Client Comments			
3	09/04/03	Move Scope Reduced			
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2079

SHEET TITLE
PHOTONICS LABORATORY E-D207 DISASSEMBLY DRAWING

JOB NO PDC 0214
DATE 09/04/03
REV NO 4
SCALE NONE
DWG NO **SK-E-D207-3**

1

PL9 - OVEN

1. DISCONNECT ELECTRICAL POWER.

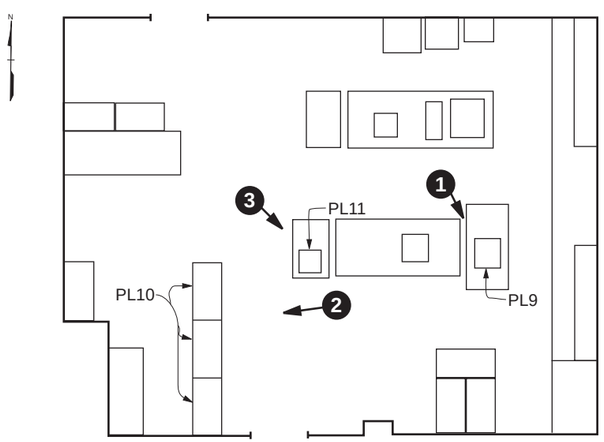
2

PL10 - CABINETS W/GLASS DOORS (3)

3

PL11 - FLUORMETER

1. DISCONNECT ELECTRICAL POWER.
2. DISCONNECT COMPUTER CABLES.



NTRC
ROOM 121

NOTES:
1. USE E-D207 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
4	09/04/03	Revised per Client Comments			
3	09/04/03	Move Scope Reduced			
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2079

SHEET TITLE
PHOTONICS LABORATORY E-D207 DISASSEMBLY DRAWING

JOB NO PDC 0214
DATE 09/04/03
REV NO 4
SCALE NONE
DWG NO **SK-E-D207-4**

1

PL13 - STORAGE FILES (2)

PL14 - TOOL BOX

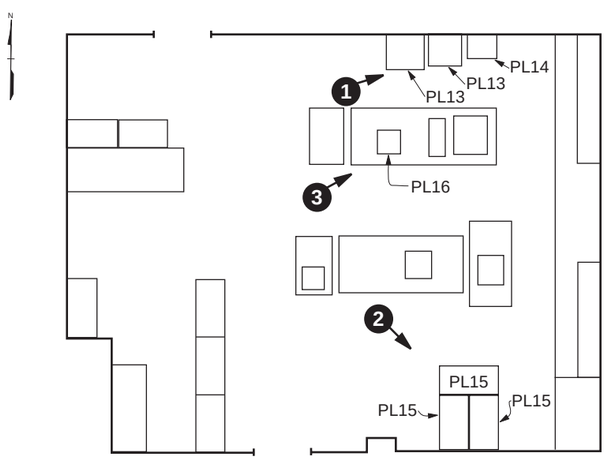
2

PL15 - CABINETS (3)

3

PL16 - PC WORK STATION

1. DISCONNECT ELECTRICAL POWER.
2. DISCONNECT COMPUTER CABLES.



NTRC
ROOM 121

NOTES:
1. USE E-D207 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
4	09/04/03	Revised per Client Comments			
3	09/04/03	Move Scope Reduced			
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2079

SHEET TITLE
PHOTONICS LABORATORY E-D207
DISASSEMBLY DRAWING

JOB NO PDC 0214
DATE 09/04/03
REV NO 4
SCALE NONE
DWG NO **SK-E-D207-5**

1

PL17 - LATERAL FILES (3)

2

PL18 - STORAGE CABINETS (9)

3

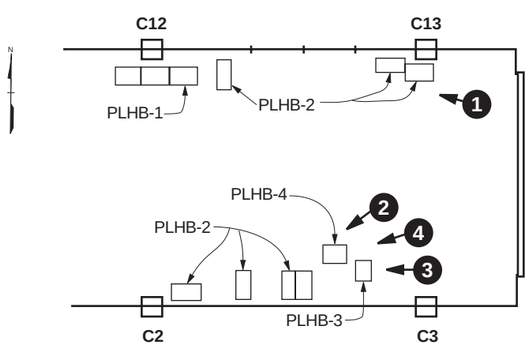
PL19 - HIGH POWER LASER (2 PIECES)

1. UNIT IS DISCONNECTED AND READY TO MOVE.

4

PL20 - HIGH POWER LASER (2 PIECES)

1. UNIT IS DISCONNECTED AND READY TO MOVE.



NTRC
FIRST FLOOR HIGH BAY

NO PICTURES AVAILABLE FOR THE FOLLOWING ITEMS:

1. PL20A - WIM SYSTEM
2. PL20B - RAMPS (4)

NOTES:
1. USE E-D207 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
4	09/04/03	Revised per Client Comments			
3	09/04/03	Move Scope Reduced			
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

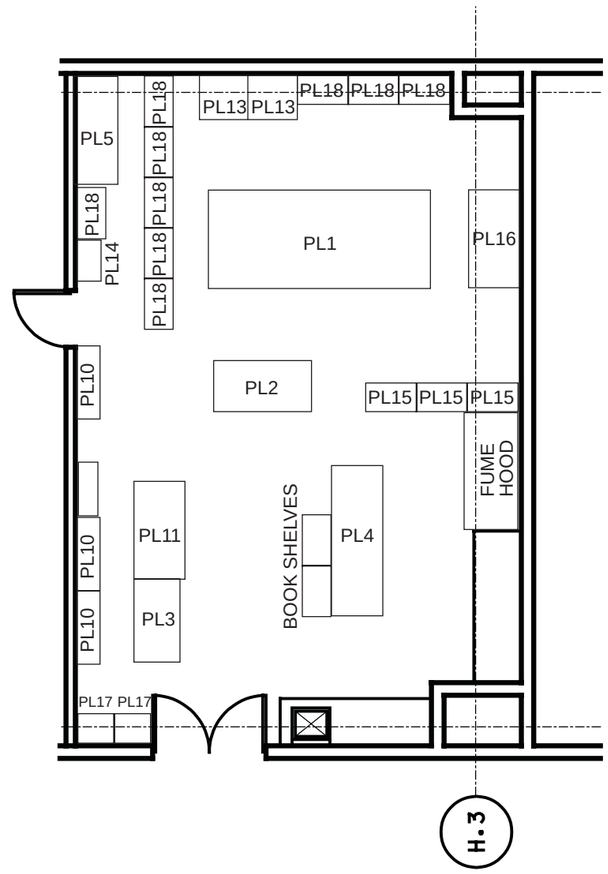
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2079

SHEET TITLE
PHOTONICS LABORATORY E-D207 DISASSEMBLY DRAWING

JOB NO PDC 0214
DATE 09/04/03
REV NO 4
SCALE NONE
DWG NO **SK-E-D207-6**

E-D207



PHOTONICS LAB FLOOR PLAN

SCALE: 1/8" = 1'-0"

NO	DATE	REVISION	BY	CK	APPR
4	09/04/03	Revised per Client Comments			
3	09/04/03	Move Scope Reduced			
2	06/16/03	Added New Room Number			
1	04/07/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E2079

SHEET TITLE

PHOTONICS RESEARCH MATERIAL LAB E-D207
INSTALLATION DRAWING NO. 1

JOB NO PDC 0214
DATE 09/04/03
REV NO 4
SCALE 3/32"=1'-0"
DWG NO **SK-E-D207-7**

Equipment to be moved to Pellet E-D110:

TAG E-D110-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
PL1	Leak Detector-Balzers HLT 160	24” x 24” x 55”	Y-12 9201-2 2nd Floor	SK-E-D110-2	SK-E-1044-10
PL2	Plotter-Houston Instrument DMR 60	52” x 30” x 52”	Y-12 9201-2 2nd Floor	SK-E-D110-2	SK-E-D110-10
PL3	Equipment Cage-Pipe Rack, H2 Compressor, Pipe, etc.	8’ x 24’ x 8’	Y-12 9201-2 2nd Floor	SK-E-D110-2	SK-E-D110-10
PL4	Vacuum Pump, Blower, Controls	40” x 68” x 60”	Y-12 9201-2 2nd Floor	SK-E-D110-2	SK-E-D110-10
PL5	Gas Bottle Rack	34” x 34” x 43”	Y-12 9201-2 2nd Floor	SK-E-D110-3	SK-E-D110-10
PL6	Shipping Containers (6)	25” x 29” x 16” (Largest)	Y-12 9201-2 2nd Floor	SK-E-D110-3	SK-E-D110-10
PL7	Support Stand	12’ x 3’ x 3’	Y-12 9201-2 2nd Floor	SK-E-D110-3	SK-E-D110-10
PL8	Vacuum Pump	36” x 33” x 54”	Y-12 9201-2 2nd Floor	SK-E-D110-3	SK-E-D110-10
PL9	Vacuum Vessel (Box)	34” x 34” x 44” (800 #s)	Y-12 9201-2 2nd Floor	SK-E-D110-3	SK-E-D110-10
PL10	Repeating Pellet Injector (RPI)	40” x 36” x 60”	Y-12 9201-2 2nd Floor	SK-E-D110-3	SK-E-D110-10
PL11	Small Support Stand	24” x 65” x 38”	Y-12 9201-2 2nd Floor	SK-E-D110-3	SK-E-D110-10
PL12	Box (2)	24” x 24” x 48” (300 #s)	Y-12 9201-2 2nd Floor	SK-E-D110-3	SK-E-D110-10
PL13	Vacuum Chamber	11” x 36” x 21”	Y-12 9201-2 2nd Floor	SK-E-D110-3	SK-E-D110-10
PL14	Vacuum Pumps (6)	21” x 10” x 17”	Y-12 9201-2 2nd Floor	SK-E-D110-3	SK-E-D110-10
PL15	Leak Detector - Veeco MS-17	31” x 23” x 43”	Y-12 9201-2 2nd Floor	SK-E-D110-4	SK-E-D110-10
PL16	Heavy Duty Cabinets (7)	38” x 25” x 85” (200 #s)	Y-12 9201-2 2nd Floor	SK-E-D110-4	SK-E-D110-10
PL17	Instrument Racks (10)	24” x 26” x 80”	Y-12 9201-2 2nd Floor	SK-E-D110-4	SK-E-D110-10
PL18	Cable Tray	50’ x 8”	Y-12 9201-2 2nd Floor	SK-E-D110-5	SK-E-D110-10
PL19	Refrigeration Unit - Cryomech CP-25	36” x 24” x 43”	Y-12 9201-2 2nd Floor	SK-E-D110-5	SK-E-D110-10
PL20	Transformer	22” x 18” x 34” (300 #s)	Y-12 9201-2 2nd Floor	SK-E-D110-5	SK-E-D110-10
PL21	Refrigeration Unit - Balzers He Comp.	26” x 20” x 28”	Y-12 9201-2 2nd Floor	SK-E-D110-6	SK-E-D110-10
PL22	Transformer		Y-12 9201-2 2nd Floor	SK-E-D110-6	SK-E-D110-10
PL23	Support Stand	12’ x 38” x 40”	Y-12 9201-2 2nd Floor	SK-E-D110-6	SK-E-D110-10
PL24	Box	36” x 32” x 38”	Y-12 9201-2 2nd Floor	SK-E-D110-6	SK-E-D110-10
PL25	Support Stand	18’ x 40” x 40”	Y-12 9201-2 2nd Floor	SK-E-D110-6	SK-E-D110-10
PL26	Box	24” x 24” x 48” (300 #s)	Y-12 9201-2 2nd Floor	SK-E-D110-6	SK-E-D110-10
PL27	Flammable Storage Cabinet	43” x 18” x 45”	Y-12 9201-2 2nd Floor	SK-E-D110-7	SK-E-D110-10
PL28	Computer and Monitor	30” x 30” x 48”	Y-12 9201-2 2nd Floor	SK-E-D110-7	SK-E-D110-10
PL29	Computers and Monitors	15’ x 30” x 42”	Y-12 9201-2 2nd Floor	SK-E-D110-7	SK-E-D110-10
PL30	Support Stand	21’ x 42” x 28”	Y-12 9201-2 2nd Floor	SK-E-D110-8	SK-E-D110-10
PL31	Liquid He Dewar	33” dia. x 72”	Y-12 9201-2 2nd Floor	SK-E-D110-8	SK-E-D110-10
PL32	Centrifugal Pellet Injector	70” x 111” x 80” (4000 #s)	Y-12 9201-2 2nd Floor	SK-E-D110-8	SK-E-D110-10
PL33	Liquid He Dewar	33” dia. x 72”	Y-12 9201-2 2nd Floor	SK-E-D110-9	SK-E-D110-10
PL34	Centrifugal Pellet Injector	70” x 111” x 80” (4000 #s)	Y-12 9201-2 2nd Floor	SK-E-D110-9	SK-E-D110-10
PL35	Misc. Boxes (22)	4’ x 2’ x 2’ (20) 12’ X 2’ X 2’ (2)	Y-12 9201-2 2nd Floor		
PL36	Vacuum Pump, Blower, Controls	40” x 68” x 60”		SK-E-D110-9	SK-E-D110-10

PELLET LAB E-D110 DRAWING INDEX

Drawing No.	Title
SK-E-D110-1	Drawing Index and Equipment List
SK-E-D110-2	Pellet Lab Disassembly Drawing
SK-E-D110-3	Pellet Lab Disassembly Drawing
SK-E-D110-4	Pellet Lab Disassembly Drawing
SK-E-D110-5	Pellet Lab Disassembly Drawing
SK-E-D110-6	Pellet Lab Disassembly Drawing
SK-E-D110-7	Pellet Lab Disassembly Drawing
SK-E-D110-8	Pellet Lab Disassembly Drawing
SK-E-D110-9	Pellet Lab Disassembly Drawing
SK-E-D110-10	Pellet Lab Installation Drawing No. 1 (To Be Added Later)

NOTES:

1. USE SUFFIX E-D110 FOR ALL EQUIPMENT TAGS.
2. ALL EQUIPMENT WILL BE DISCONNECTED AND READY TO MOVE. SMALLER ITEMS WILL BE BOXED IN 4’ X 2’ X 2’ WOODEN BOXES FOR FORK LIFT OR PALLET JACK HANDLING.

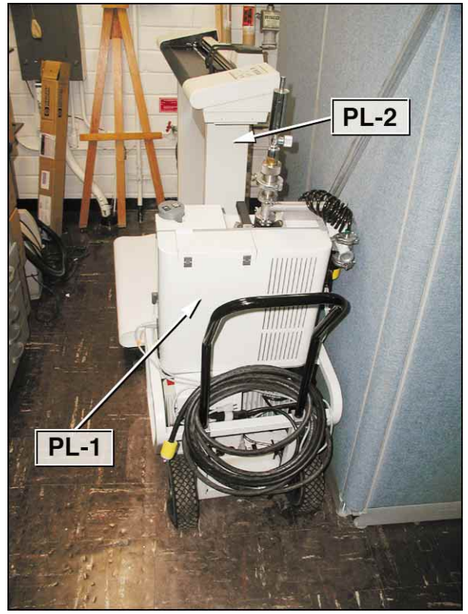
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

PELLET LABORATORY E-D110
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214-00001
DATE 09/04/03
REV NO 0
SCALE NONE
DWG NO **SK-E-D110-1**



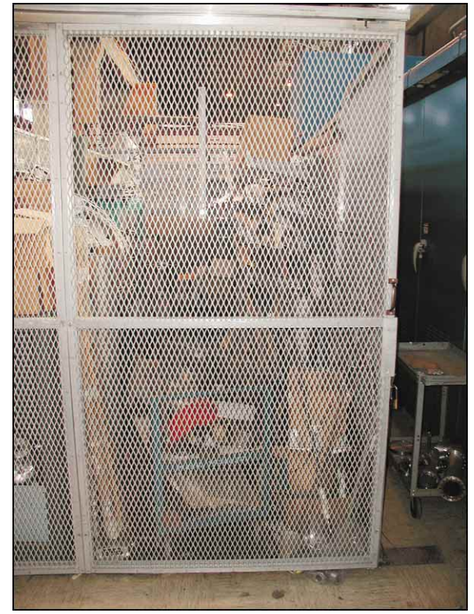
1

PL1 - LEAK DETECTOR - BALZERS HLT 160

1. CURRENTLY NOT IN PELLET LAB; WILL BE BY MOVING TIME.

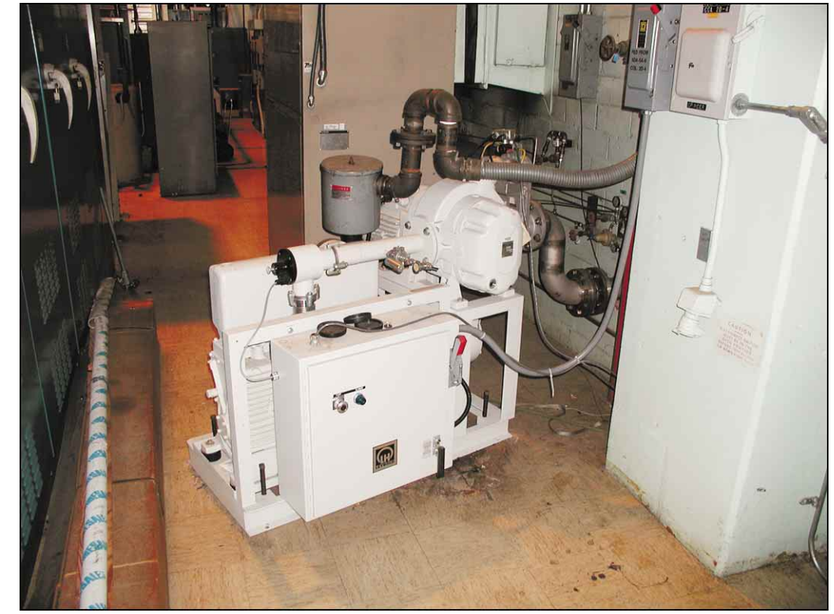
PL2 - PLOTTER - HOUSTON INSTRUMENT DMR 60

1. CURRENTLY NOT IN PELLET LAB; WILL BE BY MOVING TIME.



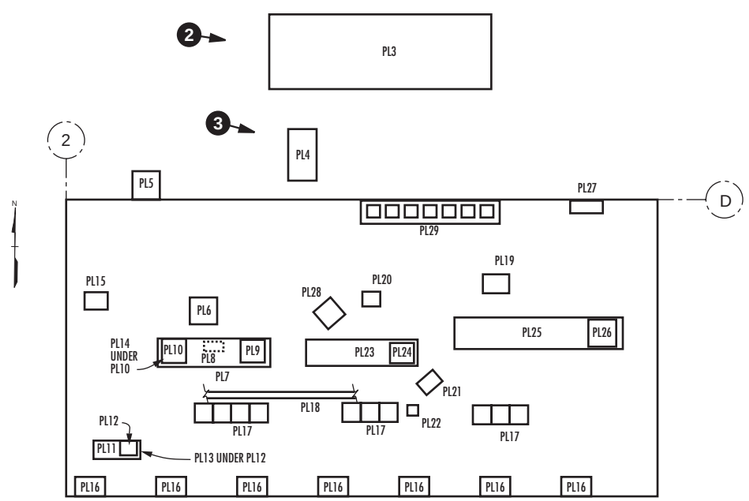
2

PL3 - EQUIPMENT CAGE



3

PL4 - VACUUM PUMP, BLOWER, CONTROLS



BUILDING 9201-2, SECOND FLOOR

NOTES:

1. USE SUFFIX E-D110 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

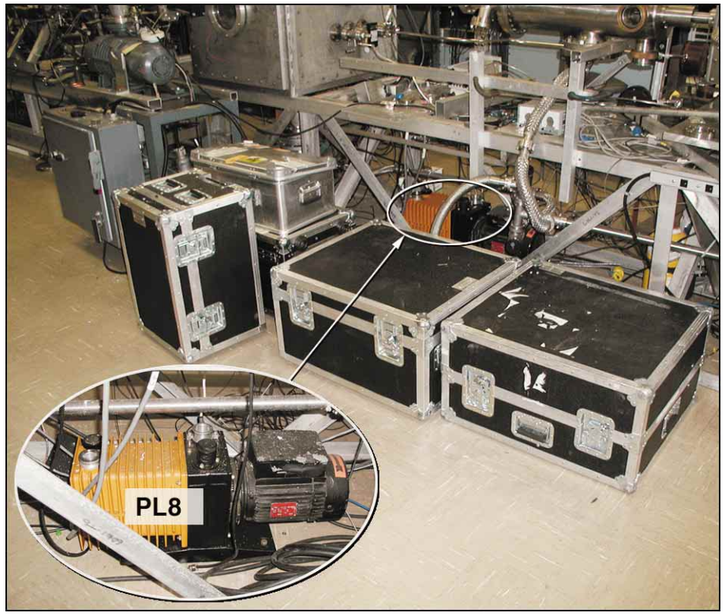
SHEET TITLE

PELLET LABORATORY E-D110
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-D110-2**

4

PL5 - GAS BOTTLE RACK

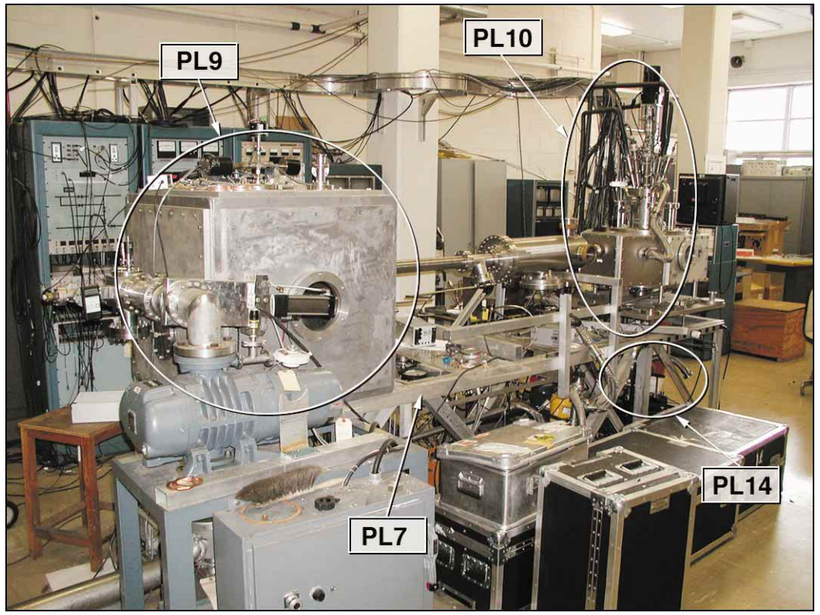


5

PL6 - SHIPPING CONTAINERS (6)

1. 5 SHOWN.

PL8 - VACUUM PUMP



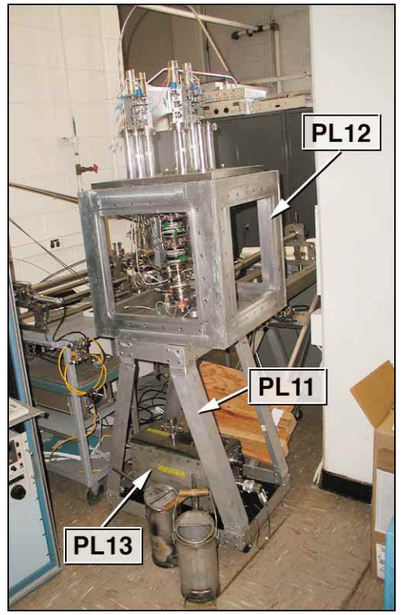
6

PL7 - SUPPORT STAND

PL9 - VACUUM VESSEL

PL10 - REPEATING PELLET INJECTOR

PL14 - VACUUM PUMPS (6)

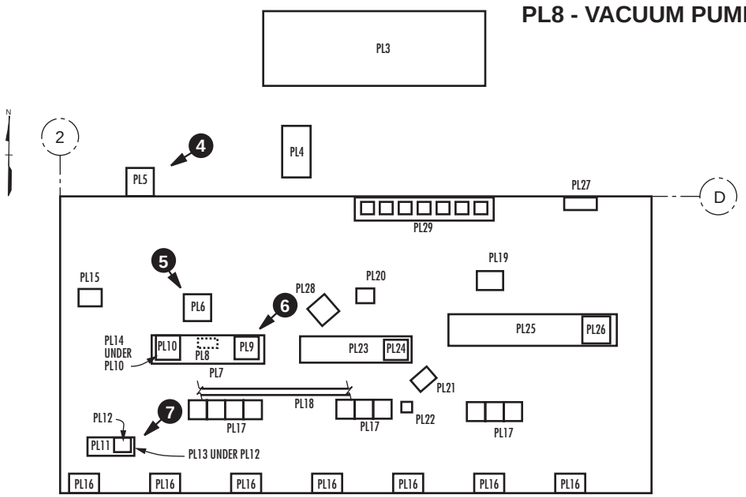


7

PL11 - SMALL SUPPORT STAND

PL12 - BOX

PL13 - VACUUM CHAMBER



BUILDING 9201-2, SECOND FLOOR

NOTES:

1. USE SUFFIX E-D110 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

PELLET LABORATORY E-D110 DISASSEMBLY DRAWING

JOB NO PDC 0214-00001

DATE 09/04/03

REV NO 0

SCALE NONE

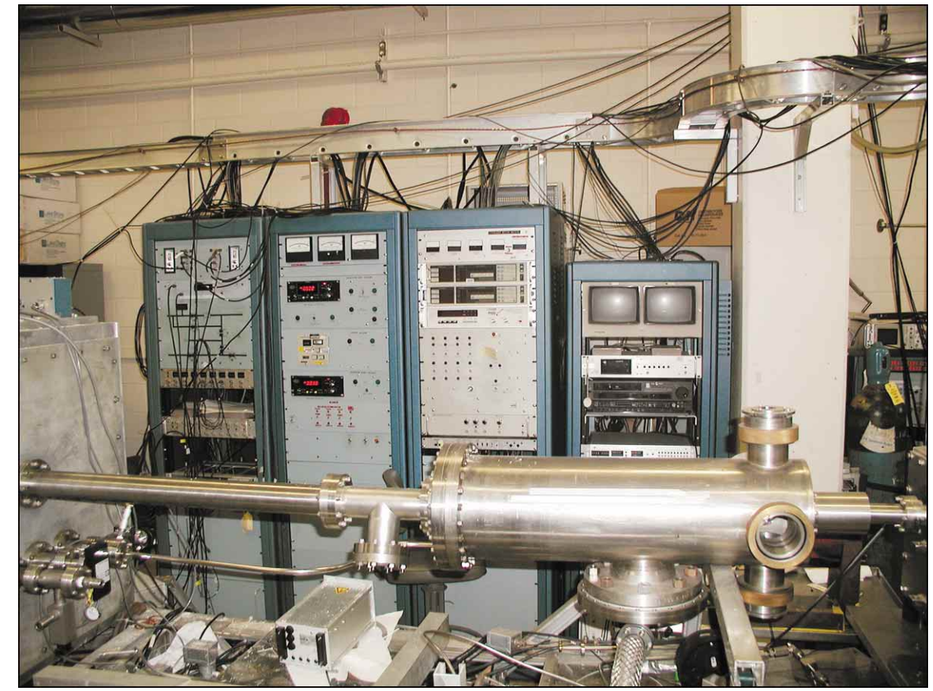
DWG NO **SK-E-D110-3**

8

PL15 - LEAK DETECTOR - VEECO MS-17

9

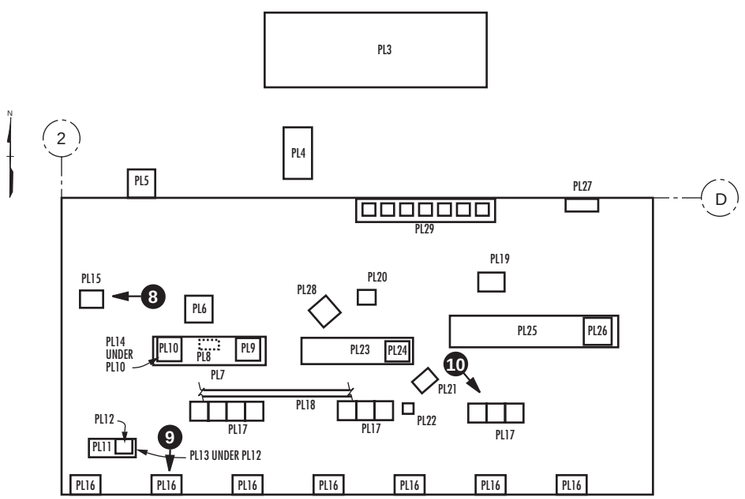
PL16 - HEAVY DUTY STORAGE CABINET (TYPCIAL FOR 7)



10

PL17 - INSTRUMENT RACKS (TYPICAL FOR 10)

1. INSTRUMENT RACK WIRING WILL BE DISCONNECTED BY ORNL. MOVE CONTRACTOR TO MOVE RACKS TO E-D110.



BUILDING 9201-2, SECOND FLOOR

NOTES:

1. USE SUFFIX E-D110 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

PELLET LABORATORY E-D110 DISASSEMBLY DRAWING

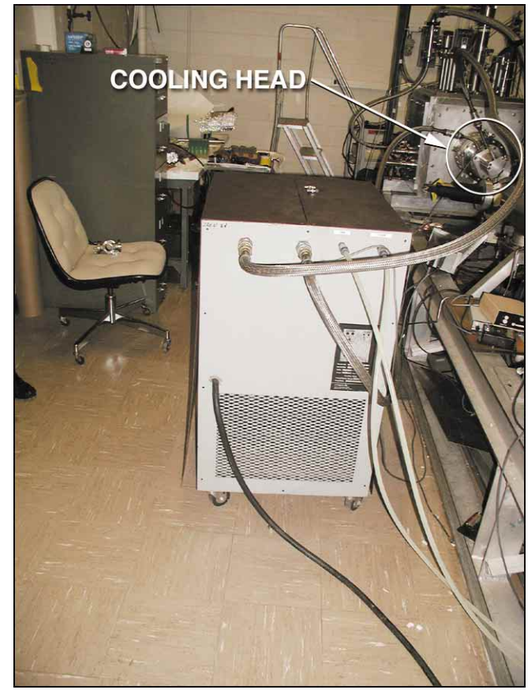
JOB NO PDC 0214-00001	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-D110-4**

11

PL18 - CABLE TRAY

1. CABLE TRAY TO BE DISASSEMBLED BY ORNL.

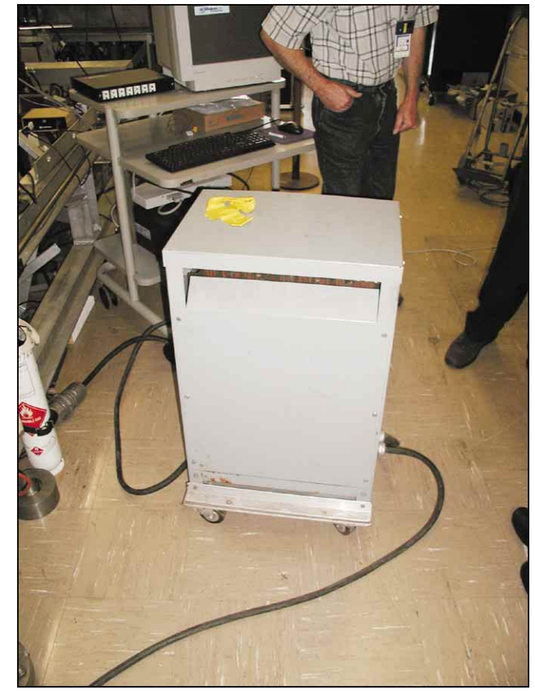
2. MOVE CONTRACTOR TO PUT TRAY ON PALLET AND MOVE TO ETF E-D110.



12

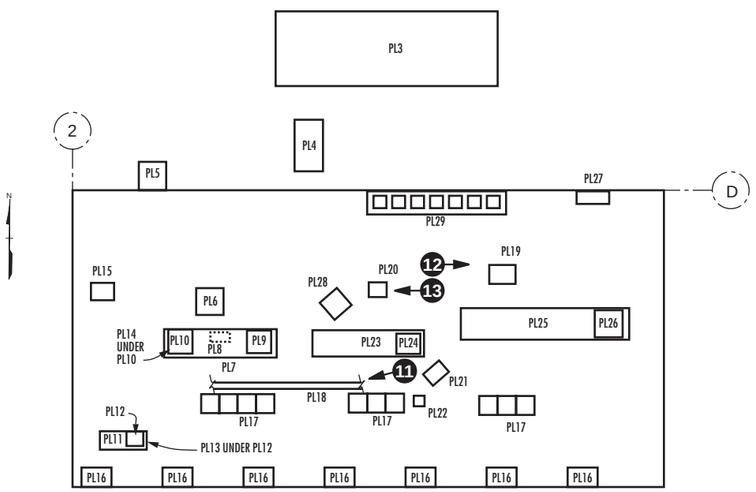
PL19 - REFRIGERATION UNIT - CRYOMECH CP-25

1. COOLING WATER & ELECTRICAL TO BE DISCONNECTED BY ORNL. COOLING HEAD WILL BE REMOVED FROM PL24 BY ORNL AND WILL BE LEFT CONNECTED TO THE REFRIGERATION UNIT.



13

PL20 - TRANSFORMER FOR CRYOMECH REFRIGERATION UNIT



BUILDING 9201-2, SECOND FLOOR

NOTES:

1. USE SUFFIX E-D110 FOR ALL EQUIPMENT TAGS.

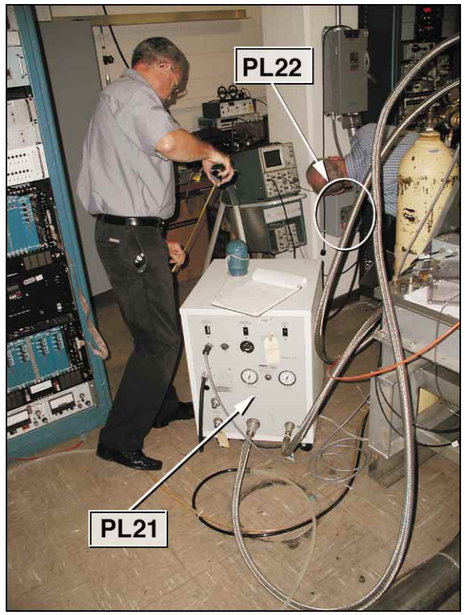
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

PELLET LABORATORY E-D110 DISASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-D110-5**

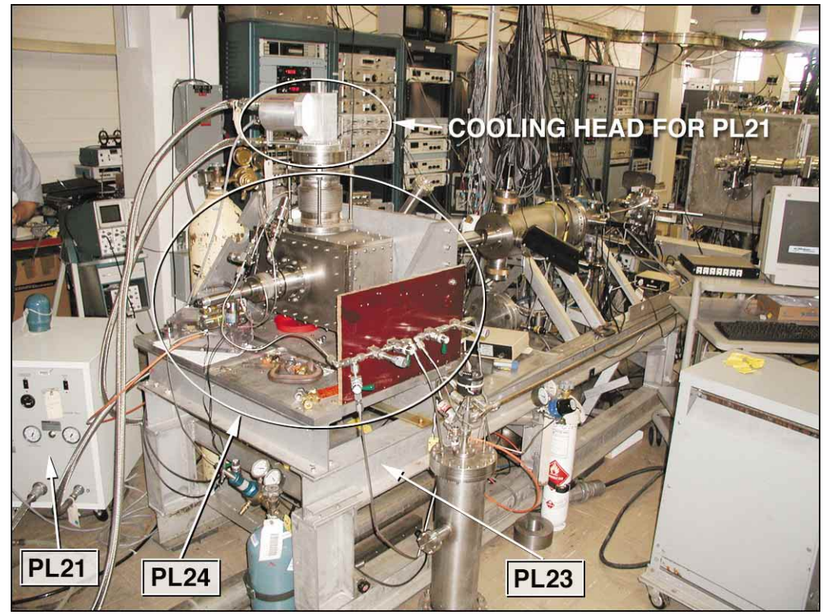


14

PL21 - REFRIGERATION UNIT - BALZERS HELIUM COMPRESSOR

PL22 - TRANSFORMER FOR BALZERS REFRIGERATION UNIT

1. COOLING HEAD WIL BE REMOVED FROM PL24 AND MOVE WITH REFRIGERATION UNIT.

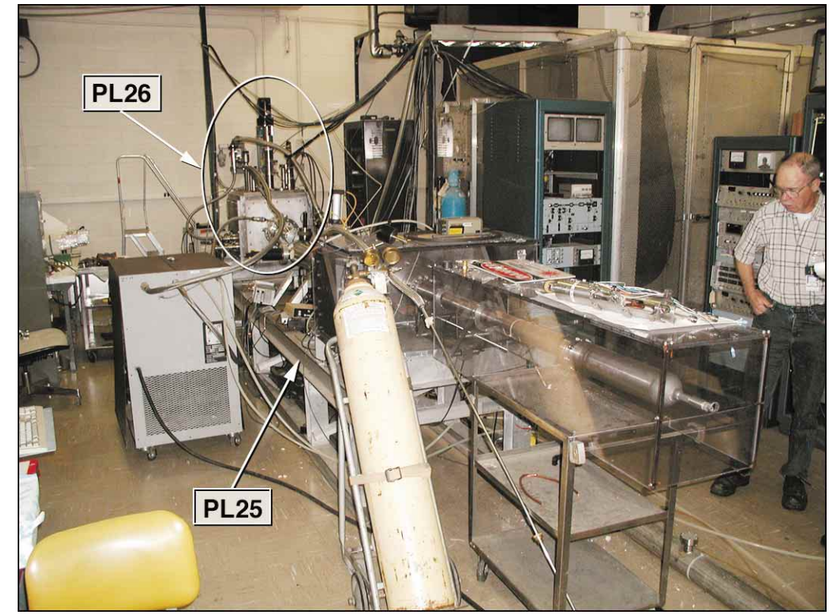


15

PL23 - SUPPORT STAND

PL24 - BOX

1. SUPPORT STAND AND ASSOCIATED EQUIPMENT TO BE DISASSEMBLED BY ORNL. MOVE CONTRACTOR TO BOX AND MOVE TO ETF.

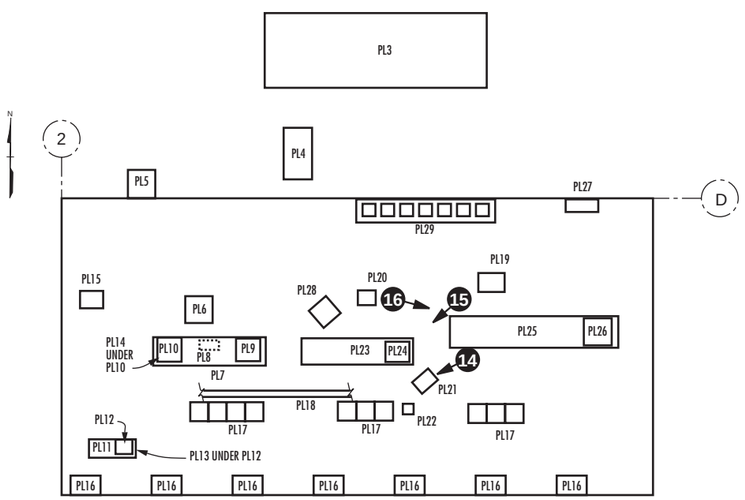


16

PL25 - SUPPORT STAND

PL26 - BOX

1. SUPPORT STAND AND ASSOCIATED EQUIPMENT TO BE DISASSEMBLED BY ORNL. MOVE CONTRACTOR TO BOX AND MOVE TO ETF.



BUILDING 9201-2, SECOND FLOOR

NOTES:

1. USE SUFFIX E-D110 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

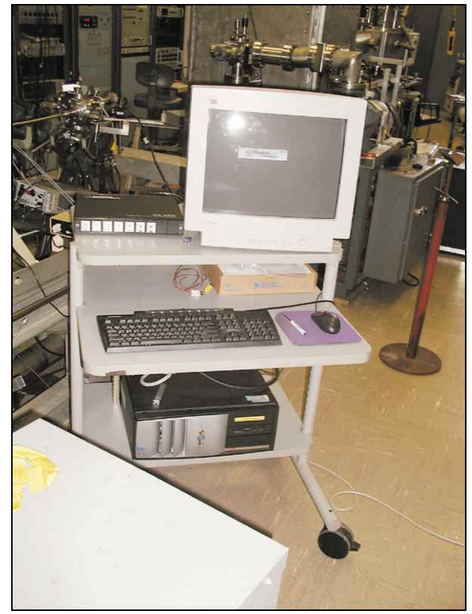
SHEET TITLE

PELLET LABORATORY E-D110 DISASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-D110-6**

17

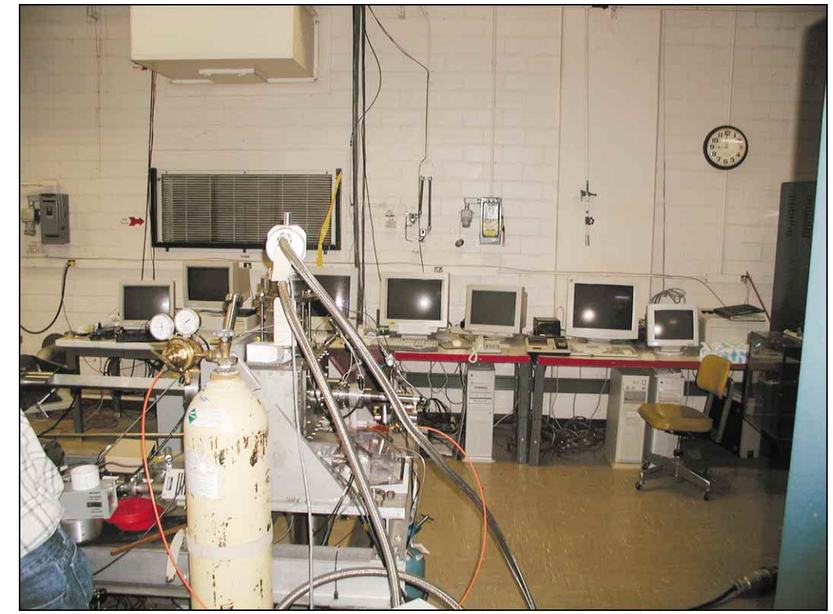
PL27 - FLAMMABLE STORAGE CABINET



18

PL28 - COMPUTER AND MONITOR

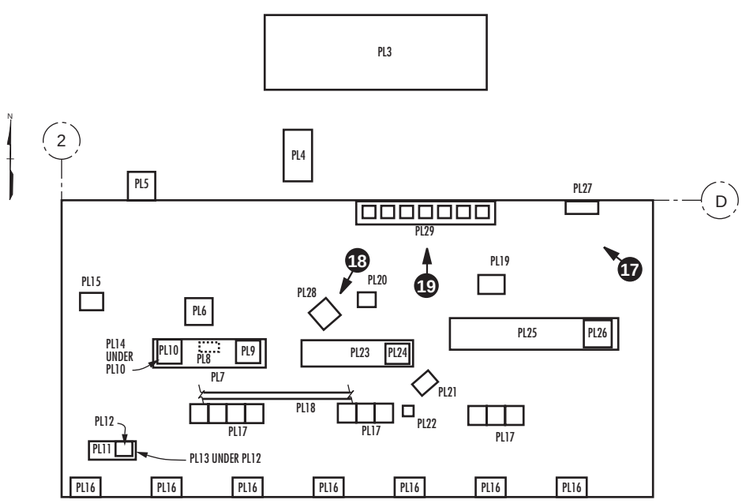
1. COMPUTERS TO BE DISCONNECTED AND BOXED BY ORNL.



19

PL29 - COMPUTERS AND MONITORS

1. COMPUTERS TO BE DISCONNECTED AND BOXED BY ORNL.



BUILDING 9201-2, SECOND FLOOR

NOTES:

1. USE SUFFIX E-D110 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

PELLET LABORATORY E-D110 DISASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-D110-7**

20

PL30 - SUPPORT STAND

1. STAND IS 21' LONG.

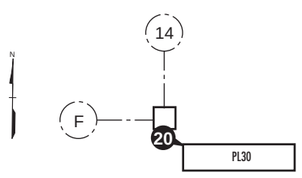
21

PL31 - LIQUID HELIUM DEWAR

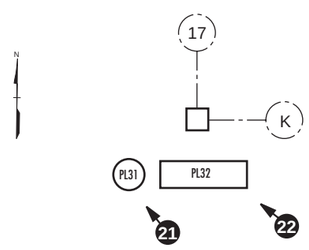
22

PL32 - CENTRIFUGAL PELLET INJECTOR

1. WEIGHT - 4000 LBS



BUILDING 9201-2, SECOND FLOOR



BUILDING 9201-2, FIRST FLOOR

NOTES:

1. USE SUFFIX E-D110 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

PELLET LABORATORY E-D110
DISASSEMBLY DRAWING

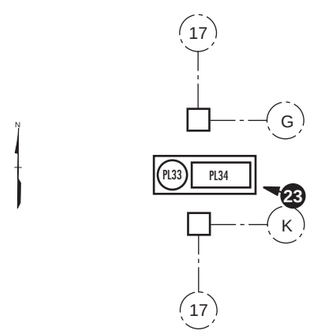
JOB NO PDC 0214-00001	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-D110-8**

NO PICTURE

23

PL33 - LIQUID HELIUM DEWAR

PL34 - CENTRIFUGAL PELLET INJECTOR (WEIGHS 4000 LBS)



BUILDING 9201-2, SECOND FLOOR

24

PL36 - VACUUM PUMP, BLOWER, CONTROLS

NOTES:

1. USE SUFFIX E-D110 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

PELLET LABORATORY E-D110
DISASSEMBLY DRAWING

JOB NO PDC 0214-00001

DATE 09/04/03

REV NO 0

SCALE NONE

DWG NO **SK-E-D110-9**

SERVER AND POWER SUPPLY IN RACK
MOVE FROM NTRC

NOTES:

1. INITIALLY, A SERVER & POWER SUPPLY FROM NTRC AND 5 OR 6 PCS FROM 4500N WILL BE LOCATED IN THE IT CENTER. MORE EQUIPMENT WILL BE ADDED LATER.
2. TERRY HEATHERLY WILL FIELD DIRECT THE CONNECTION OF EQUIPMENT BEING MOVED TO THE IT CENTER.
3. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
4. ESTD WILL PROVIDE ALL SAFETY SUPPORT (IH, H&S, ETC.) REQUIRED FOR THE MOVE. ESTD WILL PROVIDE HP SURVEYS OR USE PROCESS KNOWLEDGE TO OBTAIN ANY REQUIRED GREEN TAGS FOR EQUIPMENT TO BE MOVED TO ETF.
5. ESTD WILL REMOVE ALL INTERCONNECTING WIRING BETWEEN LAB EQUIPMENT PRIOR TO THE MOVE AND WILL RECONNECT THIS WIRING AFTER THE MOVE.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

IT CENTER E-D209
MOVE PACKAGE

JOB NO PDC 0214	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-D209-1**

Equipment to be moved to Electro-Optics Lab E-D201:

TAG E-D201-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
D1	Work Bench	30” x 96” x 52”	NTRC	SK E-D201-2	SK E-D201-4
D2	Work Bench	30” x 72” x 52”	NTRC	SK E-D201-2	SK E-D201-4
D3	Motor Current Demonstrator	16” x 24” x 16”	NTRC	SK E-D201-2	SK E-D201-4
D4	Oscilloscope Cart	16” x 30” x 48”	NTRC	SK E-D201-2	SK E-D201-4
D5	Tool Box	24” x 18” x 48”	NTRC	SK E-D201-2	SK E-D201-4
D6	Boxed Items & Transfer Cases	8 pallets	NTRC	NA	NA
D7	Optical Table	24” x 144” x 30”	Building 3500, Room 36	SK E-D201-3	SK E-D201-4
D8	Maple Top Work Bench	72” x 30” x 34”	Y-12 9201-3, Room 250	SK E-D201-3	SK E-D201-4

ELECTRO-OPTICS LAB E-D201 DRAWING INDEX

Drawing No.	Title
SK E-D201-1	Drawing Index and Equipment List
SK E-D201-2	Electro-Optics Lab Disassembly Drawing No. 1
SK E-D201-3	Electro-Optics Lab Disassembly Drawing No. 2
SK E-D201-4	Electro-Optics Lab Installation Drawing

NOTES:

1. HOWARD HAYNES (946-1343) AND DON HUTCHINSON (574-4730) WILL FIELD DIRECT THE CONNECTION OF EQUIPMENT BEING MOVED TO THE ELECTRO-OPTICS LAB E-D201.
2. USE E-D201 SUFFIX FOR ALL EQUIPMENT TAGS.
3. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
4. ESTD WILL PROVIDE ALL SAFETY SUPPORT (IH, H&S, ETC.) REQUIRED FOR THE MOVE. ESTD WILL PROVIDE HP SURVEYS OR USE PROCESS KNOWLEDGE TO OBTAIN ANY REQUIRED GREEN TAGS FOR EQUIPMENT TO BE MOVED TO ETF.
5. ESTD WILL REMOVE ALL INTERCONNECTING WIRING BETWEEN LAB EQUIPMENT PRIOR TO THE MOVE AND WILL RECONNECT THIS WIRING AFTER THE MOVE.

ENGINEERING TECHNOLOGY FACILITY
ELECTRO-OPTICS LABORATORY E-D201
MOVE PACKAGE

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ELECTRO-OPTICS LAB E-D201
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214

DATE 09/04/03

REV NO 0

SCALE NONE

DWG NO **SK-E-D201-1**

1

D1 & D2 WORK BENCHES
NTRC

1. DISCONNECT 120V POWER SUPPLY FROM WALL RECEPTACLES.

2

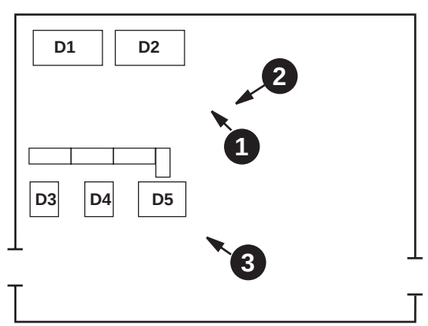
D6 TRANSFER CASES
NTRC

1. ESTD WILL PACKAGE CONTENTS OF 4 STORAGE CABINETS, WORK BENCH TOP AND WORK BENCH DRAWERS.

3

D3 CURRENT DEMONSTRATORS
D4 OSCILLOSCOPE CART
D5 TOOL BOX

NTRC



DIAGNOSTICS SPECIAL PROJECTS LAB
NTRC FIRST FLOOR, ROOM L106

NOTES:

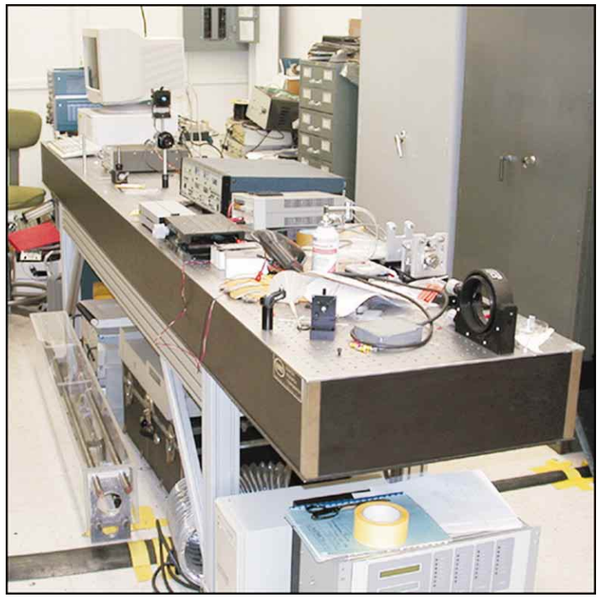
1. USE E-D201 SUFFIX FOR ALL EQUIPMENT TAGS

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

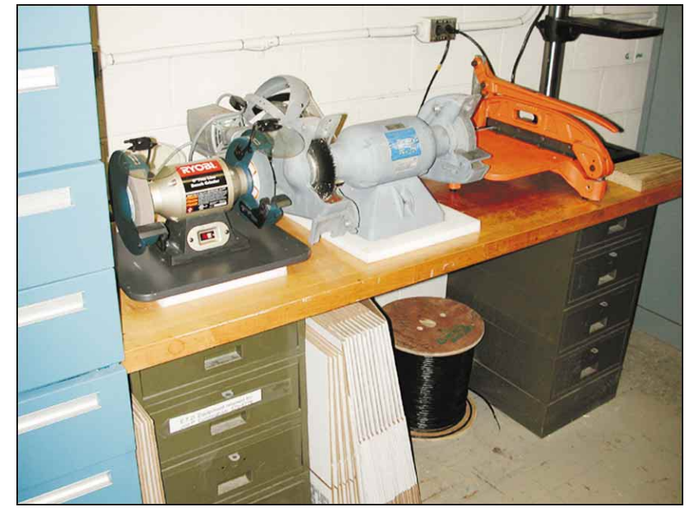
ELECTRO-OPTICS LAB E-D201
DISASSEMBLY DRAWING NO. 1

JOB NO	DATE	09/04/03
PDC 0214	REV NO	0
SCALE	DWG NO	
NONE		**SK-E-D201-2**



4

D7 2' X 12' OPTICAL TABLE
BUILDING 3500, ROOM 36



5

D8 MAPLE TOP WORK BENCH
9201-3, ROOM 250

NOTES:

1. USE SUFFIX E-D201 FOR ALL EQUIPMENT TAGS.

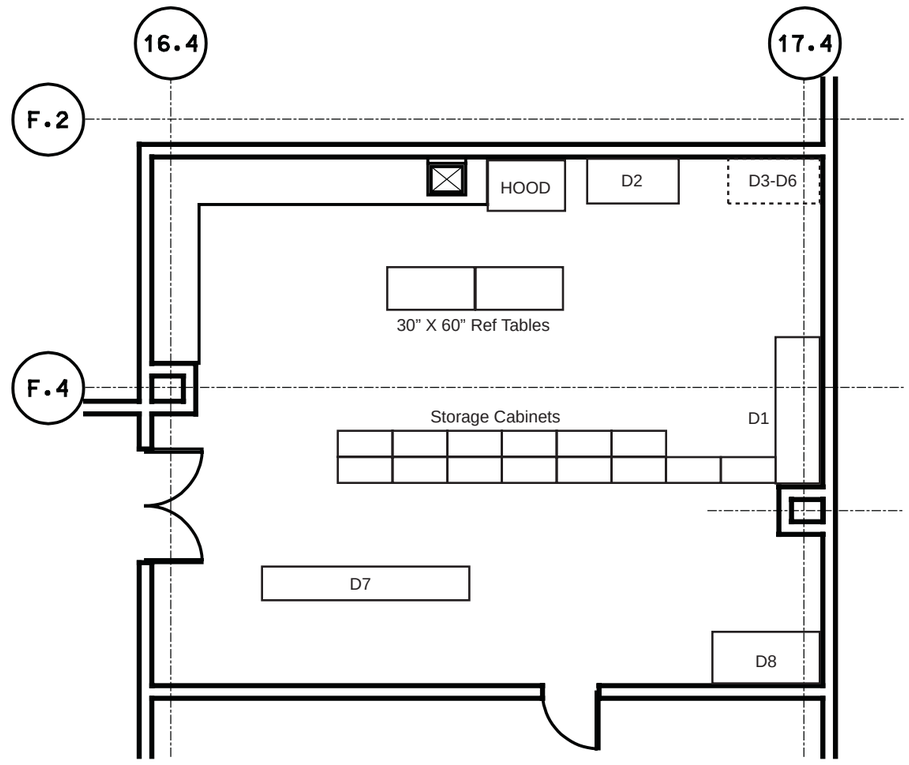
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ELECTRO-OPTICS LAB E-D201
DISASSEMBLY DRAWING NO. 2

JOB NO	DATE	09/04/03
PDC 0214	REV NO	0
SCALE	DWG NO	
NONE		**SK-E-D201-3**



ELECTRO-OPTICS LAB FLOOR PLAN

SCALE: 1/8" = 1'-0"

NO	DATE	REVISION	BY	CK	APPR
1	03/28/03	Management Walkthrough			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

ELECTRO-OPTICS LAB E-D201
ASSEMBLY DRAWING

JOB NO PDC 0214-00001	DATE 09/04/03
	REV NO 1
SCALE NONE	DWG NO **SK-E-D201-4**

Equipment to be moved to Composite Processing Lab E-D105:

TAG E-D105-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
CP1	Curing Oven (New - in crate) Greeve	82” x 90” x 78”	Y-12, 9204-1, 2nd Floor High Bay Col J-16	SK E-D105-2	SK E-D105-10
CP2	Curing Oven (New - in crate) Greeve	82” x 90” x 78”	Y-12, 9204-1, 2nd Floor High Bay Col J-16	SK E-D105-2	SK E-D105-10
CP3	RTM (15 gal) (on cart) Liq Controls	48” x 84” x 72”	Y-12, 9204-1, 2nd Floor	SK E-D105-2	SK E-D105-10
CP4	Specimen Saw and Router	30” x 60” x 48”	Y-12, 9204-1, 2nd Floor Col J-12	SK E-D105-3	SK E-D105-10
CP5	Abrasive Wheel	30” x 30” x 48”	Y-12, 9204-1, 2nd Floor Col J-12	SK E-D105-3	SK E-D105-10
CP6	Four Axis Winder	240” x 288” x 96”	Y-12, 9725	SK E-D105-4	SK E-D105-10
CP7	Two Axis Winder	36” x 180” x 60”	Y-12, 9725	SK E-D105-5	SK E-D105-10
CP8	Fiber Cart #1	36” x 60” x 60”	Y-12, 9725	SK E-D105-5	SK E-D105-10
CP9	Fiber Cart #2	36” x 60” x 60”	Y-12, 9725	SK E-D105-5	SK E-D105-10
~~CP10~~	~~Multi-Spool Cart~~	~~48” x 144” x 60”~~	~~Y-12, 9725~~	~~SK E-D105-6~~	~~SK E-D105-10~~
~~CP11~~	~~Brake Bank~~	~~48” x 72” x 72”~~	~~Y-12, 9725~~	~~SK E-D105-6~~	~~SK E-D105-10~~
CP12	Resin Transfer Molding (RTM) (5 Gal)	36” x 36” x 60”	Y-12, 9204-1		
CP13	RTM (30 Gal)	72” x 84” x 72”	Y-12 9725	SK E-D105-6	SK E-D105-10
CP14	Ultrasonic Cleaner	36” x 48” x 36”	Y-12 9725	SK E-D105-7	SK E-D105-10
CP15	Bead Blaster	24” x 48” x 72”	Y-12 9725	SK E-D105-7	SK E-D105-10
CP16	Ring Cut Off Saw	36” x 72” x 72”	Y-12, 9725	SK E-D105-7	SK E-D105-10
CP17	Band Saw	24” x 48” x 72”	Y-12, 9725	SK E-D105-7	SK E-D105-10
CP18	Short Beam Saw	24” x 24” x 48”	Y-12, 9725	SK E-D105-8	SK E-D105-10
CP19	Cut Off Saw	24” x 24” x 48”	Y-12, 9725	SK E-D105-8	SK E-D105-10
CP20	Table Saw	24” x 24” x 36”	Y-12 9725	SK E-D105-8	SK E-D105-10
CP21	Surface Grinder	24” x 48” x 48”	Y-12, 9204-1		
CP22	Drill Press	24” x 24” x 72”	Y-12, 9725	SK E-D105-8	SK E-D105-10
~~CP23~~	~~Composition Analyzer~~	~~24” x 48” x 24”~~	~~Y-12, 9725~~	~~SK E-D105-8~~	~~Will Not Move~~
CP24	Broomstraw Process	32” x 66” x 55”	Y-12, 9725	SK E-D105-9	SK E-D105-10
CP25	Stand Up Freezer		Y-12, 9204-1		
CP26	HEPA Vacuum (2)	30” x 26” x 48”	Y-12, 9725	SK E-D105-9	SK E-D105-10
CP27	Large Heaters	32” x 24” x 59”	Y-12, 9725	SK E-D105-9	SK E-D105-10
CP28	Tape Applicator	50” x 60” x 48”	Y-12, 9725	SK E-D105-9	SK E-D105-10
~~CP29~~	~~Budd Slurry Equipment (Slurry Tank, Oven and Press)~~	~~144” x 288” x 288”~~	~~Out of Y-12~~ On loan to USEC. They will return to E-D105.		
CP30	VWR Scientific Upright Freezer	34” x 37” x 80”	Y-12, 9725		
CP31	Tool Cabinets/Chest (Typical 5)	36” x 18” x 55”	Y-12, 9725		
CP32	Miscellaneous Large Plywood Boxes		Y-12, 9725		
NEW EQUIPMENT					
	Fume Hood				

COMPOSITE PROCESSING LAB E-D105 DRAWING INDEX

Drawing No.	Title
SK E-D105-1	Drawing Index and Equipment List
SK E-D105-2	Composite Processing Lab Disassembly Drawing No. 1
SK E-D105-3	Composite Processing Lab Disassembly Drawing No. 2
SK E-D105-4	Composite Processing Lab Disassembly Drawing No. 3
SK E-D105-5	Composite Processing Lab Disassembly Drawing No. 4
SK E-D105-6	Composite Processing Lab Disassembly Drawing No. 5
SK E-D105-7	Composite Processing Lab Disassembly Drawing No. 6
SK E-D105-8	Composite Processing Lab Disassembly Drawing No. 7
SK E-D105-9	Composite Processing Lab Disassembly Drawing No. 8
SK E-D105-10	Composite Processing Lab Installation Drawing

NOTES:

1. Ken Yarborough (574-6622) will field direct the connection of equipment being moved to the Composite Processing Lab E-D105.
2. Use E-D105 Suffix for all equipment tags.
3. M&CD will package all loose equipment and will label all equipment and boxes to be moved.
4. M&CD will provide all safety support (IH, H&S, etc.) required for the move. M&CD will provide HP surveys or use process knowledge to obtain any required green tags for equipment to be moved to ETF.
5. M&CD will remove all interconnecting wiring between lab equipment prior to the move and will reconnect this wiring after the move.
6. Equipment lined through or X’d out has been removed from the scope of the move.
7. Electronic lab equipment is very sensitive and care must be given to ensure that physical shock or vibration to the equipment is minimized.

ENGINEERING TECHNOLOGY FACILITY
COMPOSITE PROCESSING LABORATORY E-D105
MOVE PACKAGE

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1053

SHEET TITLE
COMPOSITE PROCESSING LABORATORY E-D105 DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D105-1**

1

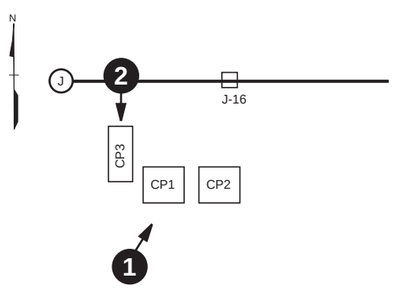
CP-1 AND CP-2 GREEVE CURING OVENS

1. MOVE TWO OVENS, LOCATED ON THE SECOND FLOOR OF 9204-1 AT COLUMN J-16, TO ETF ROOM E-D105. THE OVENS ARE NEW AND IN CRATES.

2

CP-3 RTM (15 GAL)

1. MOVE RTM (15 GAL), LOCATED ON THE SECOND FLOOR OF 9204-1 AT COLUMN J-16, TO ETF ROOM E-D105. THE RTM IS MOUNTED ON A DOLLY.



Y-12 BUILDING 9204-1 SECOND FLOOR

NOTES:

1. USE SUFFIX E-D105 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1053

SHEET TITLE

COMPOSITE PROCESSING LABORATORY E-D105 DISASSEMBLY DRAWING NO. 1

JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE NONE

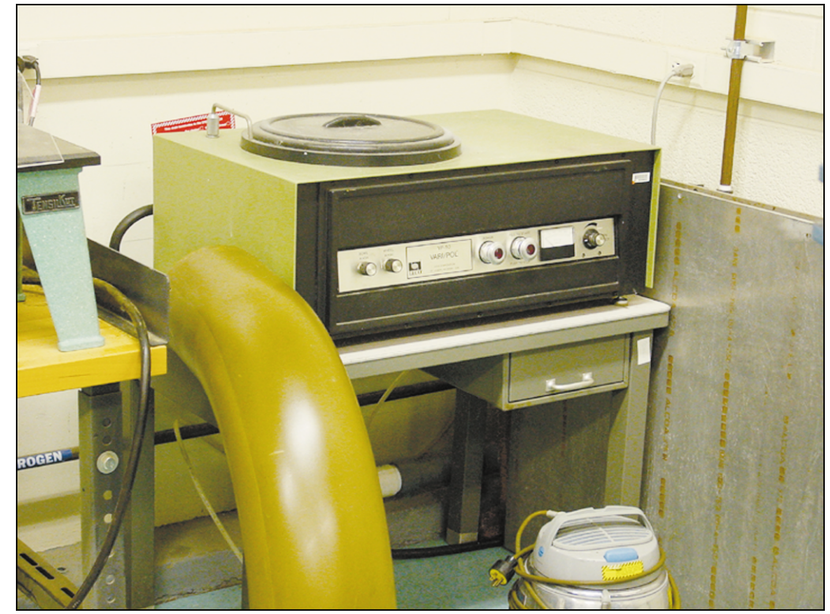
DWG NO **SK-E-D105-2**

1

CP-4 SPECIMEN SAW AND ROUTER

1. DISCONNECT THE ELECTRICAL POWER FROM THE SPECIMEN SAW AND ROUTER, LOCATED ON THE SECOND FLOOR OF 9204-1 AT COLUMN J-12.

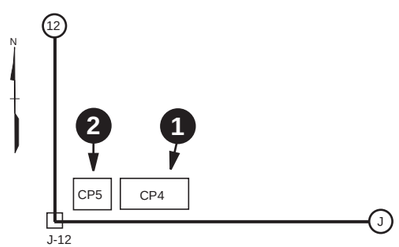
2. MOVE THE SAW, ROUTER, TABLE AND VACUUM CLEANERS.



2

CP-5 ABRASIVE WHEEL

1. MOVE THE ABRASIVE WHEEL, LOCATED ON THE SECOND FLOOR OF 9204-1 AT COLUMN J-12, TO ETF ROOM E-D105.



Y-12 BUILDING 9204-1 SECOND FLOOR

NOTES:

1. USE SUFFIX E-D105 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1053

SHEET TITLE

COMPOSITE PROCESSING LABORATORY E-D105 DISASSEMBLY DRAWING NO. 2

JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE NONE

DWG NO **SK-E-D105-3**

1

CP-6 FOUR AXIS WINDER

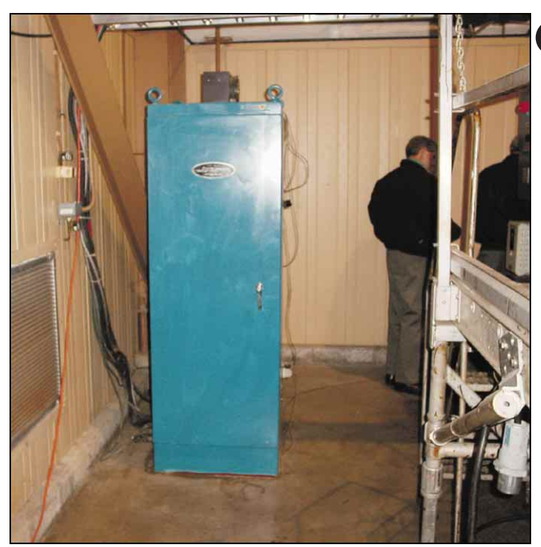
2

CP-6 FOUR AXIS WINDER

3

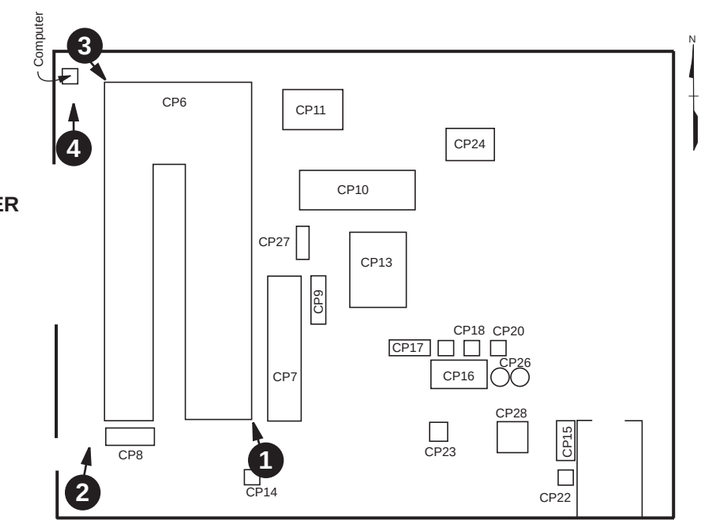
CP-6 FOUR AXIS WINDER

1. DISCONNECT 480V, 3 PHASE, 80 AMP ELECTRICAL POWER.
2. DISCONNECT COMPUTER CABLES AND INSTRUMENTATION WIRING.
3. DISCONNECT COMPRESSED AIR.
4. DISASSEMBLE MACHINE FOR SHIPPING.
5. MACHINE WEIGHS 30,000 POUNDS.
6. USE FLAT BED TRUCK TO HAUL MACHINE.
7. KEN YARBOROUGH WILL DIRECT DISASSEMBLY AND REASSEMBLY.
8. IN-TEK WILL BE NEEDED FOR FINAL ADJUSTMENTS AFTER REASSEMBLY.



4

COMPUTER FOR FOUR AXIS WINDER



Y-12 BUILDING 9275

NOTES:

1. USE SUFFIX E-D105 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1053

SHEET TITLE

COMPOSITE PROCESSING LABORATORY E-D105 DISASSEMBLY DRAWING NO. 3

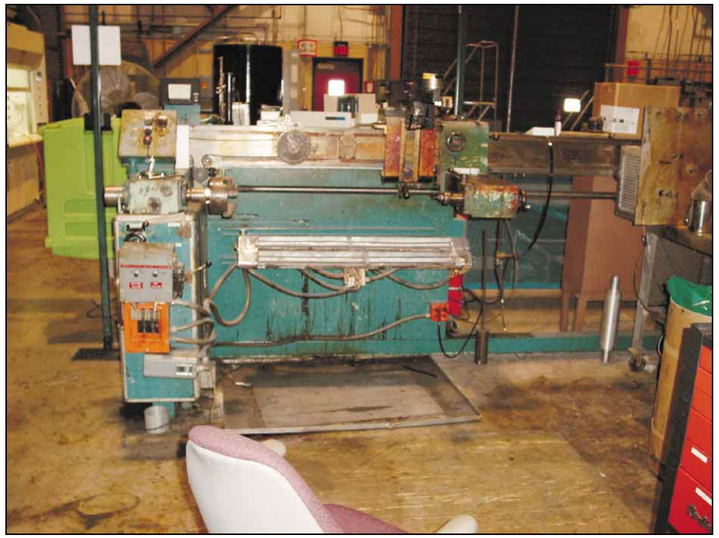
JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE NONE

DWG NO **SK-E-D105-4**



1

CP-7 TWO AXIS WINDER

1. DISCONNECT 480V, THREE PHASE, 50 AMP ELECTRICAL POWER.
2. DISCONNECT COMPRESSED AIR.

2

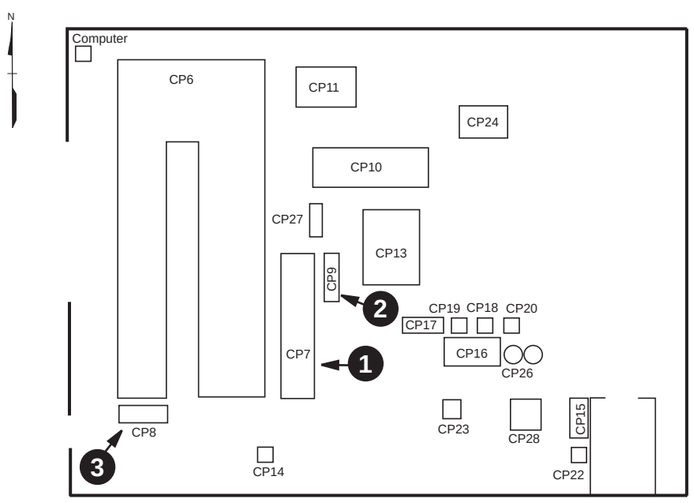
CP-9 FIBER CART NO. 2

1. DISCONNECT 115V ELECTRICAL POWER.

3

CP-8 FIBER CART NO. 1

1. DISCONNECT 115V ELECTRICAL POWER.



Y-12 BUILDING 9275

NOTES:

1. USE SUFFIX E-D105 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

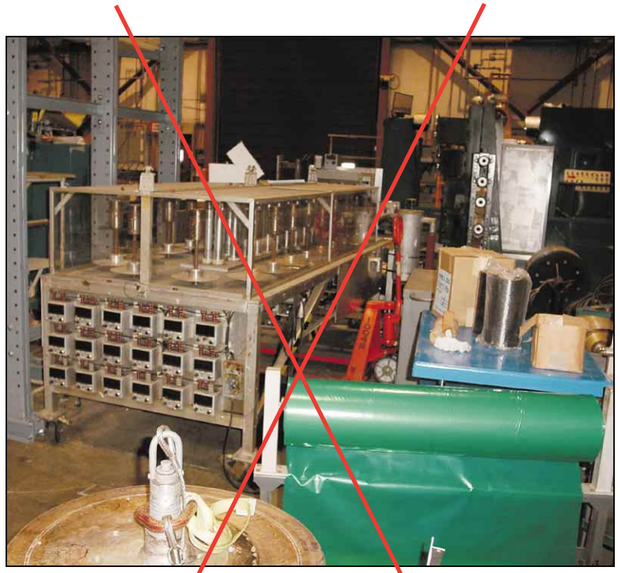
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1053

SHEET TITLE

COMPOSITE PROCESSING LABORATORY E-D105
DISASSEMBLY DRAWING NO. 4

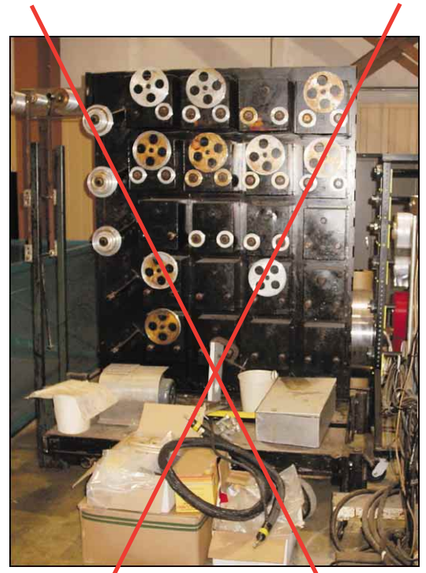
JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D105-5**



1

CP-10 MULTI-SPOOL CART

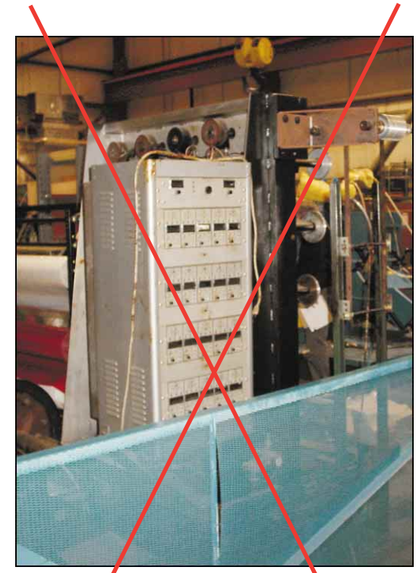
1. DISCONNECT 115V 30 AMP ELECTRICAL POWER.



2

CP-11 BRAKE BANK

1. DISCONNECT 115V 30 AMP ELECTRICAL POWER.



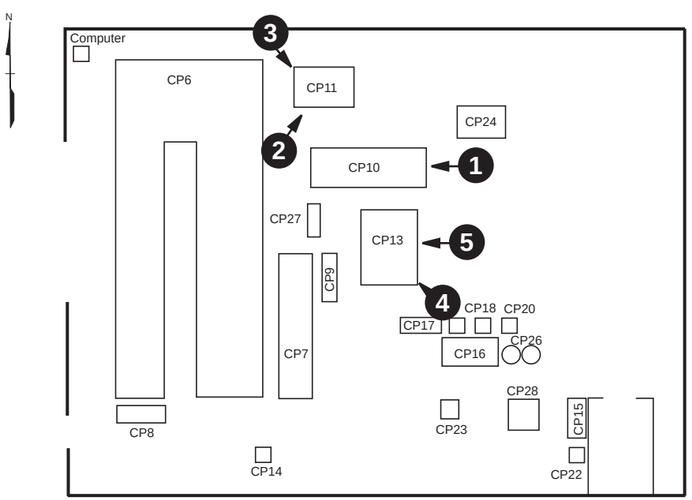
3

CP-11 BRAKE BANK (REAR VIEW)

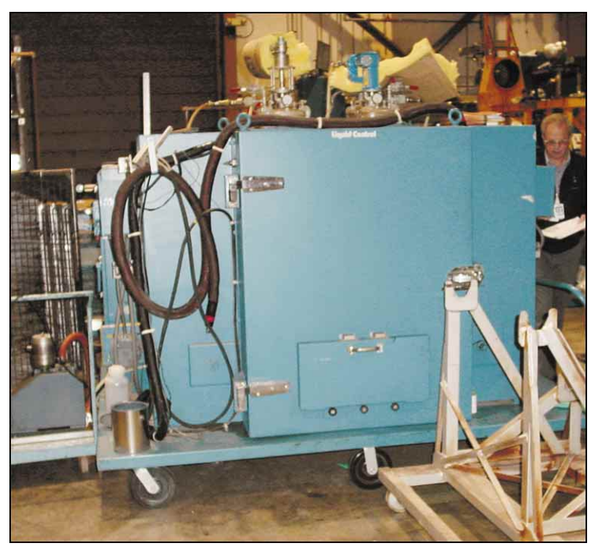
4

CP-13 RTM (30 GAL)

1. DISCONNECT 208V, 3 PHASE, 50 AMP ELECTRICAL POWER.
2. DISCONNECT COMPRESSED AIR.
3. DISCONNECT VACUUM VENT.
4. DISCONNECT CONTROL PANEL WIRING.



Y-12 BUILDING 9275



5

CP-13 RTM (30 GAL) (SIDE VIEW)

NOTES:

1. USE SUFFIX E-D105 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1053

SHEET TITLE

COMPOSITE PROCESSING LABORATORY E-D105 DISASSEMBLY DRAWING NO. 5

JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE NONE

DWG NO **SK-E-D105-6**

1

CP-14 ULTRASONIC CLEANER

1. ~~DISCONNECT~~ 240V, 3 PHASE, 30 AMP ELECTRICAL POWER.
2. DISCONNECTED AND READY TO LOAD.

2

CP-15 BEAD BLASTER

1. ~~DISCONNECT~~ 115V ELECTRICAL POWER.
2. ~~DISCONNECT~~ COMPRESSED AIR.
3. DISCONNECTED AND READY TO LOAD.

3

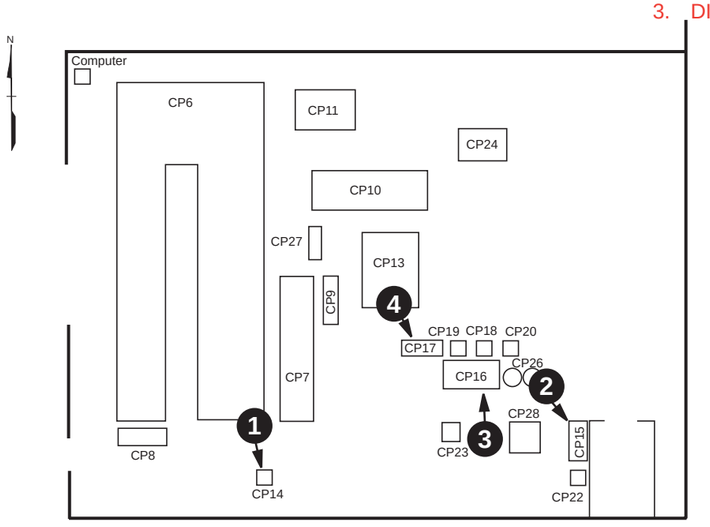
CP-16 RING CUT-OFF SAW

1. DISCONNECT 220V, SINGLE PHASE, 20 AMP ELECTRICAL POWER.
2. DISCONNECT COMPRESSED AIR.

4

CP-17 BAND SAW

1. DISCONNECT 240V, 3 PHASE, 30 AMP ELECTRICAL POWER.



Y-12 BUILDING 9275

NOTES:

1. USE SUFFIX E-D105 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1053

SHEET TITLE

COMPOSITE PROCESSING LABORATORY E-D105
DISASSEMBLY DRAWING NO. 6

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D105-7**

1

CP-18 SHORT BEAM SAW

1. DISCONNECT 230V, 3 PHASE, 10 AMP ELECTRICAL POWER.

2

CP-19 CUT-OFF SAW

1. DISCONNECT 230V, 3 PHASE, 10 AMP ELECTRICAL POWER.

3

CP-20 TABLE SAW

1. DISCONNECT 115V ELECTRICAL POWER.

4

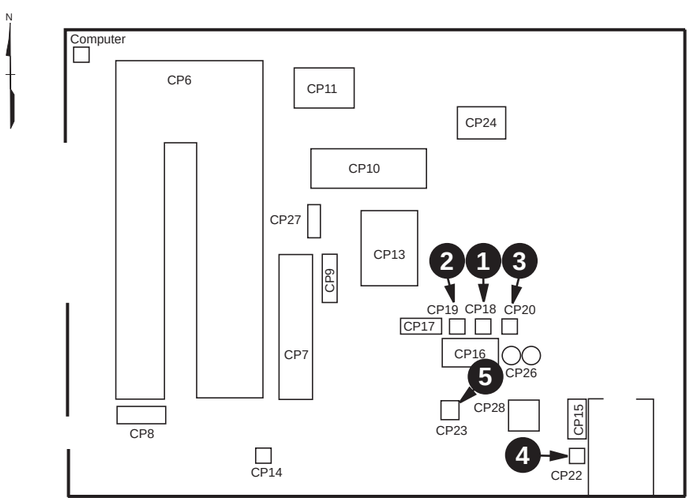
CP-22 DRILL PRESS

1. DISCONNECT 115V ELECTRICAL POWER.

5

CP-23 COMPOSITION ANALYZER

1. DISCONNECT 230V, SINGLE PHASE, 15 AMP ELECTRICAL POWER.
2. DISCONNECT EXHAUST DUCT.



Y-12 BUILDING 9275

NOTES:

1. USE SUFFIX E-D105 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1053

SHEET TITLE

COMPOSITE PROCESSING LABORATORY E-D105 DISASSEMBLY DRAWING NO. 7

JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE NONE

DWG NO **SK-E-D105-8**

1

CP-24 BROOMSTRAW PROCESS

1. DISCONNECT 115V ELECTRICAL POWER.

2

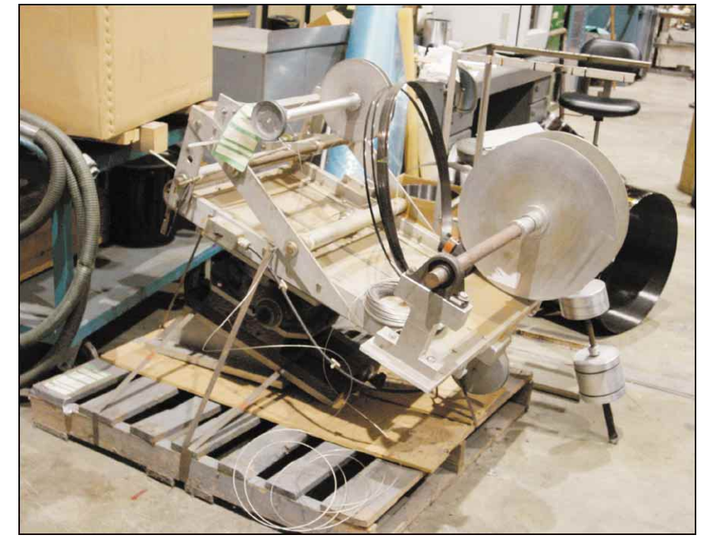
CP-26 HEPA VACUUM

1. DISCONNECT 115V ELECTRICAL POWER.

3

CP-27 LARGE HEATERS (TYPICAL 2)

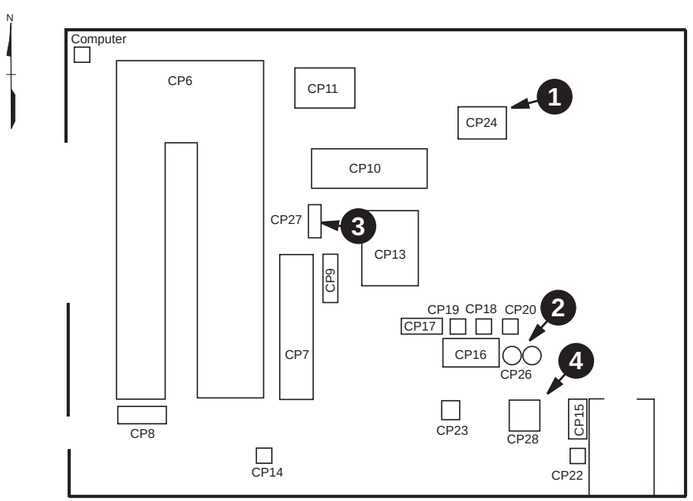
1. ~~DISCONNECT~~ 460V, 3 PHASE, 50 AMP ELECTRICAL POWER.
2. DISCONNECTED AND READY TO LOAD.



4

CP-28 TAPE APPLICATOR

1. CURRENTLY MOUNTED ON A SKID.



Y-12 BUILDING 9275

NOTES:

1. USE SUFFIX E-D105 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

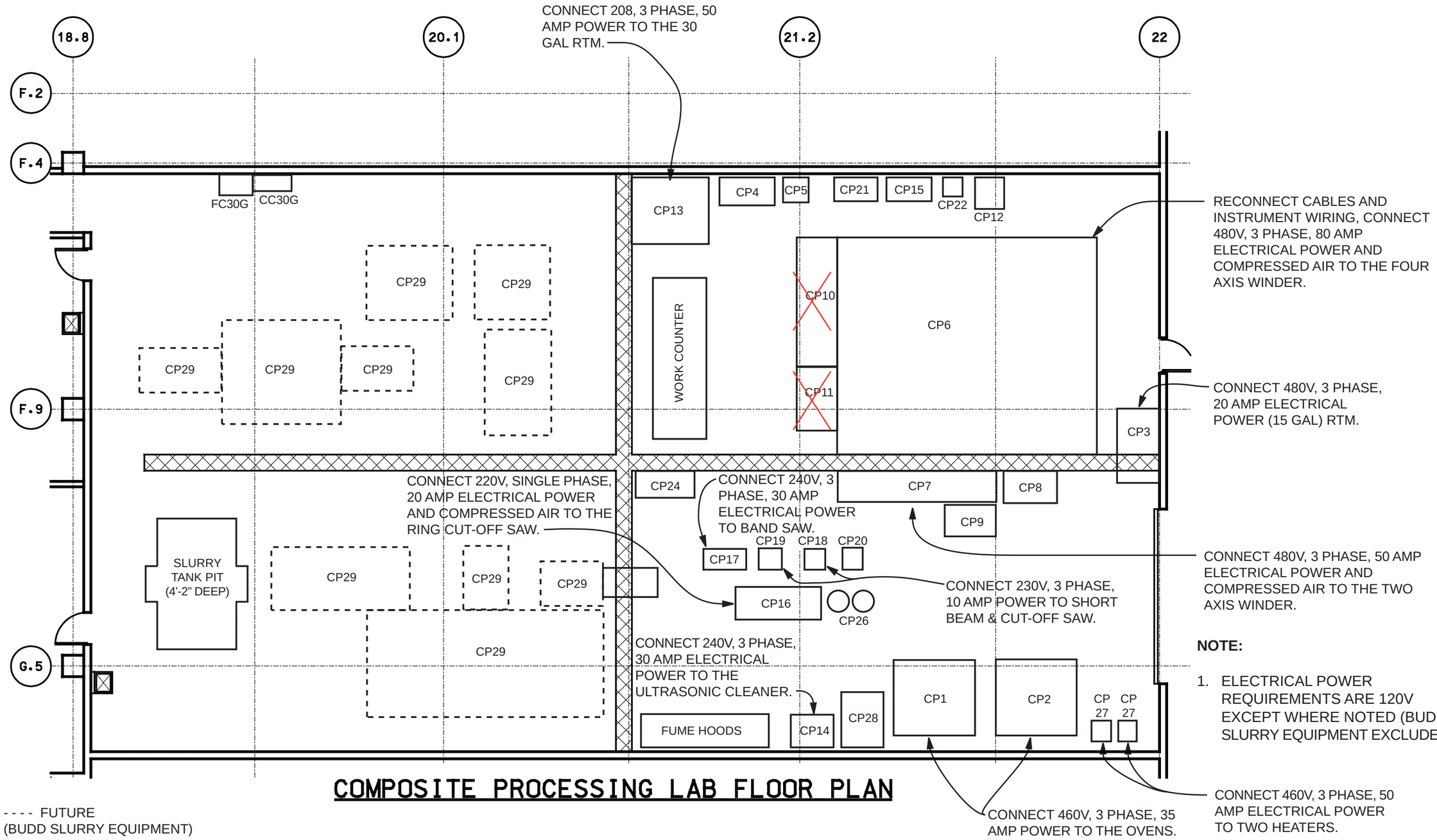
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1053

SHEET TITLE

COMPOSITE PROCESSING LABORATORY E-D105 DISASSEMBLY DRAWING NO. 8

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D105-9**



COMPOSITE PROCESSING LAB FLOOR PLAN

NOTE:

1. ELECTRICAL POWER REQUIREMENTS ARE 120V EXCEPT WHERE NOTED (BUDD SLURRY EQUIPMENT EXCLUDED).

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1053

SHEET TITLE

COMPOSITE PROCESSING LABORATORY E-D105 INSTALLATION DRAWING NO. 1

JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE 1/8"=1'-0"

DWG NO **SK-E-D105-10**

Equipment to be moved to the Insulation Laboratory					
ITEM NUMBER	**Equipment Name Description/Model**	**W x L X H (Inches)**	**Present Location**	**Disassembly Drawing**	**Utilities**
Emittance Apparatus					
1	Hoist	33 x 33 x 125	4508, Room 244	SK-E-F110-3	None
2	Drum	26 x 28 x 75	4508, Room 244	SK-E-F110-3	compressed air, oxygen, 120v,50 amp ckt, 231A plug
3	Instrument Panel		4508, Room 244	SK-E-F110-3	Compressed Air, 120v, 20 amp ckt
4	Oxygen Cylinder and Cabinet	24 x 22 x 69	4508, Room 244	SK-E-F110-3	120v, 20 amp ckt w/ 2 duplex receptacles. 208v, 20 amp, single phase w/ Hubbell twist lock receptacle
5	Two Liquid Nitrogen Drums	20" Diameter	4508, Room 244	SK-E-F110-3	none
6	Diffusion Pump	24 x 15 x 21	4508, Room 244	SK-E-F110-3	water,120v, 20 amp ckt
7	Switches and readout	95 x 30 x 38	4508, Room 244	SK-E-F110-3	same circuit as the diffusion pump
Miscellaneous Equipment					
8	Tool Box	27 x 18 x 54	4508, Room 244	SK-E-F110-4	
9	Rack	24 x 48 x 96	4508, Room 244	SK-E-F110-4	
10	Scale	15 x 15 x 4	4508, Room 244	SK-E-F110-4	120v, 20 amp ckt
	Scale	15 x 19 x 4	4508, Room 244	SK-E-F110-4	same as other scale
	Digimicro	20 x 12 x 21	4508, Room 244	SK-E-F110-4	same ckt as scales
11	Refrigerator	30 x 30 x 64	4508, Room 244	SK-E-F110-4	120v, 20 amp ckt
Large Heat Flow Meters					
12	Fox 670 - Meter	45 x 37 x 39	4508, Room 244	SK-E-F110-5	Compressed air,120v, 20 amp ckt
	Table (meter and controls)	96 x 37 x 39	4508, Room 244	SK-E-F110-5	
13	Fox 605	45 x 37 x 39	4508, Room 244	SK-E-F110-5	Compressed air, 120v, 20 amp ckt
	Table (meter and controls)	72 x 30 x 31	4508, Room 244	SK-E-F110-5	
Vacuum Chamber					
14	Vacuum Chamber	48 x 24 x 66	4508, Room 244	SK-E-F110-5	Two 120v, 20 amp ckts
Foam Cutter					
15	Foam Cutter	48 x 30 x 18	4508, Room 244	SK-E-F110-5	120v, 20 amp ckt
VIP Film Tester					
16	Insulated Sections-3 total	58 x 38 x 36 each	4508, Room 244	SK-E-F110-6	Four 120v, 20 amp ckts
	Table (VIP Film Tester)	60 x 113 x 32	4508, Room 244	SK-E-F110-6	
	Vacuum Pump	under table	4508, Room 244	SK-E-F110-6	included in above
Thin Heater					
17	Enclosure	120 x 112 x 98	4508, Room 244	SK-E-F110-7	will not move, but requires disassembly
18	Thin Heater Apparatus	69 x 45 x 60	4508, Room 244	SK-E-F110-7	120v, 20 amp ckt
19	Power and Circulator	26 x 19 x 44, 24 x 26 x 60	4508, Room 244	SK-E-F110-7	Three 120v, 20 amp ckts
20	Read Outs and Switches		4508, Room 244	SK-E-F110-7	120v, 20 amp ckt
VIP Test Stand					
21	Test Stand	36 x 18 x 48	4508, Room 244	SK-E-F110-8	110v, 20 amp ckt w/ 3 duplex receptacles
	Table	96 x 30 x 34	4508, Room 244	SK-E-F110-8	
22	Vacuum Pump		4508, Room 244	SK-E-F110-8	
Fume Hood					
23	Fume Hood, 1000 CFM (Ethanol, Methanol, dry graphite film lubricant)	60 x 36 x 96	4508, Room 244	SK-E-F110-8	hot and cold water, compressed air, 120v, 20 amp ckt, process drain, 1000 CFM exh
Foam Diffusion Unit					
24	Foam Diffusion Unit Controls	28 x 30 x 34	4508, Room 244	SK-E-F110-8	120 v, 20 amp ckt, compressed air
25	Foam Diffusion Unit	48 x 30 x 34	4508, Room 244	SK-E-F110-8	

INSULATION LAB E-F110 ASSEMBLY DRAWINGS

Drawing No.	Title
SK-E-F110-13	Equipment Layout
SK-E-F110-14	Mechanical Requirements
SK-E-F110-15	Electrical Requirements

NOTES:

1. USE SUFFIX E-F110 FOR ALL EQUIPMENT TAGS.
2. ALL ELECTRICAL CONNECTIONS ARE PLUG IN EXCEPT WHERE NOTED.
3. CONTACT KEN WILKES, 574-5931 FOR ADDITIONAL INFORMATION.
4. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
5. ESTD WILL PROVIDE ALL SAFETY SUPPORT (IH, H&S, ETC.) FOR THE MOVE. ESTD WILL PROVIDE HP SURVEYS OR USE PROCESS KNOWLEDGE TO OBTAIN ANY REQUIRED GREEN TAGS FOR EQUIPMENT TO BE MOVED TO ETF.
6. ESTD WILL REMOVE ALL INTERCONNECTING WIRING BETWEEN LAB EQUIPMENT PRIOR TO THE MOVE AND WILL RECONNECT THIS WIRING AFTER THE MOVE.
7. APPROXIMATELY ?? BOXES WILL BE MOVED IN ADDITION TO THE EQUIPMENT IDENTIFIED IN THIS PACKAGE.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE
INSULATION LABORATORY E-F110
DRAWING INDEX AND EQUIPMENT LIST - PAGE 1

JOB NO PDC 0214
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-E-F110-1**

Equipment to be moved to the Insulation Laboratory					
ITEM NUMBER	**Equipment Name Description/Model**	**W x L X H (Inches)**	**Present Location**	**Disassembly Drawing**	**Utilities**
Drying Oven					
26	Oven	45 x 67 x 65	4508, Room 244	SK-E-F110-9	208/3, 50 Amp (37.4 FLA) hard wired to box
	Frame	45 x 67 x 31	4508, Room 244	SK-E-F110-9	
Air Permability Tester					
27	Air Permability Tester	60 x 60 x 60	4508, Room 244	SK-E-F110-9	Three 120v, 20 amp ckts, compressed air
28	Compressed Air Dryer		4508, Room 244	SK-E-F110-9	
Pipe Tester					
29	Readout and switches		4508, Room 244	SK-E-F110-10	120v, 20 amp ckt
30	Power Supply	28 x 18 x 62	4508, Room 244	SK-E-F110-10	208v 20 amp, single phase, 231A plug
31	Pipe Tester	36 x 48 x 31	4508, Room 244	SK-E-F110-10	
Electrical Resistivity					
32	Electrical Resistivity	36 x 24 x 48	4508, Room 244	SK-E-F110-10	120v, 20 amp ckt
Specimen Freezers					
33	Specimen Freezer #10 (90 deg)	36 x 27 x 74	4508, Room 244	SK-E-F110-10	120v, 20 amp ckt
34	Speciman Freezer #11 (-10 deg)	36 x 27 x 74	4508, Room 244	SK-E-F110-10	120v, 20 amp ckt
Heat Flow Reader					
35	Small Heat Flow Reader		4508, Room 244	SK-E-F110-10	Compressed Air, 120v, 20 amp ckt
36	Small Heat Flow Reader		4508, Room 244	SK-E-F110-10	Compressed Air, 120v, 20 amp ckt
	Table and Controls	75 x 30 x 72	4508, Room 244	SK-E-F110-10	120v, 20 amp ckt
Disconnected Equipment					
37	Hollymatic Vacuum Packager	46 x 64 x 48	4508, Room 243	SK-E-F110-11	120v, 20 amp ckt, 208v, 30 amp, 3 phase NEMA 5-30 receptacle
38	Portable Pumping Station	24 x 18 x 53	4508, Room 243	SK-E-F110-11	120v, 20 amp ckt
39	Heat Sealer	48 x 34 x 62	4508, Room 243	SK-E-F110-11	208v, 20 amp, single phase ckt w/ a 231A receptacle, compressed air
40	Hydraulic Press	48 x 36 x 76	4508, Room 243	SK-E-F110-11	120v, 20 amp ckt
41	Welder (table top)	11 x 17 x 15	4508, Room 243	SK-E-F110-11	120v, 20 amp ckt
Miscellaneous Equipment					
42	Foam Diffusion Apparatus		4508, Room 274	SK-E-F110-12	120v, 20 amp ckt, compressed air
43	Miscellaneous Storage lockers and filing cabinets		4508, Room 250	SK-E-F110-12	
44	Specimen Freezer #1 (-40deg)	36 x 27 x 74	4508, Room 265	SK-E-F110-12	120v, 20 amp ckt
45	Specimen Freezer #2 (10 deg)	36 x 27 x 74	4508, Room 265	SK-E-F110-12	120v, 20 amp ckt
46	Specimen Freezer #3 (10 deg)	36 x 27 x 74	4508, Room 265	SK-E-F110-12	120v, 20 amp ckt
47	Specimen Freezer #4 (10 deg)	36 x 27 x 74	4508, Room 265	SK-E-F110-12	120v, 20 amp ckt
48	Specimen Freezer #5 (-40 deg)	36 x 27 x 74	4508, Room 265	SK-E-F110-12	120v, 20 amp ckt
49	Specimen Freezer #6 (-40 deg)	36 x 27 x 74	4508, Room 265	SK-E-F110-12	120v, 20 amp ckt
50	Specimen Freezer #7 (-40 deg)	36 x 27 x 74	4508, Room 265	SK-E-F110-12	120v, 20 amp ckt
51	Specimen Freezer #8 (90 deg)	36 x 27 x 74	4508, Room 265	SK-E-F110-12	120v, 20 amp ckt
52	Specimen Freezer #9 (90 deg)	36 x 27 x 74	4508, Room 265	SK-E-F110-12	120v, 20 amp ckt
53	Insulation Panels		4508, Room 224	SK-E-F110-12	none
54	Recirculating Chiller	24 x 13 x 20	to be purchased		120v, 20 amp ckt
55	Recirculating Chiller	24 x 13 x 20	to be purchased		120v, 20 amp ckt
56	Recirculating Chiller	24 x 13 x 20	to be purchased		120v, 20 amp ckt
57	Recirculating Chiller	24 x 13 x 20	to be purchased		120v, 20 amp ckt

INSULATION LAB E-F110 ASSEMBLY DRAWINGS

Drawing No.	Title
SK-E-F110-13	Equipment Layout
SK-E-F110-14	Mechanical Requirements
SK-E-F110-15	Electrical Requirements

NOTES:

1. USE SUFFIX E-F110 FOR ALL EQUIPMENT TAGS.
2. ALL ELECTRICAL CONNECTIONS ARE PLUG IN EXCEPT WHERE NOTED.
3. CONTACT KEN WILKES, 574-5931 FOR ADDITIONAL INFORMATION.
4. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
5. ESTD WILL PROVIDE ALL SAFETY SUPPORT (IH, H&S, ETC.) FOR THE MOVE. ESTD WILL PROVIDE HP SURVEYS OR USE PROCESS KNOWLEDGE TO OBTAIN ANY REQUIRED GREEN TAGS FOR EQUIPMENT TO BE MOVED TO ETF.
6. ESTD WILL REMOVE ALL INTERCONNECTING WIRING BETWEEN LAB EQUIPMENT PRIOR TO THE MOVE AND WILL RECONNECT THIS WIRING AFTER THE MOVE.
7. APPROXIMATELY ?? BOXES WILL BE MOVED IN ADDITION TO THE EQUIPMENT IDENTIFIED IN THIS PACKAGE.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY E-F110
DRAWING INDEX AND EQUIPMENT LIST - PAGE 2

JOB NO PDC 0214
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-E-F110-2**

1

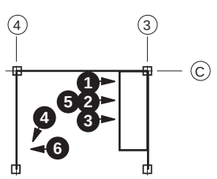
HOIST

1. 33” X 35” X 125” ON CASTERS.

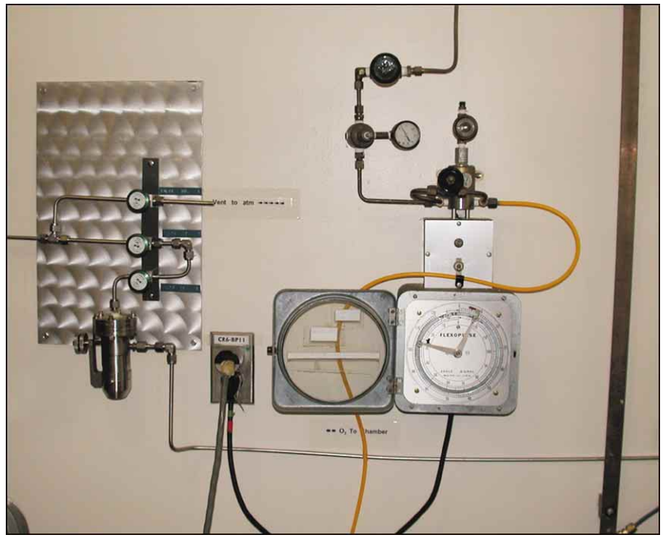
2

DRUM

1. 26” X 28” X 75”
2. 120V 50 AMP CIRCUIT 231A PLUG
3. COOLING WATER (HARD CONNECTION)
4. DRAIN
5. COMPRESSED AIR (HARD CONNECTION)
6. OXYGEN



ROOM 244, BUILDING 4508



3

INSTRUMENTATION

1. 120V
2. COMPRESSED AIR (HARD CONNECTION)

4

OXYGEN CYLINDER AND CABINET

1. 24” X 22” X 69”
2. 120V 20 AMP CIRCUIT
3. 208V 20 AMP, SINGLE PHASE W/HUBBELL TWIST LOCK RECEPTACLE.
4. 110V CIRCUIT

5

LIQUID NITROGEN DRUMS

1. 20” DIAMETER ON CASTERS

6

DIFFUSION PUMP

1. 24” X 15” X 21”
2. 120V

7

SWITCHES AND READOUT

1. TABLE: 95” X 30” X 38”
2. 120V CIRCUIT

NOTES:

1. USE SUFFIX E-F110 FOR ALL EQUIPMENT TAGS.
2. ALL ELECTRICAL CONNECTIONS ARE PLUG IN EXCEPT WHERE NOTED.
3. CONTACT KEN WILKES, 574-5931 FOR ADDITIONAL INFORMATION.
4. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
5. ESTD WILL PROVIDE ALL SAFETY SUPPORT (IH, H&S, ETC.) FOR THE MOVE. ESTD WILL PROVIDE HP SURVEYS OR USE PROCESS KNOWLEDGE TO OBTAIN ANY REQUIRED GREEN TAGS FOR EQUIPMENT TO BE MOVED TO ETF.
6. ESTD WILL REMOVE ALL INTERCONNECTING WIRING BETWEEN LAB EQUIPMENT PRIOR TO THE MOVE AND WILL RECONNECT THIS WIRING AFTER THE MOVE.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY E-F110 EMITTANCE APPARATUS

JOB NO PDC 0214	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-E-F110-3**

8

TOOL BOX

1. 27” X 18” X 54” ON CASTERS.

9

RACK

1. 24” X 48” X 96”
2. 5 SHELVES

10

2 SCALES

1. 15” X 15” X 4”
2. 15” X 19” X 4”
3. 120V
4. HANDLE WITH CARE

NIKON DIGIMIRCO STAND

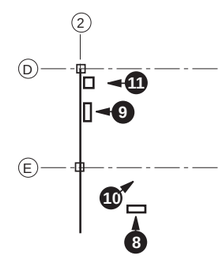
1. 20” X 12” X 21”
2. 120V
3. HANDLE WITH CARE

THE WORKBENCH WILL NOT MOVE.

11

REFRIGERATOR

1. 30” X 30” X 64”
2. 120V



ROOM 244, BUILDING 4508

NOTES:

1. USE SUFFIX E-F110 FOR ALL EQUIPMENT TAGS.
2. ALL ELECTRICAL CONNECTIONS ARE PLUG IN EXCEPT WHERE NOTED.
3. CONTACT KEN WILKES, 574-5931 FOR ADDITIONAL INFORMATION.
4. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
5. ESTD WILL PROVIDE ALL SAFETY SUPPORT (IH, H&S, ETC.) FOR THE MOVE. ESTD WILL PROVIDE HP SURVEYS OR USE PROCESS KNOWLEDGE TO OBTAIN ANY REQUIRED GREEN TAGS FOR EQUIPMENT TO BE MOVED TO ETF.
6. ESTD WILL REMOVE ALL INTERCONNECTING WIRING BETWEEN LAB EQUIPMENT PRIOR TO THE MOVE AND WILL RECONNECT THIS WIRING AFTER THE MOVE.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY E-F110
MISCELLANEOUS EQUIPMENT

JOB NO PDC 0214
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-E-F110-4**

LARGE HEAT FLOWMETERS

12 FOX 670

1. ENCLOSURE: 45” X 37” X 39”
2. TABLE: 96” X 30” X 31”
3. POTABLE WATER - 20 GALLONS PER HOUR (RECIRCULATING CHILLER REQUIRED AT E-F110, 65-70º SUPPLY WATER TEMPERATURE)
4. COMPRESSED AIR
5. 120V CIRCUIT

NOTE: 39” ACCESS ABOVE IS REQUIRED TO REMOVE THE ENCLOSURE.

13 FOX 605

1. ENCLOSURE: 45” X 37” X 39”
2. TABLE: 72” X 30” X 31”
3. POTABLE WATER - 20 GALLONS PER HOUR (RECIRCULATING CHILLER REQUIRED AT E-F110, 65-70º SUPPLY WATER TEMPERATURE)
4. COMPRESSED AIR
5. 120V CIRCUIT

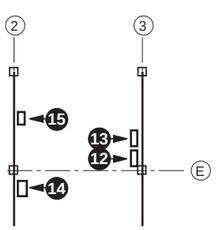
15 FOAM CUTTER

1. 48” X 30” X 18”
2. 120V

14 VACUUM CHAMBER

1. 48” X 24” X 66”
2. TABLE TOP MAY CONTAIN TRANSITE
3. PROCESS WATER (HARD PIPED)
4. PIPE INSULATION MAY CONTAIN ASBESTOS
5. 120V HARD WIRED

NOTE: WILL NOT REQUIRE WATER IN E-F110.



ROOM 244, BUILDING 4508

NOTES:

1. USE SUFFIX E-F110 FOR ALL EQUIPMENT TAGS.
2. ALL ELECTRICAL CONNECTIONS ARE PLUG IN EXCEPT WHERE NOTED.
3. CONTACT KEN WILKES, 574-5931 FOR ADDITIONAL INFORMATION.
4. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
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NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY E-F110
HEAT FLOWMETERS, VACUUM CHAMBER, FOAM CUTTER

JOB NO: PDC 0214
DATE: 06/16/03
REV NO: 1
SCALE: NONE
DWG NO: **SK-E-F110-5**

A

B

C

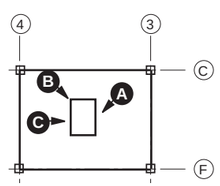
16

VIP FILM TESTER

1. 3 SECTIONS, 58” X 38” X 36” EACH
2. TABLE: 60” X 113” X 32”
3. FOUR 120V, 20 AMP CKTS
4. THE THREE SECTIONS ARE INTERCONNECTED WITH 1 1/2 INCH COPPER VACUUM LINES AND THREE 1/4 INCH STAINLESS STEEL GAS LINES. THERE ARE NO DISCONNECTS BETWEEN SECTIONS ON THESE LINES.

VIP FILM TESTER

1. INTERNAL VESSEL (TYPICAL OF 3)



ROOM 244, BUILDING 4508

NOTES:

1. USE SUFFIX E-F110 FOR ALL EQUIPMENT TAGS.
2. ALL ELECTRICAL CONNECTIONS ARE PLUG IN EXCEPT WHERE NOTED.
3. CONTACT KEN WILKES, 574-5931 FOR ADDITIONAL INFORMATION.
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NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY E-F110
VIP FILM TESTER

JOB NO PDC 0214
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-E-F110-6**

17

ENCLOSURE

1. THE ENCLOSURE WILL NOT BE MOVED, BUT MUST BE DISASSEMBLED TO REMOVE THE THIN HEATER. THERE ARE LIGHTS IN THE CEILING.

18

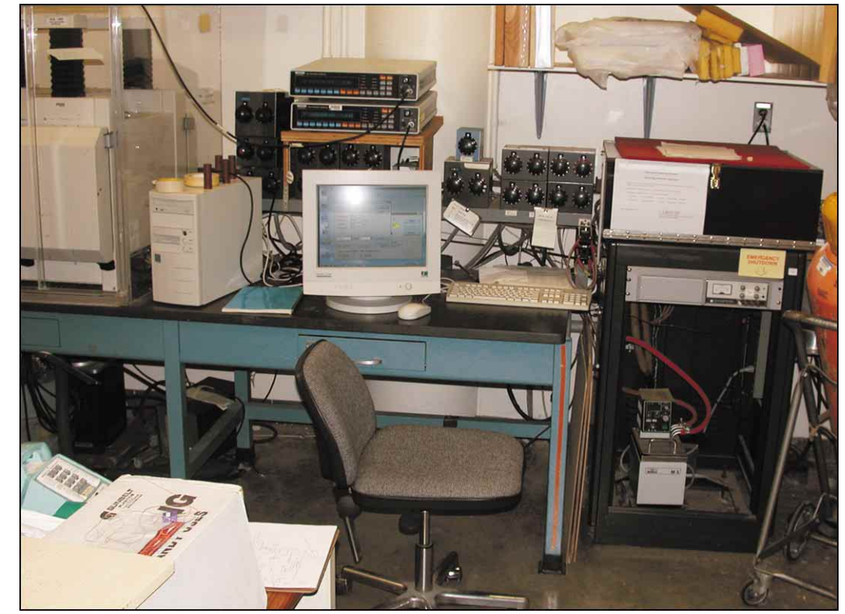
THIN HEATER APPARATUS

1. 69” X 45” X 60”
2. 120V
3. FRAME IS BOLTED TO THE FLOOR

19

THIN HEATER POWER AND CIRCULATOR

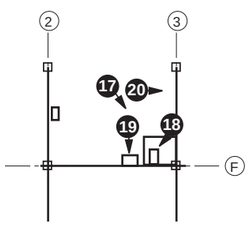
1. 26” X 19” X 44”
2. 24” X 26” X 60”
3. 120V



20

READOUTS AND SWITCHES

1. 120V



ROOM 244, BUILDING 4508

NOTES:

1. USE SUFFIX E-F110 FOR ALL EQUIPMENT TAGS.
2. ALL ELECTRICAL CONNECTIONS ARE PLUG IN EXCEPT WHERE NOTED.
3. CONTACT KEN WILKES, 574-5931 FOR ADDITIONAL INFORMATION.
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NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY E-F110 THIN HEATER

JOB NO PDC 0214	DATE 06/16/03
	REV NO 1
SCALE NONE	DWG NO **SK-E-F110-7**

21

VIP TEST STAND

1. 36” X 18” X 48”
2. TABLE: 96” X 30” X 34”
3. 110V

22

VACUUM PUMP

1. VIP TEST STAND

23

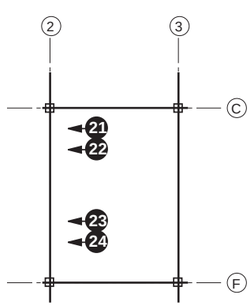
FUME HOOD, 1000 CFM

1. 60” X 36” X 96”
2. USED FOR HANDLING SOLVENTS
3. WATER, HARD PIPED
4. COMPRESSED AIR, HARD PIPED
5. 120V, HARD WIRED

24 **25**

FOAM DIFFUSION UNIT

1. 28” X 30” X 34”
2. 48” X 30” X 34”
3. 120V
4. COMPRESSED AIR



ROOM 244, BUILDING 4508

NOTES:

1. USE SUFFIX E-F110 FOR ALL EQUIPMENT TAGS.
2. ALL ELECTRICAL CONNECTIONS ARE PLUG IN EXCEPT WHERE NOTED.
3. CONTACT KEN WILKES, 574-5931 FOR ADDITIONAL INFORMATION.
4. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
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NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY E-F110
VIP TEST STAND, FUME HOOD,
FOAM DIFFUSION UNIT

JOB NO PDC 0214
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-E-F110-8**

26

DRYING OVEN

1. OVEN: 45” X 67” X 65”
2. FRAME: 45” X 67” X 31”
3. 208V/3PHASE 50 AMP CIRCUIT HARDWIRED (37.4 FLA)

27

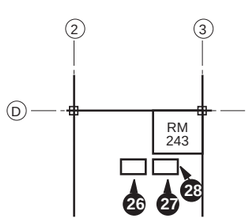
AIR PERMEABILITY TESTER

1. 60” X 60” X 60” ON CASTERS
2. 120V CIRCUIT
3. DRY COMPRESSED AIR

28

COMPRESSED AIR DRYER

1. FOR AIR PERMEABILITY TESTER



ROOM 244, BUILDING 4508

NOTES:

1. USE SUFFIX E-F110 FOR ALL EQUIPMENT TAGS.
2. ALL ELECTRICAL CONNECTIONS ARE PLUG IN EXCEPT WHERE NOTED.
3. CONTACT KEN WILKES, 574-5931 FOR ADDITIONAL INFORMATION.
4. ESTD WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
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1	06/16/03	Added New Room Number			

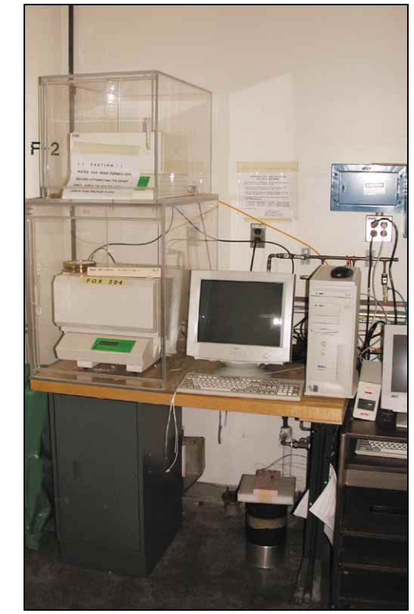
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY E-F110
DRYING OVEN AND AIR PERMEABILITY TABLE

JOB NO PDC 0214
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-E-F110-9**



29

READOUT AND SWITCHES

1. FOR PIPE TESTER
2. 120V

32

ELECTRICAL RESISTIVITY

1. 36” X 24” X 48”
2. 120V

30

POWER SUPPLY

1. 28” X 18” X 62”
2. 208V SINGLE PHASE 231A PLUG

31

PIPE TESTER

1. 36” X 48” X 31”
2. 208V SINGLE PHASE

33 34

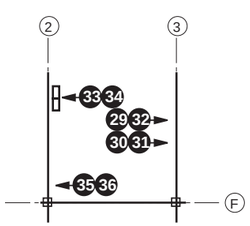
SPECIMEN FREEZERS

1. 36” X 27” X 74”
2. 120V
3. CANNOT BE WITHOUT POWER FOR MORE THAN 2-3 HOURS.

35 36

FOX HEAT FLOW READER

1. 75” X 30” X 72”
2. PROCESS WATER
3. COMPRESSED AIR (RECIRCULATING CHILLER REQUIRED AT E-F110 65-70º SUPPLY WATER TEMPERATURE)
4. 120V
5. DRAIN



ROOM 244, BUILDING 4508

NOTES:

1. USE SUFFIX E-F110 FOR ALL EQUIPMENT TAGS.
2. ALL ELECTRICAL CONNECTIONS ARE PLUG IN EXCEPT WHERE NOTED.
3. CONTACT KEN WILKES, 574-5931 FOR ADDITIONAL INFORMATION.
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NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY E-F110
PIPE TESTER, SMALL HEAT FLOW READER,
ELECTRICAL RESISTIVITY AND SPECIMEN FREEZERS

JOB NO PDC 0214
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-E-F110-10**

37

HOLLYMATIC VACUUM PACKAGER

1. 46” X 64” X 48”
2. 120V
   208V, 30 AMP, 3 PHASE NEMA
   5-30 RECEPTACLE

38

PORTABLE PUMPING STATION

1. 24” X 18” X 53”
2. 120V

39

HEAT SEALER

1. 48” X 34” X 62”
2. 120V
   208 SINGLE PHASE, 20 AMP
   231A RECEPTACLE
3. COMPRESSED AIR

40

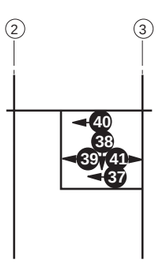
HYDRAULIC PRESS

1. 48” X 36” X 76”
2. 120V

41

WELDER

1. 11” X 17” X 15”
2. 120V



ROOM 243, BUILDING 4508

NOTES:

1. USE SUFFIX E-F110 FOR ALL EQUIPMENT TAGS.
2. ALL ELECTRICAL CONNECTIONS ARE PLUG IN EXCEPT WHERE NOTED.
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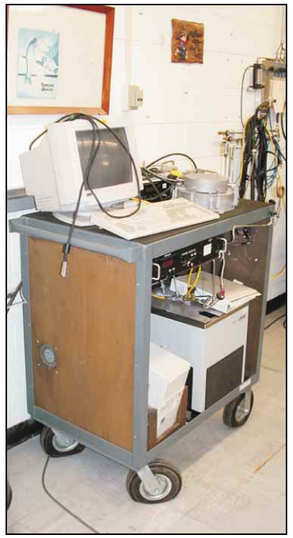
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE
INSULATION LABORATORY E-F110

JOB NO PDC 0214
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-E-F110-11**



42

FOAM DIFFUSION APPARATUS #2

1. 120V
2. COMPRESSED AIR
3. LOCATED IN ROOM 274

43

MISCELLANEOUS STORAGE AND FILING CABINETS

1. LOCATED IN ROOM 250

44 THROUGH 52

NINE FREEZERS

1. LOCATED IN ROOM 265
2. CANNOT BE WITHOUT POWER FOR MORE THAN 2-3 HOURS.

53

INSULATION PANELS

1. LOCATED IN ROOM 224

NOTES:

1. USE SUFFIX E-F110 FOR ALL EQUIPMENT TAGS.
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1	06/16/03	Added New Room Number			

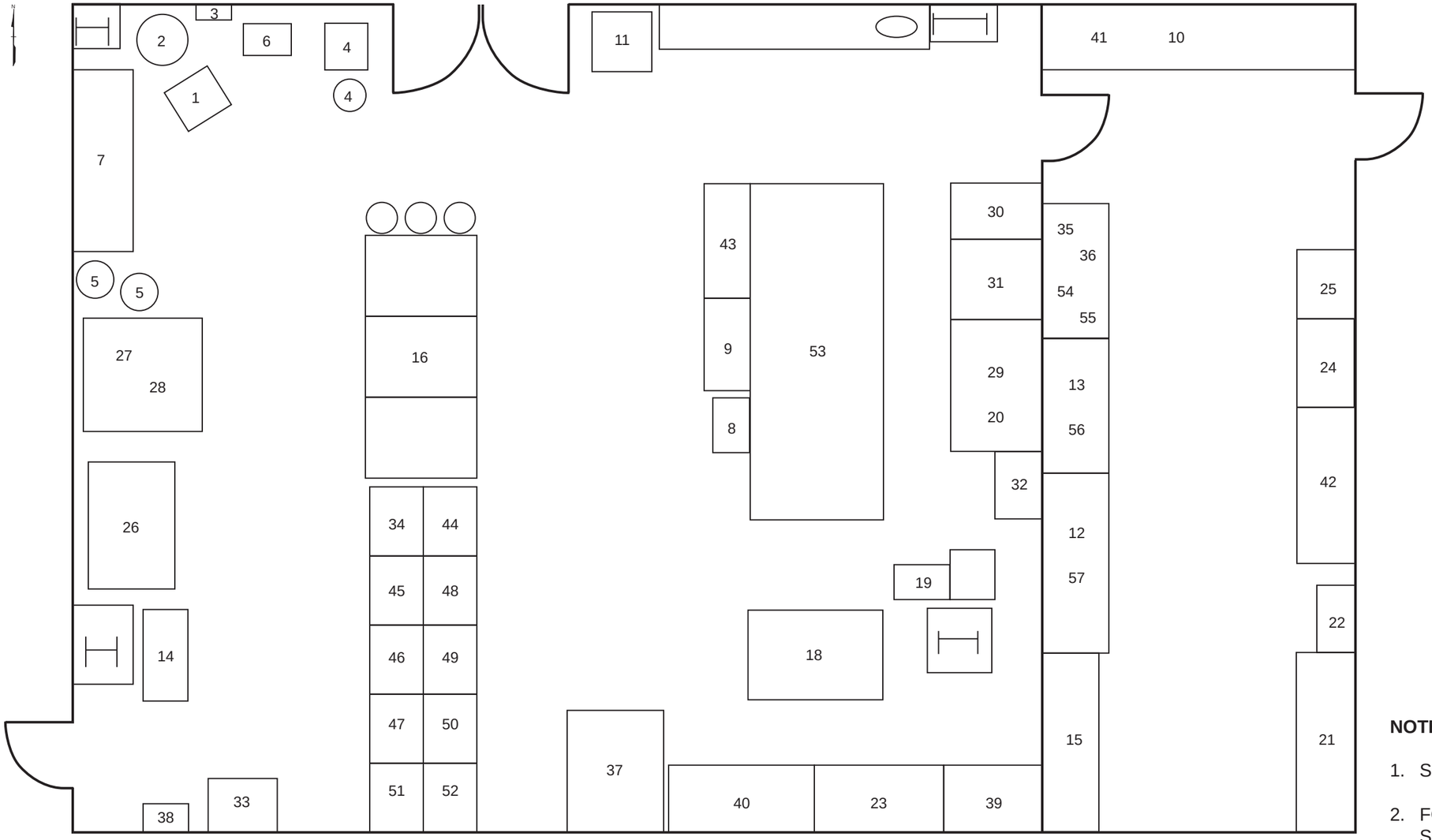
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY E-F110
MISCELLANEOUS EQUIPMENT

JOB NO PDC 0214
DATE 06/16/03
REV NO 1
SCALE NONE
DWG NO **SK-E-F110-12**



NOTES:

1. SEE SK-E-F110-1 & 2 FOR THE EQUIPMENT LIST.
2. FOR MECHANICAL UTILITY REQUIREMENTS SEE SK-E-F110-14.
3. FOR ELECTRICAL UTILITY REQUIREMENTS SEE SK-E-F110-15.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

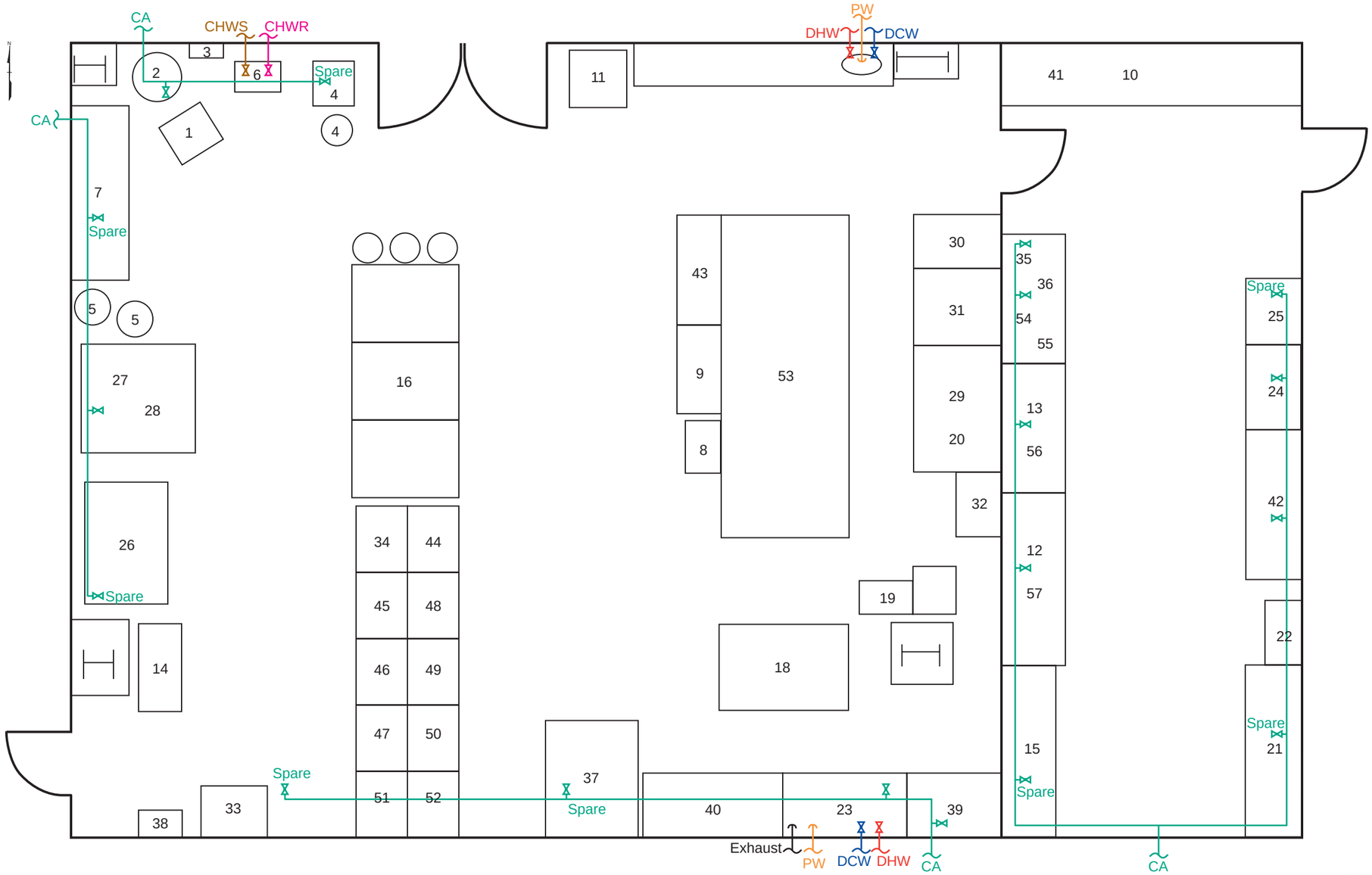
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY ETF ROOM E-F110 EQUIPMENT LAYOUT

JOB NO PDC 0214
DATE 06/16/03
REV NO 1
SCALE 3/16" = 1'0"
DWG NO **SK-E-F110-13**



LEGEND:

CA - COMPRESSED AIR
CHWS - CHILLED WATER SUPPLY
CHWR - CHILLED WATER RETURN
PW - PROCESS WASTE
DHW - DOMESTIC HOT WATER
DCW - DOMESTIC COLD WATER

NOTES:

1. MOUNT SHUT OFF VALVES 36" AFF.
2. SEE SK-E-F110-1 & 2 FOR THE EQUIPMENT LIST.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

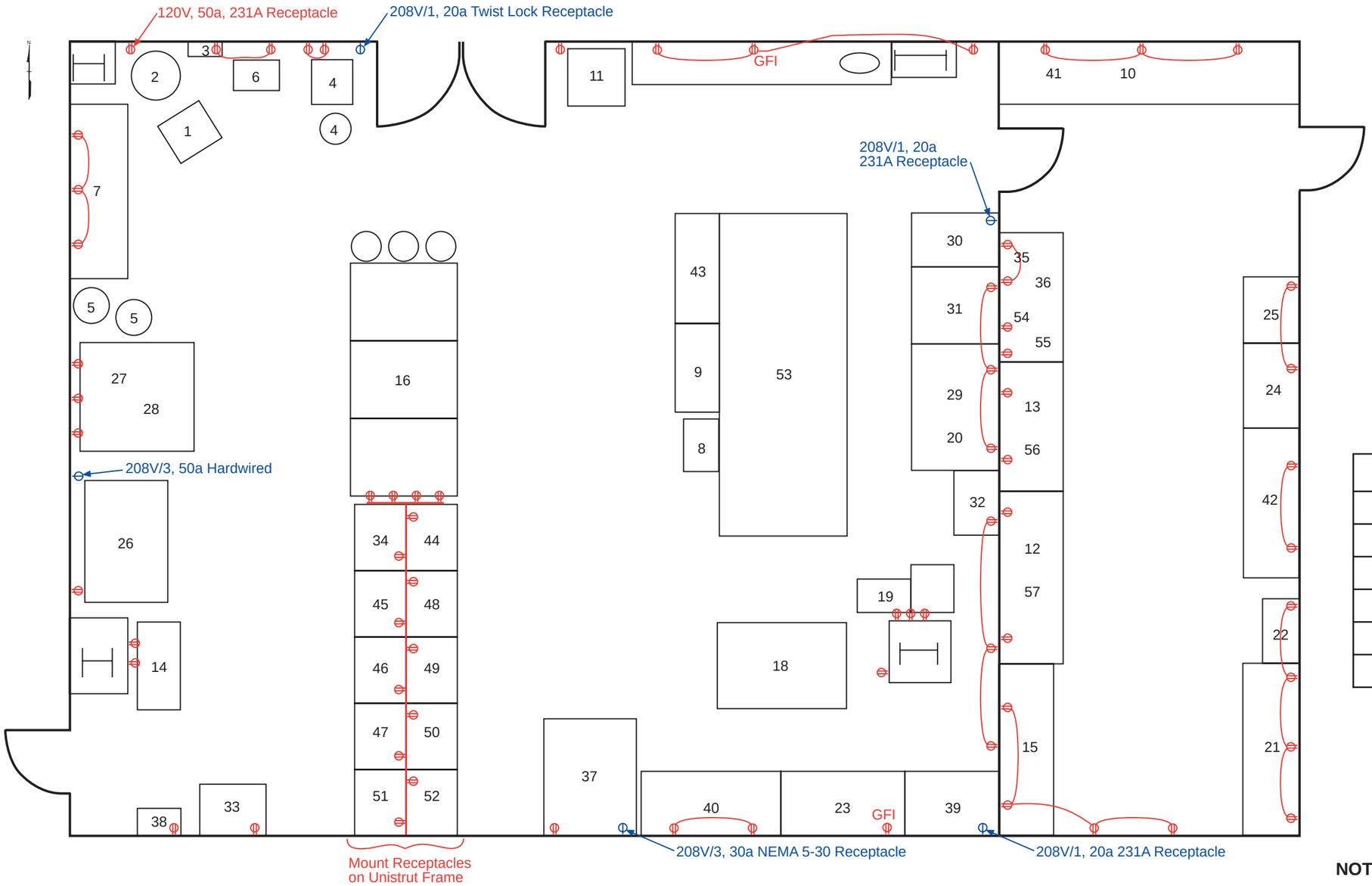
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY ETF ROOM E-F110
MECHANICAL UTILITIES

JOB NO PDC 0214
DATE 06/16/03
REV NO 1
SCALE 3/16" = 1'0"
DWG NO **SK-E-F110-14**



CIRCUITS (SEE NOTE #2)		
QUANTITY	VOLTAGE	AMPS
48	120	20
1	120	50
1	208/3	50
1	208/3	30
2	208/1	20

NOTES:

1. SEE SK-E-F110-1 & 2 FOR THE EQUIPMENT LIST.
2. RECEPTACLES ARE 120V, 15A DUPLEX UNLESS NOTED.

NO	DATE	REVISION	BY	CK	APPR
1	06/16/03	Added New Room Number			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1073

SHEET TITLE

INSULATION LABORATORY ETF ROOM E-F110
ELECTRICAL POWER

JOB NO PDC 0214
DATE 06/16/03
REV NO 1
SCALE 3/16" = 1'0"
DWG NO **SK-E-F110-15**

1

5' x 12' OPTICAL TABLE WITH OVERHEAD RACK AND LASER

2

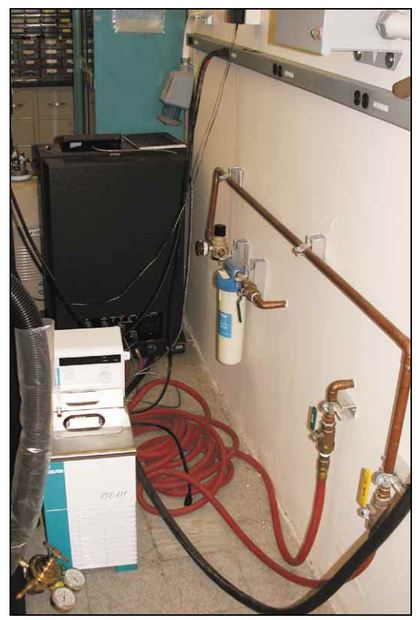
ARGON ION LASER (6' LONG) AND 180 LTR LIQUID NITROGEN DEWAR

3

?

4

GLASS-FRONT STORAGE CABINET & SMALL LIQUID NITROGEN DEWAR



5

LASER POWER SUPPLY WITH COOLING WATER CONNECTION

6

480V, 3 PHASE 100 AMP ELECTRICAL SUPPLY TO LASER

7

STORAGE CABINETS - TOTAL OF 4

NOTES:

1. THE ADVANCED PHOTONICS LAB WILL MOVE FROM 4500S, RM S259 TO NTRC, RM 121.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

BUILDING 4500S, ROOM S259
ADVANCED PHOTONICS LAB
BILL PARTRIDGE

JOB NO	DATE	09/04/03
0214-00001	REV NO	0
SCALE	DWG NO	
NONE		SK-NTRC-L121-1

Equipment to be moved to Composite Characterization Lab E-D109:

TAG E-D109-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
CC1	Calorimeter	36” x 72” x 48”	Y-12 9204-1, 2nd Floor Room 246	SK E-D109-2	SK E-D109-4
CC2	Pycnometer	36” x 60” x 48”	Y-12 9204-1, 2nd Floor Room 246	SK E-D109-2	SK E-D109-4
CC3	Dynamic Mech. Anal.	60” x 96” x 60” plus Liquid N2 Bottle	Y-12 9204-1, 2nd Floor Room 246	SK E-D109-2	SK E-D109-4
CC4	Test Machine	30” x 34” x 70” +Table 36” x 60” x 30”	Y-12 9204-1, 2nd Floor Room 246	SK E-D109-3	SK E-D109-4
CC5	Vacuum Oven #1 and #2	36” x 60” x 60”	Y-12 9204-1, 2nd Floor Room 246	SK E-D109-3	SK E-D109-4
CC6	DCA (3 pieces)	36” x 60” x 48”, 36” x 24” x 60”, 36” x 72” x 48”	Y-12 9204-1, 2nd Floor Room 246	SK E-D109-3	SK E-D109-4
CC7	Chest Freezer	36” x 72” x 36”	Y-12 9204-1, 2nd Floor		
CC8, CC9, CC10, & CC11	Marble (3 each) and Granite (1 each) Tables	24” x 18” x 36”	Y-12 9204-1, 2nd Floor Room 246	None	SK E-D109-4
CC12	Nova 2000 Analyzer Weight: 80 lbs.	20” x 20” x 31”	Y-12 9204-1, 2nd Floor Room 246	None	SK E-D109-4
	Miscellaneous Boxes				
GENERAL					
NEW EQUIPMENT					
	Fume Hood				

COMPOSITE CHARACTERIZATION LAB E-D109 DRAWING INDEX

Drawing No.	Title
SK E-D109-1	Drawing Index and Equipment List
SK E-D109-2	Composite Characterization Lab Disassembly Drawing No. 1
SK E-D109-3	Composite Characterization Lab Disassembly Drawing No. 2
SK E-D109-4	Composite Characterization Lab Installation Drawing

NOTES:

1. Ronnie Lomax (574-3551) will field direct the connection of equipment being moved to the Composite Characterization Lab E-D109.
2. Use E-D109 Suffix for all equipment tags.
3. M&CD will package all loose equipment and will label all equipment and boxes to be moved.
4. M&CD will provide all safety support (IH, H&S, etc.) requierd for the move. M&CD will provide HP surveys or use process knowledge to obtain any required green tags for equipment to be moved to ETF.
5. M&CD will remove all interconnecting wiring between lab equipment prior to the move and wil reconnect this wiring after the move.
6. Equipment lined through or X’d out has been removed from the scope of the move.
7. Electronic lab equipment is very sensitive and care must be given to ensure that physical shock or vibration to the equipment is minimized.

ENGINEERING TECHNOLOGY FACILITY
COMPOSITE CHARACTERIZATION LABORATORY E-D109
MOVE PACKAGE

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1052

SHEET TITLE
COMPOSITE CHARACTERIZATION LABORATORY E-D109 DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D109-1**

1

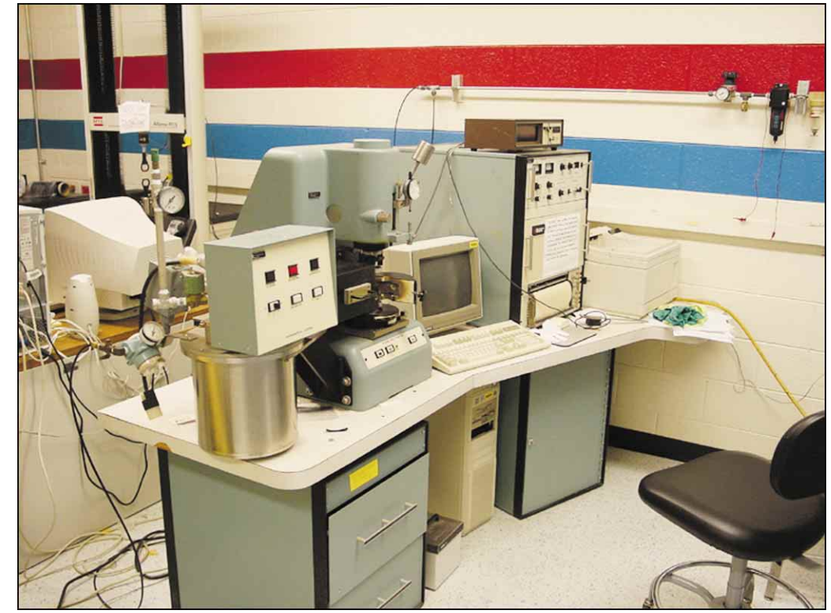
CC1 - CALORIMETER

1. **CAUTION:** EQUIPMENT IS FRAGILE. HANDLE WITH CARE
2. DISCONNECT ALL ELECTRICAL CORDS.
3. DISCONNECT COMPUTER CABLES.
4. DISCONNECT NITROGEN TANK.
5. DISCONNECT COOLING UNIT.
6. PACK EQUIPMENT TO AVOID DAMAGE TO EQUIPMENT DURING TRANSPORT.

2

CC2 - PYCNOMETER

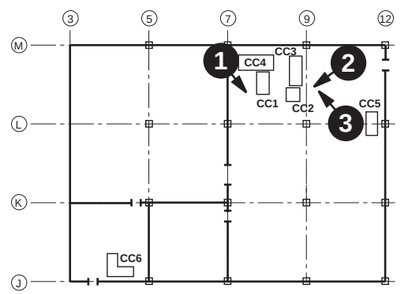
1. **CAUTION:** EQUIPMENT IS FRAGILE. HANDLE WITH CARE
2. DISCONNECT ALL ELECTRICAL CORDS.
3. DISCONNECT COMPUTER CABLES.
4. DISCONNECT HELIUM TANK.
5. PACK EQUIPMENT TO AVOID DAMAGE TO EQUIPMENT DURING TRANSPORT.



3

CC3 - DYNAMIC MECHANICAL ANALYSIS

1. **CAUTION:** EQUIPMENT IS FRAGILE. HANDLE WITH CARE
2. DISCONNECT ALL ELECTRICAL CORDS.
3. DISCONNECT COMPUTER CABLES.
4. DISCONNECT COMPRESSED AIR LINE.
5. PACK EQUIPMENT TO AVOID DAMAGE TO EQUIPMENT DURING TRANSPORT.



PRESENT LOCATION OF EQUIPMENT
Y-12 BUILDING 9204-1, SECOND FLOOR

NOTES:

1. USE SUFFIX E-D109 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1052

SHEET TITLE

COMPOSITE CHARACTERIZATION LAB E-D109
DISASSEMBLY DRAWING NO. 1

JOB NO: PDC 0214
DATE: 06/16/03
REV NO: 2
SCALE: NONE
DWG NO: **SK-E-D109-2**

1

CC4 - TEST MACHINE

1. **CAUTION:** EQUIPMENT IS FRAGILE. HANDLE WITH CARE
2. DISCONNECT ALL ELECTRICAL CORDS.
3. DISCONNECT COMPUTER CABLES.
4. DISCONNECT COMPRESSED AIR LINE.
5. M&CD WILL PACKAGE THE LOAD CELL TO AVOID DAMAGE TO EQUIPMENT DURING TRANSPORT.

2

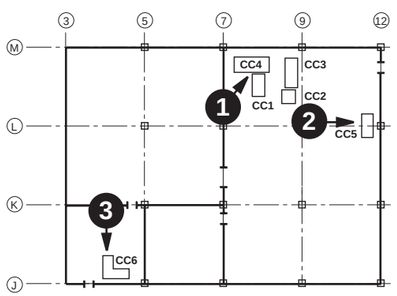
CC5 - VACUUM OVENS #1 AND #2

1. DISCONNECT ALL ELECTRICAL CORDS.
2. DISCONNECT VACUUM PUMP.
3. LEAVE OVENS MOUNTED TO TABLE.

3

CC6 - DCA

1. **CAUTION:** EQUIPMENT IS FRAGILE. HANDLE WITH CARE.
2. DISCONNECT ALL ELECTRICAL CORDS.
3. DISCONNECT COMPUTER CABLES.
4. PACK EQUIPMENT TO AVOID DAMAGE TO EQUIPMENT DURING TRANSPORT.



PRESENT LOCATION OF EQUIPMENT
Y-12 BUILDING 9204-1, SECOND FLOOR

NOTES:

1. USE SUFFIX E-D109 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

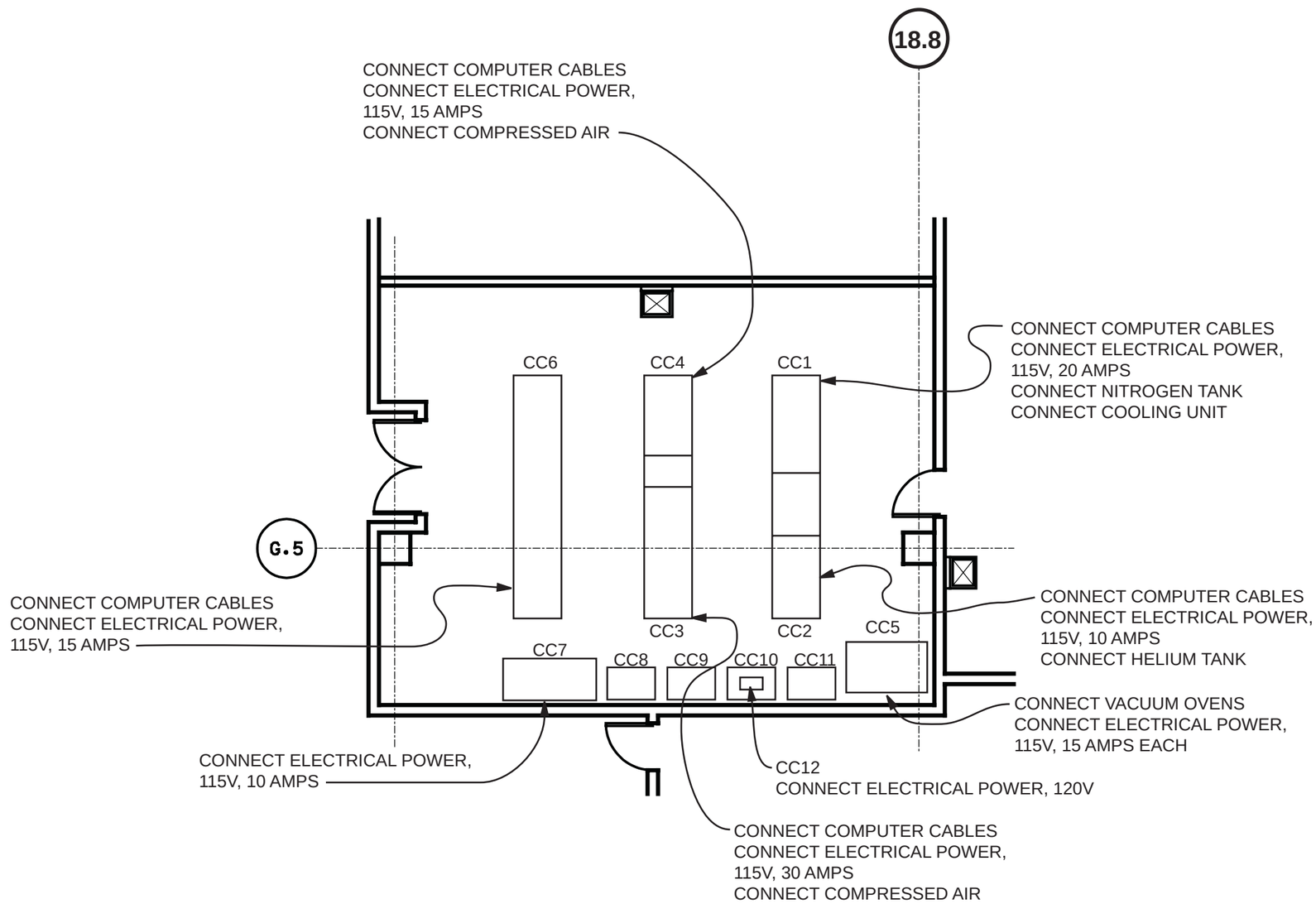
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1052

SHEET TITLE

COMPOSITE CHARACTERIZATION LAB E-D109
DISASSEMBLY DRAWING NO. 2

JOB NO: PDC 0214
DATE: 06/16/03
REV NO: 2
SCALE: NONE
DWG NO: **SK-E-D109-3**



COMPOSITE CHARACTERIZATION LAB FLOOR PLAN

SCALE: 1/8" = 1'-0"

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1052

SHEET TITLE

COMPOSITE CHARACTERIZATION LAB E-D109
INSTALLATION DRAWING NO. 1

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE 1/8"=1'-0"
DWG NO **SK-E-D109-4**

Equipment to be moved to Composite Stress Life Lab E-D104:

TAG E-D104-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
CS1	Strand Test Chamber and Meters Bangor/EGC	168” x 192” x 168”	Y-12 9204-1, 2nd Floor Room 247	SK E-D104-2	SK E-D104-4
CS2	Dryer for Item CS1 Dwyer LHS 300	48” x 48” x 36”	Y-12 9204-1, 2nd Floor Room 247	SK E-D104-2	SK E-D104-4
CS3	Heat Pump for CS1 Copeland	36” x 60” x 36”	Y-12 9204-1, 2nd Floor Room 247	SK E-D104-2	SK E-D104-4
CS4	Strip Heaters for CS1		Y-12 9204-1, 2nd Floor Room 247	SK E-D104-2	SK E-D104-4
CS5	Load Frame #1 thru #10 ATS/20K	48” x 48” x 120”	Y-12 9204-1, 2nd Floor Room 247	SK E-D104-3	SK E-D104-4
CS6	Creep Frame #1 thru #4 ATS/1.2K	24” x 72” x 144”	Y-12 9204-1, 2nd Floor Room 247	SK E-D104-3	SK E-D104-4
CS7	Creep Frame #5 ATS/1.2K	24” x 72” x 144”	Y-12 9204-1, 2nd Floor Room 246	SK E-D104-3	SK E-D104-4
CS8	Data Acquisition	24” x 36” x 60”	Y-12 9204-1, 2nd Floor Room 247	SK E-D104-3	SK E-D104-4
CS9	Chest Freezer Kenmore	36” x 72” x 36”	Y-12 9204-1, 2nd Floor		SK E-D104-4
GENERAL					
NEW EQUIPMENT					

COMPOSITE STRESS LIFE LAB E-D104 DRAWING INDEX

Drawing No.	Title
SK E-D104-1	Drawing Index and Equipment List
SK E-D104-2	Composite Stress Life Lab Disassembly Drawing No. 1
SK E-D104-3	Composite Stress Life Lab Disassembly Drawing No. 2
SK E-D104-4	Composite Stress Life Lab Installation Drawing

NOTES:

1. Ronnie Lomax (574-3551) will field direct the connection of equipment being moved to the Composite Stress Life Lab E-D104.
2. Use E-D104 Suffix for all equipment tags.
3. M&CD will package all loose equipment and will label all equipment and boxes to be moved.
4. M&CD will provide all safety support (IH, H&S, etc.) required for the move. M&CD will provide HP surveys or use process knowledge to obtain any required green tags for equipment to be moved to ETF.
5. M&CD will remove all interconnecting wiring between lab equipment prior to the move and will reconnect this wiring after the move.
6. Equipment lined through or X’d out has been removed from the scope of the move.
7. Electronic lab equipment is very sensitive and care must be given to ensure that physical shock or vibration to the equipment is minimized.

ENGINEERING TECHNOLOGY FACILITY
COMPOSITE STRESS LIFE LABORATORY E-D104
MOVE PACKAGE

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1039

SHEET TITLE
COMPOSITE STRESS LIFE LABORATORY E-D104
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D104-1**

1

CS1 - STRAND TEST CHAMBER AND METERS

1. **CAUTION:** ELECTRICAL METERS ARE FRAGILE. HANDLE WITH CARE.
2. TAG AND DISCONNECT ELECTRICAL INSTRUMENT WIRING FROM METERS.
3. DISCONNECT ELECTRICAL POWER FROM THE TEST CHAMBER.
4. REMOVE REFRIGERATE FROM THE REFRIGERATION SYSTEM.
5. DISCONNECT REFRIGERATE PIPING FROM THE TEST CHAMBER.
6. REMOVE EVAPORATOR UNIT FROM THE TEST CHAMBER.
7. DISCONNECT THE DRYER FROM THE TEST CHAMBER.
8. LABEL THE PANELS OF THE TEST CHAMBER TO FACILITATE REASSEMBLY.
9. DISMANTLE THE TEST CHAMBER FOR RELOCATION TO ETF ROOM E-D104.

2

INSTRUMENTATION FOR THE STRAND TEST CHAMBER

1. **CAUTION:** INSTRUMENTATION IS FRAGILE. HANDLE WITH CARE.
2. TAG AND DISCONNECT WIRING.
3. REMOVE INSTRUMENTATION FROM THE TEST CHAMBER.

3

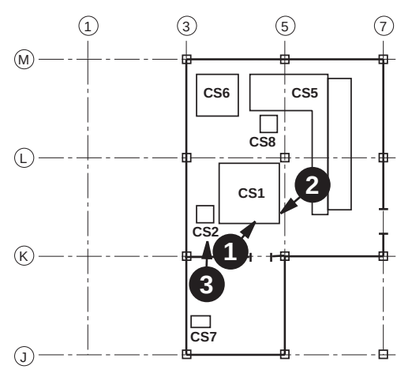
CS2 - DRYER FOR THE STRAND TEST CHAMBER

1. DISCONNECT ELECTRICAL POWER FROM THE DRYER.
2. DISCONNECT THE DRYER FROM THE TEST CHAMBER.

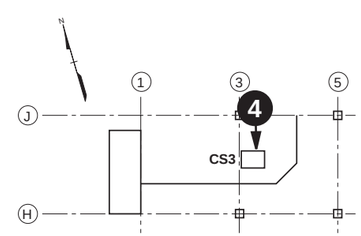
4

CS3 - HEAT PUMP FOR THE STRAND TEST CHAMBER

1. DISCONNECT ELECTRICAL POWER FROM THE HEAT PUMP UNIT.
2. REMOVE REFRIGERATE FROM THE HEAT PUMP UNIT.
3. DISCONNECT REFRIGERATE PIPING FROM THE HEAT PUMP UNIT.



Y-12 BUILDING 9204-1, SECOND FLOOR



Y-12 BUILDING 9204-1,
SECOND FLOOR MEZZANINE

NOTES:

1. USE SUFFIX E-D104 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1039

SHEET TITLE

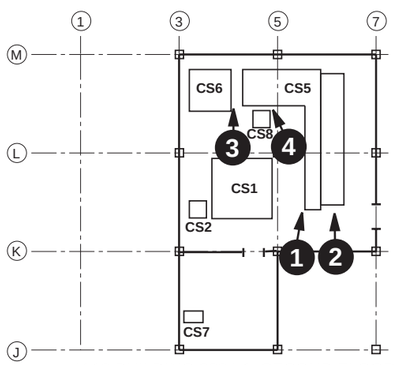
COMPOSITE STRESS LIFE LAB E-D104
DISASSEMBLY DRAWING NO. 1

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D104-2**

1

CS5 - LOAD FRAME #1 THROUGH #10

1. DISCONNECT ELECTRICAL POWER.
2. TAG AND DISCONNECT INSTRUMENT WIRING.
3. DISCONNECT COOLING WATER FROM LOAD FRAMES #9 AND #10.



Y-12 BUILDING 9204-1, SECOND FLOOR

2

CS5 - COOLING UNITS FOR LOAD FRAMES #1 THROUGH #8

3

CS6 AND CS7 - CREEP FRAMES #1 THROUGH #5

1. **CAUTION:** CREEP FRAMES AND INSTRUMENTATION ARE FRAGILE. HANDLE WITH CARE.
2. DISCONNECT ELECTRICAL POWER.
3. TAG AND DISCONNECT INSTRUMENT WIRING.
4. REMOVE WEIGHTS.

4

CS8 - DATA ACQUISITION

1. DISCONNECT ELECTRICAL POWER.
2. TAG AND DISCONNECT INSTRUMENTATION WIRING.

NOTES:

1. USE SUFFIX E-D104 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

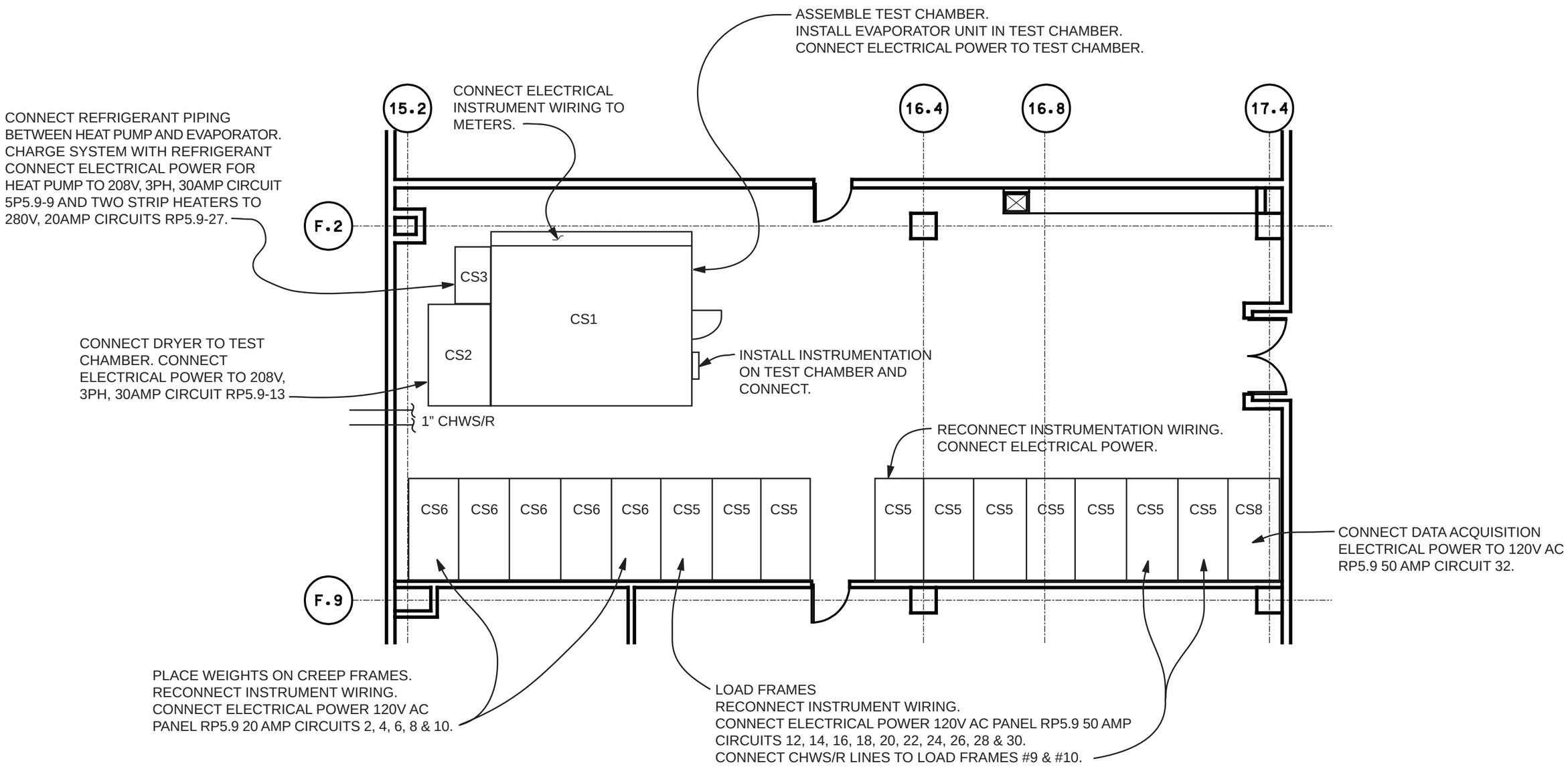
PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: E1039

SHEET TITLE

COMPOSITE STRESS LIFE LAB E-D104 DISASSEMBLY DRAWING NO. 2

JOB NO PDC 0214	DATE 06/16/03
	REV NO 2
SCALE NONE	DWG NO **SK-E-D104-3**



COMPOSITE STRESS LAB FLOOR PLAN

SCALE: 1/8" = 1'-0"

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1039

SHEET TITLE

COMPOSITE STRESS LIFE LAB E-D104
INSTALLATION DRAWING NO. 1

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE 1/8"=1'-0"
DWG NO **SK-E-D104-4**

Equipment to be moved to Plasma Processing E-C101:

TAG E-C101-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
PP1	Instrument Rack	22” x 22” x 58”	Y-12 9201-2 2nd Floor	SK-E-C101-2	SK-E-C101-12
PP2	Instrument Rack	24” x 22” x 42”	Y-12 9201-2 2nd Floor	SK-E-C101-2	SK-E-C101-12
PP3	Chamber Number 1	27” x 24” x 34”	Y-12 9201-2 2nd Floor	SK-E-C101-2	SK-E-C101-12
PP4	Chamber Number 2	22” x 22” x 33”	Y-12 9201-2 2nd Floor	SK-E-C101-2	SK-E-C101-12
PP5	Balzer Turbo Pump	15” x 15” x 18”	Y-12 9201-2 2nd Floor	SK-E-C101-2	SK-E-C101-12
PP6	Valve	15” x 8” x 20”	Y-12 9201-2 2nd Floor	SK-E-C101-2	SK-E-C101-12
PP7	Leybold Trivac Roughing Pump	15” x 15” x 29”	Y-12 9201-2 2nd Floor	SK-E-C101-2	SK-E-C101-12
PP8	Vacuum Pump	10” x 15” x 20”	Y-12 9201-2 2nd Floor	SK-E-C101-2	SK-E-C101-12
PP9	Heater Circulator	18” x 13” x 20”	Y-12 9201-2 2nd Floor	SK-E-C101-2	SK-E-C101-12
PP10	Leybold Vacuum Pump and Stand	25” x 38” x 49”	Y-12 9201-2 2nd Floor	SK-E-C101-3	SK-E-C101-12
PP11	Optical Table	48” x 96” x 2.5”	Y-12 9201-2 2nd Floor	SK-E-C101-3	SK-E-C101-12
PP12	Base Unit for Optical Table (2)	36” x 24” x 36”	Y-12 9201-2 2nd Floor	SK-E-C101-3	SK-E-C101-12
PP13	Base Unit for Optical Table (2)	48” x 24” x 36”	Y-12 9201-2 2nd Floor	SK-E-C101-3	SK-E-C101-12
PP14	Computer and Table	25” x 38” x 49”	Y-12 9201-2 2nd Floor	SK-E-C101-4	SK-E-C101-12
PP15	Desk	72” x 30” x 34”	Y-12 9201-2 2nd Floor	SK-E-C101-4	SK-E-C101-12
PP16	Instrument Rack	24” x 22” x 84”	Y-12 9201-2 2nd Floor	SK-E-C101-4	SK-E-C101-12
PP17	Rack	60” x 25” x 48”	Y-12 9201-2 2nd Floor	SK-E-C101-4	SK-E-C101-12
PP18	Instrument Rack	24” x 22” x 72”	Y-12 9201-2 2nd Floor	SK-E-C101-4	SK-E-C101-12
PP19	Storage Cabinets	36” x 18” x 78”	Y-12 9201-2 2nd Floor	SK-E-C101-5	SK-E-C101-12
PP20	Silane Tubing	12’ x 1.5”, 4’ x 1.5”, 4’ x 1.5”, 3’ x 3”	Y-12 9201-2 2nd Floor	SK-E-C101-5	SK-E-C101-12
PP21	Nelab Refrigeration Unit	16” x 14” x 21”	Y-12 9201-2 2nd Floor	SK-E-C101-5	SK-E-C101-12
PP22	Jarren Ash Monochronometer	26” x 12” x 10”	Y-12 9201-2 2nd Floor	SK-E-C101-6	SK-E-C101-12
PP23	Silane Gas Storage Cabinet	18” x 18” x 30”	Y-12 9201-2 2nd Floor	SK-E-C101-6	SK-E-C101-12
PP24	VWR Scientific Water Cooler	36” x 16” x 26”	Y-12 9201-2 2nd Floor	SK-E-C101-6	SK-E-C101-12
GENERAL					
	Wooden Boxes (12)	4’ x 2’ x 2’	Y-12 9201-2 2nd Floor	NA	NA
	Wooden Boxes (1)	12’ x 2’ x 2’	Y-12 9201-2 2nd Floor	NA	NA
	Cardboard Boxes		Y-12 9201-2 2nd Floor	NA	NA

PLASMA PROCESSING LAB E-C101 DRAWING INDEX

Drawing No.	Title
SK-E-C101-1	Drawing Index and Equipment List
SK-E-C101-2	Plasma Processing Disassembly Drawing
SK-E-C101-3	Plasma Processing Disassembly Drawing
SK-E-C101-4	Plasma Processing Disassembly Drawing
SK-E-C101-5	Plasma Processing Disassembly Drawing
SK-E-C101-6	Plasma Processing Disassembly Drawing
SK-E-C101-12	Lab Installation Drawing (To Be Added Later)

NOTES:
1. USE SUFFIX E-C101 FOR ALL EQUIPMENT TAGS.

PLASMA PROCESSING LAB

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

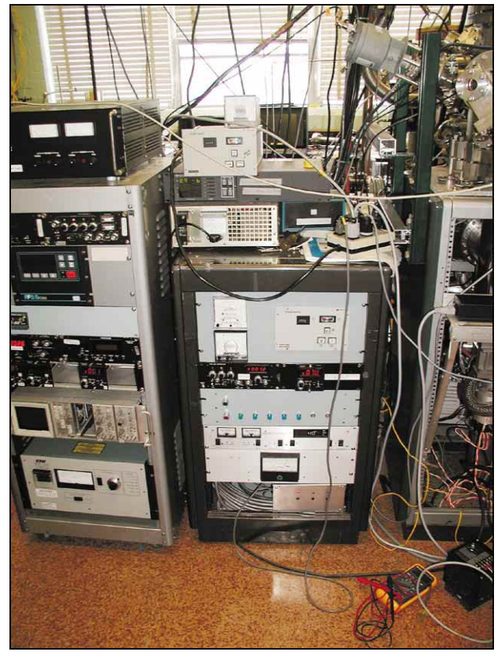
RF-3D, SCAN/PLASMA PROCESSING LAB DRAWING INDEX AND EQUIPMENT LIST

JOB NO 0214-00001
DATE 09/04/03
REV NO 0
SCALE NONE
DWG NO **SK-E-C101-1**

1

PP1 - INSTRUMENT RACK

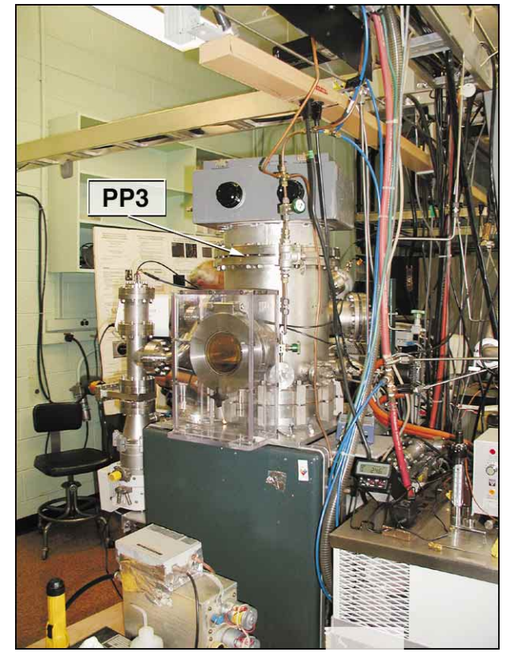
1. INSTRUMENT RACK WILL BE DISCONNECTED AND READY TO MOVE BY THE MOVE CONTRACTOR.



2

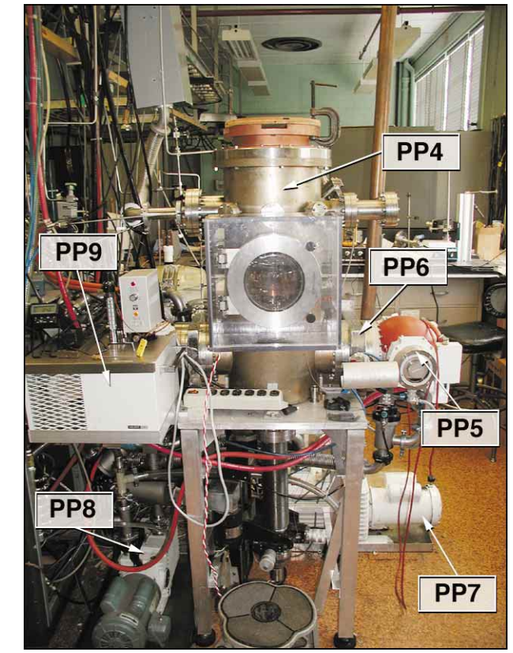
PP1 - INSTRUMENT RACK

1. INSTRUMENT RACK WILL BE DISCONNECTED AND READY TO MOVE BY THE MOVE CONTRACTOR.



3

PP3 - CHAMBER 1



4

PP4 - CHAMBER 2

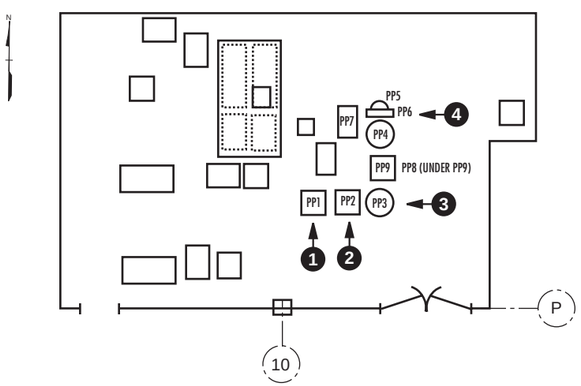
PP5 - BALZER TURBO PUMP

PP6 - VALVE

PP7 - LEYBOLD TRIVAC ROUGHING PUMP

PP8 - VACUUM PUMP

PP9 - HEATER CIRCULATOR



BUILDING 9201-2, SECOND FLOOR
ROOM 228

PLASMA PROCESSING LAB

NOTES:
1. USE SUFFIX E-C101 FOR ALL EQUIPMENT TAGS.

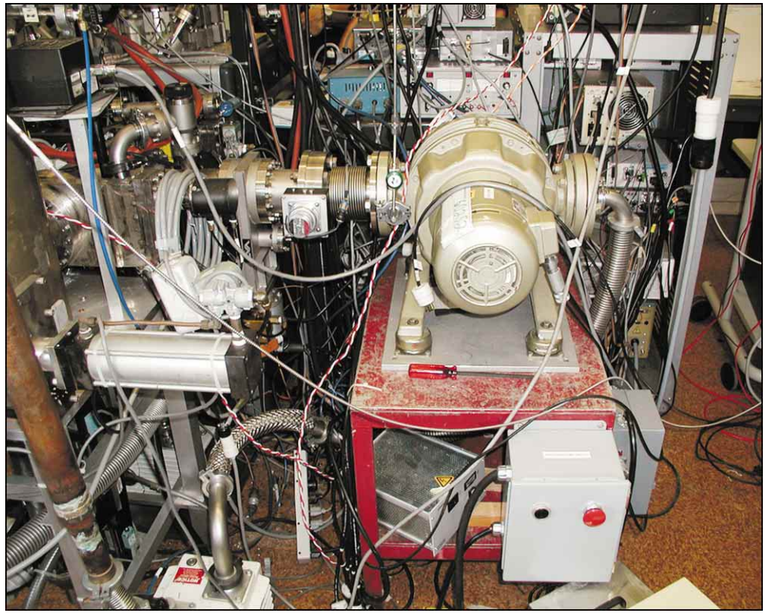
NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

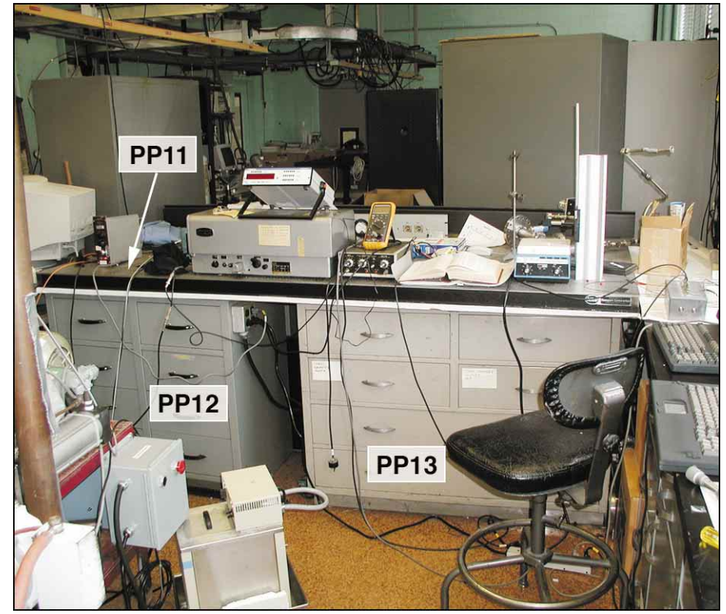
RF-3D, SCAN/PLASMA PROCESSING LAB
DISASSEMBLY DRAWING NO. 2

JOB NO 0214-00001	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-C101-2**



5

PP10 - LEYBOLD VACUUM PUMP AND STAND



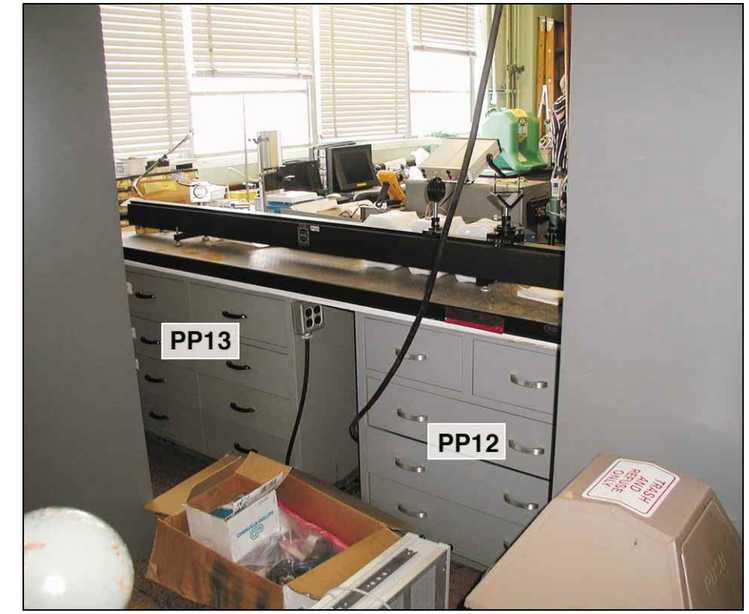
6

PP11 - OPTICAL TABLE

1. WEIGHS 300 POUNDS.

PP12 - BASE UNIT FOR OPTICAL TABLE

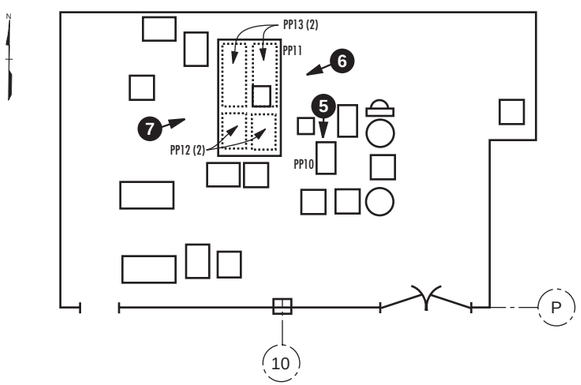
PP13 - BASE UNIT FOR OPTICAL TABLE



7

PP12 - BASE UNIT FOR OPTICAL TABLE

PP13 - BASE UNIT FOR OPTICAL TABLE



BUILDING 9201-2, SECOND FLOOR
ROOM 228

PLASMA PROCESSING LAB

NOTES:
1. USE SUFFIX E-C101 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

RF-3D, SCAN/PLASMA PROCESSING LAB
DISASSEMBLY DRAWING NO. 3

JOB NO	DATE	09/04/03
0214-00001	REV NO	0
SCALE	DWG NO	
NONE		**SK-E-C101-3**

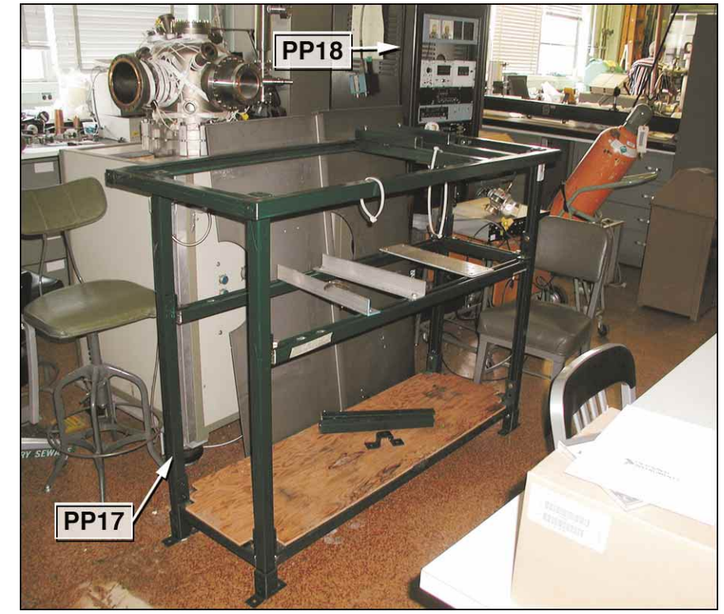
8

PP14 - COMPUTER AND TABLE

9

PP15 - DESK

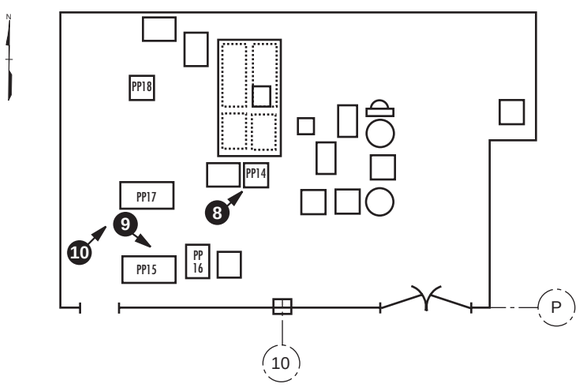
PP16 - INSTRUMENT RACK



10

PP17 - RACK

PP18 - INSTRUMENT RACK



BUILDING 9201-2, SECOND FLOOR
ROOM 228

PLASMA PROCESSING LAB

NOTES:
1. USE SUFFIX E-C101 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

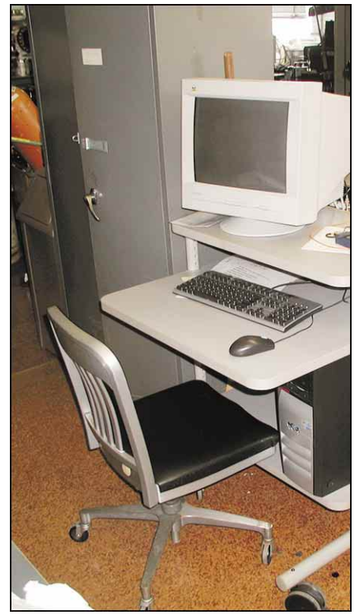
SHEET TITLE

RF-3D, SCAN/PLASMA PROCESSING LAB
DISASSEMBLY DRAWING NO. 4

JOB NO 0214-00001	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO SK-E-C101-4

11

PP19 - STORAGE CABINETS



12

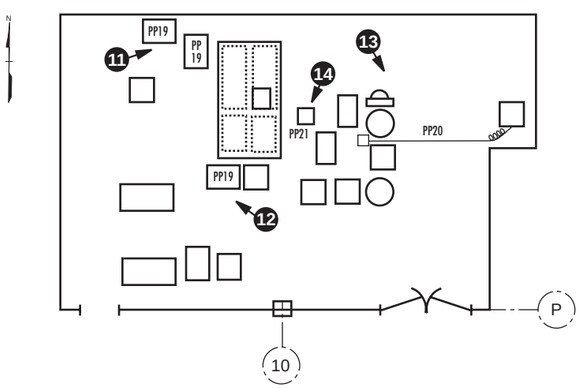
PP19 - STORAGE CABINET

13

PP20 - SILANE TUBING

14

PP21 - NELAB REFRIGERATION UNIT



BUILDING 9201-2, SECOND FLOOR
ROOM 228

PLASMA PROCESSING LAB

NOTES:
1. USE SUFFIX E-C101 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

RF-3D, SCAN/PLASMA PROCESSING LAB
DISASSEMBLY DRAWING NO. 5

JOB NO 0214-00001	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-C101-5**

15

PP22 - JARREN ASH MONOCHRONOMETER

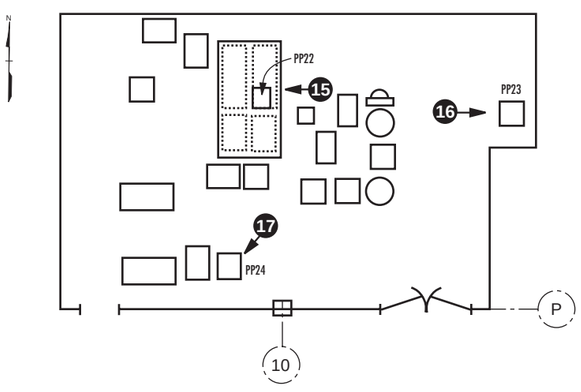
16

PP23 - SILANE GAS STORAGE CABINET

17

PP24 - VWR SCIENTIFIC WATER COOLER

1. THIS PIECE OF EQUIPMENT IS FRAGILE AND WILL REQUIRE SPECIAL HANDLING.



BUILDING 9201-2, SECOND FLOOR
ROOM 228

PLASMA PROCESSING LAB

NOTES:
1. USE SUFFIX E-C101 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

RF-3D, SCAN/PLASMA PROCESSING LAB
DISASSEMBLY DRAWING NO. 6

JOB NO 0214-00001	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-C101-6**

Equipment to be moved to Liquid Jet E-C101:

TAG E-C101-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
LJ1	Optical Table	14’ x 5’ x 40”	Y-12 9201-2 2nd Floor	SK-E-C101-8	SK-E-C101-12
LJ2	Glass Tube	12’ x 12” Dia.	Y-12 9201-2 2nd Floor	SK-E-C101-8	SK-E-C101-12
LJ3	Compuer and Table	48” x 28” x 48”	Y-12 9201-2 2nd Floor	SK-E-C101-8	SK-E-C101-12
LJ4	Instrument Rack	18” x 22” x 72”	Y-12 9201-2 2nd Floor	SK-E-C101-8	SK-E-C101-12
LJ5	Glass Front Storage Cabinet	48” x 17” x 84”	Y-12 9201-2 2nd Floor	SK-E-C101-8	SK-E-C101-12
LJ6	Optical Table	12’ x 4’ x 75”	Y-12 9201-2 2nd Floor	SK-E-C101-9	SK-E-C101-12
LJ7	Optical Table	8’ x 4’ x 75”	Y-12 9201-2 2nd Floor	SK-E-C101-9	SK-E-C101-12
LJ8	Storage Cabinet	36” x 18” x 72”	Y-12 9201-2 2nd Floor	SK-E-C101-9	SK-E-C101-12
LJ9	Storage Cabinet	38” x 18” x 78”	Y-12 9201-2 2nd Floor	SK-E-C101-9	SK-E-C101-12
LJ10	Oscilloscope Cart	24” x 30” x 48”	Y-12 9201-2 2nd Floor	SK-E-C101-9	SK-E-C101-12
GENERAL					
	Boxes (3)	4’ x 2’ x 2’	Y-12 9201-2 2nd Floor	NA	NA
	Boxes (1)	12’ x 2’ x 2’	Y-12 9201-2 2nd Floor	NA	NA
	Cardboard Boxes		Y-12 9201-2 2nd Floor	NA	NA
NEW EQUIPMENT					

LIQUID JET LAB E-C101 DRAWING INDEX

Drawing No.	Title
SK-E-C101-7	Drawing Index and Equipment List
SK-E-C101-8	Liquid Jet Disassembly Drawing
SK-E-C101-9	Liquid Jet Disassembly Drawing
SK-E-C101-12	Lab Installation Drawing

NOTES:
1. USE SUFFIC E-C101 FOR ALL EQUIPMENT TAGS.

LIQUID JET LAB

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

RF-3D, SCAN/PLASMA PROCESSING LAB
DRAWING INDEX AND EQUIPMENT LIST

JOB NO 0214-00001

DATE 09/04/03

REV NO 0

SCALE NONE

DWG NO **SK-E-C101-7**

1

LJ1 - OPTICAL TABLE

1. TABLE WEIGHS 2500 POUNDS.

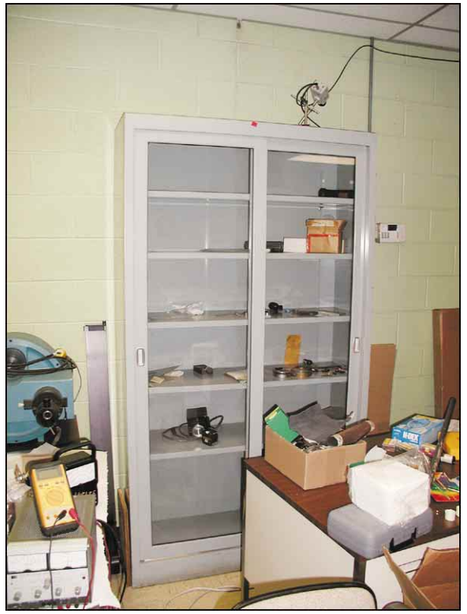
LJ2 - GLASS TUBE

1. GLASS TUBE IS FRAGILE AND WILL REQUIRE SPECIAL HANDLING.

2

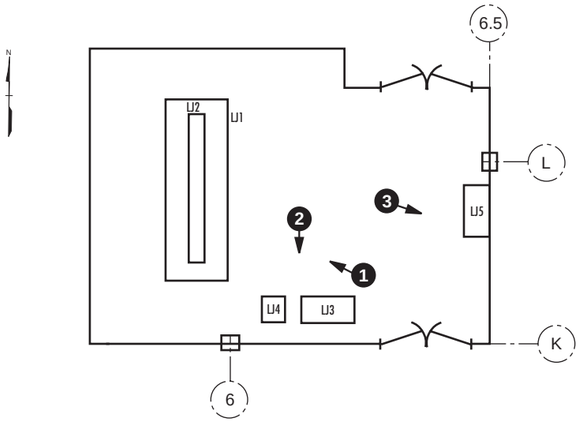
LJ3 - COMPUTER AND TABLE

LJ4 - INSTRUMENT RACK



3

LJ5 - GLASS FRONT STORAGE CABINET



BUILDING 9201-2, SECOND FLOOR
ROOM 235

LIQUID JET LAB

NOTES:
1. USE SUFFIX E-C101 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

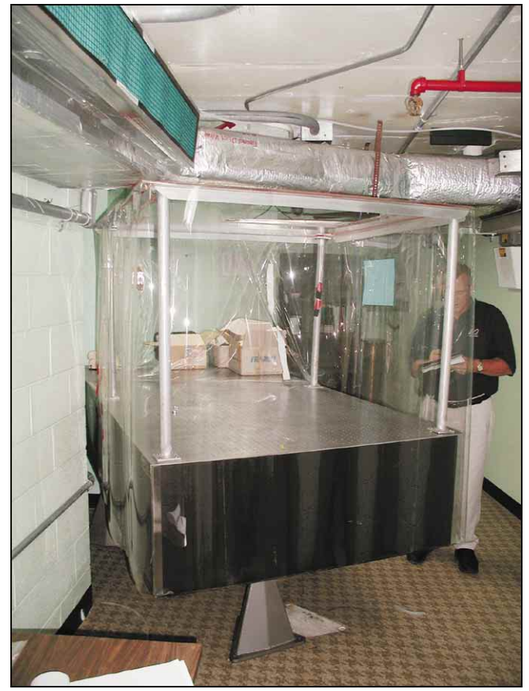
RF-3D, SCAN/PLASMA PROCESSING LAB
DISASSEMBLY DRAWING NO. 7

JOB NO 0214-00001	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO **SK-E-C101-8**

1

LJ6 - OPTICAL TABLE

1. TABLE WEIGHS 2500 POUNDS.



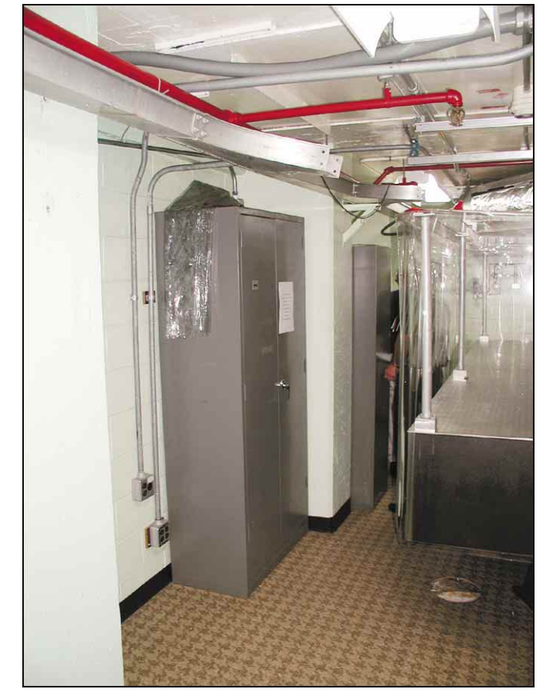
2

LJ7 - OPTICAL TABLE

1. TABLE WEIGHS 1500 POUNDS.

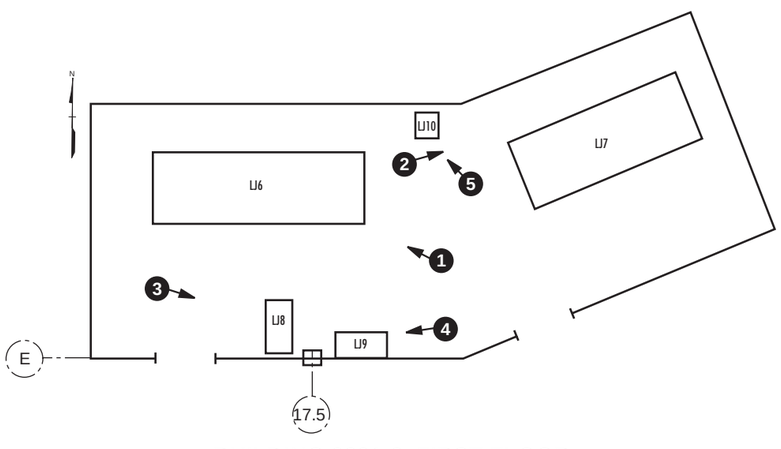
3

LJ8 - STORAGE CABINET



4

LJ9 - STORAGE CABINET



BUILDING 9201-2, FIRST FLOOR
ROOM 161-A

LIQUID JET LAB

5

LJ10 - OSCILLOSCOPE CART

NOTES:
1. USE SUFFIX E-C101 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

RF-3D, SCAN/PLASMA PROCESSING LAB
DISASSEMBLY DRAWING NO. 8

JOB NO	DATE	09/04/03
0214-00001	REV NO	0
SCALE	DWG NO	
NONE		**SK-E-C101-9**

Equipment to be moved to RF Mapping E-C101:

TAG E-C101-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
RFM1	Frame	72” x 72” x 92”	Y-12 9201-2 2nd Floor	SK-E-C101-11	SK-E-C101-12
RFM2	Frame	117” x 60” x 144”	Y-12 9201-2 2nd Floor	SK-E-C101-11	SK-E-C101-12
RFM3	Table	60” x 36” x 30”	Y-12 9201-2 2nd Floor	SK-E-C101-11	SK-E-C101-12
RFM4	Table	36” x 30” x 30”	Y-12 9201-2 2nd Floor	SK-E-C101-11	SK-E-C101-12
GENERAL					
	Box (1)	4’ x 2’ x 2’	Y-12 9201-2 2nd Floor	NA	NA
	Cardboard Boxes		Y-12 9201-2 2nd Floor	NA	NA
NEW EQUIPMENT					

RF MAPPING LAB E-C101 DRAWING INDEX

Drawing No.	Title
SK-E-C101-10	Drawing Index and Equipment List
SK-E-C101-11	RF Mapping Disassembly Drawing
SK-E-C101-12	Lab Installation Drawing

NOTES:
1. USE SUFFIX E-C101 FOR ALL EQUIPMENT TAGS.

RF MAPPING LAB

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

RF-3D, SCAN/PLASMA PROCESSING LAB
DRAWING INDEX AND EQUIPMENT LIST

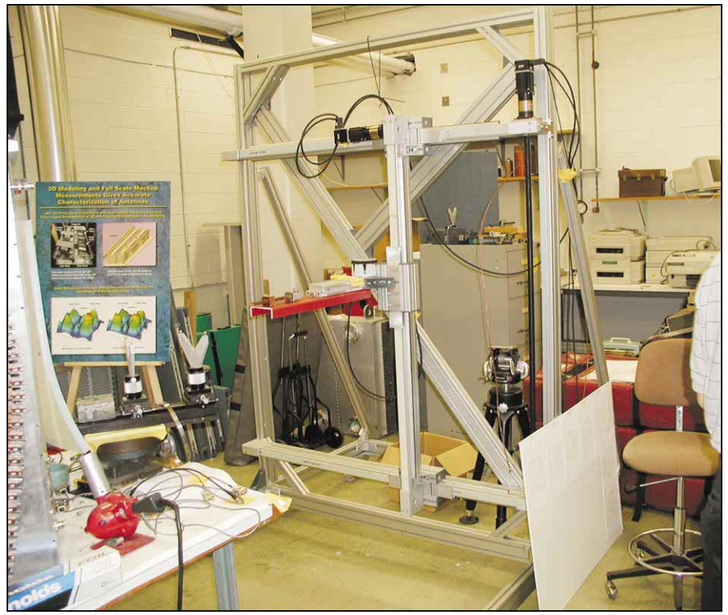
JOB NO 0214-00001

DATE 09/04/03

REV NO 0

SCALE NONE

DWG NO **SK-E-C101-10**



1

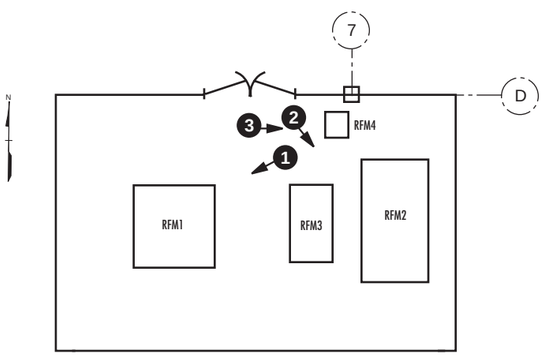
RFM1 - FRAME

2

RFM2 - FRAME
RFM3 - TABLE

3

RFM4 - TABLE



BUILDING 9201-2, SECOND FLOOR
ROOM 2026

RF MAPPING LAB

NOTES:
1. USE SUFFIX E-C101 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

RF-3D, SCAN/PLASMA PROCESSING LAB
DISASSEMBLY DRAWING NO. 9

JOB NO	DATE	09/04/03
0214-00001	REV NO	0
SCALE	DWG NO	
NONE		**SK-E-C101-11**

Equipment to be moved to Isotopes Chemistry Lab Rooms 203, 205 and 119 Bldg 5500:

Tag 5500	Equipment Name Description/Model	W x L x H (Inches)	Present Location	New Location	Electrical V / Ph / Watts	CW	AIR	O2	IG	FG
ICL1	Balance, Electronic (6)	2.5 X 2	Y-12 Bldg 9204-1	Rm 203 (2), 204a (3), 205 (1)	120 / 1 / 9.6					
ICL2	Band Saw, 14" (Hood)	3 X 2	Y-12 Bldg 9204-1	Rm 203 hood	120 / 1 / 1000					
ICL3	Centrifuge, Bench (2)	1.5 X 1.5 (bench)	Y-12 Bldg 9204-1	Rm 205	120 / 1 / 500					
ICL4	Centrifuge, Floor (2)	3 X 3	Y-12 Bldg 9204-1	Mobile (203 & 205)	120 / 1 / 805					
ICL5	Crucible Furnace	3 X 3	Y-12 Bldg 9204-1	Rm 119	240 / 1 / 10400			X	X	
ICL6	Flammable Storage	3 X 1.5	Y-12 Bldg 9204-1	Rm 203 (in hood base)						
ICL7	Furnace Tube Storage	5 X 3	Y-12 Bldg 9204-1	Rm 119						
ICL8	Gas Cylinders (4)	1 X 1	Y-12 Bldg 9204-1	Rm 119 (or outside if possible)				X	X	X
ICL9	Glassware Storage (5)	4 X 1.5	Y-12 Bldg 9204-1	Rm 203 (2), 205 (3)						
ICL10	Glass Working Station	4 X 3	Y-12 Bldg 9204-1	NA (**Bldg 5510**)				X		NAT
ICL11	Hot plate/Stirrer (4)	2 X 2 (bench)	Y-12 Bldg 9204-1	Rm 203 hoods (2), 205 hoods (2)	120 /1 /1113					
ICL12	Hot Plate (Hood)	3 X 2 (hood)	Y-12 Bldg 9204-1	Rm 205	240 /1 /3200					
ICL13	Ion Exchange Columns (2)	3 X 2	Y-12 Bldg 9204-1	Rm 205						
ICL14	Miscellaneous Storage (4)	4 X 1.5	Y-12 Bldg 9204-1	Rm 204a (2), 119 (2)						
ICL15	Oven, Convection (2)	3 X 3	Y-12 Bldg 9204-1	Rm 119	120 / 1 /1460		X			
ICL16	Oven, Muffle (2)	3 X 3	Y-12 Bldg 9204-1	Rm 119	240 / 1 / 3500		X	X		
ICL17	pH Meter	1 X 1	Y-12 Bldg 9204-1	Rm 205	120 /1 / ~10					
ICL18	Power Supply - DC (3)	1.5 X 1	Y-12 Bldg 9204-1	Rm 203	120 /1 / ~100					
ICL19	PPE Storage	4 X 1.5	Y-12 Bldg 9204-1	Rm 204a						
ICL20	Reagent Storage (Bulk) (2)	3 X 3	Y-12 Bldg 9204-1	Rm 205 (in hood base)						
ICL21	Reagent Storage (Lab) (5)	4 X 1.5	Y-12 Bldg 9204-1	Rm 203 (2), 205 (2)						
ICL22	Reference Book Case	3 X 1.25	Y-12 Bldg 9204-1	Rm 204a						
ICL23	Refrigerator/Freezer - Explosion Proof	2.5 X 3	Y-12 Bldg 9204-1	Rm 203	120 / 1 / 480					
ICL24	Safe, Precious Metals	4 X 3	Y-12 Bldg 9204-1	NA (**Bldg 5510**)	Alarmed Room					
ICL25	Steam Table (Hood)	3 X 1.5	Y-12 Bldg 9204-1	Rm 205	120 / 1 / 1800	X				
ICL26	Tool Box	2 X 1.5	Y-12 Bldg 9204-1	Mobile (203, 205, 119)						
ICL27	Tube Furnace - 3" (2)	3 X 3	Y-12 Bldg 9204-1	Rm 119	240 / 1 / 2300			X	X	X
ICL28	Tube Furnace - 6"	4 X 3	Y-12 Bldg 9204-1	Rm 119	240 / 1 / 10400			X	X	
ICL29	Unprocessed Isotope Storage	12 X 12	Y-12 Bldg 9204-1	Rm 119						
ICL30	Vacuum Cleaner (2)	3 X 3	Y-12 Bldg 9204-1	Mobile (203, 205, 119)	120 / 1 / 500					
ICL31	Vacuum Oven	1.5 X 3	Y-12 Bldg 9204-1	Rm 119	120 / 1 / 500				X	
ICL32	Vacuum Pump	2 X 2	Y-12 Bldg 9204-1	Rm 119	120 / 1 / 900					
ICL33	Waste Containers (3)	2 X 2	Y-12 Bldg 9204-1	Rm 203 (1), 205 (2)						
ICL34	Water De-Ionizer Unit	3 X 3	Y-12 Bldg 9204-1	Rm 203	120 / 1 / 360	X				

NOTES:
1. USE 5500 SUFFIX FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

SHEET TITLE

ISOTOPE CHEMISTRY LABS BLDG 5500
DRAWING INDEX AND EQUIPMENT LIST

JOB NO 0214-00001
DATE 04/11/03
REV NO 0
SCALE NONE
DWG NO **SK-5500-1**

Equipment to be moved to Composite Clean Room Lab E-D106:

TAG E-D106-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
CCR1	Curing Oven #4 Blue M/P 11	36” x 72” x 78”	Y-12 9204-1, 2nd Floor Room 241	SK E-D106-2	SK E-D106-4
CCR2	Curing Oven #5 Blue M/M256C	36” x 48” x 60”	Y-12 9204-1, 2nd Floor Room 241	SK E-D106-2	SK E-D106-4
~~CCR3~~	~~Chest Freezer Kenmore~~	~~30” x 69” x 35”~~	~~Y-12 9204-1, 2nd Floor Room 241~~	~~SK E-D106-2~~	~~SK E-D106-4~~
CCR4	Gas Autoclave United McGill 9214 (K314739)	60” x 84” x 72”	Y-12 9204-1, 2nd Floor Room 241	SK E-D106-2	SK E-D106-4
CCR5	Platten Press #1 Carver	30” x 60” x 72”	Y-12 9204-1, 2nd Floor Room 241	SK E-D106-3	SK E-D106-4
CCR6	Platten Press #2 Carver (Y270443)	30” x 60” x 72”	Y-12 9204-1, 2nd Floor Room 241	SK E-D106-3	SK E-D106-4
CCR7	Centrifuge Damon/CRL 5000	26” x 34” x 48”	Y-12 9204-1, 2nd Floor Room 241	SK E-D106-3	SK E-D106-4
CCR8, CCR9, & CCR10	Flammable Storage Cabinet (Typ 3)	42” x 12” x 72”	Y-12 9204-1, 2nd Floor Room 241	None	SK E-D106-4
CCR11	Marble Table	24” x 18” x 36”	Y-12 9204-1, 2nd Floor Room 241	None	SK E-D106-4
CCR12	Thermolyne 4800 Furnace	20” x 14” x 18”	Y-12 9204-1, 2nd Floor Room 241	None	SK E-D106-4
CCR13	Ultrasonic Cleaner on Casters	24” x 24” x 36”	Y-12 9204-1, 2nd Floor Room 241	None	SK E-D106-4
GENERAL					
G1	Boxed Items		Y-12 9204-1, 2nd Floor Room 241		
NEW EQUIPMENT					
N1	Fume Hood	36” x72” Bench Type w/Cabinets		NA	NA

COMPOSITE CLEAN ROOM LAB E-D106 DRAWING INDEX

Drawing No.	Title
SK E-D106-1	Drawing Index and Equipment List
SK E-D106-2	Composite Clean Room Lab Disassembly Drawing No. 1
SK E-D106-3	Composite Clean Room Lab Disassembly Drawing No. 2
SK E-D106-4	Composite Clean Room Lab Installation Drawing

NOTES:

1. Ronnie Lomax (574-3551) will field direct the connection of equipment being moved to the Composite Clean Room Lab E-D106.
2. Use E-D106 Suffix for all equipment tags.
3. M&CD will package all loose equipment and will label all equipment and boxes to be moved.
4. M&CD will provide all safety support (IH, H&S, etc.) required for the move. M&CD will provide HP surveys or use process knowledge to obtain any required green tags for equipment to be moved to ETF.
5. M&CD will remove all interconnecting wiring between lab equipment prior to the move and will reconnect this wiring after the move.
6. Equipment lined through or X’d out has been removed from the scope of the move.
7. Electronic lab equipment is very sensitive and care must be given to ensure that physical shock or vibration to the equipment is minimized.

ENGINEERING TECHNOLOGY FACILITY
COMPOSITE CLEAN ROOM LABORATORY E-D106
MOVE PACKAGE

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1042

SHEET TITLE
COMPOSITE CLEAN ROOM LABORATORY E-D106
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D106-1**

1

CCR1 - CURING OVEN #4

1. DISCONNECT ELECTRICAL POWER.
2. REMOVE THE INSULATION FROM THE EXHAUST DUCT. DISCONNECT EXHAUST DUCT. MOVE ~~INSULATED~~ DUCT AND DAMPERS WITH OVEN.
3. DISCONNECT AND REMOVE TEMPERATURE RECORDER.

2

CCR2 - CURING OVEN #5

1. DISCONNECT ELECTRICAL POWER.
2. DISCONNECT EXHAUST DUCT. MOVE INSULATED DUCT AND DAMPERS WITH OVEN.

3

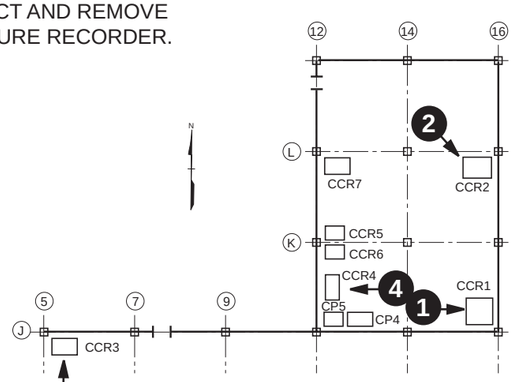
CCR3 - CHEST FREEZER

1. DISCONNECT ELECTRICAL POWER.

4

CCR4 - GAS AUTOCLAVE

1. DISCONNECT ELECTRICAL POWER.
2. DISCONNECT NITROGEN PIPING.
3. DISCONNECT PLANT AIR PIPING.
4. DISCONNECT COOLING WATER PIPING.
5. DISCONNECT VENT PIPING.
6. DISCONNECT DRAIN PIPING.
7. TAG AND DISCONNECT INSTRUMENTATION WIRING.



Y-12 BUILDING 9204-1, SECOND FLOOR

NOTES:

1. USE SUFFIX E-D106 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1042

SHEET TITLE

COMPOSITE CLEAN ROOM LAB E-D106
DISASSEMBLY DRAWING NO. 1

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D106-2**

1

CCR5 - PLATTEN PRESS #1

1. DISCONNECT ELECTRICAL POWER.
2. DISCONNECT COOLING WATER PIPING.
3. DRAIN HYDRAULIC LINES AND DISCONNECT.
4. TAG AND DISCONNECT INSTRUMENTATION WIRING.

2

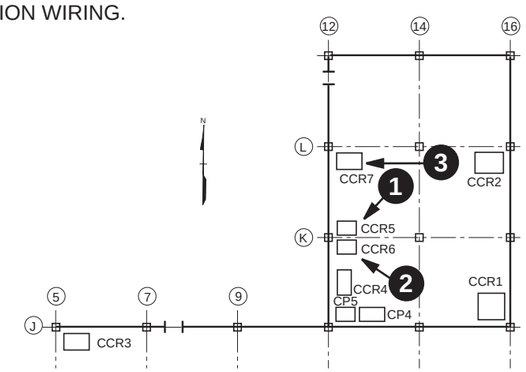
CCR6 - PLATTEN PRESS #2

1. DISCONNECT ELECTRICAL POWER.
2. DISCONNECT COOLING WATER PIPING.
3. DRAIN HYDRAULIC LINES AND DISCONNECT.
4. TAG AND DISCONNECT INSTRUMENTATION WIRING.

3

CCR7 - CENTRIFUGE

1. DISCONNECT ELECTRICAL POWER.
2. SECURE ROTATING EQUIPMENT COMPONENTS PRIOR TO MOVING.



Y-12 BUILDING 9204-1, SECOND FLOOR

NOTES:

1. USE SUFFIX E-D106 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

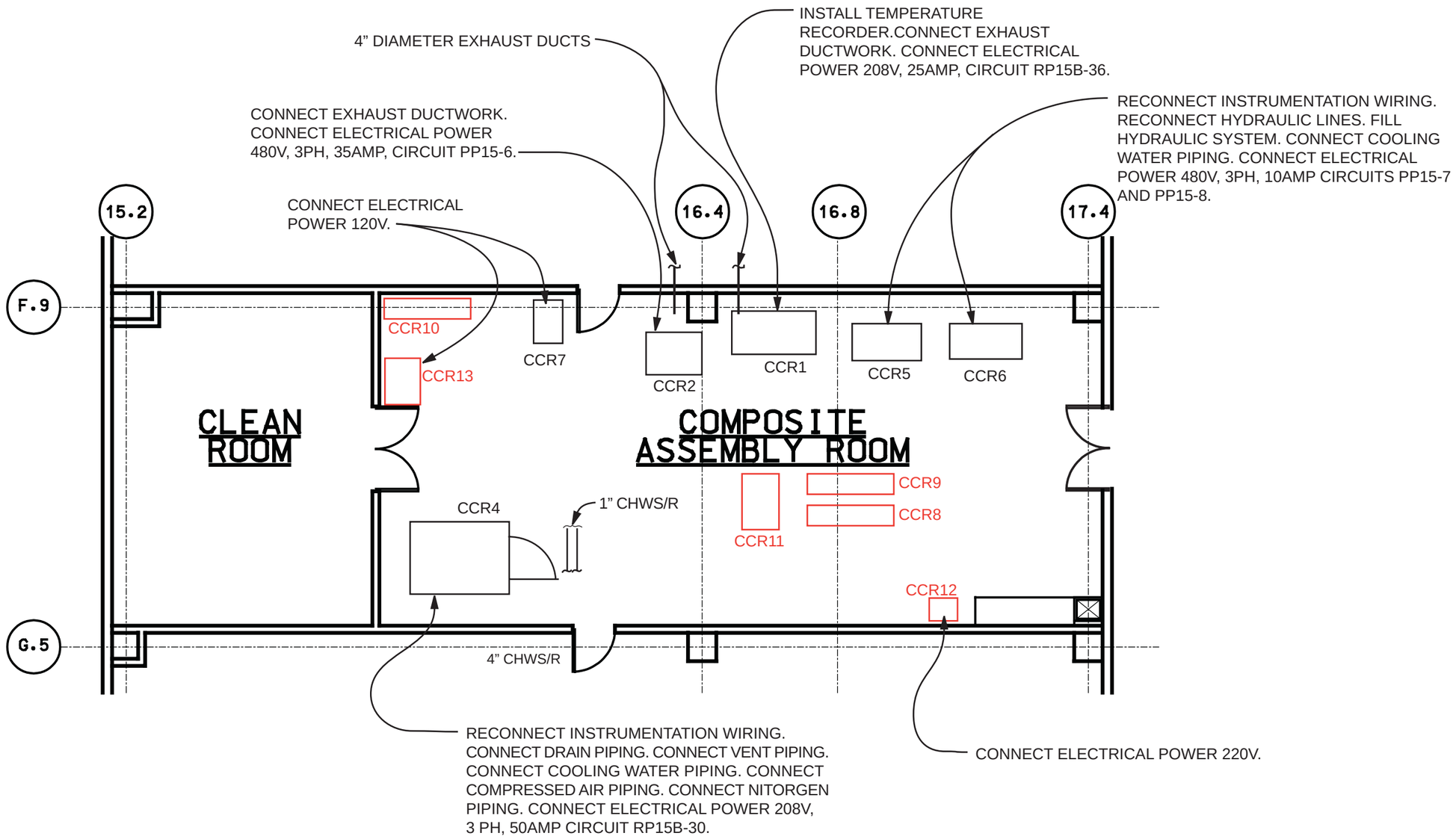
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1042

SHEET TITLE

COMPOSITE CLEAN ROOM LAB E-D106 DISASSEMBLY DRAWING NO. 2

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D106-3**



FLOOR PLAN

SCALE: 1/8" = 1'-0"

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1042

SHEET TITLE

COMPOSITE CLEAN ROOM LAB E-D106 INSTALLATION DRAWING

JOB NO PDC 0214

DATE 06/16/03

REV NO 2

SCALE 1/8"=1'-0"

DWG NO **SK-E-D106-4**

Equipment to be moved to Quality Control Lab:

TAG: E-F108-	EQUIPMENT DESCRIPTION	W X L X H (inches)	PRESENT LOCATION
1	Surface Plate, Black Granite Manufacturer Microflat, top serial # 101811 Frame Serial # 101821	36 X 60 X 37 (10 inch thick top)	9201-3
2	Granite Surface Plate, TAFT PIERCE. It is on casters.	24 x 36 x 41 (6 inch thick top)	9201-3
3	Work Bench on Wheels	38 X 26 X 36	9201-3
4	Work Bench, two pieces	60 X 28 X 34	9201-3
5	Scale	20 X 6 X 9	9201-3
6	Scale (120 V power)	16 X 14 X 9	9201-3
7	Records	17 boxes	9201-3
8	Filing Cabinet	36 X 18 X 78	9201-3
9	3 High Shelves	33 X 13 X 61	9201-3
10	Desk	60 X 35 X 31	9201-3
11	Desk	24 X 36 X 27	9201-3
12	Table	60 X 34 X 31	9201-3
13	Fire King Filing Cabinets (7 each)	18 X 32 X 53	9201-3
14	Fire King Filng Cabinet	15 X 25 X 51	9201-3
15	Metal Top Table	60 X 30 X 31	9201-3
16	Microscope	28 X 12 X 15	9201-3
17	Cart	25 X 20 X 28	9201-3
18	Drafting Table	72 X 40 X 40	9201-3
19	Film Reader	24 X 30 X 56	9201-3
20	Rotary Table	8 X 23 X 15	9201-3
21	Comparitor	18 X 48 X 36	9201-3
22	Table for Comparitor	18 X 32 X32	9201-3
23	Height Gauges (3 each)	10 X 4 X 27	9201-3

NOTES:
1. CONTACT JACK WELLS (574-0401) IF ADDITIONAL INFORMATION IS REQUIRED.
2. JACK WELLS WILL FIELD DIRECT THE CONNECTION OF EQUIPMENT BEING MOVED TO THE QUALITY CONTROL LAB E-F108.
3. USE E-F108 SUFFIX FOR ALL EQUIPMENT TAGS.
4. THE QUALITY DIVISION WILL PACKAGE ALL LOOSE EQUIPMENT AND WILL LABEL ALL EQUIPMENT AND BOXES TO BE MOVED.
5. THE QUALITY DIVISION WILL PROVIDE ALL SAFETY SUPPORT (IH, H&S, ETC.) REQUIRED FOR THE MOVE. THE QUALITY DIVISION WILL PROVIDE HP SURVEYS OR USE PROCESS KNOWLEDGE TO OBTAIN ANY REQUIRED GREEN TAGS FOR EQUIPMENT TO BE MOVED TO ETF.

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1097

SHEET TITLE

QUALITY CONTROL LABORATORY E-F108 EQUIPMENT LIST

JOB NO 0214-00001
DATE 05/19/03
REV NO 0
SCALE NONE
DWG NO **SK-E-F108-1**

Equipment to be moved to Composite Storage Lab E-D107:

TAG E-D107-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
CST1	Walk-in Freezer	96” x 96” x 144”	Y-12 9204-1, 2nd Floor Room 243	SK E-D107-2	SK E-D107-3
GENERAL					
NEW EQUIPMENT					

COMPOSITE STORAGE LAB E-D107 DRAWING INDEX

Drawing No.	Title
SK E-D107-1	Drawing Index and Equipment List
SK E-D107-2	Composite Storage Lab Disassembly Drawing
SK E-D107-3	Composite Storage Lab Installation Drawing

Design Concern:

Freezer requires a 208v, 3ph, 30amp supply. Electrical drawings do not show that supply for room E-D107.

NOTES:

1. Ronnie Lomax (574-3551) will field direct the connection of equipment being moved to the Composite Storage Lab E-D107.
2. Use E-D107 room suffix for all equipment tags.
3. M&CD will package all loose equipment and will label all equipment and boxes to be moved.
4. M&CD will provide all safety support (IH, H&S, etc.) required for the move. M&CD will provide HP surveys or use process knowledge to obtain any required green tags for equipment to be moved to ETF.
5. M&CD will remove all interconnecting wiring between lab equipment prior to the move and will reconnect this wiring after the move.
6. Equipment lined through or X’d out has been removed from the scope of the move.
7. Electronic lab equipment is very sensitive and care must be given to ensure that physical shock or vibration to the equipment is minimized.
8. A refrigerated unit must be provided to transport and store freezer contents at 0º F for approximately one week while the freezer has been reassembled.

ENGINEERING TECHNOLOGY FACILITY
COMPOSITE STORAGE LABORATORY E-D107
MOVE PACKAGE

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

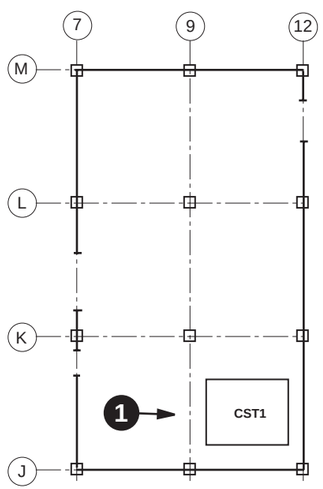
OLD ROOM NUMBER: E1051

SHEET TITLE

COMPOSITE STORAGE LABORATORY E-D107
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D107-1**

THE CONDENSATE HEATER IS MOUNTED ON THE WALL.



Y-12 BUILDING 9204-1 SECOND FLOOR

1

CST1 - WALK-IN FREEZER

1. DISCONNECT ELECTRICAL POWER.
2. DISCONNECT AND REMOVE TEMPERATURE RECORDER AND CONTROLS.
3. REMOVE REFRIGERATION UNIT.
4. LABEL HOUSING PANEL FOR REASSEMBLY AND DISASSEMBLE HOUSING.
5. THE CONDENSATE HEATER (120V) USED TO EVAPORATE THE CONDENSATE FROM THE AIR CONDITIONING UNIT WILL BE NEEDED AT E-D107 AND SHOULD BE DISCONNECTED AND TRANSPORTED WITH THE FREEZER.
6. SCHEDULE AN OUTAGE WITH THE Y-12 FIRE DEPARTMENT TO CUT AND REMOVE THE SPRINKLER HEAD. APPROVAL FROM THE Y-12 CONFIGURATION CONTROL BOARD IS REQUIRED.
7. REFRIGERATED TRANSPORT AND STORAGE AT 0º F WILL BE REQUIRED FOR APPROXIMATELY ONE WEEK.

NOTES:

1. USE SUFFIX E-D107 FOR ALL EQUIMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

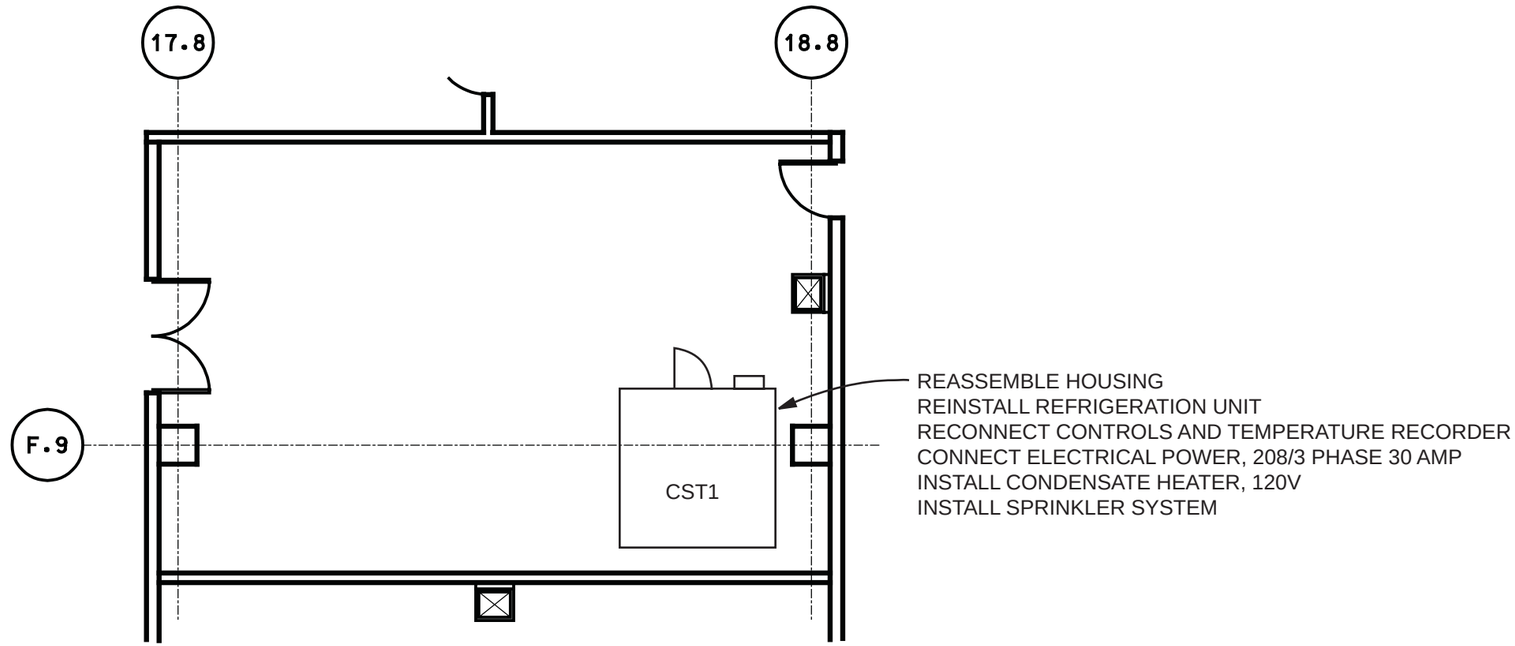
PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1051

SHEET TITLE

COMPOSITE STORAGE LABORATORY E-D107
DISASSEMBLY DRAWING NO. 1

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D107-2**



COMPOSITE STORAGE FLOOR PLAN

SCALE: 1/8" = 1'-0"

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1051

SHEET TITLE

COMPOSITE STORAGE LABORATORY E-D107
INSTALLATION DRAWING NO. 1

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE 1/8"=1'-0"
DWG NO **SK-E-D107-3**

Equipment to be moved to Concrete Lab E-D113:

TAG E-D113-	Equipment Name Description/Model	W x L x H (Inches)	Present Location	Disassembly Drawing	Installation Drawing
C1	Forney Testing Machine (2 pieces)	24” x 24” x 60” and 18” x 40” x 72”	Y12 9204-1 1st Floor	SK E-D113-2	SK E-D113-5
C2	Concrete Mixer		Y12 9204-1 1st Floor	SK E-D113-2	SK E-D113-5
C3	Masonary Saw	30” x 24” x 24”	Y12 9204-1 1st Floor	SK E-D113-3	SK E-D113-5
C4	Vibrating Table	24” x 24” x 12”	Y12 9204-1 1st Floor	SK E-D113-3	SK E-D113-5
C5	Balance Scale	34” x 44” x 72”	Y12 9204-1 1st Floor	SK E-D113-3	SK E-D113-5
C6	Portable Scale		Y12 9204-1 1st Floor	SK E-D113-4	SK E-D113-5
C7	Hobart Mixer	24” x 24” x 24” 150#	Y12 9204-1 1st Floor	SK E-D113-4	SK E-D113-5
C8	Gilson Sieve Shaker	24” x 24” x 24” 200#	Y12 9204-1 1st Floor	SK E-D113-4	SK E-D113-5
C9	Creep Frames (8 Total)	45” x 20” x 84”	Y12 9204-1 1st Floor, Room 102	SK E-D113-4	SK E-D113-5
GENERAL					
G1	Approximately 40 pieces of miscellaneous equipment		Y12 9204-1 1st Floor	NA	NA
	3 Metal Tables (Heavy)	48” x 96” x 31”	Y12 9204-1 1st Floor		

CONCRETE LAB E-D113 DRAWING INDEX

Drawing No.	Title
SK E-D113-1	Drawing Index and Equipment List
SK E-D113-2	Concrete Lab Disassembly Drawing No. 1
SK E-D113-3	Concrete Lab Disassembly Drawing No. 2
SK E-D113-4	Concrete Lab Disassembly Drawing No. 3
SK E-D113-5	Concrete Lab Installation Drawing

NOTES:

1. Dan Naus (574-0657) will field direct the connection of equipment being moved to the Concrete Lab E-D113.
2. Use E-D113 Suffix for all equipment tags.
3. M&CD will package all loose equipment and will label all equipment and boxes to be moved.
4. M&CD will provide all safety support (IH, H&S, etc.) required for the move. M&CD will provide HP surveys or use process knowledge to obtain any required green tags for equipment to be moved to ETF.
5. M&CD will remove all interconnecting wiring between lab equipment prior to the move and will reconnect this wiring after the move.
6. Equipment lined through or X’d out has been removed from the scope of the move.
7. Electronic lab equipment is very sensitive and care muste be given to ensure that physical shock or vibration to the equipment is minimized.

ENGINEERING TECHNOLOGY FACILITY
CONCRETE LABORATORY E-D113
MOVE PACKAGE

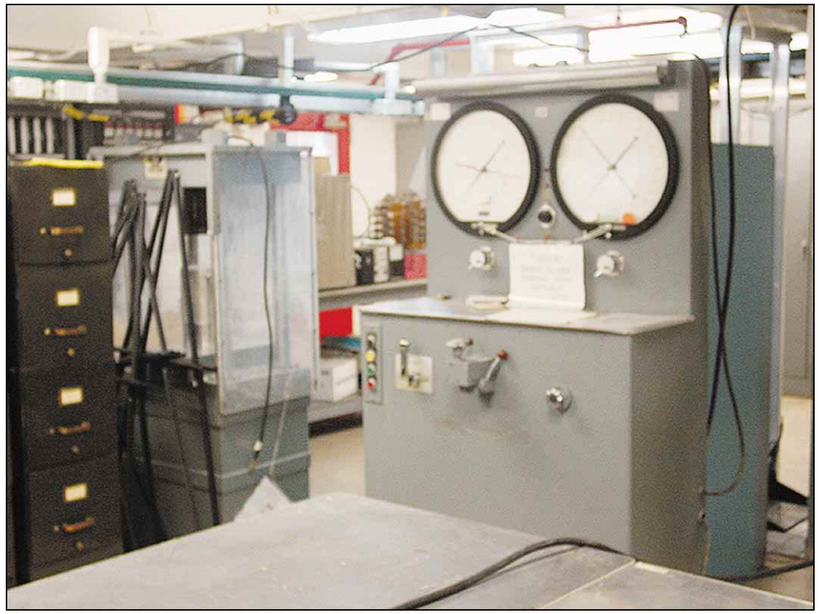
NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1055

SHEET TITLE
CONCRETE LABORATORY E-D113
DRAWING INDEX AND EQUIPMENT LIST

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D113-1**



1

C1 - FORNEY TESTING MACHINE

2

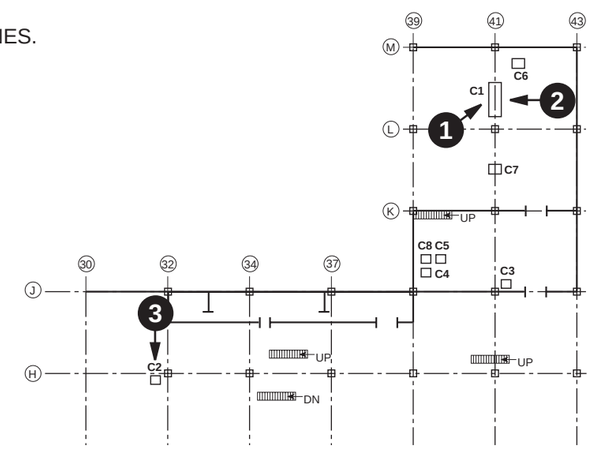
C1 - FORNEY TESTING MACHINE

3

C2 - CONCRETE MIXER

1. MIXER IS MOUNTED ON WHEELS.

1. DISCONNECT 480V, 3 PHASE, 30 AMP ELECTRICAL POWER.
2. DRAIN HYDRAULIC SYSTEM.
3. DISCONNECT HYDRAULIC LINES.



CONCRETE LABORATORY
Y-12 BUILDING 9204-1, 1ST FLOOR

NOTES:

1. USE SUFFIX E-D113 FOR ALL EQUIPMENT TAGS.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

OLD ROOM NUMBER: E1055

SHEET TITLE

CONCRETE LAB E-D113
DISASSEMBLY DRAWING NO. 1

JOB NO PDC 0214	DATE 06/16/03
	REV NO 2
SCALE NONE	DWG NO **SK-E-D113-2**

1

C3 - MASONRY SAW

1. DISCONNECT 208V, SINGLE PHASE, 20 AMP ELECTRICAL POWER.

2

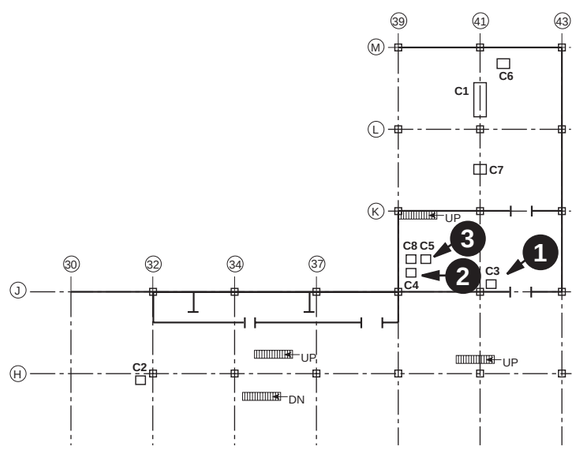
C4 - VIBRATING TABLE

1. DISCONNECT 120V ELECTRICAL POWER.

3

C2 - BALANCE SCALES

1. SCALES WEIGHS 200#.
2. HANDLE WITH CARE TO AVOID DAMAGE TO SCALES.



CONCRETE LABORATORY
Y-12 BUILDING 9204-1, 1ST FLOOR

NOTES:

1. USE SUFFIX E-D113 FOR ALL EQUIPMENT TAGS.

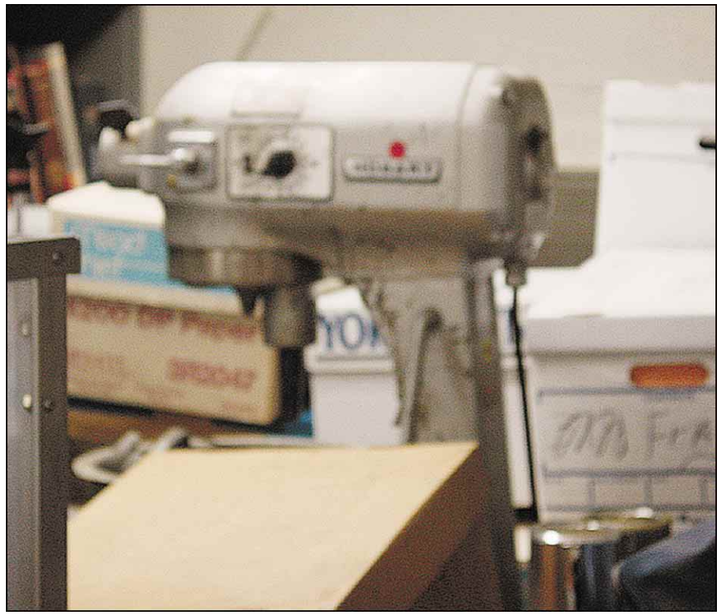
NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1055

SHEET TITLE
CONCRETE LAB E-D113
DISASSEMBLY DRAWING NO. 2

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE NONE
DWG NO **SK-E-D113-3**



1

C6 - PORTABLE SCALES

1. HANDLE WITH CARE TO AVOID DAMAGE TO SCALES.

2

C7 - HOBART MIXER

1. MIXER WEIGHS 150#.

3

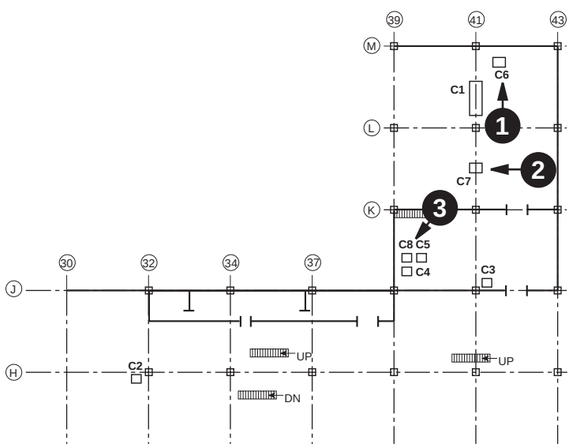
C8 - GILSON SIEVE SHAKER

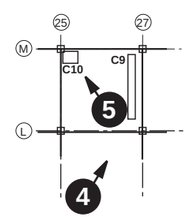
1. SHAKER WEIGHS 200#.

4

C9 - CREEP FRAMES

1. (8 TOTAL).





CONCRETE LABORATORY
Y-12 BUILDING 9204-1, 1ST FLOOR

5

C10 - ELECTRONIC CABINET

1. (CONNECTED TO CREEP FRAMES SHOWN IN PHOTO 4).

NOTES:

1. USE SUFFIX E-D113 FOR ALL EQUIPMENT TAGS.

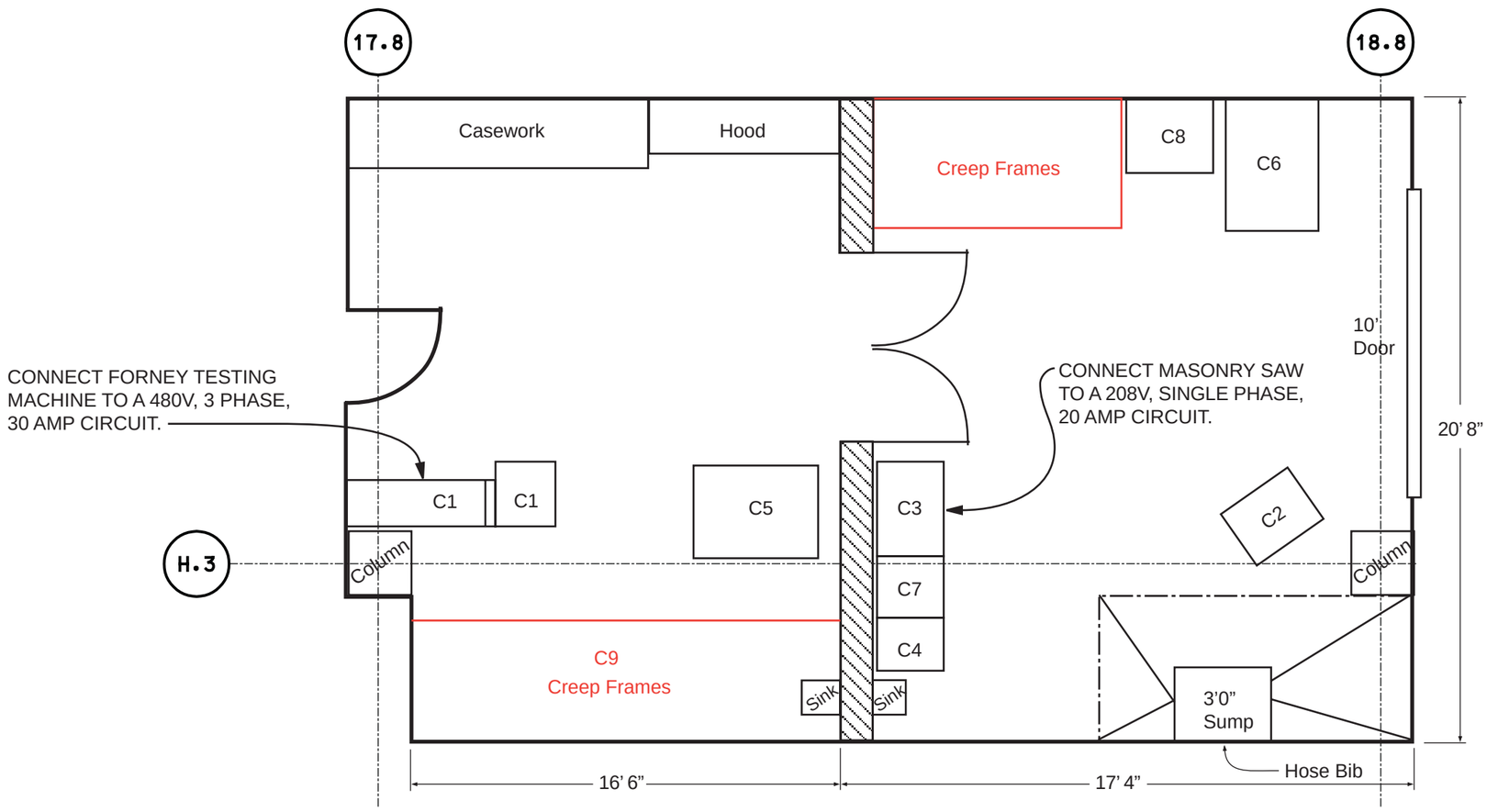
NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1055

SHEET TITLE
CONCRETE LAB E-D113
DISASSEMBLY DRAWING NO. 3

JOB NO: PDC 0214
DATE: 06/16/03
REV NO: 2
SCALE: NONE
DWG NO: **SK-E-D113-4**



FLOOR PLAN

NOTES:

1. ALL EQUIPMENT ELECTRICAL REQUIREMENTS ARE 120V EXCEPT AS NOTED.
2. RICK BATTISTE (574-0736) SHOULD BE CONTACTED PRIOR TO LOCATING THE CREEP FRAMES.

NO	DATE	REVISION	BY	CK	APPR
2	06/16/03	Added New Room Number			
1	04/29/03	Management Walkthrough			

PREPARED BY
CHECKED BY
DISCIPL APPR
INTERFACE CK
PM APPR
CLIENT APPR

OLD ROOM NUMBER: E1055

SHEET TITLE

CONCRETE LAB E-D113
INSTALLATION DRAWING NO. 1

JOB NO PDC 0214
DATE 06/16/03
REV NO 2
SCALE
DWG NO **SK-E-D113-5**

1

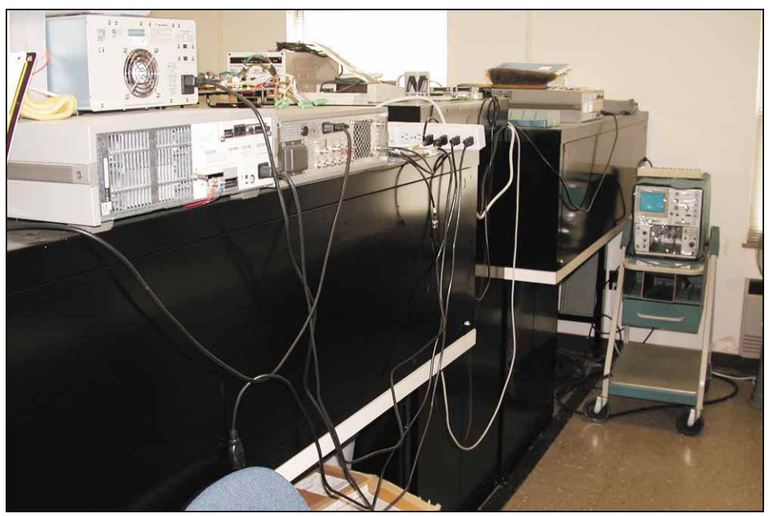
STORAGE AND WORK BENCH

2

WORK BENCHES AND STORAGE

3

WORK BENCHES AND STORAGE



4

BACKSIDE OF WORK BENCHES (Photo 3)

5

WORK BENCHES

NOTES:

1. THE ANALOG/DIGITAL LABS IN BUILDING 3606 WILL MOVE TO BUILDING 3500. ROOM ASSIGNMENT AND ARRANGEMENT WILL BE DETERMINED LATER.

2. ALL ELECTRICAL EQUIPMENT REQUIRES 120V AC.

NO	DATE	REVISION	BY	CK	APPR		
						PREPARED BY	
						CHECKED BY	
						DISCIPL APPR	
						INTERFACE CK	
						PM APPR	
						CLIENT APPR	

SHEET TITLE

BUILDING 3606, ROOM 101
CBMS ELECTRONIC LAB
DWIGHT CLAYTON

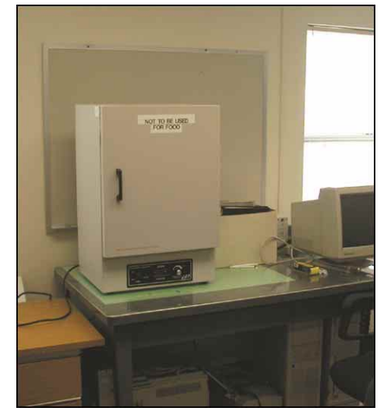
JOB NO	DATE	09/04/03
0214-00001	REV NO	0
SCALE	DWG NO	
NONE		**SK-3500-1**

1

PLOTTER, PRINTER, & REFRIGERATOR

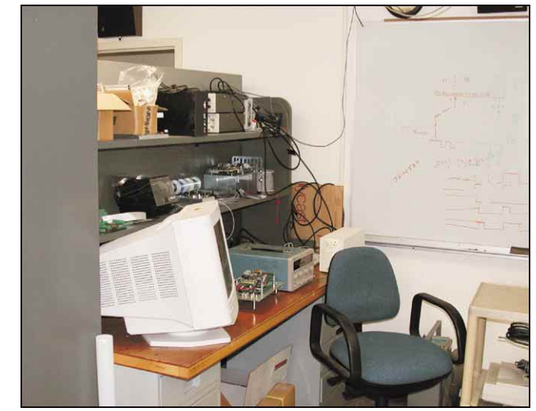
2

OFFICE AREA



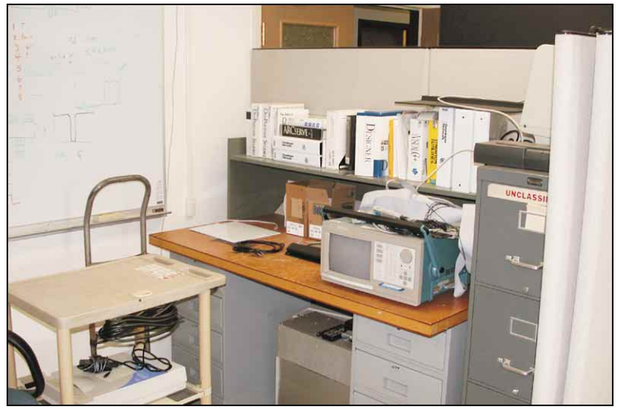
3

OVEN - 120V AC, 1200 WATTS



4

WORK BENCH



5

WORK BENCH

6

WORK BENCH AND DENTAL STORAGE CABINET

7

STORAGE CABINETS

8

WORK BENCH

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

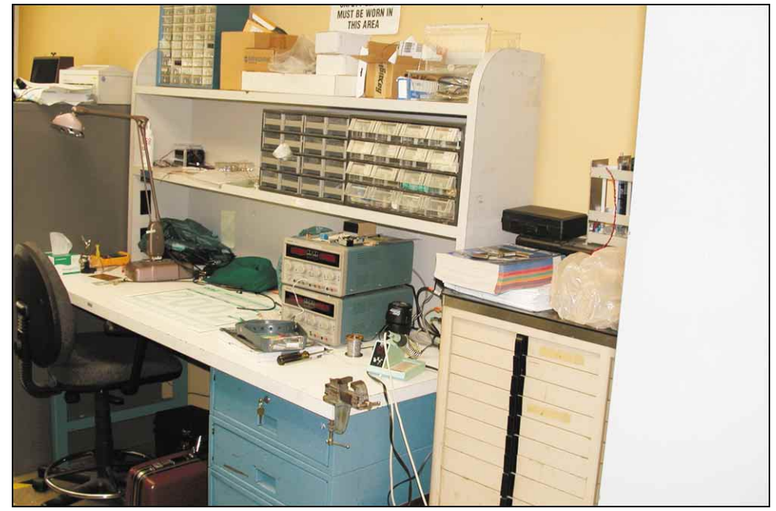
SHEET TITLE

BUILDING 3606, ROOM 111
ELECTRONIC LAB
DWIGHT CLAYTON

JOB NO	DATE	09/04/03
0214-00001	REV NO	0
SCALE	DWG NO	
NONE		SK-3500-2

1

ROOM 211
WORK BENCH



2

ROOM 213
WORK BENCH, STORAGE &
DENTAL STORAGE CABINET

3

ROOM 215
WORK BENCH

4

ROOM 211
DENTAL STORAGE CABINET

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

BUILDING 3606, ROOMS 211, 213, & 215
COMBINATION LAB/OFFICES
DWIGHT CLAYTON

JOB NO 0214-00001

DATE 09/04/03

REV NO 0

SCALE NONE

DWG NO **SK-3500-3**

1

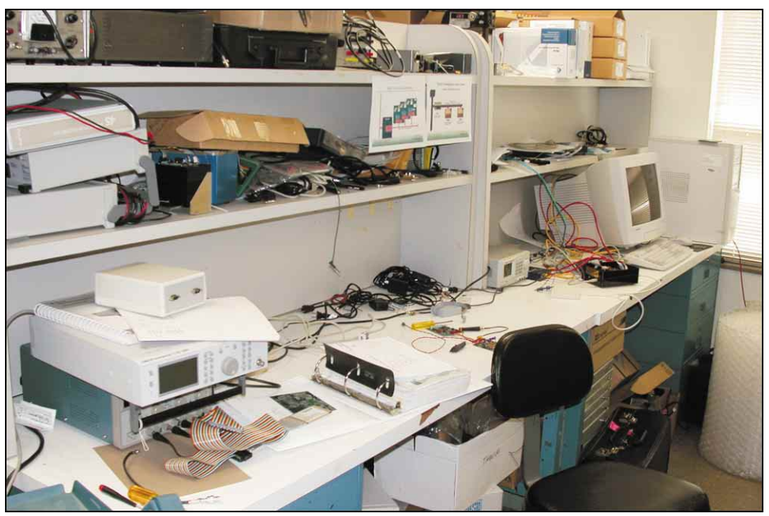
WORK BENCHES AND ELECTRONIC RACK

2

TOOL CABINET AND WORK BENCH

3

WORK BENCHES AND STORAGE



4

WORK BENCHES

5

STORAGE CABINETS

6

STORAGE CABINETS

NO	DATE	REVISION	BY	CK	APPR

PREPARED BY	
CHECKED BY	
DISCIPL APPR	
INTERFACE CK	
PM APPR	
CLIENT APPR	

SHEET TITLE

BUILDING 3606, ROOM 217
ELECTRONICS DEVELOPMENT LAB
DWIGHT CLAYTON

JOB NO 0214-00001	DATE 09/04/03
	REV NO 0
SCALE NONE	DWG NO SK-3500-4

APPENDIX D

EAST CAMPUS DEVELOPMENT UTILITY TIE-INS

East Campus Development
Utility Tie-Ins (sorted by system)

Utility	Related Project	Project WBS	From	To	Routing	Installer	Tie-In By*	Planned/ Actual Completion Date	Third Party/ State Easement	Comments
Electrical Systems										
CSB Power	East Campus Elect. Systems Upgrade GPP	1.01.06	4000 Substation	CSB HV Transformer	Substation 4000 through MH-12 and MH-13 to CSB transformers on West side.	East Campus Electrical Sys. Upgrade GPP Fixed Price Subcontractor (FPSC)	Third Party Contractor	3/03 Complete	Y	Cable pulled by Electrical System Upgrade GPP FPSC; termination @ 4000 by Ops
Substation 4000 to Switches 1 & 2	East Campus Elect. Systems Upgrade GPP	1.01.06	4000 Substation	Switches 1 & 2	Substation 4000 through ORNL installed conduit through MH-12 and MH-13 to switches.	East Campus Electrical Sys. Upgrade FPSC	Elect. Sys. Upgrade FPSC	2/03 Complete	Y	Cable pulled by Electrical System Upgrade GPP FPSC; termination @ 4000 by Ops
Substation 4000 to ETF	East Campus Elect. Systems Upgrade GPP	1.01.06	4000 Substation	ETF Main Transformer	Substation 4000 through GPP installed conduit along Third Party North Boundary, through GPP installed conduit down East side to ETF transformers.	East Campus Electrical Sys. Upgrade FPSC	Third Party Contractor	2/03 Complete	Y	Cable pulled by Electrical System Upgrade GPP FPSC; termination @ 4000 by Ops
Switches 3 & 4 to RSC	RSC & Third Party Project	1.01.04 1.01.02	Switches 3 & 4	RSC	Third Party conduit from switches 3 & 4 through new manhole to RSC conduit tie-in point.	RSC Contractor & Third Party	RSC Contractor	3/04	Y	Cable pulled by RSC; termination @ Switch 3/4 by Ops; Feeder to Switches 1 & 2 installed 10/18/02
Switches 1 & 2 to JICS	JICS/ORCAS State Project	1.01.05	Switches 1 & 2	JICS	JICS Installed Conduit	State Contractor	State Contractor	8/03 Complete	Y	Cable pulled by JICS; termination @ Switch 1/2 by Ops
Chilled Water										
8-inch to JICS Interface	Third Party Project	1.01.03	ROB	Third Party North Boundary	Underground line from ROB to new 8" line on Third Party North boundary.	Third Party Contractor	NA	6/03 Complete	Y	If system in operation by JICS need date, Ops will tie in
8-inch to JICS	JICS/ORCAS State Project	1.01.05	Third Party North Boundary	JICS	Underground line to JICS from new 8" line on Third Party North boundary.	State Contractor	State Contractor	4/03 Complete	Y	
8-inch to RSC Interface	Third Party Project	1.01.03	ROB	Third Party North Boundary	Underground line from ROB to new 8" line on Third Party North boundary to RSC interface.	Third Party Contractor	NA	6/03 Complete	Y	If system in operation by RSC need date (high probable), then by Ops
8-inch to RSC	RSC LI Project	1.01.04	Third Party North Boundary	RSC	Underground line from Third Party interface to RSC.	RSC Contractor	RSC Contractor	9/03	Y	
Heating Water/Steam										
4-inch HW to JICS Interface	Third Party Project	1.01.03	ROB	Third Party North Boundary	Underground line from ROB to new 4" line on Third Party North boundary.	Third Party Contractor	NA	6/03 Complete	Y	
4-inch HW to JICS	JICS/ORCAS State Project	1.01.05	Third Party North Boundary	JICS	Underground line to JICS from new 4" line on Third Party North boundary.	State Contractor	State Contractor	4/03 Complete	Y	
4-inch HW to RSC Interface	Third Party Project	1.01.03	ROB	Third Party North Boundary	Underground line from ROB to new 4" line on Third Party North boundary to RSC interface.	Third Party Contractor	NA	6/03 Complete	Y	
4-inch HW to RSC	RSC LI Project	1.01.04	Third Party North Boundary	RSC	Underground line from Third Party interface to RSC.	RSC Contractor	RSC Contractor	9/03	Y	
8-inch Steam Main to CEP	Third Party Project	1.01.01	Central Energy Plant (CEP) in CSB	S ORNL Steam Line	Underground Line	Third Party Contractor	Third Party Contractor	3/03 Complete	Y	
Natural Gas System										
3-inch North & East of RSC from Metering Station to Third Party Boundary	Natural Gas Line IGPP	1.08.05	Main Pressure Reducing Valve on Bethel Valley	Third Party North Boundary	Underground line from metering station to Third Party North boundary.	Natural Gas Line FPSC	Natural Gas Line FPSC	1/03 Complete	N	
3-inch Supply Line South of RSC to ETF/CSB	Third Party Project	1.01.01 1.01.02	Third Party Property Line	ETF and CSB	Underground line from Third Party Northeast boundary south to White Oak Ave and west along south side of the ETF & CSB tie points.	Third Party Contractor	Third Party	1/03 Complete	Y	
3-inch Connection to RSC	RSC LI Project	1.01.04	Valve on Main	RSC	Underground line from new 3" line to RSC.	RSC Contractor	RSC Contractor	3/04	N	
Fire/Potable Water										
16-inch Water Line Along Central Ave. North of ROB (North Water Line)	Third Party Project	1.01.01	Existing 24" from Reservoir	Existing 16" @ 5002	Underground 16" line from existing 24" line to existing 16" line @ 5002.	Third Party Contractor	Third Party Contractor	1/03 Complete	Y	
16-inch Water Line East and South of ETF (South Water Line)	Third Party Project	1.01.01	Existing 16" by 6010 Fence	Existing 8" @ Gate 1E at White Oak Ave	Underground 16" line from existing 16" line to existing @ 6010 fence to existing 8" line @ Gate 1E on White Oak Ave.	Third Party Contractor	Third Party Contractor	2/03 Complete	Y	
12-inch Water Line West of CSB	Third Party Project	1.01.01	CSB West side	Existing 12" @ 6th Street	Underground line from West side of CSB to existing 12" line along 6th Street.	Third Party Contractor	Third Party Contractor	2/03 Complete	Y	

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East Campus Development
Utility Tie-Ins (sorted by system)

Utility	Related Project	Project WBS	From	To	Routing	Installer	Tie-In By*	Planned/ Actual Completion Date	Third Party/ State Easement	Comments
Fire/Potable Water (continued)										
8-inch Water Line East of ROB	Third Party Project	1.01.03	ROB	Existing 10" @ 6012	Underground line from Northeast side of ROB to existing 10" @ 6012.	Third Party Contractor	Third Party Contractor	2/03 Complete	Y	
8-inch Fire Protection Line on South Side of ETF	Third Party Project	1.01.02	ETF	New 16" Line	Underground 8" line from the South side of the ETF to the new 16" line South of the ETF.	Third Party	Third Party Contractor	2/03 Complete	Y	
12/16-inch Water Line North and East of the East Campus Area	Utility Mods IGPP	1.08.06	Existing 8" @ 6012	JICS Northeast boundary	Underground line from existing 8" line @ 6012 to north of Bethel Valley Road along the east side of the RSC to the northeast boundary of the JICS; Ties into the existing 24-inch water line north of Bethel Valley Rd.	Utilities Mods IGPP FPSC	Utilities Mods FPSC	2/04	N	
12-inch RSC Water Line Connection	RSC LI Project	1.01.04	New 12" East of RSC	RSC	Underground line from new 12" line to RSC.	RSC Contractor	RSC Contractor	2/04	N	
16-inch Water Line North and West of JICS	JICS/ORCAS State Project	1.01.05	16" South of JICS on Central Ave	JICS North East Boundary and Fire Hydrant	Underground line from new 16" line on Third Party North boundary on the West side of JICS to Northeast JICS boundary and to fire hydrant on West end of North parking lot.	State Contractor	State Contractor	6/03 Complete	Y	
4-inch and 2.5-inch Water Line Connection to JICS	JICS/ORCAS State Project	1.01.05	New 16" water line on the west of JICS	West side of JICS	Two underground water lines from the new JICS 16" line to the JICS Building. One line is a 2.5-inch copper potable water line and the other is a 4" DIP for fire protection.	State Contractor	State Contractor	12/03	Y	
Sanitary Sewer										
6th Street and White Oak	Upgrade Sewage Collection IGPP	1.08.07	Manhole-101 near the Southwest corner of CSB	Manhole near North side of Building 5500	Underground line from MH-101 thru a new manhole in 6th Street to new manhole @ 5500 & existing 8" sanitary sewer.	Upgrade Sewer Collection FPSC	Upgrade Sewer Collection FPSC	4/03 Complete	Y	
White Oak Ave. at ETF	Upgrade Sewage Collection IGPP	1.08.07	ETF Discharge	New Manhole South of White Oak Ave	Underground line from ETF clean-out to existing 8" line @ new manhole @ White Oak Ave.	Upgrade Sewer Collection FPSC	Upgrade Sewer Collection FPSC	6/03 Complete	Y	
8-inch Line North Along 6th Street and East Along Central Ave	Third Party Project	1.01.01	Existing Manhole 101	New Manhole @ RSC	Underground 8 " line from manhole MH-101 through new manhole on 6th Street and through two new manholes along Central Ave. to new manhole @ RSC.	Third Party Contractor	Third Party Contractor	3/03 Complete	Y	
8-inch Line to CSB	Third Party Project	1.01.01	8" Line Along 6th Street	CSB	Underground line from new 8" line to CSB on West side.	Third Party Contractor	Third Party Contractor	4/03 Complete	Y	
6-inch Line to JICS	JICS/ORCAS State Project	1.01.05	JICS	8" Line on Third Party North Boundary	Underground line from new 8" line on Third Party North boundary to JICS.	State Contractor	State Contractor	4/03 Complete	N	
6-inch Line to RSC	RSC LI Project	1.01.04	RSC	8" Line Third Party North Boundary	Underground line from Third Party North boundary MH to RSC.	RSC Contractor	RSC Contractor	9/03	N	
Telecommunications										
Telecom Cables & Duct Bank from 4500N Central Office to CSB-Remote Distribution Facility (RDF)	Telecom GPP	1.02.01	4500N Central Office	CSB-RDF	Primary Routing: Route cables thru existing underground duct bank along Central Ave & 6th Street to MH-B-2 & 2A, thru new underground duct bank to new MH-TE & thru Third Party duct bank to MH-B2-1 & the CSB-RDF. Secondary Routing from 4500N to MH-TE: Cable routing from the 4500N Central Office would be through mostly existing underground duct bank north of Central Ave. routed thru MH-A1, MH-TB, MH-S2, & MH-TC, MH-TD, & MH-S4 to MH-TE.	Telecom GPP Contractor	Telecom GPP Contractor	4/03 Complete	Y	Telecom cables include fiber optic and copper cables for telephone, networking, and security alarms. In case another pathway is required, a short duct bank is being added between MH-S2 & MH-TB to allow use of the secondary routing path North of Central Ave.

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East Campus Development
Utility Tie-Ins (sorted by system)

Utility	Related Project	Project WBS	From	To	Routing	Installer	Tie-In By*	Planned/ Actual Completion Date	Third Party/ State Easement	Comments
Telecommunications (continued)										
Telecom Cables between 4500N Central Office to MH-B2-1 & MH-B2-2	Telecom GPP	1.02.01	4500N Central Office	MH-B2-1 & MH-B2-2	Route cables thru existing underground duct bank along Central Ave and 6th Street to MH-B-2, to new MH-B-2A, thru new duct bank to new MH-TE & thru Third Party duct bank to MH-B2-1 & MH-B2-2.	Telecom GPP Contractor	Telecom GPP Contractor	4/03 Complete	Y	Telecom cables include copper cables for telephone. These cables will be coiled in MH-B2-1 for future use by JICS and coiled in MH-B2-2 for future use by RSC.
Telecom Cables & Duct Bank between 4512 (LSS) & CSB-RDF	Telecom GPP	1.02.01	4512 (LSS)	CSB-RDF	Route cables thru new & existing duct bank to MH-B-3 and up 6th Street to MH-B-2 & 2A. From MH-B-2A, route cables thru new underground duct bank to new MH-TE & thru Third Party duct bank to MH-B2-1 & the CSB-RDF.	Telecom GPP Contractor	Telecom GPP Contractor	4/03 Complete	Y	Telecom cables include fiber optic and copper cables for fire alarms, badge readers, security alarms, and the master fan shutdown.
Telecom Cables between 4512 (LSS) and MH-B2-1 and/or MH-B2-2	Telecom GPP	1.02.01	4512 (LSS)	MH-B2-1 and/or MH-B2-2	Route cables thru new and existing duct bank to MH-B-3 and up 6th Street to MH-B-2 /2A. From MH-B-2A, route thru new underground duct bank to new MH-TE & thru Third Party duct bank to MH-B2-1 & MH-B2-2	Telecom GPP Contractor	Telecom GPP Contractor	4/03 Complete	Y	Telecom cables include fiber optic cables for fire alarms and badge & pass.
Telecom Cables between CSB-RDF to MH-B2-1 in Third Party Duct Banks	Telecom GPP	1.02.01	CSB-RDF	MH-B2-1	Cable routed thru Third Party underground duct banks from CSB-RDF to MH-B2-1	Telecom GPP Contractor	Telecom GPP Contractor	4/03 Complete	Y	The Telecom GPP will leave cables coiled in MH-B2-1. Telecom cables include copper and fiber optic cables for networks, telephone, badge readers, security alarms, and master fan shutdown.
Telecom Cables between CSB-RDF and MH-B2-2	Telecom GPP	1.02.01	CSB RDF	MH-B2-2	Cable routed thru Third Party underground duct banks from CSB-RDF thru MH-B2-1 to MH-B2-2.	Telecom GPP Contractor	Telecom GPP Contractor	4/03 Complete	Y	The Telecom GPP will leave cables coiled in MH-B2-2. Telecom cables include copper and fiber optic cables for networks, telephone, CATV, master fan shutdown, badge readers, and security alarms.
Duct Bank between MH-TE to TD	Telecom GPP	1.02.01	MH-TE	MH-TD	Provide underground duct bank from new MH-TE to MH-TD to enable the use of existing conduit from 4500N that runs north of Central Ave.	Telecom GPP Contractor	Telecom GPP Contractor	3/03 Complete	Y	This duct bank is being provided as a secondary pathway from 4500N to the East Campus Area.
CSB-RDF to JICS	JICS/ORCAS & Telecom GPP	1.01.05	MH-B2-1	JICS Building Distribution Facility (BDF)	JICS will provide underground duct banks and the Telecom GPP will pull/splice cables to the JICS BDF.	State Contractor & Telecom GPP Contractor (QWEST)	Telecom GPP Contractor	1/04	N	Telecom cables include copper and fiber optic cables for networks, telephone, badge readers, fire alarms, security alarms, and master fan shutdown.
CSB-RDF to RSC	RSC LI Project & Telecom GPP	1.01.04	Manhole MH-B2-2	RSC BDF	RSC will provide underground duct banks and Telecom GPP will pull/splice cables to the RSC BDF.	RSC Contractor & Telecom GPP Contractor (QWEST)	Telecom GPP Contractor	7/04	N	Telecom cables include copper and fiber optic cables for networks, telephone, CATV, badge & pass, badge readers, fire alarms, security alarms, and master fan shutdown.
Landscaping										
ROB Stabilization	Third Party Project	1.01.03	N/A	N/A	N/A	Third Party Contractor	N/A	7/03 Complete	Y	
ETF, CSB, and South ROB Hardscape & Landscape	Third Party Project	1.01.03	N/A	N/A	N/A	Third Party Contractor	N/A	9/03 Complete	Y	
Main Entry & North Parking Court	Main Entrance Modifications & Parking IGPP	1.08.03	Bethel Valley Road	North Parking Court between RSC & JICS/ORCAS	N/A	Main Entrance Mods & Parking FPSC	N/A	4/04	N	

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East Campus Development
Utility Tie-Ins (sorted by system)

Utility	Related Project	Project WBS	From	To	Routing	Installer	Tie-In By*	Planned/ Actual Completion Date	Third Party/ State Easement	Comments
Landscaping (continued)										
Interpretive Terrace & Pergola between JICS/ORCAS and RSC	Main Entrance Modifications & Parking IGPP	1.08.03	North Parking Court	Quadrangle Lawn	N/A	Main Entrance Mods & Parking FPSC	N/A	9/04	N	
Visitors Center Plaza & Passenger Drop-off Node	Main Entrance Modifications & Parking IGPP	1.08.03	Main Entry Road	RSC	N/A	Main Entrance Mods & Parking FPSC	N/A	9/04	N	
Entry & Parking Landscaping	Main Entrance Modifications & Parking IGPP	1.08.03	Main Entry Road	RSC	N/A	Main Entrance Mods & Parking FPSC	N/A	3/05	N	
Quadrangle Lawn between	Quadrangle Common Area GPP	1.08.01	JICS/ORCAS	7th Street	N/A	Quad Common Area FPSC	N/A	8/04	N	
7th Street, Adjacent Hardscape, & Landscape	Quadrangle Common Area GPP	1.08.01	Passenger Drop-off Node	Extended Central Avenue	N/A	Quad Common Area FPSC	N/A	11/04	N	
Outside Dining Area adjacent to RSC	Quadrangle Common Area GPP	1.08.01	South side of RSC	East side of RSC	N/A	Quad Common Area FPSC	N/A	9/04	N	
Natural Grass Areas East & North of RSC	Quadrangle Common Area GPP	1.08.01	Bethel Valley Road	Pond	N/A	Quad Common Area FPSC	N/A	6/05	N	
Central Avenue Road Extension including Adjacent Hardscape & Landscape	Central Avenue Extension IGPP	1.08.02	Southeast of Building 5002	Northwest of Building 6012	N/A	Central Ave. Ext. FPSC	N/A	9/03 - Hardscape 3/04 - Landscape	Y	
Gathering Area Surfacing, Hardscape, & Landscape Northeast of ROB	Central Avenue Extension IGPP	1.08.02	ROB	Building 6012	N/A	Central Ave. Ext. FPSC	N/A	9/03 - Hardscape 3/04 -	Y	
Gathering Area Surfacing, Hardscape, & Landscape Northwest of ROB	Central Avenue Extension IGPP	1.08.02	6th Street	ROB	N/A	Central Ave. Ext. FPSC	N/A	9/03 - Hardscape 3/04 -	Y	
Gathering Area Surfacing, Hardscape, & Landscape Northeast of 4500N	Central Avenue Extension IGPP	1.08.02	Northwest of 4500N	6th Street	N/A	Central Ave. Ext. FPSC	N/A	9/03 - Hardscape 3/04 -	Y	
JICS/ORCAS Hardscape/Landscape	JICS/ORCAS State Project & Central Avenue Extension IGPP	1.01.05	West and South of JICS/ORCAS	State Property Boundary	NA	State Contractor & Central Ave. Ext. FPSC	N/A	4/04	Y	Central Ave. Extension FPSC will interface @ south side of JICS/ORCAS
Storm Drains										
Modify Existing Headwall at Detention Basin	East Campus Storm Drain Mods IGPP	1.08.04	Detention Basin	N/A	N/A	Storm Drain Mods FPSC	N/A	3/03 Complete	N	
36/48-inch RCP Line From Detention Basin to 30/48-inch RCP Line on Third Party North Boundary	East Campus Storm Drain Mods IGPP	1.08.04	Detention Basin	48" RCP Line on Third Party North Boundary	Underground line from detention basin south along east side of Quad to new 30/48" RCP line at new area drain.	Storm Drain Mods FPSC	Storm Drain Mods FPSC	6/03 Complete	N	
Step Weir	East Campus Storm Drain Mods IGPP	1.08.04	Pond	N/A	N/A	Storm Drain Mods FPSC	N/A	6/03 Complete	N	
24/30/48-inch RCP Line Along Third Party North Boundary	Third Party Project	1.01.03	Central Avenue @ ROB	Existing 4"x 60" @ Entrance to 6010	Underground line from new area drain/manhole @ northwest Third Party boundary to existing 40" x 60" CMP @ entrance to 6012.	Third Party Contractor	Third Party Contractor	5/03 Complete	Y	
6, 15, & 18-inch Lines on ROB & CSB West Side	Third Party Project	1.01.01	Area & Roof Drains on West Side	Existing Manholes @ 6th Street	Underground lines from roof and foundation drains.	Third Party Contractor	Third Party Contractor	3/03 Complete	Y	

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East Campus Development
Utility Tie-Ins (sorted by system)

Utility	Related Project	Project WBS	From	To	Routing	Installer	Tie-In By*	Planned/ Actual Completion Date	Third Party/ State Easement	Comments
Storm Drains (continued)										
6, 12 & 15-inch Lines on ROB & ETF South Side	Third Party Project	1.01.02	Area & Roof Drains on South Side	Existing Manholes @ White Oak Avenue	Underground lines from roof and area drains.	Third Party Contractor	Third Party Contractor	3/03 Complete	Y	
12-inch CPP Line Around JICS	JICS/ORCAS State Project	1.01.05	NW & SW Drain Areas	24" RCP Line on Third Party North Boundary	Underground line from northwest and southwest drain areas to 24" RCP line on Third Party North boundary.	State Contractor	State Contractor	5/03 Complete	Y	
15-inch RCP Lines North & West of RSC	RSC LI Project	1.01.04	North & West Drains	48" RCP Line on Third Party North Boundary	Underground line from north and west drains to 48" line on Third Party North boundary.	RSC Contractor	RSC Contractor	6/03 Complete	N	
15-inch RCP Line East of RSC to Third Party North East Boundary	RSC LI Project	1.01.04	RSC East entrance parking lot catch basin	New manhole/area drain at Northeast Third Party Project boundary.	Underground 18-inch line from RSC East entrance catch basin to 48-inch RCP @ Northeast Corner of Third Party boundary.	RSC Contractor	RSC Contractor	5/03 Complete	N	

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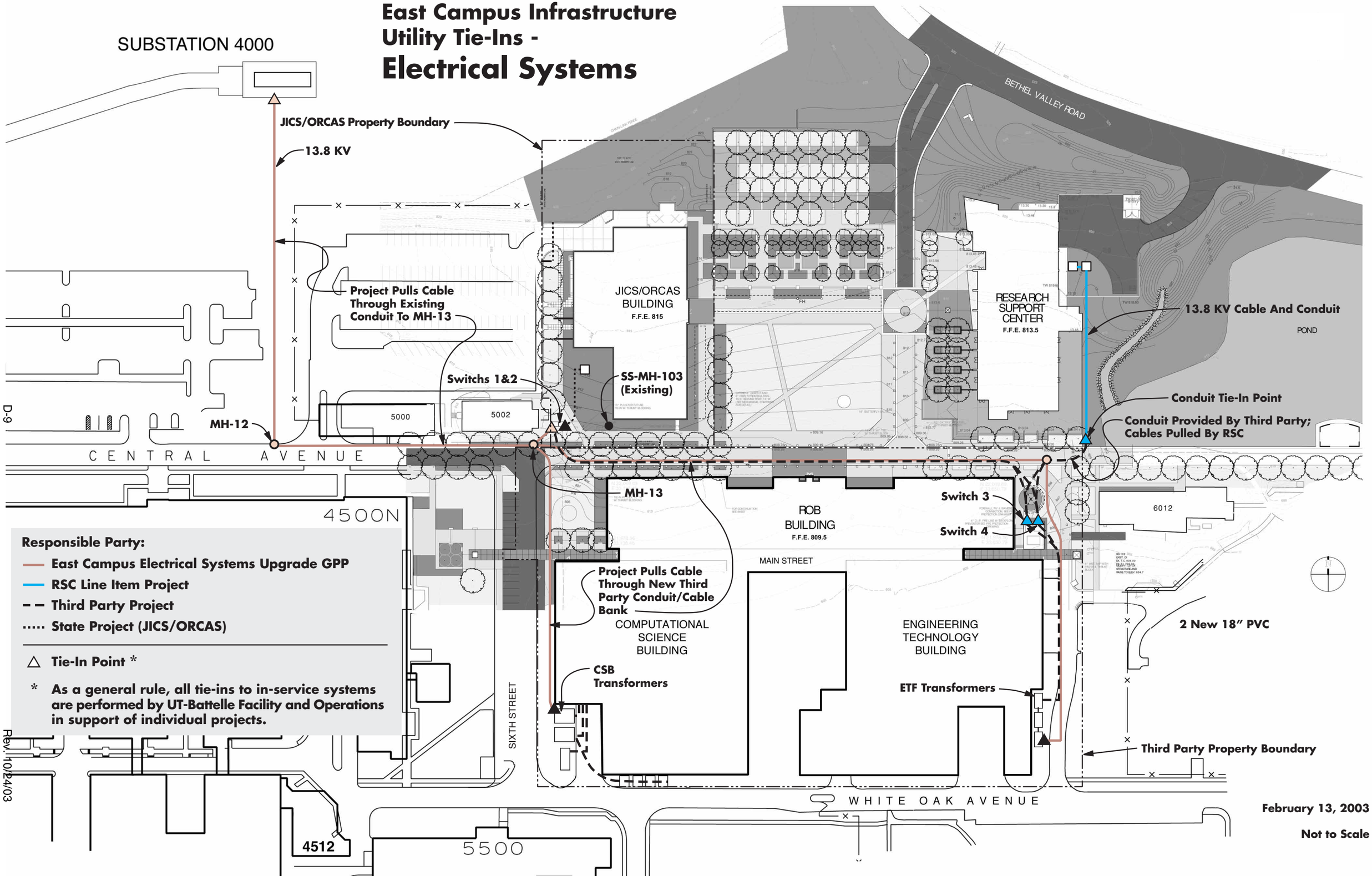
East Campus Development
Utility Tie-Ins

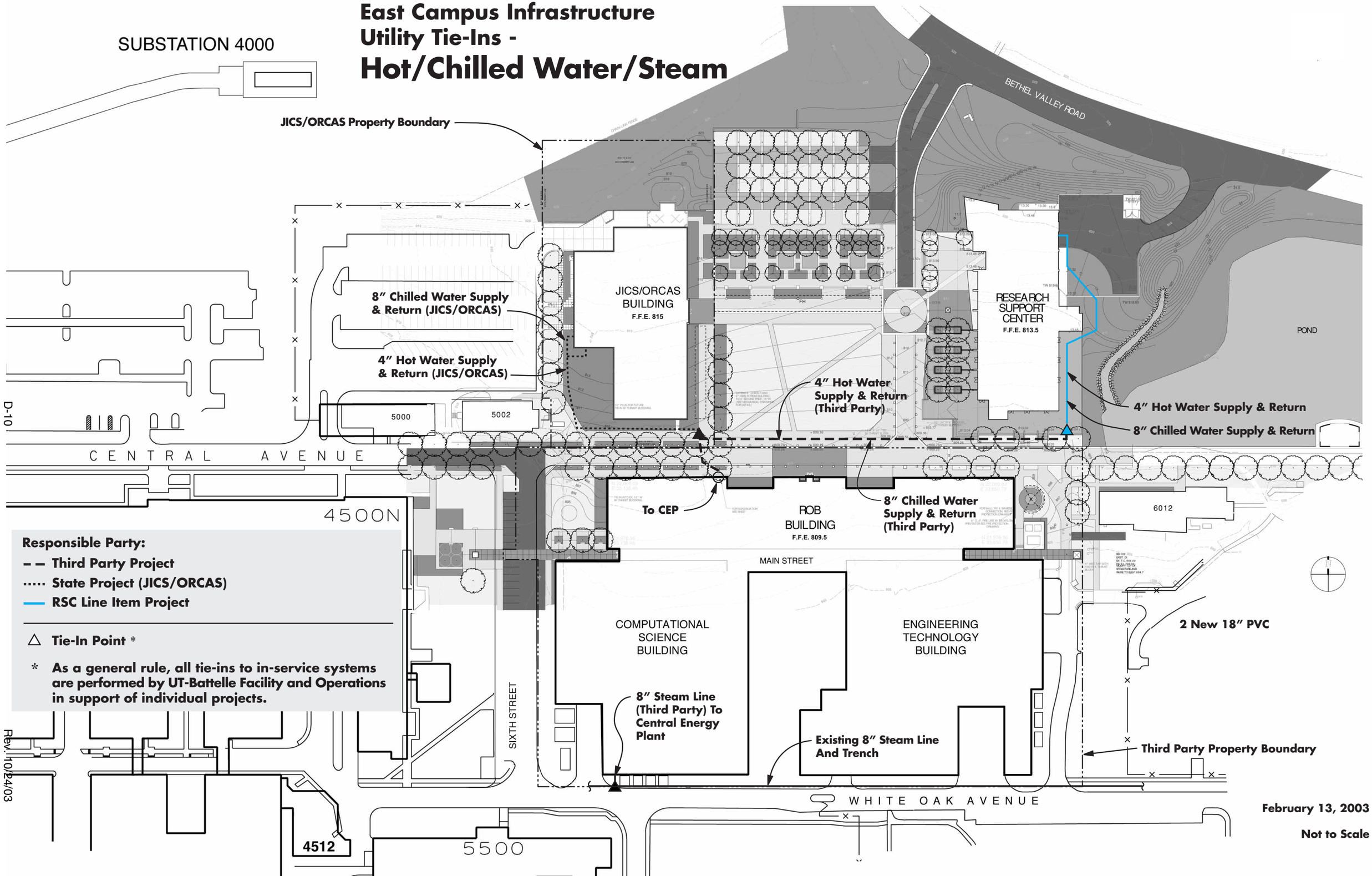
Utility	Related Project	From	To	Routing	Installer	Tie-In By*	Planned/ Actual Completion Date	Third Party/ State Easement	Comments
Storm Drains									
Modify Existing Headwall at Detention Basin	East Campus Storm Drain Mods IGPP	Detention Basin	N/A	N/A	Storm Drain Mods FPSC	N/A	3/03	N	
36/48-inch RCP Line From Detention Basin to 30/48-inch RCP Line on Third Party North Boundary	East Campus Storm Drain Mods IGPP	Detention Basin	48" RCP Line on Third Party North Boundary	Underground line from detention basin south along east side of Quad to new 30/48" RCP line at new area drain.	Storm Drain Mods FPSC	Storm Drain Mods FPSC	5/03	N	
Step Weir	East Campus Storm Drain Mods IGPP	Pond	N/A	N/A	Storm Drain Mods FPSC	N/A	5/03	N	
Slipline 5 existing 24-inch CMPs	Detention Basin GPP	Existing 40"x 60" CMP	N/A	Slip line 5 existing 24" CMP	Storm Drain Mods FPSC	N/A	7/05	N	Additional scope proposed for the Detention Basin GPP
Improve the existing underground storm water system south of 6012 to the junction with the 40"x60" CMP just east of ETF	Detention Basin GPP	Existing 36" CMP south of 6012	Existing 40"x 60" CMP east of ETF	Add new manhole at the junction of the existing 36" CMP with two exiting 18" CMPs. Replace 2-18" CMPs with 2-18" PVC pipes northeast from the junction with the existing 40"x60" CMP to an area drain south of 6012.	Storm Drain Mods FPSC	Storm Drain Mods FPSC	7/05	N	Additional scope proposed for the Detention Basin GPP
24/30/48-inch RCP Line Along Third Party North Boundary	Third Party Project	Central Avenue @ ROB	Existing 4"x 60" @ Entrance to 6010	Underground line from new area drain/manhole @ northwest Third Party boundary to existing 40" x 60" CMP @ entrance to 6012.	Third Party Contractor	Third Party Contractor	5/03	Y	
6, 15, & 18-inch Lines on ROB & CSB West Side	Third Party Project	Area & Roof Drains on West Side	Existing Manholes @ 6th Street	Underground lines from roof and foundation drains.	Third Party Contractor	Third Party Contractor	3/03	Y	
6, 12 & 15-inch Lines on ROB & ETF South Side	Third Party Project	Area & Roof Drains on South Side	Existing Manholes @ White Oak Avenue	Underground lines from roof and area drains.	Third Party Contractor	Third Party Contractor	3/03	Y	
12-inch CPP Line Around JICS	JICS/ORCAS State Project	NW & SW Drain Areas	24" RCP Line on Third Party North Boundary	Underground line from northwest and southwest drain areas to 24" RCP line on Third Party North boundary.	State Contractor	State Contractor	5/03	Y	
12-inch RCP Lines North & West of RSC	RSC LI Project	North & West Drains	48" RCP Line on Third Party North Boundary	Underground line from north and west drains to 48" line on Third Party North boundary.	RSC Contractor	RSC Contractor	6/03	N	
18-inch RCP Line East of RSC to Third Party North East Boundary	RSC LI Project	RSC East entrance parking lot catch basin	New manhole/area drain at Northeast Third Party Project boundary.	Underground 18-inch line from RSC East entrance catch basin to 48-inch RCP @ Northeast Corner of Third Party boundary.	RSC Contractor	RSC Contractor	5/03	N	
Detention Basin	Detention Basin GPP	Bethel Valley Road	N/A	N/A	Detention Basin FPSC	N/A	7/05	N	

* As general rule, all final tie-ins to in-service utility systems are performed by UT-Battelle Facility and Operations in support of individual projects.

East Campus Infrastructure Utility Tie-Ins - Electrical Systems



East Campus Infrastructure Utility Tie-Ins - Hot/Chilled Water/Steam



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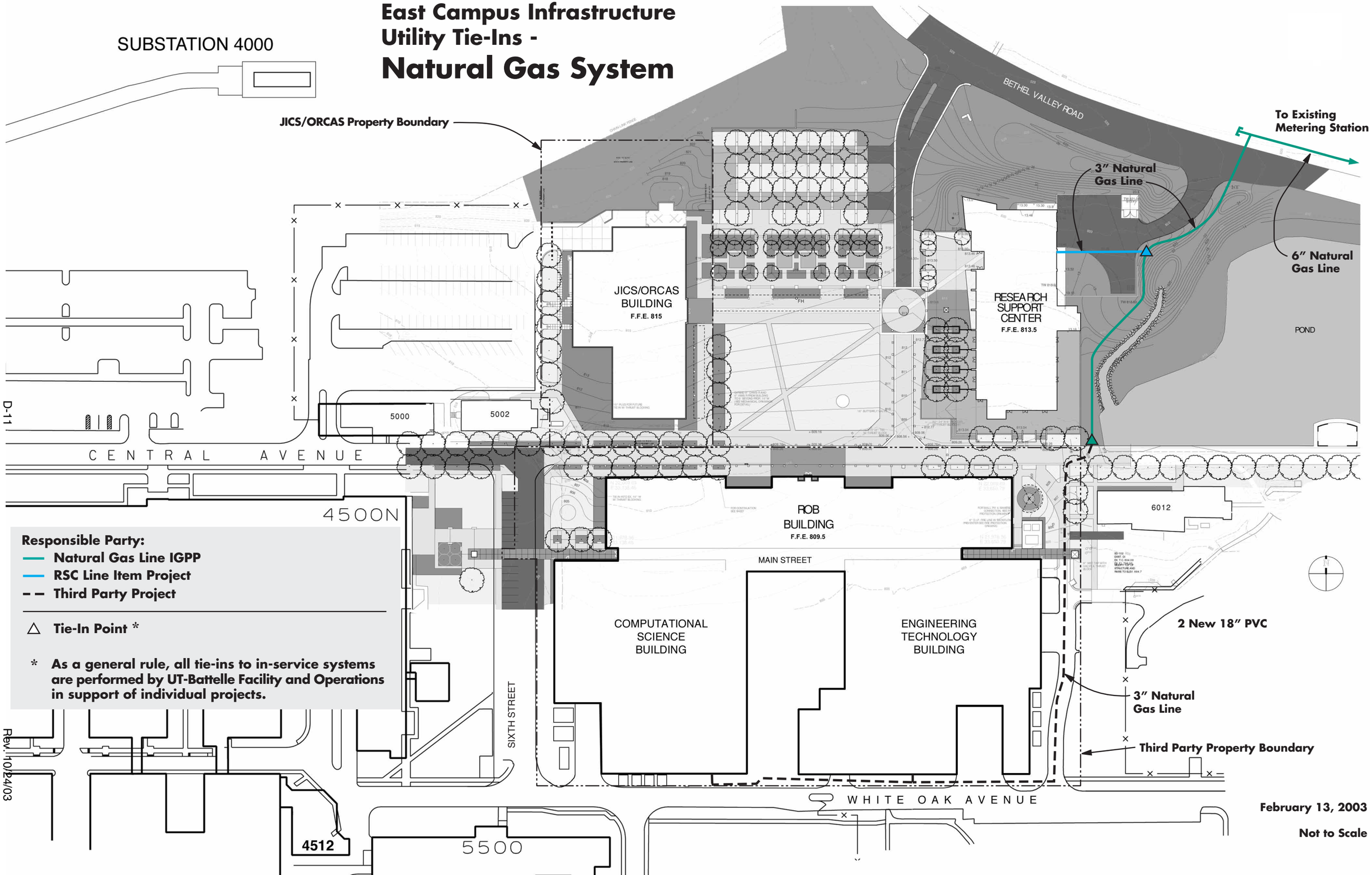
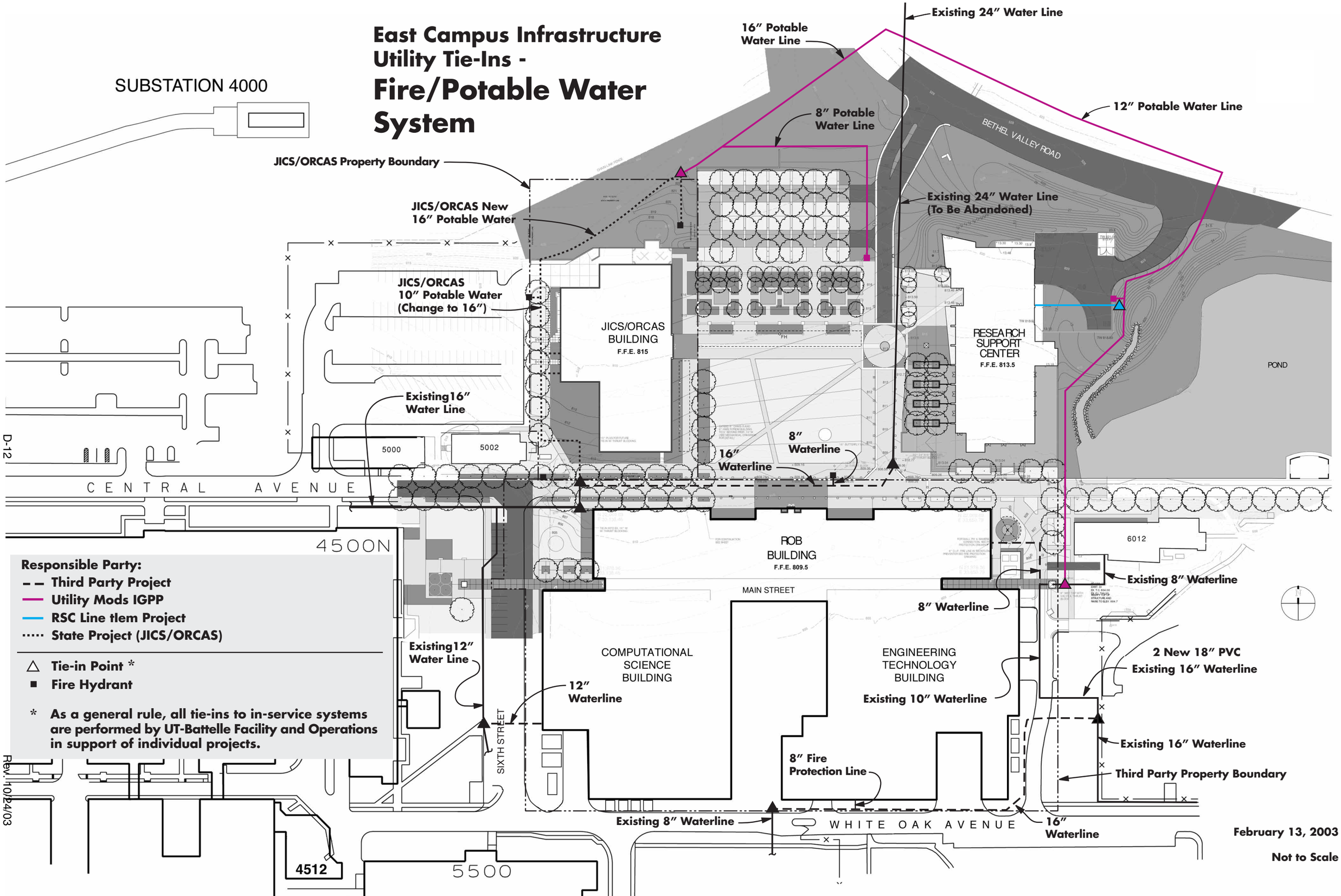
East Campus Infrastructure Utility Tie-Ins - Natural Gas System



East Campus Infrastructure Utility Tie-Ins - Fire/Potable Water System



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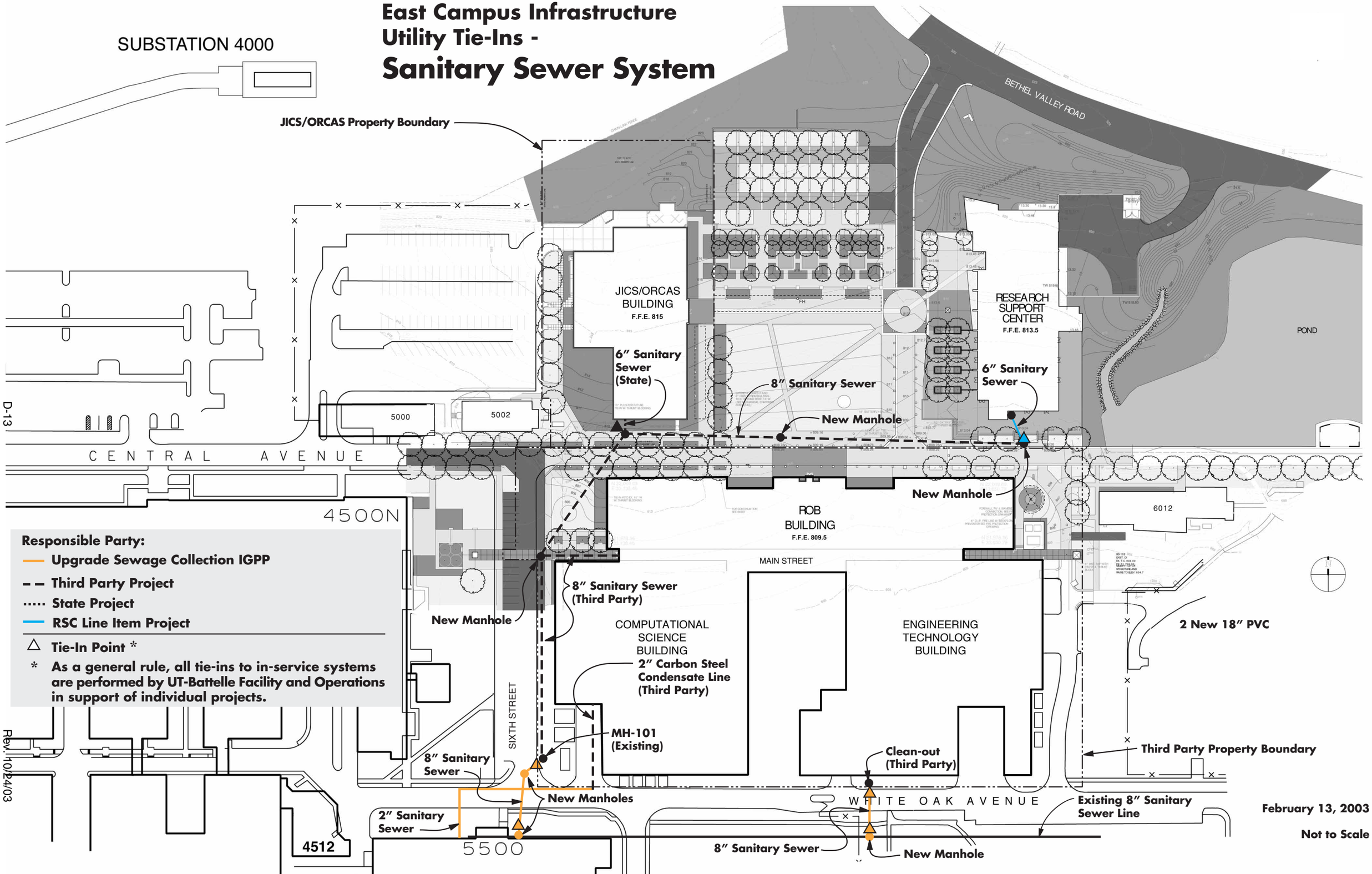
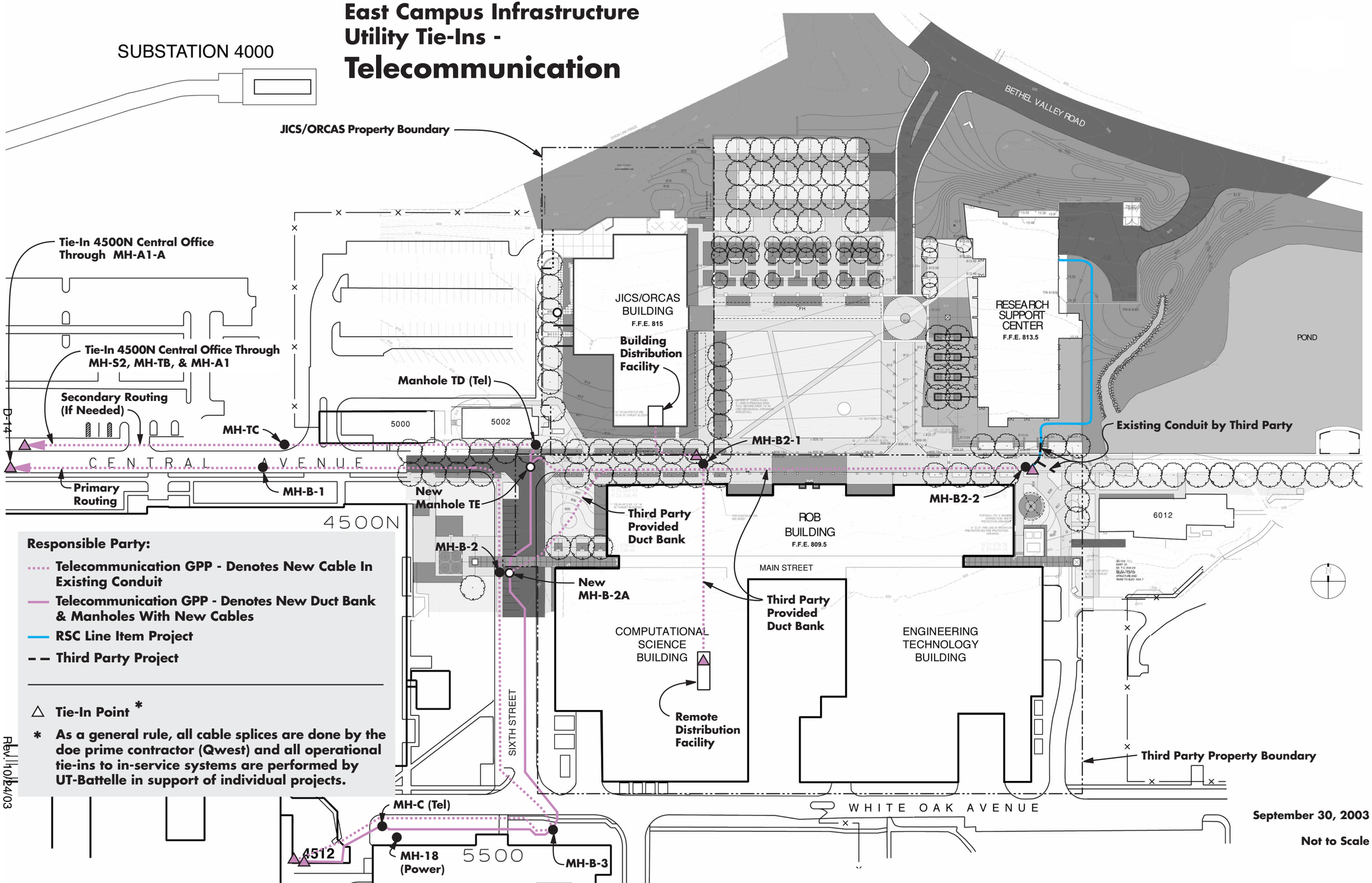
East Campus Infrastructure Utility Tie-Ins - Sanitary Sewer System



East Campus Infrastructure Utility Tie-Ins - Telecommunication



Responsible Party:

- Telecommunication GPP - Denotes New Cable In Existing Conduit
- Telecommunication GPP - Denotes New Duct Bank & Manholes With New Cables
- RSC Line Item Project
- Third Party Project

△ Tie-In Point *

* As a general rule, all cable splices are done by the doe prime contractor (Qwest) and all operational tie-ins to in-service systems are performed by UT-Battelle in support of individual projects.

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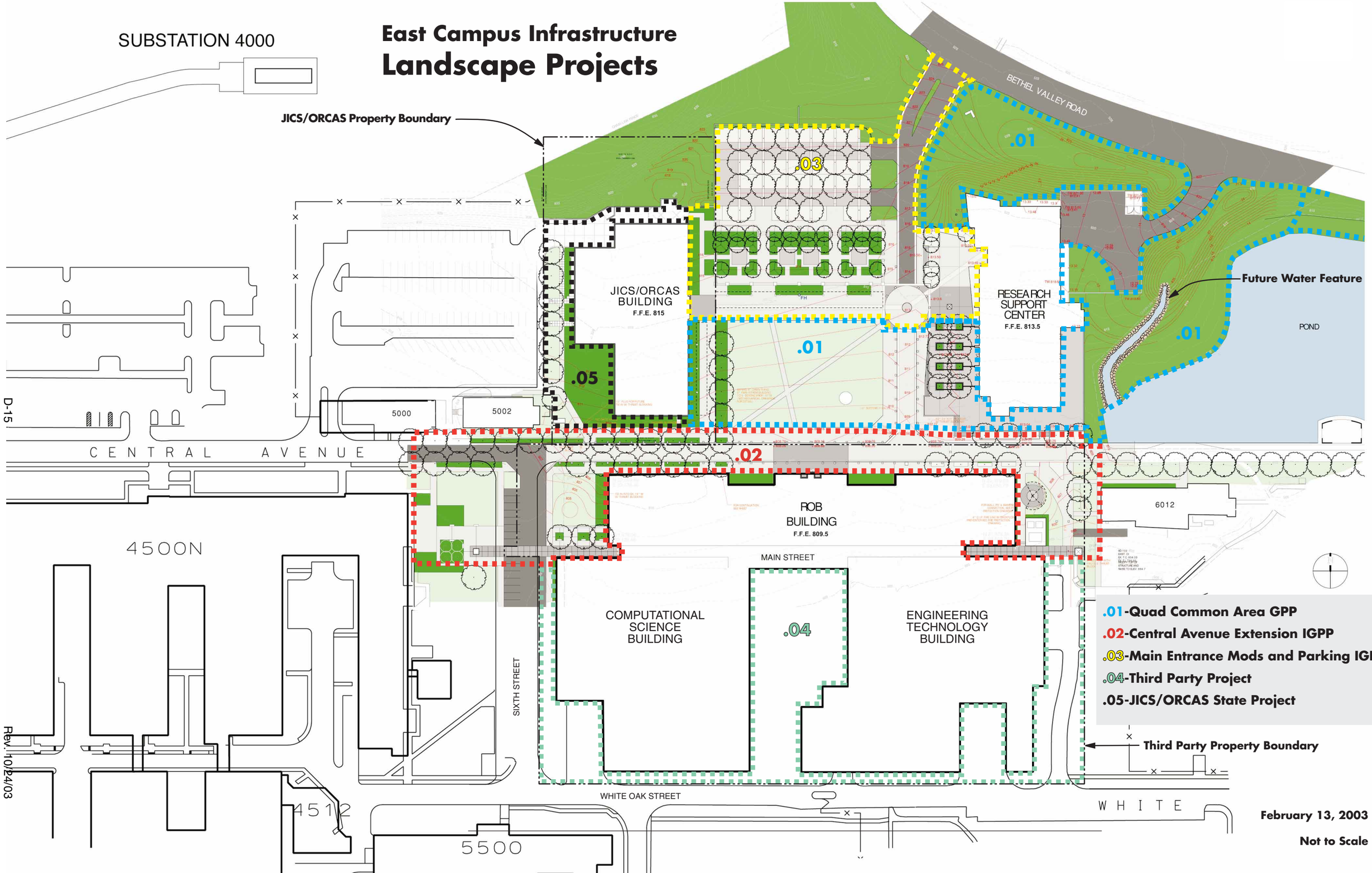
East Campus Infrastructure
Landscape Projects



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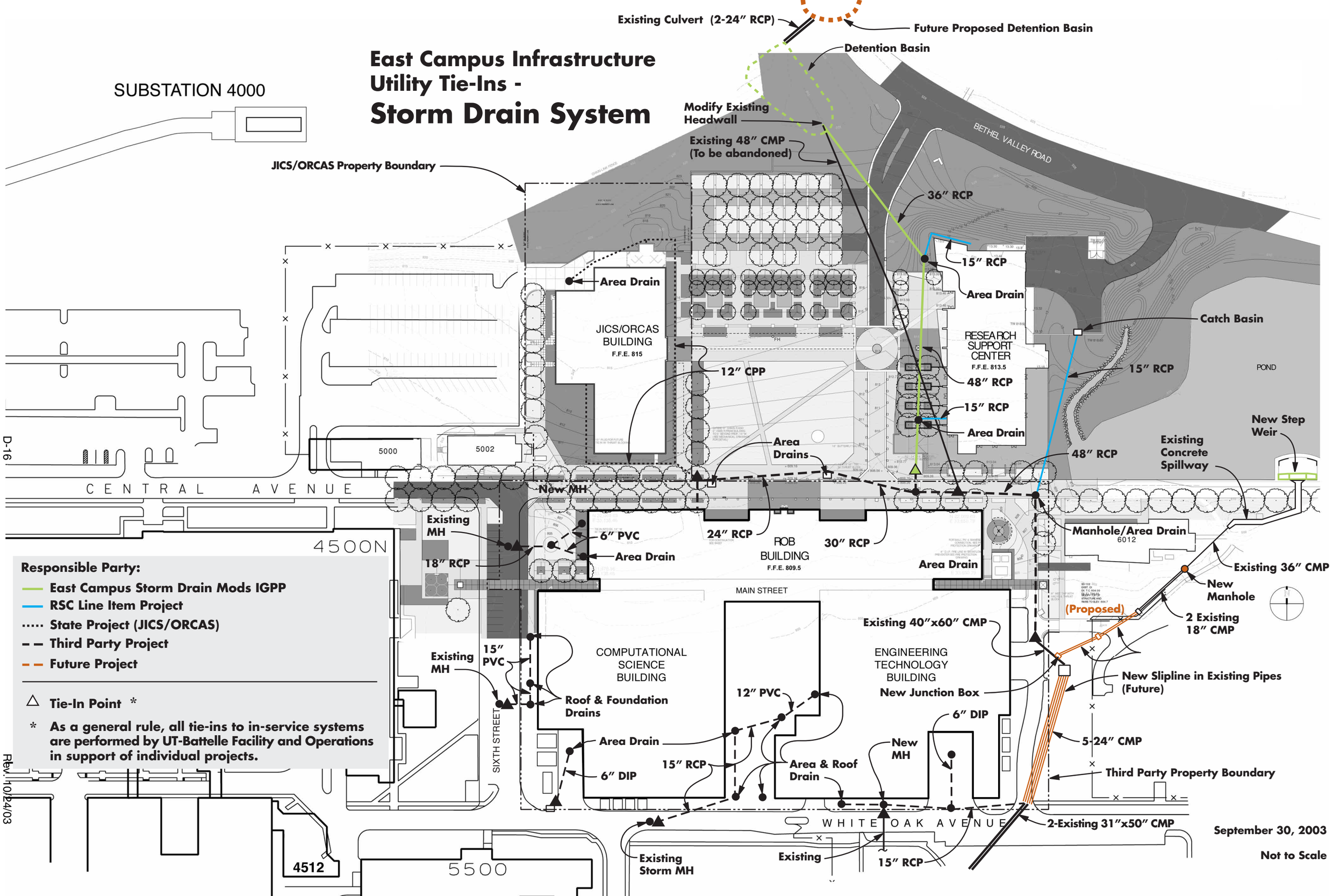
East Campus Infrastructure Utility Tie-Ins - Storm Drain System



Responsible Party:

- East Campus Storm Drain Mods IGPP
- RSC Line Item Project
- State Project (JICS/ORCAS)
- Third Party Project
- Future Project

△ Tie-In Point *

* As a general rule, all tie-ins to in-service systems are performed by UT-Battelle Facility and Operations in support of individual projects.

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