(2)

September 1993

Strategically Planning Avionics Laboratory's Facilities for the Future

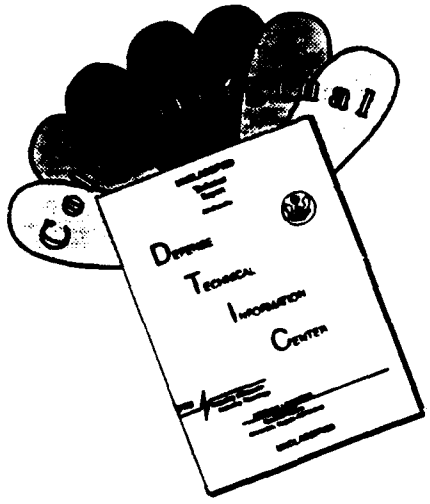
AF205R1

Jeffrey A. Hawkins
Trevor L. Neve

Prepared pursuant to Department of Defense Contract MDA903-90-C-0006. The views expressed here are those of the Logistics Management Institute at the time of issue but not necessarily those of the Department of Defense. Permission to quote or reproduce any part except for Government purposes must be obtained from the Logistics Management Institute.

Logistics Management Institute
6400 Goldsboro Road
Bethesda, Maryland 20817-5886

DISCLAIMER NOTICE



THIS DOCUMENT IS BEST QUALITY AVAILABLE. THE COPY FURNISHED TO DTIC CONTAINED A SIGNIFICANT NUMBER OF COLOR PAGES WHICH DO NOT REPRODUCE LEGIBLY ON BLACK AND WHITE MICROFICHE.

Strategically Planning Avionics Laboratory's Facilities for the Future

Executive Summary

The Avionics Laboratory at Wright-Patterson Air Force Base is one of this country's leading research and development centers for aircraft electronics. Performance of its highly technical mission depends on the effective utilization of all the resources at its disposal, including its facilities. Avionics Laboratory's success depends on having the right quantity and types of space available for its research activities when and where they are needed.

The Logistics Management Institute (LMI) helped the Avionics Laboratory establish a multiyear strategy for improving its facility utilization nearly 7 years ago. That plan, which is still being implemented today, is now outdated. Changes to research programs, organizational structure, and staffing at the Avionics Laboratory have significantly changed the requirements for space, and reductions in its military construction funding and subsequent changes in project scope and schedule have reduced its new construction to 90,000 gross square feet which must now be built in two phases. As a result of these changes, LMI was asked to create new configuration plans and implementation strategies for both construction phases, which are scheduled for completion in FY95 and FY97.

The primary justification for Phase I construction was to consolidate and integrate as much of the Avionics Laboratory's separated research activities as possible into Building 620. The total space requirement for all those research activities that need to be in Building 620 is 218,695 net square feet, but Building 620 has only 203,895 net square feet available. Thus, at the end of Phase I construction in FY95, the space deficit will be 14,800 square feet. Although Phase II construction will add another [illegible].000 net square feet to the building, three modular buildings near Building [illegible] must be removed at the same time (part of the justification for Phase II co[illegible]ction), and that will create a net loss of 14,860 square feet from space available to Avionics Laboratory activities. Also during that time, Avionics Laboratory's space requirements are expected to increase by about 2,000 square feet; therefore, even with the Phase II construction, its space shortage will only be reduced from 14,800 to 9,660 square feet.

While these Phase I and Phase II space deficits appear large, they are not altogether unmanageable. We recommend that Avionics Laboratory take the following three actions to manage and mitigate the impact of this deficit:

- *The Avionics Laboratory should implement the proposed facility layout and reconfiguration strategy.* However, that strategy must be continually reviewed and updated as changes occur to Avionics Laboratory's mission, organization, and the staffing. Each of those components has a direct and immediate impact on Avionics Laboratory's requirement for space and, as a result, the recommended space configurations. The Avionics Laboratory must expect change and plan for it.

- *The Avionics Laboratory should adopt a computer-aided space management system to improve the in-house management of its facilities.* In preparing this strategic facility plan, LMI developed and used a space management model to analyze the large quantity of data. Avionics Laboratory should begin managing its space using the supporting facility requirements and inventory data bases, and computer-aided drafting files. LMI will continue to provide the needed training and support during Avionics Laboratory's transition to in-house management of its space.

- *Avionics Laboratory should establish a space management working group.* An empowered committee comprising members of each major operating division (chaired by the Avionics Facilities Branch) should be established to develop Avionics Laboratory space management policy and to review and approve changes to its current and proposed allocation and configuration of space. The recommended space allocations and configuration should set the baseline for any future decisions.

Adopting these recommendations will ensure that, in the future, Avionics Laboratory personnel will be able to manage their own facilities better by more effectively responding to changing mission, space inventories, and space needs.

Contents

Contents (Continued)

Contents (Continued)

List of Figures

Contents (Continued)

List of Tables

CHAPTER 1

Introduction

BACKGROUND

The Avionics Laboratory, a part of the Wright Laboratories,[1] is one of this country's leading research and development (R&D) centers for aircraft and support electronics. Located at Wright-Patterson Air Force Base (AFB), it supports the Air Force's broad R&D program through numerous exploratory and advanced development programs that involve systems for navigation, surveillance, reconnaissance, electronic warfare, fire control, weapon delivery, communications, system architecture, information and signal processing, subsystem integration, supporting electronics, and software research and development.

The Avionics Laboratory's mission-related responsibilities are highly technical and complex, and, to meet its research and cost objectives, it must effectively utilize all the resources at its disposal. In particular, its facilities are a resource that, if utilized efficiently, can lead to lower occupancy costs by reducing the operations and maintenance of occupied space, lower renovation costs by avoiding unnecessary changes to existing space, and lowering major construction costs by eliminating the need for new laboratory facilities. Even more important, facilities can improve the Avionics Laboratory's operational productivity if they are designed and configured to support the research mission, personnel, and activities effectively. Matching facilities to mission needs plays an important role in the success of the Avionics Laboratory – the right kind of facilities in the right quantity must be in the right place at the right times.

Currently, the Avionics Laboratory employs more than 1,000 engineering and support professionals and occupies and manages almost 600,000 gross square feet (close to 370,000 net usable square feet) housed at 11 distinct facilities, used as laboratory, office, and support space.[2] The Avionics Laboratory is operating under a plan that will consolidate several of its currently isolated activities into its primary research facility, Building 620. The consolidation of research activities will reduce the total amount of space occupied, improve communications among researchers, simplify logistics, and eliminate crucial experimental data transmission delays caused when on-line equipment is separated by as much as a mile. The plan – now nearly 7 years old – initiated two new major

[1] Wright Laboratories is located at Wright-Patterson AFB near Dayton, Ohio, and is part of the Aeronautical Systems Division (ASD) of the Air Force Systems Command (AFSC).

[2] *Gross square footage* refers to a facility's total space bounded by the outer face of the exterior walls; *net usable square footage* refers to the space in a facility that can actually be occupied. Net usable space equals the gross space minus the core spaces (mechanical rooms, restrooms, vertical penetrations, janitor closets, etc.) and primary circulation corridors.

military construction (MILCON) projects, which, when completed, will add nearly 90,000 gross square feet to Building 620 and will permit the Avionics Laboratory to consolidate its research activities. Plans call for the construction to take place in two separate phases – referred to in this report as Phase I and Phase II construction. (Chapter 2 presents details on the anticipated construction and its completion schedules.)

Through a series of previous research efforts,[3] the Logistics Management Institute (LMI) has been actively involved in the Avionics Laboratory's space planning and facility configurations. Many of LMI's recommendations have been implemented over the past 7 years, but many of the conditions that led to those recommendations are now outdated. For example, Avionics Laboratory's research mission and program areas have changed – some have been phased out and others have arisen. As mission areas changed so too did the staffing and organizational alignment of some Avionics Laboratory activities. Changes to mission areas and staffing, of course, mean changes in the requirements for office, laboratory, and support space. Additionally, the Avionics Laboratory's inventory of facilities and space available for their occupancy is not the same as it was 7 years ago, and recently, because of reduced MILCON funding levels, the scope of both Phase I and Phase II construction projects will result in lower gross square footage in Building 620 than was originally anticipated. Thus, all the recent changes to those factors that influence the proposed configuration of the Avionics Laboratory's facilities (especially Building 620) mean that the current blueprint the Avionics Laboratory is using to plan its future facility configuration may no longer be applicable. Therefore, the allocation of space to each Avionics Laboratory activity and the configuration of existing and future facilities (after Phases I and II construction) should now be revisited to answer the following questions:

- Do Avionics Laboratory facilities currently meet its mission needs and are the current layout and reconfiguration plans still acceptable?
- What affect does the starting of new programs and the ending of old programs have on Avionics Laboratory facilities?
- What are the Avionics Laboratory's true requirement for space, and will those requirements be satisfied after both construction phases are complete?
- How should Avionics Laboratory facilities be configured to best support its mission after both phases of the proposed construction are complete, and how can the Avionics Laboratory facilities best make the transition from their current state to the proposed layouts?

This study addresses those questions and presents the Avionics Laboratory with a detailed configuration and implementation plan for Building 620 after Phase I and Phase II construction is complete. While this study's methodology is

[3] LMI Report AF502, *Avionics Laboratory Configuration and Implementation Plans*, Douglas K. Ault and David Fagen, February 1986. LMI Report AF602, *Avionics Laboratory Phased Construction Plan*, Douglas K. Ault and Richard W. Menge, August 1986.

Phase I and Phase II construction is complete. While this study's methodology is based on LMI's previous efforts, it takes a modern look at Avionics Laboratory space requirements, its current inventory of space, its mission, and changes to current and proposed MILCON, and provides fresh answers about the allocation and configuration of space in the Avionics Laboratory's primary research facility, Building 620.

Avionics Laboratory Organization

The name "Avionics Laboratory" has come to mean that portion of the Wright Laboratories that supports its avionics mission areas and, organizationally, consists primarily of the Avionics Directorate (AA) and the Solid State Electronics Directorate (EL). In addition to AA and EL, other Wright Laboratories elements provide needed administrative, computer, security, and contracting support to ensure its efficient operation. Those other elements provide essential administrative functions and should be located proximate to the Avionics Laboratory activities they support. Therefore, since those groups currently occupy space in the Avionics Laboratory and will need space in future Avionics Laboratory layouts, we have included them in this study. Appendix A shows the organizational placement of AA and EL in Wright Laboratories along with their detailed organization charts. A complete listing of all the other Wright Laboratories organizations involved in this study are also highlighted.

Study Methodology

The Avionics Laboratory asked LMI to develop an improved facility configuration for Building 620 through both phases of planned construction and to prepare an implementation plan that would enable their facilities to make the transition from the current configuration to the one proposed. To do the task right, we adopted a strategic facilities planning model that establishes a relationship between the Avionics Laboratory's mission objectives and its facility objectives. The model takes into account changes in the Avionics Laboratory's business needs that have a direct affect on space needs. The Avionics Laboratory's space requirements, space inventory, planning criteria, organizations and staffing, and mission areas change frequently; our goal was to create a dynamic model that provides us the flexibility we need to adjust space allocations, configurations, and implementation plans as changes occur. Our methodology and strategic facilities planning model can be adopted by Avionics Laboratory space planners so that, in the future, its space can be managed in house. Figure 1-1 illustrates the strategic facilities planning model along with its primary inputs – an understanding of the existing state of Avionics Laboratory's facilities, "where you are," and the desired results, "where you want to be."

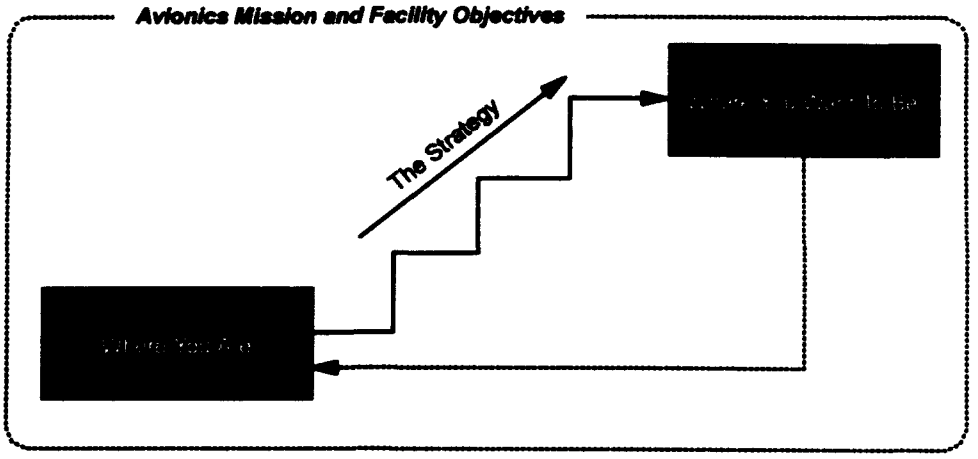


Figure 1-1.
Strategic Facilities Planning Model

"Where you are" is defined by a comprehensive inventory of existing Avionics Laboratory facility resources that includes the following:

- Quantity of space
- Types of space (laboratory, office, support, and public)
- Current occupancies of that space by group
- Planned increases or decreases to current space assets.

"Where you want to be" is defined by a comprehensive description of Avionics Laboratory's requirements for space, including the following:

- Quantity of space needed by each group today and in the future
- Functional relationships among all organizational activities and support areas
- Anticipated changes in program areas.

On the basis of all of those factors, the model provides a facility configuration that improves the Avionics Laboratory's productivity and that shows the amount and location of space by type for each group.

The difference between the existing facility baseline and the desired facility results defines the series of steps or the "strategy" that will be followed to achieve those goals. The model is constrained by the Avionics Laboratory's business and facility objectives, such that only those facility requirements that are consistent with standing mission and facility objectives need be considered. The

model is also cyclic and dynamic – as the strategic steps are realized, a new baseline (where you are) is formed, and, as the space planning goals change (which is particularly likely in an R&D environment), the most effective strategy to achieve those goals also will probably change. As a result, the model is constantly updated, the desired goals are frequently being reformulated, and the old strategies are abandoned in favor of new strategies that attempt to achieve those goals in the changing environment.

At the Avionics Laboratory, we began the strategic facilities planning process through a series of interviews to determine each AA and EL activity's mission. We then inventoried all Avionics Laboratory space by type (office, laboratory, or support) and by group to gain a full understanding of the existing conditions at each of their 11 facilities. How much space did the Avionics Laboratory currently occupy? What type of space was it? What groups were in it?

Next, we employed a bottom-up approach to calculate the space requirements for each AA and EL activity (plus miscellaneous other Wright Laboratories activities) needing space in Building 620. Existing space requirements were developed for office, laboratory, and support spaces and were subsequently forecast for future years (1994, 1995, 1997, and 1999). Activities that interact frequently or transfer a high volume (or high value) of product or information among them should be located proximate to each other to improve productivity. From those intergroup and intragroup relationships, we developed a comprehensive set of proximity requirements that establish which groups need to be *close to other groups* and which groups had a negative impact on other groups (for example, a negative impact would occur if executive offices were placed next to a noisy laboratory or cafeteria).

With all the space inventory and space requirements information, our next step was to determine the best configuration for Building 620 – how much space does each group get by type and where is that space best located to maximize productivity to its research mission? To facilitate our analysis and give us the flexibility we needed to react to anticipated changes, we input all space inventory, space requirements, office size standards, and proximity requirements into a space management software program called *FM:Space Management*™[4]. At the same time, we loaded all the Building 620 floor plans for the existing, Phase I, construction and Phase II construction plans into a computer-aided design and drafting (CADD) package to get a graphical representation of the existing and later the proposed floor plans. The industry standard *AUTOCAD*™ was used. By integrating the two separate packages, we achieved a computer-aided space management system that allowed us to manipulate the data, draw comparisons between existing and required space, and query the data base to generate the needed information to begin answering the key questions. We could then quickly, efficiently, and accurately develop alternative solutions and scenarios for satisfying the Avionics Laboratory's space needs. The quantification allowed us to score, set priorities, and perform sensitivity analyses on optional solutions so that we could select the alternatives best suited to the Avionics Laboratory. Once an optimal configuration was determined, we were able to develop the

[4] *FM:Space Management*, Version 4.0. FM:Systems, Raleigh, N.C.

strategy that would achieve that configuration through a series of executable steps using a critical path network.

Report Organization

The remainder of this report follows the same logical sequence outlined in the above study methodology. Chapter 2 lays out our findings on the Avionics Laboratory's existing inventory of space and contains a number of graphics and tables that inventories the square footage available for occupancies by type of space and the current occupancies by group. That chapter also shows the phased new construction schedule for the Building 620 additions and how much and when new space will be completed and available for occupancy. Chapter 3 describes the methodology used to develop the detailed space requirements for Avionics Laboratory organizations and then summarizes those requirements for each of those organizations. The requirements are summarized by office, laboratory, and support space needs and are given for the present and future years (1994, 1995, 1997, and 1999). In Chapter 4, the recommended allocation and configuration of Avionics Laboratory's space in Building 620 is illustrated after both Phase I and Phase II construction is complete. In those chapters, we present a summary of the space analysis that compares space requirements to inventory, reasons for the space shortages, and recommended solutions for satisfying the shortfalls. CADD drawings that illustrate the proposed solutions are presented in the appendices along with the implementation strategies that will achieve the desired facility layouts. Finally, in Chapter 5, we submit additional conclusions and recommendations for improving space management at the Avionics Laboratory. Those long-term planning recommendations will show Avionics Laboratory space planners and managers how to take a more proactive stance for managing all of Avionics Laboratory space now and in the future.

CHAPTER 2

Space Inventory and Occupancy

Space inventory is one of the basic measures used in the strategic facilities planning methodology for this study. It describes in detail all the existing Avionics Laboratory facility resources and establishes the baseline against which all future changes will be measured. That baseline will be used to determine the feasible future configurations and the impact resulting changes caused by renovations, relocations, and disruption will have on existing operations. This chapter describes Avionics Laboratory's current inventory of space and shows how much space it currently occupies, the type of space in its inventory (laboratory, office, or support), and what groups currently occupy it.

CURRENT SPACE INVENTORY

Various Avionics Laboratory research activities are located at 10 different facilities on Wright-Patterson AFB. Figure 2-1 illustrates their relative locations on the base, and Figure 2-2 presents their gross and net usable space by building. While this study's primary objective is an effective configuration and implementation plan for Building 620 only, an inventory of all the current facilities is important because many of the new space requirements imposed on Building 620 will come from other facilities. Furthermore, not all of the Avionics Laboratory's space needs can or will be satisfied in Building 620 alone. Thus, based on an understanding of the physical capabilities of those other buildings and associated costs for relocating their research activities, we can determine which buildings are more cost-effective to keep and which can readily be vacated.

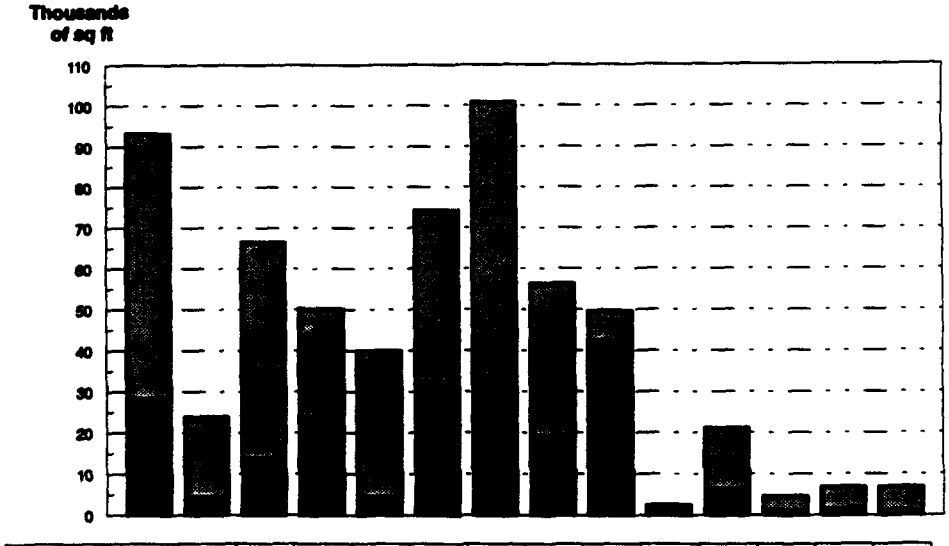
The following subsections present the important factors concerning the entire inventory of buildings currently occupied by AA and EL activities. Far more detailed information is presented on Building 620 since it is the primary focus of this study.

Building 620

Building 620, as the Avionics Laboratory's primary research facility, was specifically designed for its current R&D mission. Figure 2-2 shows that the individual floors, basement, and tower areas of Building 620 currently provide 283,045 gross square feet and 155,270 net usable square feet. The layouts of each floor along with Avionics Laboratory groups that occupy that space are presented in Appendix B.

Wright-Patterson Air Force Base, Ohio

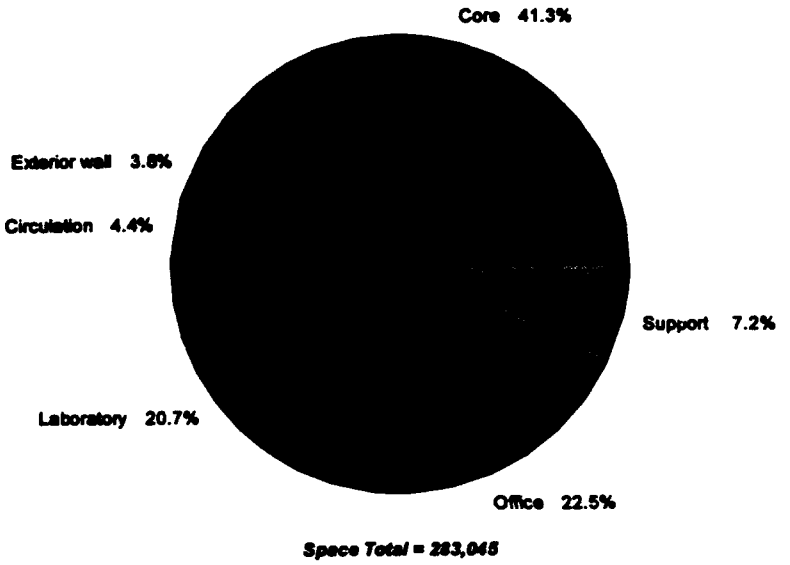
Figure 2-1.
Avionics Laboratory Facilities Map



	Bldg 45F	Bldg 1F	Bldg 2	Bldg 3B	Bldg 3	Bldg 4B1	Bldg 4B2	Bldg 4B4	Bldg 4B5	Bldg 45O	Bldg 62	MobA	MobB	MobC
Unassigned	29,255	4,280	13,660	23,770	4,420	32,145	33,470	19,084	42,328	750	6,245	950	1,147	1,037
Not usable	64,945	19,495	52,740	26,355	35,450	42,073	67,297	37,120	7,130	1,650	14,755	3,550	5,600	5,710
Total gross sq ft	93,200	23,725	66,400	50,125	39,870	74,218	100,767	56,204	49,458	2,400	21,000	4,500	6,747	6,747

Figure 2-2.
Space Inventory by Building

Since Building 620 was designed exclusively for R&D, it necessarily has a high percentage of mechanical, primary circulation, core, and exterior wall areas (45 percent) to support its clean room facilities; heating, ventilation, and air conditioning (HVAC); and electrical systems and the essential flow of equipment and materials throughout the facility. While such a high percentage of unusable-to-usable space would certainly be inappropriate for office buildings, facilities designed for R&D can be expected to be that high. Figure 2-3 further breaks out the type and quantity of space in Building 620.



Note: Circulation = secondary circulation; Core = primary circulation, vertical penetrations, mechanical rooms, restrooms, janitor closets, and all other nonallocated spaces.

Figure 2-3.
Building 620 Space Analysis

Most of the space in Building 620 has been specially designed and constructed for use as laboratories at a relatively high cost. However, since laboratories must be supported by the people who work in them, a large percentage of the usable space in the Building 620 laboratory area is utilized as office and support areas (conference rooms, equipment storage rooms, file rooms, and computer workrooms, for example) because of the shortage of any space designed specifically for offices. Figure 2-3 shows that the usable space is now divided into laboratories (20.7 percent, or about 58,600 net usable square feet), offices (22.5 percent, or about 63,800 net usable square feet), and support areas (7.2 percent, or about 17,000 net usable square feet).

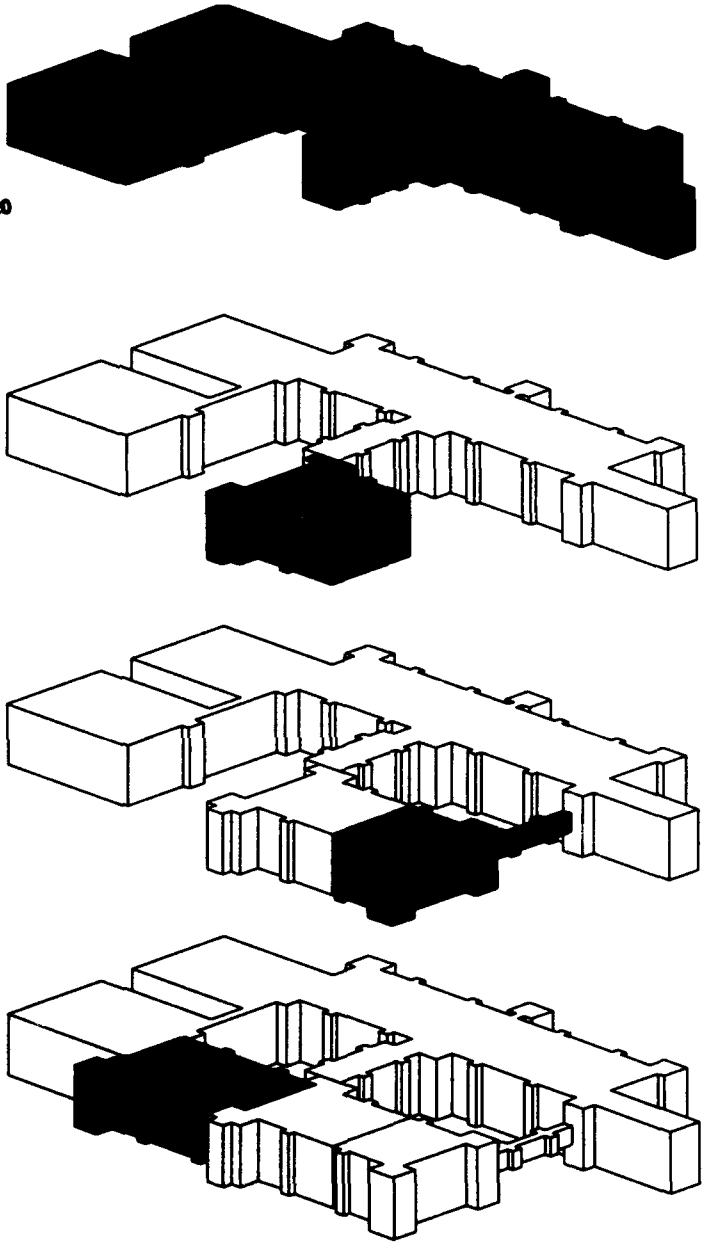
Many of the existing research laboratories in Building 620 have been constructed and specially configured to support specific research functions; for example, the Anechoic Chamber Laboratory, the Integrated Test Bed Laboratory, and various clean rooms. Some laboratories (including those just mentioned)

contain highly classified research and have special physical security elements constructed into the perimeter walls, electrical systems, HVAC ducts, and entry doors. The result is that most of the laboratory areas in Building 620 would be prohibitively expensive to relocate, expand, or reproduce elsewhere on the base or even elsewhere within Building 620.

The office areas in Building 620 are much easier to relocate. They have been constructed, for the most part, on the laboratory floor out of demountable partitions designed exclusively for the Building 620 raised floor grid system. Because the floor is built on a on a 4.5 foot by 4.5 foot floor tile grid system, the majority of the research engineer offices are either 81 square feet (2 by 2 floor tiles) or 121.5 square feet (2 by 3 floor tiles). Because Building 620 is, in general, overutilized, the current office areas are, by and large, overcrowded. The overcrowding has resulted in more and more engineers being forced into the 81-square-foot offices that many laboratory personnel feel are insufficient to accommodate a typical research engineer. Those engineers typically need one or even two personal computers or workstations, horizontal work surfaces, file cabinets, one or more security safes, and space to meet with at least one other person. However, providing the engineers any more space would have to come at the expense of critical laboratory area – that which the building was specifically designed for and that which supports the primary mission activity of the Avionics Laboratory. The space shortage in Building 620 has also led to other inefficiencies. Divisions, branches, and groups claim that the space is not adequate for the meeting or conference rooms, filing space, reception areas, and copy rooms required to meet their needs. Chapter 4 illustrates how much shortfall is anticipated when Phases I and II construction are completed.

Proposed Building 620 Additions

Much of today's overcrowding in Building 620 was anticipated during LMI's previous studies some 7 years ago. The recommendations from those studies initiated a request for MILCON funding that would have given Building 620 an additional 150,000 gross square feet attached to the north side of the building. Subsequent MILCON program cuts first reduced that total to 135,000 and then to 90,000 gross square feet. Additional MILCON program reductions split the 90,000 square feet into two phases. Phase I construction was for 53,000 gross square feet at a cost of $8.5 million; Phase II construction rounded out the gross space requirement with another 37,000 square feet at an estimated $5.8 million. Construction of Phase I began in March of 1993 and is scheduled to be complete in about 20 months, or near the beginning of FY95. The Phase II design is at about the 90 percent complete stage, and it is slated for the FY94 MILCON program; if everything goes according to plan, it will be completed by the beginning of FY97. As of now, a Phase III construction plan for another 60,000 gross square feet is being held in the FY96 MILCON program, but the justification for that phase depends in part upon the recommendations of this report. Figure 2-4 shows the planned expansion of Building 620 as a result of the anticipated phased construction schedule.



Note: All phased construction is for a basement and other floors.

Figure 2-4.
Phased Building 620 Expansion Plan

Phase I Construction

Changes to the original Phase I construction design will result in 53,000 gross square feet being added to Building 620 in early FY95. The Phase I addition, which was justified and subsequently designed as general-purpose office area, will provide about 33,800 more net usable square feet. The new space can only be used as office and general-purpose space and cannot support research laboratory activity.

Since the final design phase, the Phase I layout has been "locked in." However, since that time, some of the AA divisions and branches that were scheduled to occupy the new space have been reorganized with accompanying staffing changes. Thus, the Avionics Laboratory faces a situation in which the space designed for those groups in the Phase I addition no longer exactly meets their needs. After the Phase I construction is complete, some minor reconfiguration of the movable interior partitions may be necessary.

Phase II Construction

Phase II construction was to add about 37,000 gross square feet to Building 620 and, until recently, would have provided another 27,000 net usable square feet of general-purpose office space. However, a last-minute design change will reduce the usable space to approximately 22,000 net usable square feet. Like Phase I space, the Phase II space has been designed for general-purpose office use and will not be suitable for research laboratories. Right now, Phase II is expected to be complete in the middle of FY96, but slippage in the MILCON program or construction may delay the completion date until FY97 or later.

Buildings 4A, 4B, and 4F

Buildings 4A, 4B, and 4F are three parts of a former aircraft hangar complex. The space has been converted to house some of the Avionics Laboratory's research activities, including laser laboratories, a radar range, and anechoic chambers. Those activities have been located there because of a need for high bay space and the need to be near a flight line where aircraft can pull up for testing. Those laboratories are operated by the Exploration Group (AAWP-2) and Electro-Optics Group (AAWP-3), but a recent major rehabilitation project added office and support space within the hangar complex, and, by June 1993, it will also accommodate the Passive Electronics Countermeasures (AAWP) Branch and the ESM Technology Group (AAWP-1). Those groups will be relocated from Building 620 when the renovations to Buildings 4A, 4B, and 4F are complete and, at that time, all of the AAWP Branch will be consolidated in that facility. The high bay requirement, the need for large open areas, and the need to be near the flight line make it cost-prohibitive and unlikely that the functions currently in Buildings 4A, 4B, and 4F will ever move to Building 620 as part of the AA consolidation.

Buildings 18F and 23

The space in Buildings 18F and 23 is dedicated to high-technology laboratories shared by two Mission Avionics Division (AAR) branches – Target Recognition Technology Branch (AARA) and the Sensor Evaluations Branch (AARF). Most of the space is occupied by AARF's Dynamic Analyzer Laboratory, SEQUEL Laboratory, and SDSA Laboratory and AARA's Model Based Vision Laboratory. The remainder of those buildings serve as laboratory support, storage, and general office space for both branches' laboratories. Neither research activity is ever likely to be moved to Building 620 since the 52,000-pound dynamic analyzer equipment would cost $6 million to $7 million to move. The equipment requires a high bay facility and must be secured with bed rock anchors that would be very expensive to duplicate elsewhere. The other laboratories in the buildings support the dynamic analyzer and should not moved independently because it would require those facilities to be duplicated.

Building 22

Building 22 is a large two-story building and old hanger facility that houses a number of the AA administrative and office functions and some laboratories. The AA head office, parts of AAR, all of the Management Operations Division (AAO), and several supporting Wright Laboratories activities are all located in the building. The space occupied by those groups is more than adequate, and office sizes are typically larger than the office standards established for this study. The Avionics Laboratory top management has decided that all of the AA and supporting activities will be moved out of Building 22. Most will be relocated to Building 620, but the AAR Electro-Optics Branch (AARI) will be relocated to Building 622 to consolidate it with the other AARI groups. Primarily, the relocation to Buildings 620 and 622 is intended to improve the interaction between those research activities that are now separated, but it will also reduce the total amount of space occupied by AA groups and eliminate the need to operate and maintain Building 22.

Building 22B

Building 22B is occupied by EL's Electro-Optics Division (ELO) only. The Directorate is currently planning to move ELO into Building 620 to consolidate it with other EL functions already there and end the need for operating and maintaining a separate facility. Since the move is scheduled before Phase I of the Building 620 expansion project is completed, EL will have to accommodate most of the ELO activity within the space currently occupied by other EL activities in Building 620. By sharing laboratories, reducing office and support space, and consolidating certain functions, most of ELO's space requirements can be absorbed in Building 620. After the consolidation, EL will need about 2,500 more net usable square feet, and that need will likely remain unmet until Phase I construction is complete.

Building 146

Building 146 is not an AA or EL asset. The Cockpit Avionics Office (AAA-2) has been placed in that building to be collocated with the other Wright Laboratories functions that work on aircraft cockpits. The need for that collocation outweighs any need for AAA-2 to be consolidated with the rest of AA, and there are no plans to move that function from Building 146.

Building 622

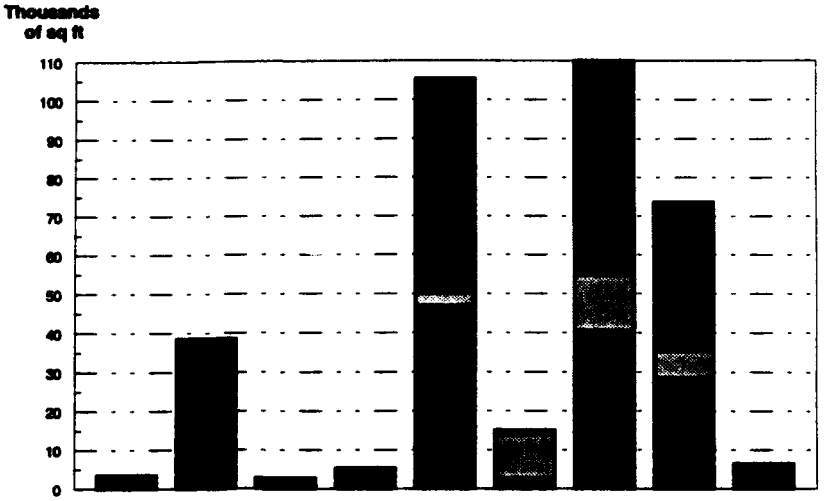
Currently, two AARI groups are located in Building 622. The building was constructed around a 100-inch collimator, a large piece of equipment that would be extremely difficult and cost-prohibitive to move. The AAR division considers moving Building 622 functions into Building 620 a relatively low-priority event. Current new construction at Building 622 will add enough space to accommodate the other AARI activities currently in Building 22. The relocation will consolidate all of AARI in Building 622.

Modular Buildings A, B, and C

Three modular buildings – A, B, and C – were erected adjacent to Building 620 for temporary relief of some of the office space shortage in the main building. That temporary use has started to assume the look of permanence as the programmed expansions of Building 620 have been delayed. The current plan is to retain the three modular facilities until the Phase II construction is complete, and, at that time, abandon and remove them. The result of this study's space determination may justify the need to retain one or several of the modular facilities. However, even if they are needed, it is uncertain whether Avionics Laboratory will be allowed to renew the lease on those facilities.

Current Facility Occupancies

Knowing what groups occupy the available space is equally important to knowing how much and what types of space the Avionics Laboratory currently occupies. Knowing current occupancies by group will help us to determine whether various groups currently occupy the amount and types of space they actually need. In Chapter 4 that information will help us fairly allocate the space that will become available when the Phase I and II construction projects are completed. Figure 2-5 shows how much and what type of net usable space each AA and EL division. Appendix C provides more detailed occupancy information for each division, branch, and group and identifies the specific laboratory, office, and support areas they occupy.



	AA	AAA	AAC	AAO	AAR	AAT	AAW	BL	Other
Office	3,500	25,956	2,675	4,566	46,820	2,626	40,521	28,482	5,384
Support	0	1,084	0	775	3,385	11,405	14,317	7,016	1,051
Laboratory	0	11,571	0	0	55,295	1,053	66,737	38,198	0
Total gross sq ft	3,500	38,611	2,675	5,341	105,500	15,084	121,575	73,696	6,435

Figure 2-5.
Current Avionics Laboratory Occupancy by Group

CHAPTER 3

Space Requirements

The other important element of the Avionics Laboratory strategic facilities planning process is the development of the space requirements. They show how much space each AA and EL activity actually needs, and near what other groups or activities they should be located. How much space a group needs is determined by a detailed *space program* spanning a predetermined period of time. The space program addresses only that group's demand for space. The issue of where the group's space should be located is addressed through *proximity requirements*, which allow us to establish the relationship and relative importance of placing certain groups near others. This chapter addresses the *how much* and *where* issues by evaluating and calculating, using a bottom-up approach, AA's and EL's true space requirements.

AVIONICS LABORATORY SPACE PROGRAM

The space program says how much space each AA and EL activity needs. That space should not be confused with the amount of space a group already occupies (outlined in Chapter 2) since what is occupied often has little to do with what is needed. Because it is important to match the type and cost of floor space with similar type and value of mission-related activity, the space program calculates space requirements separately by type of space (office, laboratory, and support). Because several months to several years may be needed to change facilities through relocations, major renovations, or new construction, the group's space requirement must be reviewed over an extended period of time. That way, future space configurations can accommodate AA and EL groups' future space requirements. For instance, if you know that it will take at least a year to plan, budget, and execute a major renovation for several groups, it makes more sense to renovate that space according to the groups' future requirements rather than its current requirements. Using the current requirements will mean that when the renovation is complete, the completed space will likely not meet those groups' needs when the space is occupied.

For the Avionics Laboratory, we chose January 1993 as the existing baseline and January 1994, 1995, 1997, and 1999 as the space program's effective study period. The outyears 1995 and 1997 were selected because they are the expected completion dates of the Phase I and Phase II construction, respectively, and 1999 is the time frame that the Avionics Laboratory could reasonably expect any further construction, if it is needed, since it can take 6 to 7 years to plan, program, and budget new construction through the MILCON process.

Table 3-1 summarizes the space requirements (given as net usable square footage) for each AA and EL division for each year in the study period. The figures show each AA and EL divisions' total space requirements regardless of whether that space is located in Building 620 or any of the other Avionics Laboratory facilities. A more detailed analysis showing specific office, laboratory, and support space requirements for each AA and EL activity over the selected time period can be found in Appendix D.

Table 3-1.
Space Requirements by Division

Activity	Jan. 1993 (sq ft)	Jan. 1994 (sq ft)	Jan. 1995 (sq ft)	Jan. 1997 (sq ft)	Jan. 1998 (sq ft)
AA	2,415	2,415	2,415	2,415	2,415
AAA	45,220	45,645	45,760	45,990	46,105
AAC	2,634	2,634	2,634	2,634	2,634
AAO	4,233	4,233	4,233	4,233	4,233
AAR	107,817	108,542	108,542	107,967	107,967
AAT	16,526	16,526	16,526	16,526	16,526
AAW	123,979	128,526	128,526	128,526	128,526
AA Total	302,824	308,521	308,636	308,291	308,406
EL*	31,527	31,527	31,527	31,527	31,527
ELA	1,932	2,029	2,130	2,237	2,348
ELE	4,659	4,892	5,136	5,392	5,661
ELM	4,544	4,771	5,010	5,261	5,523
ELO	4,533	4,760	4,997	5,247	5,509
ELR	6,947	7,641	8,405	9,245	10,172
EL Total	54,142	55,620	57,205	58,909	60,740
All others	5,371	5,371	5,371	5,371	5,371
Avionics Laboratory Totals	362,337	369,512	371,212	372,571	374,517

Note: AAA = System Avionics Division; AAC = Financial Management Division; AAT = Avionics Technical Services Division; AAW = Electronic Warfare Division; ELA = Operations Division; ELE = Microelectronics Division; ELM = Microwave Division; and ELR = Research Division.

*Laboratory requirements for all EL divisions are included in the EL requirements.

The space requirement for each group shown in Table 3-1 and in Appendix D were developed using a bottom-up approach. That approach calculates specific space requirements differently depending on the type of space needed (i.e., office, laboratory, or support). The following subsections discuss the methods used for calculating the space requirements for each type. The information in Table 3-1 shows that little relative growth is anticipated for the Avionics Laboratory as a whole and that what little growth that does exist is

anticipated in the EL divisions. EL growth is expected from possible expansion in existing programs and anticipation of new programs coming to EL.

Office Space Requirements

Office space refers to the individual offices occupied by Avionics Laboratory employees. Therefore, the requirement for office space is directly proportional to the number, grade, and responsibilities of its employees. By applying an office space standard to each employee's classification and grade, we can calculate office space requirements. Since each AA and EL division maintains group-level staffing documentation, that head-count guidance can be used to develop the needed roster of existing personnel by job classification and grade. No growth to little growth in personnel was forecast over the period of study. However, the Avionics Laboratory had no office space standards so our first step was to establish them and have them approved through AA's management. Table 3-2 shows the space standards that were tentatively approved and used to calculate the office space requirement.

Table 3-2.
Office Space Standards

Job description	Office space standard (sq ft)
Directorate Director	300
Division Director	200
Deputy Director	200
Chief Scientist	300
Program Manager	150
Branch Chief and Deputy	150
Group Chief	120
Engineer — Grade level 14 – 15	120
Engineer — Grade level 11 – 13	100
Engineer Technician	80
On-site Contractor	70
Visiting Professor or Student	70
Technical Advisor	150
Financial Analyst	80
Executive Secretary	120
Secretary	80

Laboratory Space Requirements

Avionics Laboratory space refers to those areas in which R&D activity actually takes place and typically excludes those parts of laboratories in which

personnel have established quasi-office area. Since no space standards exist for R&D space, each laboratory requirement was handled on an individual basis, and each group was required to justify how much space individual laboratories required. We examined each laboratory area to assure the reasonableness of the requests. In several cases, some growth in laboratory space requirement was indicated to accommodate new programs or specialized equipment that has been approved by AA's and EL's management. A detailed inventory of the AA's and EL's laboratory space requirements is presented in Appendix D.

Support Space Requirements

Support space was defined as those areas that were neither office nor laboratory space but were essential for the daily activity and personnel welfare. For example, conference rooms, training rooms, coffee/snack areas, divisional and branch reception areas, files storage, computer workrooms, copier rooms, and coat closets were all considered as support space. We used architectural rules of thumb to establish floor space standards for various classifications of conference rooms and other support space that were common among the AA and EL activities. All other support space requirements were handled on a case-by-case basis. Each division was assigned medium-sized conference rooms and each branch activity was assigned a smaller workroom (except where branches indicated individual workrooms were unnecessary). Otherwise, just like the laboratory space, each activity was required to justify a need for other support spaces. Table 3-3 shows the space standards used for the commonly required support areas.

Table 3-3.
Support Area Standards

Support area	Floor space standard (sq ft)
Large Conference Room (seats 20 – 25)	500
Medium Conference Room (seats 10 – 15)	350
Small Workroom (seats 4 – 8)	150
Reception Area	80
Coat Room	40
Coffee/Snack Area	40
Copier Room	40

The summation of the individual requirements for office, laboratory, and support areas equals each group's total assignable space requirement. However, we are interested in tracking space requirements by net usable space which means that secondary circulation area needs to be estimated and added to the assignable area.

Secondary Circulation

Secondary circulation refers to the tributary aisles that allow access to individual offices, laboratories, and support space and essential to the efficient functioning of any occupied area. The sum of the office, laboratory, and support space plus the calculated secondary circulation gives the net usable square footage required. The amount of secondary circulation will typically vary from one area to the next and depends on its physical layout. However, over larger areas, secondary circulation tends to be fairly standard among facilities so, for the sake of space programming, we can estimate it. Based on the Avionics Laboratory's existing mix of assignable space and secondary circulation, we used a 15 percent mark up for calculating the net usable space for each group. Therefore, the space requirements shown in Table 3-2 are the summation of assignable space for office, laboratory, and support space plus a 15 percent mark up to account for the secondary circulation. The detailed space requirement summaries in Appendix D illustrate the above approach and show how the total space requirements for each group were calculated.

Public Space Requirements

Public space represents space that is shared by most or all Avionics Laboratory employees and is not allocated to individual groups. Examples of public space include facility reception areas, restrooms, primary circulation corridors, mechanical rooms, janitor closet, and HVAC and electrical chases. Public space is essentially space that represents the difference between a facility's gross square footage and its net usable area. In Building 620, most public space is already well-established, and we used that fixed area to calculate a mark-up factor that translates net usable space requirements to gross space requirements. The Avionics Laboratory's gross space mark up is about 40 percent, a number that can be used to develop future gross space requirements for new construction projects.

Proximity Requirements

Efficiency and organizational productivity can be significantly improved merely by locating those groups that interact frequently with each other in proximity to each other. The importance of that relationship increases as either the value or the frequency of those groups' interaction increases. Proximity requirements establish the importance of those proximity relationships amongst groups. The simple action of locating highly interactive groups near one another minimizes the time that would otherwise be necessary to travel between those separated activities.

In this study, we scored AA and EL proximity relationships on a high (H), low (L), or negative (X) impact scale. H means that it is highly desirable for the groups to be near one another, and L means that those groups would like to be close but the need is not as important as an H. The X shows a negative

relationship between those groups and that it is desirable for those groups to be kept apart from one another. For instance, a laser optics laboratory should never be placed next to a machine shop because of the effect of vibrations from metal-forming equipment has on the sensitive laser optics apparatus. Appendix E shows the proximity requirements, in matrix form, for each group involved in the study.

While Appendix E shows that some proximity requirements exist between divisions and other groups outside of divisions, the primary and strongest proximity relationships were interdivisional. In other words, a group within a branch has a strong need to be near other groups in that branch and a branch within a division has a strong need to be near other branches in that division. As would be expected, strong proximity relationships also exist between office areas and associated laboratory activities and support spaces. While it is important to satisfy the proximity relationship between office and laboratory functions, unfortunately, the physical configuration of Building 620 and the limited space designed specifically for laboratory activity make it impossible to satisfy all the laboratory-to-office proximity needs. The overflow will be satisfied in the new Phase I and II space when the anticipated construction is complete. This is discussed in further detail in the subsequent chapters in which the space allocation criteria are discussed.

CHAPTER 4

Recommended Space Configurations and Implementation Plans

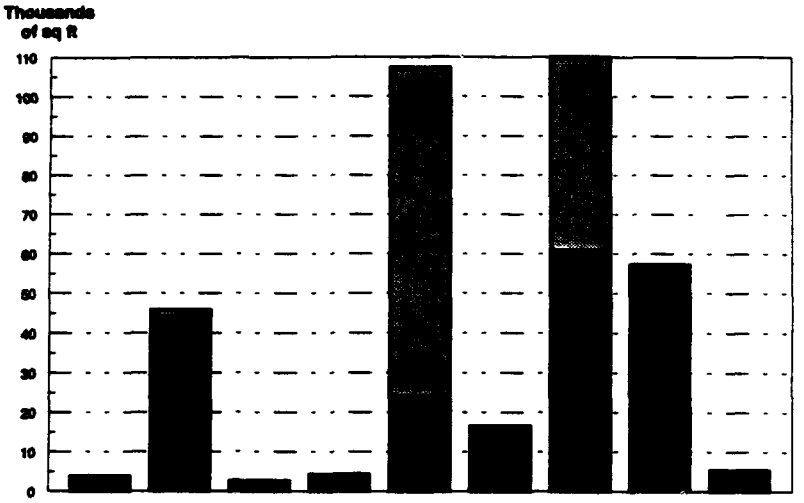
The final step of our strategic facility planning methodology is to effectively and fairly allocate and configure the available space in Building 620 after Phase I and Phase II construction is complete. The final configuration is one that best supports the research mission of the Avionics Laboratory and the personnel working there. Once the proposed configuration is established, an appropriate series of steps – the strategy – that will transform the existing facility layout into the proposed configuration can be developed and put into effect. Information on the existing facility inventory and occupancies from Chapter 2, the space needs and proximity requirements from Chapter 3, and the set of allocation criteria discussed in this chapter are all used in developing the most effective space configurations. This chapter presents our conclusions and recommendations for the allocation and configuration of space for all AA and EL activities after the Phase I construction is complete in the FY95 time frame and then again after the Phase II construction is complete in FY97.

BUILDING 620 SPACE REQUIREMENTS

In Table 3-1, we show the space requirements for each major Avionics Laboratory activity. Those figures represent each EL and AA group's total space requirements regardless of what facility would eventually satisfy that requirement. Since, for this study, we are only concerned with reconfiguring Building 620, that portion of those division's space needs that will be satisfied by other facilities must be subtracted from their total requirements. Therefore, Figures 4-1 and 4-2 show each activity's forecasted space needs for Building 620 in FY95 (the time when the Phase I construction project will likely be complete and ready for occupancy) and FY97 (expected Phase II completion).

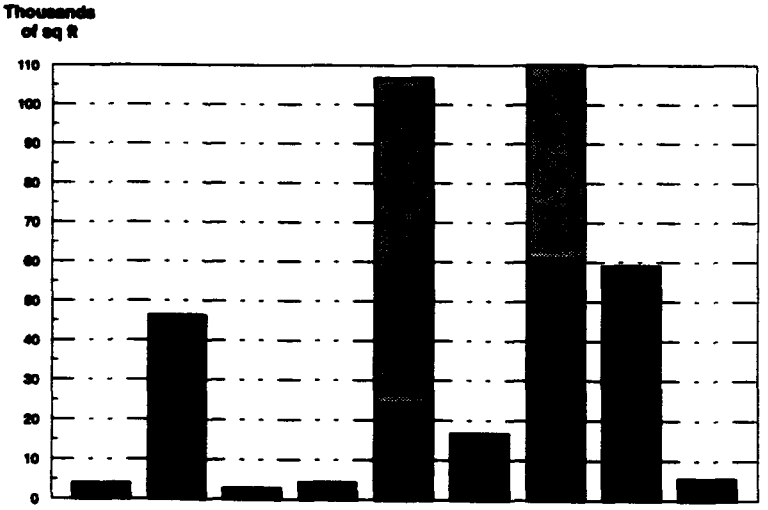
AVIONICS LABORATORY SPACE SUMMARY

Knowing total net usable space requirements and available net usable space in Building 620, we can now compare Avionics Laboratory's space needs to its expected space resources when Phase I and Phase II construction is complete. Figures 4-3 and 4-4 summarize the analysis.



	AA	AAA	AAC	AAO	AAR	AAT	AAW	EL	Other
Bldg 620	3,795	44,069	2,634	4,233	24,105	16,526	60,753	57,205	5,371
Others	0	1,691	0	0	83,147	0	67,693	0	0

Figure 4-1.
Avionics Laboratory's FY95 Space Requirements



	AA	AAA	AAC	AAO	AAR	AAT	AAW	EL	Other
Bldg 620	3,795	44,069	2,634	4,233	24,105	16,526	60,753	57,205	5,371
620 Growth	0	345	0	0	0	0	0	1,704	0
Other	0	1,691	0	0	82,572	0	67,693	0	0

Figure 4-2.
Avionics Laboratory's FY97 Space Requirements

Requirements (net usable square feet):			
Space required in Building 620	=		218,695
Total AA and EL requirements	=	371,225	
Space needed in other facilities	=	152,530	
Inventory (net usable square feet):			
Space available in Building 620	=		203,895
Building 620	=	155,270	
Modulars A, B, and C	=	14,860	
Phase I construction	=	33,765	
Space Surplus/(Deficit) (net usable square feet):			
After Phase I construction	=		(14,800)

Figure 4-3.
FY95 Phase I Space Summary

Requirements (net usable square feet):			
Space required in Building 620	=		220,630
Total AA and EL requirements	=	372,585	
Space needed in other facilities	=	151,955	
Inventory (net usable square feet):			
Space available in Building 620	=		211,005
Building 620	=	155,270	
Phase I construction	=	33,765	
Phase II construction	=	21,970	
Space Surplus/(Deficit) (net usable square feet):			
After Phase II construction	=		(9,625)

Figure 4-4.
FY97 Phase II Space Summary

The space summary in Figure 4-3 shows that the AA and EL total requirements for space are a little over 371,000 net usable square feet. Those AA activities that will remain in Buildings 4A, 4B, 4F, 18F, and 23 require 152,530 square feet, which is subtracted from the total AA and EL space requirement. Thus, 218,695 net usable square feet must be provided within the Building 620, complex. After Phase I construction is complete, only 203,895 net usable square feet of space will be available in Building 620, including the existing facility, the modular buildings, and the Phase I addition. That leaves a 14,800-square-foot space deficit in Building 620. In other words, Building 620 with its modulars would still need almost 15,000 square feet more to satisfy all the requirements for floor space for those AA and EL activities that need to be in Building 620 in

FY95. A similar analysis in Figure 4-4 using the Phase II space summary indicates a space shortfall of 9,625 net square feet in FY97.

Phase I Space Shortage Solution

The Avionics Laboratory is committed to accommodating as many AA and EL activities in the Building 620 complex as is possible to reduce its total occupied space and improve operational productivity. However, in meeting those objectives, more Avionics Laboratory activities are being jammed into Building 620 than it has space for. While it may seem unlikely that mere space efficiencies and improved adjacencies could accommodate the 14,800-square-foot shortfall expected after the completion of Phase I construction, the deficit represents only about 7 percent of the total space available in Building 620. Thus, various methods of reducing and suppressing space requirements offer reasonable alternatives for accommodating the deficit, at least on a temporary or short-term basis.

The first way of partially reducing the space deficit is to suppress the growth of various laboratory and support spaces (primarily conference rooms) requested by AA and EL activities. That means some laboratories will need to continue operating with the same amount of space they occupy today until more space becomes available after the Phase II construction. While some laboratories' requirements for additional space are certainly justified, when such a large space shortage exists, only those laboratories and support activities with imminent growth requirements can be given the additional space they need. The effect of suppressing a certain amount of support space will not be as dramatic since one of the primary space allocation objectives will be to improve proximities between groups and branches. If groups and branches can be collocated, some support areas can be shared. For example, instead of a need for one workroom per group and one small conference room per branch, only one conference room will be allocated and shared by all groups in that branch. By suppressing less critical laboratory and support space growth, the Avionics Laboratory's total space requirements can be reduced by about 2,000 square feet.

The total AA and EL space requirement for 371,225 net usable square feet is based in part on the office space standards approved by the AA management and shown in Table 3-2. Another way to reduce the space shortfall would be to allocate less office space to each AA and EL group than the space standards require. Those engineers entitled to 100-square-foot offices (according to the established space standards) would be allocated only 80 square feet, and those engineers entitled to 120 square feet would be allocated only 100 square feet. Approximately 550 AA and EL engineers would be affected by that course of action, and, at 20 square feet per person, the Avionics Laboratory's space requirements (and, therefore, the space shortage) would be reduced by about 11,000 net usable square feet.

The above two approaches will not totally eliminate the deficit, but they will reduce it to less than 1 percent of the total available space in Building 620. The

AA and EL divisions. However, such an arrangement should only be temporary until the Phase II construction is completed and another 22,000 net usable square feet are added to Building 620.

Phase II Space Shortage Solutions

The Phase II space summary shows that after construction is complete, the Avionics Laboratory will still face a 9,625-net-usable-square-foot space deficit. Even though 22,000 net square feet will be added when Phase II construction is complete, that additional space is almost entirely offset (1) by increases in space requirements from FY95 to FY97 of about 2,000 net usable square feet and (2) because of the planned removal of the three modular buildings totaling close to 14,900 square feet. The net result is that the deficit will only be reduced by about 5,200 square feet after Phase II construction.

The solution for the Phase II space shortfall is much simpler than that for Phase I since the entire shortfall can be accommodated by allocating office area below the office standards. As in the Phase I solution, engineers entitled to 120- and 100-square-foot offices according to the standards will be allocated only 100 and 80 square feet, respectively. Because more space will be available, those research laboratory activities that need additional space will be given the room to grow after Phase II construction is complete. The inherent shortfall caused by the reduced office space standards must be shared equally between all the AA and EL divisions.

Space Allocation Objectives

The available space in Building 620 should be allocated fairly and simply knowing the expected space shortfall, existing inventory and occupancies, and the space requirements by group may not be enough information to do so. The goal of any facility or space configuration plan is the efficient and effective utilization of space that leads to improved productivity for the organization. Thus, what is also needed to effectively allocate Avionics Laboratory space after Phases I and II construction projects are complete is a set of space allocation objectives. The following space allocation criteria were established to ensure that the final Building 620 configurations effectively support the research mission of the Avionics Laboratory.

Consolidating into Building 620

One of the primary objectives of this study was to develop a configuration and implementation plan for Building 620 after Phase I and Phase II construction was complete. The justification for those new construction projects was partly based on the consolidation of Avionics Laboratory activities from other facilities into its primary research facility, Building 620. The objective of which was to

bring research activities together thus improving the quality of that research and, at the same time, reducing the number of facilities the Avionics Laboratory operates and maintains. Therefore, a fundamental space allocation objective is to make sure as many AA, EL, and other support groups as possible from Buildings 22 and 22B are relocated into Building 620 after Phase I construction is complete. While there are cost and technological reasons for relocating those groups to Building 620, there are equally compelling cost and technological justifications for leaving other Avionics Laboratory activities in Buildings 4A, 4B, 4F, 18F, and 23. At this time, the added benefit of consolidating those groups into Building 620 (assuming there is room to do so) does not outweigh the enormous cost of constructing new facilities and relocating the equipment if those activities were removed from the other buildings. Modular buildings A, B, and C will also remain through the Phase I construction, which will allow Avionics Laboratory to accommodate as many AA and EL groups within Building 620 as possible. The current lease on those facilities extends through FY95. At this time, the modular buildings are being considered for removal after Phase II is complete.

Minimizing Disruptive Laboratory Relocations

Most of the existing laboratories in Building 620 would be relatively expensive to relocate. Because of their highly technical nature and the requisite security classification of some laboratories, the cost to construct replacements would be prohibitive, and the loss in productivity from mission down time during relocation would be intolerable. For those reasons, the reallocation of space in Building 620 should revolve around existing laboratories. Where possible, the reconfiguration of Building 620 will avoid relocating laboratories; however, that does not include soft-technology laboratories or laboratories with no physical security requirement since they can be relocated relatively inexpensively.

Satisfying Primary Proximity Requirements

Because buildings are physically constrained by their exterior walls and interior primary corridors, rarely can all proximity requirements be satisfactorily met. However, a main objective of our Building 620 configuration is to satisfy as many high-priority proximity requirements as possible. One of those requirements is to locate the specific research activities that will eventually support the "wind tunnel" concept to the third floor of Building 620, thus keeping them all in close proximity. Also, the most common high-priority proximity needs among the Avionics Laboratory activities are to consolidate groups within branches and branches within divisions while, at the same time, satisfying the need to keep the personnel near the laboratories they support.

Matching High-Value Activities with High-Cost Floor Space

Building 620 was originally designed and constructed as an R&D facility. As such, it is three to four times more costly per square foot than floor space

designed and constructed for office use. Therefore, another major space allocation objective is to match the Avionics Laboratory's high-value activities – its research – with its high-cost floor space in Building 620 – the laboratory space. Fortunately, enough laboratory space is currently available in Building 620 to accommodate all of the Avionics Laboratory's research needs. The remainder of the laboratory areas can then be utilized for office and other areas that support those laboratories instead of leaving the area vacant. The new areas created from the Phase I and Phase II construction were designed as general-purpose office area and must be utilized for personnel and support space.

Allocating Shortfalls Fairly

Relocating all of the groups from Buildings 22 and 22B to Building 620 and satisfying the immediate space shortage of the groups currently in Building 620 puts the Avionics Laboratory in a significant space deficit situation. The analysis in Figures 4-3 and 4-4 indicates that a space deficit of about 14,800 and 9,600 net usable square feet will exist in Building 620 after the moves are made. However, not all AA and EL currently share the deficit burden equally. One of the primary concerns is that the available space in Building 620 be fairly allocated among those divisions that need to be there so that no single division carries more than a fair share of the deficit burden.

Configuring Phase I Construction to Minimize Disruption During Phase II Construction

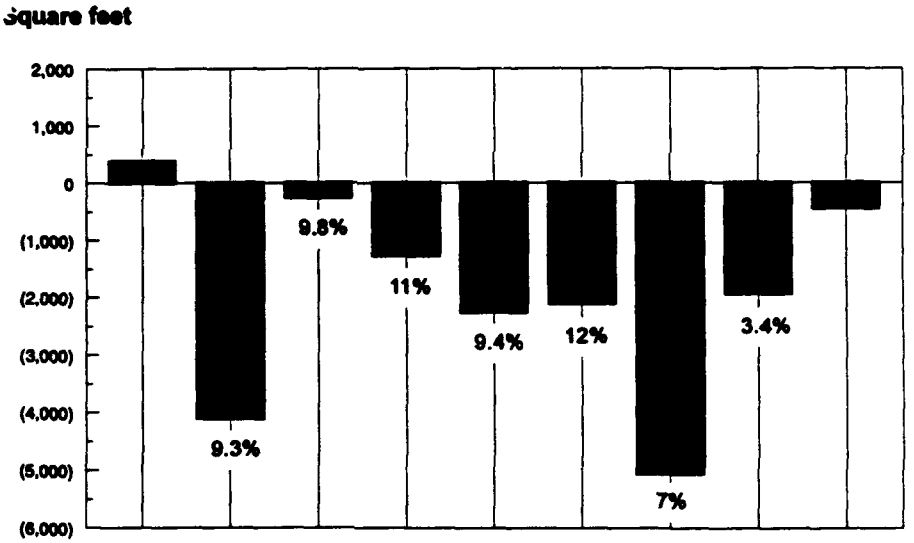
The final Building 620 configuration will be realized after the Phase II construction is complete and represents the "best" solution for Avionics Laboratory based on the information available at this time. However, the space made available after Phase I construction must be utilized to satisfy immediate Avionics Laboratory space shortfalls. Therefore, after Phase I is complete, Building 620 must be configured such that subsequent moves following Phase II completion are minimized. While double moves cannot be avoided entirely, the objective is to keep them to a minimum while, at the same time, satisfying the primary proximities and efficiently utilizing the space.

Not all the above space allocation criteria can be satisfied simultaneously and, oftentimes, satisfying one works against another. However, the criteria give us an approach and methodology with which we can evaluate the success of alternative configurations. That approach will ensure that the recommended configuration maximizes benefits to the Avionics Laboratory and that the space effectively supports its mission.

RECOMMENDED BUILDING 620 CONFIGURATION

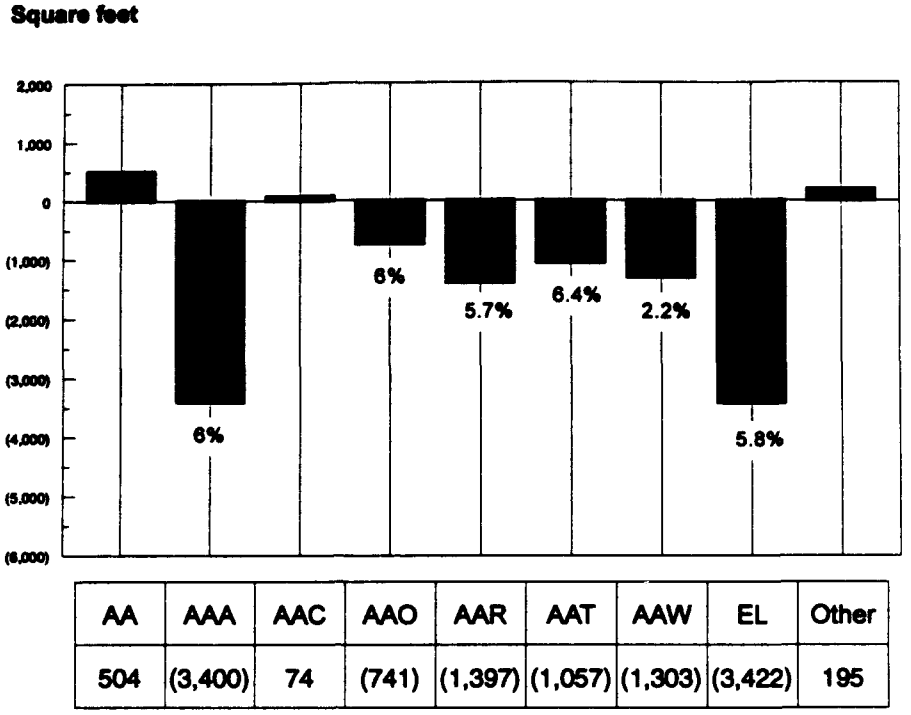
In Appendix F, we present the recommended configuration for each floor of Building 620 after both phases of construction are complete. The recommended space allocations and configurations offer workable solutions that do the following:

- Allocate limited space proportionally and fairly between the AA and EL divisions after construction in Phases I and II is complete. The goal was to proportionally allocate the shortfall. Figures 4-5 and 4-6 are surplus/deficit charts that show the difference between how much space each division needs and how much they will occupy. After Phase I construction, the deficits will be between 7 and 9 percent for the AA operating divisions (a little more for the support divisions) and 3.4 percent for EL. When Phase II construction is complete, more space will become available for occupancy, and the AA deficits will be reduced to between 2.2 and 6.4 percent. Much of the shortfall indicated in these charts will be accommodated by reducing office space allocations below the standard. EL shows the least deficit because it is anticipating some future growth in that period.



AA	AAA	AAC	AAO	AAR	AAT	AAW	EL	Other
380	(4,106)	(257)	(1,267)	(2,257)	(2,103)	(5,062)	(1,934)	(443)

Figure 4-5.
Post-Phase I Space Surplus/(Deficit) by Division



AA	AAA	AAC	AAO	AAR	AAT	AAW	EL	Other
504	(3,400)	74	(741)	(1,397)	(1,057)	(1,303)	(3,422)	195

Figure 4-6.
Post-Phase II Space Surplus/(Deficit) by Division

- Correct the allocations of several groups that have excess space. Several AA activities currently occupied more space than they need or more than can be justified in the expected space deficit situation. The large amount of facility churn resulting after the Phase I construction will provide the opportunity to allocate the appropriate amount of space for those groups while, at the same time, improving adjacencies.

- Satisfy most primary proximity requirements by consolidating group functions within their respective branches and consolidating branches within their respective divisions.

- Use high-cost laboratory space for high-value Avionics Laboratory requirements and utilize space constructed specifically for administrative activity as office and support area.

- Move the Avionics Laboratory closer toward meeting its "wind tunnel" objectives by placing key laboratories in close proximity. While the "wind tunnel" concept means more than just placing those laboratories near one another, by doing so, the Avionics Laboratory will be in a position to electronically connect various experiments and to integrate the currently separated research activities.

- Place executive and management offices in close proximity.
- Minimize disruptive laboratory relocation, which avoids costly laboratory construction and operational downtime.
- Utilize Phase I construction layout to the maximum extent practical, thus minimizing modifications to current Phase I wall, partition, and modular furniture floor plans.

The completion of Phase I construction gives the Avionics Laboratory the opportunity to improve the allocation and configuration of space to its operating and support activities. LMI's recommended configuration significantly improves the allocation of space to each AA and EL division in the short term and locates those groups so that when Phase II is complete, the next series of relocations will involve moving office and support spaces only. The Phase I configuration gets AA and EL most of the way toward a final layout that will minimize the transition between Phase I and Phase II completion. As a result of the new construction, some groups may have to move twice. An attempt was made to minimize dual moves, but Phase II construction brings more than 22,000 square feet of net usable space and an opportunity to relieve some of the shortfall that exists even after Phase I is complete. That will require another series of renovations and relocations.

Implementation Strategy

After the Phase I and Phase II construction is complete, a series of renovations and relocations in Building 620 will be necessary to meet the recommended allocation and configuration of available space. The precedence networks shown in Appendix G establish the sequence of moves and renovations that will be necessary to achieve the final configurations illustrated in Appendix F.

CHAPTER 5

Recommendations

MANAGING A CHANGING FACILITIES ENVIRONMENT

The Avionics Laboratory performs its R&D mission in an environment that requires responsiveness and rapid change. Its research programs are often growing or contracting to meet national security needs, to exploit new technologies, or to solve problems identified by field organizations. Fluctuations in its program funding can also cause sudden growth or contraction. Such an environment of continual change and uncertainty gives rise to the need for more flexibility and a more proactive approach for managing space.

The recommended configuration and implementation plans set forth in Chapter 4 must become part of an Avionics Laboratory strategic facilities plan. Such a plan will establish a framework in which more proactive space management is possible. Until now, the Avionics Laboratory has taken a piecemeal approach to facilities planning. Previous plans have been developed and have remained in place, often for years, until requirements for action forced major changes. Such an approach results in major reconfiguration efforts and costs when changes that occur to research programs and organizational staffing create subsequent space requirements.

The Avionics Laboratory's facility plans must be dynamic and recognize that changes occur. A better approach is to continually review the plan and to make minor adjustments as soon as those changes occur. Too many changes at the Avionics Laboratory occur too frequently for any facilities plan to remain current for very long. If the plan is not continually revised and updated, options for responding to those changes may be narrowed when action becomes essential. Proactive space management will reduce the Avionics Laboratory's operation and maintenance costs, preclude unnecessary new construction, improve the justification for new construction when that construction is needed, and ensure that all of its facilities support its research mission to the maximum extent possible. The following recommendations will help Avionics Laboratory improve the management of its facility resources.

IMPLEMENTING THE PHASED EXPANSIONS

We recommend that the Avionics Laboratory begin implementing the facility layout and reconfiguration strategies presented in Chapter 4 and make them the foundation of its long-range strategic facilities plan. Chapter 4 develops effective facility layouts along with step-by-step implementation plans for each phase of the Building 620 expansion. Those configuration and implementation plans, which have been

verified and approved by the Directorate staffs, improve Avionics Laboratory space allocations and adjacencies and will enable the project designers to complete their detailed designs and layouts for Phase I and Phase II construction projects. Those plans should serve as the baseline for all subsequent changes and revisions since all changes to organizations, staffing, and research mission have a direct and immediate effect on how much space each group has and where that space should be located

COMPUTER-AIDED SPACE MANAGEMENT

We recommend that the Avionics Laboratory adopt a computer-aided space management system to improve its in-house management of its facilities. For the Avionics Laboratory to effectively manage its space inventory in house and to make more proactive decisions affecting those facilities, it will need an accurate and comprehensive facility data base and up-to-date facility plans. As a minimum, that data base should include the existing space inventory of all offices, laboratories, and support spaces; current facility occupancies by group; current and projected space requirements for each group; adjacency relationships between groups; current and projected staff levels; and the approved office space standards. Additionally, existing and proposed space configurations in the Avionics Laboratory facilities (particularly those in Building 620) should be kept up to date on a CADD system. The only practical way to manage all the information that will be necessary is through the use of an automated system. LMI developed such a system and space management methodology for this study. The system, which integrates the Avionics Laboratory's facility data base and supporting software with a CADD system, will be turned over to Avionics Facility Branch (AATF). The system will give AATF the tool they need to continually review and update space-related data and to provide them the information they will need to make better space-related decisions. LMI will provide the needed training and implementation support during the transition to Avionics Laboratory's self-management of space.

A FACILITIES SPACE WORKING GROUP

We recommend that the Avionics Laboratory establish a standing working group for managing space. The Avionics Laboratory must plan for change and have the mechanisms in place to anticipate and react to change as it occurs. The most common such management review mechanism for facility needs is a standing committee. An empowered committee of Avionics Laboratory middle management can act as a working group to explore issues and analyze facility options. Such a group should be chaired by the AATF branch supervisor who will also be responsible for recording minutes of the meeting and acting as the primary action agent.

The working group should develop facility options and present them, usually with recommendations, to the senior management decision makers on

the Avionics Laboratory's Board of Directors. The working group's primary responsibilities will be to establish an Avionics Laboratory space management policy and to review and approve changes to the proposed configuration plans. The facility working group's responsibilities are as outlined below.

Manage the Facility Space Records of the Avionics Laboratory

The facility data base of space requirements and occupancies for each AA and EL activity was built for this study. It includes current proximities, office space and support space standards, and the Avionics Laboratory's current organizational structure. When changes to it occur, that data base must be updated if it is to remain useful. The working group should make sure that any changes are agreed upon before the official facility data base is updated. The computer-aided facility management system and facility drawings that comprise the data base should be maintained by AATF.

Establish Space Standards and Policies

Space requirements can be determined only after space standards and policies have been established. The working group would determine the authorized square footage of office space for each of the Avionics Laboratory's job categories (junior engineers and secretaries, for example) and specify the furniture and equipment that would be authorized for each job category. We adopted such standards for this study that were approved by the Avionics Laboratory's management. However, the working group's responsibility will be to codify those standards and create an Avionics Laboratory policy for their future use. All future changes to the standards must be approved by Avionics Laboratory management.

Verify Requests for Change

One of the working group's main functions would be to identify space issues far enough in advance to allow timely action. Those issues might range from the announcement of a new mission that will require laboratory space to the need for more conference room space. Those requests could be for more space or for relocations of functions to improve space proximities. Upon receiving a request for such a change, the working group would verify the justification for the request and reach agreement on required actions since oftentimes one group's requirement for more space comes at the expense of another group's need. A request for more space could be justified, for example, on the basis of an authorized staff increase, an additional mission or mission change, an equipment purchase, or other increased laboratory requirement. Justifications for additional conference rooms, centralized file areas, libraries, and other special needs may be more difficult to verify, but the working group would have a working

knowledge of each division's mission and could compare one division's needs with those of the others.

Recommend Allocations and Reallocations of Facilities Space

As requests for space changes are verified, the resulting changes in requirements will add to a division's or activities' space shortage or surplus. The working group would evaluate the impact of those changes on the Avionics Laboratory's mission. On the basis of that evaluation, the group would then recommend action, if any, that the Board of Directors should take. Space could be reallocated among divisions, or a programmed facility expansion could be enlarged or made smaller, for example. The working group would incorporate the Board's decisions into subsequent facility plans.

Maintain Space Discipline

A comprehensive space data base and a formal system for requesting changes to it are of little value if system discipline is not maintained. Space left vacant has a tendency to be claimed by a group that happens to notice it. Activities have also been known to trade space without notifying anyone. If those actions are allowed to continue, they would soon make the established data base and current strategic facility plans obsolete. And, when the data becomes obsolete, decisions based on those data become invalid. The members of the facilities space working group should guard against such transgressions by staying informed and by making periodic physical inventories of Avionics Laboratory's space.

Coordinate and Comment on Facility Plans

The working group should review all documents that pertain to the Avionics Laboratory's space. For example, they should coordinate on construction programming documents and architectural designs. They should also review leases of modular buildings and acquisition agreements for other base facilities. This involvement would ensure that the working group stayed fully informed on facilities issues, and it would use the working group's knowledge to help verify those documents' accuracy.

Keep Management and Staff Fully Informed of Facilities Issues

The working group should also be responsible for keeping the Avionics Laboratory's senior management fully informed on all facilities matters. It should brief the Board of Directors periodically, or as necessary, on the issues it is staffing and the problems it has identified. Similarly, its members should ensure that the staffs in their divisions are kept up to date on facilities plans and

policies. Such information is good for staff morale, and it allows staffs to plan for moves and other space changes in a logical and timely fashion.

The Working Group's Procedures

The facilities space working group should operate as a committee of middle managers and it should meet at least quarterly. At first, it may have to meet more often to resolve Phase I and Phase II configuration issues since the configurations are sure to change between now and when the designs are finalized and the construction is complete. The announcement of meetings, the choice of meeting place, the make up of the agenda, and other administrative matters should be handled by AATF.

Requests made to the working group for space changes should be in writing and signed by a division director or delegate. Requiring such a formal procedure helps to ensure that the request has been well-conceived and contains sufficient information for the group to make a determination. A signature from the division director ensures that the request is in keeping with the division's own internal facilities and business planning.

Facility issues have the potential to become divisive, especially if there is a severe space shortage and perceived differences in the importance of various research missions and programs. The working group should aim for a consensus and settle issues by vote. If agreement cannot be reached, the group should present more than one option to the Board of Directors without a specific recommendation. Such instances, however, should be a rare exception. The group's charter is to do the staff work and find compromises before the matter goes to the Board.

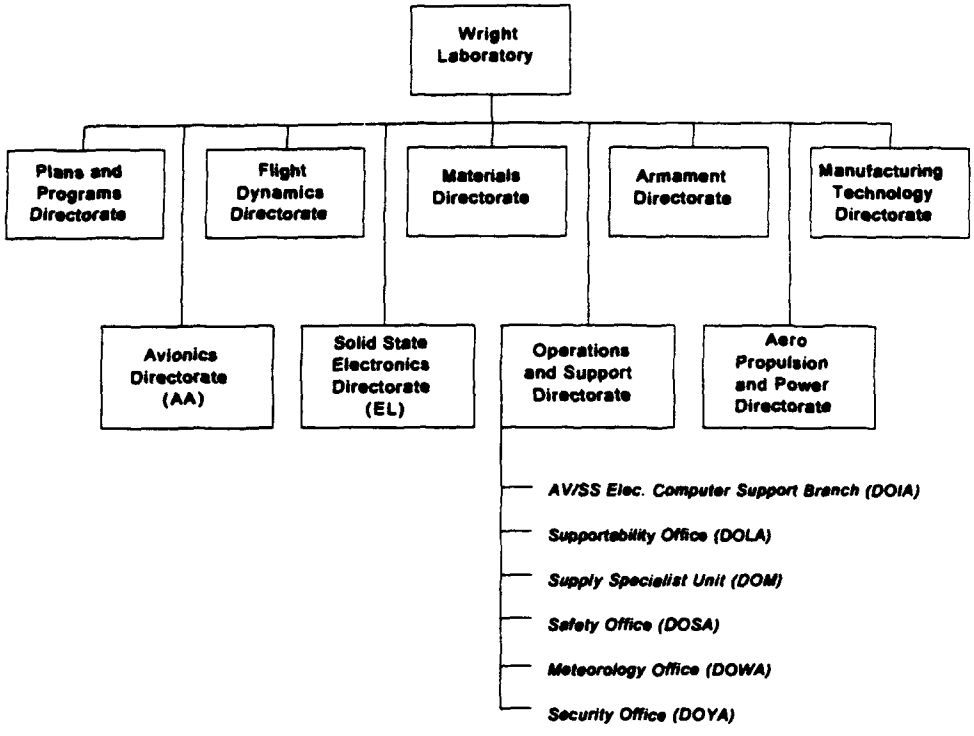
The working group should keep formal meeting minutes, and those minutes should provide the only official record of actions presented and agreed upon. The minutes should be taken by a recorder provided by AATF.

Finally, as a working group, all of its decisions should be presented to the Board of Directors for approval. It should have no independent authority unless some has been specifically designated in writing by the Board of Directors.

By adopting all of LMI's recommendations, Avionics Laboratory and AATF will be in a position to manage its facilities better. A more proactive approach will mean that Avionics Laboratory will be able to respond to its changing business environment and the effect that it has on its facilities and the requirement for all types of space. The result will be more efficient operations, lower occupancy costs, an improved system for allocating space to Avionics Laboratory research activities, and a better methodology for justifying new construction when it is needed and avoiding new construction costs when it is not needed.

APPENDIX A

Avionics Laboratory Organizational Charts



Note: Those groups identified by italics are the Wright Laboratory organizational elements involved in this study. Greater detail of the AA and EL Directorates is shown on the following organization charts.

Figure A-1.
Wright Laboratories Organizational Structure

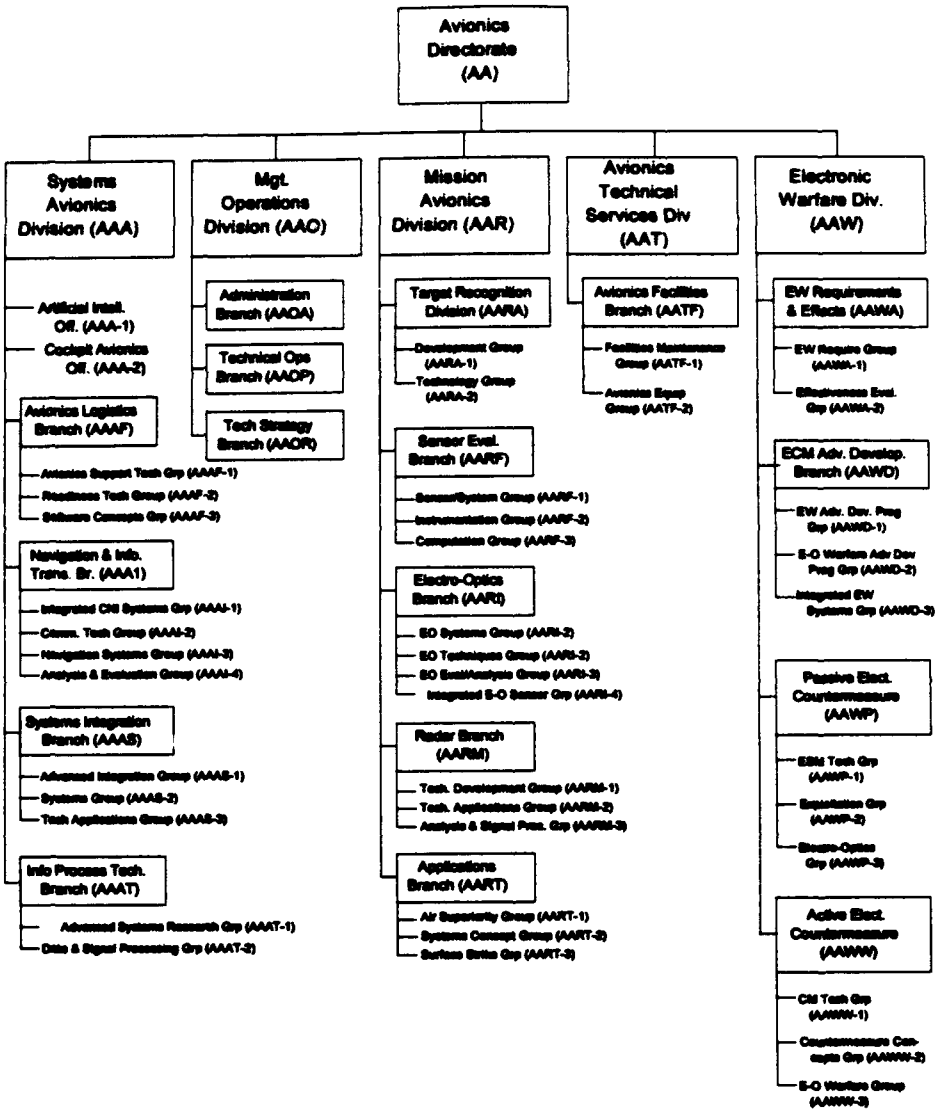


Figure A-2.
Avionics Directorate Organizational Structure

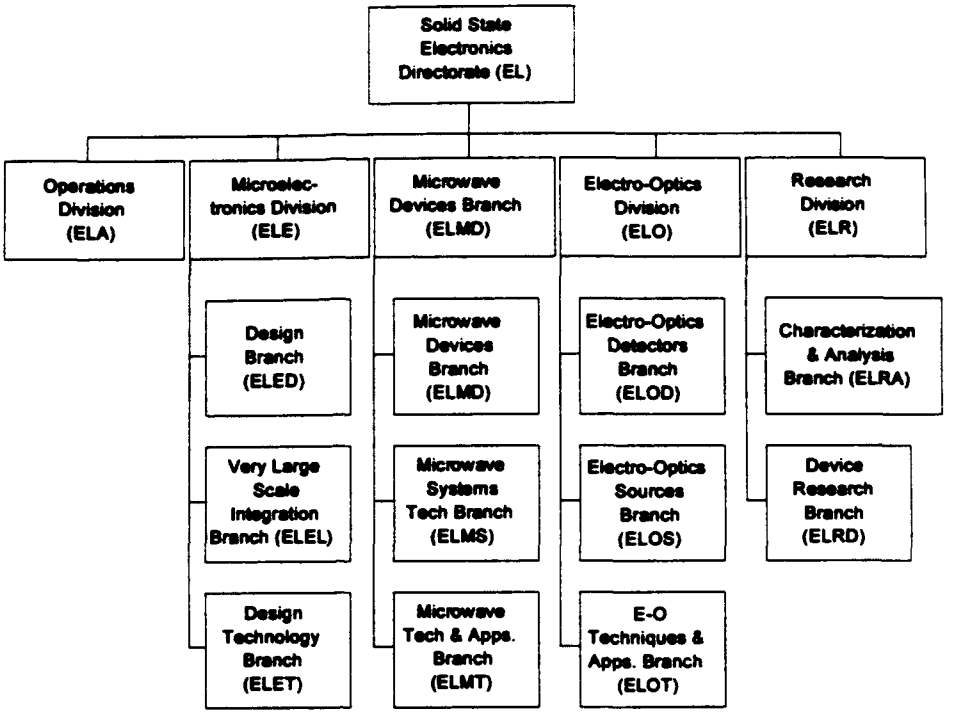
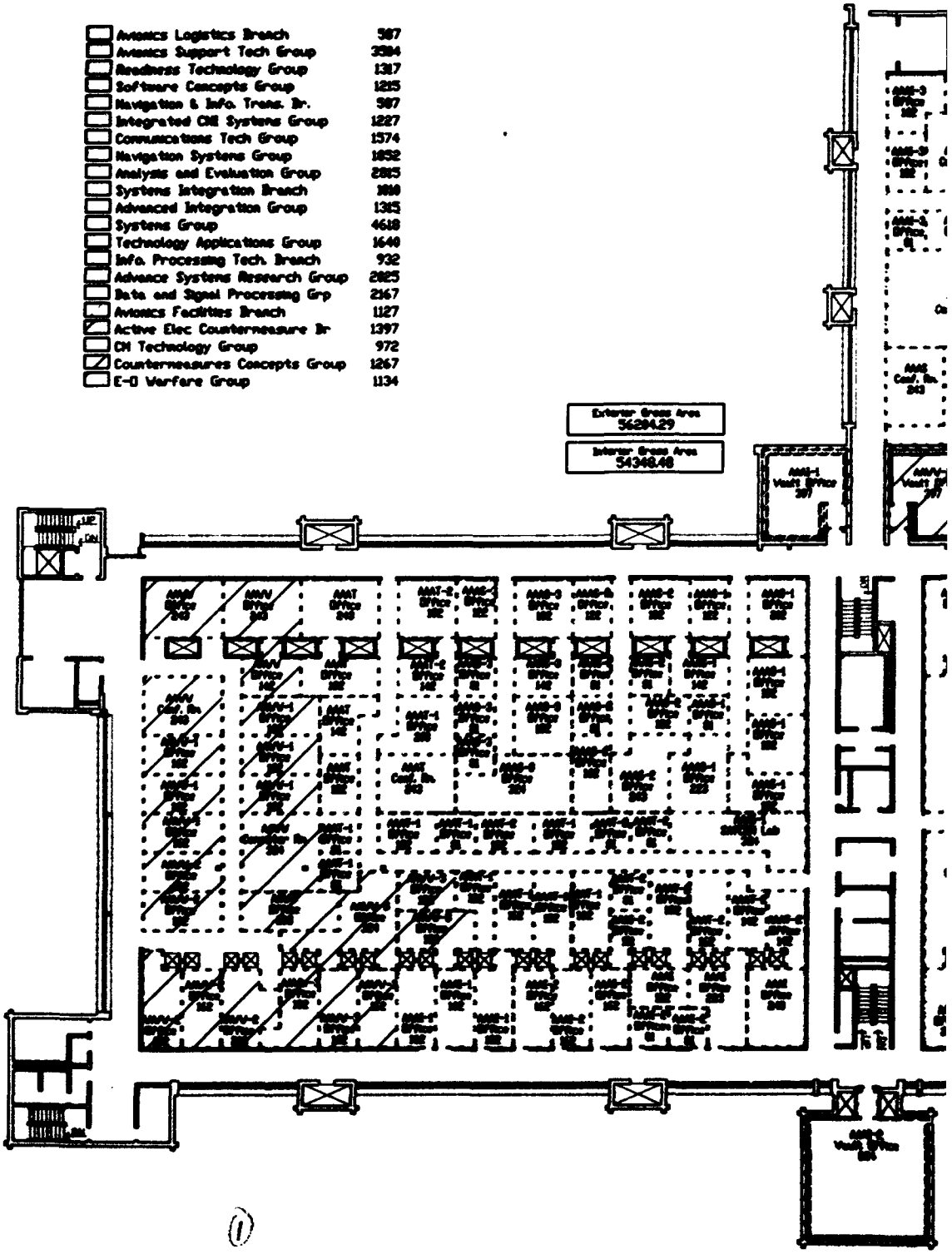
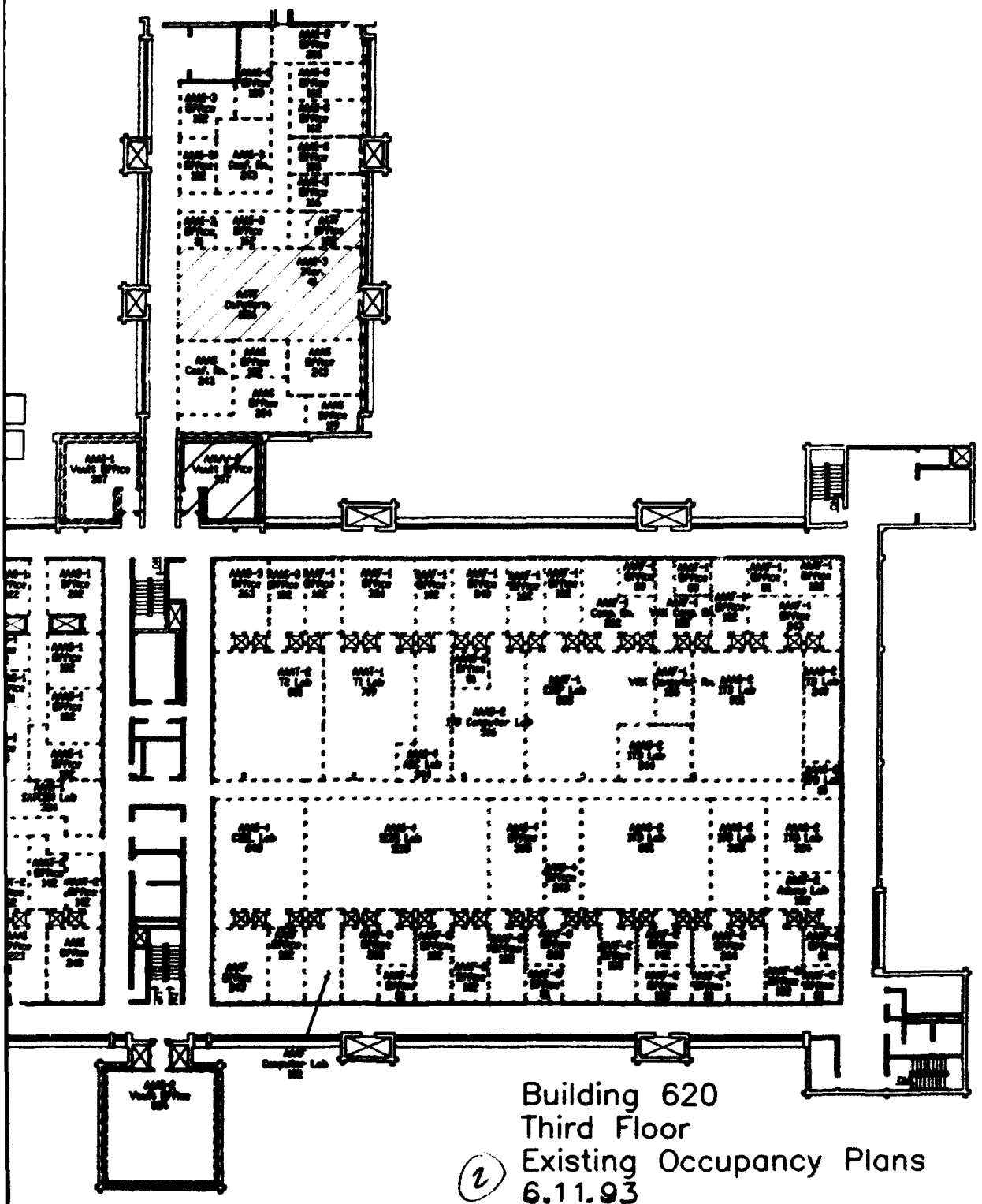


Figure A-3.
Solid State Electronics Directorate Organizational Structure

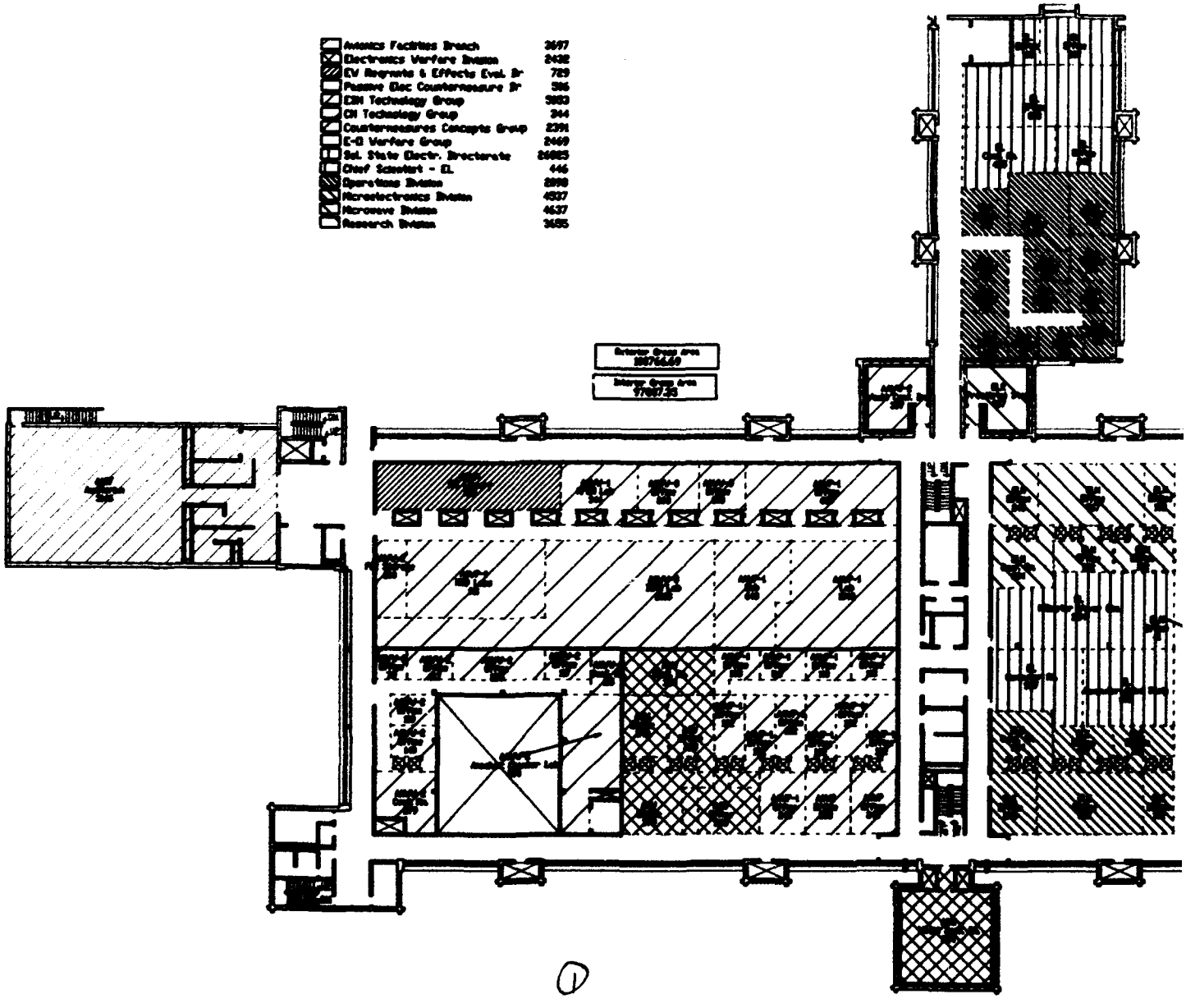
APPENDIX B

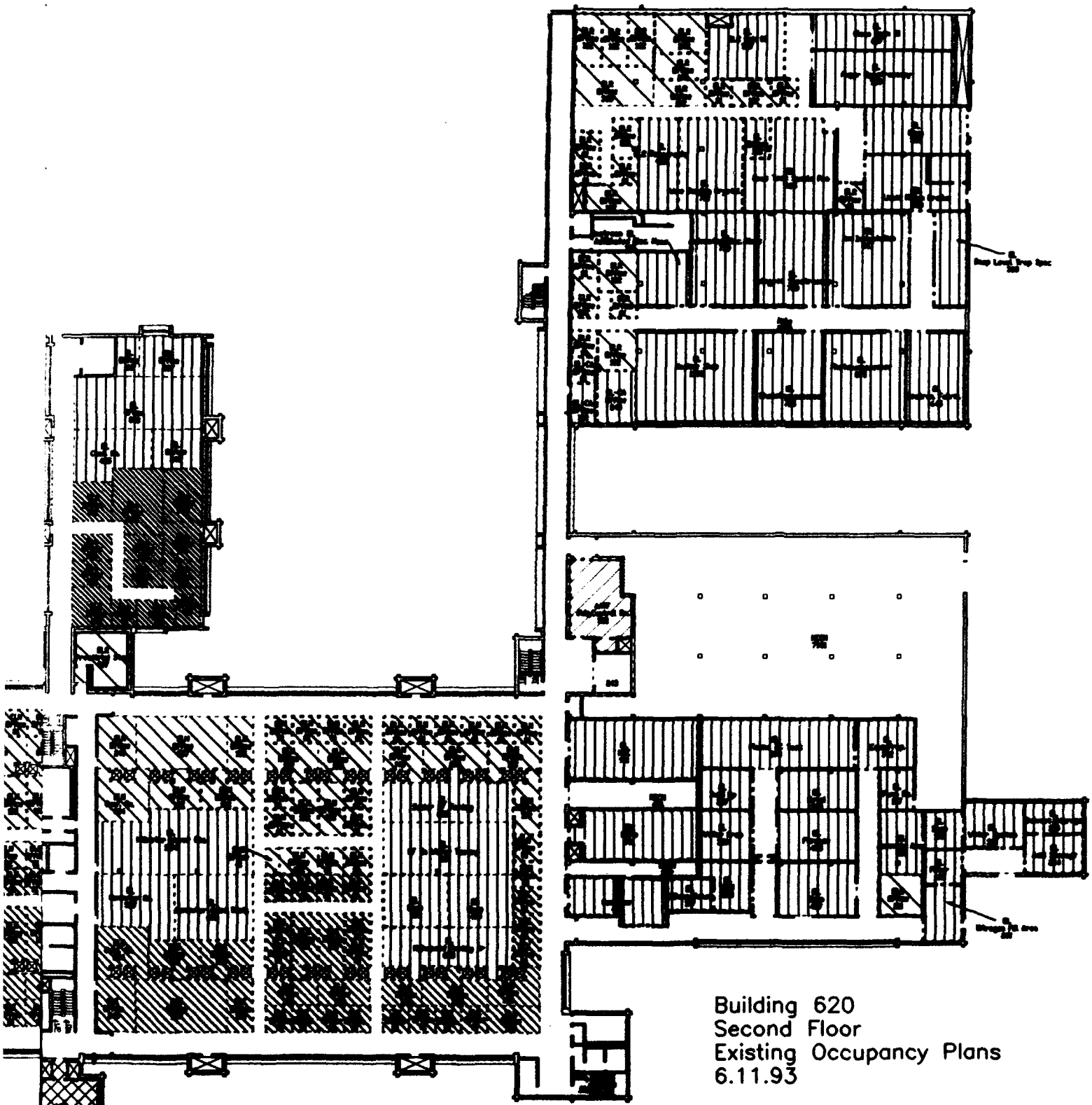
Existing Building 620 Occupancy and Floor Plans


Avionics Logistics Branch 387
Avionics Support Tech Group 3384
Readiness Technology Group 1317
Software Concepts Group 1215
Navigation & Info. Trans. Br. 387
Integrated CNI Systems Group 1227
Communications Tech Group 1574
Navigation Systems Group 1852
Analysis and Evaluation Group 2885
Systems Integration Branch 1818
Advanced Integration Group 1315
Systems Group 4618
Technology Applications Group 1648
Info. Processing Tech. Branch 932
Advance Systems Research Group 2825
Data and Signal Processing Grp 2167
Avionics Facilities Branch 1127
Active Elec Countermeasure Br 1397
CNI Technology Group 972
Countermeasures Concepts Group 1267
E-O Warfare Group 1134
Exterior Gross Area 56284.29
Interior Gross Area 54348.48



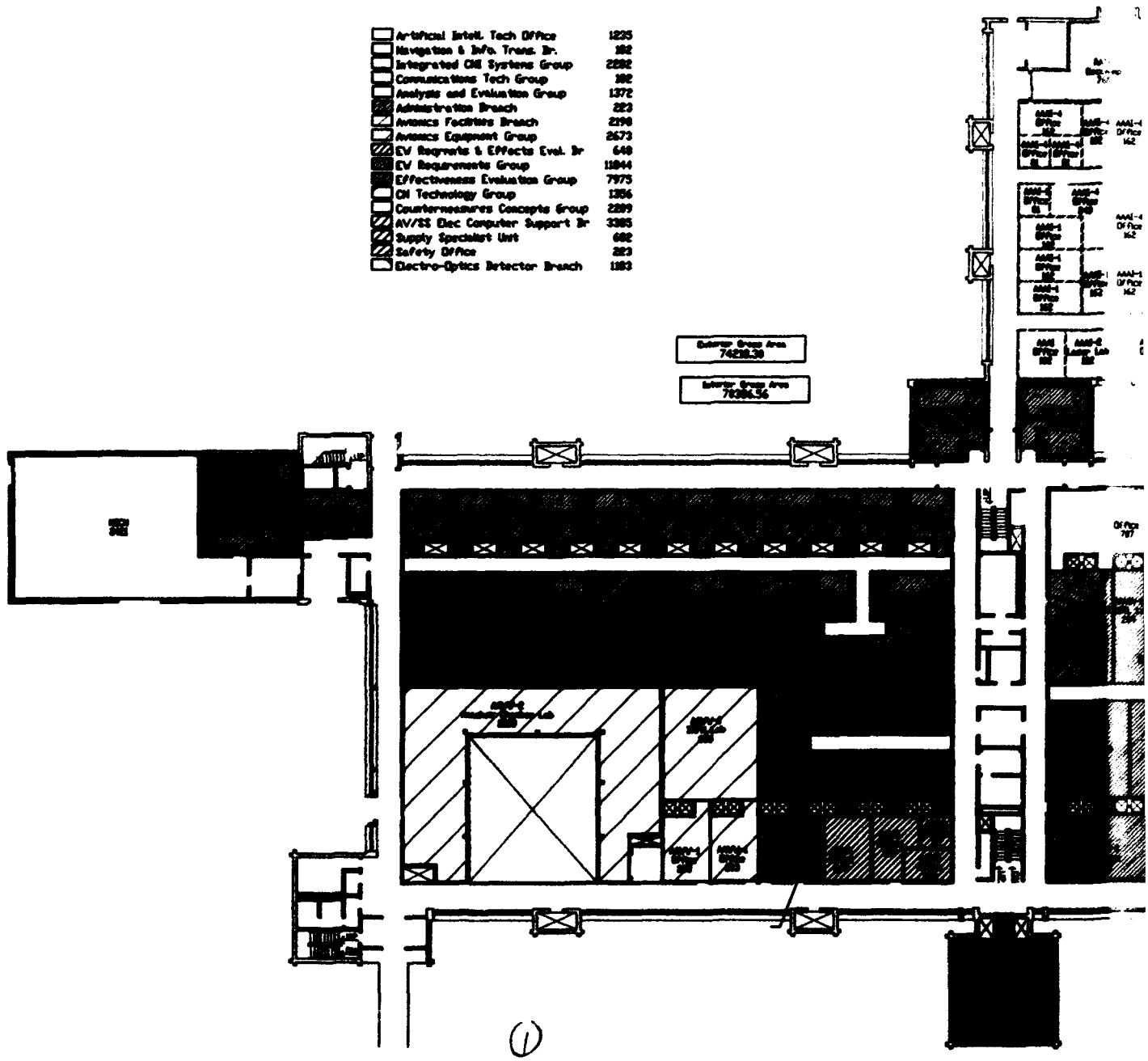
Building 620
Third Floor
(2) Existing Occupancy Plans
6.11.93


Avionics Facilities Branch 3697
Electronics Warfare Division 2432
EW Response & Effects Eval. Br 789
Passive Elec Countermeasure Br 386
CBM Technology Group 3983
CM Technology Group 344
Countermeasures Concepts Group 2391
E-O Warfare Group 2469
Sol. State Electr. Directorate 24885
Chief Scientist - EL 446
Operations Division 2898
Microelectronics Division 4537
Microwave Division 4637
Research Division 3485

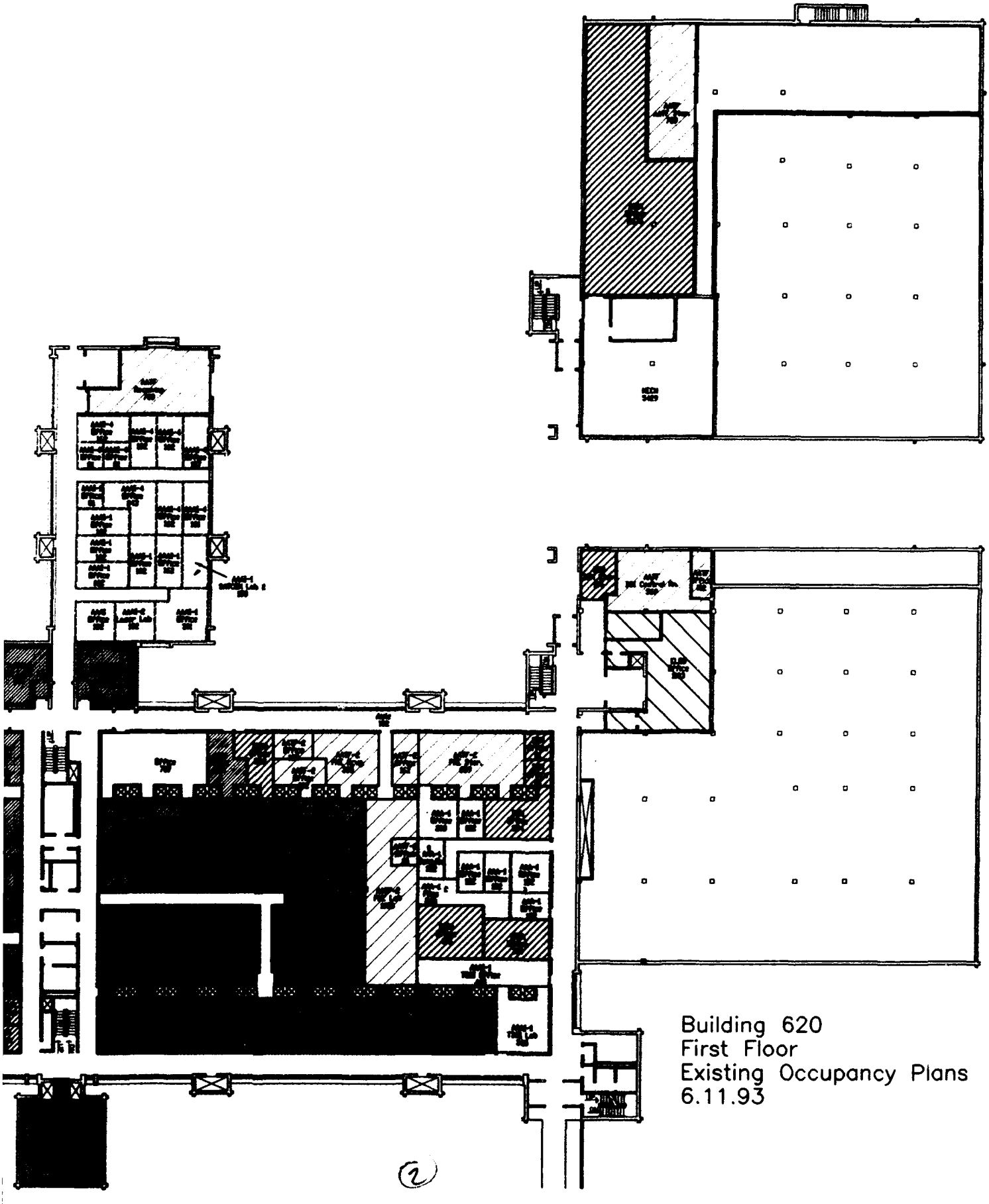


Building 620
Second Floor
Existing Occupancy Plans
6.11.93

(2)

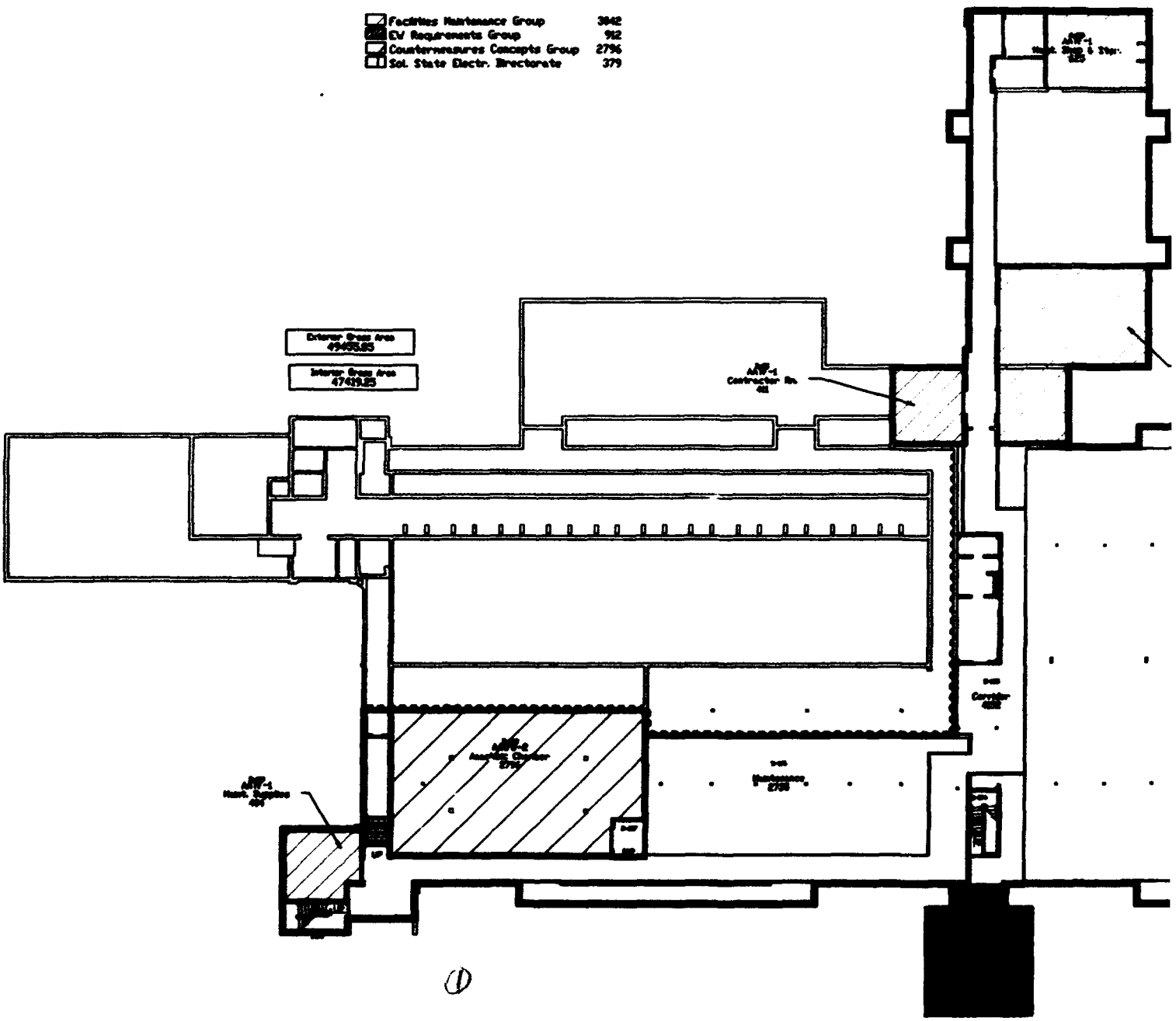

Artificial Intell. Tech Office 1235
Navigation & Info. Trans. Br. 182
Integrated CNI Systems Group 2282
Communications Tech Group 182
Analysis and Evaluation Group 1372
Administration Branch 223
Avionics Facilities Branch 2198
Avionics Equipment Group 2673
EW Requmts & Effects Eval. Br 648
EW Requirements Group 11844
Effectiveness Evaluation Group 7975
CNI Technology Group 1306
Countermeasures Concepts Group 2289
AV/ES Elec Computer Support Br 3385
Supply Specialist Unit 682
Safety Office 223
Electro-Optics Detector Branch 1183
Interior Group Area 74238.39
Interior Group Area 7938.56

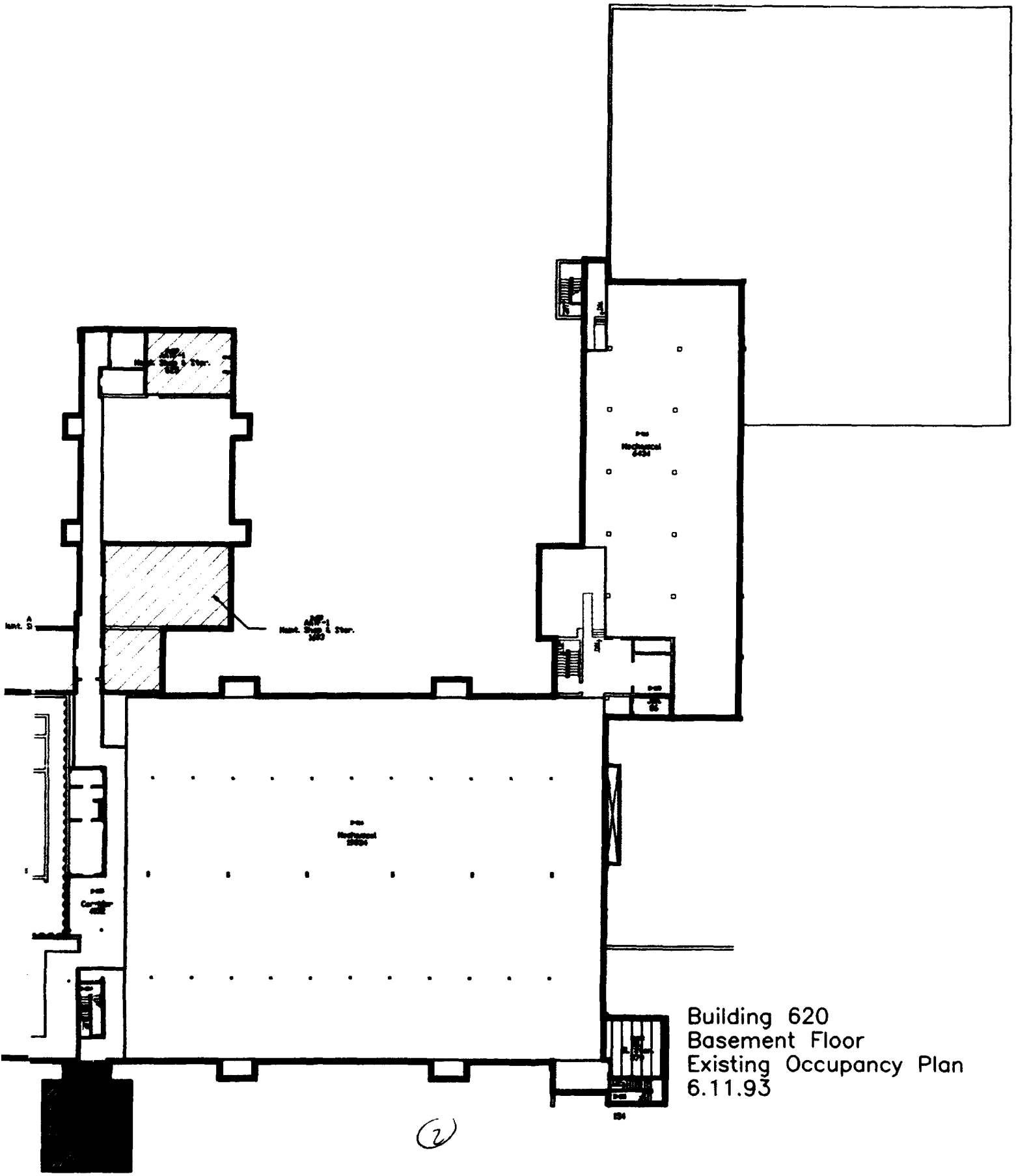
(1)



Building 620
First Floor
Existing Occupancy Plans
6.11.93

(2)


Facilities Maintenance Group 3842
ECV Requirements Group 912
Countermeasures Concepts Group 2796
Sol. State Electr. Directorate 379
Exterior Gross Area
49455.85
Interior Gross Area
47419.85
AMF-1
AMF-1
AMF-1



Building 620
Basement Floor
Existing Occupancy Plan
6.11.93

(2)

APPENDIX C

Existing Space Inventory

Space Inventory by Group

Group		Area(SF)
Unassigned		224,662
AA	Avionic Directorate	3,500
AAA	Systems Avionics Division	2,120
AAA-1	Artificial Intell. Tech Office	1,235
AAA-2	Cockpit Avionics Office	1,691
AAAF	Avionics Logistics Branch	587
AAAF-1	Avionics Support Tech Group	3,504
AAAF-2	Readiness Technology Group	1,317
AAAF-3	Software Concepts Group	1,215
AAAI	Navigation & Info. Trans. Br.	770
AAAI-1	Integrated CNI Systems Group	4,346
AAAI-2	Communications Tech Group	2,081
AAAI-3	Navigation Systems Group	1,852
AAAI-4	Analysis and Evaluation Group	4,187
AAAS	Systems Integration Branch	1,010
AAAS-1	Advanced Integration Group	1,315
AAAS-2	Systems Group	4,618
AAAS-3	Technology Applications Group	1,840
AAAT	Info. Processing Tech. Branch	932
AAAT-1	Advance Systems Research Group	2,025
AAAT-2	Data and Signal Processing Grp	2,167
AAC	Financial Management Division	2,675
AAO	Management Operations Division	1,700
AAOA	Administration Branch	873
AAOP	Technical Operations Branch	1,540
AAOR	Technology Strategy Branch	1,230
AAR	Mission Avionics Division	6,200
AARA	Target Recognition Tech Branch	1,640
AARA-1	Development Group	925
AARA-2	Technology Group	3,520
AARF	Sensor Evaluation Branch	44,120
AARF-1	Sensor/System Group	1,840
AARF-2	Instrumentation Group	1,245
AARF-3	Computation Group	1,625
AARI	Electro-Optics Branch	2,180
AARI-1	EO Systems Group	1,000
AARI-2	EO Techniques Group	11,055
AARI-3	EO Evaluation/Analysis Group	3,700
AARI-4	Integrated EO Sensor Group	1,125
AARM	Radar Branch	950
AARM-1	Technology Development Group	3,390
AARM-2	Technology Applications Group	3,280
AARM-3	Analysis & Signal Proc Group	5,915
AART	Applications Branch	1,230
AART-1	Air Superiority Group	2,680
AART-2	Systems Concept Group	4,695
AART-3	Surface Strike Group	3,285
AAT	Avionics Tech Service Division	445
AATF	Avionics Facilities Branch	8,922

Space Inventory by Group

Group		Area(SF)
AATF-1	Facilities Maintenance Group	3,042
AATF-2	Avionics Equipment Group	2,673
AAW	Electronics Warfare Division	2,757
AAWA	EW Reqrmnts & Effects Eval. Br	1,377
AAWA-1	EW Requirements Group	17,026
AAWA-2	Effectiveness Evaluation Group	7,975
AAWD	ECM Advanced Developmnt Branch	1,280
AAWD-1	EW Advanced Dev Program Group	1,440
AAWD-2	EO Warfare Adv Dev Prog Group	1,440
AAWD-3	Integrated EW Systems Group	1,440
AAWP	Passive Elec Countermeasure Br	8,456
AAWP-1	ESM Technology Group	8,253
AAWP-2	Exploitation Group	41,986
AAWP-3	Electro-Optics Group	11,810
AAWW	Active Elec Countermeasure Br	1,397
AAWW-1	CM Technology Group	2,673
AAWW-2	Countermeasures Concepts Group	8,664
AAWW-3	E-O Warfare Group	3,603
DOIA	AV/SS Elec Computer Support Br	3,945
DOLA	Supportability Office	740
DOM	Supply Specialist Unit	682
DOSA	Safety Office	223
DOWA	Meteorology Office	665
DOYA	Security Office	180
EL	Sol. State Electr. Directorate	27,206
EL-CA	Chief Scientist - EL	446
ELA	Operations Division	2,098
ELE	Microelectronics Division	4,537
ELM	Microwave Division	4,637
ELO	Electro-Optics Division	26,365
ELOD	Electro-Optics Detector Branch	1,183
ELR	Research Division	7,205
Total Area		597,060

Group/ Building Room Number	Room Name	Group	Area(SF)
Unassigned			
Building:18F			
18F-	Mech		2,100
18F-	Mech.		400
18F-	Restrooms		410
18F-1XX2			240
18F-2XX2			1,110
Building:18F Subtotal			**4,260**
Building:22			
22-	Restrooms		905
22-	Mech Room		380
22-	Telephone Closet		30
22-	Restrooms		525
22-	Mech Room		380
22-1XX2			8,150
22-2XX2			3,290
Building:22 Subtotal			**13,660**
Building:22B			
22B-	Restrooms		400
22B-1XX2			23,370
Building:22B Subtotal			**23,770**
Building:23			
23-	Restrooms		180
23-1XX2			1,660
23-2XX2			2,290
23-3XX2			290
Building:23 Subtotal			**4,420**
Building:4ABF			
4ABF-	Restrooms		430
4ABF-	Mech Rooms		830
4ABF-	Restrooms		730
4ABF-1XX2			24,665
4ABF-2XX2			1,600
Building:4ABF Subtotal			**28,255**
Building:620			
620-			105
620-	Mech Room		5,429
620-1-101	Restroom		367
620-1-102	Vestibule		155
620-1-103			158
620-1-105			173
620-1-106	Restroom		321

Group/ Building

Room Number	Room Name	Group	Area(SF)
620-1-107	Aisle		176
620-1-108	Repro.		145
620-1-109			108
620-1-110	Restroom		370
620-1-111	Corridor		1,651
620-1-112	Aisle		830
620-1-113			196
620-1-114	Aisle		385
620-1-115			131
620-1-116	Vestibule		155
620-1-117			151
620-1-118	Restroom		356
620-1-119	Jan.		70
620-1-120			160
620-1-123	MECH		2,421
620-1-125			105
620-1-126	Jan.		194
620-1-127	Corridor		10,166
620-1-130	Corr.		202
620-1-131			181
620-1-132	Aisle		182
620-1-133			171
620-1-134	Jan.		73
620-1-135			240
620-1-140	MECH		5,429
620-1-141	Corridor		278
620-1-142			142
620-1-A36	Office		707
620-1-C116	Corr.		203
620-1-K69	Corr.		202
620-1-U69	Corr.		142
620-1XX1	Exterior Wall		3,832
620-1XX2			4,045
620-2-101	Restroom		367
620-2-102			160
620-2-103	Jan.		91
620-2-105			173
620-2-106	Restroom		321
620-2-107			108
620-2-108	Repro.		145
620-2-109	Aisle		222
620-2-110	Restroom		370
620-2-111	Aisle		776
620-2-112	Corr.		1,651
620-2-113			196
620-2-114	Jan.		108
620-2-115			153

Group/ Building

Room Number	Room Name	Group	Area(SF)
620-2-116	Restroom		356
620-2-118	Aisle		372
620-2-119	Jan.		67
620-2-120			166
620-2-122	Restroom		105
620-2-123			190
620-2-124	Corr.		11,738
620-2-127	Aisle		263
620-2-128			169
620-2-129	Aisle		486
620-2-130	Aisle		486
620-2-131	Aisle		162
620-2-132	Aisle		162
620-2-133	Aisle		1,910
620-2-134	Aisle		182
620-2-135	MECH		282
620-2-136	MECH		476
620-2-138	Jan.		46
620-2-139			243
620-2-140			171
620-2-141	Aisle		1,379
620-2-146	Restroom		574
620-2-147	Aisle		1,076
620-2-M104	MECH		7,981
620-2XX1	Exterior Wall		2,959
620-2XX2			4,107
620-3-101	Restroom		367
620-3-103	Jan.		91
620-3-105			173
620-3-106	Restroom		321
620-3-107			108
620-3-108	Corr.		1,651
620-3-109	Restroom		370
620-3-110	Aisle		182
620-3-111	Jan.		108
620-3-112	Restroom		356
620-3-113	Aisle		590
620-3-114	Jan.		67
620-3-115			152
620-3-116	Jan.		98
620-3-117			179
620-3-118	Aisle		790
620-3-119	Aisle		182
620-3-120	Aisle		182
620-3-121	Corr.		9,962
620-3-124	Aisle		263
620-3-125			169

Group/ Building Room Number	Room Name	Group	Area(SF)
620-3-127			171
620-3-128			206
620-3-129	Jan.		33
620-3-C105	Aisle		648
620-3XX1	Exterior Wall		1,856
620-3XX2			2,384
620-B-101			154
620-B-104			173
620-B-105	Corridor		4,152
620-B-106	Maintenance		2,735
620-B-107			112
620-B-110			150
620-B-114	Mechanical		19,834
620-B-115	Jan.		86
620-B-116	Mechanical		6,434
620-BXX1	Exterior Wall		2,037
620-BXX2			1,030
620-C-102			160
620-RXX1	Exterior Wall		200
620-RXX2			200
620-TXX2			350
Building:620 Subtotal			**140,918**
Building:622			
622-	Restrooms		200
622-1XX2			6,045
Building:622 Subtotal			**6,245**
Building:MODA			
MODA-	Restrooms		275
MODA-	Telephone Closet		70
MODA-XX2			605
Building:MODA Subtotal			**950**
Building:MODB			
MODB-	Restrooms		275
MODB	Telephone Closet		70
MODB-XX2			802
Building:MODB Subtotal			**1,147**
Building:MODC			
MODC-	Restrooms		275
MODC-	Telephone Closet		70
MODC-XX2			692
Building:MODC Subtotal			**1,037**
Unassigned Subtotal			**224,662**

Group/ Building Room Number	Room Name	Group	Area(SF)
Avionic Directorate			
Building:22			
22-	General Office	AA	3,050
22-	Conf Room	AA	450
Building:22 Subtotal			**3,500**
Avionic Directorate Subtotal			**3,500**
Systems Avionics Division			
Building:22			
22-	Spec Library	AAA	800
Building:22 Subtotal			**800**
Building:MODC			
MODC-	General Office	AAA	920
MODC-	Conf Room	AAA	400
Building:MODC Subtotal			**1,320**
Systems Avionics Division Subtotal			**2,120**
Artificial Intell. Tech Office			
Building:620			
620-1-H61	Office	AAA-1	203
620-1-H62	Office	AAA-1	122
620-1-J60	Comp.Rm.	AAA-1	122
620-1-K61	Files	AAA-1	243
620-1-K63	Office	AAA-1	122
620-1-K64	Office	AAA-1	122
620-1-K66	Office	AAA-1	182
620-1-P68	Office	AAA-1	122
Building:620 Subtotal			**1,235**
Artificial Intell. Tech Office Subtotal			**1,235**
Cockpit Avionics Office			
Building:146			
146-	General Office	AAA-2	1,691
Building:146 Subtotal			**1,691**
Cockpit Avionics Office Subtotal			**1,691**
Avionics Logistics Branch			
Building:620			
620-3-Z37	Office	AAAF	243
620-3-Z39	Office	AAAF	162
620-3-Z40	Computer Lab	AAAF	182
Building:620 Subtotal			**587**

Group/ Building Room Number	Room Name	Group	Area(SF)
Avionics Logistics Branch Subtotal			**587**
Avionics Support Tech Group			
Building:620			
620-3-A40	Office	AAAF-1	162
620-3-A45	Office	AAAF-1	324
620-3-A47	Office	AAAF-1	162
620-3-A50	Office	AAAF-1	243
620-3-A52	Office	AAAF-1	162
620-3-A53	Office	AAAF-1	162
620-3-A56	Comp. Rm.	AAAF-1	262
620-3-A57	Office	AAAF-1	80
620-3-A59	VAX Comp. Rm.	AAAF-1	188
620-3-A60	Office	AAAF-1	80
620-3-A62	Office	AAAF-1	182
620-3-A65	Office	AAAF-1	81
620-3-A66	Office	AAAF-1	122
620-3-E59	VAX Computer Rm.	AAAF-1	165
620-3-E68	Office	AAAF-1	243
620-3-M54	ESIP Lab	AAAF-1	888
Building:620 Subtotal			**3,504**
Avionics Support Tech Group Subtotal			**3,504**
Readiness Technology Group			
Building:620			
620-3-V68	Adams Lab	AAAF-2	182
620-3-W68	Office	AAAF-2	81
620-3-X60	Office	AAAF-2	142
620-3-Z57	Office	AAAF-2	183
620-3-Z60	Office	AAAF-2	122
620-3-Z61	Office	AAAF-2	81
620-3-Z63	Office	AAAF-2	264
620-3-Z65	Office	AAAF-2	182
620-3-Z67	Office	AAAF-2	81
Building:620 Subtotal			**1,317**
Readiness Technology Group Subtotal			**1,317**
Software Concepts Group			
Building:620			
620-3-Z43	Office	AAAF-3	263
620-3-Z45	Office	AAAF-3	81
620-3-Z47	Office	AAAF-3	182
620-3-Z49	Office	AAAF-3	162
620-3-Z50	Office	AAAF-3	182
620-3-Z53	Office	AAAF-3	81

Group/ Building Room Number	Room Name	Group	Area(SF)
620-3-Z55	Office	AAAF-3	263
Building:620 Subtotal			1,215
Software Concepts Group Subtotal			1,215
Navigation & Info. Trans. Br.			
Building:620			
620-1-X69	Office	AAAI	182
620-3-W28	Office	AAAI	122
620-3-Z30	Office	AAAI	223
620-3-Z32	Office	AAAI	243
Building:620 Subtotal			770
Navigation & Info. Trans. Br. Subtotal			770
Integrated CNI Systems Group			
Building:620			
620-1-L69	Office	AAAI-1	81
620-1-N69	Office	AAAI-1	162
620-1-Q69	Office	AAAI-1	162
620-1-S69	Office	AAAI-1	162
620-1-T73	Office	AAAI-1	162
620-1-T75	Office	AAAI-1	162
620-1-T77	SATCOM Lab 2	AAAI-1	158
620-1-U68	TSSI Office	AAAI-1	405
620-1-U76	Office	AAAI-1	301
620-1-Z65	TSSI Lab	AAAI-1	365
620-3-122	Vault Office	AAAI-1	397
620-3-P32	SATCOM Lab	AAAI-1	324
620-3-Z15	Office	AAAI-1	162
620-3-Z16	Office	AAAI-1	162
620-3-Z18	Office	AAAI-1	182
620-ROOF	Rooftop Lab	AAAI-1	1,000
Building:620 Subtotal			4,346
Integrated CNI Systems Group Subtotal			4,346
Communications Tech Group			
Building:620			
620-1-V72	Laser Lab	AAAI-2	182
620-3-104	Vault Office	AAAI-2	824
620-3-U25	Office	AAAI-2	101
620-3-Z20	Office	AAAI-2	162
620-3-Z22	Office	AAAI-2	162
620-3-Z24	Office	AAAI-2	162
620-3-Z26	Office	AAAI-2	81
620-3-Z29	Office	AAAI-2	81

Group/ Building Room Number	Room Name	Group	Area(SF)
620-TOWER	Laser Com Lab	AAAI-2	325
Building:620 Subtotal			**2,081**
Communications Tech Group Subtotal			**2,081**
Navigation Systems Group			
Building:620			
620-3-B74	Office	AAAI-3	206
620-3-C73	Office	AAAI-3	189
620-3-D75	Office	AAAI-3	162
620-3-E75	Office	AAAI-3	162
620-3-F69	Office	AAAI-3	162
620-3-H75	Office	AAAI-3	158
620-3-J70	Office	AAAI-3	122
620-3-J71	Conf. Rm.	AAAI-3	243
620-3-J75	Office	AAAI-3	166
620-3-L75	Stor.	AAAI-3	41
620-308	Office	AAAI-3	162
620-313	Office	AAAI-3	81
Building:620 Subtotal			**1,852**
Navigation Systems Group Subtotal			**1,852**
Analysis and Evaluation Group			
Building:620			
620-1-G69	Office	AAAI-4	162
620-1-J69	Office	AAAI-4	81
620-1-J72	Office	AAAI-4	81
620-1-J73	Office	AAAI-4	162
620-1-J75	Office	AAAI-4	162
620-1-J77	Office	AAAI-4	157
620-1-L71	Office	AAAI-4	243
620-1-L76	Office	AAAI-4	162
620-1-L77	Office	AAAI-4	161
620-3-M47	ARC Lab	AAAI-4	344
620-3-P38	CSEL Lab	AAAI-4	643
620-3-P45	IESS Lab	AAAI-4	1,215
620-3-P50	Office	AAAI-4	365
620-3-P53	Office	AAAI-4	243
Building:620 Subtotal			**4,187**
Analysis and Evaluation Group Subtotal			**4,187**
Systems Integration Branch			
Building:620			
620-3-U74	Office	AAAS	122
620-3-V75	Office	AAAS	243

Group/ Building Room Number	Room Name	Group	Area(SF)
620-3-W69	Conf. Rm.	AAAS	243
620-3-W76	Office	AAAS	119
620-3-X69	Office	AAAS	284
Building:620 Subtotal			**1,010**
Systems Integration Branch Subtotal			**1,010**
Advanced Integration Group			
Building:620			
620-3-A31	Office	AAAS-1	122
620-3-C32	Office	AAAS-1	202
620-3-E30	Office	AAAS-1	142
620-3-E32	Office	AAAS-1	182
620-3-H30	Office	AAAS-1	81
620-3-H32	Office	AAAS-1	182
620-3-J30	Office	AAAS-1	223
620-3-K31	Office	AAAS-1	182
Building:620 Subtotal			**1,315**
Advanced Integration Group Subtotal			**1,315**
Systems Group			
Building:620			
620-3-C24	Office	AAAS-2	122
620-3-C26	Office	AAAS-2	182
620-3-E24	Office	AAAS-2	81
620-3-E26	Office	AAAS-2	81
620-3-G26	Office	AAAS-2	122
620-3-G49	Office	AAAS-2	81
620-3-H24	Office	AAAS-2	81
620-3-J24	Office	AAAS-2	162
620-3-K25	Office	AAAS-2	243
620-3-M51	ITB Computer Lab	AAAS-2	506
620-3-M57	ITB Lab	AAAS-2	244
620-3-M61	ITB Lab	AAAS-2	851
620-3-M68	ITB Lab	AAAS-2	243
620-3-P58	ITB Lab	AAAS-2	851
620-3-P63	ITB Lab	AAAS-2	365
620-3-P68	ITB Lab	AAAS-2	324
620-342	ITB Lab	AAAS-2	81
Building:620 Subtotal			**4,618**
Systems Group Subtotal			**4,618**
Technology Applications Group			
Building:620			
620-3-A37	Office	AAAS-3	263

Group/ Building Room Number	Room Name	Group	Area(SF)
620-3-A38	Office	AAAS-3	182
620-3-C15	Office	AAAS-3	122
620-3-C20	Office	AAAS-3	182
620-3-E18	Office	AAAS-3	81
620-3-E20	Office	AAAS-3	142
620-3-G18	Office	AAAS-3	81
620-3-J18	Office	AAAS-3	81
620-3-J20	Office	AAAS-3	182
620-3-K19	Office	AAAS-3	324
Building:620 Subtotal			1,640
Technology Applications Group Subtotal			1,640
Info. Processing Tech. Branch			
Building:620			
620-3-D10	Office	AAAT	243
620-3-E12	Office	AAAT	182
620-3-G12	Office	AAAT	142
620-3-K10	Office	AAAT	122
620-3-K13	Conf. Rm.	AAAT	243
Building:620 Subtotal			932
Info. Processing Tech. Branch Subtotal			932
Advance Systems Research Group			
Building:620			
620-3-J13	Office	AAAT-1	203
620-3-M43	T1 Lab	AAAT-1	709
620-3-P11	Office	AAAT-1	81
620-3-P15	Office	AAAT-1	122
620-3-P17	Office	AAAT-1	81
620-3-P23	Office	AAAT-1	122
620-3-Q11	Office	AAAT-1	81
620-3-R20	Office	AAAT-1	162
620-3-R22	Office	AAAT-1	182
620-3-R23	Office	AAAT-1	162
620-443	Office	AAAT-1	122
Building:620 Subtotal			2,025
Advance Systems Research Group Subtotal			2,025
Data and Signal Processing Grp			
Building:620			
620-3-C14	Office	AAAT-2	182
620-3-E14	Office	AAAT-2	142
620-3-M37	T2 Lab	AAAT-2	851
620-3-P18	Office	AAAT-2	122

Group/ Building Room Number	Room Name	Group	Area(SF)
620-3-P25	Office	AAAT-2	81
620-3-P26	Office	AAAT-2	81
620-3-R26	Office	AAAT-2	81
620-3-R28	Office	AAAT-2	182
620-3-R29	Office	AAAT-2	162
620-3-R31	Office	AAAT-2	142
620-3-S33	Office	AAAT-2	142
Building:620 Subtotal			**2,167**
Data and Signal Processing Grp Subtotal			**2,167**
Financial Management Division			
Building:MODC			
MODC-	General Office	AAC	2,675
Building:MODC Subtotal			**2,675**
Financial Management Division Subtotal			**2,675**
Management Operations Division			
Building:22			
22-	General Office	AAO	925
22-	Training Room	AAO	775
Building:22 Subtotal			**1,700**
Management Operations Division Subtotal			**1,700**
Administration Branch			
Building:22			
22-	General Office	AAOA	650
Building:22 Subtotal			**650**
Building:620			
620-1-A44	Office	AAOA	223
Building:620 Subtotal			**223**
Administration Branch Subtotal			**873**
Technical Operations Branch			
Building:22			
22-	General Office	AAOP	1,540
Building:22 Subtotal			**1,540**
Technical Operations Branch Subtotal			**1,540**
Technology Strategy Branch			
Building:22			
22-	General Office	AAOR	1,230

Group/ Building Room Number	Room Name	Group	Area(SF)
Building:22 Subtotal			**1,230**
Technology Strategy Branch Subtotal			**1,230**
Mission Avionics Division			
Building:22			
22-	General Office	AAR	1,475
22-	Conf Room	AAR	415
22-	Classified Conf Room	AAR	810
22-	XPN Office/Lab	AAR	3,500
Building:22 Subtotal			**6,200**
Mission Avionics Division Subtotal			**6,200**
Target Recognition Tech Branch			
Building:23			
23-	General Office	AARA	1,640
Building:23 Subtotal			**1,640**
Target Recognition Tech Branch Subtotal			**1,640**
Development Group			
Building:23			
23-	General Office	AARA-1	180
23-	General Office	AARA-1	745
Building:23 Subtotal			**925**
Development Group Subtotal			**925**
Technology Group			
Building:18F			
18F-	Model Based Vis Lab	AARA-2	675
18F-	General Office	AARA-2	2,560
18F-	Conf Room	AARA-2	175
Building:18F Subtotal			**3,410**
Building:23			
23-	General Office	AARA-2	110
Building:23 Subtotal			**110**
Technology Group Subtotal			**3,520**
Sensor Evaluation Branch			
Building:18F			
18F-	Bldg 18F Lab	AARF	10,800
18F-	Test Lab	AARF	2,785
18F-	Contractor Office	AARF	570

Group/ Building Room Number	Room Name	Group	Area(SF)
18F-	Computer Room	AARF	640
Building:18F Subtotal			**14,795**
Building:23			
23-	Dynamic Analyzer Lab	AARF	14,500
23-	Break Room	AARF	675
23-	MTL Contr. Office	AARF	500
23-	SEQUAL Lab	AARF	1,150
23-	SDSA Lab	AARF	4,565
23-	Dyn Anlz Supp Equip	AARF	5,520
23-	MTL Contract Office	AARF	945
23-	General Office	AARF	205
23-	General Office	AARF	760
23-	Vault	AARF	85
23-	Copy Room	AARF	100
23-	Conf Room	AARF	320
Building:23 Subtotal			**29,325**
Sensor Evaluation Branch Subtotal			**44,120**
Sensor/System Group			
Building:18F			
18F-	General Office	AARF-1	200
Building:18F Subtotal			**200**
Building:23			
23-	General Office	AARF-1	680
23-	General Office	AARF-1	960
Building:23 Subtotal			**1,640**
Sensor/System Group Subtotal			**1,840**
Instrumentation Group			
Building:18F			
18F-	General Office	AARF-2	880
Building:18F Subtotal			**880**
Building:23			
23-	General Office	AARF-2	365
Building:23 Subtotal			**365**
Instrumentation Group Subtotal			**1,245**
Computation Group			
Building:18F			
18F-	General Office	AARF-3	180
Building:18F Subtotal			**180**

Group/ Building Room Number	Room Name	Group	Area(SF)
Building:23			
23-	General Office	AARF-3	1,235
23-	General Office	AARF-3	210
Building:23 Subtotal			**1,445**
Computation Group Subtotal			**1,625**
Electro-Optics Branch			
Building:22			
22-	General Office	AARI	1,200
22-	Conf Room	AARI	480
22-	Conf Room	AARI	500
Building:22 Subtotal			**2,180**
Electro-Optics Branch Subtotal			**2,180**
EO Systems Group			
Building:22			
22-	General Office	AARI-1	1,000
Building:22 Subtotal			**1,000**
EO Systems Group Subtotal			**1,000**
EO Techniques Group			
Building:622			
622-	General Office	AARI-2	2,760
622-	Collumator Lab	AARI-2	6,525
622-	Conf Room	AARI-2	640
622-	Computer Lab	AARI-2	660
622-	Storage	AARI-2	470
Building:622 Subtotal			**11,055**
EO Techniques Group Subtotal			**11,055**
EO Evaluation/Analysis Group			
Building:622			
622-	General Office	AARI-3	1,715
622-	Bldg 622 Lab	AARI-3	1,985
Building:622 Subtotal			**3,700**
EO Evaluation/Analysis Group Subtotal			**3,700**
Integrated EO Sensor Group			
Building:22			
22-	General Office	AARI-4	1,125
Building:22 Subtotal			**1,125**
Integrated EO Sensor Group Subtotal			**1,125**

Group/ Building Room Number	Room Name	Group	Area(SF)
Radar Branch			
Building:22			
22-	General Office	AARM	850
Building:22 Subtotal			**850**
Radar Branch Subtotal			**850**
Technology Development Group			
Building:22			
22-	General Office	AARM-1	1,720
22-	H140 Lab ???	AARM-1	510
22-	General Office	AARM-1	1,160
Building:22 Subtotal			**3,390**
Technology Development Group Subtotal			**3,390**
Technology Applications Group			
Building:22			
22-	Rooms H160-164 ???	AARM-2	2,200
22-	Conf Room	AARM-2	280
22-	Radar Lab	AARM-2	800
Building:22 Subtotal			**3,280**
Technology Applications Group Subtotal			**3,280**
Analysis & Signal Proc Group			
Building:22			
22-	Signal Proc Lab	AARM-3	2,280
22-	Rooms H160 ????	AARM-3	1,270
22-	Rooms H146	AARM-3	2,100
22-	Room H182a ???	AARM-3	265
Building:22 Subtotal			**5,915**
Analysis & Signal Proc Group Subtotal			**5,915**
Applications Branch			
Building:22			
22-	General Office	AART	975
22-	Conf. Room	AART	255
Building:22 Subtotal			**1,230**
Applications Branch Subtotal			**1,230**
Air Superiority Group			
Building:22			
22-	General Office	AART-1	2,175
22-	Vault Room	AART-1	505

Group/ Building Room Number	Room Name	Group	Area(SF)
Building:22 Subtotal			**2,690**
Air Superiority Group Subtotal			**2,690**
Systems Concept Group			
Building:22			
22-	General Office	AART-2	3,035
22-	Computer Labs	AART-2	560
22-	FCSM Lab	AART-2	1,100
Building:22 Subtotal			**4,695**
Systems Concept Group Subtotal			**4,695**
Surface Strike Group			
Building:22			
22-	General Office	AART-3	3,125
22-	Equipment Stores	AART-3	160
Building:22 Subtotal			**3,285**
Surface Strike Group Subtotal			**3,285**
Avionics Tech Service Division			
Building:MODC			
MODC-	General Office	AAT	445
Building:MODC Subtotal			**445**
Avionics Tech Service Division Subtotal			**445**
Avionics Facilities Branch			
Building:22			
22-	Storage Bldg 22	AATF	630
Building:22 Subtotal			**630**
Building:620			
620-1-138	DSI Control Rm.	AATF	568
620-1-139	Office	AATF	112
620-1-144	AATF Stor.	AATF	759
620-1-E70	Receiving	AATF	760
620-2-121	Auditorium	AATF	3,146
620-2-161	Bldg.Control Rm.	AATF	551
620-3-N78	Office	AATF	122
620-3-P69	Cafeteria	AATF	1,006
Building:620 Subtotal			**7,022**
Building:MODC			
MODC-	General Office	AATF	990
MODC-	Drafting Room	AATF	280

Group/ Building Room Number	Room Name	Group	Area(SF)
Building:MODC Subtotal			**1,270**
Avionics Facilities Branch Subtotal			**8,922**
Facilities Maintenance Group			
Building:620			
620-B-109	Maint. Supplies	AATF-1	404
620-B-111	Contractor Rm.	AATF-1	411
620-B-112	Maint. Shop & Stor.	AATF-1	1,603
620-B-113	Maint. Shop & Stor.	AATF-1	625
Building:620 Subtotal			**3,042**
Facilities Maintenance Group Subtotal			**3,042**
Avionics Equipment Group			
Building:620			
620-1-A56	PME Rcvg.	AATF-2	385
620-1-B50	Office	AATF-2	122
620-1-B57	Office	AATF-2	162
620-1-C51	Office	AATF-2	182
620-1-E62	PME Stor.	AATF-2	689
620-1-J57	Office	AATF-2	81
620-1-K56	PME Lab	AATF-2	1,053
Building:620 Subtotal			**2,673**
Avionics Equipment Group Subtotal			**2,673**
Electronics Warfare Division			
Building:620			
620-2-104	Vault Conf. Rm.	AAW	824
620-2-R19	Conf. Rm.	AAW	354
620-2-V19	Office	AAW	248
620-2-V22	Office	AAW	263
620-2-W23	Office	AAW	263
620-2-W24	Stor.	AAW	41
620-2-Y21	Stor.	AAW	61
620-2-Z20	Office	AAW	379
620-TOWER	EW Tower Lab	AAW	325
Building:620 Subtotal			**2,757**
Electronics Warfare Division Subtotal			**2,757**
EW Reqmnts & Effects Eval. Br			
Building:620			
620-1-W29	Office	AAWA	243
620-1-X33	Office	AAWA	81
620-1-Y31	Office	AAWA	122

Group/ Building Room Number	Room Name	Group	Area(SF)
620-1-Z31	Office	AAWA	203
620-2-D4	TIC Library	AAWA	729
Building:620 Subtotal			1,377
EW Reqmnts & Effects Eval. Br Subtotal			1,377
EW Requirements Group			
Building:22			
22-	General Office	AAWA-1	715
22-	Rooms H107 ???	AAWA-1	1,200
22-	RW Lab	AAWA-1	2,800
Building:22 Subtotal			4,715
Building:620			
620-1-104	Vault Labs 1.5	AAWA-1	824
620-1-128	Vault Labs 1.7	AAWA-1	397
620-1-129	Vault Labs 1.6	AAWA-1	397
620-1-M38	ECSRL Lab	AAWA-1	567
620-1-M40	ECSRL Lab	AAWA-1	284
620-1-M41	ECSRL Lab	AAWA-1	284
620-1-M46	ECSRL Lab	AAWA-1	567
620-1-M47	ECSRL Lab	AAWA-1	284
620-1-N49	ECSRL Lab	AAWA-1	486
620-1-N52	Office	AAWA-1	486
620-1-P35	ECSRL Lab	AAWA-1	608
620-1-P40	ECSRL Lab	AAWA-1	846
620-1-P48	ECSRL Lab	AAWA-1	846
620-1-Q26	Conf.Rm.	AAWA-1	238
620-1-Q28	Office	AAWA-1	119
620-1-Q30	Office	AAWA-1	122
620-1-Q32	Office	AAWA-1	119
620-1-Q34	Office	AAWA-1	119
620-1-S27	Office	AAWA-1	142
620-1-S32	Office	AAWA-1	203
620-1-V25	Files/Stor.	AAWA-1	326
620-1-V31	Office	AAWA-1	203
620-1-V35	Storage	AAWA-1	628
620-1-W46	Office	AAWA-1	425
620-1-W52	Lab/Recept.	AAWA-1	425
620-1-Z23	Office	AAWA-1	162
620-1-Z25	Office	AAWA-1	162
620-1-Z84	Office	AAWA-1	1,134
620-B-103	Vault 0.5	AAWA-1	912
Building:620 Subtotal			12,311
EW Requirements Group Subtotal			17,026
Effectiveness Evaluation Group			
Building:620			
620-1-122	Classified Stor.	AAWA-2	752

Group/ Building Room Number	Room Name	Group	Area(SF)
620-1-124	Recept. Area	AAWA-2	238
620-1-D1	Office	AAWA-2	203
620-1-D10	Office	AAWA-2	203
620-1-D13	Office	AAWA-2	263
620-1-D16	Office	AAWA-2	142
620-1-D18	Office	AAWA-2	203
620-1-D22	Office	AAWA-2	203
620-1-D25	Office	AAWA-2	203
620-1-D28	Office	AAWA-2	142
620-1-D31	Office	AAWA-2	203
620-1-D34	Office	AAWA-2	203
620-1-D4	Office	AAWA-2	203
620-1-D7	Office	AAWA-2	142
620-1-F31	Conf. Rm.	AAWA-2	304
620-1-H10	Office	AAWA-2	425
620-1-H17	Equip.Maint.	AAWA-2	365
620-1-H25	Office	AAWA-2	182
620-1-H28	Office	AAWA-2	182
620-1-J26	Simulation Labs	AAWA-2	2,653
620-1-J31	Config. Mgt. Files	AAWA-2	567
Building:620 Subtotal			**7,975**
Effectiveness Evaluation Group Subtotal			**7,975**
ECM Advanced Developmnt Branch			
Building:MODB			
MODB-	General Office	AAWD	640
MODB-	Conf Room	AAWD	360
MODB-	Repro Room	AAWD	80
MODB-	Computer Room	AAWD	200
Building:MODB Subtotal			**1,280**
ECM Advanced Developmnt Branch Subtotal			**1,280**
EW Advanced Dev Program Group			
Building:MODB			
MODB-	General Office	AAWD-1	1,440
Building:MODB Subtotal			**1,440**
EW Advanced Dev Program Group Subtotal			**1,440**
EO Warfare Adv Dev Prog Group			
Building:MODB			
MODB-	General Office	AAWD-2	1,440
Building:MODB Subtotal			**1,440**
EO Warfare Adv Dev Prog Group Subtotal			**1,440**

Group/ Building Room Number	Room Name	Group	Area(SF)
Integrated EW Systems Group			
Building:MODS			
MODS-	General Office	AAWD-3	1,440
Building:MODS Subtotal			1,440
Integrated EW Systems Group Subtotal			1,440
Passive Elec Countermeasure Br			
Building:4ABF			
4ABF-	Vehicle Storage	AAWP	5,735
4ABF-	Laser/Radar Tower	AAWP	840
4ABF-	Break Room	AAWP	400
4ABF-	Visiting Room	AAWP	230
4ABF-	Copier Room	AAWP	245
4ABF-	Secret Conf Room	AAWP	500
Building:4ABF Subtotal			7,950
Building:620			
620-2-Z29	Office	AAWP	263
620-2-Z31	Office	AAWP	243
Building:620 Subtotal			506
Passive Elec Countermeasure Br Subtotal			8,456
ESM Technology Group			
Building:4ABF			
4ABF-	EWAAD and Computers	AAWP-1	1,010
4ABF-	General Office	AAWP-1	1,625
4ABF-	Conf Room	AAWP-1	150
4ABF-	400 HZ Lab	AAWP-1	225
4ABF-	RWAPL Storage	AAWP-1	190
Building:4ABF Subtotal			3,200
Building:620			
620-2-D25	Office	AAWP-1	689
620-2-F24	Lab	AAWP-1	643
620-2-F31	Lab	AAWP-1	1,043
620-2-K7	H29 Labs	AAWP-1	911
620-2-P25	Office	AAWP-1	138
620-2-P26	Office	AAWP-1	118
620-2-P31	Office	AAWP-1	118
620-2-P32	Office	AAWP-1	118
620-2-R24	Office	AAWP-1	162
620-2-R25	Office	AAWP-1	182
620-2-R28	Office	AAWP-1	182
620-2-R29	Office	AAWP-1	162
620-2-R31	Office	AAWP-1	162

Group/ Building Room Number	Room Name	Group	Area(SF)
620-2-R33	Office	AAWP-1	182
620-2-Z28	Office	AAWP-1	243
Building:620 Subtotal			5,063
ESM Technology Group Subtotal			8,253
Exploitation Group			
Building:4ABF			
4ABF-	Document Storage	AAWP-2	265
4ABF-	General Office	AAWP-2	2,695
4ABF-	General Lab	AAWP-2	300
4ABF-	Conf Room	AAWP-2	125
4ABF-	RF Lab	AAWP-2	1,215
4ABF-	Laser Lab	AAWP-2	2,620
4ABF-	Adv Int Circ Exp Lab	AAWP-2	830
4ABF-	Radar Range	AAWP-2	11,410
4ABF-	Metal Shop	AAWP-2	1,420
4ABF-	SKIF Vault	AAWP-2	230
4ABF-	ECM Test/Eval Room	AAWP-2	1,220
4ABF-	Test Control Lab	AAWP-2	495
4ABF-	Photo Lab	AAWP-2	200
4ABF-	General Office	AAWP-2	3,060
4ABF-	Contractor Office	AAWP-2	510
4ABF-	Computer Rooms	AAWP-2	500
4ABF-	Anechoic Chamber	AAWP-2	5,320
4ABF-	Radar Lab	AAWP-2	845
4ABF-	Shield Room	AAWP-2	795
4ABF-	Modular Shield Room	AAWP-2	635
4ABF-	Electronic Lab	AAWP-2	480
4ABF-	Lab Support	AAWP-2	185
4ABF-	Storage	AAWP-2	615
4ABF-	Break Room	AAWP-2	445
4ABF-	Other 4ABF Lab	AAWP-2	1,110
4ABF-	Assembly Area	AAWP-2	3,780
4ABF-	ECM Lab	AAWP-2	680
Building:4ABF Subtotal			41,985
Exploitation Group Subtotal			41,985
Electro-Optics Group			
Building:4ABF			
4ABF-	General Office	AAWP-3	2,485
4ABF-	Conf Room	AAWP-3	625
4ABF-	IR Lab	AAWP-3	2,175
4ABF-	Laser Lab	AAWP-3	4,900
4ABF-	Env Control Room	AAWP-3	375
4ABF-	RF Lab	AAWP-3	365

Group/ Building Room Number	Room Name	Group	Area(SF)
4ABF-	Bldg 4abf Lab	AAWP-3	905
Building:4ABF Subtotal			11,810
Electro-Optics Group Subtotal			11,810
Active Elec Countermeasure Br			
Building:620			
620-3-A5	Office	AAWW	243
620-3-D4	Office	AAWW	243
620-3-[illegible]8	Office	AAWW	142
620-3-F4	Conf. Rm.	AAWW	243
620-3-R6	Computer Rm.	AAWW	324
620-3-T6	Office	AAWW	203
Building:620 Subtotal			1,397
Active Elec Countermeasure Br Subtotal			1,397
CM Technology Group			
Building:620			
620-1-U19	DRFM Lab	AAWW-1	835
620-1-Z19	Office	AAWW-1	258
620-1-Z22	Office	AAWW-1	263
620-2-D13	RFCM Lab	AAWW-1	344
620-3-G6	Office	AAWW-1	162
620-3-J4	Office	AAWW-1	162
620-3-J6	Office	AAWW-1	162
620-3-L4	Office	AAWW-1	162
620-3-L6	Office	AAWW-1	162
620-3-P4	Office	AAWW-1	162
Building:620 Subtotal			2,673
CM Technology Group Subtotal			2,673
Countermeasures Concepts Group			
Building:620			
620-1-V1	Anechoic Chamber Lab	AAWW-2	2,209
620-2-125	Vault Conf. Rm.	AAWW-2	397
620-2-F2	F02 Storage	AAWW-2	203
620-2-P12	Office	AAWW-2	117
620-2-P2	Office	AAWW-2	79
620-2-P3	Office	AAWW-2	117
620-2-P8	Office	AAWW-2	235
620-2-Q15	Conf. Rm.	AAWW-2	115
620-2-R14	Anechoic Chamber Lab	AAWW-2	590
620-2-S2	Office	AAWW-2	119
620-2-T2	Office	AAWW-2	140
620-2-W1	Conf. Rm.	AAWW-2	279

Group/ Building Room Number	Room Name	Group	Area(SF)
620-3-123	Vault Office	AAWW-2	397
620-3-R4	Office	AAWW-2	162
620-3-T4	Office	AAWW-2	162
620-3-V1	Office	AAWW-2	182
620-3-V4	Office	AAWW-2	162
620-3-W7	Office	AAWW-2	203
620-B-108	Anachoic Chamber	AAWW-2	2,796
Building:620 Subtotal			**8,664**
Countermeasures Concepts Group Subtotal			**8,664**
E-O Warfare Group			
Building:620			
620-2-D19	Office	AAWW-3	263
620-2-D22	Office	AAWW-3	203
620-2-F17	DIME Lab	AAWW-3	2,003
620-3-S14	Office	AAWW-3	122
620-3-T14	Office	AAWW-3	182
620-3-U8	Office	AAWW-3	324
620-3-V10	Office	AAWW-3	162
620-3-V13	Office	AAWW-3	162
620-3-W8	Office	AAWW-3	182
Building:620 Subtotal			**3,603**
E-O Warfare Group Subtotal			**3,603**
AV/SS Elec Computer Support Br			
Building:22			
22-	Training Room	DOIA	560
Building:22 Subtotal			**560**
Building:620			
620-1-143	Office	DOIA	2,676
620-1-S64	Office	DOIA	405
620-1-S68	Office	DOIA	304
Building:620 Subtotal			**3,385**
AV/SS Elec Computer Support Br Subtotal			**3,945**
Supportability Office			
Building:22			
22-	General Office	DOLA	740
Building:22 Subtotal			**740**
Supportability Office Subtotal			**740**
Supply Specialist Unit			
Building:620			
620-1-137	DOM Stor.	DOM	196

Group/ Building Room Number	Room Name	Group	Area(SF)
620-1-A68	Office	DOM	81
620-1-D68	Office	DOM	81
620-1-H68	Office	DOM	324
Building:620 Subtotal			**682**
Supply Specialist Unit Subtotal			**682**
Safety Office			
Building:620			
620-1-A45	Office	DOSA	223
Building:620 Subtotal			**223**
Safety Office Subtotal			**223**
Meteorology Office			
Building:22			
22-	General Office	DOWA	370
22-	Equip Storage	DOWA	295
Building:22 Subtotal			**665**
Meteorology Office Subtotal			**665**
Security Office			
Building:22			
22-	General Office	DOYA	180
Building:22 Subtotal			**180**
Security Office Subtotal			**180**
Sol. State Electr. Directorate			
Building:620			
620-2-142	Photoluminescence	EL	875
620-2-143	Electron. Fabric. &	EL	645
620-2-144	Deep Level Trap Spec	EL	368
620-2-145	Ion Implantation	EL	917
620-2-149	Liquid Helium Produc	EL	680
620-2-150	Open	EL	590
620-2-AA14	Machine Shop	EL	1,303
620-2-B18	Clean Room #1	EL	607
620-2-C1	MBE	EL	901
620-2-C17	ELR Lab #1	EL	567
620-2-C23	Equip.Prep.	EL	342
620-2-C73	Office	EL	108
620-2-C75	Office	EL	307
620-2-D15	Plasma DC Test	EL	898
620-2-D18	Auger Spectroscopy	EL	928
620-2-E17	Metal	EL	383

[redacted] Page 25

[redacted]

[redacted]	[redacted]	[redacted]	[redacted]
620-2-P14	Build Up	EL	267
620-2-P57	Scatter RF Testing	EL	628
620-2-G27	Pump Rm.	EL	167
620-2-G69	Office	EL	806
620-2-H76	Office	EL	243
620-2-J1	Litho	EL	761
620-2-J11	Wire Bonding Crystal	EL	713
620-2-J15	Office	EL	122
620-2-J17	Furnace	EL	473
620-2-J19	Gase Test Sample Pro	EL	865
620-2-J31	Shop	EL	183
620-2-J36	Solvent Storage	EL	213
620-2-J8	EL2 Topography	EL	425
620-2-K14	Water Prep	EL	330
620-2-K28	Assembly Area	EL	327
620-2-L34	Water System	EL	321
620-2-L66	Conf. Rm.	EL	425
620-2-M35	Acid Storage	EL	264
620-2-M46	Millimeter Waver Cha	EL	1,134
620-2-M57	RF On Wafer Testing	EL	810
620-2-N29	Filter	EL	160
620-2-N41	Computer Rm.	EL	527
620-2-N46	Computer Aided Desig	EL	808
620-2-N57	Open	EL	405
620-2-N62	Open	EL	405
620-2-P1	Computer	EL	484
620-2-P14	SEM	EL	260
620-2-Q12	E-Beam Column	EL	177
620-2-R18	Open	EL	497
620-2-S27	Nitrogen Fill Area	EL	261
620-2-U57	Highspeed Testing Ar	EL	648
620-2-W10	Automated Elec. Meas	EL	739
620-2-W19	Infrared Spectroscop	EL	769
620-2-W9	Automated Elec.. Meas	EL	336
620-2-Z19	Photoluminescence	EL	725
620-B-162	EL Stor.	EL	379
[redacted]			27,205

[redacted] 27,205

[redacted]

620-2-D12	Office	EL-CA	81
620-2-D51	Office	EL-CA	122
620-2-D52	Office	EL-CA	243
[redacted]			446

[redacted] 446

Group/ Building Room Number	Room Name	Group	Area(SF)
Operations Division			
Building:620			
620-2-P71	Office	ELA	182
620-2-P72	Office	ELA	385
620-2-P76	Office	ELA	242
620-2-Q76	Office	ELA	179
620-2-R71	Office	ELA	122
620-2-S73	Office	ELA	122
620-2-T73	Office	ELA	122
620-2-U71	Office	ELA	122
620-2-U76	Office	ELA	121
620-2-V71	Office	ELA	182
620-2-V77	Office	ELA	119
620-2-W72	Office	ELA	81
620-2-W74	Office	ELA	122
Building:620 Subtotal			2,096
Operations Division Subtotal			2,096
Microelectronics Division			
Building:620			
620-2-P49	Office	ELE	81
620-2-P51	Office	ELE	81
620-2-P52	Office	ELE	81
620-2-P54	Office	ELE	81
620-2-P68	Office	ELE	81
620-2-R48	Office	ELE	81
620-2-R50	Office	ELE	182
620-2-R53	Office	ELE	183
620-2-R55	Office	ELE	81
620-2-S68	Office	ELE	81
620-2-T55	Office	ELE	81
620-2-U48	Office	ELE	81
620-2-U62	Office	ELE	223
620-2-U68	Office	ELE	81
620-2-V38	Conf. Rm.	ELE	284
620-2-V41	Office	ELE	182
620-2-V44	Office	ELE	182
620-2-V68	Office	ELE	182
620-2-W37	Office	ELE	243
620-2-W45	Office	ELE	162
620-2-X48	Office	ELE	162
620-2-X55	Office	ELE	162
620-2-X57	Office	ELE	122
620-2-Y48	Office	ELE	81
620-2-Y55	Office	ELE	81
620-2-Y57	Office	ELE	81

Group/ Building

Room Number	Room Name	Group	Area(SF)
620-2-Z41	Office	ELE	567
620-2-Z51	Office	ELE	81
620-2-Z52	Office	ELE	81
620-2-Z60	Office	ELE	81
620-2-Z61	Office	ELE	81
620-2-Z64	Office	ELE	81
620-2-Z68	Office	ELE	162
Building:620 Subtotal			4,537
Microelectronics Division Subtotal			4,537
Microwave Division			
Building:620			
620-2-A41	Office	ELM	567
620-2-A50	Office	ELM	81
620-2-A53	Office	ELM	81
620-2-A57	Office	ELM	81
620-2-A59	Office	ELM	81
620-2-A61	Office	ELM	81
620-2-A63	Office	ELM	81
620-2-A65	Office	ELM	81
620-2-B48	Office	ELM	81
620-2-B55	Office	ELM	81
620-2-B68	Office	ELM	81
620-2-C48	Office	ELM	182
620-2-C57	Office	ELM	142
620-2-D37	Office	ELM	243
620-2-D45	Office	ELM	162
620-2-D55	Office	ELM	182
620-2-D68	Office	ELM	182
620-2-E38	Conf. Rm.	ELM	284
620-2-E41	Office	ELM	182
620-2-E44	Office	ELM	182
620-2-E62	Office	ELM	203
620-2-E68	Office	ELM	182
620-2-G48	Office	ELM	81
620-2-G55	Office	ELM	81
620-2-H48	Office	ELM	81
620-2-H55	Office	ELM	81
620-2-J50	Office	ELM	162
620-2-J52	Office	ELM	162
620-2-K68	Office	ELM	81
620-2-L48	Office	ELM	41
620-2-L51	Office	ELM	122
620-2-L53	Office	ELM	81
620-2-L55	Office	ELM	81
620-2-M68	Office	ELM	81

Group/ Building Room Number	Room Name	Group	Area(SF)
Building:620 Subtotal			4,637
Microwave Division Subtotal			4,637
Electro-Optics Division			
Building:22B			
22B-	General Office	ELO	4,870
22B-	AV Room	ELO	210
22B-	Classified Conf Room	ELO	800
22B-	Conf Room	ELO	410
22B-	Storage	ELO	2,630
22B-	Machine Shop	ELO	3,400
22B-	Conf Room	ELO	650
22B-	Bldg 22B Labs	ELO	13,385
Building:22B Subtotal			26,355
Electro-Optics Division Subtotal			26,355
Electro-Optics Detector Branch			
Building:620			
620-1-136	Office	ELOD	1,183
Building:620 Subtotal			1,183
Electro-Optics Detector Branch Subtotal			1,183
Research Division			
Building:620			
620-2-126	Prec.Metal Stor.	ELR	397
620-2-148	Office	ELR	91
620-2-C8	Office	ELR	243
620-2-D2	Office	ELR	162
620-2-D3	Office	ELR	162
620-2-D6	Office	ELR	162
620-2-E7	Office	ELR	162
620-2-F7	Office	ELR	162
620-2-G1	Office	ELR	365
620-2-G11	Office	ELR	81
620-2-G15	Office	ELR	122
620-2-G17	Office	ELR	81
620-2-K2	Office	ELR	81
620-2-L4	Office	ELR	122
620-2-M4	Office	ELR	81
620-2-N2	Office	ELR	81
620-2-N25	Office	ELR	211
620-2-N3	Office	ELR	162
620-2-U2	Office	ELR	81
620-2-V3	Office	ELR	162

Group/ Building Room Number	Room Name	Group	Area(SF)
620-2-X1	Office	ELR	122
620-2-X4	Office	ELR	81
620-2-Z1	Office	ELR	81
620-2-Z3	Office	ELR	182
Building:620 Subtotal			**3,655**
Building:MODA			
MODA-	TSSI Offices	ELR	1,700
MODA-	WSU/UES Offices	ELR	1,700
MODA-	Conf Room	ELR	150
Building:MODA Subtotal			**3,550**
Research Division Subtotal			**7,205**
Total Area			**597,050**

Appendix D

Avionics Laboratory Space Requirements

Wright-Patterson Air Force Base
Avionics Lab - Strategic Facilities Plan
Staff & Space Rqmnts Forecast

06/22/93

		Staff					Rqd Area(SF)				
		Jan93	Jan94	Jan95	Jan97	Jan99	Jan93	Jan94	Jan95	Jan97	Jan99
AA	Avionic Directorate	7	7	7	7	7	3,795	3,795	3,795	3,795	3,795
AAA	Systems Avionics Division	6	6	6	6	6	2,599	2,599	2,599	2,599	2,599
AAA-1	Artificial Intell. Tech Office	7	7	8	9	10	1,403	1,403	1,518	1,633	1,748
AAA-2	Cockpit Avionics Office	14	14	14	14	14	1,691	1,691	1,691	1,691	1,691
AAAF	Avionics Logistics Branch	2	2	2	2	2	943	943	943	943	943
AAAF-1	Avionics Support Tech Group	20	20	20	20	20	4,424	4,539	4,539	4,539	4,539
AAAF-2	Readiness Technology Group	13	13	13	13	13	1,565	1,565	1,565	1,565	1,565
AAAF-3	Software Concepts Group	8	9	9	9	9	920	1,035	1,035	1,035	1,035
AAAI	Navigation & Info. Trans. Br.	3	3	3	3	3	932	932	932	932	932
AAAI-1	Integrated CNI Systems Group	17	16	16	16	16	5,658	5,543	5,543	5,543	5,543
AAAI-2	Communications Tech Group	15	15	15	15	15	2,576	2,576	2,576	2,576	2,576
AAAI-3	Navigation Systems Group	14	14	14	14	14	1,599	1,599	1,599	1,599	1,599
AAAI-4	Analysis and Evaluation Group	19	19	19	19	19	4,556	4,556	4,556	4,556	4,556
AAAS	Systems Integration Branch	4	4	4	4	4	1,058	1,058	1,058	1,058	1,058
AAAS-1	Advanced Integration Group	14	14	14	14	14	1,656	1,656	1,656	1,656	1,656
AAAS-2	Systems Group	14	14	14	14	14	5,152	5,152	5,152	5,152	5,152
AAAS-3	Technology Applications Group	18	19	19	19	19	2,289	2,369	2,369	2,369	2,369
AAAT	Info. Processing Tech. Branch	4	4	4	4	4	1,024	1,024	1,024	1,024	1,024
AAAT-1	Advance Systems Research Group	18	19	19	20	20	2,783	2,898	2,898	3,013	3,013
AAAT-2	Data and Signal Processing Grp	12	13	13	13	13	2,392	2,507	2,507	2,507	2,507
AAA	Systems Avionics Division Subtotal	222	225	226	228	229	45,220	45,645	45,760	45,990	46,105
AAC	Financial Management Division	23	23	23	23	23	2,634	2,634	2,634	2,634	2,634
AAO	Management Operations Division	3	3	3	3	3	1,668	1,668	1,668	1,668	1,668
AAOA	Administration Branch	4	4	4	4	4	598	598	598	598	598
AAOP	Technical Operations Branch	9	9	9	9	9	1,196	1,196	1,196	1,196	1,196
AAOR	Technology Strategy Branch	6	6	6	6	6	771	771	771	771	771
AAO	Management Operations Division Subtotal	22	22	22	22	22	4,233	4,233	4,233	4,233	4,233
AAR	Mission Avionics Division	6	6	6	6	6	5,129	5,129	5,129	5,129	5,129

		Staff					Rqd Area(SF)				
		Jan93	Jan94	Jan95	Jan97	Jan99	Jan93	Jan94	Jan95	Jan97	Jan99
AARA	Target Recognition Tech Branch	3	3	3	3	3	748	748	748	748	748
AARA-1	Development Group	19	19	19	19	19	1,932	1,932	1,932	1,932	1,932
AARA-2	Technology Group	29	29	29	29	29	5,624	5,624	5,624	5,624	5,624
AARF	Sensor Evaluation Branch	28	28	28	28	28	49,013	49,013	49,013	49,013	49,013
AARF-1	Sensor/System Group	15	15	15	15	15	1,944	1,944	1,944	1,944	1,944
AARF-2	Instrumentation Group	12	12	12	12	12	1,127	1,127	1,127	1,127	1,127
AARF-3	Computation Group	12	12	12	12	12	1,380	1,380	1,380	1,380	1,380
AARI	Electro-Optics Branch	5	5	5	5	5	2,070	2,070	2,070	1,495	1,495
AARI-1	EO Systems Group	12	12	12	12	12	1,484	1,484	1,484	1,484	1,484
AARI-2	EO Techniques Group	31	31	31	31	31	12,903	12,903	12,903	12,903	12,903
AARI-3	EO Evaluation/Analysis Group	16	16	16	16	16	3,979	3,979	3,979	3,979	3,979
AARI-4	Integrated EO Sensor Group	8	8	8	8	8	943	943	943	943	943
AARM	Radar Branch	4	4	4	4	4	817	817	817	817	817
AARM-1	Technology Development Group	18	20	20	20	20	2,542	2,703	2,703	2,703	2,703
AARM-2	Technology Applications Group	11	13	13	13	13	1,748	1,909	1,909	1,909	1,909
AARM-3	Analysis & Signal Proc Group	15	18	18	18	18	4,439	4,681	4,681	4,681	4,681
AART	Applications Branch	3	3	3	3	3	1,093	1,093	1,093	1,093	1,093
AART-1	Air Superiority Group	14	14	14	14	14	2,185	2,185	2,185	2,185	2,185
AART-2	Systems Concept Group	18	20	20	20	20	3,600	3,761	3,761	3,761	3,761
AART-3	Surface Strike Group	14	14	14	14	14	1,829	1,829	1,829	1,829	1,829
AAR	Mission Avionics Division Subtotal	293	302	302	302	302	106,529	107,254	107,254	106,679	106,679
AAT	Avionics Tech Service Division	2	2	2	2	2	863	863	863	863	863
AATF	Avionics Facilities Branch	5	5	5	5	5	8,890	8,890	8,890	8,890	8,890
AATF-1	Facilities Maintenance Group	3	3	3	3	3	3,863	3,863	3,863	3,863	3,863
AATF-2	Avionics Equipment Group	4	4	4	4	4	2,910	2,910	2,910	2,910	2,910
AAT	Avionics Tech Service Division Subtotal	14	14	14	14	14	16,526	16,526	16,526	16,526	16,526
AAW	Electronics Warfare Division	4	4	4	4	4	2,494	2,494	2,494	2,494	2,494
AAWA	EW Reqrmnts & Effects Eval. Br	3	3	3	3	3	1,679	1,679	1,679	1,679	1,679
AAWA-1	EW Requirements Group	28	28	28	28	28	14,305	14,305	14,305	14,305	14,305
AAWA-2	Effectiveness Evaluation Group	37	37	37	37	37	14,260	14,260	14,260	14,260	14,260

		Staff					Rqd Area(SF)				
		Jan93	Jan94	Jan95	Jan97	Jan99	Jan93	Jan94	Jan95	Jan97	Jan99
AAWD	ECM Advanced Developmnt Branch	3	3	3	3	3	1,258	1,258	1,258	1,258	1,258
AAWD-1	EW Advanced Dev Program Group	10	10	10	10	10	1,139	1,139	1,139	1,139	1,139
AAWD-2	EO Warfare Adv Dev Prog Group	10	10	10	10	10	1,196	1,196	1,196	1,196	1,196
AAWD-3	Integrated EW Systems Group	9	9	9	9	9	1,035	1,035	1,035	1,035	1,035
AAWP	Passive Elec Countermeasure Br	2	2	2	2	2	8,280	8,280	8,280	8,280	8,280
AAWP-1	ESM Technology Group	16	16	16	16	16	4,451	4,451	4,451	4,451	4,451
AAWP-2	Exploitation Group	37	37	37	37	37	39,583	39,583	39,583	39,583	39,583
AAWP-3	Electro-Optics Group	18	18	18	18	18	15,379	15,379	15,379	15,379	15,379
AAWW	Active Elec Countermeasure Br	5	5	5	5	5	1,385	1,385	1,385	1,385	1,385
AAWW-1	CM Technology Group	10	10	10	10	10	3,033	3,958	3,958	3,958	3,958
AAWW-2	Countermeasures Concepts Group	18	18	18	18	18	8,798	10,638	10,638	10,638	10,638
AAWW-3	E-O Warfare Group	17	17	17	17	17	5,624	7,406	7,406	7,406	7,406
AAW	Electronics Warfare Division Subtotal	227	227	227	227	227	123,899	128,446	128,446	128,446	128,446
AA	Avionic Directorate Subtotal	808	820	821	823	824	302,836	308,533	308,648	308,303	308,418
DOIA	AV/SS Elec Computer Support Br	14	14	14	14	14	2,599	2,599	2,599	2,599	2,599
DOLA	Supportability Office	5	5	5	5	5	782	782	782	782	782
DOM	Supply Specialist Unit	5	5	5	5	5	897	897	897	897	897
DOSA	Safety Office	2	2	2	2	2	288	288	288	288	288
DOWA	Meteorology Office	3	3	3	3	3	690	690	690	690	690
DOYA	Security Office	1	1	1	1	1	115	115	115	115	115
EL	Sol. State Electr. Directorate	4	4	4	4	4	30,952	30,952	30,952	30,952	30,952
EL-CA	Chief Scientist - EL	2	2	2	2	2	575	575	575	575	575

		Staff					Rqd Area(SF)				
		Jan93	Jan94	Jan95	Jan97	Jan99	Jan93	Jan94	Jan95	Jan97	Jan99
ELA	Operations Division	15	16	17	18	19	1,932	2,029	2,130	2,237	2,348
ELE	Microelectronics Division	5	5	5	5	5	1,150	1,208	1,268	1,332	1,398
ELED	Design Branch	11	12	13	14	15	1,300	1,365	1,433	1,504	1,579
ELEL	VLS Integration Branch	11	12	13	14	15	1,346	1,413	1,484	1,558	1,636
ELET	Device Technology Branch	7	7	7	7	7	863	906	951	998	1,048
ELE	Microelectronics Division Subtotal	34	36	38	40	42	4,659	4,892	5,136	5,392	5,661
ELM	Microwave Division	5	5	5	5	5	1,104	1,159	1,217	1,278	1,342
ELMD	Microwave Devices Branch	10	11	12	13	14	1,185	1,244	1,306	1,372	1,441
ELMS	Microwave Systems Tech Branch	7	7	7	7	7	840	882	926	972	1,020
ELMT	Micorwave Tech & Apps. Branch	12	13	14	15	16	1,415	1,486	1,561	1,639	1,720
ELM	Microwave Division Subtotal	34	36	38	40	42	4,544	4,771	5,010	5,261	5,523
ELO	Electro-Optics Division	4	4	4	4	4	1,024	1,075	1,129	1,186	1,245
ELOD	Electro-Optics Detector Branch	9	9	9	9	9	1,093	1,148	1,205	1,265	1,328
ELOS	Electro-Optics Sources Branch	11	12	13	14	15	1,323	1,389	1,458	1,531	1,608
ELOT	E-O Techniques & Apps Branch	9	9	9	9	9	1,093	1,148	1,205	1,265	1,328
ELO	Electro-Optics Division Subtotal	33	34	35	36	37	4,533	4,760	4,997	5,247	5,509
ELR	Research Division	23	25	28	31	34	2,668	2,935	3,228	3,551	3,907
ELRA	Character. & Analysis Branch	17	19	21	23	25	2,036	2,239	2,463	2,709	2,981
ELRD	Device Research Branch	19	21	23	25	28	2,243	2,467	2,714	2,985	3,284
ELR	Research Division Subtotal	59	65	72	79	87	6,947	7,641	8,405	9,245	10,172
EL	Sol. State Electr. Directorate Subtotal	181	193	206	219	233	54,142	55,620	57,205	58,909	60,740
Total Usable Area		1,019	1,043	1,067	1,072	1,087	362,349	369,524	371,224	372,583	374,529

AA Avionic Directorate
Dept. Head:J.P. Braily

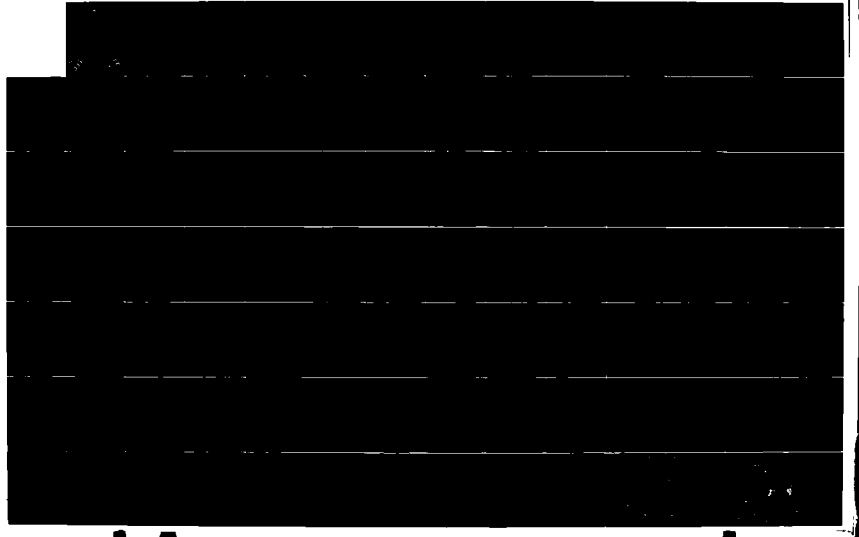
Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Directorate Director	300	1	1	1	1	1	300	300	300	300	300
Chief Scientist	300	1	1	1	1	1	300	300	300	300	300
Deputy Director	200	1	1	1	1	1	200	200	200	200	200
Executive Officer	120	1	1	1	1	1	120	120	120	120	120
Executive Secretary	120	1	1	1	1	1	120	120	120	120	120
Executive Secretary	120	1	1	1	1	1	120	120	120	120	120
Executive Secretary	120	1	1	1	1	1	120	120	120	120	120
Subtotal		7	7	7	7	7	1,280	1,280	1,280	1,280	1,280
Support Space											
Conf. Room (20-25)	500	1	1	1	1	1	500	500	500	500	500
Classified Conf Room	1200	1	1	1	1	1	1,200	1,200	1,200	1,200	1,200
Copy Room	40	4	4	4	4	4	160	160	160	160	160
Reception Area	80	2	2	2	2	2	160	160	160	160	160
Subtotal		8	8	8	8	8	2,020	2,020	2,020	2,020	2,020
Subtotal Assignable							3,300	3,300	3,300	3,300	3,300
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	495	495	495	495	495
Total Usable Area							3,795	3,795	3,795	3,795	3,795

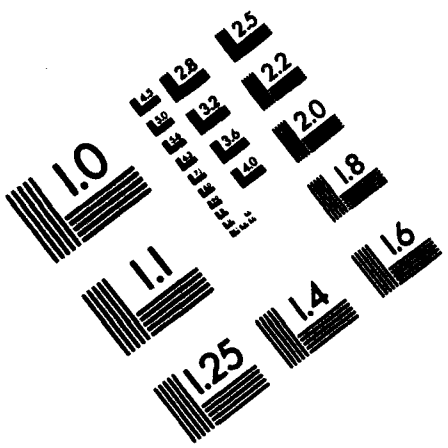
AAA Systems Avionics Division
Dept. Head:Dr. C.H. Krueger

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Division Director	200	1	1	1	1	1	200	200	200	200	200
Deputy Director	200	1	1	1	1	1	200	200	200	200	200
Technical Director	200	1	1	1	1	1	200	200	200	200	200
Program Manager	150	1	1	1	1	1	150	150	150	150	150
Executive Secretary	120	2	2	2	2	2	240	240	240	240	240
Subtotal		6	6	6	6	6	990	990	990	990	990
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
Copy Room	40	1	1	1	1	1	40	40	40	40	40
Reception Area	80	1	1	1	1	1	80	80	80	80	80
Technical Library	800	1	1	1	1	1	800	800	800	800	800
Subtotal		4	4	4	4	4	1,270	1,270	1,270	1,270	1,270
Subtotal Assignable							2,260	2,260	2,260	2,260	2,260
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	339	339	339	339	339
Total Usable Area							2,599	2,599	2,599	2,599	2,599

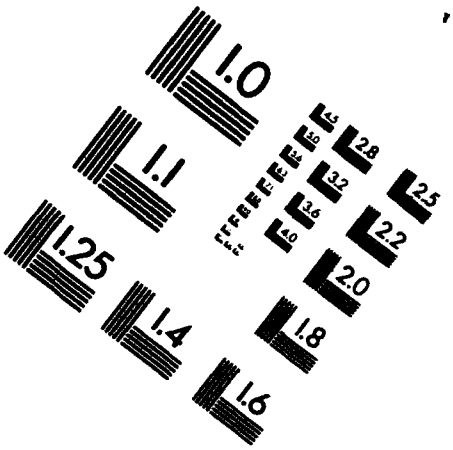
AD-A274 238 STRATEGICALLY PLANNING AVIONICS LABORATORY'S FACILITIES FOR THE FUTURE(U) LOGISTICS MANAGEMENT INST BETHESDA MD J A HAWKINS ET AL. SEP 93 LMI-AF205R1 XC-WL/WP 2/3

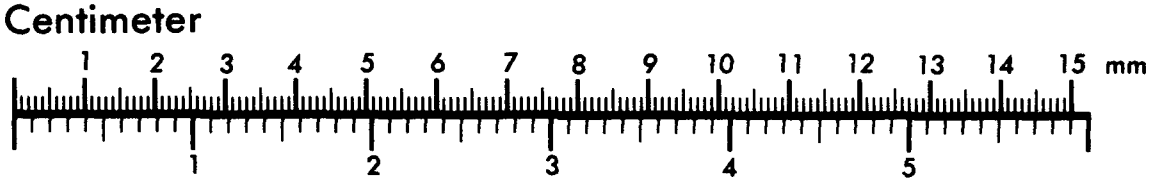
UNCLASSIFIED MDA903-90-C-0006 NL

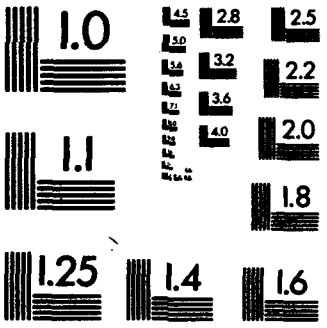


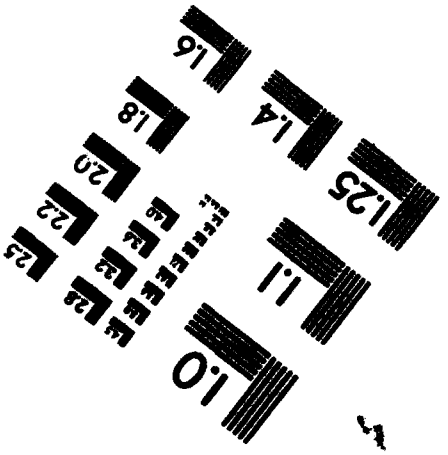


Association for Information and Image Management
1100 Wayne Avenue, Suite 1100
Silver Spring, Maryland 20910
301/587-8202

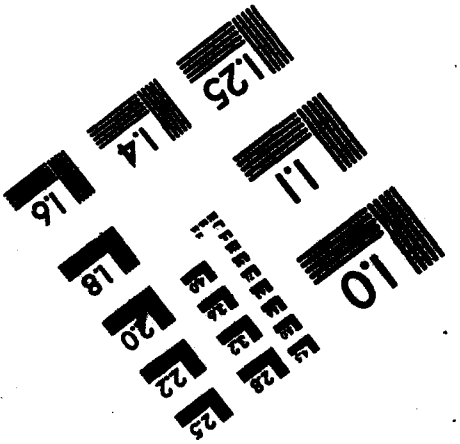








MANUFACTURED TO AIIM STANDARDS
BY APPLIED IMAGE, INC.



AAA-1 Artificial Intell. Tech Office
Dept. Head:William Baker

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
GS11-GS13 Engineer	100	4	4	5	6	7	400	400	500	600	700
Visiting Prof/Studnt	70	1	1	1	1	1	70	70	70	70	70
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		7	7	8	9	10	700	700	800	900	1,000
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
Computer/Files Store	250	1	1	1	1	1	250	250	250	250	250
Computer Room	120	1	1	1	1	1	120	120	120	120	120
Subtotal		3	3	3	3	3	520	520	520	520	520
Subtotal Assignable							1,220	1,220	1,320	1,420	1,520
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	183	183	198	213	228
Total Usable Area							1,403	1,403	1,518	1,633	1,748

AAA-2 Cockpit Avionics Office
Dept. Head:Jerry Covert

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Group Chief	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	10	10	10	10	10	1,000	1,000	1,000	1,000	1,000
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		14	14	14	14	14	1,470	1,470	1,470	1,470	1,470
Subtotal Assignable							1,470	1,470	1,470	1,470	1,470
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	221	221	221	221	221
Total Usable Area							1,691	1,691	1,691	1,691	1,691

AAAF Avionics Logistics Branch
Dept. Head:Ms D.M. Morris

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		2	2	2	2	2	230	230	230	230	230
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
Computer Workroom	240	1	1	1	1	1	240	240	240	240	240
Subtotal		2	2	2	2	2	590	590	590	590	590
Subtotal Assignable							820	820	820	820	820
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	123	123	123	123	123
Total Usable Area							943	943	943	943	943

AAAF-1 Avionics Support Tech Group
Dept. Head:O.S. Keener

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Jan84	Jan85	Jan87	Jan88	Rqd Area(SF) Jan83	Jan84	Jan85	Jan87	Jan88
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	9	10	10	10	10	900	1,000	1,000	1,000	1,000
On-site Contractor	70	8	8	8	8	8	560	560	560	560	560
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		19	20	20	20	20	1,660	1,760	1,760	1,760	1,760
Support Space											
ESIP Lab	2025	1	1	1	1	1	2,025	2,025	2,025	2,025	2,025
Computer Room	162	1	1	1	1	1	162	162	162	162	162
Subtotal		2	2	2	2	2	2,187	2,187	2,187	2,187	2,187
Subtotal Assignable							3,847	3,947	3,947	3,947	3,947
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	577	592	592	592	592
Total Usable Area							4,424	4,539	4,539	4,539	4,539

AAAF-2 Readiness Technology Group
Dept. Head:T. Kearns

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	9	9	9	9	9	900	900	900	900	900
On-site Contractor	70	2	2	2	2	2	140	140	140	140	140
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		13	13	13	13	13	1,240	1,240	1,240	1,240	1,240
Support Space											
ADAMS Lab	121	1	1	1	1	1	121	121	121	121	121
Subtotal		1	1	1	1	1	121	121	121	121	121
Subtotal Assignable							1,361	1,361	1,361	1,361	1,361
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	204	204	204	204	204
Total Usable Area							1,565	1,565	1,565	1,565	1,565

AAAF-3 Software Concepts Group
Dept. Head:R.L. Harris

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	6	7	7	7	7	600	700	700	700	700
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		8	9	9	9	9	800	900	900	900	900
Subtotal Assignable							800	900	900	900	900
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	120	135	135	135	135
Total Usable Area							920	1,035	1,035	1,035	1,035

AAAI Navigation & Info. Trans. Br.
Dept. Head:Ms. D.E. Summers

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Program Manager	150	1	1	1	1	1	150	150	150	150	150
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		3	3	3	3	3	380	380	380	380	380
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
Reception Area	80	1	1	1	1	1	80	80	80	80	80
Subtotal		2	2	2	2	2	430	430	430	430	430
Subtotal Assignable							810	810	810	810	810
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	122	122	122	122	122
Total Usable Area							932	932	932	932	932

AAAI-1 Integrated CNI Systems Group
Dept. Head:A. Johnson

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	3	3	3	3	3	360	360	360	360	360
GS11-GS13 Engineer	100	9	8	8	8	8	900	800	800	800	800
On-site Contractor	70	3	3	3	3	3	210	210	210	210	210
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		17	16	16	16	16	1,670	1,570	1,570	1,570	1,570
Support Space											
Rooftop Lab	1000	1	1	1	1	1	1,000	1,000	1,000	1,000	1,000
SATCOM Lab	600	1	1	1	1	1	600	600	600	600	600
SATCOM Lab	300	1	1	1	1	1	300	300	300	300	300
Vault/Office	350	1	1	1	1	1	350	350	350	350	350
TSSI Contractor Lab	1000	1	1	1	1	1	1,000	1,000	1,000	1,000	1,000
Subtotal		5	5	5	5	5	3,250	3,250	3,250	3,250	3,250
Subtotal Assignable							4,920	4,820	4,820	4,820	4,820
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	738	723	723	723	723
Total Usable Area							5,658	5,543	5,543	5,543	5,543

AAAI-2 Communications Tech Group
Dept. Head:F. Hutson

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	10	10	10	10	10	1,000	1,000	1,000	1,000	1,000
On-site Contractor	70	1	1	1	1	1	70	70	70	70	70
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		15	15	15	15	15	1,510	1,510	1,510	1,510	1,510
Support Space											
Laser Com Lab-Tower	325	1	1	1	1	1	325	325	325	325	325
Laser Com Lab	405	1	1	1	1	1	405	405	405	405	405
Subtotal		2	2	2	2	2	730	730	730	730	730
Subtotal Assignable							2,240	2,240	2,240	2,240	2,240
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	336	336	336	336	336
Total Usable Area							2,576	2,576	2,576	2,576	2,576

AAAI-3 Navigation Systems Group
Dept. Head:F.R. Nadeau

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	10	10	10	10	10	1,000	1,000	1,000	1,000	1,000
Visiting Prof/Studnt	70	1	1	1	1	1	70	70	70	70	70
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		14	14	14	14	14	1,390	1,390	1,390	1,390	1,390
Subtotal Assignable							1,390	1,390	1,390	1,390	1,390
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	209	209	209	209	209
Total Usable Area							1,599	1,599	1,599	1,599	1,599

AAAI-4 Analysis and Evaluation Group
Dept. Head:D.S. Jacobs

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	8	8	8	8	8	800	800	800	800	800
On-site Contractor	70	7	7	7	7	7	490	490	490	490	490
Visiting Prof/Studnt	70	2	2	2	2	2	140	140	140	140	140
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		19	19	19	19	19	1,630	1,630	1,630	1,630	1,630
Support Space											
IESS Lab	1215	1	1	1	1	1	1,215	1,215	1,215	1,215	1,215
CSEL Lab	610	1	1	1	1	1	610	610	610	610	610
ARC Lab	345	1	1	1	1	1	345	345	345	345	345
Equip. Computer Lab	162	1	1	1	1	1	162	162	162	162	162
Subtotal		4	4	4	4	4	2,332	2,332	2,332	2,332	2,332
Subtotal Assignable							3,962	3,962	3,962	3,962	3,962
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	594	594	594	594	594
Total Usable Area							4,556	4,556	4,556	4,556	4,556

AAAS Systems Integration Branch
Dept. Head:Mr. D.A. Zann

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Deputy Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Technical Specialist	150	1	1	1	1	1	150	150	150	150	150
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		4	4	4	4	4	530	530	530	530	530
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
Copy Room	40	1	1	1	1	1	40	40	40	40	40
Subtotal		2	2	2	2	2	390	390	390	390	390
Subtotal Assignable							920	920	920	920	920
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	138	138	138	138	138
Total Usable Area							1,058	1,058	1,058	1,058	1,058

AAAS-1 Advanced Integration Group
Dept. Head:J.C. Ostgaard

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	10	10	10	10	10	1,000	1,000	1,000	1,000	1,000
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		14	14	14	14	14	1,440	1,440	1,440	1,440	1,440
Subtotal Assignable							1,440	1,440	1,440	1,440	1,440
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	216	216	216	216	216
Total Usable Area							1,656	1,656	1,656	1,656	1,656

AAAS-2 Systems Group
Dept. Head:J.L. Blair

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	8	8	8	8	8	800	800	800	800	800
On-site Contractor	70	4	4	4	4	4	280	280	280	280	280
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		14	14	14	14	14	1,280	1,280	1,280	1,280	1,280
Support Space											
ITB Lab	3200	1	1	1	1	1	3,200	3,200	3,200	3,200	3,200
Subtotal		1	1	1	1	1	3,200	3,200	3,200	3,200	3,200
Subtotal Assignable							4,480	4,480	4,480	4,480	4,480
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	672	672	672	672	672
Total Usable Area							5,152	5,152	5,152	5,152	5,152

AAAS-3 Technology Applications Group
Dept. Head:P. Hanselman

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	14	14	14	14	14	1,400	1,400	1,400	1,400	1,400
Visiting Prof/Studnt	70	0	1	1	1	1	0	70	70	70	70
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		18	19	19	19	19	1,840	1,910	1,910	1,910	1,910
Support Space											
Computer Work Room	150	1	1	1	1	1	150	150	150	150	150
Subtotal		1	1	1	1	1	150	150	150	150	150
Subtotal Assignable							1,990	2,060	2,060	2,060	2,060
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	299	309	309	309	309
Total Usable Area							2,289	2,369	2,369	2,369	2,369

AAAT Info. Processing Tech. Branch
Dept. Head:Mr. E.L. Gliatti

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Program Manager	150	1	1	1	1	1	150	150	150	150	150
Secretary	80	2	2	2	2	2	160	160	160	160	160
Subtotal		4	4	4	4	4	460	460	460	460	460
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
Supply Room	80	1	1	1	1	1	80	80	80	80	80
Subtotal		2	2	2	2	2	430	430	430	430	430
Subtotal Assignable							890	890	890	890	890
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	134	134	134	134	134
Total Usable Area							1,024	1,024	1,024	1,024	1,024

AAAT-1 Advanced Systems Research Group
Dept. Head:D.E. Nelson

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	10	11	11	12	12	1,000	1,100	1,100	1,200	1,200
Visiting Prof/Studnt	70	5	5	5	5	5	350	350	350	350	350
Subtotal		18	19	19	20	20	1,710	1,810	1,810	1,910	1,910
Support Space											
T1 Lab	710	1	1	1	1	1	710	710	710	710	710
Subtotal		1	1	1	1	1	710	710	710	710	710
Subtotal Assignable							2,420	2,520	2,520	2,620	2,620
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	363	378	378	393	393
Total Usable Area							2,783	2,898	2,898	3,013	3,013

AAAT-2 Data and Signal Processing Grp
Dept. Head:E.M. Frier

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Jan84	Jan85	Jan87	Jan89	Rqd Area(SF) Jan83	Jan84	Jan85	Jan87	Jan89
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	9	9	9	9	9	900	900	900	900	900
Visiting Prof/Studnt	70	1	1	1	1	1	70	70	70	70	70
Subtotal		12	13	13	13	13	1,230	1,330	1,330	1,330	1,330
Support Space											
T2 Lab	850	1	1	1	1	1	850	850	850	850	850
Subtotal		1	1	1	1	1	850	850	850	850	850
Subtotal Assignable							2,080	2,180	2,180	2,180	2,180
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	312	327	327	327	327
Total Usable Area							2,392	2,507	2,507	2,507	2,507

AAC Financial Management Division
Dept. Head:William Garst

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Division Director	200	1	1	1	1	1	200	200	200	200	200
Branch Chief	150	4	4	4	4	4	600	600	600	600	600
Financial Analyst	70	6	6	6	6	6	420	420	420	420	420
Budget Ass't	50	11	11	11	11	11	550	550	550	550	550
Executive Secretary	120	1	1	1	1	1	120	120	120	120	120
Subtotal		23	23	23	23	23	1,890	1,890	1,890	1,890	1,890
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
File Storage	250	1	1	1	1	1	250	250	250	250	250
Subtotal		2	2	2	2	2	400	400	400	400	400
Subtotal Assignable							2,290	2,290	2,290	2,290	2,290
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	344	344	344	344	344
Total Usable Area							2,634	2,634	2,634	2,634	2,634

AAO Management Operations Division
Dept. Head:Mr. L.E. Porter

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Division Director	200	1	1	1	1	1	200	200	200	200	200
Deputy Director	200	1	1	1	1	1	200	200	200	200	200
Executive Secretary	120	1	1	1	1	1	120	120	120	120	120
Subtotal		3	3	3	3	3	520	520	520	520	520
Support Space											
Reception Area	80	1	1	1	1	1	80	80	80	80	80
Conf/Training Room	750	1	1	1	1	1	750	750	750	750	750
Storage Room	100	1	1	1	1	1	100	100	100	100	100
Subtotal		3	3	3	3	3	930	930	930	930	930
Subtotal Assignable							1,450	1,450	1,450	1,450	1,450
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	218	218	218	218	218
Total Usable Area							1,668	1,668	1,668	1,668	1,668

AAOA Administration Branch
Dept. Head:Ms. A.V. Murphy

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan03	Qty Jan04	Qty Jan05	Qty Jan07	Qty Jan09	Rqd Area(SF) Jan03	Rqd Area(SF) Jan04	Rqd Area(SF) Jan05	Rqd Area(SF) Jan07	Rqd Area(SF) Jan09
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Eng Tech/Analyst	70	3	3	3	3	3	210	210	210	210	210
Subtotal		4	4	4	4	4	360	360	360	360	360
Support Space											
Reception Area	80	2	2	2	2	2	160	160	160	160	160
Subtotal		2	2	2	2	2	160	160	160	160	160
Subtotal Assignable							520	520	520	520	520
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	78	78	78	78	78
Total Usable Area							598	598	598	598	598

AAOP Technical Operations Branch
Dept. Head:Mr. S.A. George

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
GS11-GS13 Engineer	100	5	5	5	5	5	500	500	500	500	500
Visiting Prof/Studnt	70	2	2	2	2	2	140	140	140	140	140
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		9	9	9	9	9	870	870	870	870	870
Support Space											
Graphics Area	120	1	1	1	1	1	120	120	120	120	120
Microfiche Wrkstatn	50	1	1	1	1	1	50	50	50	50	50
Subtotal		2	2	2	2	2	170	170	170	170	170
Subtotal Assignable							1,040	1,040	1,040	1,040	1,040
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	156	156	156	156	156
Total Usable Area							1,196	1,196	1,196	1,196	1,196

AAOR Technology Strategy Branch
Dept. Head:Vacant

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
GS14-GS15 Engineer	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	2	2	2	2	2	200	200	200	200	200
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		6	6	6	6	6	670	670	670	670	670
Subtotal Assignable							670	670	670	670	670
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	101	101	101	101	101
Total Usable Area							771	771	771	771	771

AAR Mission Avionics Division
Dept. Head:Mr. L. McFawn

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Division Director	200	1	1	1	1	1	200	200	200	200	200
Deputy Director	200	2	2	2	2	2	400	400	400	400	400
Program Manager	150	1	1	1	1	1	150	150	150	150	150
XPN Vault Offices	3000	1	1	1	1	1	3,000	3,000	3,000	3,000	3,000
Executive Secretary	120	2	2	2	2	2	240	240	240	240	240
Subtotal		7	7	7	7	7	3,990	3,990	3,990	3,990	3,990
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
Copy Room	40	1	1	1	1	1	40	40	40	40	40
Reception Area	80	1	1	1	1	1	80	80	80	80	80
Subtotal		3	3	3	3	3	470	470	470	470	470
Subtotal Assignable							4,460	4,460	4,460	4,460	4,460
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	669	669	669	669	669
Total Usable Area							5,129	5,129	5,129	5,129	5,129

AARA Target Recognition Tech Branch
Dept. Head:Mr. E.G. Zelnio

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Deputy Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		3	3	3	3	3	380	380	380	380	380
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
Copy Room	40	1	1	1	1	1	40	40	40	40	40
Reception Area	80	1	1	1	1	1	80	80	80	80	80
Subtotal		3	3	3	3	3	270	270	270	270	270
Subtotal Assignable							650	650	650	650	650
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	98	98	98	98	98
Total Usable Area							748	748	748	748	748

AARA-1 Development Group
Dept. Head:J. Rachal

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	8	8	8	8	8	800	800	800	800	800
On-site Contractor	70	8	8	8	8	8	560	560	560	560	560
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		19	19	19	19	19	1,680	1,680	1,680	1,680	1,680
Subtotal Assignable							1,680	1,680	1,680	1,680	1,680
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	252	252	252	252	252
Total Usable Area							1,932	1,932	1,932	1,932	1,932

AARA-2 Technology Group
Dept. Head:M. Bryant

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	15	15	15	15	15	1,500	1,500	1,500	1,500	1,500
On-site Contractor	70	12	12	12	12	12	840	840	840	840	840
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		29	29	29	29	29	2,540	2,540	2,540	2,540	2,540
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
Model Based Vis. Lab	1000	1	1	1	1	1	1,000	1,000	1,000	1,000	1,000
SEQUEL Lab	1150	1	1	1	1	1	1,150	1,150	1,150	1,150	1,150
Data Storage	50	1	1	1	1	1	50	50	50	50	50
Subtotal		4	4	4	4	4	2,350	2,350	2,350	2,350	2,350
Subtotal Assignable							4,890	4,890	4,890	4,890	4,890
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	734	734	734	734	734
Total Usable Area							5,624	5,624	5,624	5,624	5,624

AARF Sensor Evaluation Branch
Dept. Head:Mr. J.C Haley

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Deputy Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Eng Tech/Analyst	70	1	1	1	1	1	70	70	70	70	70
On-site Contractor	70	24	24	24	24	24	1,680	1,680	1,680	1,680	1,680
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		28	28	28	28	28	2,130	2,130	2,130	2,130	2,130
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
AARF 18F Labs	14800	1	1	1	1	1	14,800	14,800	14,800	14,800	14,800
Dyn Anal Lab Bldg23	20100	1	1	1	1	1	20,100	20,100	20,100	20,100	20,100
SDSA Lab - Bldg 23	4600	1	1	1	1	1	4,600	4,600	4,600	4,600	4,600
Computer Room-Bldg18	640	1	1	1	1	1	640	640	640	640	640
Subtotal		5	5	5	5	5	40,490	40,490	40,490	40,490	40,490
Subtotal Assignable							42,620	42,620	42,620	42,620	42,620
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	6,393	6,393	6,393	6,393	6,393
Total Usable Area							49,013	49,013	49,013	49,013	49,013

AARF-1 Sensor/System Group
Dept. Head:P. Desimio

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	11	11	11	11	11	1,100	1,100	1,100	1,100	1,100
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		15	15	15	15	15	1,540	1,540	1,540	1,540	1,540
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
Subtotal		1	1	1	1	1	150	150	150	150	150
Subtotal Assignable							1,690	1,690	1,690	1,690	1,690
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	254	254	254	254	254
Total Usable Area							1,944	1,944	1,944	1,944	1,944

AARF-2 Instrumentation Group
Dept. Head:R. Demers

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	3	3	3	3	3	300	300	300	300	300
Eng Tech/Analyst	70	8	8	8	8	8	560	560	560	560	560
Subtotal		12	12	12	12	12	980	980	980	980	980
Subtotal Assignable							980	980	980	980	980
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	147	147	147	147	147
Total Usable Area							1,127	1,127	1,127	1,127	1,127

AARF-3 Computation Group
Dept. Head:D. Heger

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	10	10	10	10	10	1,000	1,000	1,000	1,000	1,000
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		12	12	12	12	12	1,200	1,200	1,200	1,200	1,200
Subtotal Assignable							1,200	1,200	1,200	1,200	1,200
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	180	180	180	180	180
Total Usable Area							1,380	1,380	1,380	1,380	1,380

AARI Electro-Optics Branch
Dept. Head:Mr. G.D. Urban

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Deputy Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Program Manager	150	2	2	2	2	2	300	300	300	300	300
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		5	5	5	5	5	680	680	680	680	680
Support Space											
Conf. Room (20-25)	500	2	2	2	1	1	1,000	1,000	1,000	500	500
Copy Room	40	1	1	1	1	1	40	40	40	40	40
Reception Area	80	1	1	1	1	1	80	80	80	80	80
Subtotal		4	4	4	3	3	1,120	1,120	1,120	620	620
Subtotal Assignable							1,800	1,800	1,800	1,300	1,300
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	270	270	270	195	195
Total Usable Area							2,070	2,070	2,070	1,495	1,495

AARI-1 EO Systems Group
Dept. Head:G Shroyer

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Program Manager	150	2	2	2	2	2	300	300	300	300	300
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	6	6	6	6	6	600	600	600	600	600
On-site Contractor	70	1	1	1	1	1	70	70	70	70	70
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		12	12	12	12	12	1,290	1,290	1,290	1,290	1,290
Subtotal Assignable							1,290	1,290	1,290	1,290	1,290
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	194	194	194	194	194
Total Usable Area							1,484	1,484	1,484	1,484	1,484

AAR-2 EO Techniques Group
Dept. Head:D Tomlinson

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	13	13	13	13	13	1,300	1,300	1,300	1,300	1,300
On-site Contractor	70	5	5	5	5	5	350	350	350	350	350
Visiting Prof/Studnt	70	10	10	10	10	10	700	700	700	700	700
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		31	31	31	31	31	2,670	2,670	2,670	2,670	2,670
Support Space											
Conf. Room (4-8)	150	3	3	3	3	3	450	450	450	450	450
Bldg 622 Lab	8100	1	1	1	1	1	8,100	8,100	8,100	8,100	8,100
Subtotal		4	4	4	4	4	8,550	8,550	8,550	8,550	8,550
Subtotal Assignable							11,220	11,220	11,220	11,220	11,220
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	1,683	1,683	1,683	1,683	1,683
Total Usable Area							12,903	12,903	12,903	12,903	12,903

AAR-3 EO Evaluation/Analysis Group
Dept. Head:J. Stewart

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Jan84	Jan85	Jan87	Jan89	Rqd Area(SF) Jan83	Jan84	Jan85	Jan87	Jan89
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	8	8	8	8	8	800	800	800	800	800
On-site Contractor	70	3	3	3	3	3	210	210	210	210	210
Visiting Prof/Studnt	70	2	2	2	2	2	140	140	140	140	140
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		16	16	16	16	16	1,470	1,470	1,470	1,470	1,470
Support Space											
Bldg 622 Lab	1990	1	1	1	1	1	1,990	1,990	1,990	1,990	1,990
Subtotal		1	1	1	1	1	1,990	1,990	1,990	1,990	1,990
Subtotal Assignable							3,460	3,460	3,460	3,460	3,460
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	519	519	519	519	519
Total Usable Area							3,979	3,979	3,979	3,979	3,979

AARI-4 Integrated EO Sensor Group
Dept. Head:H. Lapp

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	5	5	5	5	5	500	500	500	500	500
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		8	8	8	8	8	820	820	820	820	820
Subtotal Assignable							820	820	820	820	820
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	123	123	123	123	123
Total Usable Area							943	943	943	943	943

AARM Radar Branch
Dept. Head:Mr. G.L. McFarland

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Deputy Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Program Manager	150	1	1	1	1	1	150	150	150	150	150
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		4	4	4	4	4	530	530	530	530	530
Support Space											
Reception Area	80	1	1	1	1	1	80	80	80	80	80
File Room	100	1	1	1	1	1	100	100	100	100	100
Subtotal		2	2	2	2	2	180	180	180	180	180
Subtotal Assignable							710	710	710	710	710
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	107	107	107	107	107
Total Usable Area							817	817	817	817	817

AARM-1 Technology Development Group
Dept. Head:D. Campbell

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	4	4	4	4	4	480	480	480	480	480
GS11-GS13 Engineer	100	11	11	11	11	11	1,100	1,100	1,100	1,100	1,100
On-site Contractor	70	1	3	3	3	3	70	210	210	210	210
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		18	20	20	20	20	1,850	1,990	1,990	1,990	1,990
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
Computer Work Room	210	1	1	1	1	1	210	210	210	210	210
Subtotal		2	2	2	2	2	360	360	360	360	360
Subtotal Assignable							2,210	2,350	2,350	2,350	2,350
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	332	353	353	353	353
Total Usable Area							2,542	2,703	2,703	2,703	2,703

AARM-2 Technology Applications Group
Dept. Head:J. Prevish

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	8	8	8	8	8	800	800	800	800	800
On-site Contractor	70	1	3	3	3	3	70	210	210	210	210
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		11	13	13	13	13	1,070	1,210	1,210	1,210	1,210
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
Radar Lab	300	1	1	1	1	1	300	300	300	300	300
Subtotal		2	2	2	2	2	450	450	450	450	450
Subtotal Assignable							1,520	1,660	1,660	1,660	1,660
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	228	249	249	249	249
Total Usable Area							1,748	1,909	1,909	1,909	1,909

AARM-3 Analysis & Signal Proc Group
Dept. Head:J. Bell

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	10	10	10	10	10	1,000	1,000	1,000	1,000	1,000
On-site Contractor	70	3	6	6	6	6	210	420	420	420	420
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		15	18	18	18	18	1,410	1,620	1,620	1,620	1,620
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
Radar Sig Proc Lab	2300	1	1	1	1	1	2,300	2,300	2,300	2,300	2,300
Subtotal		2	2	2	2	2	2,450	2,450	2,450	2,450	2,450
Subtotal Assignable							3,860	4,070	4,070	4,070	4,070
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	579	611	611	611	611
Total Usable Area							4,439	4,681	4,681	4,681	4,681

AART Applications Branch
Dept. Head:Mr. F.P. Johnson

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Deputy Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		3	3	3	3	3	380	380	380	380	380
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
Copy Room	40	1	1	1	1	1	40	40	40	40	40
Reception Area	80	1	1	1	1	1	80	80	80	80	80
Computer Work Room	100	1	1	1	1	1	100	100	100	100	100
Subtotal		4	4	4	4	4	570	570	570	570	570
Subtotal Assignable							950	950	950	950	950
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	143	143	143	143	143
Total Usable Area							1,093	1,093	1,093	1,093	1,093

AART-1 Air Superiority Group
Dept. Head:W. Moore

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	10	10	10	10	10	1,000	1,000	1,000	1,000	1,000
Secretary	80	2	2	2	2	2	160	160	160	160	160
Subtotal		14	14	14	14	14	1,400	1,400	1,400	1,400	1,400
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
Vault Room	350	1	1	1	1	1	350	350	350	350	350
Subtotal		2	2	2	2	2	500	500	500	500	500
Subtotal Assignable							1,900	1,900	1,900	1,900	1,900
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	285	285	285	285	285
Total Usable Area							2,185	2,185	2,185	2,185	2,185

AART-2 Systems Concept Group
Dept. Head:J. Jacobs

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	8	8	8	8	8	800	800	800	800	800
On-site Contractor	70	2	4	4	4	4	140	280	280	280	280
Visiting Prof/Studnt	70	4	4	4	4	4	280	280	280	280	280
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		18	20	20	20	20	1,660	1,800	1,800	1,800	1,800
Support Space											
FCSM Lab	900	1	1	1	1	1	900	900	900	900	900
Computer Tempest Lab	570	1	1	1	1	1	570	570	570	570	570
Subtotal		2	2	2	2	2	1,470	1,470	1,470	1,470	1,470
Subtotal Assignable							3,130	3,270	3,270	3,270	3,270
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	470	491	491	491	491
Total Usable Area							3,600	3,761	3,761	3,761	3,761

AART-3 Surface Strike Group
Dept. Head:E. Hamilton

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	10	10	10	10	10	1,000	1,000	1,000	1,000	1,000
Visiting Prof/Student	70	2	2	2	2	2	140	140	140	140	140
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		14	14	14	14	14	1,340	1,340	1,340	1,340	1,340
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
Safe Storage Room	100	1	1	1	1	1	100	100	100	100	100
Subtotal		2	2	2	2	2	250	250	250	250	250
Subtotal Assignable							1,590	1,590	1,590	1,590	1,590
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	239	239	239	239	239
Total Usable Area							1,829	1,829	1,829	1,829	1,829

AAT Avionics Tech Service Division
Dept. Head:Mr. R.E. Kellog

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Jan84	Jan85	Jan87	Jan89	Rqd Area(SF) Jan83	Jan84	Jan85	Jan87	Jan89
Personnel Space											
Division Director	200	1	1	1	1	1	200	200	200	200	200
Executive Secretary	120	1	1	1	1	1	120	120	120	120	120
Subtotal		2	2	2	2	2	320	320	320	320	320
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
Reception Area	80	1	1	1	1	1	80	80	80	80	80
Subtotal		2	2	2	2	2	430	430	430	430	430
Subtotal Assignable							750	750	750	750	750
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	113	113	113	113	113
Total Usable Area							863	863	863	863	863

AATF Avionics Facilities Branch
Dept. Head:Mr. V.J. Allenson

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
GS11-GS13 Engineer	100	1	1	1	1	1	100	100	100	100	100
Eng Tech/Analyst	70	2	2	2	2	2	140	140	140	140	140
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		5	5	5	5	5	470	470	470	470	470
Support Space											
Drafting/Repro Room	300	1	1	1	1	1	300	300	300	300	300
Auditorium	3200	1	1	1	1	1	3,200	3,200	3,200	3,200	3,200
620 Control Room	550	1	1	1	1	1	550	550	550	550	550
DSI Control Support	680	1	1	1	1	1	680	680	680	680	680
Cafeteria	1010	1	1	1	1	1	1,010	1,010	1,010	1,010	1,010
Storage Bsmt	760	1	1	1	1	1	760	760	760	760	760
Receiving	760	1	1	1	1	1	760	760	760	760	760
Subtotal		7	7	7	7	7	7,260	7,260	7,260	7,260	7,260
Subtotal Assignable							7,730	7,730	7,730	7,730	7,730
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	1,160	1,160	1,160	1,160	1,160
Total Usable Area							8,890	8,890	8,890	8,890	8,890

AATF-1 Facilities Maintenance Group
Dept. Head:B. Swangim

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
Building Managers	100	2	2	2	2	2	200	200	200	200	200
Subtotal		3	3	3	3	3	320	320	320	320	320
Support Space											
Maint. Storage	404	1	1	1	1	1	404	404	404	404	404
Maint Shop/Storage	2225	1	1	1	1	1	2,225	2,225	2,225	2,225	2,225
Contractor Brk Room	410	1	1	1	1	1	410	410	410	410	410
Subtotal		3	3	3	3	3	3,039	3,039	3,039	3,039	3,039
Subtotal Assignable							3,359	3,359	3,359	3,359	3,359
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	504	504	504	504	504
Total Usable Area							3,863	3,863	3,863	3,863	3,863

AATF-2 Avionics Equipment Group
Dept. Head:C. Bowen

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Req Area(SF) Jan83	Req Area(SF) Jan84	Req Area(SF) Jan85	Req Area(SF) Jan87	Req Area(SF) Jan89
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
Eng Tech/Analyst	70	3	3	3	3	3	210	210	210	210	210
Subtotal		4	4	4	4	4	330	330	330	330	330
Support Space											
PMI Lab	2200	1	1	1	1	1	2,200	2,200	2,200	2,200	2,200
Subtotal		1	1	1	1	1	2,200	2,200	2,200	2,200	2,200
Subtotal Assignable							2,530	2,530	2,530	2,530	2,530
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	380	380	380	380	380
Total Usable Area							2,910	2,910	2,910	2,910	2,910

AAW Electronics Warfare Division
Dept. Head:Vacant

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Division Director	200	1	1	1	1	1	200	200	200	200	200
Technical Director	200	1	1	1	1	1	200	200	200	200	200
Visiting Prof/Studnt	70	1	1	1	1	1	70	70	70	70	70
Executive Secretary	120	1	1	1	1	1	120	120	120	120	120
Subtotal		4	4	4	4	4	590	590	590	590	590
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
EW Lab Tower	325	1	1	1	1	1	325	325	325	325	325
Reception Area	80	1	1	1	1	1	80	80	80	80	80
Vault Conf Room	824	1	1	1	1	1	824	824	824	824	824
Subtotal		4	4	4	4	4	1,579	1,579	1,579	1,579	1,579
Subtotal Assignable							2,169	2,169	2,169	2,169	2,169
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	325	325	325	325	325
Total Usable Area							2,494	2,494	2,494	2,494	2,494

AAWA EW Requests & Effects Eval. Br
Dept. Head:Mr. W.E. Lane

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Technical Specialist	150	1	1	1	1	1	150	150	150	150	150
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		3	3	3	3	3	380	380	380	380	380
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
TIC Library	730	1	1	1	1	1	730	730	730	730	730
Subtotal		2	2	2	2	2	1,080	1,080	1,080	1,080	1,080
Subtotal Assignable							1,460	1,460	1,460	1,460	1,460
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	219	219	219	219	219
Total Usable Area							1,679	1,679	1,679	1,679	1,679

AAWA-1 EW Requirements Group
Dept. Head:W.K. McQuay

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	9	9	9	9	9	900	900	900	900	900
On-site Contractor	70	15	15	15	15	15	1,050	1,050	1,050	1,050	1,050
Eng Tech/Analyst	70	1	1	1	1	1	70	70	70	70	70
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		28	28	28	28	28	2,340	2,340	2,340	2,340	2,340
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
ECSRL Lab	5900	1	1	1	1	1	5,900	5,900	5,900	5,900	5,900
1.6 Vault	400	1	1	1	1	1	400	400	400	400	400
0.5 Vault	900	1	1	1	1	1	900	900	900	900	900
RW Lab Bldg22	1000	1	1	1	1	1	1,000	1,000	1,000	1,000	1,000
1.7 Vault	400	1	1	1	1	1	400	400	400	400	400
1.5 Vault	825	1	1	1	1	1	825	825	825	825	825
Files Storage	324	1	1	1	1	1	324	324	324	324	324
Subtotal		8	8	8	8	8	10,099	10,099	10,099	10,099	10,099
Subtotal Assignable							12,439	12,439	12,439	12,439	12,439
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	1,866	1,866	1,866	1,866	1,866
Total Usable Area							14,305	14,305	14,305	14,305	14,305

AAWA-2 Effectiveness Evaluation Group
Dept. Head:D. McDermott

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Jan84	Jan85	Jan87	Jan89	Rqd Area(SF) Jan83	Jan84	Jan85	Jan87	Jan89
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	12	12	12	12	12	1,200	1,200	1,200	1,200	1,200
Eng Tech/Analyst	70	2	2	2	2	2	140	140	140	140	140
On-site Contractor	70	20	20	20	20	20	1,400	1,400	1,400	1,400	1,400
Visiting Prof/Studnt	70	2	2	2	2	2	140	140	140	140	140
Subtotal		37	37	37	37	37	3,000	3,000	3,000	3,000	3,000
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
IDAL Sim. Labs	7800	1	1	1	1	1	7,800	7,800	7,800	7,800	7,800
Config Mgt Files	500	1	1	1	1	1	500	500	500	500	500
Classified Storage	750	1	1	1	1	1	750	750	750	750	750
Subtotal		4	4	4	4	4	9,400	9,400	9,400	9,400	9,400
Subtotal Assignable							12,400	12,400	12,400	12,400	12,400
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	1,860	1,860	1,860	1,860	1,860
Total Usable Area							14,260	14,260	14,260	14,260	14,260

AAWD ECM Advanced Development Branch
Dept. Head:Mr. P.J. Westcott

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Program Manager	150	1	1	1	1	1	150	150	150	150	150
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		3	3	3	3	3	380	380	380	380	380
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
Copy Room	40	1	1	1	1	1	40	40	40	40	40
Supplies Storage	324	1	1	1	1	1	324	324	324	324	324
Computer Workroom	200	1	1	1	1	1	200	200	200	200	200
Subtotal		4	4	4	4	4	714	714	714	714	714
Subtotal Assignable							1,094	1,094	1,094	1,094	1,094
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	164	164	164	164	164
Total Usable Area							1,258	1,258	1,258	1,258	1,258

AAWD-1 EW Advanced Dev Program Group
Dept. Head:D.A. Hime

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	6	6	6	6	6	600	600	600	600	600
Eng Tech/Analyst	70	1	1	1	1	1	70	70	70	70	70
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		10	10	10	10	10	990	990	990	990	990
Subtotal Assignable							990	990	990	990	990
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	149	149	149	149	149
Total Usable Area							1,139	1,139	1,139	1,139	1,139

AAWD-2 EO Warfare Adv Dev Prog Group
Dept. Head:B.L. Noren

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	6	6	6	6	6	600	600	600	600	600
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		10	10	10	10	10	1,040	1,040	1,040	1,040	1,040
Subtotal Assignable							1,040	1,040	1,040	1,040	1,040
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	156	156	156	156	156
Total Usable Area							1,196	1,196	1,196	1,196	1,196

AAWD-2 Integrated EW Systems Group
Dept. Head:L.D. Snyder

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	7	7	7	7	7	700	700	700	700	700
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		9	9	9	9	9	900	900	900	900	900
Subtotal Assignable							900	900	900	900	900
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	135	135	135	135	135
Total Usable Area							1,035	1,035	1,035	1,035	1,035

AAWP Passive Elec Countermeasure Br
Dept. Head:Mr. P.E. Hadorn

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		2	2	2	2	2	230	230	230	230	230
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
Laser/Radar Lab	840	1	1	1	1	1	840	840	840	840	840
Hanger Labs	5700	1	1	1	1	1	5,700	5,700	5,700	5,700	5,700
Reception Area	80	1	1	1	1	1	80	80	80	80	80
Subtotal		4	4	4	4	4	6,970	6,970	6,970	6,970	6,970
Subtotal Assignable							7,200	7,200	7,200	7,200	7,200
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	1,080	1,080	1,080	1,080	1,080
Total Usable Area							8,280	8,280	8,280	8,280	8,280

AAWP-1 EBM Technology Group
Dept. Head:R.L. Shaw

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	6	6	6	6	6	600	600	600	600	600
On-site Contractor	70	4	4	4	4	4	280	280	280	280	280
Visiting Prof/Studnt	70	2	2	2	2	2	140	140	140	140	140
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		16	16	16	16	16	1,460	1,460	1,460	1,460	1,460
Support Space											
Receiver/Proc Lab	2410	1	1	1	1	1	2,410	2,410	2,410	2,410	2,410
Subtotal		1	1	1	1	1	2,410	2,410	2,410	2,410	2,410
Subtotal Assignable							3,870	3,870	3,870	3,870	3,870
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	581	581	581	581	581
Total Usable Area							4,451	4,451	4,451	4,451	4,451

AAWP-2 Exploitation Group
Dept. Head:D.C. Murray

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	10	10	10	10	10	1,000	1,000	1,000	1,000	1,000
Eng Tech/Analyst	70	1	1	1	1	1	70	70	70	70	70
On-site Contractor	70	23	23	23	23	23	1,610	1,610	1,610	1,610	1,610
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		37	37	37	37	37	3,000	3,000	3,000	3,000	3,000
Support Space											
Conf. Room (20-25)	500	1	1	1	1	1	500	500	500	500	500
Anechoic Chambers	20200	1	1	1	1	1	20,200	20,200	20,200	20,200	20,200
Vault	288	1	1	1	1	1	288	288	288	288	288
Integrated Circ Lab	610	1	1	1	1	1	610	610	610	610	610
Vault	1234	1	1	1	1	1	1,234	1,234	1,234	1,234	1,234
Machine Shop	864	1	1	1	1	1	864	864	864	864	864
Contractor Eq Maint	2911	1	1	1	1	1	2,911	2,911	2,911	2,911	2,911
Open Storage	3000	1	1	1	1	1	3,000	3,000	3,000	3,000	3,000
Contractor Work Area	1813	1	1	1	1	1	1,813	1,813	1,813	1,813	1,813
Subtotal		9	9	9	9	9	31,420	31,420	31,420	31,420	31,420
Subtotal Assignable							34,420	34,420	34,420	34,420	34,420
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	5,163	5,163	5,163	5,163	5,163
Total Usable Area							39,583	39,583	39,583	39,583	39,583

AAWP-3 Electro-Optics Group
Dept. Head:G. Grider

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	5	5	5	5	5	500	500	500	500	500
Eng Tech/Analyst	70	2	2	2	2	2	140	140	140	140	140
On-site Contractor	70	6	6	6	6	6	420	420	420	420	420
Visiting Prof/Studnt	70	3	3	3	3	3	210	210	210	210	210
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		18	18	18	18	18	1,470	1,470	1,470	1,470	1,470
Support Space											
IR Lab	1511	1	1	1	1	1	1,511	1,511	1,511	1,511	1,511
Electro-Optics Lab	10392	1	1	1	1	1	10,392	10,392	10,392	10,392	10,392
Subtotal		2	2	2	2	2	11,903	11,903	11,903	11,903	11,903
Subtotal Assignable							13,373	13,373	13,373	13,373	13,373
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	2,006	2,006	2,006	2,006	2,006
Total Usable Area							15,379	15,379	15,379	15,379	15,379

AAWW Active Elec Countermeasure Br
Dept. Head:Mr. K.W. Helberg

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Jan84	Jan85	Jan87	Jan89	Rqd Area(SF) Jan83	Jan84	Jan85	Jan87	Jan89
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Visiting Prof/Studnt	70	2	2	2	2	2	140	140	140	140	140
Secretary	80	2	2	2	2	2	160	160	160	160	160
Subtotal		5	5	5	5	5	450	450	450	450	450
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
Reception Area	80	1	1	1	1	1	80	80	80	80	80
Computer Workroom	324	1	1	1	1	1	324	324	324	324	324
Subtotal		3	3	3	3	3	754	754	754	754	754
Subtotal Assignable							1,204	1,204	1,204	1,204	1,204
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	181	181	181	181	181
Total Usable Area							1,385	1,385	1,385	1,385	1,385

AAMW-1 CM Technology Group
Dept. Head:J.V. Kastle

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS11-GS13 Engineer	100	8	8	8	8	8	800	800	800	800	800
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		10	10	10	10	10	1,000	1,000	1,000	1,000	1,000
Support Space											
RFCM Lab	300	1	1	1	1	1	300	300	300	300	300
Mini Chamber Lab	565	0	1	1	1	1	0	565	565	565	565
Data Collection Lab	240	0	1	1	1	1	0	240	240	240	240
DRFM Lab	1337	1	1	1	1	1	1,337	1,337	1,337	1,337	1,337
Subtotal		2	4	4	4	4	1,637	2,442	2,442	2,442	2,442
Subtotal Assignable							2,637	3,442	3,442	3,442	3,442
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	396	516	516	516	516
Total Usable Area							3,033	3,958	3,958	3,958	3,958

AAWW-2 Countermeasures Concepts Group
Dept. Head:A.W. White

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	8	8	8	8	8	800	800	800	800	800
On-site Contractor	70	6	6	6	6	6	420	420	420	420	420
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		18	18	18	18	18	1,660	1,660	1,660	1,660	1,660
Support Space											
3.5 Vault	390	1	1	1	1	1	390	390	390	390	390
C3CM Lab	1600	0	1	1	1	1	0	1,600	1,600	1,600	1,600
Anechoic Chamber/Lab	5400	1	1	1	1	1	5,400	5,400	5,400	5,400	5,400
Storage Room	200	1	1	1	1	1	200	200	200	200	200
Subtotal		3	4	4	4	4	5,990	7,590	7,590	7,590	7,590
Subtotal Assignable							7,650	9,250	9,250	9,250	9,250
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	1,148	1,388	1,388	1,388	1,388
Total Usable Area							8,798	10,638	10,638	10,638	10,638

AAWW-3 E-O Warfare Group
Dept. Head:L.J. Baumgardner

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Group Chief	120	1	1	1	1	1	120	120	120	120	120
GS14-GS15 Engineer	120	2	2	2	2	2	240	240	240	240	240
GS11-GS13 Engineer	100	6	6	6	6	6	600	600	600	600	600
On-site Contractor	70	8	8	8	8	8	560	560	560	560	560
Subtotal		17	17	17	17	17	1,520	1,520	1,520	1,520	1,520
Support Space											
DIME Lab	3370	1	1	1	1	1	3,370	3,370	3,370	3,370	3,370
IR Lab	1550	0	1	1	1	1	0	1,550	1,550	1,550	1,550
Subtotal		1	2	2	2	2	3,370	4,920	4,920	4,920	4,920
Subtotal Assignable							4,890	6,440	6,440	6,440	6,440
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	734	966	966	966	966
Total Usable Area							5,624	7,406	7,406	7,406	7,406

DOIA AV/SS Elec Computer Support Br
Dept. Head:Capt Holcomb

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
GS11-GS13 Engineer	100	4	4	4	4	4	400	400	400	400	400
On-site Contractor	70	8	8	8	8	8	560	560	560	560	560
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		14	14	14	14	14	1,190	1,190	1,190	1,190	1,190
Support Space											
Conf. Room (10-15)	350	1	1	1	1	1	350	350	350	350	350
Tape Storage	100	1	1	1	1	1	100	100	100	100	100
Training Room	500	1	1	1	1	1	500	500	500	500	500
Work Shop	120	1	1	1	1	1	120	120	120	120	120
Subtotal		4	4	4	4	4	1,070	1,070	1,070	1,070	1,070
Subtotal Assignable							2,260	2,260	2,260	2,260	2,260
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	339	339	339	339	339
Total Usable Area							2,599	2,599	2,599	2,599	2,599

DOLA Supportability Office
Dept. Head:Michael Greenwood

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
GS11-GS13 Engineer	100	3	3	3	3	3	300	300	300	300	300
Secretary	80	1	1	1	1	1	80	80	80	80	80
Subtotal		5	5	5	5	5	530	530	530	530	530
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
Subtotal		1	1	1	1	1	150	150	150	150	150
Subtotal Assignable							680	680	680	680	680
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	102	102	102	102	102
Total Usable Area							782	782	782	782	782

DOM Supply Specialist Unit
Dept. Head:Charles McBeth

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
Eng Tech/Analyst	70	4	4	4	4	4	280	280	280	280	280
Subtotal		5	5	5	5	5	430	430	430	430	430
Support Space											
Storage/Loading	350	1	1	1	1	1	350	350	350	350	350
Subtotal		1	1	1	1	1	350	350	350	350	350
Subtotal Assignable							780	780	780	780	780
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	117	117	117	117	117
Total Usable Area							897	897	897	897	897

DOSA Safety Office
Dept. Head:Carleton Johnson

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
GS11-GS13 Engineer	100	1	1	1	1	1	100	100	100	100	100
Subtotal		2	2	2	2	2	250	250	250	250	250
Subtotal Assignable							250	250	250	250	250
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	38	38	38	38	38
Total Usable Area							288	288	288	288	288

DOWA **Meteorology Office**
Dept. Head:Ronald Rodney

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1	1	1	1	1	150	150	150	150	150
GS11-GS13 Engineer	100	2	2	2	2	2	200	200	200	200	200
Subtotal		3	3	3	3	3	350	350	350	350	350
Support Space											
Conf. Room (4-8)	150	1	1	1	1	1	150	150	150	150	150
Tech Library	100	1	1	1	1	1	100	100	100	100	100
Subtotal		2	2	2	2	2	250	250	250	250	250
Subtotal Assignable							600	600	600	600	600
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	90	90	90	90	90
Total Usable Area							690	690	690	690	690

DOYA Security Office
Dept. Head:Dale Baker

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
GS11-GS13 Engineer	100	1	1	1	1	1	100	100	100	100	100
Subtotal		1	1	1	1	1	100	100	100	100	100
Subtotal Assignable							100	100	100	100	100
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	15	15	15	15	15
Total Usable Area							115	115	115	115	115

EL Sol. State Electr. Directorate
Dept. Head:W.J. Edwards

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Directorate Director	300	1	1	1	1	1	300	300	300	300	300
Deputy Director	200	1	1	1	1	1	200	200	200	200	200
Executive Secretary	120	2	2	2	2	2	240	240	240	240	240
Subtotal		4	4	4	4	4	740	740	740	740	740
Support Space											
Coffee/Snack	40	1	1	1	1	1	40	40	40	40	40
Conf. Room (20-25)	500	1	1	1	1	1	500	500	500	500	500
Copy Room	40	1	1	1	1	1	40	40	40	40	40
EL Division Labs	16800	1	1	1	1	1	16,800	16,800	16,800	16,800	16,800
EL Div Cleanrooms	7335	1	1	1	1	1	7,335	7,335	7,335	7,335	7,335
Reception Area	80	2	2	2	2	2	160	160	160	160	160
Storage	1300	1	1	1	1	1	1,300	1,300	1,300	1,300	1,300
Subtotal		8	8	8	8	8	26,175	26,175	26,175	26,175	26,175
Subtotal Assignable							26,915	26,915	26,915	26,915	26,915
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	4,037	4,037	4,037	4,037	4,037
Total Usable Area							30,952	30,952	30,952	30,952	30,952

EL-CA Chief Scientist - EL
Dept. Head:

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Chief Scientist	300	1	1	1	1	1	300	300	300	300	300
Executive Secretary	120	1	1	1	1	1	120	120	120	120	120
Subtotal		2	2	2	2	2	420	420	420	420	420
Support Space											
Reception Area	80	1	1	1	1	1	80	80	80	80	80
Subtotal		1	1	1	1	1	80	80	80	80	80
Subtotal Assignable							500	500	500	500	500
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	75	75	75	75	75
Total Usable Area							575	575	575	575	575

ELA Operations Division
Dept. Head:Mr. D.S. Rees

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Jan84	Jan85	Jan87	Jan89	Rqd Area(SF) Jan83	Jan84	Jan85	Jan87	Jan89
Personnel Space											
Division Director	200	1					200				
GS14-GS15 Engineer	120	6					720				
GS11-GS13 Engineer	100	1					100				
Eng Tech/Analyst	70	2					140				
On-site Contractor	70	4					280				
Executive Secretary	120	1					120				
Subtotal		15					1,560				
Support Space											
Copy Room	40	1					40				
Reception Area	80	1					80				
Subtotal		2					120				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								1,764	1,852	1,945	2,042
Subtotal Assignable							1,680	1,764	1,852	1,945	2,042
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	252	265	278	292	306
Total Usable Area							1,932	2,029	2,130	2,237	2,348

ELE Microelectronics Division
Dept. Head:Mr. S.E. Wagner

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Jan84	Jan85	Jan87	Jan89	Rqd Area(SF) Jan83	Jan84	Jan85	Jan87	Jan89
Personnel Space											
Division Director	200	1					200				
GS11-GS13 Engineer	100	1					100				
On-site Contractor	70	1					70				
Executive Secretary	120	1					120				
Secretary	80	1					80				
Subtotal		5					570				
Support Space											
Conf. Room (10-15)	350	1					350				
Reception Area	80	1					80				
Subtotal		2					430				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								1,050	1,103	1,158	1,216
Subtotal Assignable							1,000	1,050	1,103	1,158	1,216
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	150	158	165	174	182
Total Usable Area							1,150	1,208	1,268	1,332	1,398

ELED Design Branch
Dept. Head:Dr. J.W. Hines

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Jan84	Jan85	Jan87	Jan89	Rqd Area(SF) Jan83	Jan84	Jan85	Jan87	Jan89
Personnel Space											
Branch Chief	150	1					150				
GS11-GS13 Engineer	100	9					900				
Secretary	80	1					80				
Subtotal		11					1,130				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								1,187	1,246	1,308	1,373
Subtotal Assignable							1,130	1,187	1,246	1,308	1,373
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	170	178	187	196	206
Total Usable Area							1,300	1,365	1,433	1,504	1,579

ELEL VLS Integration Branch
Dept. Head:Mr. A.G. Tewksbury

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1					150				
GS14-GS15 Engineer	120	2					240				
GS11-GS13 Engineer	100	7					700				
Secretary	80	1					80				
Subtotal		11					1,170				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								1,229	1,290	1,355	1,423
Subtotal Assignable							1,170	1,229	1,290	1,355	1,423
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	176	184	194	203	213
Total Usable Area							1,346	1,413	1,484	1,558	1,636

ELET Device Technology Branch
Dept. Head:Vacant

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Branch Chief	150	1					150				
GS14-GS15 Engineer	120	1					120				
GS11-GS13 Engineer	100	4					400				
Secretary	80	1					80				
Subtotal		7					750				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								788	827	868	911
Subtotal Assignable							750	788	827	868	911
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	113	118	124	130	137
Total Usable Area							863	906	951	998	1,048

ELM Microwave Division
Dept. Head:Mr. R.T. Kemerley

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Division Director	200	1					200				
On-site Contractor	70	3					210				
Executive Secretary	120	1					120				
Subtotal		5					530				
Support Space											
Conf. Room (10-15)	350	1					350				
Reception Area	80	1					80				
Subtotal		2					430				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								1,008	1,058	1,111	1,167
Subtotal Assignable							960	1,008	1,058	1,111	1,167
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	144	151	159	167	175
Total Usable Area							1,104	1,159	1,217	1,278	1,342

ELMD Microwave Devices Branch
Dept. Head:Mr. H.J. Romaker

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Branch Chief	150	1					150				
GS11-GS13 Engineer	100	8					800				
Secretary	80	1					80				
Subtotal		10					1,030				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								1,082	1,136	1,193	1,253
Subtotal Assignable							1,030	1,082	1,136	1,193	1,253
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	155	162	170	179	188
Total Usable Area							1,185	1,244	1,306	1,372	1,441

ELMS Microwave Systems Tech Branch
Dept. Head:Vacant

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Branch Chief	150	1					150				
GS11-GS13 Engineer	100	5					500				
Secretary	80	1					80				
Subtotal		7					730				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								767	805	845	887
Subtotal Assignable							730	767	805	845	887
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	110	115	121	127	133
Total Usable Area							840	882	926	972	1,020

ELMT Microwave Tech & Appe. Branch
Dept. Head:Mr. M.C. Calcatera

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Jan84	Jan85	Jan87	Jan89	Rqd Area(SF) Jan83	Jan84	Jan85	Jan87	Jan89
Personnel Space											
Branch Chief	150	1					150				
GS11-GS13 Engineer	100	10					1,000				
Secretary	80	1					80				
Subtotal		12					1,230				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								1,292	1,357	1,425	1,496
Subtotal Assignable							1,230	1,292	1,357	1,425	1,496
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	185	194	204	214	224
Total Usable Area							1,415	1,486	1,561	1,639	1,720

ELO Electro-Optics Division
Dept. Head:Mr. R.L. Remski

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Division Director	200	1					200				
On-site Contractor	70	2					140				
Executive Secretary	120	1					120				
Subtotal		4					460				
Support Space											
Conf. Room (10-15)	350	1					350				
Reception Area	80	1					80				
Subtotal		2					430				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								935	982	1,031	1,083
Subtotal Assignable							890	935	982	1,031	1,083
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	134	140	147	155	162
Total Usable Area							1,024	1,075	1,129	1,186	1,245

ELOD Electro-Optics Detector Branch
Dept. Head:Mr. C.H. Stevens

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1					150				
GS14-GS15 Engineer	120	1					120				
GS11-GS13 Engineer	100	6					600				
Secretary	80	1					80				
Subtotal		9					950				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								998	1,048	1,100	1,155
Subtotal Assignable							950	998	1,048	1,100	1,155
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	143	150	157	165	173
Total Usable Area							1,093	1,148	1,205	1,265	1,328

ELO6 Electro-Optics Sources Branch
Dept. Head:Mr. D.J. Smith

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Branch Chief	150	1					150				
GS14-GS15 Engineer	120	1					120				
GS11-GS13 Engineer	100	8					800				
Secretary	80	1					80				
Subtotal		11					1,150				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								1,208	1,268	1,331	1,398
Subtotal Assignable							1,150	1,208	1,268	1,331	1,398
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	173	181	190	200	210
Total Usable Area							1,323	1,389	1,458	1,531	1,608

ELOT E-O Techniques & Appe Branch
Dept. Head:Mr. C.R. Lane

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Qty Jan94	Qty Jan95	Qty Jan97	Qty Jan99	Rqd Area(SF) Jan93	Rqd Area(SF) Jan94	Rqd Area(SF) Jan95	Rqd Area(SF) Jan97	Rqd Area(SF) Jan99
Personnel Space											
Branch Chief	150	1					150				
GS14-GS15 Engineer	120	1					120				
GS11-GS13 Engineer	100	6					600				
Secretary	80	1					80				
Subtotal		9					950				
Forecast by Percentage Growth Rate			5%	5%	5%	5%					
								998	1,048	1,100	1,155
Subtotal Assignable							950	998	1,048	1,100	1,155
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	143	150	157	165	173
Total Usable Area							1,093	1,148	1,205	1,265	1,328

ELR Research Division
Dept. Head:Mr. G.L. McCoy

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Division Director	200	1					200				
On-site Contractor	70	21					1,470				
Executive Secretary	120	1					120				
Subtotal		23					1,790				
Support Space											
Conf. Room (10-15)	350	1					350				
Reception Area	80	1					80				
Prec. Metals Store	100	1					100				
Subtotal		3					530				
Forecast by Percentage Growth Rate			10%	10%	10%	10%		2,552	2,807	3,088	3,397
Subtotal Assignable							2,320	2,552	2,807	3,088	3,397
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	348	383	421	463	510
Total Usable Area							2,668	2,935	3,228	3,551	3,907

ELRA Character. & Analysis Branch
Dept. Head:Dr. R.E. Wallins

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan93	Jan94	Jan95	Jan97	Jan99	Rqd Area(SF) Jan93	Jan94	Jan95	Jan97	Jan99
Personnel Space											
Branch Chief	150	1					150				
GS14-GS15 Engineer	120	2					240				
GS11-GS13 Engineer	100	13					1,300				
Secretary	80	1					80				
Subtotal		17					1,770				
Forecast by Percentage Growth Rate			10%	10%	10%	10%					
								1,947	2,142	2,356	2,592
Subtotal Assignable							1,770	1,947	2,142	2,356	2,592
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	266	292	321	353	389
Total Usable Area							2,036	2,239	2,463	2,709	2,981

ELRD Device Research Branch
Dept. Head:Mr. K. Nakano

Job/Space Std Descrp	Space Std Area(SF)	Qty Jan83	Qty Jan84	Qty Jan85	Qty Jan87	Qty Jan89	Rqd Area(SF) Jan83	Rqd Area(SF) Jan84	Rqd Area(SF) Jan85	Rqd Area(SF) Jan87	Rqd Area(SF) Jan89
Personnel Space											
Branch Chief	150	1					150				
GS14-GS15 Engineer	120	1					120				
GS11-GS13 Engineer	100	16					1,600				
Secretary	80	1					80				
Subtotal		19					1,950				
Forecast by Percentage Growth Rate			10%	10%	10%	10%					
								2,145	2,360	2,596	2,856
Subtotal Assignable							1,950	2,145	2,360	2,596	2,856
Secondary Circ.		13.%	13.%	13.%	13.%	13.%	293	322	354	389	428
Total Usable Area							2,243	2,467	2,714	2,985	3,284

APPENDIX E

Proximity Requirements

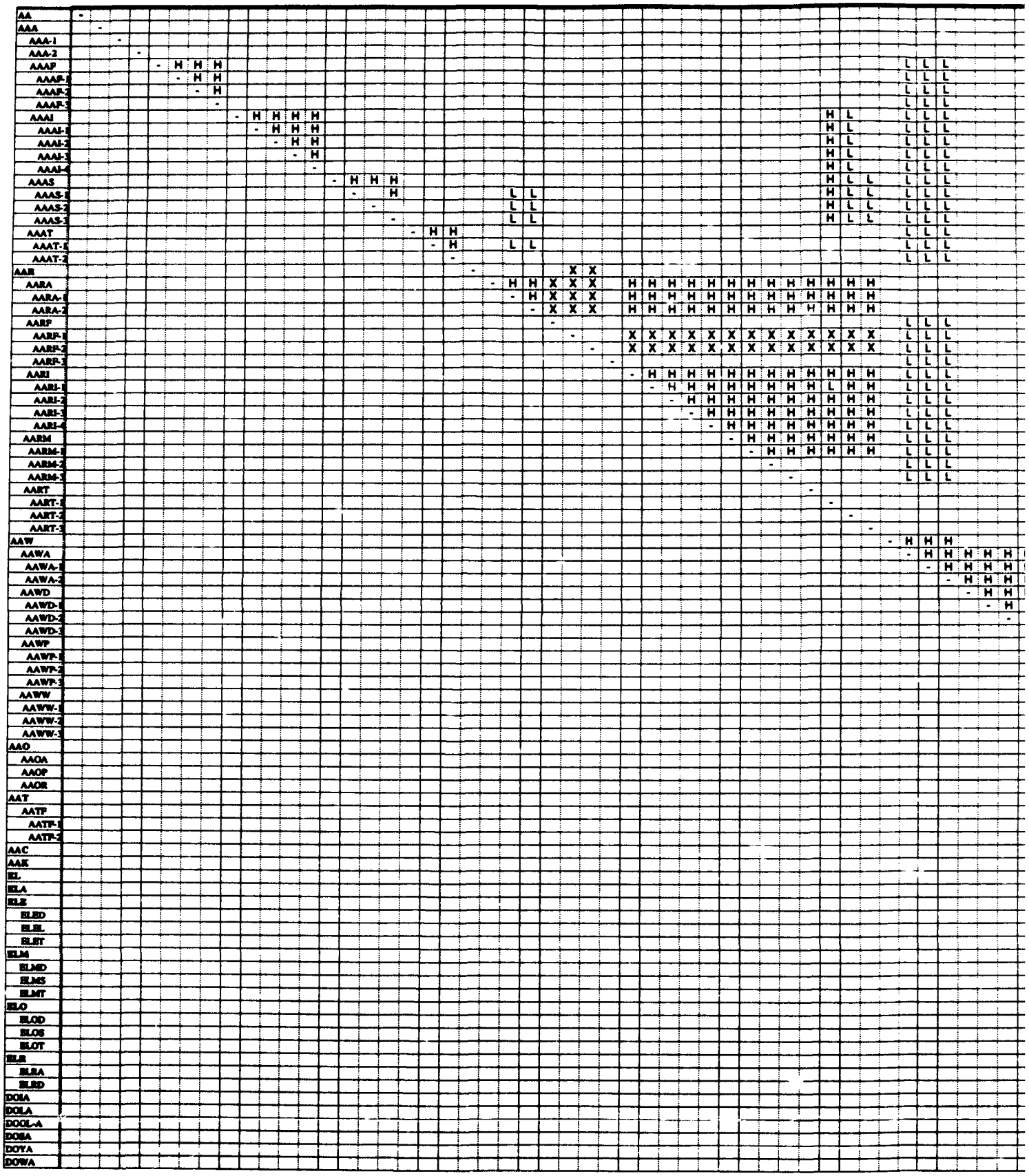
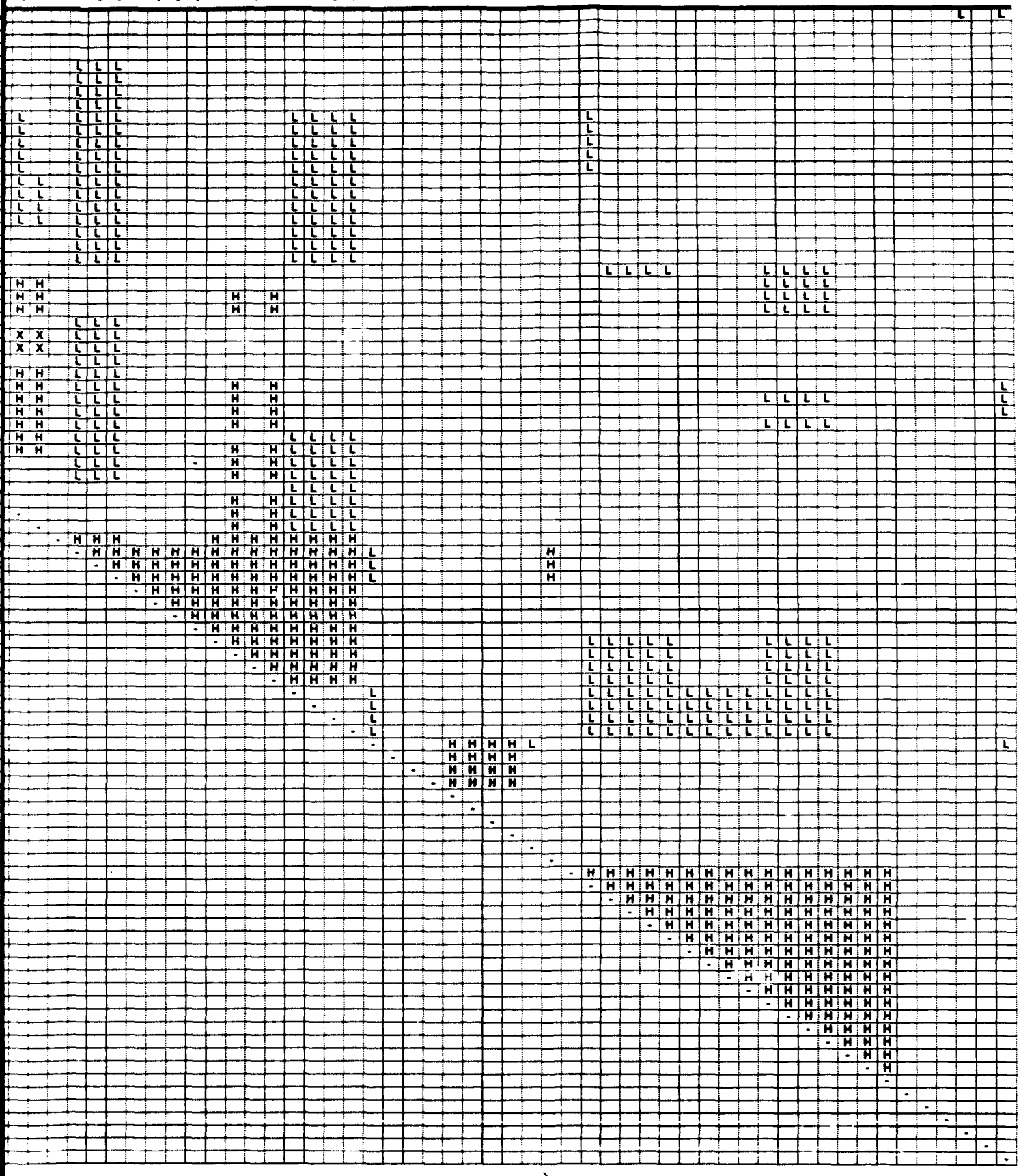


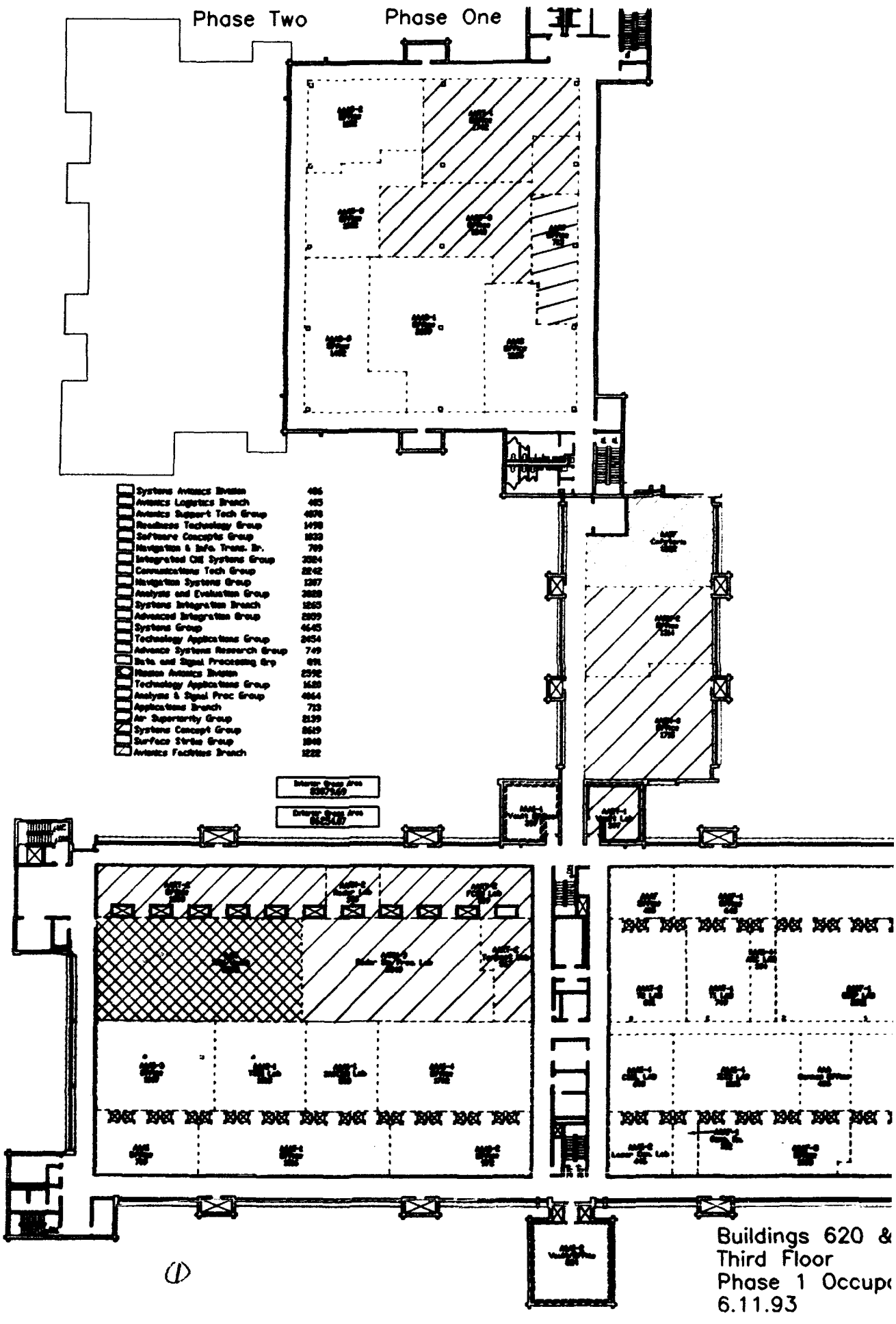
Figure E-1. Avionics Laboratory Proximity Requirements

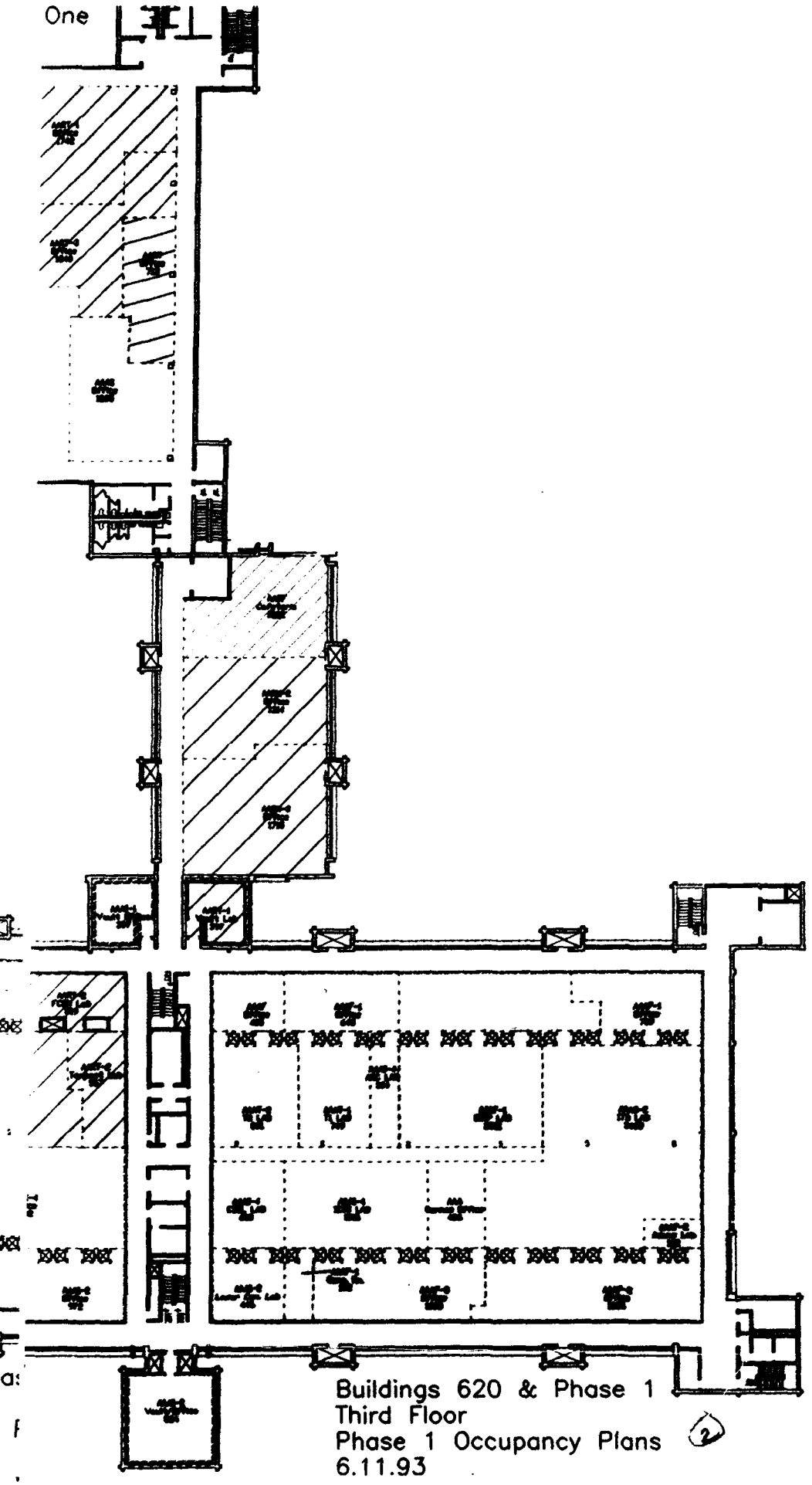


onics Laboratory Proximity Requirements

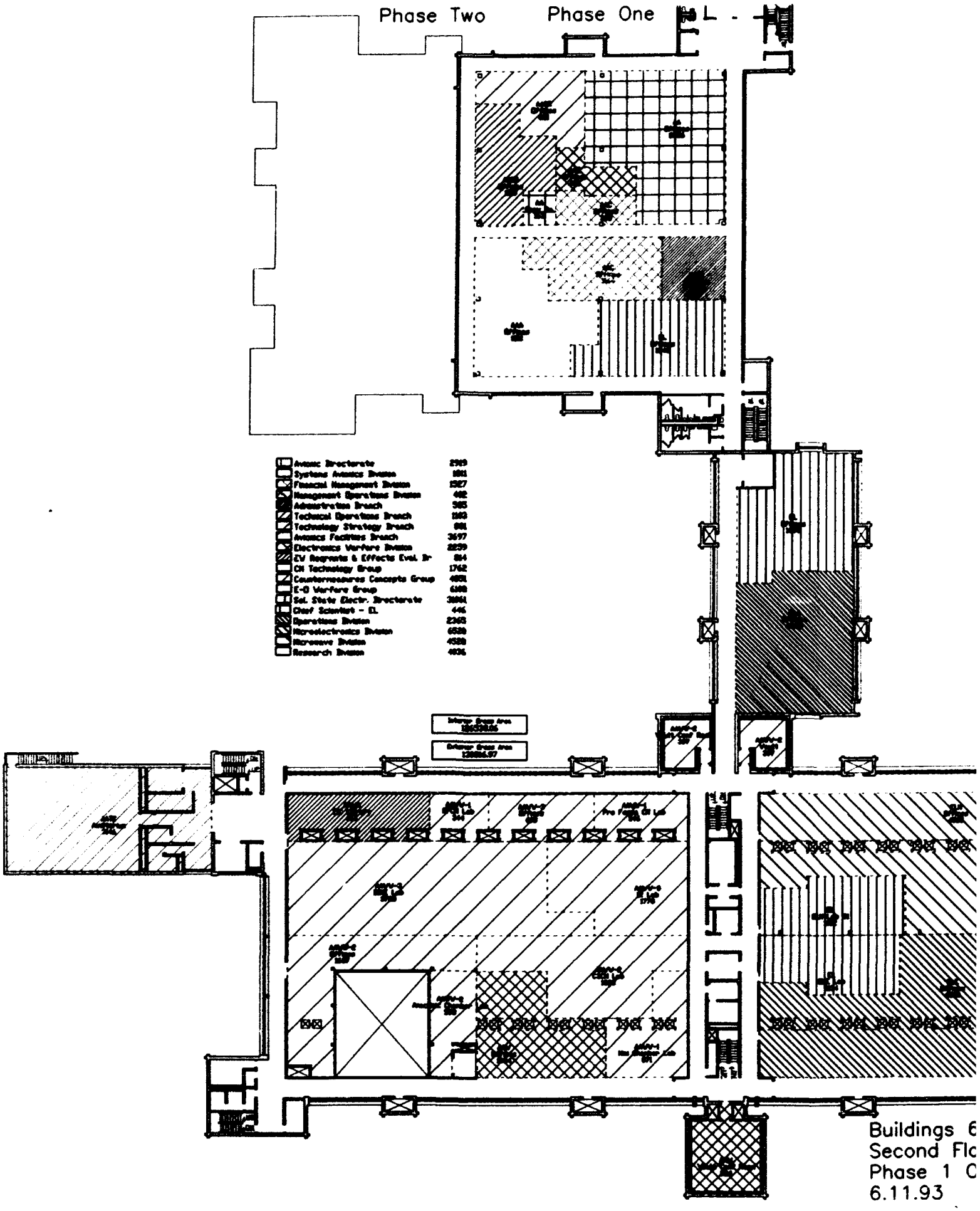
APPENDIX F

Recommended Building 620 Space Configurations – Post Phase I and II Construction

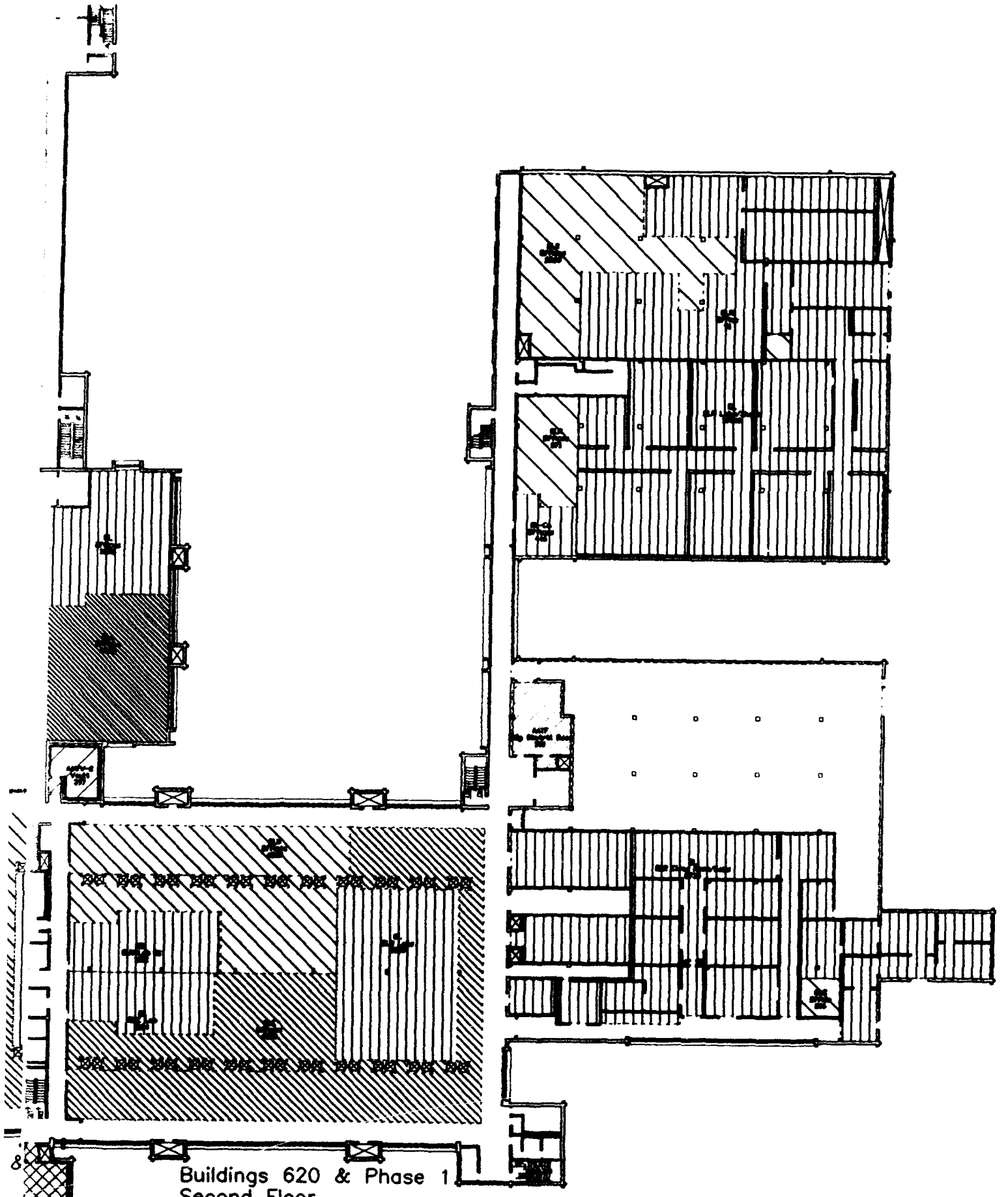

Phase Two
Phase One
Systems Avionics Division 486
Avionics Logistics Branch 485
Avionics Support Tech Group 4878
Readiness Technology Group 1498
Software Concepts Group 1833
Navigation & Info. Trans. Br. 709
Integrated CNI Systems Group 2584
Communications Tech Group 2242
Navigation Systems Group 1287
Analysis and Evaluation Group 2888
Systems Integration Branch 1265
Advanced Integration Group 2809
Systems Group 4645
Technology Applications Group 2454
Advance Systems Research Group 749
Data and Signal Processing Grp 891
Mission Avionics Division 2592
Technology Applications Group 1620
Analysis & Signal Proc Group 4864
Applications Branch 713
Air Superiority Group 2139
Systems Concept Group 2619
Surface Strike Group 1848
Avionics Facilities Branch 1222
Buildings 620 &
Third Floor
Phase 1 Occup
6.11.93



Buildings 620 & Phase 1
Third Floor
Phase 1 Occupancy Plans (2)
6.11.93



Buildings 6
Second Flo
Phase 1 C
6.11.93

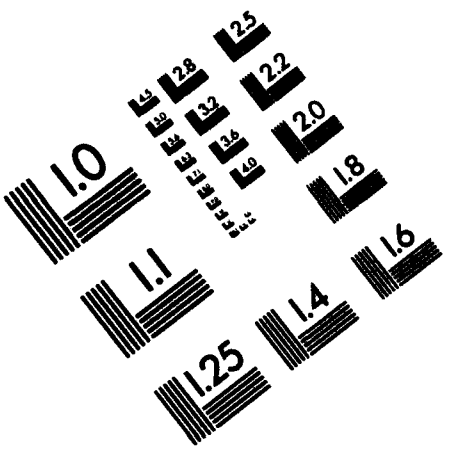


Buildings 620 & Phase 1
Second Floor
Phase 1 Occupancy Plans
6.11.93

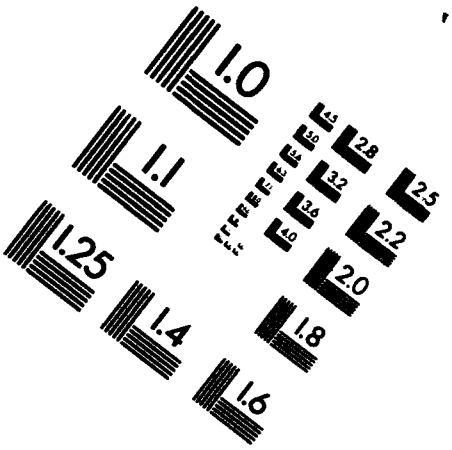
AD-A274 238 STRATEGICALLY PLANNING AVIONICS LABORATORY'S FACILITIES FOR THE FUTURE(U) LOGISTICS MANAGEMENT INST BETHESDA MD J A HAWKINS ET AL. SEP 93 LMI-AF205R1 XC-WL/WP 3/3

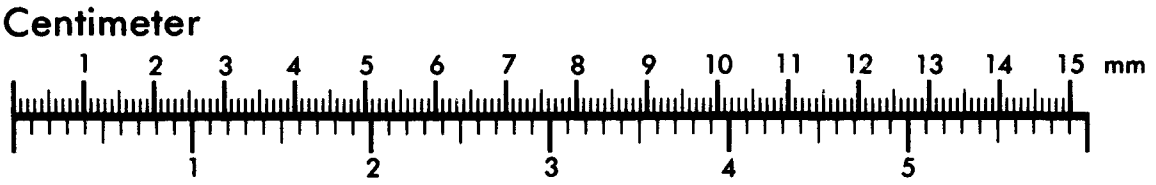
UNCLASSIFIED MDA903-90-C-0006 NL

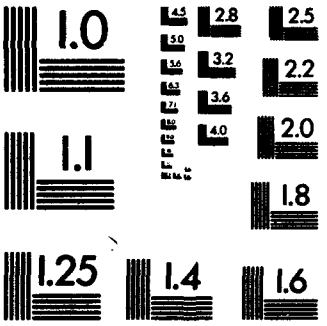
END
FILMED
DTIC

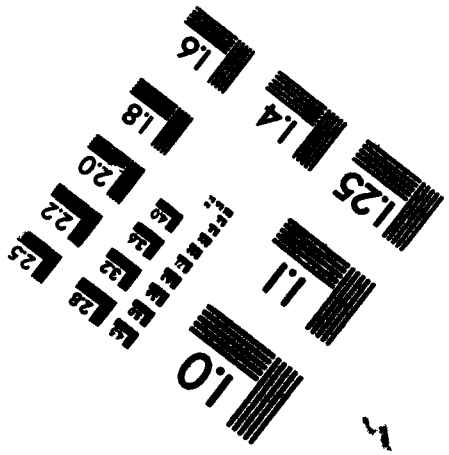


Association for Information and Image Management
1100 Wayne Avenue, Suite 1100
Silver Spring, Maryland 20910
301/587-8202

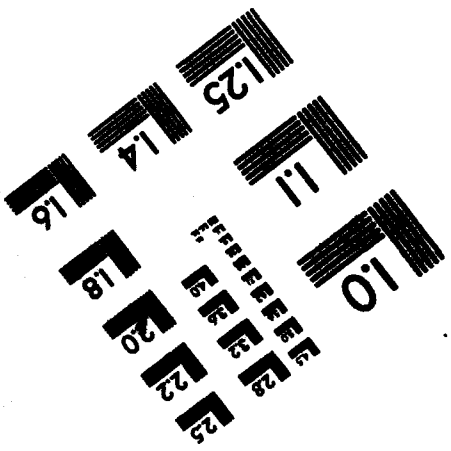


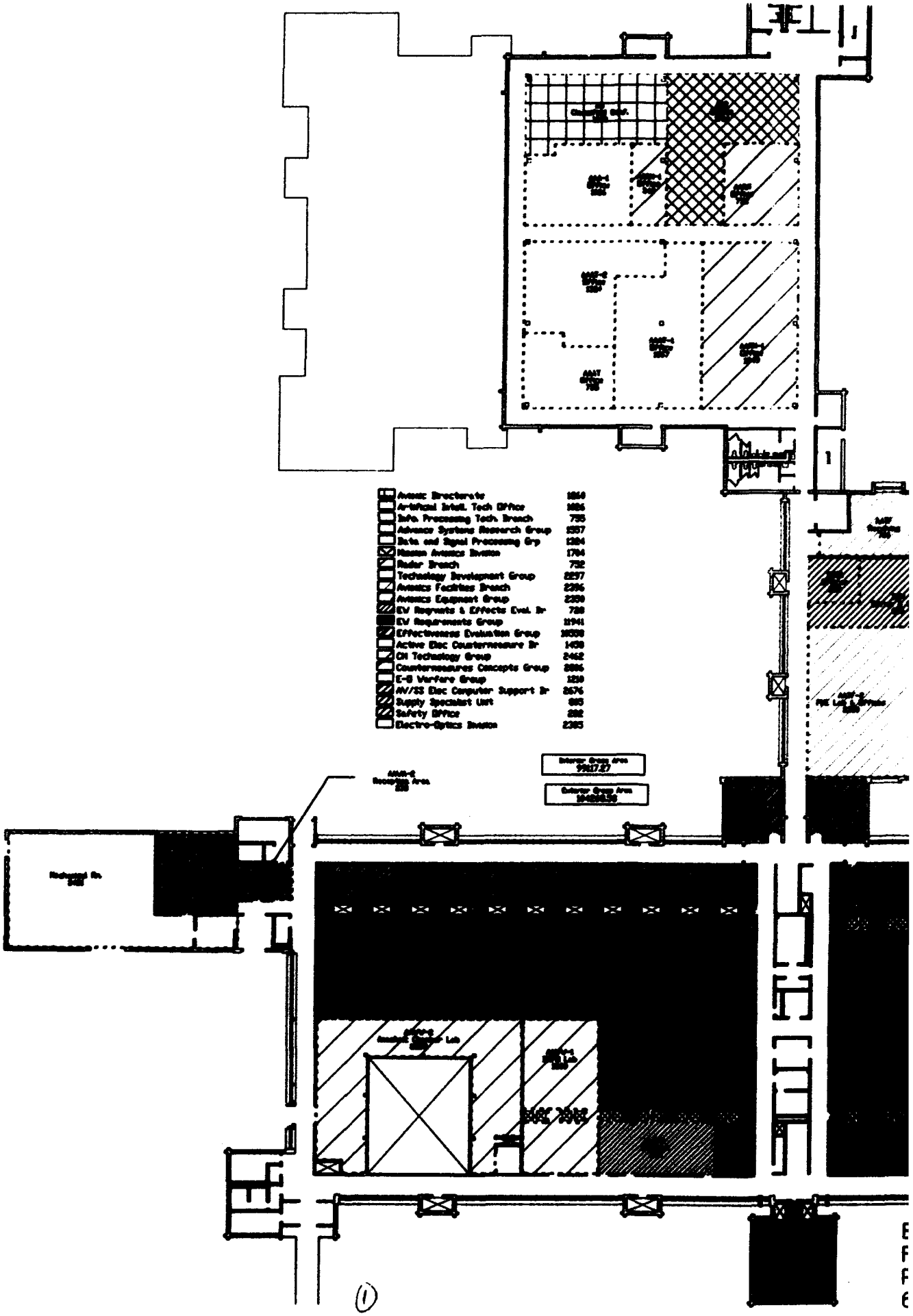


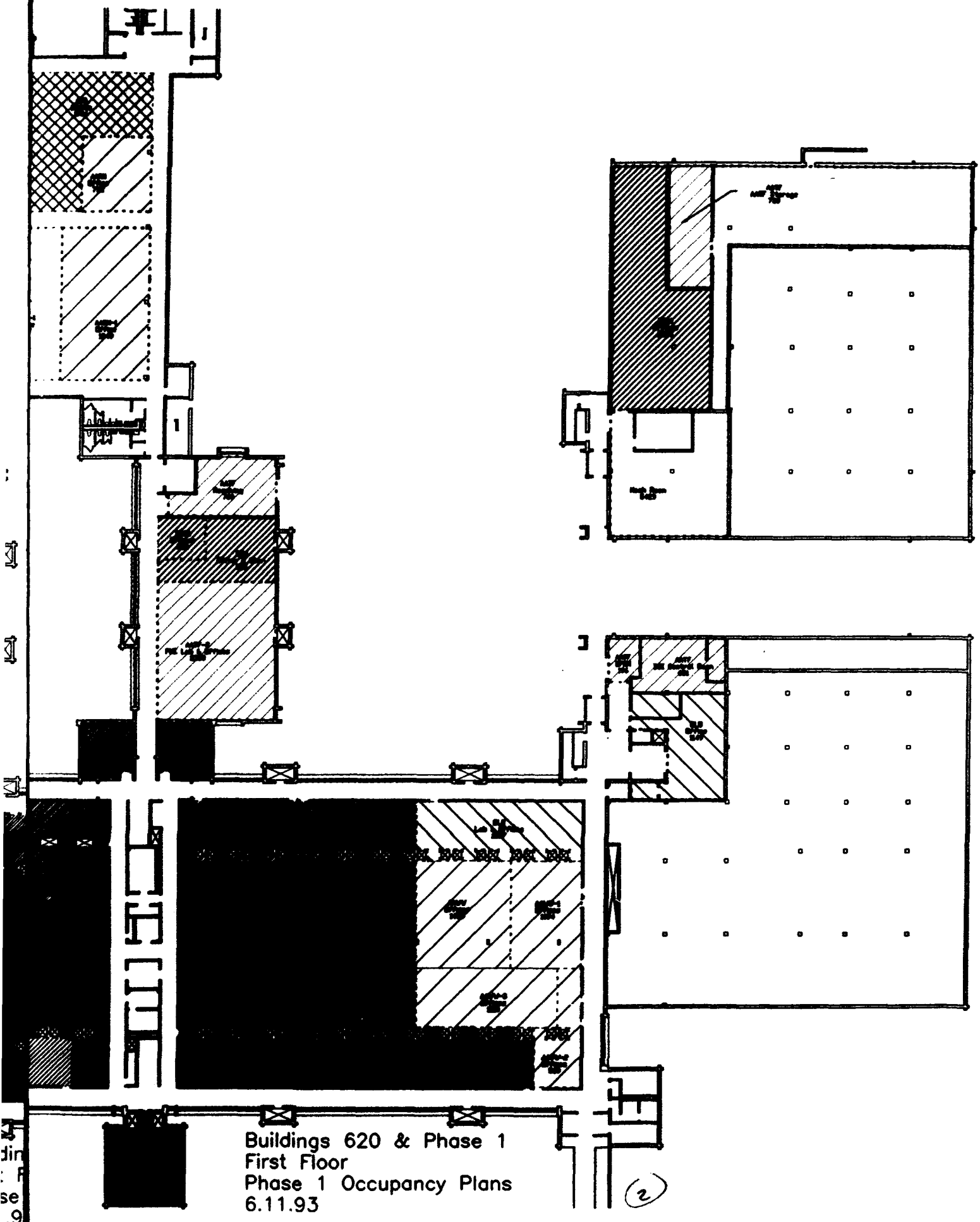




MANUFACTURED TO AIIM STANDARDS
BY APPLIED IMAGE, INC.

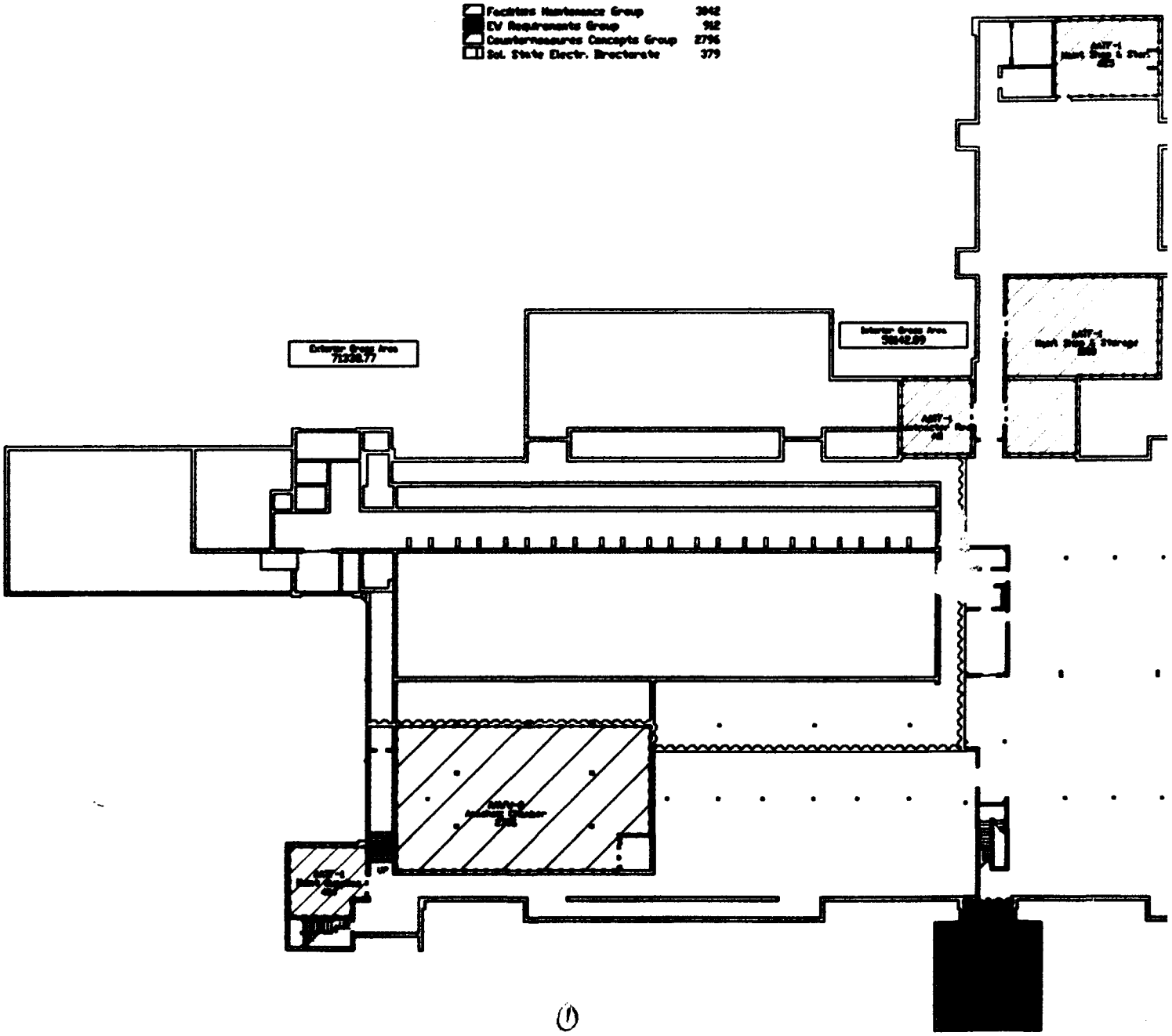


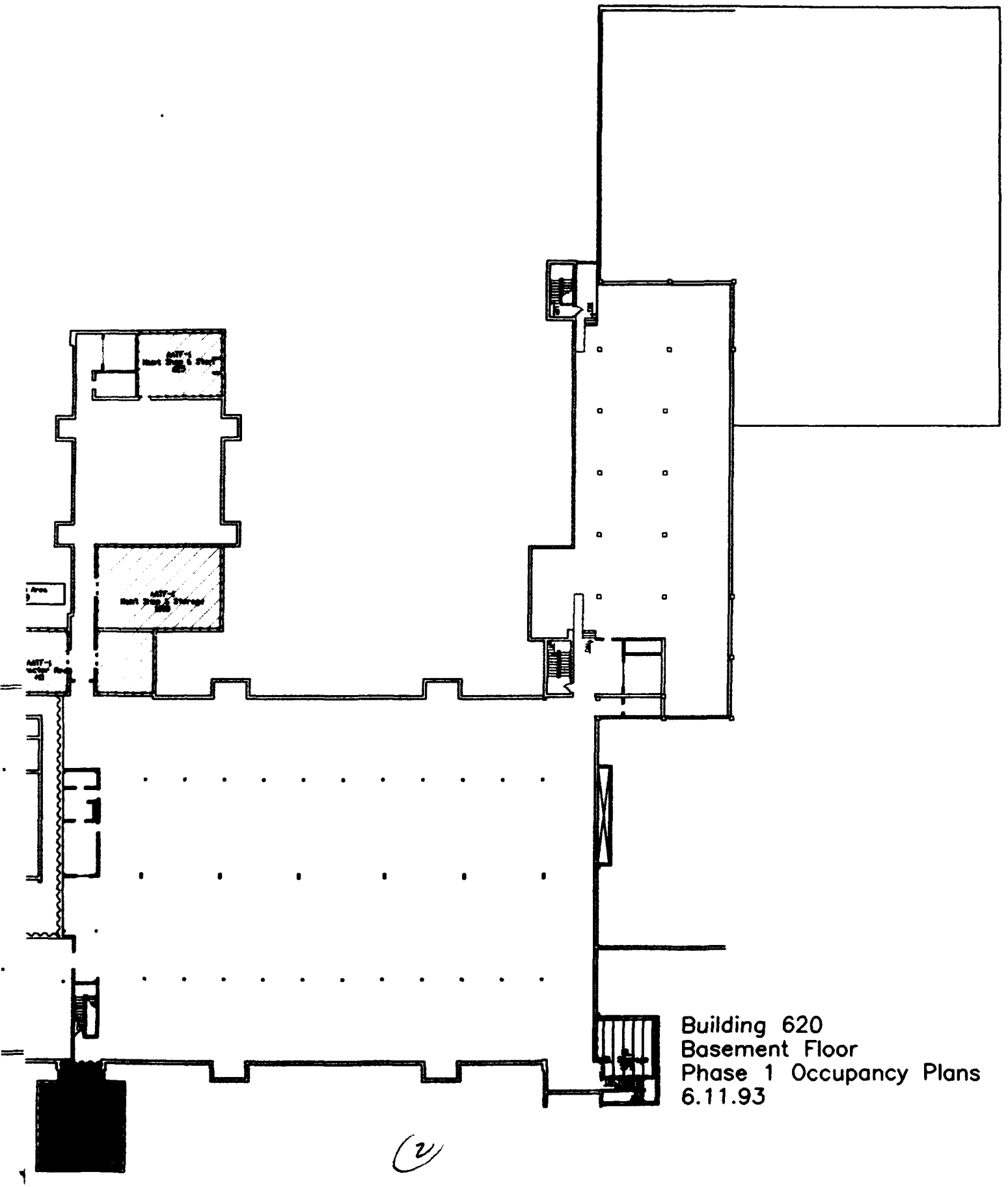

Avionic Directorate 1814
Artificial Intell. Tech Office 1826
Info. Processing Tech. Branch 735
Advance Systems Research Group 1557
Data and Signal Processing Gry 1384
Mission Avionics Division 1704
Radar Branch 732
Technology Development Group 2277
Avionics Facilities Branch 2296
Avionics Equipment Group 2359
EW Reqmnts & Effects Eval. Br 738
EW Requirements Group 11941
Effectiveness Evaluation Group 10338
Active Elec Countermeasure Br 1458
CM Technology Group 2462
Countermeasures Concepts Group 2886
E-B Warfare Group 1239
AV/SS Elec Computer Support Br 2676
Supply Specialist Unit 885
Safety Office 882
Electro-Optics Division 2385



Buildings 620 & Phase 1
First Floor
Phase 1 Occupancy Plans
6.11.93

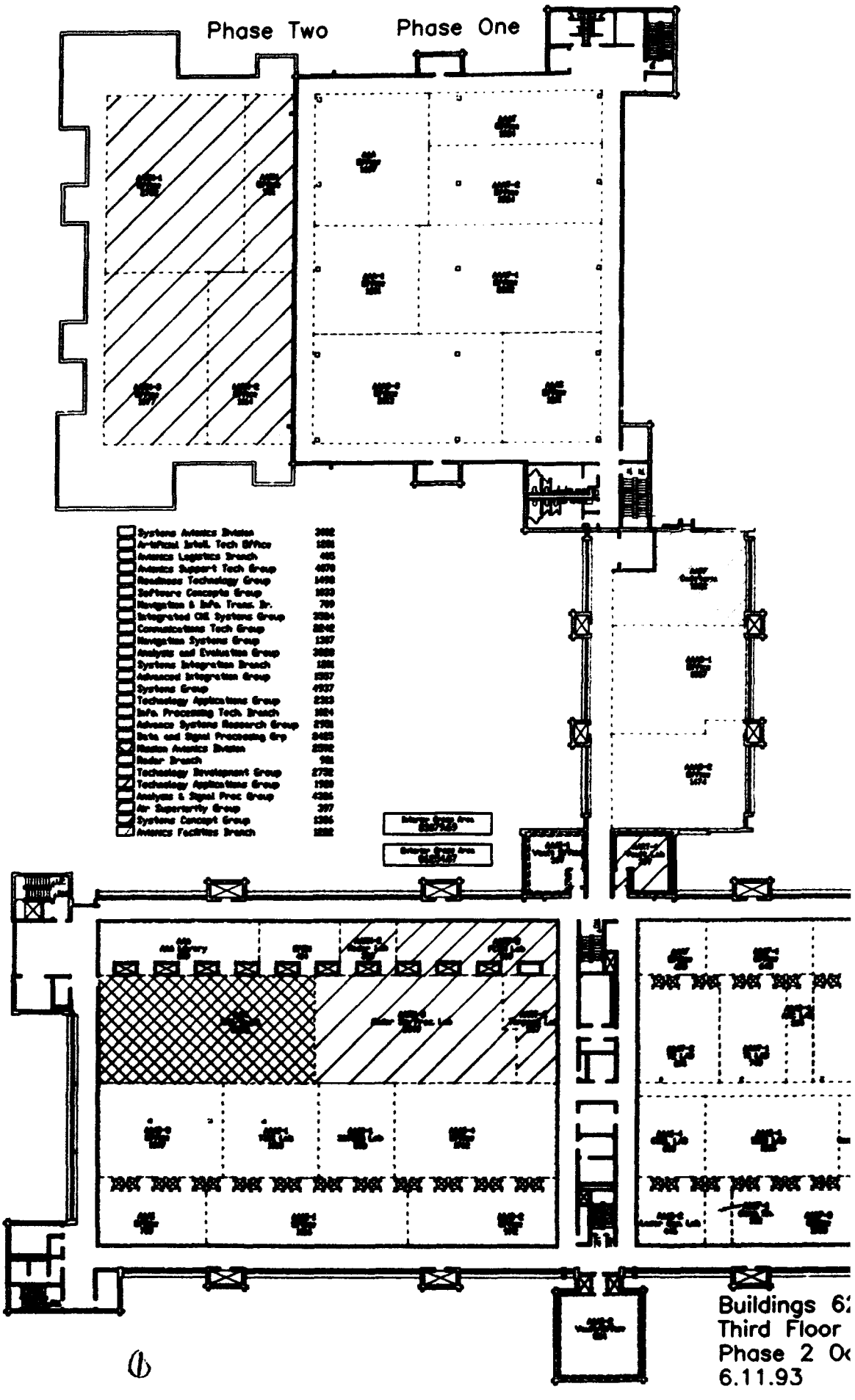
(2)

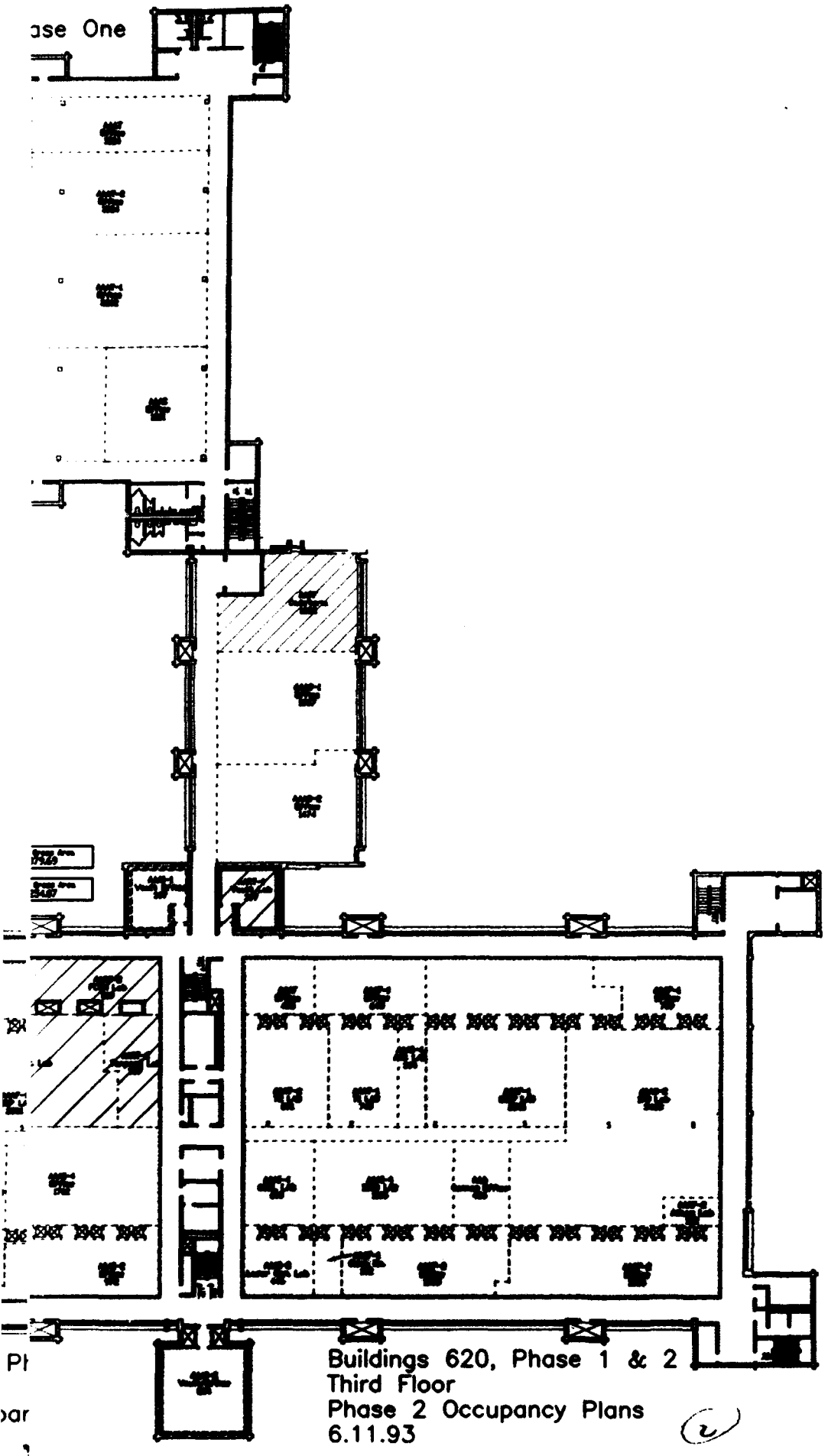

Facilities Maintenance Group 3042
EV Requirements Group 912
Countermeasures Concepts Group 2796
Sol. State Electr. Directorate 379



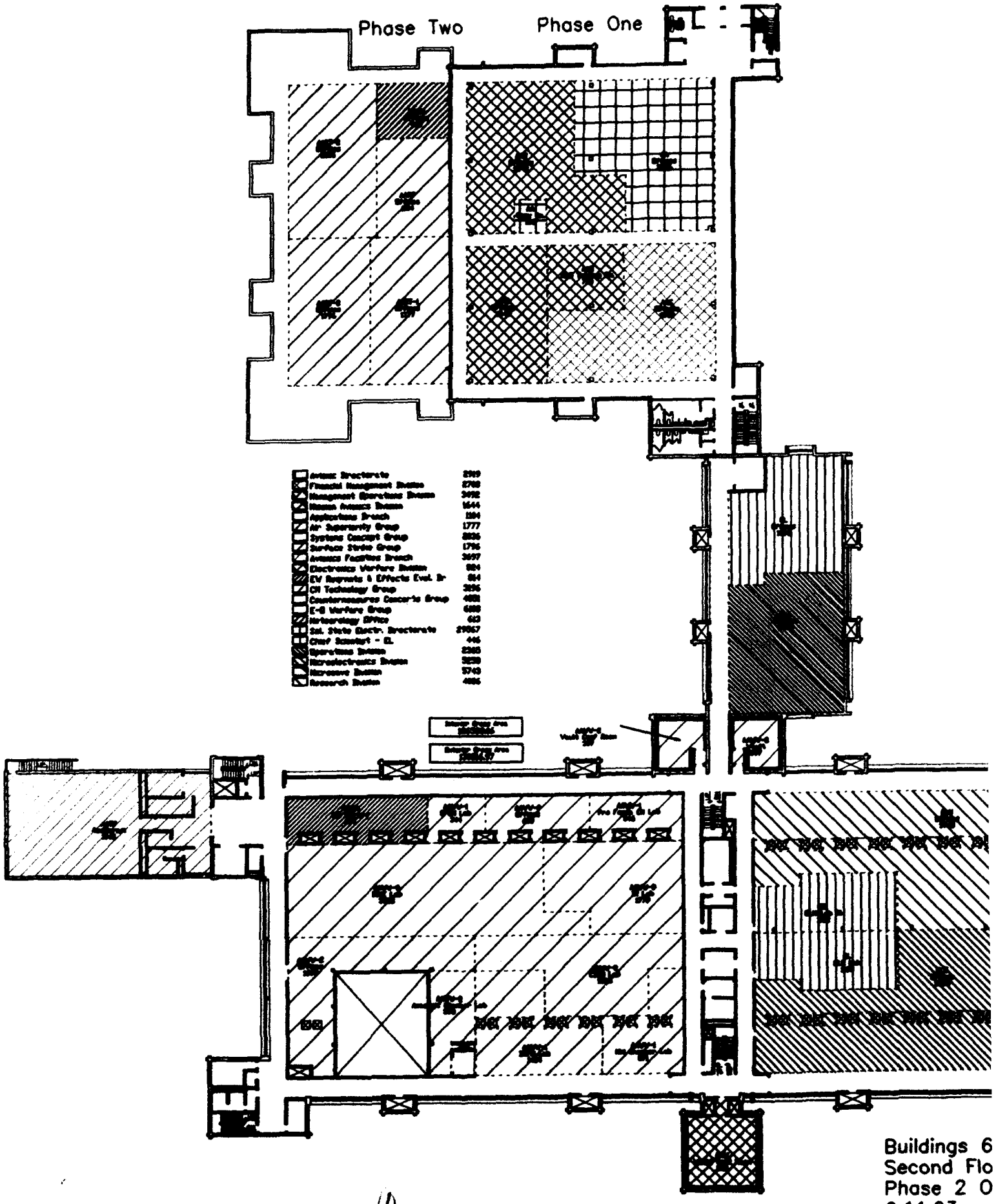
Building 620
Basement Floor
Phase 1 Occupancy Plans
6.11.93

(2)

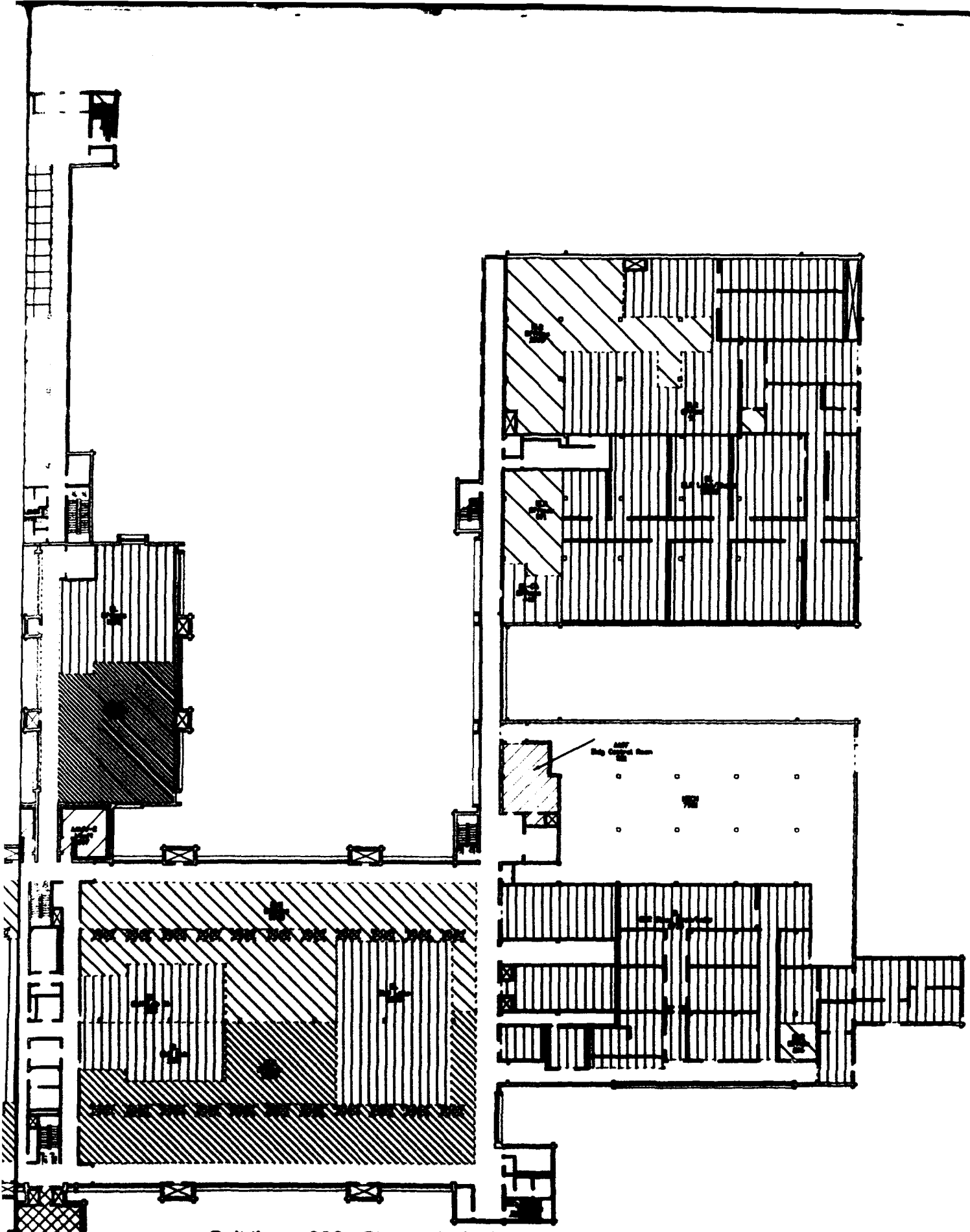

Phase Two
Phase One
Buildings 62
Third Floor
Phase 2 Oc
6.11.93



Buildings 620, Phase 1 & 2
Third Floor
Phase 2 Occupancy Plans
6.11.93

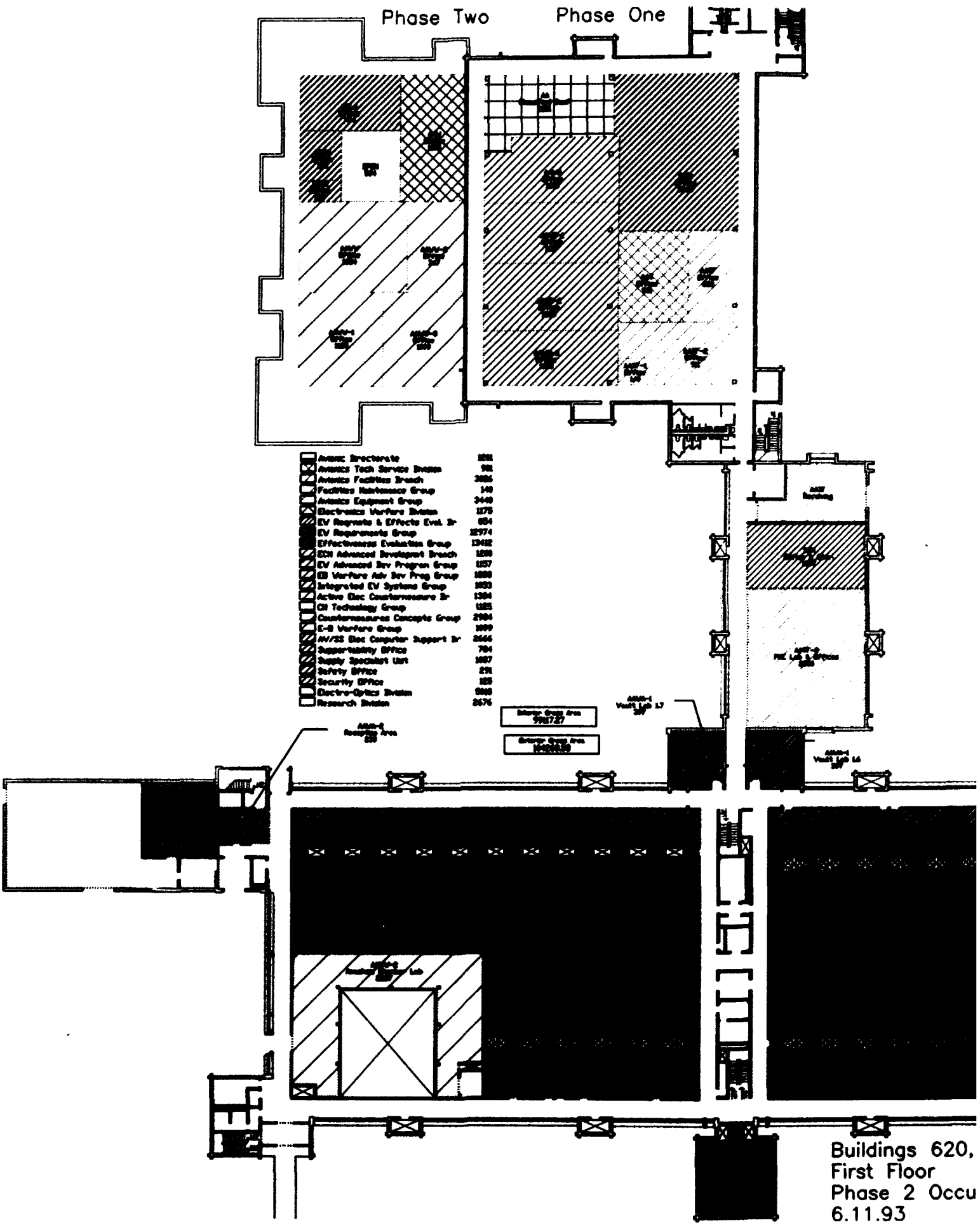


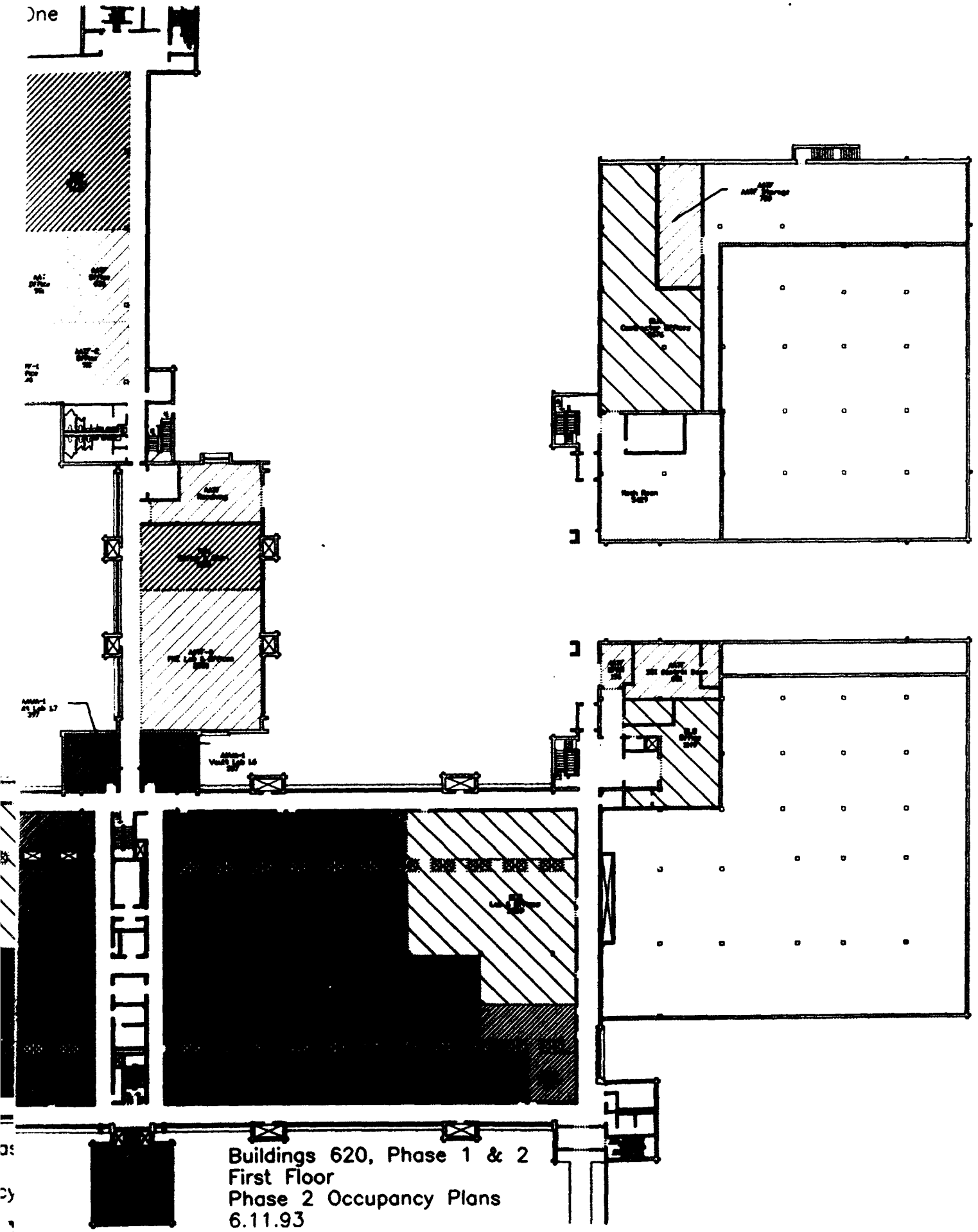
Buildings 6
Second Flo
Phase 2 O
6.11.93



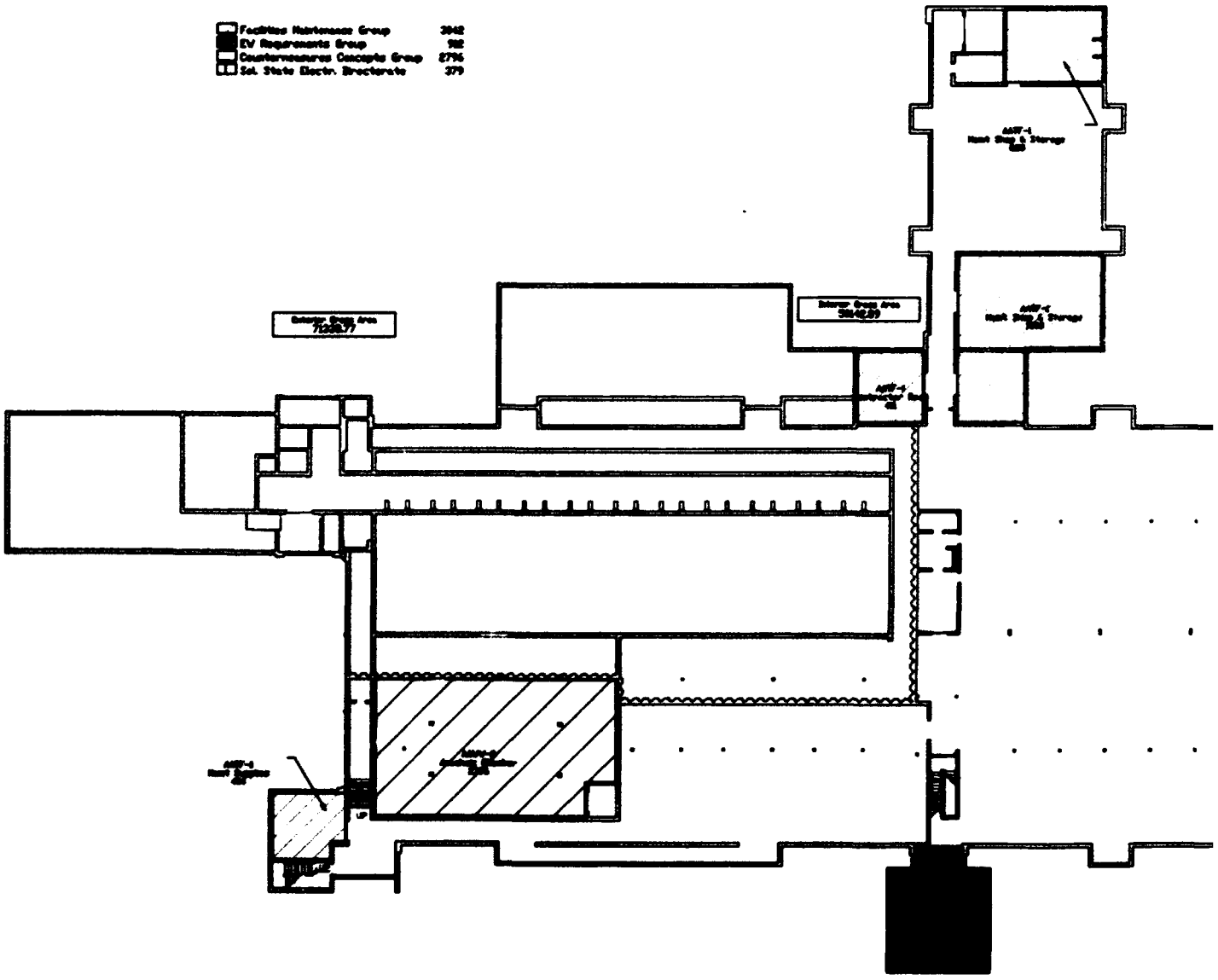
Buildings 620, Phase 1 & 2
Second Floor
Phase 2 Occupancy Plans
6.11.93

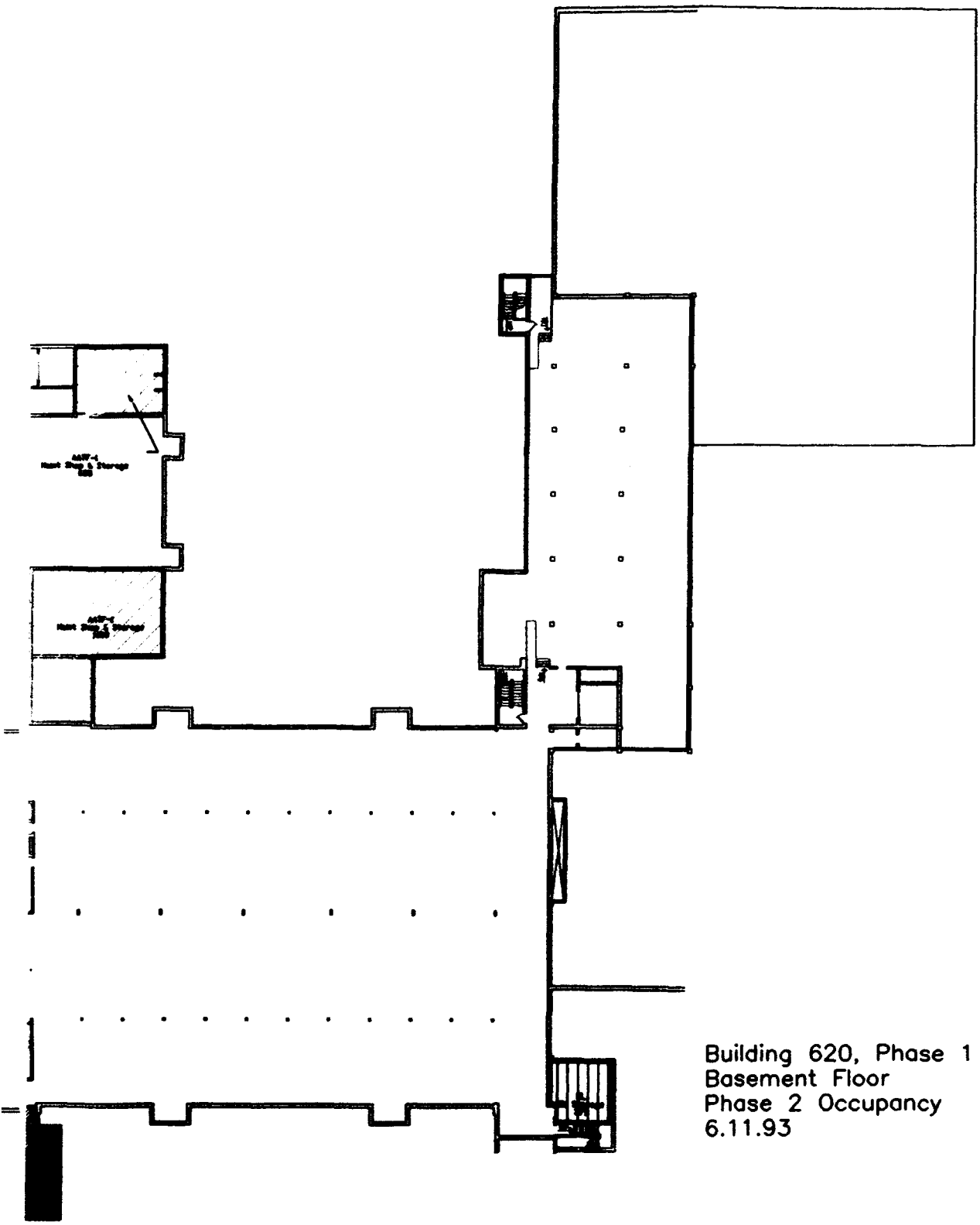
(2)


Phase Two
Phase One
Buildings 620,
First Floor
Phase 2 Occu
6.11.93



Buildings 620, Phase 1 & 2
First Floor
Phase 2 Occupancy Plans
6.11.93


Facilities Maintenance Group 3042
EV Requirements Group 102
Countermeasures Concepts Group 2716
Sol. State Electr. Directorate 379

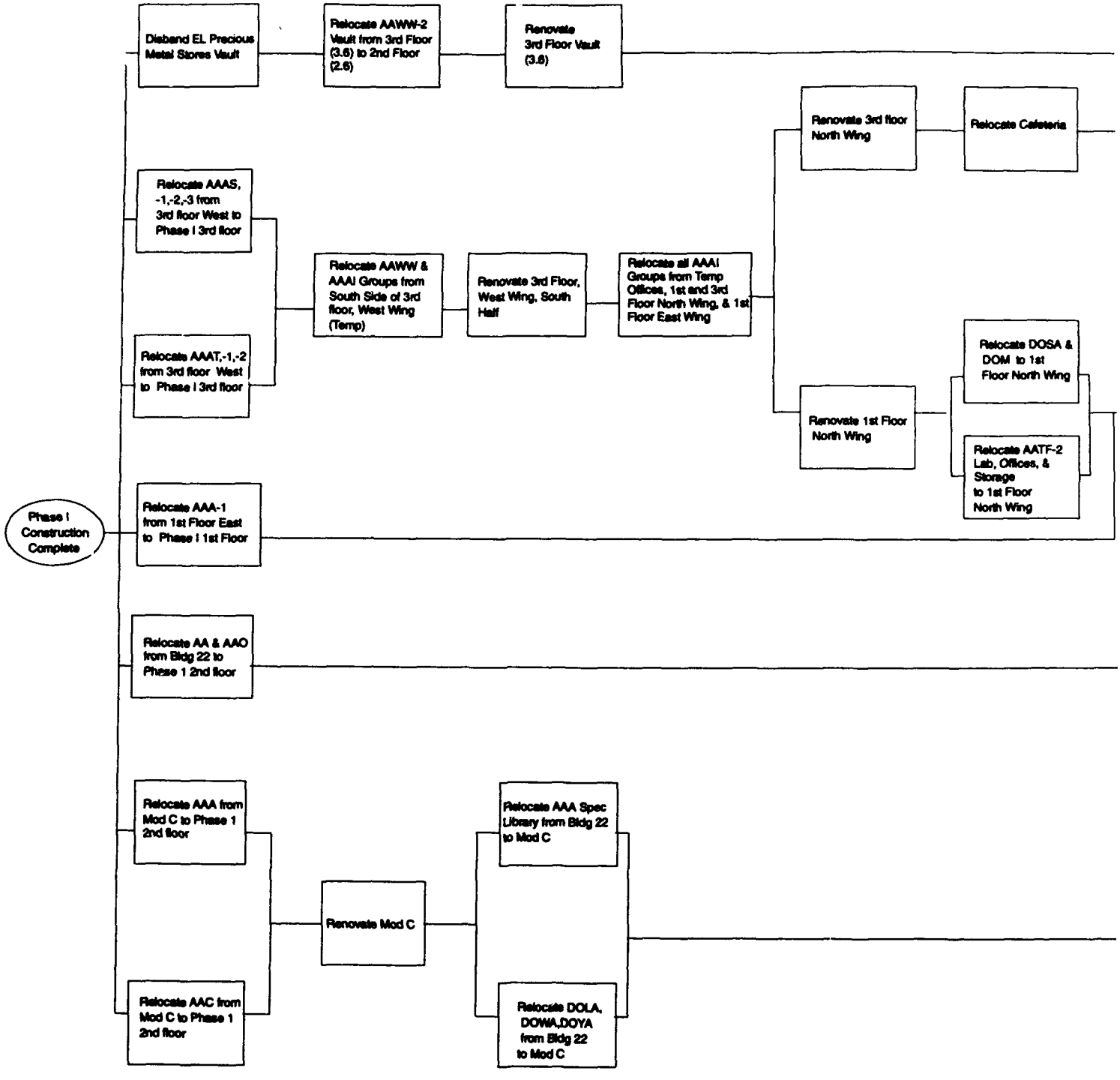


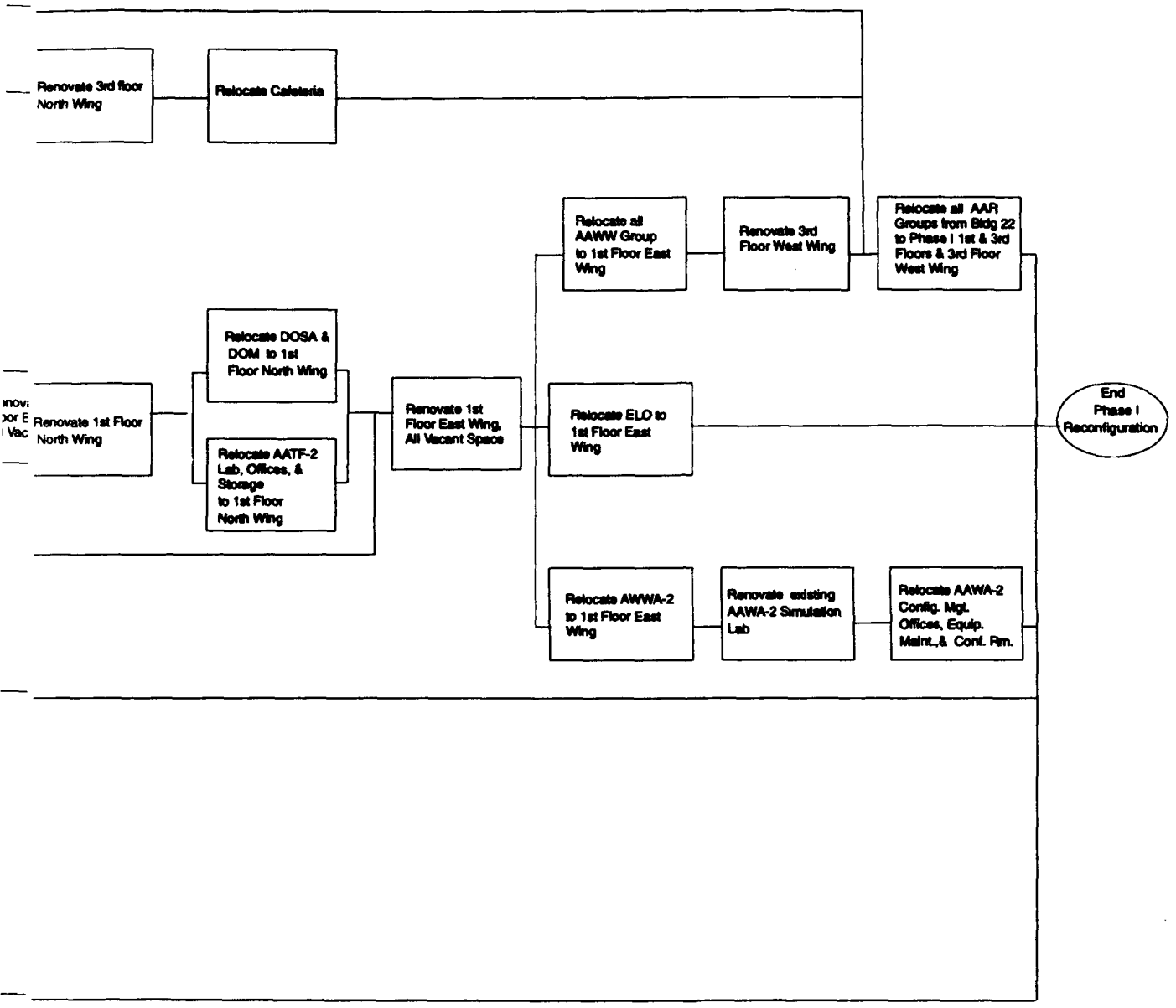
Building 620, Phase 1 & 2
Basement Floor
Phase 2 Occupancy
6.11.93

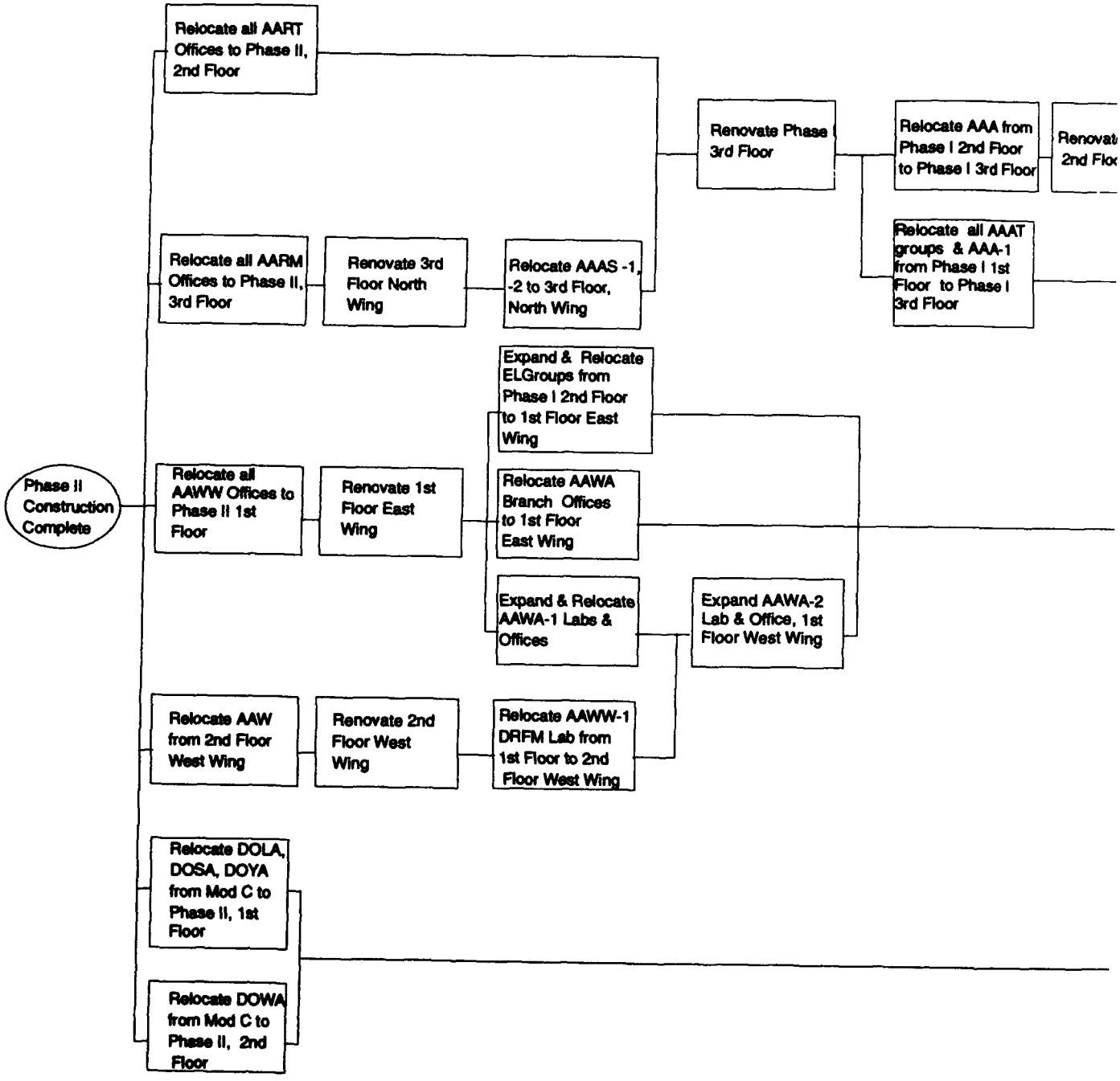
(2)

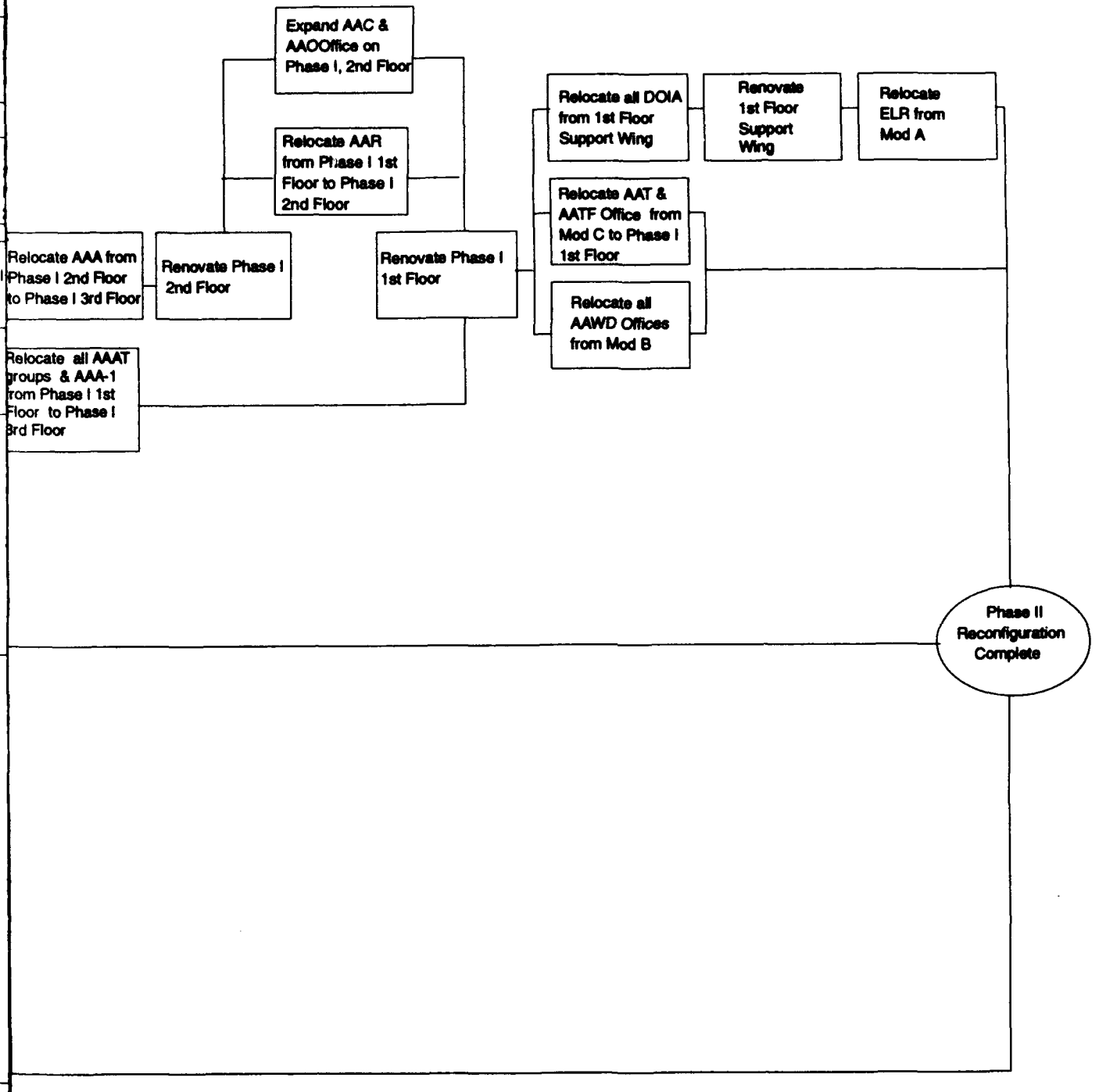
APPENDIX G

Step-by-Step Implementation Strategy


Phase I Construction Complete
Disband EL Precious Metal Stores Vault
Relocate AAWW-2 Vault from 3rd Floor (3.6) to 2nd Floor (2.6)
Renovate 3rd Floor Vault (3.6)
Relocate AAAS, -1,-2,-3 from 3rd floor West to Phase I 3rd floor
Relocate AAAT,-1,-2 from 3rd floor West to Phase I 3rd floor
Relocate AAWW & AAAI Groups from South Side of 3rd floor, West Wing (Temp)
Renovate 3rd Floor, West Wing, South Half
Relocate all AAAI Groups from Temp Offices, 1st and 3rd Floor North Wing, & 1st Floor East Wing
Renovate 3rd floor North Wing
Relocate Cafeteria
Renovate 1st Floor North Wing
Relocate DOSA & DOM to 1st Floor North Wing
Relocate AATF-2 Lab, Offices, & Storage to 1st Floor North Wing
Relocate AAA-1 from 1st Floor East to Phase I 1st Floor
Relocate AA & AAO from Bldg 22 to Phase 1 2nd floor
Relocate AAA from Mod C to Phase 1 2nd floor
Relocate AAC from Mod C to Phase 1 2nd floor
Renovate Mod C
Relocate AAA Spec Library from Bldg 22 to Mod C
Relocate DOLA, DOWA,DOYA from Bldg 22 to Mod C


Renovate 3rd floor North Wing
Relocate Cafeteria
Relocate all AAWW Group to 1st Floor East Wing
Renovate 3rd Floor West Wing
Relocate all AAR Groups from Bldg 22 to Phase I 1st & 3rd Floors & 3rd Floor West Wing
Relocate DOSA & DOM to 1st Floor North Wing
Renovate 1st Floor North Wing
Relocate AATF-2 Lab, Offices, & Storage to 1st Floor North Wing
Renovate 1st Floor East Wing, All Vacant Space
Relocate ELO to 1st Floor East Wing
End Phase I Reconfiguration
Relocate AWWA-2 to 1st Floor East Wing
Renovate existing AAWA-2 Simulation Lab
Relocate AAWA-2 Config. Mgt. Offices, Equip. Maint.,& Conf. Rm.


Phase II Construction Complete
Relocate all AART Offices to Phase II, 2nd Floor
Relocate all AARM Offices to Phase II, 3rd Floor
Renovate 3rd Floor North Wing
Relocate AAAS -1, -2 to 3rd Floor, North Wing
Relocate all AAWW Offices to Phase II 1st Floor
Renovate 1st Floor East Wing
Relocate AAW from 2nd Floor West Wing
Renovate 2nd Floor West Wing
Relocate DOLA, DOSA, DOYA from Mod C to Phase II, 1st Floor
Relocate DOWA from Mod C to Phase II, 2nd Floor
Renovate Phase I 3rd Floor
Relocate AAA from Phase I 2nd Floor to Phase I 3rd Floor
Relocate all AAAT groups & AAA-1 from Phase I 1st Floor to Phase I 3rd Floor
Expand & Relocate ELGroups from Phase I 2nd Floor to 1st Floor East Wing
Relocate AAWA Branch Offices to 1st Floor East Wing
Expand & Relocate AAWA-1 Labs & Offices
Relocate AAWW-1 DRFM Lab from 1st Floor to 2nd Floor West Wing
Expand AAWA-2 Lab & Office, 1st Floor West Wing


Expand AAC & AAOOffice on Phase I, 2nd Floor
Relocate AAR from Phase I 1st Floor to Phase I 2nd Floor
Relocate all DOIA from 1st Floor Support Wing
Renovate 1st Floor Support Wing
Relocate ELR from Mod A
Relocate AAT & AATF Office from Mod C to Phase I 1st Floor
Relocate all AAWD Offices from Mod B
Relocate AAA from Phase I 2nd Floor to Phase I 3rd Floor
Renovate Phase I 2nd Floor
Renovate Phase I 1st Floor
Relocate all AAAT groups & AAA-1 from Phase I 1st Floor to Phase I 3rd Floor
Phase II Reconfiguration Complete

(2)

REPORT DOCUMENTATION PAGE

Form Approved
OPM No.0704-0188

1. AGENCY USE ONLY *(Leave Blank)*	2. REPORT DATE	3. REPORT TYPE AND DATES COVERED
	September 1993	Final

4. TITLE AND SUBTITLE

Strategically Planning Avionics Laboratory's Facilities for the Future

5. FUNDING NUMBERS

C MDA903-90-C-0006

PE 0902198D

6. AUTHOR(S)

Jeffrey A. Hawkins, Trevor L. Neve

7. PERFORMING ORGANIZATION NAME(S) AND ADDRESS(ES)

Logistics Management Institute
6400 Goldsboro Road
Bethesda, MD 20817-5886

8. PERFORMING ORGANIZATION REPORT NUMBER

LMI- AF205R1

9. SPONSORING/MONITORING AGENCY NAME(S) AND ADDRESS(ES)

Mr. John Braily and Mr. William Edwards
Avionics Directorate
Wright Laboratory
Wright-Patterson AFB
Dayton, Ohio 45433

10. SPONSORING/MONITORING AGENCY REPORT NUMBER

11. SUPPLEMENTARY NOTES

12a. DISTRIBUTION/AVAILABILITY STATEMENT

A: Approved for public release; distribution unlimited

12b. DISTRIBUTION CODE

13. ABSTRACT *(Maximum 200 words)*

The Avionics Laboratory at Wright-Patterson Air Force Base has a complex research and development mission. Doing its job right means that its facilities must effectively support that mission. This report establishes a strategic facilities planning methodology and a space management model that ties Avionics Laboratory's mission to its facilities to make sure the right amount and types of facilities are available when and where they are needed. It does so by comparing current and future space requirements (generated by current and future mission requirements) to its existing and anticipated space inventories. The resulting space deficit or surplus, along with space allocation criteria, lead to effective solutions for allocating avionics lab space. Comparing the existing space layouts to the optional future layouts results in an implementation strategy for achieving that proposed layout.

14. SUBJECT TERMS

Strategic Facilities Planning, Space Management, Wright Laboratory, Avionics Directorate, Facilities Planning

15. NUMBER OF PAGES

198

16. PRICE CODE

17. SECURITY CLASSIFICATION OF REPORT	18. SECURITY CLASSIFICATION OF THIS PAGE	19. SECURITY CLASSIFICATION OF ABSTRACT	20. LIMITATION OF ABSTRACT
Unclassified	Unclassified	Unclassified	UL