

Construction Grants Program

for

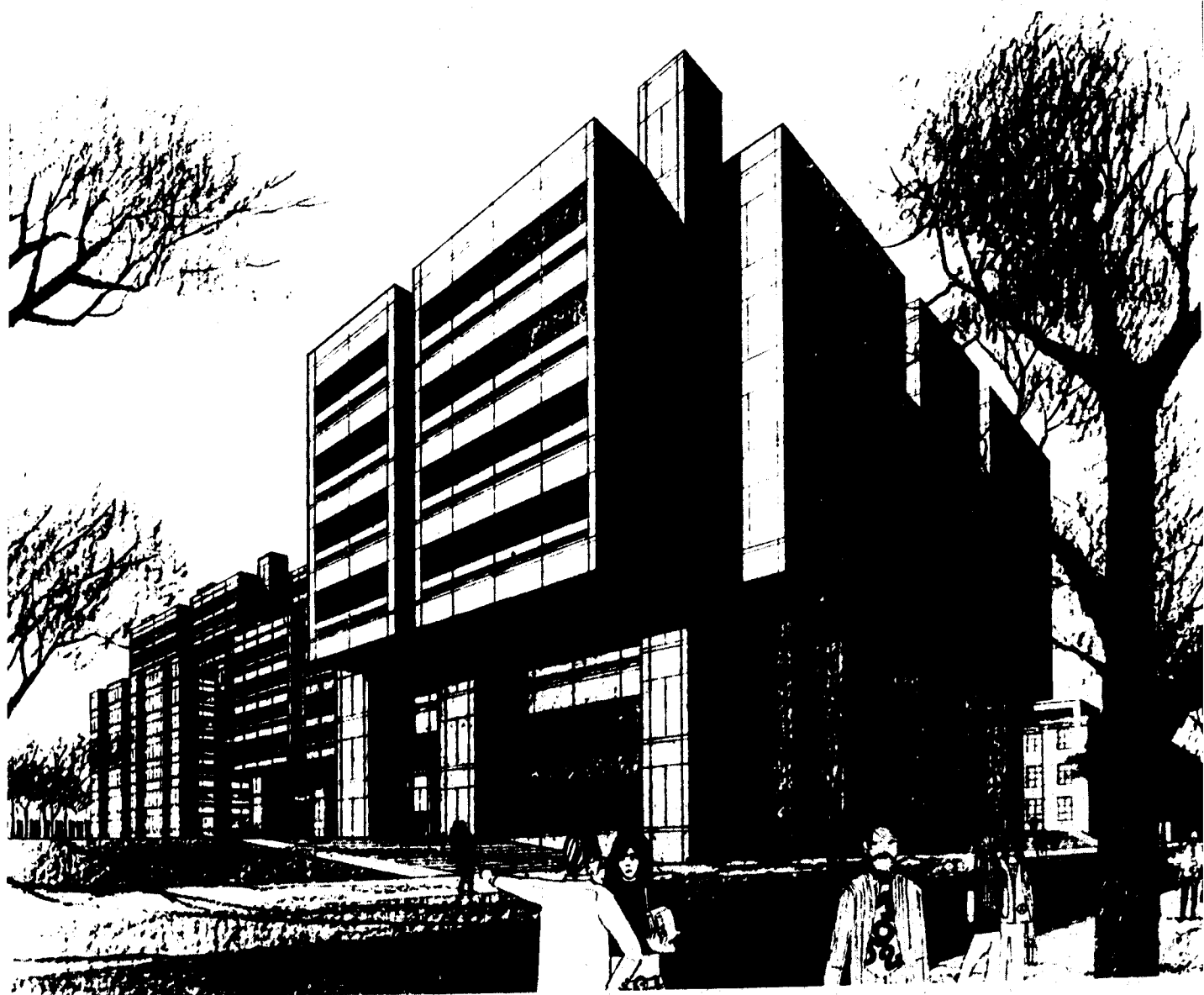
Schools of Nursing

Nurse Training Act of 1971
(Public Law 92-158)
Title VIII, Part A

Health Sciences Unit F

- Joint Application -
University of Minnesota
School of Nursing
and
College of Pharmacy

March 17, 1975



UNIVERSITY OF MINNESOTA
Health Sciences - Unit F
Nurse Training Facility

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U.S. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE
WASHINGTON, D.C.

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APPLICATION FOR FEDERAL ASSISTANCE
FOR CONSTRUCTION OF HEALTH
AND EDUCATIONAL FACILITIES

STATE	DHEW
Date Rec'd.	
Project Number	

GENERAL INFORMATION

1. LEGAL NAME OF APPLICANT Regents of the University of Minnesota	2. ADDRESS OF APPLICANT (street, city, country, congressional district, state, zip code, and telephone number) 202 Morrill Hall University of Minnesota Minneapolis, Minnesota 55455 (612) 373-2025 5th Congressional District
--	--

3. APPLICANT APPLIES FOR FEDERAL FUNDS FOR CONSTRUCTION UNDER THE FOLLOWING PROGRAM(S):

(A) CODE NO. <i>(See Program Instructions)</i>	SHORT TITLE	(B) GRANT AMOUNT	OTHER (IDENTIFY)
(1) 41	Health Professions	\$ 4,823,761	\$ _____
(2) 43	Nursing	\$ 4,395,412	\$ _____
(3) _____	_____	\$ _____	\$ _____
(4) _____	_____	\$ _____	\$ _____

4. PROPOSED FACILITY AND PROJECT

(A) Name and Type
Health Sciences - Unit F
University of Minnesota
Teaching Facilities for
School of Nursing and College of Pharmacy

Address (street, city, county, congressional district, state, zip code)
University of Minnesota
Minneapolis, Minnesota 55455

(C) Type of construction (Check all that apply)

- New facility
- Expansion of existing facility
- Remodeling
- Acquisition
- Equipment only
- Other (specify)

(D) Type of Ownership

- Public
- Other Nonprofit

(E) Type of operational control in other than the owner

- Public
- Other Nonprofit

5. APPLICANT'S REPRESENTATIVE (Name, title, address, telephone number)
Clinton T. Johnson, Assistant Vice President,
Business Administration and Treasurer
University of Minnesota
302 Morrill Hall
Minneapolis, Minnesota 55455
(612) 373-2058

6. PROJECT ARCHITECT (Name, address, telephone number)
The Architects Collaborative, Inc.
Architects and Master Planners
46 Brattle Street
Cambridge, Massachusetts 02138
(617) 868-4200

PROGRAM INFORMATION

7. APPLICANT ELIGIBILITY AND NEED FOR FACILITY See page **22**

(See program instructions for detailed requirements for this item)

8. OCCUPANCY DATA See page **41**

(See program instructions for detailed requirements for this item)

9. DESCRIPTION OF PROGRAMS TO BE CONDUCTED IN FACILITY See page **46**

(See program instructions for detailed requirements for this item)

10. DESCRIPTION OF FACILITY See page **163**

(See program instructions for detailed requirements for this item)

FACILITY INFORMATION

11. APPLICANT'S FINANCIAL RESOURCES APPLICABLE TO THIS FACILITY

A. Cash and negotiable and non-negotiable securities \$ _____

B. Pledges: Face value: \$ _____

Discounted Value \$ _____

C. Contingent gifts and bequests \$ _____

D. Bonds authorized but not yet sold \$ _____

E. Mortgage \$ _____

F. Appropriations:

		Available (specify date)	Anticipated (specify date)
	1969 -	\$ 318,000	
State	1971 -	\$ 1,351,400	\$ 10,060,365 - 1976
Local		\$ _____	\$ _____

TOTAL \$ 11,729,765

G. Other (Specify) \$ _____

H. TOTAL \$ _____

12. OTHER FEDERAL ASSISTANCE FOR THIS PROPOSED FACILITY

PROGRAM	FED. AGENCY	STATUS	AMOUNT	PROJECT NUMBER
A.				
B.				
C.	NONE	NONE	NONE	NONE

13. TOTAL DEVELOPMENT COST

(Sum of items 3, 11, and 12) \$ 20,948,938

14. SITE AND IMPROVEMENTS

A. Title or Other Interest in Site is ~~or will~~ be Vested in:

 x Applicant _____ Agency or institution which is to operate the facility

_____ Other (specify)

B. Indicate whether applicant/operator has:

_____ Fee simple title _____ Leasehold interest _____ Other (specify)

C. If applicant/operator has leasehold interest, give following information:

(1) Length of lease or other estate interest: _____

(2) Number of years to run: _____

(3) Is lease renewable? ___ Yes ___ No

(4) Current appraised value of land: \$ _____

(5) Annual rental: \$ _____

D. Attach an opinion from acceptable title counsel describing the interest applicant operator has in the site and certifying that the estate or interest is legal and valid.

E. Attach site survey, soil investigation reports and where applicable copies of land appraisals.

F. Where applicable attach certification from architect on the feasibility of improving existing structures.

G. Attach plot plan.

15. CONSTRUCTION SCHEDULE ESTIMATES:

A. Target dates for completion of drawings:

Schematics Complete Preliminary Complete Final November, 1975

B. Target dates for: Bid advertising April, 1976; Contract award June, 1976;

Construction completed June, 1978; Occupancy June-December, 1978;

16. BUDGET INFORMATION
ESTIMATED FACILITY BUDGET

A. Building identification: _____
(if more than one structure)

B. Budget Line	C. New construction	D. Other (identify)	E. Total
1. Building work			
a. General construction	\$ 9,141,530	\$ ---	\$ 9,141,530
b. Plumbing	1,191,070	---	1,191,070
c. Heating, air cond., ventilation	2,392,730	---	2,392,730
d. Electrical work	1,422,400	---	1,422,400
e. Elevators	315,940	---	315,940
f. Other building work (attach list and itemization of costs)	11,000	---	11,000
g. TOTAL FOR BUILDING WORK	14,474,670	---	14,474,670
2. Site work			
a. Site preparation	3,000	---	3,000
b. Site development and parking facilities	165,000	---	165,000
c. Utility connecting lines	51,000	---	51,000
d. Special use items	---	---	---
e. TOTAL FOR SITE WORK	219,000	---	219,000

ESTIMATED FACILITY BUDGET (Cont'd.)

B. Budget Line	C. New construction	D. Other (identify)	E. Total
3. Off-site work			
a. Connecting lines to central utility plant	\$	\$	\$
b. Other items (list and itemize costs)			
c. TOTAL FOR OFF-SITE WORK			
∞ 4. Central utility plant (prorata share for this structure)	239,817	---	239,817
5. TOTAL-CONSTRUCTION COSTS	14,933,487	---	14,933,487
6. Built-in equipment	824,030	---	824,030
7. Architectural and engineering costs			
a. Architect's basic fee	1,130,139		1,130,139
b. Supervision and inspection (project representative)	191,096	---	191,096
c. Surveys, tests, and borings	37,000	---	37,000
d. Other items (list and itemize costs)	60,000	---	60,000
e. TOTAL-ARCHITECTURAL AND ENGINEERING COST	1,418,235	---	1,418,235

ESTIMATED FACILITY BUDGET (Cont'd.)

B. Budget Line	C. New construction	D. Other (Identify)	E. Total
8. Movable equipment	\$ 2,293,155	\$ ---	\$ 2,293,155
9. TOTAL COST FOR CONSTRUCTION FIXED EQUIP. A/E FEES AND MOVABLE EQUIPMENT	19,468,907	---	19,468,907
10. Contingency	458,631	---	458,631
11. Purchase of Land	1,021,400	---	1,021,400
12. Purchase of Buildings			
13. Other (list and itemize)			
14. Subtotal-Lines 9 to 13 incl.			
15. Works of Art			
16. TOTAL DEVELOPMENT COST	\$ 20,948,938	\$ ---	\$ 20,948,938

17. SPACE ALLOCATION BY GRANT PROGRAM

A. Building identification (if more than one structure) _____					
B. Gross area in facility _____ 213,039 _____ S.F.		C. Net area in facility _____ 111,584 _____ S.F.			
Alternate I	GRANT PROGRAMS				5) APPLICANT SPACE
	1) 41 PROGRAM CODE	2) 43 PROGRAM CODE	3) PROGRAM CODE	4) PROGRAM CODE	
D. Net area by program(s)	56,384 SF	37,457 SF	SF	SF	17,743 SF
E. Cost allocation ratio by programs (D/C X 100—to two decimals)	50 %	34 %	%	%	16 %
Alternate II					
F. Gross area by program(s)	SF	SF	SF	SF	SF
G. Cost allocation ratio by programs (F/B X 100—to two decimals)	%	%	%	%	%

COSTS ELIGIBLE FOR FEDERAL PARTICIPATION
(BY PROGRAMS)

A. Budget line	B. Total cost (col. E, item 16)	C. Total eligible cost	D. Amounts eligible for Federal participation (for each grant program)			
			1) Program code 41, 50 %	2) Program code 43, 34 %	3) Program code _____ %	4) Program code _____, _____ %
			from item 17E X or 17G	from item 17E X or 17G	from item 17E — or 17G —	from item 17E — or 17G —
1g. Building work	\$ 14,474,670	\$ 14,474,670	\$ 7,237,335	\$ 4,921,388	\$	\$
2e. Site work	219,000	133,508	66,754	45,393		
3c. Off-site work	---	---	---	---		
4. Central utility plant	239,817	239,817	119,908	81,538		
6. Fixed equipment	824,030	824,030	412,015	280,170		
7e. A/E costs	1,418,235	871,235	435,617	296,220		
8. Movable equipment	2,293,155	2,293,155	1,146,577	779,673		
10. Contingency	458,631	458,631	229,315	155,935		
11. Purchase of Land	1,021,400	---	---	---		
12. Purchases of Building(s)						
13. Other						
15. Works of Art						
16. TOTALS (1g. through 15)	\$ 20,948,938	\$ 19,295,046	\$ 9,647,521	\$ 6,560,317	\$	\$
17. Amount of Fed. Assist Requested			\$ 4,823,761	\$ 4,395,412	\$	\$
18. Fed. Share Request— Percentage			50%	67%	%	%

19. ASSURANCES

The following assurances are divided into two parts. Part A assurances are required for all applicants applying for construction program support including the acquisition of facilities where applicable, from the Department of Health, Education, and Welfare. Part B assurances are ones which relate only to individual construction grant or loan programs. Signature by the applicant's representative will indicate that the institution agrees to all Part A assurances and to the Part B assurances required by the program or programs to which it is applying for support.

The applicant gives assurance that:

Part A.

1. It possesses legal authority to apply for and receive the grant or loan, and to finance and construct the proposed facilities; that a resolution, motion or similar action has been duly adopted or passed as an official act of the applicant's governing board, authorizing the filing of the application, including all understandings and assurances contained therein, and directing and authorizing the person identified as the official representative of the applicant to act in connection with the application and to provide such additional information as may be required.
2. It will comply with the provisions of the National Environmental Policy Act, PL 91-190; Executive Order 11296, relating to flood-plain elevation and necessary controls; and Executive Order 11288 relating to the prevention, control, and abatement of water pollution.
3. Sufficient funds will be available to meet the non-Federal share of the cost of constructing the facility, and that sufficient funds will be available when construction is completed to assure effective operation and maintenance of the facility for the purposes for which constructed.
4. Approval by the HEW Secretary or his designee* of the final working drawings and specifications will be obtained before the project is advertised or placed on the market for bidding; that it will construct the project, or cause it to be constructed, to final completion in accordance with the application and approved drawings and specifications; that it will submit to the Secretary or his designee for prior approval changes that materially alter the scope or costs of the project, use of space, or functional layout; that it will not enter into a construction contract(s) for the project or a part thereof until the conditions of the construction grant or loan programs have been met.
5. Except as otherwise provided by State/local law, all contracting for construction (including the purchase and installation of built-in equipment) shall be on a lump sum fixed-price basis, and contracts will be awarded on the basis of competitive bidding with award of the contract to the lowest responsive and responsible bidder. The provision for exceptions based on State and local law will not be invoked to give local contractors or suppliers a percentage preference over non-local contractors bidding for the same contract. Such practices are precluded by this assurance.
6. Except as otherwise provided by law, all laborers and mechanics employed by contractors and subcontractors on all construction and minor remodeling projects will be paid wages at rates not less than those prevailing as determined by the Secretary of Labor in accordance with the Davis-Bacon Act, as amended (40 U.S.C. 276a-276a-5) and 29 CFR Part 1, and shall receive overtime compensation in accordance with and subject to the provisions of the Contract Work Hours Standards Act (40 U.S.C. 327-332); that such contractors and subcontractors shall comply with the provisions of 29 CFR Part 3; and that all construction contracts and subcontracts shall incorporate the contract clauses required by 29 CFR 5.5(a) and (c). Such contracts shall also include the applicable provisions of Executive Order 11246, as amended (Nondiscrimination in Construction Contract Employment), and the applicant shall otherwise comply with the requirements of section 301 of said Executive Order. The contractor shall furnish performance and payment bonds, each in the amount of the full contract price; and provide, during the life of the contract, for adequate fire, public liability, property damage, and workmen's compensation insurance.
7. It will provide and maintain competent and adequate architectural engineering supervision and inspection at the construction site to insure that the completed work conforms with the approved drawings and specifications; that it will furnish progress reports and such other information as the Secretary or his designee may require.
8. An assurance of compliance with Title VI of the Civil Rights Act of 1964 (Form HEW 441) applying to the facility described in this application was filed or is attached to this application.
9. It will maintain grant or loan accounting records (identifiable by grant or loan number), including all records relating to the receipt and expenditure of Federal grant or loan funds and to the expenditure of the non-Federal share of the cost of a project, for three years after the completion of the project if an audit is conducted by or on behalf of the Department within that period, or in the case where no audit is performed, for five years; except that should audit questions arise with respect to the grant or loan, the records will be maintained until all such questions are resolved. Representatives of the Federal Government shall have access at all reasonable times to the grantee's records and to work whenever it is in preparation or progress, and the contractor shall provide proper facilities for such access and inspection.
10. The facility will be operated and maintained in accordance with the requirements of

*The term Secretary or his designee shall mean Commissioner of Education with respect to Office of Education programs.

applicable Federal, State and local agencies for the maintenance and operation of such facilities.

11. The applicant will require the facility to be designed to comply with the "American Standard Specifications for Making Buildings and Facilities Accessible to, and Usable by, the Physically Handicapped," Number A117.1-1961, as modified by other standards prescribed by the Secretary of HEW or the Administrator of General Services. The applicant will be responsible for conducting inspections to insure compliance with these specifications by the contractor.
12. The applicant will cause work on the project to be commenced within a reasonable time after receipt of notification from the Secretary or his designee that funds have been awarded, and that the project will be prosecuted to completion with reasonable diligence.
13. Any Federal funds received pursuant to a grant or loan will be used solely for defraying the development cost of the proposed project.

Part B.

1. Hill-Burton, Community Mental Health Centers, and Mental Retardation Facilities.

- a. That it will conform to all the applicable requirements of the appropriate State plan and the regulations pertaining thereto.
- b. That all portions and services of the entire facility for the construction of which, or in connection with which, aid is sought, will be made available without discrimination on account of creed, and no professionally qualified person will be discriminated against on account of creed with respect to the privilege of professional practice in the facility.
- c. That the facility will furnish a community service and:
 - (1) will furnish below cost or without charge a reasonable volume of services to persons unable to pay therefore; or
 - (2) will NOT furnish below cost or without charge a reasonable volume of services to persons unable to pay therefore, because of the justification which is attached.
- d. The facility will be used for the purposes for which it is constructed for not less than 20 years after the completion of the construction.

2. Community Mental Health Centers:

That the services to be provided by the facility, alone or in conjunction with other facilities owned or operated by the applicant, will be made available for a program providing principally for persons residing in a particular community or communities in or near which

such facility is to be situated, at least the essential elements of comprehensive mental health services-i.e., inpatient services, outpatient services, partial hospitalization services (including at least day care services), emergency services provided 24 hours per day, and consultation and education services available to community agencies and professional personnel.

3. Health Professions and Allied Health Professions Teaching Facilities, Nurse Training Facilities, Medical Library Facilities, and Health Research Facilities.

- a. The facility will not be used for sectarian instruction or as a place for religious worship.
- b. The Health Professions Teaching facility is intended to be used for the purpose set forth in this application.
- c. The Allied Health Professions Teaching facility or Health Research facility will be used for the purpose for which it is constructed for not less than 10 years after the completion of construction.
- d. The Nurse Training facility or Medical Library facility will be used for the purpose for which it is constructed for not less than 20 years after the completion of construction.
- e. The Health or Allied Health Professions Training facility or Nurse Training facility will provide for increased enrollment as set forth in the program instructions and in this application.

4. School Construction under P.L. 81-815:

- a. It is a local educational agency having administrative control and direction of free public elementary or secondary education in the applicant school district, or a State agency which has the responsibility for providing school facilities.
- b. It is a local educational agency created and authorized to construct and maintain school buildings under constitutional, statutory, or charter provisions; and that it may accept and disburse Federal funds to aid in financing the cost of constructing school buildings in accordance with constitutional, statutory, or charter provisions cited:

Legal Classification:

Citation:

- c. The applicant has or will have title to the site or the right to build the school facilities on the site and to maintain them on the site for at least twenty years.
- d. The applicant's school facilities will be available to the children for whose education contributions are provided with funds under Public Law 81-815, as amended, on the same terms, in accordance with the laws of the State in which applicant is situated, as they are available to other children in applicant's school district.

- e. The applicant will cause due consideration to be given to excellence of architecture and design of project and to the inclusion of works of art the cost of which does not exceed one percent of the Federal share of the cost of the project.
5. Higher Education Facilities under Titles I, II, III of the Higher Education Facilities Act.
- a. No part of the eligible areas included in the proposed project: (1) is intended primarily for events for which admission is to be charged to the general public; (2) is especially designed for athletic or recreational activities other than for an academic course in physical education; (3) will be used for sectarian instruction or as a place for religious worship or primarily in connection with any part of the program of a school or department of divinity (as defined in P.L. 88-204); or (4) will be used by a "school of medicine," "school of dentistry," "school of osteopathy," "school of pharmacy," "school of optometry," "school of podiatry," or "school of public health" as these terms are defined in section 724 of the Public Health Service Act, or by a "school of nursing" as defined in that Act under section 843.
- b. The applicant is fully cognizant of the requirements regarding economical methods of purchase of movable equipment in accordance with sound business practice, as set forth in the applicable regulations, (45 CFR 170.4), and all movable equipment, the cost of which is to be charged to the project, will be procured in accordance with such regulations. It is understood and agreed by

the applicant that the eligible project development cost and the Federal grant or loan amount may be reduced at settlement by the Commissioner of Education based on the amount of any costs claimed under the project which are for elaborate or extravagant equipment items.

- c. It is understood and agreed by the applicant that the Commissioner of Education may, from time to time, after execution of a grant or loan agreement for the project, and prior to final settlement under the grant or loan agreement, make downward amendments in the grant or loan amount to adjust to a reduction in the cost of the facilities, the identification of ineligible costs, or a reduction in the size of the project.
- d. The applicant has reviewed the academic and financial requirements for operation of the facilities upon completion, and considers the plans for operation of the facilities to be practical and within the financial capabilities of the institution.
- e. The facility will be used as an academic facility for not less than twenty (20) years after completion of construction (unless otherwise approved by the U.S. Commissioner of Education), or for so long as the Government holds any of the bonds pursuant to a loan from the Government, whichever is longer.

20. CERTIFICATION BY APPLICANT

The applicant hereby certifies that the foregoing information in this application (including all assurances and all attachments) are correct to the best of its knowledge and belief.

Regents of the University of
Minnesota

(Legal Name of Applicant)

C.T. Johnson

(Signature of Authorized Officer)

C.T. Johnson, Assistant Vice
President, Business Administration

(Typed Name and Title of Authorized
Officer)

Assistant Vice President
Business Administration

Morrill Hall, Minneapolis, Minnesota

(Address)

(Address if different than above)

March 17, 1975

(Date of Application)

UNIVERSITY OF MINNESOTA
TWIN CITIES

Office of the University Attorney
330 Morrill Hall
Minneapolis, Minnesota 55455
(612) 373-3446

March 29, 1974

Regents of the University of Minnesota
Fourth Floor, Morrill Hall
Minneapolis, Minnesota 55455

Attention: Duane Z. Wilson, Secretary

Re: Title Opinion
Health Sciences Expansion - Hall E

Gentlemen:

I have investigated and questioned the location of the site or sites, rights-of-way, and easements being provided by the applicant for the facilities in its application for Federal Aid entitled above to be constructed, operated and maintained thereon, described as follows:

All of the northerly 117.75 feet of "Barney's Subdivision of Lots 3, 4 and 5 of St. Anthony" as shown in the official plat, quarter of Block, Hennepin County, Minneapolis, Minnesota, lying south of the southerly right of way line of Minnesota Highway 52.

I have examined the records of ownership of said sites and the applicant holds fee simple title, free and clear of all claims and encumbrances except for the following:

The alley adjacent to the westerly property, Line of Lots 1, 2, 3 and 4 which will be vacated.

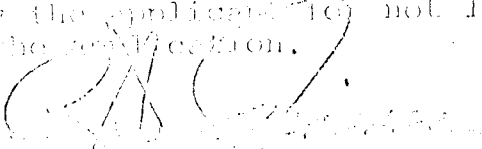
The encroachment above ground elevation North of the North Line of Jackson Avenue, also known as Elmwood Drive, 17'. The easement for utility purposes as shown and indicated by the Minnesota Electric Corporation.

March 29, 1974

Regents of the University of Minnesota
Page Two

In my opinion, the applicant has and will have upon completion of vacated alley and air rights, sufficient legal interest in the said site, rights-of-way, and easements to permit the construction of such facilities thereon and to permit the operation and maintenance of such facilities thereon by the applicant for not less than seventy-five years from the date of the certification.

Dated: March 29, 1974


R. Paul Runkel, Attorney at Law
300 Marshall Hall
University of Minnesota
St. Paul, Minnesota 55455

ABSTRACT

The project proposes construction of Unit F of the Health Sciences master plan. The present 17,455 assignable square feet of Nursing space will be replaced by 37,457 net square feet of newly constructed space, the subject of this application. The total facility will also house the College of Pharmacy, and Health Sciences shared facilities for a total project of 111,584 square feet of assignable space. The joining of facilities for the School of Nursing and the College of Pharmacy into one building is consistent with the interdisciplinary concept developed in the master plan. This is particularly congenial since Pharmacy and Nursing have had joint educational ventures and are planning additional ones. This new space along with other shared classroom, library and learning centers, and clinical facilities, will serve the School of Nursing's space needs. The School's present space is severely deficient in teaching and practice areas for the various nursing skills - in research and project grant space, in space for students and for faculty offices and conference rooms. The skills areas will include: helping relationships skills with individuals and groups, traditional procedural skills, critical care skills, health assessment of both adults and children including physical assessment skills. Research and project grant activities have increased dramatically in the past four years and are expected to remain at this level in order to meet the School's commitment to scholarly productivity and to provide investigative experience for graduate students. In order to meet this region's needs, the graduate program must expand considerably. The baccalaureate program will grow less dramatically but will continue to serve as developer and demonstrator of innovative approaches for other nursing schools. At present, the following innovative approaches are being tested: career mobility for the able RN into a baccalaureate, career mobility for the nurse with a baccalaureate in another field into the master's in nursing, development and evaluation of a new baccalaureate curriculum built on a conceptual model, research projects in many areas such as care of the dying child at home, sodium transport across everted rat gut.

Enrollment commitment attendant with this proposal will provide a major expansion of graduate training of 50%, and a 5% increase in undergraduate enrollment.

Accomplishments expected to accrue from the project include ability to meet the University's part of the nursing manpower needs of the region, which are particularly acute at the graduate level; ongoing outputs from research and project activities including further development of a research environment supportive to the graduate program; improvement in faculty and student welfare from adequate office and meeting space.

As part of the Health Sciences master planning efforts, emphasis was placed on the desire to integrate the disciplines and maximize space and other resources.

With the ultimate objective of integrating the School of Nursing into the main Health Sciences complex, the phasing out of the School of Nursing's use of Powell Hall began with the completion of Unit A. Unit A, the first phase of the Health Sciences Expansion, primarily houses facilities for the School of Dentistry. Shared space, such as classrooms, auditoria, and seminar rooms, are currently used by the School of Nursing.

Positive aspects of this include, proceeding as planned for nursing integration into the Health Sciences complex and the eventual total move of the School of Nursing. At the same time however, the original completion date for construction of Units A, B/C and F was scheduled for 1974 in order to permit a major expansion of enrollments throughout the Health Sciences. The enrollment expansion has occurred. The total health sciences student body has increased from 3170 in 1969 to a current enrollment of 4557. The facilities construction has not kept pace and the total Health Sciences pressure for use of the shared facilities for this major enrollment expansion continues to grow as the full impact of increased first year enrollments during the past several years is fully realized.

The phasing out of use of Powell Hall space by the School of Nursing coupled with delay has resulted in fragmentation of the School of Nursing over a longer than planned period.

The completion of Unit F will permit the use of classrooms, seminar rooms and auditoria that, in terms of the School of Nursing, will:

1. Permit the School to overcome problems encountered by the current fragmentation.
2. Provide nursing skills facility not presently available.
3. Provide appropriate faculty facilities (currently all faculty offices are shared and are housed in three different buildings).
4. Permit confidential counseling of students.
5. Provide facilities for practice of nursing skills.
6. Provide the essential integration of the School of Nursing into the Health Sciences complex where the School of Dentistry, Medical School and School of Public Health are housed.

The total dollar magnitude of Unit F is approximately \$20 million. The first phase of the Health Sciences Expansion included Units A, B/C, F and remodeling of specific vacated space. The approximate dollar magnitude of Phase I is \$150,000,000.

Summary of Response to Criteria

Criterion 1: The effectiveness of the project in accomplishing the purposes of the program at the least relative cost to the Federal Government.

This facility will enable the School of Nursing to accomplish the objectives of: 1) increased graduate training opportunities consistent with state-wide plans for nursing education, 2) replace obsolete facilities which currently create an unhealthy educational environment for nursing students as described on page 26, 3) provide research opportunities currently limited but essential for graduate education, 4) complete the physical facilities necessary to integrate the School of Nursing with other health science disciplines in accordance with the conceptual framework of the Master Plan.

Unit F will permit the College of Pharmacy and School of Nursing to be fully integrated with medicine, dentistry, public health and allied health. This proposal is designed as a joint proposal for the purpose of accomplishing the project with economies to be realized from shared facilities.

While the facility under construction has a somewhat higher than usual construction cost due to the tied-in site and the flexible design established for the entire Center, a special effort has been made to assure maximum usage of the facility. This is particularly true of much of the area to be shared by nursing and pharmacy. For this application, the School is requesting a 67% federal match for that portion of the building necessary for the School of Nursing program. The remainder of the funds will come from private and State sources. Evidence of State of Minnesota support for the project is evidenced by the appropriations noted on page 5 of the HEW form 537. The State Legislature provided funds in 1969 for planning and working drawings for the entire Health Sciences project of Units A, B/C and F. In 1971 over \$1 million was appropriated for land acquisition and program planning for Unit F.

The Health Sciences expansion was carefully scrutinized by the Board of Regents, the Metropolitan Council ("B" Agency), the State Comprehensive Health Planning Agency ("A" Agency) and State legislative committees. It is considered to be the least costly alternative which would fulfill the specified requirements. The current proposal providing facilities for nursing and pharmacy is the result of several years of investigation, planning and discussion with official groups within the state.

Criterion 2: Effectiveness of the project to provide increased training opportunities.

The enrollment expansion does exceed that for capitation purposes. It is expected that clinical, educational and student applicant resources will be available; the projections are fully compatible with the state-wide plan for nursing education developed by Minnesota Higher Education Coordinating Commission. The Minnesota Board of Nursing is also supportive of the plans. The Commission will, through the program approval mechanism, effect more equitable geographic distribution of training programs in the state. The School of Nursing, through the South-west Minnesota Consortium, Agassiz Valley Consortium, Area Health Education Center, Feasibility Study for a Partially External Master's Degree, and its open policy for receiving statements of need from communities in the State and Region, is actively affecting geographic distribution of nurse training opportunities. Page 41 provides current enrollment information and indicates that with the new facilities the School of Nursing will increase its undergraduate enrollment by 5% and graduate enrollment by 50%. A specific response to the effectiveness of this project to provide increased opportunities can be found on page 44.

Criterion 3: The applicant's effort in providing opportunities for all students including minority, disadvantaged groups.

Special program for admission and progression for disadvantaged minority students has been in operation for four years, partially supported by the Opportunities in Health for Minorities, which is a Health Sciences-wide program. The school has a special program (same terminal objectives) for RN students seeking the Baccalaureate in Nursing, which has been in operation for two years, with the additional likelihood of offering that program in one or two out-state sites. The School has a special project grant to study the entering competencies of students into the graduate program in Nursing, including qualified RN's whose baccalaureate is in a field other than nursing. See Page 83 for programs in the School for disadvantaged students.

Criterion 4: Utilization of the proposed facility or relationship of program to equipment only request.

The proposed space has been planned to serve enlarging missions of the School (Research and Graduate education), numbers of faculty needed for the programs, facilities to teach content necessary to modern curriculums such as health assessment and helping relationships skills labs. Scheduling plans by course number with size of class indicated have been completed. Complete plans for implementing the school's program in the facility are described on Page 147.

Criterion 5: The availability of financial resources to operate the program. (See Chart on page 123.)

The amount of financial resources necessary have been projected and are expected to be available. Since the School is a unit of the University, stable financial circumstances have always existed. New directions projected will require shifting of funds and/or finding new sources. Four new faculty positions have been requested from state funds this year to meet the current program needs. Response to date regarding this request has been supportive.

Criterion 6: Availability of school personnel to implement present and projected program.

The School of Nursing faculty has doubled in number during the past five years. Six years ago one faculty member was prepared at the Doctoral level; at present there are seven who have been awarded degrees and five who have made substantial progress toward completion of doctoral preparation. As the undergraduate curriculum development project phases out and physical facilities are improved, it is anticipated that no increase in undergraduate faculty will be necessary.

Currently eight full time faculty are available for graduate instruction and ten additional faculty devote a significant portion of time to graduate teaching and advisement. The projected enrollment would result in a full time equivalent faculty-student ratio of 1:4. There are approximately 15 additional doctoral candidates at various stages of study in other departments of the University. Ongoing recruitment efforts will consider those and other candidates. See pages 118 and 119.

Criterion 7: The relationship and compatibility of the project to state, regional, or local planning for nursing education.

A statewide plan for nursing education has been developed by the Nursing Education Advisory Committee of the Minnesota Higher Education Coordinating Commission. The 1975 report entitled "Nursing Education in Minnesota" is included in the appendix on Page 222. The School's Associate Dean is an active member of that Committee and has participated in the planning of this proposal to insure that the University of Minnesota's plans for Unit F and enrollment increases are fully consistent with the state-wide plan.

Criterion 8: Need for new faculty and/or equipment.

The expanded enrollment projected to meet the needs of the region, as outlined on page 22 particularly in graduate education will not be possible without replacement of the current obsolete facilities of the School of Nursing. Efforts, already limited by space constraints, to engage in research activities essential to a quality nursing education program will be seriously jeopardized. See page 143. The importance of conducting the School's programs in the integrated Health Sciences complex cannot be minimized.

Applicant Eligibility

Item 7

Statement of Need for Nursing Programs

The University of Minnesota School of Nursing serves as a key resource for this region, in graduate education, in innovative baccalaureate programming and in continuing education.

The 1975 study "Planning for Nursing Education in Minnesota" done by Minnesota Higher Education Coordinating Commission (see Appendix page 222). of output of nurses (both LPN and RN) found that the state was preparing sufficient nurses as a total pool. (The study excluded master's and higher degree nurses.) The model used studied the interactive relationships between the educational sector and the manpower market for nurses. The Commission has sponsored a study to determine the percentage of that total pool who should be prepared as LPN, RN (AD and baccalaureate). In terms of student demand, the School receives applications from three to four times as many qualified applicants as it can accept.

No regional study has been done of need for master's graduates. One indication of such need however is the following information provided by the Board of Nursing indicating that at least 269 nurse faculty members in RN preparing schools in this state do not have master's degrees. This does not reflect the unfilled positions in these schools, which we know exist. The Minnesota Higher Education Coordinating Commission (HECC) has accepted the Nursing Advisory Committee's position that priority attention needs to be paid to improvement of graduate nursing education (See Appendix,

"Nursing Education in Minnesota: A Status Report", page 303).

The School's enrollment projections are fully congruent with HECC's plan. It is expected that the major change in source of students for both programs will be an increase in those from rural areas of Minnesota. The School is preparing to offer its programs in outstate communities through arrangements with planning regions in the state. The graduate student enrollment source will also increase from rural areas of surrounding states. These program plans will serve to provide instruction close to the students' residence. In addition, it is expected that larger numbers of baccalaureate graduates (particularly the very able RN - B.S. students) will enter the graduate program as the pattern evolves.

Minnesota Nursing Programs
 Highest Earned Credential
 of Nurse Directors and Faculty

Program	Credential					
	No.	Doctorate	Masters	Bacc.	Assoc. Degree	Diploma
Baccalaureate						
Director	9	4	5	0	0	0
Faculty	164	3	114	46	0	1
Associate Degree						
Director	8	0	7	1	0	0
Faculty	106	1	41	58	6	0
Diploma						
Director	10	0	6	4	0	0
Faculty	201	0	29	154	0	18
Practical						
Director	27	0	1	26	0	0
Faculty	133	0	2	51	0	80
Total						
Director	54	4	19	31	0	0
Faculty	604	4	186	309	6	99

March, 1974

Collected by Minnesota Board of Nursing

Contribution of School to the Achievement of a
Desirable Level of Nurse Manpower

The University of Minnesota School of Nursing has contributed significantly to production of nursing manpower and has long been a leader in nursing education. It was the first school of nursing in a university setting; its graduates and programs have been known nationally and internationally. Below is a table which indicates numbers of graduates prepared by the School in the past ten years. This is not inclusive of the continuing education efforts, which during 1973-74 enrolled 4,000 students.

Recently, the School has been instrumental in development of the primary nursing method of delivering care; previously it has been known as an international center for study for nurses from a number of foreign countries as an early developer of master's preparation in nursing administration and other developments.

Numbers of Graduates from the University of Minnesota
School of Nursing Baccalaureate and Master's Programs, 1964-1974

	<u>B.S.</u>	<u>Master's</u>
1964	193	33
1965	120	38
1966	157	51
1967	137	37
1968	83	42
1969	76	36
1970	117	38
1971	128	43
1972	128	29
1973	153	50
1974	157	48
	<hr style="width: 50%; margin: 0 auto;"/> 1439	<hr style="width: 50%; margin: 0 auto;"/> 445

Total: 1884

engage in research activities which have been necessarily limited by space, would immediately cease if the School were not able to look forward to adequate facilities.

A specific recommendation by the Board of Nursing regarding the need for facilities is included in the Board's letter of accreditation on page 76.

The letter states, in part, that "... although some long-range plans for changing and adding facilities are acknowledged, it is recommended that the School of Nursing requests for facilities be accorded full support by the University."

The following pages summarize the School's current space, and indicates the specific deficiencies of each area.

Current Space and Its Utilization

A. General Purpose Classrooms

<u>Room Number</u>	<u>Sq. Ft.</u>	<u>Capacity</u>	<u>Remarks</u>
1305	1238	100	Amphitheater with closed circuit television. Ventilation is so poor that classes of only 100 can be scheduled although maximum capacity should be 150.
1326	443	30	Poor ventilation. Two levels below ground.
1413	325	20	Inconvenient for general scheduling. Students must pass through a laboratory class which is heavily scheduled to get to it. No power outlets.

B. Class Laboratories and Special Class Laboratories

<u>Room Number</u>	<u>Sq. Ft.</u>	<u>Capacity</u>	<u>Remarks</u>
	405	20	Equipped for video-taping and audio-visual presentations with observation window. Scheduled centrally (Special class lab).
1405	1369	15-20	Nursing tools and skills class laboratory equipped with 8 hospital beds, bed side units, area for table arm chairs. (Poor lighting. No privacy. Antiquated conditions.)
2112	672	10	Nursing tools and skills class laboratory with 8 hospital beds and related equipment. Space on loan from Hospitals until the end of the year only. Necessary to trade one of School's general program classrooms in order to obtain use.

C. Prepared Rooms and Service Rooms

<u>Room Number</u>	<u>Sq. Ft.</u>	<u>Remarks</u>
1323	321	Preparation room for 1305. Toilet facilities. See School Support Facilities.
1405-6	328	Preparation room for 1405 and 1404. Serves as office for three faculty members.
1408A, B	56	Storage for 1405

1410	26	Storage for 1405.
2313	18	A-V Booth for 1323
4310,7	32	Storage, general.

D. Faculty Office Space

<u>Room Number</u>	<u>Sq. Ft.</u>	<u>Capacity</u>	<u>Remarks</u>
3324	120	2	Two full time faculty.
4302	195	2	Two full time faculty.
4303	183	2	Two full time faculty.
4304*	221	1	Full time faculty.
4305	203	2	One full time faculty. One 50% time faculty.
4306	234	2	Two full time faculty.
4307*	195	1	One full time faculty.
4313	195	2	One full time faculty. One 50% time faculty
	195	1	One full time faculty.
	208	1	One full time faculty.
4318*	180	1	One full time faculty.
4322*	208	1	One full time faculty.
4324	229	2	Two full time faculty.
4327*	157	1	One full time faculty.
4408	192	1	One full time faculty. Principle Investigator of Federal Grant
4410	167	2	Two full time faculty.
4411	145	2	Two full time faculty.
4412	198	2	Two full time faculty.
4413	187	2	One full time faculty. One 50% time faculty.

4416	208	2	Two full time faculty.
4417	189	2	One full time faculty. One 20% undergraduate student counselor.
4400	225	2	Two full time faculty, conference and work area for project grant.
4404	175	2	Two full time faculty.
5306*	235	2	Two 75% time faculty.
5312	224	2	One full time faculty. One 50% time faculty.
5318	222	2	Two full time faculty.
5320	208	2	Two full time faculty.
5322	208	2	Two full time faculty.
5324	216	2	One full time faculty. One 75% time faculty.
5330-A	319	1	One full time secretary. Project office and work room for Federal Grant.
4318	451	4	One full time faculty, two 50% time faculty, one 20% graduate student counselor. Serves as conference room when possible.
2317	462	4	One 50%, one 75%, one 30% faculty. One 50% civil service (audio visual aid). Converted classroom. Classes moved to Unit A as faculty increased in numbers. Work area for Research Center across hall.
	150	2	One full time civil service. One 50% faculty. Conference and work room for grant project. Borrowed space on loan from planning office.
Front Hall			
137	189	3	Two full time faculty. One 50% time faculty.
139	189	2	One full time faculty. One 50% time faculty.
141	189	2	One full time faculty. One 50% time faculty.
143	189	1	Off campus. Faculty members and consultants and work space for special contracted projects.

* Offices have been thus assigned to alleviate pressure on limited conference and seminar space as these faculty members have heavy commitments in small group teaching and task force sub-committee and planning work as part of their assigned load.

E. Administration

<u>Room Number</u>	<u>Sq. Ft.</u>	<u>Capacity</u>	<u>Remarks</u>
2326	205	3	Two full time (faculty, civil service) One 50% research assistant. Research Center and consulting office
3303	170	1	One full time faculty. Research Coordinator
3307	176	1	Dean's Office
3319	176	1	One full time faculty. Coordinator for continuing education, work room and conference room for program.
3320	183	2	Admissions and records office. One full time civil service, one 50% time student aid.
3320A	120	1	One full time civil service, admissions and records
3320B	120		Active storage, files for admission and records
3321	170	1	Associate Dean
3327	167	2	One full time faculty (student personnel director), one full time civil service.
3330	150	2	Two full time civil service (account clerks)
3330A	150	1	Administrative Officer
3302	500	5	Secretarial Pool. Three full time secretaries, one 80% secretary, one 50% secretary.
3305	176	10	Conference room. Only formally fitted conference room in School.
3313	176	2	General School office. Two full time secretaries (receptionist).
3401	42		Inactive storage Admissions and Records, A-V storage.
3402	159.		Duplicating room, work room for clerics and staff.

4406	90		A-V Storage for soft ware, curriculum storage.
4409	106	1	One full time secretary for grant project.
2319	123		Storage of secretarial and office supplies.

F. School Support Facilities

<u>Room Number</u>	<u>Sq. Ft.</u>	<u>Capacity</u>	<u>Remarks</u>
1323	321	9	Student study carrels, to be equipped as audio-tutorial carrels when funds are made available.
2401	52		Mens locker room.
2408	705		Women's locker room and general student lounge.
4310	125		Faculty lounge, mail boxes, work space and conference space for clinicians

	<u>NET SQ. FT.</u>
General Purpose Classrooms	2006
Class Laboratories and Special Class Laboratories	2446
Preparation Rooms and Service Rooms	781
Faculty Office Space	7860
Administration	3159
School Support Facilities	1203

CLASSROOM UTILIZATION

School of Nursing Controlled Space

<u>Room Number</u>	<u>Capacity</u>	<u>Remarks</u>
1305	100	Amphitheater. Poor utilization due to: A. Inappropriate size and configuration for majority of classes scheduled; B. Poor ventilation and outdated equipment.
1326	30	Poor ventilation. Used heavily as committee/conference rooms. No audio-visual facilities.
1413	30	Classroom is internal space of class laboratory and can only be scheduled when it is convenient for students to pass through laboratory.
1405	15-20	Nursing tools class laboratory.
1404	20	Special class laboratory equipped for video taping and audio-visual presentations.
2112	10	Nursing tool laboratory space on loan from University Hospital, temporary arrangement for school year, 1974-1975.

Other Classrooms Utilized by the School of Nursing, Not Controlled by School, Shared with and in Competition for Use by all Health Science Units

<u>Building and Room Number*</u>	<u>Capacity</u>	<u>Average Hours Per Week Utilized by the School of Nursing</u>
Powell Hall 5327	10	13
Powell Hall 2309	25	50
Health Science Unit "A"		
1-526	16	6
1-528	12	10
2-107	16	7
2-113	16	7
2-122	16	6
2-126	16	7
2-146	16	14
2-154	16	8
2-520	87	3
2-533	26	1
2-548	20	7
2-564	16	12
2-580	110	6
2-585	30	4
2-620	236	2
2-629	16	7
2-633	10	5
2-639	16	3
2-672	14	7
2-676	10	5
2-680	16	3
2-693	8	5
2-697	16	10
Millard Hall 128	25	8

*Listings do not reflect clinical areas (stations) utilized in University Hospitals.



MINNESOTA BOARD of NURSING

717 Delaware Street Southeast

Minneapolis, Minnesota ~~55440~~ 55414

Telephone 612:296-5493

February 28, 1975

Dr. Isabel Harris, Dean
University of Minnesota
School of Nursing
3313 Powell Hall
Minneapolis, MN 55455

Dear Dr. Harris:

The Executive Committee of the Board has discussed the plans of the School of Nursing to request funds for the construction of a building to be occupied with the College of Pharmacy. The members were cognizant of your need for more and better designed space and felt that cooperative planning with another health discipline was wise.

We understand that the School intends to increase enrollment of generic students twenty percent by 1982. Since the Board has agreed to follow the guidelines of the Minnesota Higher Education Coordinating Commission relative to expansion of programs and since those guidelines are not projected seven years ahead, we have no official position on your plans. However, the Board does believe that an increase in the number of baccalaureate graduates in Minnesota is necessary as a foundation for increasing the number of graduates with higher degrees who are needed to fill leadership positions.

We wish you success with your grant request.

Sincerely,

A handwritten signature in cursive script, appearing to read "Joyce T. Schowalter".

Joyce T. Schowalter, R.N.
Executive Director

JNS/dh

DO NOT RE State Clearinghouse No. 1-R	Card Type 9	State of Minnesota NOTIFICATION OF INTENT TO APPLY FOR FEDERAL AID
--	-------------	--

10 11 01	Applicant Project Name 12 71 Unit F -University of Minnesota Health Sciences
02	Applicant Agency 12 45 University of Minnesota
03	Applicant Address (Street) 12 45 432 Morrill Hall
04	Contact Person 12 45 Lyle A. French, M.D., Vice President
05	12 71 Project Description - Nature, Purpose and Beneficiaries (Use 6 lines if needed) Unit F will consist of eleven levels, nine of which will be finished program space and
06	12 71 two of which will house mechanical equipment. Three levels of the building will be
07	12 71 below ground. The facility, located at Washington Avenue and Harvard Street on the
08	12 71 East Bank of the Minneapolis Campus, will house seminar rooms, classrooms, laboratory
09	12 71 support areas, faculty and administrative offices for the School of Nursing and College
10	12 71 of Pharmacy.

11	Project Location City 12 45 Minneapolis	Project Location County 46 79 Hennepin
----	---	--

	FEDERAL FUNDS		MINNESOTA MATCHING FUNDS		OTHER (E) Funds 44-51	TOTAL (F) Funds 52-60
	(A) Grant 12-19	(B) Other 20-27	(C) State 28-35	(D) Local 36-43		
12	10000000		7000000		3000000	20000000

13	Type of Other Federal Funds (B) 12 45	Type of Other Funds (E) 46 79 private contributions
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14	Federal Program Title 12 66 Title VII Section 729	Federal Catalog No. 67-71 A-95 Part I of OMB Circular
----	---	---

15	Federal Agency Name 12 45 Dept of Health Education Welfare	Federal Sub Agency 46 79 Public Health Service - Health Resources
----	--	---

TYPE OF APPLICANT (CHECK (X) ONLY ONE BOX)									
State	Inter-State	County	City	School District	Special District	Community Action	Sponsored Organization	Other	
<input type="checkbox"/> 12	<input checked="" type="checkbox"/> 13	<input type="checkbox"/> 14	<input type="checkbox"/> 15	<input type="checkbox"/> 16	<input type="checkbox"/> 17	<input type="checkbox"/> 18	<input type="checkbox"/> 19	<input type="checkbox"/> 20	

TYPE OF ACTION (CHECK (X) BOXES WHICH APPLY)									
17	New	<input checked="" type="checkbox"/> 21 Supplemental	<input type="checkbox"/> 23 Increase Duration	<input type="checkbox"/> 24 Increased Dollars	<input checked="" type="checkbox"/> 27				
	Continuation	<input checked="" type="checkbox"/> 22 Cancellation	<input type="checkbox"/> 26 Decrease Duration	<input type="checkbox"/> 25 Decrease Dollars	<input type="checkbox"/> 28				

Is State Plan Required?	Has Regional Agency been Notified?	Is Project under A-95 Jurisdiction?	DO NOT USE
Yes <input type="checkbox"/> 29 No <input type="checkbox"/> 30	Yes <input checked="" type="checkbox"/> 31 No <input type="checkbox"/> 32	Yes <input checked="" type="checkbox"/> 35 No <input type="checkbox"/> 36	Environmental Impact Statement Yes <input type="checkbox"/> 37 No <input type="checkbox"/> 38

Estimated Date Applicant Expects To Submit Formal Application March 17, 1975
(Date)

State Fund Code 62700 14 211

Signature *C. T. Johnson* Date February 11, 1975
Clinton T. Johnson, Asst Vice President, Business Administration and Treasurer

SUBMIT TWO (2) COPIES OF COMPLETED FORM TO:
 State Planning Agency
 Capitol Square Building
 550 Cedar Street
 St. Paul, Minnesota 55101

COMMENTS

16

UNIVERSITY OF MINNESOTA

Office of the Assistant Vice President and Treasurer
302 Morrill Hall
Minneapolis, Minnesota 55455

February 11, 1975

Metropolitan Council
300 Metro Square Building
7th Street and Robert Street
St. Paul, Minnesota 55101


Attention: John Boland, Chairman

Dear Mr. Boland:

In accordance with the procedure established under OMB Circular A-95, enclosed please find copies of notification forms which have been sent to the State Planning Agency indicating the University's intent to apply for federal construction funds for the following projects:

Unit F - College of Pharmacy - School of Nursing
Primary Care Clinic
Community University Health Care Center
Smiley's Point Family Practice Clinic
Chicago Avenue Family Practice Site
Basic Science Remodeling

Sincerely,


Clinton T. Johnson
Assistant Vice President
and Treasurer

CTJ/ct

Enclosures



STATE OF MINNESOTA

STATE PLANNING AGENCY
100 CAPITOL SQUARE BUILDING
550 CEDAR STREET
ST. PAUL, 55101

March 13, 1975

Mr. Clinton T. Johnson
Assistant Vice-President
Business Administration and Treasurer
Morrill Hall
University of Minnesota
Minneapolis, Minnesota 55455

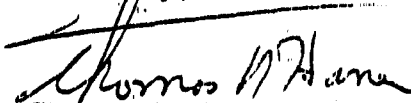
RE: Unit F - University of Minnesota Health Sciences
SCH # 75031304

Dear Mr. Johnson:

This is to certify that the Minnesota State Planning Agency has in accordance with the Project Notification and Review System (PNRS) procedures, established by the Office of Management and Budget Circular A-95, reviewed the Unit F - University of Minnesota Health Sciences proposal noted above. State agencies which may be interested in or affected by this proposal have been notified by our office.

This letter represents the final action of the State Planning Agency's review of the proposal in its performance of the function as the State Clearinghouse under the PNRS procedures. University of Minnesota is, therefore, authorized to submit its application without further notice or review by this agency. A copy of this letter should be attached to said application.

Sincerely,


Thomas N. Harren
State Clearinghouse



300 Metro Square Building, 7th Street and Robert Street, Saint Paul, Minnesota 55101 Area 612, 227-9421

February 28, 1975

Mr. Clinton T. Johnson
Assistant Vice President
Office of Assistant Vice President and Treasurer
302 Morrill Hall
Minneapolis, Minnesota 55455

RE: Unit F - College of Pharmacy - School of Nursing
Metropolitan Council Referral File No. 2500
Primary Care Clinic
Metropolitan Council Referral File No. 2501
Community University Health Care Center
Metropolitan Council Referral File No. 2502
Smiley's Point Family Practice Clinic
Metropolitan Council Referral File No. 2503
Chicago Avenue Family Practice Site
Metropolitan Council Referral File No. 2504
Basic Science Remodeling
Metropolitan Council Referral File No. 2505

Dear Mr. Johnson:

The University of Minnesota project notification for HEW funds to assist in the projects described above were received by the Metropolitan Council on February 18, 1975.

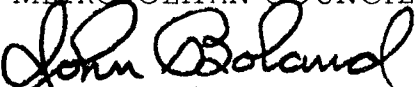
These projects will be reviewed in accordance with procedures of the Office of Management and Budget which require that the Council notify potentially affected units of government, neighborhood organizations, and human rights commissions and inform them that they have an opportunity to comment upon these projects.

Mr. Clinton T. Johnson
February 28, 1975
Page Two

Should the Council need more information before completing the review, the staff will write or call your office.

Thank you very much.

Sincerely yours,

METROPOLITAN COUNCIL

John Boland
Chairman

JB:emp

cc: Thomas Harren, Office of Local and Urban Affairs, State Planning Agency
Ms. Joan Campbell, Metropolitan Council District 6
Alton J. Gasper, Metropolitan Council District 8

ITEM #8

OCCUPANCY DATA

Information for the Program(s) for Which Federal Funds
are Being Requested in this Application

Type and Status of Program(s)

	Status	
	New	Existing
Diploma		
Associate		
Baccalaureate		X
Master's		X
Doctorate		
Continuing Education		X

Year and term when students are considered first-year students in nursing:

Fall, 2nd year

Number of classes admitted to nursing per year: One

Present Enrollment in Nursing Program(s) as of October 15, 1974

a. Undergraduate	Number of Students		
	Diploma	Associate Degree	Baccalaureate
1st year			155
2nd year			108
3rd year			137
4th year			
5th year			
Total			

b. Graduate	Master's	Doctorate
1st year	41	
2nd year	37	
Total	78	

The highest first year enrollment for any of the five full school years preceding the year in which application is made. (Using enrollment data as of October 15 of the school year.)

	Year	Number
Diploma		
Associate		
Baccalaureate	1974-75	155
Master's	1973-74	44
Doctorate		

Estimated first-year enrollment for each of the five full school years following completion of construction.

Year	Numbers of Students				
	First Year Undergraduate			First Year Graduate	
	Diploma	Associate Degree	Baccalaureate	Masters	Doctorate
1978			163	66	
1979			163	66	
1980			163	66	
1981			163	66	
1982			163	66	

Additional first-year students projected in the first year following completion of construction over the highest first-year enrollment shown in the third graph in this section.

Diploma	_____	Master's	22	(50%)
Associate Degree	_____	Doctorate	_____	
Baccalaureate	34			

Projected size of each class in each program for each of the first five years after construction is completed.

Projection of Student Enrollment After Completion of Facility

Undergraduate	1978	1979	1980	1981	1982
<u>Diploma or ADN</u>					
1st year					
2nd year					
3rd year					
<u>Baccalaureate</u>					
1st year					
2nd year	163	163	163	163	163
3rd year	155	163	163	163	163
4th year	155	155	163	163	163
5th year					
<u>Graduate</u>					
1st year	66	66	66	66	66
2nd year	55	66	66	66	66

Effectiveness of the Project to Provide Increased Training Opportunities

The projected enrollment is part of a long range program which is integral to the expansion of University of Minnesota health science enrollment to meet the needs of the state and region. For the past three years, the School of Nursing has had two-three times as many undergraduate applicants as can be admitted. Increases for Capitation Grants have already been met and are not part of the projected increases.

Projections of enrollment are consistent with a "Citizens League Report" of nursing needs for Minnesota published in 1970. This report highlighted the need for career mobility opportunities for registered nurses who are graduates of Associate Degree and Diploma programs. Expansion of enrollment in graduate programs described in this application have been developed to meet identified needs for qualified faculty to serve the 50 nursing education programs in Minnesota; to provide clinicians and nurse practitioners for programs such as intensive care, long term nursing and ambulatory care as well as nurses equipped to assume administrative roles in nursing service and nursing education.

Health Manpower Studies in recent years have indicated shortages of all health professionals in out-state areas.

This proposal will support major expansion of the graduate nursing program which serves the upper midwest area, e.g., northern Wisconsin, northern Iowa, Minnesota and the Dakota's. Unit F will enable the School of Nursing to provide the base center for this geographic area. A

feasibility study for a partially external Master's degree is presently in process and will provide more precise data to document this need.

The Higher Education Coordinating Commission is also studying the desirable "mix" of nurses prepared at various levels needed in the state. Requests for graduates of both baccalaureate and master's programs far exceed the number of graduates presently completing programs. This is particularly true of the graduate program where 150 direct requests are received per year for the approximately 30 students admitted.

Programs to be Conducted in the Facility
ITEM #9

Background of Program

Development of the School

The University of Minnesota School of Nursing was established March 1, 1909, as a result of the interest and effort of Dr. Richard Olding Beard. Although the educational offerings typified the then prevalent 3-year pattern of nurse training, it was the first preparatory program in nursing to be sponsored by a university in the United States. In 1919 a program in nursing leading to a baccalaureate degree was inaugurated. It was conducted concurrently with a shorter, nondegree program until discontinuance of the latter in 1947. The first programs leading to the professional Masters' degrees were initiated early in the 1950's. James Gray has portrayed the first 50 years of the school's history against a backdrop of changing times and evolving educational values in his book, Education for Nursing, published in 1960 by the University of Minnesota Press.

The School of Nursing assumes responsibility for the improvement of nursing care through its programs of nursing education, research, and service. The responsibilities related to research and service are fulfilled through activities such as continuing education for a variety of groups within the field of nursing, consultation services to individuals and agencies, and ongoing research in the area of nursing care of patients. In 1958 the University of Minnesota School of Nursing Foundation was established. Its purpose is improvement of patient care through appropriate assistance to the school in carrying forward programs of nursing education, research, and community service. This evidence of public interest and support indicates concern for quality in the preparation of professional practitioners for such a needed service as nursing.

Philosophy of Nursing

The goal of nursing is to assist an individual, group, or community move toward optimal health. Optimal health may be defined as a dynamic integration of man allowing for maximum human effectiveness.

Nursing is an interpersonal process which takes place in a milieu composed of participants, the climate they generate, and the social forces which affect them. The primary participants in this interpersonal process are the nurse and the recipient. The recipient (individual, group, or community who receives a desired or required service) is responsible for himself within his capabilities and, as such, has the right to both participate in decision making and to accept or reject the service offered. The nurse actively participates in decision making and assumes responsibility for her decisions.

The practitioner is perceived as the individual who delivers the service desired or required by the recipient. The service the nurse practitioner offers is directed toward assisting the recipient to utilize his strengths to attain the goal of optimal health. In an attempt to influence the recipient in moving toward his goal, the nurse participates in the practitioner-recipient relationship. This participation is based upon her breadth of knowledge and her awareness of the milieu. By means of an analytical process, the nurse assess the health status of the recipient and formulates, implements, and evaluates a plan of nursing intervention based on the unique health requirements of the recipient.

The nurse has the ability to establish a relationship with the recipient characterized by caring and to initiate and accept change in partnership with the recipient.

Philosophy of Nursing Education

The goal of nursing education is directed toward several dimensions of student development: her maturation toward a fully human person with an investigative orientation and her achievement of competencies as a developing professional in nursing.

Nursing education is a learning process that involves a relationship between student and teacher fostering independence on the part of the learner. It involves a progression of related learning experiences that are contemporary, challenging, and flexible. This process occurs in a milieu which encourages intellectual curiosity and mutual respect. This milieu assures the availability of a wide variety of professional, and academic and community resources.

The student is an active participant with teachers, peers, and others involved in the process of learning. The student is involved in establishing her identity as a nurse and human being. The learner evidences growth: in exercising her rights and responsibilities to challenge and question the educational process; and by being self-directive through utilizing resources, seeking educational experience, and increasing ability for self-evaluation. The teacher guides the student toward the goal of nursing education. The teacher possesses competencies relevant to nursing education and utilizes the milieu to enhance learning. The Long range goals of the School, described herein on page 51, have been developed within the framework of this philosophy.

Objectives of the Baccalaureate Program

In accord with the philosophy underlying the program, learnings of progressive complexity are planned to help students attain the following objectives:

1. An ability to apply synthesized principles and theoretical concepts from the natural and behavioral sciences to nursing.
2. An ability to utilize an adaptation frame of reference as a basis for interpreting and influencing human behavior in health care situations.
3. An ability to think critically and analytically in the formulation of nursing judgments.
4. An ability to effectively implement the various dimensions of the systematic process--assessment, planning, intervention, and evaluation in providing nursing care to individuals and groups.
5. An ability to establish, maintain, and terminate collaborative and/or helping interpersonal relationships with a variety of individuals and groups to accomplish the goal of nursing.
6. Competence in utilizing selected technical and other tools to accomplish the goals of nursing.
7. In an attempt to answer questions, has the ability to carry out clinical study arising from nursing practice and to determine implications for nursing practice and further study.
8. An ability and commitment to influence health care through utilization of principles of change, leadership, and teaching.
9. A commitment to development of his/her potential as an individual.

Objectives of the Master's Program

The nursing major is designed to enable the student to meet the following objectives:

1. Demonstrate ability to develop human relationships characterized by mutual response and responsibility within professional situations. The skill expectation is that of the primary practitioner.

2. Experience one's self, expressed in such areas as biases, values, and potential, being conscious of the influence of one's behavior.
3. Engage in innovative problem solving that reflects:
 - a. A refined identification and simple articulation of a problem
 - b. The utilization of several frames of reference
 - c. Discrimination of:
 - (1) Frames of reference
 - (2) Courses of action
 - (3) Consequences
4. Recognize when change is appropriate and development of skills that result in changes which improve the health of people.
5. Formulate ideas characterized by:
 - a. Relevance
 - b. Refinement
 - c. Orderliness
 - d. Expanded knowledge base
 - e. Originality
6. Identify a researchable nursing problem, to design and conduct a study; to evaluate and make increasingly discriminating use of research findings.
7. Demonstrate a course of action indicative of a self-directed learner.
8. Demonstrate an evolving and coherent personal nursing framework.

The philosophy and objectives of the Continuing Education program may be found in a later section of this proposal. It is important to note that this program is the only one in this state and region that has a faculty teaching master's students and so it serves as an important continuing education resource for the baccalaureate and master's prepared nurses in practice.

UNIVERSITY OF MINNESOTA
School of Nursing

Synopsis of Long Range Goals
February 15, 1975

1. Strengthening of All Curriculums

- a. The undergraduate program framework has been stabilized. The entire curriculum plan will have been implemented by 1976. The evaluation plan has been in effect for 2 years. Concentrated evaluation that is part of the Undergraduate Curriculum Grant will be completed by January, 1977.
- b. Increase flexibility in all programs to meet the demands of rapidly changing society and to meet needs of individual students.
- c. Enrich the existing graduate program as well as expand offerings. Enable variety in patterns of programs and development of new areas, to provide more comprehensive programs and development of new roles.
- d. Expand endeavors in Continuing Education to:
 1. Determine needs more effectively (survey now being done).
 2. Continue to expand and experiment with various target populations and programs to meet their needs.
 3. Evaluate the effectiveness of these efforts and establish priorities.
- e. Promote opportunity for active participation of faculty with other Schools within the University.
- f. Capitalize on faculty strengths through more flexible participation of faculty between undergraduate, graduate and continuing education programs.

2. Goals Related to Students

- a. Reassess criteria for selection of undergraduate and graduate students.
 1. Longterm commitment to disadvantaged students - for undergraduate students minimum enrollment of 5%.
 2. Achieve a student body characterized by aptitude in a wider variety of criteria (i.e., creativity, interpersonal skills) and representative more broadly of socio-economic class and national origin.

- b. Make a plan for enrollment based on projected needs in health care delivery.
 - 1. Accelerate the rate of expansion at the graduate level as rapidly as maintenance of standards of quality allow.
 - 2. Commitment to use all resources to maximize the success potential of individual students. This includes better advisement of undergraduate students in relation to potential for graduate study.

3. Goals Related to Faculty

- a. Improve faculty salaries and correct salary inequities within the school.
- b. Provide opportunity for individual faculty to increase competencies through involvement in such activities as clinical practice, organizational activities, research, writing, and opportunities to increase teaching skills - including skills in working with students with variety of backgrounds.
- c. More diversity on the faculty in terms of backgrounds of faculty members, with consideration to educational experience and cultural backgrounds.
- d. Active recruitment of faculty from a variety of sources, including practitioners. This could include development of use of clinicians of the faculty.
- e. Promote opportunity for active participation of faculty with other Schools within the University.
- f. Capitalize on faculty strengths through more flexible participation of faculty between undergraduate, graduate and continuing education programs.
- g. The School should be represented by periodic publications from its Faculty.

Goals Related to Physical Facilities and Supportive Services

- a. Increase office space in a single building to provide space and environment conducive to adequate functioning.
- b. Increase classroom space and improve flexibility in use of space for multiple purposes as well as scheduling.
- c. Increase flexibility, accessibility and adequacy of supportive services. In addition, effort should be made to make environment faculty-supportive personnel relationship as humanizing as possible.

5. Goals Related to Research

- a. Establish a nursing research area and/or develop research programs within existing areas. Ex.: a special unit in OPD where role of nurse in clinics can be studied and taught. Might be an interdisciplinary unit.
- b. Continuously have a minimum of 3 projects ongoing.
- c. Improve the climate of intellectual inquiry and dialogue to stimulate originality.
- d. The School should be represented by periodic research publications from its faculty.

6. Goals Related to Expansion of Interchange Between School of Nursing and Community.

- a. Increase our responsiveness to community needs through participation in planning and decision-making in health-related affairs.
- b. Seek greater involvement of community people in the affairs of the School in an effort to respond to community needs.
- c. Increased utilization of community facilities for student learning experiences. (Has occurred now).
- d. Establish more clear-cut channels to ease interchange, which might include: definition of our role in referral, news media coverage, more willingness to publicize our achievements, clearcut time lines for certain services and exchanges.

BR: scg
2/19/75

Community Relationships

The location of Unit F, on the north edge of the East Bank of the Minneapolis campus, is part of a total 301.74 acre University of Minnesota Twin Cities campus. The community is typically a University environment. Located in a major metropolitan area, the campus is situated between Minneapolis and St. Paul. Within the University community, Unit F will be constructed within the Health Sciences complex at the corner of Washington Avenue and Harvard Street adjacent to Unit A.

The planning process for the Master Plan of the Health Sciences began in 1964. Physical facilities were proposed in response to studies conducted by the University's Long Range Planning Committee. The Regents of the University determined the facilities to be essential to the maintenance of quality programs in the Health Sciences. The planning process included the need to introduce new programs and to provide increased training opportunities by a major enrollment expansion throughout the health sciences.

More than 100 health science faculty members participated in the planning effort. Most of that effort was devoted to programmatic study including an expression of goals and objectives and definition of instructional, research and service activities that are appropriate to the University's role in meeting the needs of the State of Minnesota and the Nation.

Major emphasis throughout the planning process was placed on the concept of integrating the disciplines by providing facilities that would encourage interaction among persons in all Health Sciences programs.

Internally, within the School of Nursing, a conceptual document regarding space needs was developed by the Associate Dean in 1974 and approved by the general faculty. These present building plans have operationalized those plans. With the change in the School's Constitution and Bylaws in May 1974, a new standing committee (the Faculty, Staff, Student Welfare and Resources Committee) had as part of its charge, plans for physical facilities for the School's development of policy regarding space management. That Committee has been fully involved in review of this present grant application.

The planned expansion has had and continues to have the support of the University Administration, the Board of Regents, the State of Minnesota and the Federal Government. Legislative support in 1969 included funding for planning and drawing for the entire expansion. In 1971 additional planning monies were appropriated and specific monies were provided for property acquisition for Unit F. The State further provided funding for Units A and B/C. The Bureau of Health Professions Manpower reviewed the Master Plan in 1970 and has since participated in the funding of two of the units of the project.

Public awareness of the project is evidenced by the fact that part of the total Health Sciences Expansion is complete, and part currently under construction. Media announcements regarding the plans, funding and construction of units throughout the past several years are too

numerous to include in this application. The certificate of need process required for the ambulatory care clinics portion of Unit B/C led to a joint effort of the Metropolitan Health Board and the Health Sciences to identify an underserved community for the purpose of establishing a primary care clinic which will serve that community as well as provide clinical experience for all health science students in such a setting.

The project notification letters included within this proposal provide evidence of approval by State and local planning agencies.

In addition, other Health Sciences involvement with related health agencies include:

Regional Planning and Coordination - The faculty and staff of the University of Minnesota Health Sciences serve in leadership roles in many local, regional and state planning efforts. Special efforts of the Schools of Nursing, and Pharmacy follow.

Comprehensive Health Planning - The Dean of the College of Pharmacy was Chairman of the Advisory Committee to the Minnesota Comprehensive Health Planning Program, 314-A agency, during its first years, 1969-1972. The Dean of the School of Public Health was a member of the Metropolitan Health Board, the health planning body for the 314-B agency, from 1970-1973. During this period, he served as Chairman of the subcommittee for developing with Health Chapter of the Metropolitan Development Guide. A nurse with University Hospitals serves on the Metropolitan Council, parent committee of the Metropolitan Health Board.

Area Health Education Center - The Area Health Education Center is a program for long range health manpower planning and development. Faculty from the University Health Sciences Center work together with provider and consumer groups in the 14-county Planning Area D to define health manpower needs and plan for creative response. AHEC is dedicated to regional planning and the coordination of resources for delivery of health care and education of health manpower.

The School of Nursing has been involved in AHEC, not only to provide continuing education to nurses in Area D but also to serve as a facilitator for plans for career mobility from A.D. or diploma prepared R.N. to the baccalaureate degree and for baccalaureate to the master's. Feasibility data for both programs are being gathered with the commitment to provide the programs should the data support them.

The School is heavily involved with career mobility programs in outstate areas, as well as at the Minneapolis campus. These are described below. The direct impact of such activities on space needs is that there has to be a strong, central facility to provide a base for faculty who may be teaching in School of Nursing programs outstate, as well as ample facilities for groups of students taking their program on a partially external format, to get some experiences at this campus. An example might be students in the teacher preparation portion of the master's program who may come to the Minneapolis campus for concentrated practice on teaching skills in the group helping relationships lab.

Nursing Advisory Committee to Minnesota Higher Education Coordinating Commission - Dr. Barbara Redman, Associate Dean of the School, has served on this Advisory Committee, which has focused on long-range manpower planning for nursing education in Minnesota. This Committee has adopted as a priority, urgent need for expansion of the pool of Master's degree prepared nurses. It is strongly supportive of options for career mobility. It currently is addressing the issue of the proportion of the nursing manpower pool which should be prepared at L.P.N., A.D., and baccalaureate levels.

The programs of the School, outlined in the present request for construction moneys, are fully consistent with the statewide plan for nursing education, as developed by the Advisory Committee, and adopted by the Higher Education Coordinating Commission.

Organizational Structure

The University is governed by a board of twelve regents elected for six year terms by the State Legislature. By tradition, eight of the regents are elected from congressional districts and four are elected on an at large capacity. The Regents of the University of Minnesota are by constitutional definition (reaffirmed by court decision) an autonomous body. Responsibility for academic matters has been directed by the Board of Regents to the respective collegiate faculties with all University matters in this area managed through a representative elected Senate of faculty and students.

The President of the University is a member of the Board of Regents. Under his authority are six vice presidents with responsibilities as follows: Vice President for Academic Administration, Administrative Operations, Finance, Health Sciences, Institutional Planning and Relations, Student Affairs.

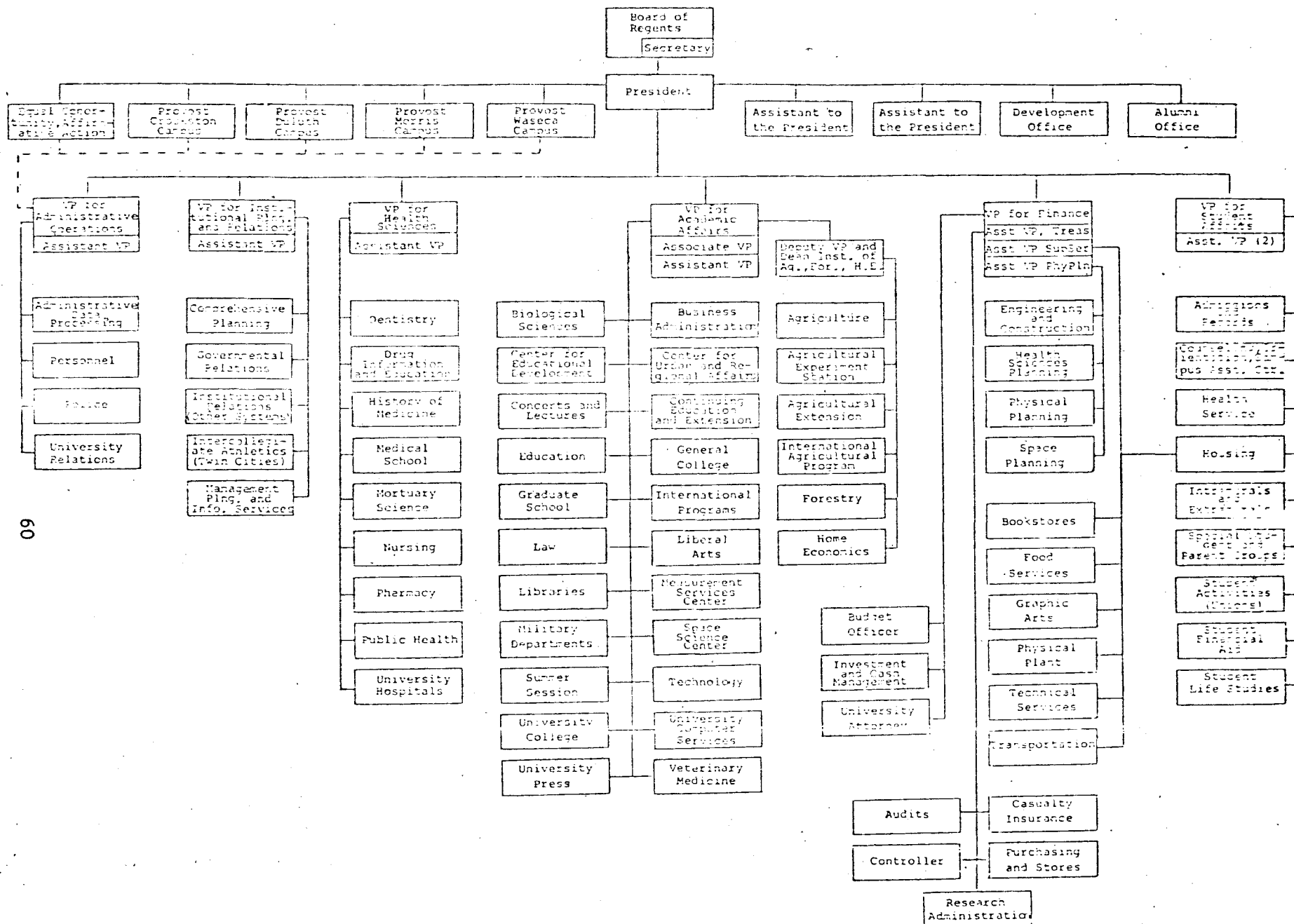
The Vice President for Health Sciences has responsibility for developing goals and operational plans in conformity with the missions of the Health Sciences and for developing inter-unit collaboration in fulfilling the missions of the Health Sciences.

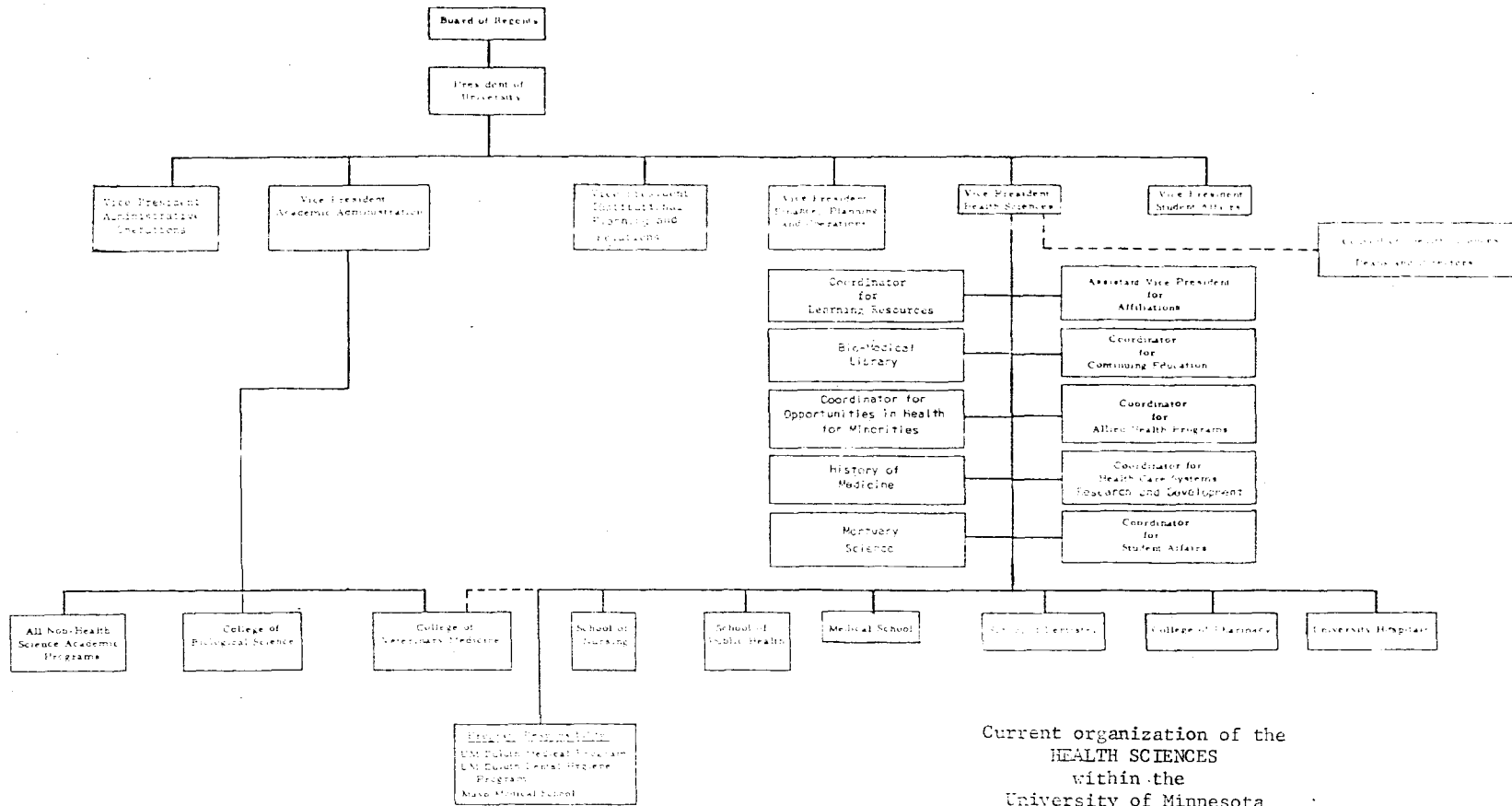
The Medical School, the School of Dentistry, the College of Pharmacy, the School of Public Health, the School of Nursing, and University Hospitals comprise the Health Sciences of the University of Minnesota. Each unit is represented by a dean or director reporting directly to the Vice President

for Health Sciences. Recognition of the mutually important affairs and activities of the College of Veterinary Medicine is expressed in the adjunct status of this collegiate unit in the Health Sciences. A Council of Deans and Directors from the Health Sciences units and the College of Veterinary Medicine serve the Vice President in a cabinet capacity. The attached organizational charts depict the relationship of the School of Nursing to other Health Science units, and the relationship of Health Sciences to the over-all University structure.

A Nursing Council was established to represent each of the nursing units at the University - School of Nursing, Public Health Nursing (Department of the School of Public Health), and University Hospitals Nursing Services. The purpose of the Council is to coordinate official actions of all three units toward optimal development of Nursing at the University of Minnesota. It has served as a forum of information exchange (for example, for avoidance of duplication of continuing education offerings among units) but also to raise and deal with issues of concern to all of nursing (for example, the effect of sex discrimination to Nursing). The Council is two years old; its membership includes the Heads of each unit plus elected representatives; it is viewed as an innovative means of maximizing Nursing's ability to meet its mission.

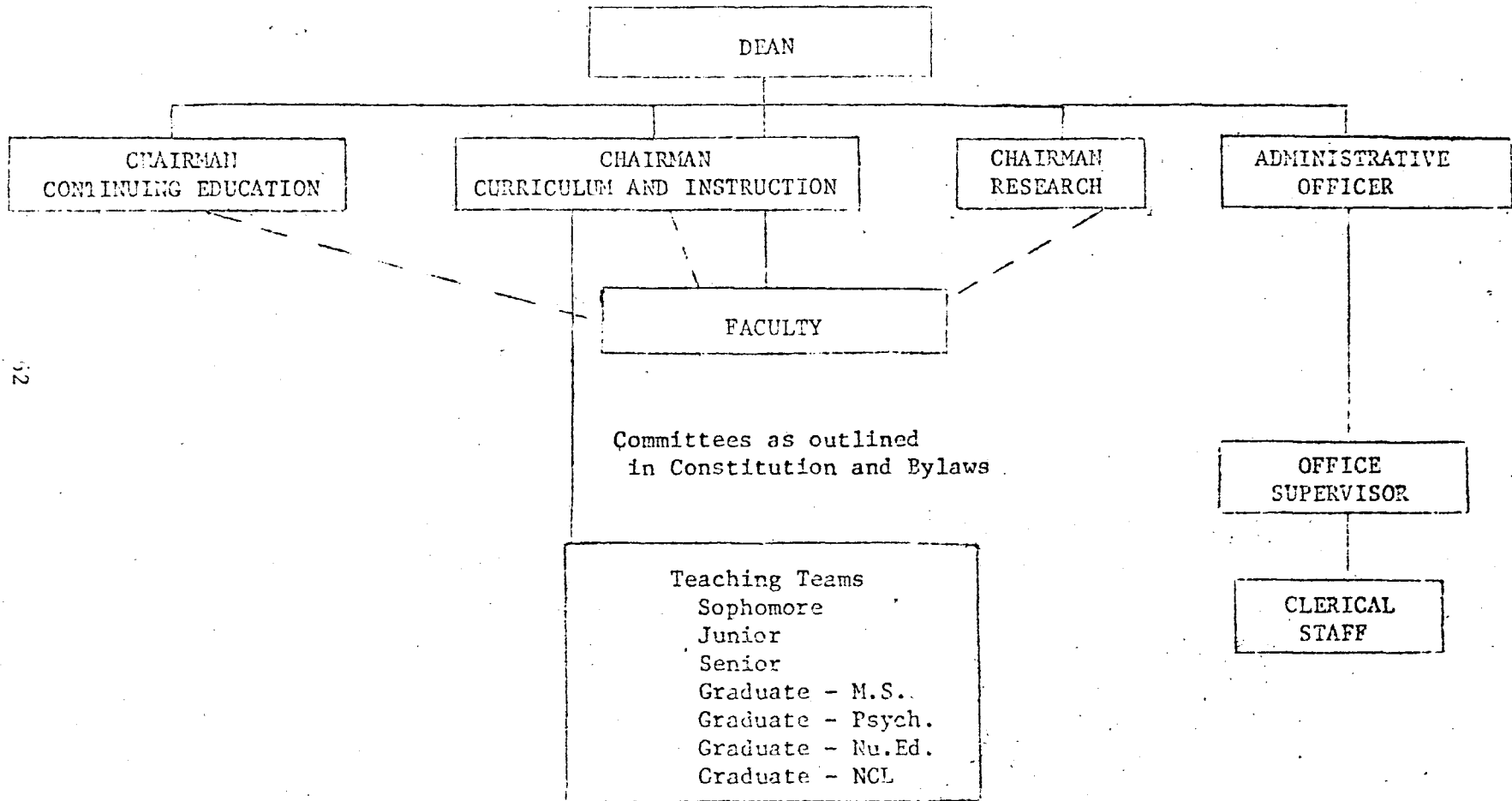
ADMINISTRATIVE ORGANIZATION OF THE UNIVERSITY OF MINNESOTA





Current organization of the
HEALTH SCIENCES
 within the
 University of Minnesota

ORGANIZATIONAL CHART - SCHOOL OF NURSING



Location of Facility with Respect to Hospitals and Other Health Agencies

The location of the proposed facility is within the complex which includes University Hospitals and buildings housing other units of the Health Sciences. Diagrams on page 180 indicate the relationship of the Health Science buildings. University Hospitals is one of the major health agencies used by the Nursing programs.

The locations and distance from the University campus for the hospitals and agencies utilized by the School of Nursing for its educational programs are listed below. Students are responsible for their own transportation, which they arrange by auto or bus.

The School of Nursing uses the following agencies for experience of graduate and undergraduate students. Distances and locations are also indicated.

<u>Agency</u>	<u>Location</u>	<u>Distance from U.</u>	<u># hrs/wk for each student</u>	<u># stu-dents/qtr</u>	<u># Patients</u>
University Hospitals	On site	On site	8	100	750
*Hennepin County General Hosp.	Minneapolis	3 miles	10	100	405 beds 24 bassinets
St. Paul Ramsey	St. Paul	5 miles	16	2	1544/mo.
*Minneapolis Health Dept.	Minneapolis	3 miles	12	35	1375/mo.
*Hoikka House	St. Paul	4 miles	8	21	117
North Memorial Hospital	Fridley	12 miles	8	5	546
Golden Valley Health Ctr.	Golden Valley	12 miles	10	8	377
Bloomington Health Dept.	Bloomington	14 miles	12	5	45/day
*Suburban Nursing Service	St. Louis Park	10 miles	12	7	1376/mo.
United Hospitals	St. Paul	5 miles	12	5	394
Shalom Nursing Home	St. Paul	7 miles	8	16	234
Highland Chateau	St. Paul	7 miles	8	10	112
St. Mary's Hospital	Minneapolis	6 miles	8	8	240
Ebenezer Society	Minneapolis	2.5 miles	8	32	515
M.T. Welcome Nursery School	Minneapolis	6 miles	8	10	780+
Phyllis Wheatly Nurs. Sch.	Minneapolis	6 miles	8	10	

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The following agencies are used for clinical experience for 1-2 graduate or undergraduate students at a time, who average 10 hours per week there.

		<u># Patients</u>
Braham Mental Health Center	Braham, MN	35-40/day
St. John's Hospital	St. Paul	380
Fairview Hospital	Minneapolis	425
Minnesota Department of Welfare	St. Paul	58,125 Henn. County
Minneapolis School System	Minneapolis	55,570
Beltrami Clinic	Minneapolis	35/day
Methodist Hospital	St. Louis Park, MN	470
St. Louis Park Medical Clinic	St. Louis Park, MN	900/day
Group Health Plan, Inc.	St. Paul	1000/day (average for 4 clinics)
Community-University Health Care Clinic	Minneapolis	2500 Kids in Continuous Care

*Have formal contracts. Others have Letters of Agreement

The School of Nursing uses the following agencies for experience of graduate and undergraduate students. Distances and locations are also indicated.

<u>Agency</u>	<u>Location</u>	<u>Distance from U.</u>	<u># hrs/wk for each student</u>	<u># students/qtr</u>
University Hospitals	On site	On site	8	100
*Hennepin County General Hosp.	Minneapolis	3 miles	10	100
St. Paul Ramsey	St. Paul	5 miles	16	2
*Minneapolis Health Dept.	Minneapolis	3 miles	12	35
*Hofstra House	St. Paul	4 miles	8	21
North Memorial Hospital	Fridley	12 miles	8	5
Golden Valley Health Ctr.	Golden Valley	12 miles	10	8
Bloomington Health Dept.	Bloomington	14 miles	12	5
*Suburban Nursing Service	St. Louis Park	10 miles	12	7
United Hospitals	St. Paul	5 miles	12	5
Shalom Nursing home	St. Paul	7 miles	8	16
Highland Chateau	St. Paul	7 miles	8	10
St. Mary's Hospital	Minneapolis	6 miles	8	8
Ebenezer Society	Minneapolis	2.5 miles	8	32
M.T. Welcome Nursery School	Minneapolis	6 miles	8	10
Phyllis Wheatley Nurs. Sch.	Minneapolis	6 miles	8	10

The following agencies are used for clinical experience for 1-2 graduate or undergraduate students at a time, who average 10 hours per week there.

Braham Mental Health Center	Braham, MN
St. John's Hospital	St. Paul

Fairview Hospital	Minneapolis
Minnesota Department of Welfare	St. Paul
Minneapolis School System	Minneapolis
Beltrami Clinic	Minneapolis
Methodist Hospital	St. Louis Park, MN
St. Louis Park Medical Clinic	St. Louis Park, MN
Group Health Plan, Inc.	St. Paul
Community-University Health Care Clinic	Minneapolis

*Have formal contracts. Others have Letters of Agreement.

An office is available at Hennepin County General Hospital for faculty and rooms are available for scheduling of conferences, on a quarterly basis. Shalom Nursing Home provides conference space. Other agencies do not have conference or office space available on a regular basis.

The conceptual framework and goals of these programs require in-hospital and community based experiences in a ratio of 1:1. In addition, more of the curriculum reflects the health needs of healthy persons and those who are at maintenance phase of chronic illnesses.

The use of such a broad range of clinical agencies is expected to continue. We have minimal teaching space and no space for teaching and lab practice of nursing skills.

The School has contracts (similar to the attached sample) with the agencies indicated by an asterisk. With all others, there are Letters of Agreement, which make a more limited commitment, for shorter periods of time.

Sample of a Contract with Clinical Agency

AGREEMENT
between
THE UNIVERSITY OF MINNESOTA SCHOOL OF NURSING

and the

MINNEAPOLIS VISITING NURSE SERVICE

for provision of
LABORATORY EXPERIENCE FOR STUDENTS IN NURSING

I. General

- A. The University of Minnesota School of Nursing will supply nursing faculty to be responsible for the student's experience in the agency. The University and Agency will plan cooperatively for appropriate orientation for faculty and for students.
- B. The usual length of the laboratory experience for undergraduate students will be a University quarter; in the case of graduate students and selected undergraduate students it may extend over a longer period.
- C. The University will provide a tentative annual schedule indicating quarters involved and numbers of students.
- D. Approximately two weeks prior to the opening of the quarter, the University School of Nursing will supply a list of students' names with designation of the program in which they are enrolled, and faculty members responsible.
- E. The University will assume responsibility for ascertaining in advance of the laboratory experience that students are in satisfactory physical condition.
- F. The University will discuss with the agency plans for contracting with any other agency for student experience in public health nursing.
- G. The University will identify a faculty member and the agency will appoint a staff member to act as coordinators in taking the main responsibility for liaison.
- H. The agency will provide service to the community which meets the standards of good community health nursing.
- I. This agreement and the conduct of the program will be reviewed annually by the parties concerned; interim conferences also will be held as needed in the interest of harmonious planning when program changes are considered.
- J. Either party may submit a notice in writing six months in advance of proposed date for termination.

II. Policies Relating to the Conduct of the Experience

- A. The University School of Nursing will plan for all student learning experiences (case selection from among families made available by agency staff, hours for class and laboratory practice, course content, methods of teaching, and evaluation of students' progress in meeting course objectives).
- B. The University faculty member responsible for a group of students, and the agency personnel, especially the station supervisor and assistant director for staff development, share responsibility for interpreting the student program to agency staff and helping University faculty and students understand current agency policies and practices.
- C. The agency has ultimate responsibility for the quality of care given to its patients. The University, through its faculty member's teaching assignment, is responsible to the agency for the quality of nursing care given by students in the laboratory experience and for the maintenance of agency policies.
- D. The University faculty member provides a periodic review to the agency supervisor and/or staff nurse of the care being provided for patients by students. Agency staff will keep faculty and students informed as they gain information about patients for whom students are caring.
- E. The agency will provide a satisfactory case load for students. University faculty and agency staff will confer on the selection of patients.

III. Costs

- A. The agency will provide without cost to the University or its students the use of available agency clinical resources and facilities; services rendered to patients by students will accrue to the agency's total service record.
- B. All transportation costs will be borne directly or indirectly by the student. The agency assumes no responsibility for automobile and malpractice insurance coverage for the student while she is on agency business. The University will be responsible for assuring that students are adequately insured.
- C. Nursing bags with permanent equipment, desks, chairs, and other incidental equipment for students and instructor are provided as necessary by the University. The agency provides conference rooms for teaching and offices for faculty and students.

UNIVERSITY OF MINNESOTA
Educational Institution

MINNEAPOLIS VISITING NURSE SERVICE

Dean, School of Nursing

Date

Nursing Director

DATES OF ANNUAL REVIEW

_____ 1972
_____ 1973
_____ 1974
_____ 1975

Other Services Supportive to the Program

A. Library Facilities

The School of Nursing no longer maintains its own departmental library as it did prior to 1960. Library services for the School are now met by the Bio-Medical Library in Diehl Hall which is conveniently located and assessable for all health science uses. The total amount of assignable square feet allocated for library purposes in Diehl Hall is 82,901, providing seating space for about 750 readers. All existing Health Science Units have access to the Library by tunnel; the School of Nursing's proposed structure would have access through a building currently under construction.

This Library encompasses the entire range of the health sciences and contains strong supportive collections in the biological sciences as well. The Bio-Medical Library is part of the University Library system and can draw on all library resources within the University. These resources total well over three million volumes. Departmental libraries, particularly the Veterinary Medicine, Pharmacy, Entomology and Chemistry Libraries, provide resources which supplement the Bio-Medical Library. Twice daily deliveries enable books and journals to be quickly and easily requested and delivered to and from other library units.

The Bio-Medical Library is currently increasing its Nursing related resources through a Federal grant of \$6000 and portions of a University grant of \$6000. This is being done with the aid of faculty from the School of Nursing.

Bio-Medical Library Statistics
July 1, 1973 - June 30, 1974

Collections

Number of Volumes	240,545
Number of Volumes added this year	9,208
Number of Current periodical subscriptions	2,441
Total number of serial titles received	3,283

Staff

Professional	12
Clerical	11
Student Assistants (FTE)	13

The School utilizes the Audio-Visual Library Service for ordering non-printed media for preview, purchase or rental.

B. Audio-Visual Center

A Health Sciences Learning Resources Committee was established in 1968 to develop the concepts and organizational structure for a Health Sciences-wide learning resources center. Dr. Barbara Redman, Associate Dean of the School of Nursing, is a member of that Committee. The School has been heavily involved in all phases of planning for this facility. The objectives for this program have been established as follows:

1. To provide an educational environment for Health Sciences students so they can utilize learning resource materials which have been identified as integral components of a course or a curricular plan.
2. To stimulate Health Sciences faculty to approach the design of educational experiences as a systematic, team-oriented process; and to economize the development process by coordinating interdisciplinary and continuing education needs in planned materials.
3. To obtain maximum economy and efficiency in utilizing learning

resources now available within the Health Sciences units and from other sources; and to identify and organize methods for appropriately applying institutional learning resources to uses in outreach programs and continuing education for the health professions.

4. To do applied research in learning appropriate to the Health Sciences.
5. To establish a capability for technically producing learning materials which have been designed by a team of health educators.

In order to achieve those objectives, a Coordinator for Health Sciences Learning Resources has been appointed and three components of organizational development have been identified: Media Production, Instructional Development, and Utilization (Learning Resources Center). Temporary space for the Learning Center has been provided on fifth level Diehl Hall (Bio-Medical Library) which presently is functioning on a pilot basis. The future Center is programmed for 13,700 square feet on the second level of Diehl Hall as part of the Health Sciences Master Plan and will be available in 1977. The Center will provide 230 independent learning carrels, a study table area for ten tables, four interaction rooms and 22 learning carrels for use by two or more students, and a dial access control center for audio-video recordings. Approximately 5,900 square feet of space is planned on the basement level of Health Science Units B/C currently under construction for Media Production. Spaces for a combined television and photography studio, artists and students work area, consultation offices and conference rooms, photo finishing rooms, and a photomicrography area are planned for. An area in the Learning Resources Center will provide a location for Instructional Development where instructors can plan and design educational materials and do field testing and previewing of other materials. This area

will house an education planning staff to assist instructors. Areas for pilot research and development in these two fields, i.e., Media Production and Instructional Development, currently in existence at various locations throughout the Health Sciences' Complex including the School of Nursing.

C. Science Laboratory and Other Classroom Space

The prerequisite science courses are taught by the College of Liberal Arts during the one year of pre-nursing studies. These courses are held in laboratories and lecture theaters controlled by that College. Those science courses required as part of the School of Nursing's curriculum are taught by instructors from the Basic Sciences Department of the School of Medicine in space controlled by that School or in Health Sciences Unit A. The Basic Science Department is scheduled to enter newly remodeled space in the Jackson/Owre/Millard complex as the next step in the Health Sciences' Master Plan. General classroom space for the School of Nursing is currently found in Powell Hall and Health Sciences Unit A. All of the School's future requirements for general classroom space will be met within the structure herein proposed, auditorium space being shared between Pharmacy and Nursing as prime users, but available for scheduling to all Health Science Units, and by Health Sciences Unit A which is adjacent and connected to the proposed structure for Nursing and Pharmacy.

D. General Services

The University maintains a custodial and grounds staff through the Department of Physical Plan Maintenance and Operations. This service would be extended to cover the School of Nursing's proposed structure on the same basis as any other building on campus. The University also maintains

a central supply warehouse and delivery service which is available to the School of Nursing on the same basis as all other schools and departments. The reproduction of media is handled within the University by either Media Resources or Printing and Graphic Arts. When very special reproduction needs and requirements are involved, the School of Nursing makes use of either Bio-medical Graphic Communications or outside vendors under the direction of the Purchasing Office.

Accreditation

The University is accredited by North Central Association of Colleges and Secondary Schools - last visit 1966. The School of Nursing baccalaureate and masters programs were granted continuing accreditation by the National League for Nursing in 1971, with the next visit scheduled for Spring, 1977.

The baccalaureate program was also granted continuing approval by the Minnesota Board of Nursing in April, 1970. The next visit was March 5 and 6, 1975. Letters of accreditation are attached.

nursing services — nursing education — citizen participation

National League for Nursing, Inc.

• 10 COLUMBUS CIRCLE, NEW YORK, N.Y. 10019

AREA CODE 212

• JUBSON 2-1022

April 23, 1971

AIRMAIL

Dr. Malcolm Moos
President
University of Minnesota
Minneapolis, Minnesota 55455

Dear Dr. Moos:

On April 23, 1971 the National League for Nursing's Board of Review for Baccalaureate and Higher Degree Programs voted to grant continuing accreditation to the baccalaureate and masters degree programs in nursing. The Board also voted to remove the warning from the baccalaureate degree program and from the masters degree program.

The reasons for the action will follow in a second Board letter that will include the Board's comments and recommendations. This letter will be sent to you within a few weeks.

Sincerely yours,

Dorothy Ozimek

Dorothy Ozimek, Secretary
Board of Review for
Baccalaureate and Higher
Degree Programs

DO:gc
cc: Dr. Isabel Harris

COPY

STATE OF MINNESOTA
Minnesota Board of Nursing
393 North Dunlap St.
St. Paul, 55104

April 15, 1970

Dr. Malcolm Moos, President
University of Minnesota
Minneapolis, Minnesota 55455

Dear President Moos:

The Minnesota Board of Nursing, for purposes of the registered nurse law, on April 3, 1970 reviewed the report of the recent survey of the University of Minnesota School of Nursing generic baccalaureate nursing program. This survey was a regular one made to inform the Board of Nursing about the present-day curriculum and administration of the baccalaureate nursing program preparing persons for registered nurse licensure.

Board members appreciated having Dr. Isabel Harris and Dr. Barbara Redman attend part of the meeting on April 3 to elaborate certain aspects of curriculum and administration as well as possible future plans. The Board of Nursing acted to grant continuing approval to the program. This approval will extend until another survey has been made and a report reviewed by the Board.

Dr. Harris is commended for the effective way in which she has been serving as acting dean of the school of nursing. Board members share the concern of the University for the appointment of a person to the position of dean and appreciate the extensive search efforts which have been made so far for this person.

The tremendous importance of this school in the state of Minnesota is recognized. The hoped-for reorganization of the college of health sciences at the University should provide for this school's equal status with other schools. This reorganization should make it possible for the school of nursing to make an increasing contribution to nursing and nursing education in the state. The opportunity for cooperative planning with the basic science groups that provides for greater flexibility and understanding should make for improved curriculum building in the nursing major.

The persistent need for improved budgetary provisions for faculty positions and faculty development as well as other aspects of school operations is strongly supported by the Board of Nursing, since without adequate numbers of qualified faculty this school cannot carry well all of the functions which are expected from the University of Minnesota School of Nursing (generic program, graduate education, continuing education, consultant and research).

Page 2
April 15, 1970
Dr. Malcolm Moos

This school continues to attract students of high ability. Faculty members are becoming increasingly aware of students' goals and needs and are now utilizing student contributions in curriculum development for which they are to be commended.

Although the re-arrangement of office and related facilities for the school of nursing represents an improvement over the previous situation, and although some long-range plans for changing and adding facilities for health sciences are acknowledged, it is recommended that the school of nursing requests for future facilities be accorded full support by the University.

It is recommended that study be made of the holdings of the Diehl Library to see how additional numbers of copies of needed reference books for nursing students may be obtained as well as determining the need for increasing the availability of recent publications in nursing.

The school personnel are encouraged to increase sharing of information about the current nursing programs with Minnesota nursing colleagues and the general public, through increased participation by membership in nursing organizations and by other means.

It is hoped that the value of last summer's faculty workshop can be duplicated or exceeded by the workshop anticipated for the summer of 1970. Such a workshop should provide faculty members with an opportunity to evaluate the program and to make general and concrete plans for the future.

The members of the Minnesota Board of Nursing extend best wishes to the faculty and administrative authorities for the operation of a high quality baccalaureate program in nursing as well as growth of the graduate programs and continuing education programs.

Sincerely,

Doris Yokie, R.N., President

DY:hk

Students

Enrollment Projections

Enrollment projections are based on needs of the region and availability of other training programs. There are eight other baccalaureate nursing programs in the state but no other master's programs in Minnesota, South Dakota, North Dakota, Western Wisconsin or Northern Iowa. While the master's program is showing steady increases in enrollment, the baccalaureate program is experiencing tremendous admission pressure with 3-4 times the number of qualified applicants it can accept. Part of this pressure is from Registered Nurse students who wish to complete requirements for the baccalaureate in nursing. For the past two years the School has run an accelerated program of its regular curriculum, for this group of students, many of whom have already taken a large number of the required and elective courses and can complete the program in five quarters.

The School's long range growth plan calls for considerable increase in the graduate program and minimal increase in the baccalaureate. The need for master's prepared nurses is acute, as is participation of School of Nursing graduate faculty in serving as minor advisors for nurses obtaining their doctorates in other fields. Feasibility for a doctoral program in nursing is being explored.

The availability of additional educational experiences for the enrollment projections contained in this proposal will not be a problem. A University of this size can expand to add students; this would be true of courses that now exist in physiology, family, etc.

While clinical resources are undeniably tight in the Minneapolis-St. Paul area, there's every reason to believe that the School can obtain

what it needs. The major expansion will come in the graduate program, and many times clinical experiences for those students are so different from those for baccalaureate students that they don't compete with each other. The University clearly has a competitive edge over other schools in gaining clinical facilities because many agencies want to strengthen the professional (B.S. and M.S.) level of their nursing practice. At the same time, the Nursing Advisory Committee to Minnesota Higher Education Coordinating Commission (MHECC) has adopted a goal of developing a coordinated plan for the use of Minnesota clinical facilities by schools.

Admission Requirements

Undergraduates. Students are admitted to the undergraduate program of the School of Nursing as sophomores, after having completed one year of liberal arts studies in any accredited college of university. Credits may also be earned through the Extension Division of this university, through Independent Study (correspondence), by taking CLEP examinations or special departmental examinations or challenge examinations.

Prerequisites for admission are a minimum of 45 quarter credits which include the following courses:

English Composition	8 quarter credits
General Chemistry	8 quarter credits
General Biology	4 quarter credits
Cultural Anthropology	3 quarter credits
Introductory Sociology	3 quarter credits

There is no discrimination in selection for admission on the basis of sex, marital status, age, race or creed.

Selection for admission is based on grades earned in all previous college courses, high school rank and tests of academic ability or achievement.

The School of Nursing admits some minority and/or disadvantaged students in each nursing class. These students should consult the MLK or HELP offices. For these students, requirements for entrance may be modified.

Registered Nurses. Those with a diploma in nursing from a hospital nursing program and those with an associate degree from a 2-year college need to meet the same admission prerequisites as other students, as described in the preceding section. Registered Nurses may seek advanced standing through the same mechanisms as are available to other applicants.

Advanced Standing Admission. Students who have completed the prerequisite courses and have been accepted for admission may enroll in the School of Nursing and enter the Sophomore Year program.

Those who have completed at least 74 quarter credits at some accredited college or university may qualify for placement in the Junior Year program, if they have completed both the prerequisite courses for nursing and the required courses of the Sophomore Year. They must also be accepted for admission to the School of Nursing, and must have successfully passed the challenge examinations covering the Sophomore Year nursing courses.

Graduate. Criteria for admission to the master's programs in nursing are: a baccalaureate degree, certification as a Registered Nurse, and a B average in prior undergraduate work. Two references are required. The procedure for admission is as follows. Candidates are evaluated by the Nursing faculty committee on admissions, who forward the committee recommendations for admission or rejection to the Graduate School. The Associate Dean of the Graduate School reviews the data and decides whether to admit, and notifies the candidate and the School of Nursing. Accepted candidates are then assigned an adviser by Nursing.

Geographic Distribution of Students

Undergraduates (B.S. Program)

	<u>Minnesota</u>	<u>Wisconsin</u>	<u>Other States</u>	<u>Foreign</u>
Sophomores	147	4	4	1
Juniors	105	4	10	1
Seniors	152	2	9	0

Graduates (M.S. Program)

	<u>Minnesota</u>	<u>Other States</u>	<u>Foreign</u>
1st Year	32	6	2
2nd Year	28	4	0

School of Nursing - 1974-75

Class	<u>Sex</u>		<u>Ethnic Background</u>				
	<u>Male</u>	<u>Female</u>	<u>Black</u>	<u>American Indian</u>	<u>American Spanish Surname</u>	<u>Asian Americans</u>	<u>Other</u>
1st	--	--	--	--	--	--	--
2nd	10	115	6	2	--	1	--
3rd	7	131	2	--	--	1	--
4th	9	128	4	--	--	1	--
Grad	--	73	2	--	1	--	2

Qualified Applicants for Admission, Baccalaureate Program

School of Nursing

<u>Year</u>	<u>No. of Applicants</u>	<u>No. Accepted</u>
1974-75	570	155
1973-74	538	150
1972-73	449	130
1971-72	356	119
1970-71	226	115
1969-70	180	68

Geographic Distribution of Enrollees, Baccalaureate Program

	School of Nursing						
	<u>1974-75</u>	<u>1973-74</u>	<u>1972-73</u>	<u>1971-72</u>	<u>1970-71</u>	<u>1969-70</u>	<u>1968-69</u>
Minn. Residents	147	105	152	124	116	59	83
Non-Residents	8	14	11	6	6	4	8
Other Countries	1	1	--	2	--	--	2

Geographic Distribution of Graduate Students

	School of Nursing						
	<u>1974-75</u>	<u>1973-74</u>	<u>1972-73</u>	<u>1971-72</u>	<u>1970-71</u>	<u>1969-70</u>	<u>1968-69</u>
Minn. Residents	32	28	23	34	24	20	12
Non-Residents	6	4	4	9	3	2	7
Other Countries	--	--	--	--	--	--	--

R.N. Exam Results

<u>Year</u>	<u>No. Taking</u>		
	<u>Exam</u>	<u>Passed</u>	<u>Failed</u>
1970	73	72	1
1971	64	61	2
1972	65	65	0
1973	97	92	5
1974	101	96	5

Admissions and Graduations 1970-74, Baccalaureate Program

<u>Year</u>	<u>Number Admitted</u>	<u>Number Graduated</u>
1970	117	76
1971	128	64
1972	128	71
1973	153	104
1974	155	109

Admissions and Graduations 1970-74, Masters Program

<u>Year</u>	<u>Number Admitted</u>	<u>Number Graduated</u>
1970	46	38
1971	43	43
1972	29	29
1973	50	50
1974	49	48

Disadvantaged Students

The School of Nursing admissions policies bar discrimination on the basis of race, creed, color, sex or natural origin. Selection for entry into the School is based on scholastic achievement, grade point average and completion of required curriculum. In the fall of 1973, forty-six spaces were reserved for students special groups: 8 for minority and disadvantaged applicants and 38 for the Special Registered Nurses Program. The impact of limiting the number of spaces available for open competition has increased the average grade point average of those admitted from 3.2 to 3.4. Undergraduate nursing students receiving financial aid numbers 106.

The School of Nursing has reserved for minority or disadvantaged students 5% of places in the entering class of undergraduates each year. Recruitment of students for these places has been accomplished largely through contacts with establishing campus programs: Martin Luther King Foundation, Higher Education for Low Income People, the Newgate program, the County Work Incentive Program, Project Breakthrough to Nursing, and the Indian Health Program at Lutheran Deaconess Hospital.

Undergraduate Student Recruitment

A Committee of the School of Nursing has attempted to coordinate recruitment efforts with the Opportunities in Health for Minorities Program of Health Sciences, which provides recruitment services for all of the Health Sciences.

Other recruitment activities have included sponsoring a get-acquainted dinner for potential students, speaking to High School Future Nurses Clubs, participating in campus visits of minority students, and counseling pre-nursing minority or disadvantaged students.

Opportunities in Health for Minorities

The Office of Opportunities in Health for Minorities is a coordinative function in the Office of the Vice President for Health Science Affairs established for the purpose of recruiting minority students into the various professional schools within the Health Sciences Center. There is a staff of recruiters whose sole task is the development of new and effective ways in which to achieve these goals.

A second aspect of the program deals with difficulties a student might have in the achievement of set academic goals. In recognition of the lack of adequate preparation of many minority students, an

attempt is made to provide them with a program of study-skills counselling, academic counselling and tutorials that will assist them in overcoming this handicap.

There are two other approaches that are taken to recruiting and retention. One course is to offer High School students the opportunity to have Health Care experiences. The Program, Career Opportunities in the Health Sciences, is a summer program for High School students. Opportunities are provided to work in clinics and laboratories at the University and at affiliated agencies of the University, in the hope that these experiences will act as positive forces in directing them towards health science careers.

The second approach takes cognizance of the specific lack of preparation that students might have. There is a pool of students who, though in possession of a Baccalaureate degree, are not adequately prepared for entry into professional areas. The Post-Baccalaureate Year permits this student to acquire this background and to set on a course that will allow some testing of an individual's potential in the area of identified interest.

In these areas, there is a need for the development of materials that would be suitable for the kind of work that needs being done. One such attempt is currently underway which will see us establish some normative data that will lead to the development of appropriate teaching and counselling materials.

The office has been cooperating with several community groups to assist them in developing programs in the area of health care. One such program, soon to be underway involves setting up a series of classes on Medical Self-Help Training through the local Civil Defense Office.

In another area, we have been asked to assist in the development of a career ladder program with one of the local hospitals designed to attract potential students from the communities into the health sciences.

The Program, Opportunities in Health for Minorities is partially funded by the U.S. Public Health Service and partially by funds from the University of Minnesota Health Sciences Center. It was established to coordinate those University activities that would contribute to the recruiting and retention of minorities.

Graduate Student Recruitment

The recruitment efforts of the School of Nursing to attract students

to graduate programs is in a formative state. A computer printout of a national pool of minority students was requested for use in recruiting graduate students for 1973-74. Consensus seems to be that the emphasis on recruitment should be on students from the local area before national recruitment is attempted. However, the limited number of minority students eligible for admission to graduate programs makes broad area recruitment a necessity. Therefore this pool of potential students is being considered as a promising source of future contacts.

Other sources which have been identified include the Minnesota Nurses' Association, the State Board of Nursing, health care agencies in the region that employ minorities, and the Twin Cities Association of Health Professionals.

On the next page is a summarization of loans, grants and scholarships utilized by graduate students.

SURVEY OF GRADUATE SCIENCE STUDENT SUPPORT AND POSTDOCTORALS, FALL 1974

PLEASE RETURN BY JANUARY 31, 1978

DEPARTMENTAL DATA SHEET

(NOTE: BEFORE FILLING OUT PLEASE READ THE INSTRUCTIONS ON THE ATTACHED)

1. NAME AND ADDRESS OF INSTITUTION: University of Minnesota--Powell Hall

2. SCIENCE OR ENGINEERING DEPARTMENT (OR UNIT) COVERED BY THIS DATA SHEET: School of Nursing

3. PERSON IN DEPARTMENT (OR UNIT) PREPARING THIS FORM: NAME: M. Peterson, G. Park TEL: (A/C) 373-3462

4. HIGHEST DEGREE PROGRAM OFFERED BY DEPARTMENT (OR UNIT) IN FALL 1974 (CHECK ONE ONLY) MASTER'S DOCTORATE

DEPARTMENT CODE (LEAVE BLANK)

3. FULL-TIME GRADUATE STUDENTS			STUDENTS RECEIVING FINANCIAL ASSISTANCE							SELF-SUPPORTED STUDENTS (INCLUDING LOANS AND FAMILY SOURCES)	TOTAL FOR ALL SOURCES (SUM OF COLUMNS (A) THRU (I))	
			FEDERAL SOURCES (EXCLUDING LOANS)				NON-FEDERAL SOURCES					
MECHANISMS OF SUPPORT	LEVEL OF STUDY		DEPT. OF DEFENSE (A)	HEW		NATIONAL SCIENCE FOUNDATION (D)	OTHER FEDERAL SOURCES (E)	INSTITUTIONAL SUPPORT (F)	FOREIGN SOURCES (G)	OTHER U.S. SOURCES (H)	(I)	(J)
				NATIONAL INSTITUTES OF HEALTH (B)	OTHER HEW (C)							
GRADUATE FELLOWSHIPS AND TRAINESHIPS	FIRST YEAR (1)			7			24					31
	BEYOND FIRST (2)			12			22					34
GRADUATE RESEARCH ASSISTANTSHIPS	FIRST YEAR (3)											
	BEYOND FIRST (4)						1					1
GRADUATE TEACHING ASSISTANTSHIPS	FIRST YEAR (5)			1								1
	BEYOND FIRST (6)											
OTHER TYPES OF SUPPORT	FIRST YEAR (7)										2	2
	BEYOND FIRST (8)										1	1
TOTAL (9)				20			47				3	70
OF LINE (9) HOW MANY WERE WOMEN?	FIRST YEAR (10)			8			24				2	34
	BEYOND FIRST (11)			12			23				1	36
FOREIGN STUDENTS (12)			OF THE FULL-TIME GRADUATE STUDENTS SHOWN IN LINE (9), COLUMN (J), HOW MANY WERE FOREIGN STUDENTS?									3

6. PART-TIME GRADUATE STUDENTS			7. G.I. BENEFITS		8. POSTDOCTORALS AND/OR RESEARCH ASSOCIATES				
FALL 1974			OF YOUR TOTAL GRADUATE ENROLLMENT (FULL AND PART-TIME) HOW MANY RECEIVED ANY G.I. BENEFITS?		SOURCE OF SUPPORT			TOTAL	OF COL. (D) HOW MANY ARE RECENT DOCTORALS? (E)
FIRST YEAR (A)	BEYOND FIRST (B)	TOTAL (C)	(A)	(B)	U.S. GOVERNMENT		NON-U.S. GOV'T. (C)		
					FELLOWSHIPS/TRAINESHIPS (A)	RESEARCH ASSOCIATES (B)		(D)	(E)
9	-0-	9	9						

A/ INCLUDE INSTITUTIONS AND STATE AND LOCAL GOVERNMENTS.

B/ INCLUDE SUPPORT FROM NONPROFIT INSTITUTIONS, INDUSTRY, AND ALL OTHER U.S. SOURCES.

C/ SINCE AND INCLUDING 1975.

School of Nursing Faculty

Full time faculty number 55. They carry a 6 credit teaching load, 12 advisees, a committee assignment and meet the responsibilities of University faculty members for research and service. Nineteen faculty are part time. Their teaching and advising duties are proportional to the amount of time they work, which is usually half time or three-quarters time.

Name: Marie E. Albrecht
Date of Appointment: June, 1972
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

B.S.N. (1947) Montana State College
Bozeman, Montana

M.S. (1972) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Swedish Hospital School of Nursing - Instructor - September, 1967-September, 1970
Swedish Hospital School of Nursing - Asst. Instructor - August, 1947-August, 1950
Montana State College - Instructor - June, 1945-June, 1946
Montana State College - Asst. Instructor - December, 1944-June, 1945

Name: Janice M. Anderson
Date of Appointment: September, 1974
Rank: Instructor
Percentage of Appointment: 100
Education:

R.N. (1950) Methodist - Kahler School of Nursing
Rochester, Minnesota

B.S. (1972) University of Minnesota
Minneapolis, Minnesota

M.S. (1974) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Itteague Mennen School of Nursing - Instructor - October, 1956-May, 1957
Staff Nurse, Charge Nurse

Name: Mary Ann L. Anglim
Date of Appointment: March, 1970
Rank: Assistant Professor
Percentage of Appointment: 75
Education:

B.S. (1956) University of Minnesota
Minneapolis, Minnesota

M.Ed. (1964) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

University of Minnesota - Instructor - July, 1964-June, 1965

Previous Experience: (continued)

Northwestern Hospital School of Nursing - Instructor - 1963
Miller Hospital School of Nursing - Instructor - 1957-1962

Name: Ethel J. Beske
Date of Appointment: September, 1969
Rank: Assistant Professor
Percentage of Appointment: 100
Education:
B.S. (1964) University of Minnesota
Minneapolis, Minnesota
M.Ed. (1967) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Baptist Hospital Fund, Inc., (Mound Midway School) - Instructor - September,
1967-June, 1969
St. Joseph's School of Practice Nursing - Instructor - September, 1964-
August, 1966
General Duty Nurse, Head Nurse

Name: Monica M. Bossenmaier
Date of Appointment: September, 1969
Rank: Assistant Professor
Percentage of Appointment: 75
Education:
Diploma (1948) St. Mary's Hospital School of Nursing
Rochester, Minnesota
B.S. (1951) University of Minnesota
Minneapolis, Minnesota
M.Ed. (1966) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Anoka-Ramsey State Junior College - Instructor - April, 1967-June, 1969
University of Minnesota - Instructor - September, 1952-June, 1958
Head Nurse

Name: Dianne L. Brogger
Date of Appointment: August, 1972
Rank: Instructor
Percentage of Appointment: 100

Education:

Diploma (1965)	Northwestern Hospital School of Nursing Minneapolis, Minnesota
B.S. (1967)	Macalester College St. Paul, Minnesota
M.S.N. (1972)	University of Minnesota Minneapolis, Minnesota

Previous Experience:

Northwestern Hospital School of Nursing - Instructor - 1969-70
Mounds Midway School of Nursing - Instructor - 1967-69
Macalester College - Assistant Health Nurse - 1965-67
Northwestern Hospital - General Duty Nurse - Summer 1965-66, '67, '71

<u>Name:</u>	Kenneth R. Burns
<u>Date of Appointment:</u>	September, 1974
<u>Rank:</u>	Instructor
<u>Percentage of Appointment:</u>	100
<u>Education:</u>	

A.B. (1954)	Radcliffe College Cambridge, Massachusetts
B.S.N. (1971)	College of St. Catherine St. Paul, Minnesota
M.S. (1974)	University of Minnesota Minneapolis, Minnesota

Previous Experience:

Summit School - Director - November, 1965-January, 1967
Summit School - Faculty - September, 1963-November, 1965
Radcliffe College - Asst. to Director - December, 1959-December, 1960
Nightingale-Bamford School - Faculty - September, 1956-June, 1959
Tudor Hall - Faculty - September, 1955-June, 1956
Private Duty Nursing
General Staff Nurse
Senior Nursing Assistant

<u>Name:</u>	Margaret L. Carolan
<u>Date of Appointment:</u>	September, 1974
<u>Rank:</u>	Instructor
<u>Percentage of Appointment:</u>	100
<u>Education:</u>	

B.S.N. (1970)	College of St. Theresa Winona, Minnesota
M.S.N. (1972)	University of Washington Seattle, Washington

Previous Experience:

University of Minnesota Hospital - Nurse Clinician - October, 1973-December, 1973
Abbott-Northwestern Hospital - Consultant - September, 1973-December, 1973
Glenwood Hills Hospital - Consultant - September, 1973 - December, 1973
Staff Nurse

Name: Sheila Ann Corcoran
Date of Appointment: September, 1971
Rank: Associate Professor
Percentage of Appointment: 100
Education:

B.S. (1959) College of St. Catherine
St. Paul, Minnesota

M.Ed. (1963) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Edinboro State College - Asst. Professor - September, 1970-September, 1971
College of St. Catherine - Asst. Professor - September, 1963-June, 1970

Name: Patricia Anne Crerar
Date of Appointment: November, 1969
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

B.S.N. (1963) University of Western Ontario
London, Ontario

M.S.M. (1968) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Ottawa Civil Hospital - Clinical Instructor - 1963
Hastings State Hospital - Director of Nursing - January 1968-November, 1969
Ottawa Civic Hospital - Psychiatric Nursing - 1964
Staff Nurse

Name: Linda L. Grummer
Date of Appointment: June, 1973
Rank: Instructor
Percentage of Appointment: 100
Education:

B.S.N. (1971) University of Miami
Miami, Florida

M.S. (1973) 92 University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Staff Nurse, 1969-1971

Name: Helen Hansen
Date of Appointment: September, 1957
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

B.S. (1955) University of Minnesota
Minneapolis, Minnesota

M.Ed. (1957) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Staff Nurse, 1955-1956

Name: M. Isabel Harris
Date of Appointment: September, 1947
Rank: Dean and Professor
Percentage of Appointment: 100
Education:

B.A. (1934) University of Michigan
Ann Arbor, Michigan

M.Ed. (1951) University of Minnesota
Minneapolis, Minnesota

Ph.D. (1962) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

John Hopkins Hospital - Head Nurse - 1938-40
Wayne County General Hospital - Head Nurse and Supervisor - 1940-1942, 1946-1947
U.S. Army Nurse Corps - 1st Lt. - 1942-1946

Name: Sharon E. Hoffman
Date of Appointment: September, 1972
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

B.S. (1966) California State College
Los Angeles, California

M.S. (1972) University of Minnesota
93 Minneapolis, Minnesota

Previous Experience:

Fairview Hospital School of Nursing - Instructor - 1968-1969
Rhode Island Hospital School of Nursing - Instructor - 1966-1968
General Staff Nurse

Name: Rosemary J. Huerter
Date of Appointment: September, 1971
Rank: Instructor
Percentage of Appointment: 100
Education:

B.S. (1963) St. Mary College.
Xavier, Kansas

M.N. (1966) Montana State University
Bozeman, Montana

Previous Experience:

Providence Hospital School of Nursing, 1966-1968
St. Vincents School of Nursing - Instructor - 1960-1965
St. James School of Nursing - Instructor - 1959-1960
St. Vincents Hospital - Coordinator of Hospital In-Service Training - 1968-70
St. Ann's Hospital - House Supervisor - 1968
Staff Nurse

Name: Maryjoan O'Brien Kidd
Date of Appointment: August, 1973
Rank: Instructor
Percentage of Appointment: 100
Education:

B.S. (1968) University of Maine
Orono, Maine

M.S.N. (1972) Duke University
Durham, North Carolina

Previous Experience:

Duke University School of Nursing - Instructor - September, 1972-May, 1973
Private Duty Nurse
Staff Nurse
Asst. Head Nurse
Charge Nurse

Name: Diane Kay Kjervik
Date of Appointment: September, 1972
Rank: Instructor
Percentage of Appointment: 100

Education:

B.S. (1967)	University of Wisconsin Madison, Wisconsin
M.S.N. (1968)	University of California San Francisco, California
Post M.S. Certificate	University of California San Francisco, California

Previous Experience:

University of Maryland - Instructor - 1971-1973
University of California - Assistant Instructor - 1970
Charge Nurse
Clinical Specialist

<u>Name:</u>	Mary Larson-Osband
<u>Date of Appointment:</u>	August, 1974
<u>Rank:</u>	Instructor
<u>Percentage of Appointment:</u>	100
<u>Education:</u>	

B.A. (1970)	Gustavus Adolphus College St. Peter, Minnesota
M.S. (1972)	University of California San Francisco, California

Previous Experience:

Staff Nurse - 1970-1971
Nurse Practitioner - 1972-1975

<u>Name:</u>	Mary Jane Madden
<u>Date of Appointment:</u>	August, 1970
<u>Rank:</u>	Assistant Professor
<u>Percentage of Appointment:</u>	100
<u>Education:</u>	

B.S.N. (1960)	College of St. Catherine St. Paul, Minnesota
M.S.N. (1968)	Case Western Reserve University Cleveland, Ohio

Previous Experience:

St. Joseph School of Nursing - Instructor - 1962-1966
Case Western Reserve University - Research Assistant - 1968
University of California - Research Assistant - 1969-1970
Head Nurse - Staff Nurse - Team Leader

Name: Nancy Sue Malcolm
Date of Appointment: July, 1969
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

B.S. (1963) University of Colorado
Denver, Colorado

M.P.H. (1969) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Staff Nurse
Staff Public Health Nurse
PHN Coordinator

Name: Ida M. Martinson
Date of Appointment: September, 1972
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

B.S. (1960) University of Minnesota
Minneapolis, Minnesota

M.N.A. (1962) University of Minnesota
Minneapolis, Minnesota

Ph.D. (1972) University of Illinois
Chicago, Illinois

Previous Experience:

Thornton Junior College - Instructor - 1968-1969
Christian Family Service Center - Nursing Consultant - 1966-1968

Name: Eileen A. McKee
Date of Appointment: August, 1974
Rank: Instructor
Percentage of Appointment: 100
Education:

B.S. (1968) College of St. Catherine
St. Paul, Minnesota

M.S. (1971) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

San Diego County Mental Health Facility, September, 1969-May, 1969
Hennepin County General Hospital - Liaison Person - June, 1970-September, 1970
Hennepin County General Hospital - Crisis Intervention Worker - 1971-1973
Westwood Psychiatric Hospital - Assistant Director of Nursing - 1974
Charge Nurse

Name: Barbara K. Redman
Date of Appointment: September, 1969
Rank: Associate Dean and Professor
Percentage of Appointment: 100
Education:

B.S.N. (1958) South Dakota State University
Brookings, South Dakota
M.Ed. (1959) University of Minnesota
Minneapolis, Minnesota
Ph.D. (1964) University of Minnesota
Minneapolis, Minnesota
Post Doctorate work in University of Washington
Nursing (1964-1966) Seattle, Washington

Previous Experience:

University of Washington - Assistant Professor - 1965-1969
University of Washington - Program Director - 1967-1969
University of Washington - Educational Coordinator - 1966-1967
University of Washington - Educational Consultant - 1965-1966
University of Washington - Acting Instructor - 1964-1965
University of Minnesota - Teaching Assistant - 1963-1964
Tacoma General Hospital - Instructor - 1959-1961
Staff Nurse

Name: Carol A. Reese
Date of Appointment: January, 1969
Rank: Instructor
Percentage of Appointment: 100
Education:

Prenursing (1962) Concordia College
Moorhead, Minnesota
B.S.N. (1965) University of Minnesota
Minneapolis, Minnesota
M.S. (1974) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Staff Nurse

Name: Virginia A. Pidgeon
Date of Appointment: August, 1972
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

A.B. (1944) Oberlin College
Oberlin, Ohio

M.A. (1952) University of Chicago
Chicago, Illinois

Ph.D. (1973) University of Pittsburgh
Pittsburgh, Pennsylvania

Previous Experience:

Indiana University School of Nursing - Asst. Professor and Instructor -
July, 1959-October, 1971
Washington University School of Nursing - Instructor - September 1952-
August, 1955
Merrill-Palmer Institute - Staff Member - April, 1950-June, 1952
John Hopkins Hospital School of Nursing - Instructor - September, 1947-
March, 1948
American University of Beirut School of Nursing - Supervisor, Instructor -
March, 1956-March, 1959

Name: Julia Randall
Date of Appointment: January, 1971
Rank: Associate Professor
Percentage of Appointment: 100
Education:

B.S. (1940) University of Minnesota
Minneapolis, Minnesota

M.N.A. (1957) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

University of Minnesota Hospitals - Instructor - 1940-1946
USPHS Division of Nursing - Nursing Consultant - August, 1964-October, 1965
Pan American Health Organization - Nursing Advisor - January, 1966-July, 1970

Name: Georgia K. Park
Date of Appointment: January, 1973
Rank: Research Associate
Percentage of Appointment: 100

Education:

B.A. (1955)	University of Washington Seattle, Washington
M.A. (1962)	University of Minnesota Minneapolis, Minnesota
Ph.D. (1972)	University of Minnesota Minneapolis, Minnesota

Previous Experience:

East Junior High School - Counselor - January, 1972-June, 1972
University of Minnesota - Instructor - August, 1964-July, 1967
Audubon Junior High School - Teacher - February, 1963-June, 1973
University of Minnesota - Research Fellow - July, 1959-June, 1962

<u>Name:</u>	Betty M. Pederson
<u>Date of Appointment:</u>	January, 1974
<u>Rank:</u>	Instructor
<u>Percentage of Appointment:</u>	50
<u>Education:</u>	

B.S. (1940)	University of Minnesota Minneapolis, Minnesota
M.N.A. (1967)	University of Minnesota Minneapolis, Minnesota

Previous Experience:

University of Minnesota Hospitals - Associate Professor - 1959-1971
University of Minnesota Hospitals - Associate Director of Nursing Administration
University of Minnesota School of Nursing - Instructor - 1940-1941

<u>Name:</u>	Nancy J. Menzel
<u>Date of Appointment:</u>	September, 1974
<u>Rank:</u>	Instructor
<u>Percentage of Appointment:</u>	100
<u>Education:</u>	

B.S. (1971)	St. Olaf College Northfield, Minnesota
M.S. (1974)	University of Minnesota Minneapolis, Minnesota

Previous Experience:

Staff Nurse

Name: Dorothy M. Moe
Date of Appointment: September, 1966
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

B.S. (1953) University of Minnesota
Minneapolis, Minnesota

M.Ed. (1966) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Iowa Methodist Hospital School of Nursing - Instructor - September, 1963-
September, 1965
Staff Nurse

Name: Elizabeth Mullin
Date of Appointment: September, 1974
Rank: Instructor
Percentage of Appointment: 100
Education:

B.S.N. (1957) University of Minnesota
Minneapolis, Minnesota

M.Ed. (1964) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Ancker School of Nursing - Sr. Med-Surg Instructor - 1971-1974
University of Minnesota - Clinical Instructor - 1965-1966
St. Mary's School of Nursing - Clinical Instructor - 1964-1965

Name: Muriel B. Ryden
Date of Appointment: September, 1970
Rank: Assistant Professor
Percentage of Appointment: 75
Education:

A.A. (1950) St. Cloud State
St. Cloud, Minnesota

B.S. (1953) University of Minnesota
Minneapolis, Minnesota

M.A. (1957) Columbia University
New York City, New York

Previous Experience:

University of Colorado - Lecturer - May, 1970-July, 1970
South Dakota State University - Relations Instructor - 1967-1969
South Dakota State University - Instructor - 1964
University of Minnesota - Instructor - 1961
University of Minnesota - Instructor - 1955-1956

Name: Alice Marilyn Sime
Date of Appointment: September, 1972
Rank: Associate Professor
Percentage of Appointment: 100
Education:

B.S. (1959) University of Minnesota
Minneapolis, Minnesota
M.S. (1964) Boston University
Boston, Massachusetts
Ph.D. (1973) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

University of Minnesota School of Nursing - Instructor - February, 1964-
September, 1968
South Dakota State College - Instructor - January, 1960-June, 1962
Staff Nurse
Assistant Head Nurse

Name: Sandra J. Monk
Date of Appointment: January, 1975
Rank: Teaching Specialist
Percentage of Appointment: 20
Education:

B.S.N. (1968) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

University of Minnesota Hospitals - Senior Staff Nurse - June, 1970-present
Monmouth Medical Center - Staff Nurse - October, 1968-June, 1970

Name: Ellen C. Egan
Date of Appointment: September, 1971
Rank: Associate Professor
Percentage of Appointment: 100
Education:

B.S.N. (1957) University of North Dakota
Grand Forks, North Dakota

Education: (continued)

M.Ed. (1961)	University of Minnesota Minneapolis, Minnesota
Ph.D. (1972)	New York University New York, New York

Previous Experience:

St. Mary's Junior College - Assistant Professor - 1961-1967

<u>Name:</u>	Alice Mae H. Graner
<u>Date of Appointment:</u>	September, 1972
<u>Rank:</u>	Instructor
<u>Percentage of Appointment:</u>	100
<u>Education:</u>	

Diploma (1960)	College of St. Catherine St. Paul, Minnesota
B.S. (1967)	University of Colorado Boulder, Colorado
M.S. (1969)	University of Colorado Boulder, Colorado

Previous Experience:

St. Mary's Junior College - Instructor, Asst. Professor - September, 1969 -
September, 1972
St. Joseph's School of Nursing - Instructor - September, 1967-June, 1968

<u>Name:</u>	Evelyn T. Peterson
<u>Date of Appointment:</u>	September, 1973
<u>Rank:</u>	Assistant Professor
<u>Percentage of Appointment:</u>	100
<u>Education:</u>	

B.S. (1951)	University of Washington Seattle, Washington
M.S. (1959)	University of Washington Seattle, Washington
Certificate in Research (1967) (2 year course)	University of California San Francisco, California
Ph.D. (pending)	University of California San Francisco, California

Previous Experience:

University of California - Clinic Co-Director - 1970-1972
South Dakota State University - Public Health Nursing - 1970
University of California - Teaching Assistant - 1968-1969
South Dakota State University - Clinical Nursing Dept. - 1966
Augustana College - Instructor, Asst. Professor - 1954-1958
South Dakota State University - Instructor, Assoc. Professor - 1954-1961

Name: Sharon L. Rising
Date of Appointment: August, 1972
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

B.A. (1963) Westmar College
LeMars, Iowa

Diploma, Nursing (1962) Methodist Kahler School of Nursing
Rochester, Minnesota

M.S.N., C.N.M. (1967) Yale University
New Haven, Connecticut

Previous Experience:

Yale University - Instructor, Asst. Professor - 1967-1972
Westmar College - College Nurse - September, 1962-June, 1963
Methodist-Kahler School of Nursing - September, 1963-June, 1965
University of Minnesota Hospitals - Nurse Clinician Consultant - February,
1971-March, 1971
Nurse-Midwife

Name: Florence R. Ruhland
Date of Appointment: September, 1971
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

B.S.N. (1950) College of St. Catherine
St. Paul, Minnesota

M.Ed. (1959) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Diabetes Education Center - Director of Nursing Education and Patient
Education Program - June, 1967-September, 1971
College of St. Catherine - Instructor, Asst. Professor - September, 1959-
June, 1967
University of Minnesota - Instructor - June, 1962-August, 1962
Northwestern Hospital School of Nursing - Instructor - October, 1955-September,
1958

Previous Experience: (continued)

Sisters of St. Joseph School of Nursing - Instructor - September, 1952-
September, 1955
Staff Nurse

Name: Eugenia R. Taylor
Date of Appointment: September, 1949
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

Diploma (1939) Sacred Heart School of Nursing
Havre, Montana

B.S. (1948) University of Minnesota
Minneapolis, Minnesota

M.S. (1955) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

University of Minnesota - Instructor, Asst. Professor, Assoc. Professor -
September, 1949-present
Staff Nurse
Public Health Nurse
Head Nurse
Sacred Heart Hospital School of Nursing - Nursing Arts Instructor - 1949

Name: Romana Urueta
Date of Appointment: May, 1967
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

Diploma (1948) Facultad de Entermeria
Universidad Nalide, Colombia

Certificate, Psy. (1949) University of Toronto
Toronto, Canada

B.S. (1956) University of Minnesota
Minneapolis, Minnesota

M.S. (1966) University of California
Los Angeles, California

Previous Experience:

Escuela Universilariade Enpevmeria - Instructor - 1963-1964
The Children Hospital - Instructor - 1957-1959
Universidad Nacional de Colombia - Instructor - 1951-1952
Supervisor

Name: Barbara A. Veatch
Date of Appointment: September, 1973
Rank: Instructor
Percentage of Appointment: 100
Education:
 B.S. (1964) College of St. Catherine
 St. Paul, Minnesota
 M.S. (1973) Case Western Reserve University
 Cleveland, Ohio.

Previous Experience:

Staff Nurse

Name: Mary G. Weisensee
Date of Appointment: December, 1968
Rank: Assistant Professor
Percentage of Appointment: 100
Education:
 Diploma (1961) St. Luke's Hospital School of Nursing
 Denver, Colorado
 B.S. (1965) University of Wyoming
 Laramie, Wyoming
 M.S. (1968) Wayne State University
 Detroit, Michigan

Previous Experience:

University of Minnesota - Instructor - September, 1965-September, 1967
 Laramie Vocational School - Instructor - January, 1965-June, 1965
 Staff Nurse

Name: Sharon L. Wilford
Date of Appointment: September, 1969
Rank: Assistant Professor
Percentage of Appointment: 100
Education:
 Diploma (1963) Mounds-Midway School of Nursing
 St. Paul, Minnesota
 B.S.N. (1967) University of Illinois
 Urbana, Illinois
 M.S. (1969) University of Colorado
 Boulder, Colorado

Previous Experience:

Mounds-Midway School of Nursing - Instructor - September, 1966-June, 1968
Staff Nurse
Camp Nurse

Name: Karen Lee Shogren
Date of Appointment: September, 1974
Rank: Instructor
Percentage of Appointment: 50
Education:

Pre-Nursing (1957) Gustavus Adolphus College
St. Peter, Minnesota
B.S.N. (1963) University of Minnesota
Minneapolis, Minnesota
M.S. (1970) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Winona State College - Instructor - September, 1971-June, 1974
St. Mary's Junior College - Asst. Professor - January, 1971-July, 1971
University of Minnesota - Instructor - September, 1968-January, 1969

Name: Carolyn A. Kochel
Date of Appointment: October, 1973
Rank: Instructor
Percentage of Appointment: 100
Education:

B.S.N. (1964) St. Olaf College
Northfield, Minnesota

Previous Experience:

Mercy Hospital School of Nursing - Assistant Instructor - September, 1965-
June, 1966

Name: Kathleen M. McMullen
Date of Appointment: June, 1974
Rank: Instructor
Percentage of Appointment: 100
Education:

B.S.N. (1971) Marquette University
Milwaukee, Wisconsin
M.S. (1974) Marquette University
Milwaukee, Wisconsin

Previous Experience:

Marquette University - Instructor - August, 1972-June, 1973
St. Francis Hospital School of Nursing - Instructor - August, 1971-August, 1972
St. Francis Hospital School of Nursing - Asst. Instructor - February, 1968-
August, 1969

Name: Linda A. Bjerke
Date of Appointment: December, 1974
Rank: Instructor
Percentage of Appointment: 50
Education:

B.S.N. (1963) St. Olaf College
Northfield, Minnesota

M.S.N. (1968) Wayne State University
Detroit, Michigan

Previous Experience:

St. Olaf College - Instructor - September, 1971-May, 1972
Michigan State University - Instructor - September, 1968-June, 1970

Name: Joan M. Tuberty
Date of Appointment: March, 1969
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

B.S. (1953) College of St. Catherine
St. Paul, Minnesota

M.S.N. (1957) Catholic University of America
Washington, D.C.

Previous Experience:

College of St. Catherine - Associate Professor - September, 1958-June, 1966
Catholic University of American - Instructor - September, 1957-September, 1958

Name: Frances E. Dunning
Date of Appointment: September, 1954
Rank: Associate Professor
Percentage of Appointment: 100
Education:

Diploma (1943) St. Luke's Hospital School of Nursing
New York City, New York

B.S. (1949) Teachers College, Columbia University

M.Ed. (1952) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

St. Luke's Hospital School of Nursing - Clinical Instructor - June, 1949-December, 1951

St. Luke's Hospital School of Nursing - Asst. Director, Clinical Instructor - December, 1953-September, 1954

Name: Irene E. Grossbach
Date of Appointment: December, 1974
Rank: Instructor
Percentage of Appointment: 100
Education:

B.S. (1970) Mankato State College
Mankato, Minnesota

M.S. (1974) Marquette University
Milwaukee, Wisconsin

Previous Experience:

University of Minnesota - Teaching Specialist - January, 1973-July, 1973

University of Minnesota Hospital - Staff Nurse - March, 1971-January, 1973

Hennepin County General Hospital - Staff Nurse - June, 1970-December, 1970

Name: Shirley A. Hoeman
Date of Appointment: September, 1974
Rank: Instructor
Percentage of Appointment: 50
Education:

B.S. (1964) University of Missouri
Columbia, Missouri

M.P.H. University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Sister Kenney Institute - Director, Nursing Service - 1970-1972

Medical Personnel Pool - Supervisor - 1970

Memorial Medical Center, Corpus Christi - Head Nurse, Surgery - 1965

Name: Carol L. Jorgens
Date of Appointment: September, 1973
Rank: Instructor
Percentage of Appointment: 100
Education:

B.S.N. (1965) St. Olaf College
Northfield, Minnesota

M.S. (pending) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Abbott-Northwestern Hospital - Instructor - September, 1969-September, 1971
Alton Memorial Hospital School of Nursing - Instructor - December, 1967-
September, 1969
Glenwood Hills Hospital School of Practical Nursing, - Instructor - July, 1966-
July, 1967

Name: Elaine E. Phillips
Date of Appointment: January, 1975
Rank: Teaching Specialist
Percentage of Appointment: 50
Education:

B.S. (1963) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Metropolitan Medical Center - Staff Nurse - May, 1973-December, 1974

Name: Vicki A. Romero
Date of Appointment: January, 1975
Rank: Teaching Specialist
Percentage of Appointment: 50
Education:

B.S.N. (1974) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

University of Minnesota Hospitals - General Staff Nurse - June, 1968-February, 1971
University of Minnesota Hospitals - General Staff Nurse - May, 1971-December, 1974

Name: Loretta A. Seitz
Date of Appointment: December, 1974
Rank: Instructor
Percentage of Appointment: 75
Education:

B.S. (1963) Boston University
Boston, Massachusetts

M.S. (1968) University of Maryland
College Park, Maryland

Previous Experience:

Middlesex Community College - Instructor - January, 1973- January, 1974
University of Maryland - Instructor - August 1968-November, 1968, September,
1969-September, 1971
Arnot Ogden Memorial Hospital - Instructor - March, 1964-May, 1965

Name: Bonnie J. Stickles
Date of Appointment: September, 1974
Rank: Instructor
Percentage of Appointment: 100
Education:

B.S.N. (1967) University of Wisconsin
Madison, Wisconsin
M.S. (1974) Columbia University

Previous Experience:

Grace Hospital, Detroit - Staff Nurse - 1970-1973
U.S.Navy, Navel Manpower Center - Staff Nurse - 1965-1970

Name: Caroline B. Adesina
Date of Appointment: September, 1974
Rank: Teaching Assistant (Graduate)
Percentage of Appointment: 40
Education:

B.S.N. (1974) University of Minnesota
Minneapolis, Minnesota

M.S. (Pending) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

University of Minnesota Hospital - Senior Nursing Assistant - 1970-1972
Matron Queen Mary's Hospital - Registered Nurse - January, 1969-December, 1969
Ministry of Health - Midwife - February, 1965-February, 1966
Ile-Abiye Maternity Hospital - Midwife - 1963-1965

Name: Glenys Cronin
Date of Appointment: July, 1974
Rank: Teaching Assistant (Undergraduate)
Percentage of Appointment: 20
Education:

Diploma (1964) Abbott Hospital School of Nursing
Minneapolis, Minnesota

B.S.N. (Pending) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Metropolitan Medical Center - Registered Nurse - March, 1973-September, 1973
VA Hospital - Registered Nurse - March, 1968-November, 1972

Name: Laurie K. Glass
Date of Appointment: April, 1975
Rank: Teaching Assistant (Graduate)
Percentage of Appointment: 40
Education:

B.S.N. (1971) University of Wisconsin (Madison)
M.S.N. (pending) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

U.S. Naval Hospital - Head Nurse - September, 1971 - September, 1973
Board of Education - Health Specialist - June, 1971-July, 1971
University of Wisconsin Hospitals - Nursing Asst. - June, 1969-October, 1970
St. Luke's Hospital - Ward Clerk - March, 1966-April, 1969

Name: Ruth C. Enestvedt
Date of Appointment: September, 1972
Rank: Instructor
Percentage of Appointment: 50
Education:

B.S. (1966) St. Olaf College
Northfield, Minnesota
M.S. (1972) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Massachusetts General Hospital - Staff Nurse - September, 1966-June, 1967
Minnesota State Health Dept., - Public Health Nurse - June, 1966-August, 1966
Minnesota State Health Department - Public Health Nurse - June, 1967-
August, 1967
Minneapolis Health Dept. - Public Health Nurse - September, 1967-September, 1970

Name: Lois E. Freeberg
Date of Appointment: January, 1972
Rank: Teaching Specialist
Percentage of Appointment: 100
Education:

A.A. (1952) Austin Junior College
Austin, Minnesota
R.T. (1957) St. Olaf Hospital and UMH X-Ray
Northfield, Minnesota
B.S.N. (1970) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

University of Minnesota - General Staff Nurse, Supervisor - June, 1970-December, 1971

Name: Blossom C. Gullickson
Date of Appointment: March, 1960
Rank: Instructor
Percentage of Appointment: 75
Education:

B.S.N. (1953) University of Minnesota
Minneapolis, Minnesota

B.S. (Nurs. Ed.) (1954) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

University of Minnesota - Instructor - March, 1970-June, 1970, part-time
Fairview Hospital, School of Nursing - Instructor - August, 1954-October, 1958
University of Minnesota - Graduate Nurse - April, 1953-June, 1954, part-time

Name: Marilyne R. Gustafson
Date of Appointment: September, 1963
Rank: Assistant Professor
Percentage of Appointment: 75
Education:

B.S. (1957) University of Minnesota
Minneapolis, Minnesota

M.S. (1960) University of Colorado
Denver, Colorado

Previous Experience:

Hamline University School of Nursing - Assistant Clinical Instructor -
June 1957 - July, 1959
University of Michigan - Assistant Professor - September 1960-July 1963

Name: Carolyn S. Stady
Date of Appointment: September, 1974
Rank: Instructor
Percentage of Appointment: 100
Education:

B.S.N. (1970) St. Olaf College
Northfield, Minnesota

M.S. (1974) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

Hennepin County General Hospital - Clinic Staff Nurse - May, 1973-June, 1974
University of Minnesota Hospitals - Pediatric Staff Nurse - June, 1973-September, 1973
St. Paul Public School System - School Nurse - January, 1971-June, 1972
Minnesota Department of Health - Staff Public Health Nurse - June, 1970-August, 1970

Name: Joan D. Stenberg
Date of Appointment: March, 1974
Rank: Instructor
Percentage of Appointment: 50
Education:

B.S.N. (1954) University of Minnesota
Minneapolis, Minnesota
M.S. (Pending) University of Minnesota
Minneapolis, Minnesota

Previous Experience:

University of Minnesota - Instructor - June, 1968-August, 1968, part-time
University of Minnesota Hospital - Head Nurse - 1960-67
University of Minnesota - Nurse Clinician - August, 1970-October, 1971
University of Minnesota - Clinical Director - October, 1971-October, 1973
University of Minnesota - Senior Night Float - October, 1973-February, 1974

Name: Arlene E. Wiskerchen
Date of Appointment: September, 1973
Rank: Instructor
Percentage of Appointment: 100
Education:

B.S. (1960) Viterbo College
LaCrosse, Wisconsin
M.S. (1971) University of Maryland
Baltimore, Maryland

Previous Experience:

Sacred Heart Hospital - OB-GYN Supervisor - 1961-1966
St. Francis Hospital - Asst. Director - 1966-1969
University of Maryland Hospital - Clinical Specialist - 1971-1972
Downstate Medical Center - Nurse-Midwifery Intern - May, 1973-August, 1973

Name: Karen L. Brand
Date of Appointment: September, 1974
Rank: Research Assistant
Percentage of Appointment: 50

Education:

B.S.N. (1969)	St. Olaf College Northfield, Minnesota
M.S. (Pending)	University of Minnesota Minneapolis, Minnesota

Previous Experience:

Hennepin County General Hospital - Staff Nurse - September, 1972-September, 1973
U.S. Navy Nurse Corps - Charge Nurse - August, 1969-July, 1972

<u>Name:</u>	Sister Mary Meyer
<u>Date of Appointment:</u>	September, 1973
<u>Rank:</u>	Research Specialist
<u>Percentage of Appointment:</u>	50
<u>Education:</u>	

B.S.N. (1957)	College of St. Catherine St. Paul, Minnesota
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Previous Experience:

St. Joseph's Hospital - Maternity Nursing Supervisor - 1956-1972
University of Minnesota - Center Consultant - November, 1972-October, 1973
part-time

<u>Name:</u>	Delores M. Krause
<u>Date of Appointment:</u>	June, 1974
<u>Rank:</u>	Research Fellow
<u>Percentage of Appointment:</u>	100
<u>Education:</u>	

B.A. (1953)	Hamline University St. Paul, Minnesota
M.S. (1966)	St. Cloud State College St. Cloud, Minnesota
Ph.D. (Pending)	University of Minnesota Minneapolis, Minnesota

Previous Experience:

University of Minnesota - Counselor, Program Adviser - July, 1973-June, 1974
University of Minnesota - Instructor - September, 1972-June, 1973
University of Minnesota - Instructor - June, 1970-September, 1972

Name: Mari (Soekorv) Palta
Date of Appointment: September, 1974
Rank: Research Fellow
Percentage of Appointment: 50
Education:

 Fil. Kand. (1970) University of Lund
 Fil. Mag. Lund, Sweden

 M.S. (1972) University of Minnesota
 Minneapolis, Minnesota

Previous Experience:

 University of Minnesota - Teaching Assistant - September, 1970-June, 1972
 University of Minnesota - Teaching Assistant - June, 1972-
 University of Lund - Teaching Assistant - January, 1964-September, 1970

Name: Patricia J. Johnson
Date of Appointment: July, 1974
Rank: Instructor
Percentage of Appointment: 100
Education:

 B.S. (1970) Mankato State College
 Mankato, Minnesota

 M.S. (Pending) University of Utah
 Salt Lake City, Utah

Previous Experience:

 University of Minnesota - Staff Nurse - June, 1970-August, 1971
 University of Minnesota - Assistant Head Nurse - August, 1971-May, 1972

Name: Gladys L. MacCarthy
Date of Appointment: September, 1968
Rank: Assistant Professor
Percentage of Appointment: 100
Education:

 B.S.N. (1953) University of Minnesota
 Minneapolis, Minnesota

 M.S. (1970) University of Minnesota
 Minneapolis, Minnesota

Previous Experience:

 None

<u>Name:</u>	Brenda H. Canedy
<u>Date of Appointment:</u>	April, 1973
<u>Rank:</u>	Instructor
<u>Percentage of Appointment:</u>	100
<u>Education:</u>	
A.B. (1954)	Radcliffe College Cambridge, Massachusetts
Elementary Education license (1955)	Indiana University Bloomington, Indiana
Baccalaureate (1971)	College of St. Catherine St. Paul, Minnesota
M.S. (1974)	University of Minnesota Minneapolis, Minnesota

Previous Experience:

Summit School, St. Paul - Director, Lower School - November, 1965-
January, 1967

Summit School, St. Paul - Faculty member - September, 1963-November, 1965

Radcliffe College, Cambridge, Mass. - Assistant to Director - Woman's
Archives - December, 1959-December, 1960

Nightingale-Bamford School, New York - Faculty member - September, 1956 -
June, 1959

Tudor Hall, Indianapolis, Indiana - Faculty member - September, 1955 -
June, 1956

University of Minnesota Hospitals
Private duty nurse
General staff nurse
Senior Nursing assistant

CLINICAL APPOINTMENTS

In accord with Goal VI of the School of Nursing, regarding expansion on interchange between the School and the Community, a two year study period has been established during which non-salaried clinical rank is conferred upon selected individuals (the number not to exceed 50% of salaried faculty) in situations where reciprocal appointments to nursing service can be accorded to University School of Nursing faculty. This arrangement is to provide access for faculty members to clinical practice and research opportunities and access of the clinical faculty to facilities and expertise of the School and influence of the School. Appointments are made through the Faculty Recruitment Committee. The initial appointment is for two years with annual review. Clinical appointees are committed to contribute a minimum of 60 hours per year in such activities as planned teaching, incidental/spontaneous teaching, orientation for faculty members, administrative planning for student experience and participation in research programs. The School of Nursing currently maintains the following clinical appointments:

<u>Name</u>	<u>Degrees</u>	<u>Rank</u>	<u>From</u>
Elizabeth Colloton	B.S.N. M.S.	Clinical Instructor	Hennepin County General Hospital
Marlys Friederichs	B.S. M.S.	Clinical Instructor	Hennepin County General Hospital
Margaret Hewitt	B.S. M.S.	Clinical Instructor	Hennepin County General Hospital
Jean Kintgen	B.S.N. M.S. Ph.D.	Clinical Associate Professor	Agassiz Region Nursing Education Consortium
Audrey Logsdon	B.S. M.S.	Clinical Instructor	Hennepin County General Hospital
Susan Nelson	B.S. M.S.	Clinical Instructor	Pilot City
Ellen O'Neal	B.S.N. M.S.	Clinical Instructor	Hennepin County General Hospital
Elizabeth Phillips	B.S. M.S.	Clinical Instructor	Hennepin County General Hospital

Current Faculty Vacancies

Currently, there are three faculty vacancies. They exist because of the scarcity of well qualified faculty to teach in the graduate program and will be filled and assigned to graduate positions as soon as available. The Associate Deanship will be vacant as of April 1, 1975, and the Deanship as of July 1, 1975. A search for a new Dean is presently occurring.

Faculty Projections for First Five Years After Completion of Facility

Major Teaching Assignment in	Year 1	Year 2	Year 3	Year 4	Year 5
Undergraduate Program					
Full time	42	42	42	42	42
Part time	13	13	13	13	13
Major Teaching Assignment in					
Graduate Program					
Full time	34	35	35	35	35
Part time	3	3	3	3	3
Research Assistants/ Associates					
Full time	1	3	3	3	3
Part time	3	3	3	3	3
Continuing Education					
Full time	2	3	3	3	3
Part time	0	0	0	0	0

Recruitment

Active recruitment for faculty is ongoing. Special effort is being placed on recruitment of graduate faculty to strengthen instruction in leadership, in maternal-child nursing, and to better meet the student enrollment demand in medical surgical nursing.

Faculty Development Program

There has been an active faculty development program for some years with University support (with finances and resource persons), especially in the area of developing instructional materials and improving instruction. The School has received 6 grants totally, 2 for media development and 4 for general educational development.

Other faculty development activities occur as part of the Research Development Grant (64/5448) and the Undergraduate Curriculum Development and Evaluation Grant (05 D 000308-040). In addition, the School has allocated 18% of its expense budget of \$28,000 for faculty development activities.

Supporting Personnel

The following represents a delineation of current support staff in the School of Nursing. All positions listed are personnel in the University Civil Service System.

Administration Officer

Senior Student Personnel Worker

2 Principal Clerks

1 Admissions clerk

1 Class and room scheduler and secretary to Continuing Education

Principal Account Clerk

Account Clerk

2 Senior Secretaries

1 Secretary to the Dean

1 Admissions Secretary

4 Senior Clerk Typists

3 Typists in the secretarial pool for faculty support.

1 Receptionist

4 Special Grants Secretaries

These are Senior Clerk Typists assigned to and paid for by outside research grants.

3 Part time student assistants

1 50% typist

1 50% Admissions and records assistant

1 50% Audio-Visual Technician

Increases in support staff anticipated for the first five years of occupancy in the proposed structure include one full time Audio-Visual Technician

responsible for the operation and minor maintenance of equipment utilized in the Nursing Skills laboratories located on level four and three senior clerk typists, two to augment the secretarial pool for support of increase projected faculty and one for support of assistant deans and associate dean. The Audio-Visual technician would have to be available as soon as the building is ready for occupancy. State funds for one additional senior clerk typist would be requested in 1977. State funds for the second and third typist would be requested so that the positions could be filled during the first year of occupancy in the new building.



UNIVERSITY OF MINNESOTA

Office of the Vice President for
Finance, Planning and Operations
301 Morrill Hall
Minneapolis, Minnesota 55455
(612) 373-5940

March 10, 1975

Lyle A. French, M.D.
Vice President for Health Sciences
432 Morrill Hall
East Bank Campus

Dear Doctor French:

My office has prepared the financial information for the Health Sciences School of Nursing for the years 1971-72, 1972-73 and 1973-74 from the information contained in the University of Minnesota Financial Report and other internal records.

Our projected budget for 1973-75 approximates a 9% increase over 1973-74. Based on previous expenses, 1975-76 and 1976-77 are projected using a 10% rate. For 1977-78 through 1979-80, 8% increases in costs are projected. The increases of the first three years are generally larger than those of the latter two years which reflect our five-year estimates of costs.

In terms of the format of this Financial Report, tuition estimates are shown as part of the income, even though tuition is collected centrally and is not credited to college accounts. Indirect costs such as maintenance and operation of University buildings, central administration and library expenditures are not shown in the collegiate summaries but are funded centrally.

We will be happy to supply any further information that may be needed for the applications.

Sincerely yours,

James F. Brinkerhoff

JFB:vma

Enc.

UNIVERSITY OF MINNESOTA
SCHOOL OF NURSING
Statement of Expenditures and Source of Funds

	<u>1972-73</u>	<u>1973-74</u>	<u>Projected 1974-75</u>	<u>Projected 1975-76</u>	<u>Projected 1976-77</u>	<u>Projected 1977-78</u>	<u>Projected 1978-79</u>	<u>Projected 1979-80</u>
SOURCE OF FUNDS								
State Government	\$ 459,155	\$ 475,877	\$ 519,000	\$ 571,000	\$ 629,000	\$ 679,000	\$ 733,000	\$ 792,000
Student Tuition	178,625	233,915	255,000	281,000	309,000	334,000	361,000	390,000
Sponsored Research								
Government	0	0	0	0	0	0	0	0
Non-Government	20,292	11,560	13,000	14,000	15,000	16,000	17,000	18,000
Non-Research & Student Aid								
Government	352,226	245,358	267,000	294,000	323,000	349,000	377,000	407,000
Non-Government	3,613	8,653	9,000	10,000	11,000	12,000	13,000	14,000
Miscellaneous--Temporary Investment, Overhead, and Other								
	<u>34,297</u>	<u>36,021</u>	<u>39,000</u>	<u>42,000</u>	<u>46,000</u>	<u>50,000</u>	<u>54,000</u>	<u>58,000</u>
Total Funds	\$1,048,208	\$1,011,384	\$1,102,000	\$1,212,000	\$1,333,000	\$1,440,000	\$1,555,000	\$1,679,000
EXPENDITURES								
Instructional								
Salaries & Wages	\$ 539,484	\$ 642,915	\$ 701,000	\$ 771,000	\$ 848,000	\$ 916,000	\$ 989,000	\$1,068,000
Supplies, Fringe Benefits, Expenses, Materials								
Services	124,060	102,212	111,000	122,000	134,000	145,000	157,000	170,000
Equipment	8,534	686	1,000	1,000	2,000	2,000	2,000	2,000
Sponsored Research								
Salaries & Wages	15,788	9,962	11,000	12,000	13,000	14,000	15,000	16,000
Supplies, Fringe Benefits, Expenses, Materials,								
Services	4,503	1,598	2,000	2,000	2,000	2,000	2,000	2,000
Equipment	0	0	0	0	0	0	0	0
Non-Research & Student aid								
Salaries & Wages	123,181	108,494	118,000	130,000	143,000	155,000	167,000	180,000
Supplies, Fringe Benefits, Expenses, Materials								
Services	232,132	140,045	153,000	168,000	185,000	200,000	216,000	234,000
Equipment	<u>526</u>	<u>5,472</u>	<u>5,000</u>	<u>6,000</u>	<u>6,000</u>	<u>6,000</u>	<u>7,000</u>	<u>7,000</u>
Total Expenditures	\$1,048,208	\$1,011,384	\$1,102,000	\$1,212,000	\$1,333,000	\$1,440,000	\$1,555,000	\$1,679,000

13

Curriculum

Baccalaureate Curriculum

The overall curriculum plan including the specially scheduled accelerated program for RN's is described in detail in this section.

The purpose of the undergraduate nursing programs in the University of Minnesota School of Nursing is to provide opportunities for students to gain a body of knowledge, skill, and understanding appropriate to the practice of professional nursing. With the use of a systematic problem solving approach, the student learns to make an assessment of nursing needs of patients, select and develop appropriate nursing intervention, and evaluate nursing care. The scope of these learnings and the degree of skill developed in their application are such that individuals are prepared, upon completion of the programs, to function in first-level beginning positions in nursing, and to gain additional proficiency through formal and informal post-baccalaureate study. Throughout the program, a coordinated balance of general and professional education is planned so that the student is encouraged to develop individual interests and potentialities through elective study in other disciplines.

The curriculum provides opportunities for the student to develop the ability to utilize synthesized principles and theoretical concepts from the natural and behavioral sciences, the adaptation frame of reference, critical and analytical thinking, interpersonal relationships, theory and skills, selected technical skills, and various dimensions

of the systematic process to effectively implement nursing care with a variety of recipients. The curriculum also provides learning opportunities and directed experiences so that graduates are prepared to function fully in professional practice, responsive to societal and technical changes by innovation, extension, and expansion. The interpersonal process of nursing in which the nurse and the recipient of nursing (individual, group or community) are primary participants demands such an education. The goal of nursing is to assist an individual, group or community to move toward optimal health. This goal is achieved through coordinated activities with other health disciplines such as the interdisciplinary course "Social & Psychological Aspects of Death and Dying" offered by the College of Pharmacy and School of Nursing. A description of this course can be found in the Appendix on Page 306.

The nursing program is four years in length. Students graduating from this accredited B.S. degree program are eligible to write the licensing examination; satisfactory performance entitles the applicant to practice as a registered nurse (R.N.) in Minnesota. The baccalaureate program also prepares students to be certified as Public Health Nurses by the State Board of Health.

Instructional Methods

Instructional methods include lectures, discussion groups, labs and clinical learning experiences in a wide variety of agencies. The faculty

have begun use of some simulated clinical testing and would like to greatly enlarge this method for simulated instruction as well as for evaluation. This, however, requires more audio-visual capability than we presently possess.

The undergraduate curriculum, as a result of the Division of Nursing funded Project Grant, is on a planned schedule of development and evaluation.

Curriculum Revisions

The conceptual framework and curriculum plan, including development of specific courses, have been completed. The revised program is in its second year of implementation in the sophomore year, first year in the junior year and will be implemented 1975-76 in the senior year. The evaluation plan which is part of that project generally follows the implementation plan with formative evaluation (evaluation with feedback for correction) for one-two years and summative evaluation (evaluation of the final fully developed course, with no feedback) for 1-2 years.

Framework, Undergraduate Curriculum

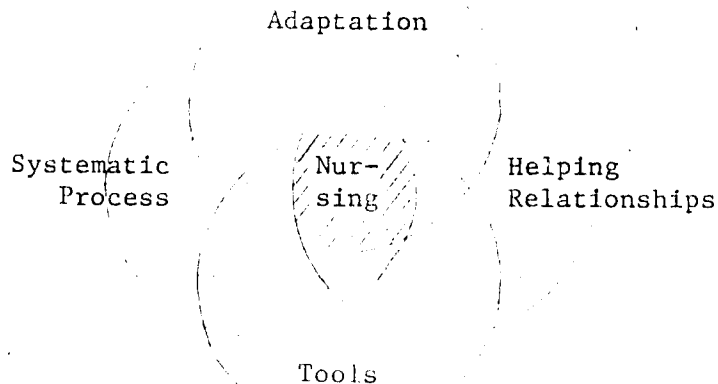
The Undergraduate Curriculum is based on a conceptual framework of nursing which incorporates 4 strands or elements: Adaptation, Helping Relationships, Systematic Process and Tools.

- 1) Adaptation: Adaptation provides a conceptual model for viewing man as a holistic being.
- 2) Helping Relationships: Helping Relationships are an essential element in the interpersonal process of nursing, and knowledge about the ability to form helping relationships is a crucial area of knowledge.
- 3) Tools: Basic skills are important tools for assessment, planning, intervening and evaluating nursing care and are means for achieving nursing goals.
- 4) Systematic Process: Systematic process is essential knowledge both as a knowledge area and as a means for systematizing the process of synthesis.

It is the synthesis of these four strands or knowledge areas that is nursing.

This conceptual framework is visually presented in the following model:

Model of Conceptual Framework



The Curriculum is divided into small units of instruction. Courses in which basic knowledge is taught are followed by courses in which students have opportunities to synthesize knowledge in patient care situations. Courses are organized sequentially into three hierarchical levels. The levels are determined by the number and complexity of the variables the student is expected to consider:

Level 1: Manipulating the component strands of nursing within a basically situation.

Level 2: Manipulating the component strands of nursing with a client experiencing crisis or loss or chronic problem.

Level 3: Manipulating components of nursing within complex situations where either the setting or the client or both provide the complexity.

The four strands of knowledge areas are each taught as separate, discrete courses. Each area is taught twice, once at each of the first two levels.

The first level knowledge courses focus on situations in which the clients are relatively healthy and functional. Second level knowledge courses focus on content concerning disruptions of normal function.

The curriculum design program prerequisite and articulation with supportive courses is shown in the diagram on the following page.

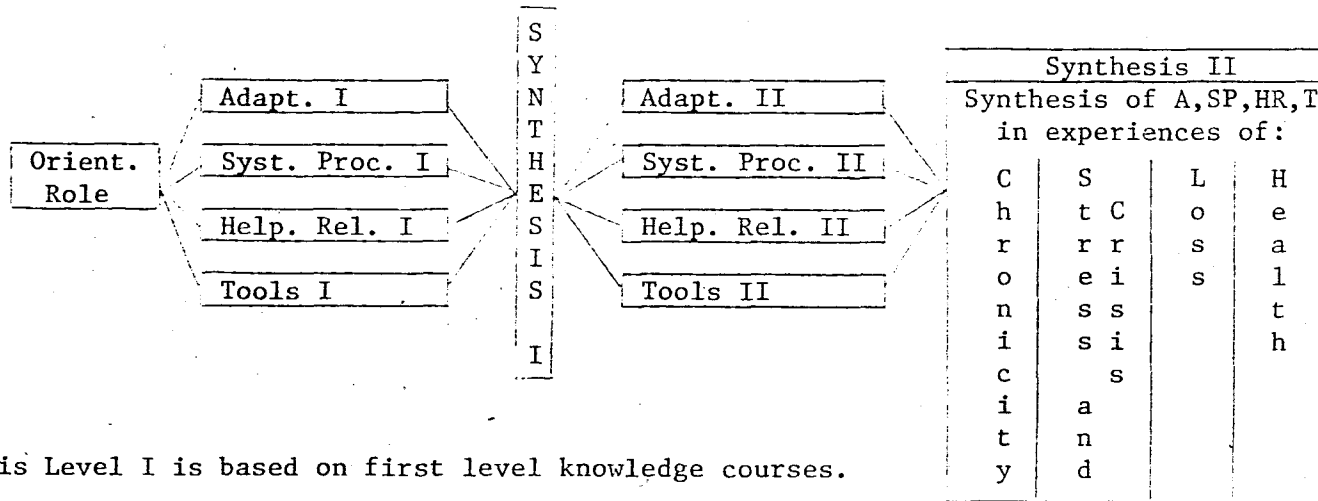
Exhibit A: Undergraduate Curriculum Scheme

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English	Anatomy	Pathophysiology	Nutrition
Sociology	Physiology	Pharmacology	Pub. Hea. Science
Anthropology	Med. Biochem.	Abnormal Psychology	
Biology	Microbiology		
Chemistry	Group Theory		
Psychology	Growth & Dev.		

(1)

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Synthesis Level I is based on first level knowledge courses.

Synthesis Level II is based on Synthesis I and second level knowledge courses. The four discrete synthesis courses each have a single focus for synthesizing experiences. Because the base is greater, the scope of synthesis is greater as the student deals with more variables.

Synthesis Level III is based on Synthesis II and all its precedents. Therefore, the scope and depth of synthesis within any one level III course is greater than in level II.

Synthesis III		
Synthesis of A, SP, HR, T and experiences of stress and crisis, loss, chronicity and health in:		
Complex nursing situations	Leadership and Management	Nursing electives

<u>Freshman Year</u> Freshman English (3 cr. total) Chemistry (8 cr. total) Electives	Freshman English Chemistry Cultural Anthropology - (at least 3 cr.)	Biology (4-5 cr.) Introductory Sociology - (at least 3 cr.)	Total Electives (12-19 cr. for admission to School = 45
<u>Sophomore Year</u> MicB 5-233 (7 cr.) MdBe 3-050 (4 cr.) Psy 1-001 (5 cr.) Nurs. 5-201 (2 cr.)	Phs1 3-051 (5 cr.) Nurs. 5-202 (2 cr.) Nurs. 5-203 (2 cr.) Nurs. 5-204 (2 cr.) Nurs. 5-205 (1 cr.)	Anat 1-004 (4 cr.) C Psy 3-301 (4 cr.) F.Sci 3-622 (4 cr.) Nurs. 5-206 (1 cr.) Nurs. 5-207 (2 cr.) Nurs. 5-208 (3 cr.)	Nursing and other courses are offered in Summer for students who wish to accel- erate or decelerate.
<u>Junior Year</u> Nurs. 5-400 (2 cr.) (Pathophys) Phcl 1-009 (3 cr.) Nurs. 5-407 (2 cr.) Nurs. 5-408 (1 cr.) Nurs. 5-409 (2 cr.) Nurs. 5-403 (1 cr.)	Nurs. 5-401 (2 cr.) (Pathophys) Abnormal Psych (*4 cr.) Nurs. 5-404 (1 cr.) Nurs. 5-611 (4 cr.) Nurs. 5-613 (3 cr.)	Nurs. 5-402 (2 cr.) (Pathophys) Nurs. 5-405 (1 cr.) Nurs. 5-612 (4 cr.) Nurs. 5-614 (3 cr.) Nurs. 5-615 (3 cr.)	
<u>Senior Year</u> P.H. Sci. 5-006 (5 cr.) Nurs. 5-630 (6 cr.)	Nurs. 5-640 (6 cr.)	Nurs. 5-650 (6 cr.)	

C. I.

PATTERN OF ENROLLMENT
 RACCALAUREATE PROGRAM
 FOR CLASS OF 1975

Total credits for degree: 180

BACCALAUREATE DEGREE IN NURSING
UNIVERSITY OF MINNESOTA
1974

AREAS OF STUDY	ENTRANCE REQUIREMENTS	THE NURSING PROGRAM			TOTAL CREDITS
	Freshman	Sophomore	Junior	Senior	

Required Courses

Nursing		2 cr. 5201 Role 2 cr. 5202 Process I 2 cr. 5203 Adaptation I 2 cr. 5204 Help. Relation. I 2 cr. 5205-6 Tools I	2 cr. 5207 Synth.	2 cr. 5407 Process II 1 cr. 5408 Adaptation II 2 cr. 5409 Help. Rel. II 3 cr. 5403-4-5 Tools II 4 cr. 5611 Chronicity 4 cr. 5612 Stress, Crisis 3 cr. 5613 Loss 3 cr. 5614 Health	3 cr. 5615 Synth: Community Assessment	5 cr. 5816 Leadership 10 cr. electives in Nursing	52
Bio. Med.		7 cr. MicB 5233 Microbio. 4 cr. MdBc 3050 Biochem. 5 cr. Phs1 3051 physio. 4 cr. Anat 1004 anatomy 4 cr. FScN 3622 Nutrition	or	6 cr. Nurs 5400-1 pathophysiology 3 cr. Phc1 1009 pharmacology 4 cr. FScN 3622 Nutrition		5 cr. PubH 5006 community health	38
Liberal Arts	8-6 cr. English comp. 8-10 cr. Gen. chemistry 4-5 cr. Gen. biology 3-5 cr. Cultural anthro. 3-4 cr. Intro. to Soc.	-----) -----) ----- 4 cr. general Psychology 4 cr. child Psychology 3 cr. group theory N5208		----- ----- ----- 4 cr. abnormal psychology 3604, 3604y (or 5604-5)		-----Group A----- -----Group B-----)-----Group C-----	6 15 22

Elective Courses

Liberal Arts		20 credits must be in Upper Div.	20 credits selected to meet the balance of the distribution requirements		Group A: 8 Group D: 12	
	15 + credits --- free choice from among liberal arts courses		12 + credits --- free choice from among liberal arts credits			27
TOTAL	45 credits		135 credits			180

Scheduling of Courses, Class Size and Frequency of Offerings -
Undergraduate Program

The following chart provides a listing of courses, number of offerings per year, and size of class, including size of lab sections. The undergraduate program is in process of moving from one offering of each nursing course per year to more flexible scheduling to allow students to accelerate, decelerate, or drop out for varying lengths of time. At this time, most nursing courses are offered twice a year; it is expected that many will require one additional offering per year.

<u>Course</u>	<u># of Quarters Running/year</u>	<u>Quarter Credits</u>	<u>Size of Group</u>
<u>Prenursing</u>			
English Composition	4	8	
General Chemistry	4	8	
General Biology	4	4	
Cultural Anthropology	4	3	
Introductory Sociology	4	3	
Electives	4	19	
<u>Sophomore Year</u>			
Medical Microbiology	1	7	170 Lab 85 each
Biochemistry	1	4	155
General Psychology	4	5	
Role of Nursing	1	2	155
Physiology	1	5	155
Nursing - Systematic Process I	2	2	78
Nursing - Adaptation I	2	2	78
Nursing - Helping Relationships I	2	2	15
Nursing - Tools I	4	2	15
Anatomy	2	4	200 Lab 100 each
Child Psychology	2	4	
Food Science and Nutrition	2	4	170
Nursing - Synthesis	2	2	8
Nursing - Group Skills	1	3	155
<u>Junior Year</u>			
Pathophysiology	2	4	150
Pharmacology	1	3	108
Nursing - Systematic Process II	1	2	108
Nursing - Adaptation II	1	2	108

Nursing - Helping Relationships II	1	2	15
Nursing - Tools II	3	3	15
Abnormal Psychology	2	4	
Nursing Synthesis - Chronicity	1	4	50
			Lab size 8
Nursing Synthesis - Stress & Crisis	2	4	50
			Lab size 8
Nursing Synthesis - Loss	2	3	50
			Lab size 8
Nursing Synthesis - Health	2	3	50
			Lab size 8
Electives	4	8-10	
<u>Senior Year</u>			
Public Health Science	2	5	140
Nursing Synthesis and Nursing Roles	4	18	70
			Lab size 8
Electives	4	12	

UNIVERSITY OF MINNESOTA
School of Nursing

Special R.N. Program
Baccalaureate Degree

A special program for Registered Nurses is available which makes it possible for students to earn a Bachelor of Science degree in Nursing with the shortest possible interruption of their careers. The time required depends upon the number of college credits the student already has completed and the additional credits which can be earned by passing examinations in lieu of registering for courses.

Requirements for graduation are 180 college credits (56 in nursing, 34 in biomedical required courses, 45 in liberal arts required courses, and 45 in liberal arts elective courses).

Applicants for the Special R.N. Program need to complete a minimum of 45 quarter credits before they enter the program. The courses which must be included in those 45 credits are:

General Chemistry	8 quarter credits
General Biology	4 quarter credits
English Composition	8 quarter credits
Cultural Anthropology	3 quarter credits
Introductory Sociology	3 quarter credits

The balance of the 45 credits required for admission may be in any liberal arts courses. A course in General Psychology is recommended, but not required for admission.

These credits may be earned in any accredited college, such as a junior college, a 4 year college, the University's College of Liberal Arts or its Extension Division.

Applicants can get credit by examination for the prerequisite courses listed above, for many elective courses, and for some of the required courses in the baccalaureate nursing program through CLEP Examinations and challenge examinations. These examinations make it possible for R.N.'s to gain college credit for past non-collegiate experiences.

CLEP examinations: The College Level Examination Program (CLEP) sponsored by the College Entrance Examination Board, is a national program of credit by examination that offers the opportunity to obtain recognition for college-level achievement, no matter when, where, or how the material was learned.

CLEP has general examinations in five liberal arts areas and subject examinations in Chemistry, Biology, Psychology, Sociology, and Human Growth and Development. One need not be a student at the University to take the exams. The Office for Special Learning Opportunities in 105 Johnston Hall, University of Minnesota campus, has information about these tests. (Phone 373-7550)

Nursing challenge exams: Registered nurses accepted for admission to the School of Nursing may challenge the following nursing courses:

- 5201 Role of Nursing Within Health Care - 2 credits
- 5202 Systematic Process - 2 credits
- 5203 Adaptation - 2 credits
- 5204 Helping Relationships - 2 credits
- 5400 Pathophysiology - 2 credits
- 5401 Pathophysiology - 2 credits
- 5402 Pathophysiology - 2 credits

The nursing challenge examinations will be scheduled some time in July.

In order to be admitted to the Special R.N. Program, applicants must either (a) successfully pass the challenge examinations for Nursing 5201, 5202, 5203, and 5204, or (b) have received a grade of P or C or better in these courses through the Extension Division of the University of Minnesota.

Other challenge exams: Required biological sciences of Anatomy and Physiology have departmental challenge exams. The Physiology examination will be scheduled in June and the Anatomy examination will be late in August.

Students admitted to the Special R.N. Program will have their schedules arranged individually. In general, it will be possible for these R.N.s to complete all of the required courses in the baccalaureate nursing program in 5 college quarters. Study will begin with the Fall Quarter and extend through Winter Quarter, Spring Quarter, an 8 week Summer Session, and the final Fall Quarter. Those who have completed a total of 180 credits at that time will be ready to graduate. Others can complete their remaining elective credits at their own convenience.

During the 5 quarters of the Special R.N. Program, students will be expected to take a full-time schedule of courses, or approximately 15 credits each quarter. Many students who are presently enrolled in a similar Special R.N. Program this year find it possible to work about half-time while they are studying by choosing weekend and/or evening working hours.

Students enrolling in the Special R.N. Program will have the advantage of taking professional nursing courses which have been designed to capitalize

on their nursing experience and to give them more advanced and challenging learning opportunities than is possible with regular students in the undergraduate program. While there will be some review, this will be kept to a minimum.

Applications for admission may be secured from the Office of Admissions, 6 Morrill Hall, University of Minnesota. They must be filed by April 15th for consideration for admission to the R.N. program beginning with the Fall Quarter. A maximum of 25 students will be selected on the basis of their grades in college courses completed by April 15 and their score on a test of academic ability (the "Ohio 26" test).

Contact Glenys Cronin (373-3462) for further information or assistance.

Graduate Curriculum

The master's program plan is outlined on the attached chart. It offers a choice of three areas of concentration (Medical-surgical, psychiatric-mental health, or childbearing-childrearing family nursing); an option of leadership, education, advanced clinical, or nurse midwifery; and required research block. While a decision has not yet been made about a doctoral program in nursing, there are at all times about ten nurses obtaining doctoral preparation in other majors who take part of their program in the School of Nursing.

Career Mobility

This School of Nursing has accepted a responsibility for career mobility, consistent with its position in the state and region. Of the nine baccalaureate nursing programs in Minnesota, six are in private liberal arts colleges who have tended not to identify the career mobilist as part of their population, and the other two are in the state college system and have remained small without active career mobility programs.

The University School of Nursing has always admitted R.N. students but two years ago developed a specially arranged program for this group. The curriculum and terminal objectives are the same as for generic students. Alterations include an extensive system of counseling and challenge exams for appropriate advanced placement, scheduling of the nursing courses to allow acceleration (required nursing and some other courses can be completed in 5 quarters) and special teaching methods to ease psychological transition

in the program. One class has completed the program; approximately half of the students are moving directly to the master's program. A second class is in process; there were approximately twice the number of qualified applicants as could be admitted.

At the graduate level nurses are being accepted into the program with a baccalaureate in any field. The Entering Behaviors Project will study the competencies brought by all students to the Master's program and will make recommendations regarding the variability of competencies and means by which to improve them to insure successful graduate study. These activities at the graduate level are aimed at providing access for nurses with nontraditional backgrounds but also a safeguarding quality of the degree.

The most widely used instructional methods are seminars and clinical experiences jointly planned by faculty and students. Significant experimentation has occurred in the use of television as a form of feedback in improving skills in helping relationships in clinical and teaching settings in the undergraduate program, there are not sufficient rooms and equipment available to use this method of instruction and evaluation optimally.

Plans for expansion of enrollment and for accomplishing the Schools long range goals, require space and facilities that are not now available.

Through private funding, the School is doing a study to locate within Minnesota and adjacent areas of surrounding states, nurses with baccalaureates who are admissable to Graduate School and are interested in obtaining a

master's degree in nursing but are unable to leave their homes for 2 years to enroll at the Minneapolis campus. The potential for offering part of the program on an external degree basis, in outstate sites, is being studied.

(See Appendix, Page 311, for "Guidelines for Degree Credit Courses Outside the Twin Cities", School of Nursing policy to provide education outstate.)

Scheduling of Courses, Class Size and Frequency of Offerings -
Graduate Program

The following chart provides a listing of courses, number of offerings per year, and size of class.

<u>Course</u>	<u># of Quarters Running/Year</u>	<u>Quarter Credits</u>	<u>Size of Group</u>
Nursing Research	1	3	41
<u>Medical Surgical Nursing:</u>			
Nursing from a Growth Oriented Philosophy	1	6	14
Crisis Experience: Nursing Assessment and Intervention	1	6	14
Assisting Groups to Improve their Health	1	6	14
<u>Psychiatric-Mental Health Nursing</u>			
Foundations of Psychiatric Nursing	1	3	12
Psychiatric Nursing - Individual Patients	1	6	12
Psychiatric Nursing - Groups of Patients	1	5	12
Psychiatric Nursing - Community Psychopathology	1	3	12
<u>Childbearing-Childrearing Family Nursing</u>			
Childbearing and Childrearing Family Nursing Care	3 (different course each quarter)	2 ea = 6	15
Care of the Childbearing Family I	1	4	9
Care of the Childbearing Family II	1	4	9
Care of the Childbearing Family III	1	4	9
Care of the Childbearing Family in Risk	1	4-6	7
Nurse-Midwifery Management	2	9-10	6
Childrearing Family in Health I	1	3	6
Childrearing Family in Health II	1	3	6
Childrearing Family in Illness	1	6	6
Family Development	4	4	
Child Development	2	4	

Other

Advanced Physiology	2	6	34
Advanced Clinical Nursing	3	1-9	6
Instruction in Nursing	2	4-6	12
Curriculum in Nursing	2	4-6	10
Educational Measurement	4	4	
Learning Theory	4	4	
Clinical Nursing Leadership	2	3	5
Electives	4	2-8	
Statistics	4	3-4	

(Dec. 1974 - Sample Patterns of Coursework)

U OF MINNESOTA - GRADUATE SCHOOL MASTER OF SCIENCE DEGREE - PLAN B MAJOR: NURSING

REQUIREMENTS:

For Admission: R.N. with Baccalaureate Degree - Previous Scholastic Achievement minimum "B" average.

For M.S. - Plan B (without thesis): Completion of Plan B Project(s) - empirical study of nursing question.

Minimum: 44 credit total 20 credits in Major* (nursing courses)

8 credits in related fields (other than nursing courses)

For Nursing Major*:

1. Nurs 8-021 Research (3 cr.) plus Plan B project(s) to meet objectives of research component
Graduate level statistics course or demonstrated evidence of knowledge of statistics
2. ONE of three Areas of Concentration including required supportive courses as indicated
3. ONE option - minimum of 9 credits.

		FALL	WINTER	SPRING	SECOND FALL
ONE of three Areas of Concentration	Med-Surg Nursing	Nurs 8-100 (6)	Nurs 8-101 (6)	Nurs 8-102 (6)	
		An advanced physiology course.....			
	Psych-Mental Health:	Nurs 8-200 (3)	Nurs 8-201 (6)	Nurs 8-202 (5)	Nurs 8-203 (4)
		Nurs 8-204 (3)			
		Coursework in small group communication recommended.....			
	Childbearing-Childrearing	Nurs 8-300 (2)	Nurs 8-301 (2)	Nurs 8-302 (2)	
	Family Nursing:	Family Development Coursework.....			
		A. Nurs 8-310 (4)	Nurs 8-311 (4)	Nurs 8-312 (4)	Nurs 8-313
		An advanced physiology course.....			Nurs 8-003 (5) (elective, 4-6)
		OR			
	B. Nurs 8-350 (3)	Nurs 3-351 (3)	Nurs 8-352 (6)		
	CPsych 5-331 (4).....				

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OPTIONS:

- Select one or combinations.
1. Advanced Clinical: Nurs 8-060 (9 cr. minimum) - Individual contact with faculty person to plan in-depth study in particular clinical area of interest.
 2. Advanced Clinical plus Education: Nurs 8-060 (5 cr.) plus Nurs 8-505 (4-6 cr.) Teaching-Learning Process
 3. Education: Prerequisite - completion of one quarter of an Area of Concentration
Nurs 8-504 (4-6 cr.) plus a course in measurement
Nurs 8-505 (4-6 cr.) plus course in learning theory
 4. A second Area of Concentration: Contract with faculty member in the second area
 5. Nurse-midwifery: Prereq. - completion of CCFN Area of Concentration plus N 8-313 and N 8-314.
 6. Leadership: two quarters sequence in seminars and field work plus coursework in organization theory.

Research Program

Space limitations have contributed to the limited research activity in this school.

The present research interest and activities were stimulated by the faculty approval of research goals.

On July 29, 1971, the following statement of goals of the School of Nursing relating to research was approved.

GOALS RELATED TO RESEARCH

- "A. Strengthening research competencies of faculty and appoint new faculty with research interests and demonstrated skill.
- B. Activate the research position. This would facilitate faculty participation in research, would be a means of providing learning experiences for faculty in the area of research.
- C. Establish a nursing research area and/or develop research programs within existing areas.
- D. Minimum of three projects to be undertaken within 5 years.
- E. Improve the climate of intellectual inquiry and dialogue to stimulate originality.
- F. The School should be represented by periodic publications from its faculty."¹

The position of the Research Chairman was filled in September, 1972, and she, together with an interested group of faculty members, submitted the faculty research grant application in January, 1973. The grant was approved in June, 1973. The grant was funded June 1, 1974. Simultaneously, under the new Constitution and Bylaws the Research Committee was established. The Research Committee is involved in developing its mission statement and implementation of the statement. The Research Committee serves in an advisory capacity to the principle investigator of the Faculty Research Grant.

The project staff consists of Delores Krause, Mari Palta as research associates and Charlotte Ann Cronseth as secretary with Ida M. Martinson as project director and principal investigator.

Since June, the following faculty involved in research projects have utilized, in varying degrees, Grant personnel. The assistance has ranged

from the preparation (typing) of study materials and discussion of research ideas to help with the selection of the study sample and the design of the study.

Although not all faculty doing research have involved the Research Center in their projects, the following faculty research projects have involved Grant staff:

Marie Albrecht - "Needs of Recently Bereaved Widows: A Longitudinal Study"

Pat Johnson - "Effects of Preoxygenation of Neonates Prior to Suctioning"

Diane Kjervik - "Sex Stereotyping Among Psychiatric Nurses"

Ida Martinson - "Home Care of the Dying Child"

Nancy Malcolm and Sharon Wilford - "Health Through Growth"

Julia Randall - "Statewide Survey of Continuing Education Needs of Minnesota's Registered Nurses"

Sharon Rising - "Evaluation of the Nurse-Midwifery Service"

Florence Ruhland - "Teaching the Visually Handicapped Diabetic Self-Administration of Insulin"

Joan Tuberty - "Analysis of the Ethical Decision Making Process in Professional Nurses"

Barbara Veatch and Elizabeth Ojala - "A Comparison of Sociodrama and Case Discussion in the Teaching of Confrontation Skills to Nurses"

Several of these studies are still in the planning stages; some are being piloted and still others have been completed in their present form.

A research newsletter has been started and two issues have been prepared.

There is an on-going weekly seminar for the faculty involved in the project "Home Health Care." Members of the seminar are Mary Ann Anglim, Barbara Veatch, Mary Weisensee, Romana Urueta and Alice Graner. These

faculty members are also caring for a child with cancer. Ida Martinson and Evelyn Peterson are coordinators of the seminar. A second research seminar began Winter quarter on pain. The members of this seminar are Betty Mullin, Virginia Pidgeon, Alice Graner, Dorothy Moe, Margaret Carolan and Nancy Menzel.

A series of workshops for use of the programmable calculator are being planned. The staff continues to support the faculty in their research endeavors in whatever they can.

In closing the following was the rationale section in our research grant which articulates our faculty stand.

"The School of Nursing active participation in research is essential for the accomplishment of its mission. This mission includes responsibilities to the people of the State of Minnesota, the nursing profession, the students of our academic programs, and the faculty of the School of Nursing.

The School assumes responsibility for the improvement of nursing care through its programs of nursing education, research, and service. In the past these three responsibilities have been fulfilled unequally. The major emphasis of the School has been on education and an innovative curriculum development. The people of Minnesota, by virtue of their support of a School of Nursing in a university setting, are entitled to expect the School to also assume some leadership in nursing research.

The School's responsibility to the nursing profession is evidenced, in part, by the fact that it serves a broad geographic region. The School is the only university school in the State of Minnesota, and one of only a few schools in the upper Midwest was graduate offerings. On-going research activity would be an important contribution to nursing generally, and specifically, to nursing in the upper Midwest area.

The promotion of a research environment in the School is vital to the further development of quality research offerings for graduate students, and for the strengthening of the graduate and undergraduate offerings. It would be particularly essential for the realization of a Ph.D. program in nursing.

Finally, an active research program would have an important impact on the opportunities the School could provide for faculty development. It would increase the availability of activities contributory to the strengthening and expansion of faculty knowledge and skills.

For reasons of fulfilling the School's responsibility to the people of the State, the nursing profession, the students and faculty, therefore the development of a research environment in the School and the active participation by faculty in research is viewed as essential."²

Potential for the future: The School of Nursing has seven faculty members who have completed research at the doctoral level. This group can serve as fact of the nucleus for the development of a community of scholars and for the leadership of nursing research in this area. This core of individuals can also be part of the support and stimulus necessary for scholarly activities. Faculty members are sought for doctoral thesis advisement as well as for consultation in nursing research.

Looking to the future a nursing research center seems to be a possible mechanism that will aid the continuation of nursing research for the faculty and in fact lead to a greater involvement of nurses in this area in nursing research.

¹ University of Minnesota School of Nursing's Goal Statement, July, 1971

² Faculty Research Grant Application, January, 1973.

Implementation of the Nursing Program in Unit F

The following information provides a floor by floor description of the use of the new facilities in relationship to the teaching program. More specific details relating to nursings planned scheduling of the facilities and class size is provided on the charts beginning on page 153.

Floor 1

Locker space and lounge area allow students to store coats and materials, so they can move in comfort around the Health Science complex. Some space for students to congregate informally will be provided and office space to house student organizations.

Nursing Educational Development and Research

This area provides work space and data security for up to six research projects and their supportive clerical staff. It also includes work space for Continuing Education including a sound proof conference room for their telelectures which are transmitted throughout the state. Besides the conference room, which would be a permanent structure within the area, the room can be divided by movable partitions, according to the number of research projects which might be funded within the School at any one given time, into individual work rooms which can be made secure. Space for clerical support staff to the projects and general work space for collating and assembling packets of material for both Continuing Education and research would be permanently set aside.

Floor 2

The two classrooms shared with Pharmacy are not available in the rest of the Health Science complex. They will be utilized especially for courses in which it is advantageous and efficient to have some classes with the total group broken into smaller groups. This combination of lecture-discussion and/or demonstration has especially been useful for courses like: Nursing 5201, which focuses on information basic to nursing roles but also clarification of the students' own value patterns and fit to nursing.

Floor 4

Floor 4 develops a major instructional facility for Nursing that is not presently available in the Complex. It represents a "nursing" concept - the constellation of skills that can be learned in a laboratory necessary to perform the nursing role.

Nursing Skills Lab with Critical Care Unit

This combines the traditional nursing arts lab with a small space fully equipped for lab practice of critical care skills for adults, children and infants. Instruction for large numbers of nurses in critical care skills, has been carried on largely through non-degree credit continuing education programs. This is expensive since it occurs in addition to the basic degree preparation, and the programs can vary in educational quality. For this reason undergraduate electives (10 credits of which are required for graduation) now include or are planned to include courses in intensive care, coronary care emergency and neonatal intensive care. The coronary care unit nursing elective is now being offered as is a continuing education program for emergency room nursing.

Helping Relationships Lab

As teaching of helping relationships becomes more highly developed, it is necessary to have available space where student's performance can be recorded and where feedback can be given and more student practice accomplished. Faculty are using videotaping feedback presently, but have inadequate facilities to accommodate more than a very few practice and feedback sessions. Since the helping relationship is a primary tool for the nurse, instruction in that skill permeates both the undergraduate and graduate programs. Concentrated instruction in this area of nursing occurs in two undergraduate courses, in the psych-mental health and teacher preparation components of the graduate program. Students need to develop skills with groups and individually; thus some of the space is programmed for rooms where a student can work with 1 or 2 clients, other space (6 units) to accommodate 1 or 2 students working with families or other client groups up to size 15.

Some time in these rooms will be held open for Pharmacy school use, since instruction in helping relationships has become important to the clinical role of the pharmacist. The School of Nursing and College of Pharmacy have for two years jointly offered a course in Death and Dying to a small group of students from both schools. It

is expected that such efforts in the behavioral aspects of patient will continue and expand and that this instruction will necessarily include work on basic helping relationship skills in part utilizing this lab.

Audiovisual Capability in Lab

An area of 2600 square feet has been programmed for students working with one or two clients. This space has been designed through collaboration with the Health Sciences Learning Resources Center in order that optimal efficiency might be obtained in the least amount of space physically possible. The room contains a large conference/teaching space of 42' x 20' which can be divided into two smaller areas. Around the periphery of the large area will be twelve cubicles of 9' x 7' and eight of 12' x 9'. The smaller cubicles will be equipped with fixed black and white cameras and recorders which could be replaced by color equipment if the occasion called for it. The larger cubicles allow for flexibility and space for playback and previewing.

The six units for groups up to 15 have also been designed with the aid of the Learning Center utilizing equipment which will adequately fulfill the School's needs, but yet keep within a realistic budget. Each unit is programmed for 300 square feet being equipped with three fixed cameras and two ceiling mounted microphones. The three cameras in each room will be linked to a control area where an instructor or student can monitor the progress in the rooms and control recording through the appropriate camera. The control room will also be equipped with six video cassette recorders, one for each of the units. It is envisioned that three portable playback systems would be necessary which could be moved into the group laboratories or be moved to some other area for preview.

Children's Lab

In the undergraduate program care of children is no longer an isolated 3 month block of instruction with sick children. Rather, care of children is incorporated in every course. In addition, the new area of concentration in the master's program - childbearing, childrearing family nursing - is now two years old, and the need for facilities to support it has become obvious.

The facilities include a play-observation area for assessment of growth and development and practice of some nursing interventions as well as exam rooms for students learning full health assessment

(including physical exam skills) which are being integrated in both graduate and undergraduate curriculums.

Adult Health Assessment Lab

The incorporation of physical assessment skills into both programs plus the midwifery programs at the graduate level, necessitates facilities for practicing those skills. It is expected that the room configuration will allow for group teaching of patients in the middle space with exam rooms around the periphery.

Audiovisual Storage and Assembly Area

This area is to serve this floor (the nursing skills lab) only. There is a shared Learning Resources Center to be available in Building B/C. A few small groups of learning carrels may be placed in the lab, but in addition A-V programs will be made available on carts, to be taken to the bedside or other area in the lab where the student is practicing. This room will allow for storage and assembly of hardware and software to directly support this instructional need.

Use of Nursing Skills Lab for Research Program of the School

The research program of the School is in a phase of rapid development. Following is a list of research topics in which faculty members are working, which will require access to various portions of the lab. (See later section on research program of the School.)

1. Observational Room for Children
Simulated hospital experience, e.g., children's response to stethoscopes, hospital bed, oxygen tent, braces, crutches, casts, wheelchairs, etc. Observe and categorize children's response to immunization.
2. Physical Assessment
 - a. Educational research such as testing teaching of physical assessment by various methods such as autotutorial or lecture, demonstration.
 - b. Recording and categorizing responses to children and adults in various aspects of physical assessment.
3. Helping Relationship Lab
Room for 15 - Research of support group, for example, rape victims, parents of dying children, post abortion patients, cancer patients, parenting or pre-natal classes.

Room for 3 - Research on individual level such as in-depth counseling, role playing, exploring faculty-student exchanges. Possible change in environment stimuli on healthy in individuals or groups such as color, noise, sound or music, etc.

4. Critical Care Lab

To provide simulated emergencies such as cardiac arrest, diabetic shock, hemorrhage. Instruction will include muscle time response, correctness of action, extra unnecessary motions, and activities.

Floor 7

The School of Nursing will share with the Health Science animal quarters for physiological research. Two post doctoral office/laboratories are planned for Nursing, one of which will be used by the Chairman of Research, the other by visiting research associates or graduate students. Nursing and Pharmacy will share space in the graduate laboratory for student research on an as needed basis.

Floor 8

Space has been provided for the following components of the School of Nursing's Administration on the eighth floor:

Private Office Space for:

Dean
Associate Dean
Two Assistant Deans
Admissions and Records Director
Chairman of Research
Administrative Officer
Admissions Counselor
Senior Student Personnel Officer

Joint Office Space (Shared) for:

Business Office
Continuing Education
Graduate and Undergraduate Counseling

Planned Open Space for:

Admissions and Records
Secretarial Pool (faculty support)

Receptionist
Secretary to the Dean
Secretarial Support to Administration

Support Services:

Machine Room and Office Supply Storage Separate
Work Room including typewriters for general
faculty use.
Waiting/Reception area with window to Admissions
and Records

Space has also been provided on this floor for two conference rooms and seven private faculty offices for those faculty members who have close working connections with administration such as departmental chairmen and chairmen of standing committees, and an open faculty office to be divided by landscape architecture and demountable partitions for increased flexibility.

Floor 9

The major portion of this floor will be utilized for faculty offices. Floor nine will also have one small conference room and a large conference area to be utilized by faculty for less than full faculty meetings and the 10-15 consultants and clinicians who are not assigned office space.

Shared Classroom #1 (Floor 2)

	<u>MONDAY</u>	<u>TUESDAY</u>	<u>WEDNESDAY</u>	<u>THURSDAY</u>	<u>FRIDAY</u>
8:00- 9:00	Nurs 5201 (large room) 110 students	Nurs 5407 Sec. 1 90 students		Nurs 5407 Sec. 1 90 students	
9:00-10:00	Nurs 5201 (broken into 4 groups of 27 each)	Nurs 5407 90 students		Nurs 5407 Sec. 2 90 students	Nurs 5207 (90 students) sometimes as large group, sometmes divided in 4
10:00-11:00					↓
11:00-12:00	Nurs 8021 large room 100 students		Nurs 8021 Room divided into 4, 25 students each		Nurs 8021 Room divided into 4, 25 students each
12:00- 1:00	Nurs 52-4 Room divided into 4, 20 students each				
1:00- 2:00	Nursing Electives 25 stud. in each - usually in	Nurs 5208 large room 80 students	Nursing Electives 25 students in each, usually in		
2:00- 3:00	small groups, sometimes 4 electives meet to- gether = 100 students	Nurs 5208 Room di- vided into 4, 20 students each	small groups, sometimes 4 electives meet to- gether = 100 students		
3:00- 4:00	↓	Nurs 5615 Room di- vided into 4, 20 students ea. clinical conference	↓	Nurs 5615 Room divided into 4, 20 students each	
4:00- 5:00					

Shared Classroom #2 (Floor 2)

	<u>MONDAY</u>	<u>TUESDAY</u>	<u>WEDNESDAY</u>	<u>THURSDAY</u>	<u>FRIDAY</u>
8:00- 9:00		Nurs 5816 90 students Sometimes in			Nurs 5613 90 students Sometimes in
9:00-10:00		large groups, sometimes in 4 small groups			large groups, sometimes in 4 small groups
10:00-11:00	Nurs 8100 40 students in 1/2 the room	↓			↓
11:00-12:00	Nurs 8200 40 students in 1/2 the room				
12:00- 1:00	↓				
1:00- 2:00	Nurs 5202 90 students Somtimes in large groups,				
2:00- 3:00	sometimes in 4 smaller groups	Nurs 5611 90 students Sometimes in large group, sometimes in 4 smaller groups		Nurs 5612 90 students Sometimes in large groups, sometimes in 4 smaller groups	
3:00- 4:00	↓	↓		↓	
4:00- 5:00	Nurs 8051 4 sections of 15 stu- dents each, sometimes meeting together				
	↓				

Helping Relationships Lab Individual and Group (Sample Quarter)

	<u>MONDAY</u>	<u>TUESDAY</u>	<u>WEDNESDAY</u>	<u>THURSDAY</u>	<u>FRIDAY</u>
8:00- 9:00	Nurs 8201 (Graduate Psych. Nsg.) 26 students	Nurs 5204 Section 3 26 students	Nurs 8201 (Graduate psych. Nsg.) 26 students	Nurs 5409 Section 3 26 students	Shared use with Pharmacy
9:00-10:00	↓	↓	↓	↓	↓
10:00-11:00	↓	Nurs 5204 Section 4 26 students	↓	Nurs 5409 Section 4 26 students	↓
11:00-12:00	Open Scheduling	↓	Open Scheduling	↓	↓
12:00- 1:00	Nurs 5204 Section 1 26 students	Open Scheduling	Nurs 5409 Section 1 26 students	Open Scheduling	Open Scheduling
1:00- 2:00	↓	Nurs 8504 Graduate nursing education - 26 students	↓	Individual sign-up times for students in nursing courses who want practice time (1 to grad, 2 to undergrad)	Open for research programs
2:00- 3:00	Nurs 5204 Section 2 26 students	↓	Nurs 5409 Section 2 26 students	↓	↓
3:00- 4:00	↓	↓	↓	↓	↓
4:00- 5:00	Open Scheduling	↓	Open Scheduling	Open Scheduling	↓

Nursing Skills Lab (including Critical Care area; Sample quarter)

	<u>MONDAY</u>	<u>TUESDAY</u>	<u>WEDNESDAY</u>	<u>THURSDAY</u>	<u>FRIDAY</u>
8:00- 9:00	Set up time	Set up time	Set up time	Set up time	Set up time
9:00-10:00	Nurs 5205 Lab for 40 students Section 1	Nurs 5205 Lab 40 stu- dents	Nurs 5403 Elect. Lab ICU for 6 stu- dents Sec.1	Nurs 5403 Lab for 40 students	Lab open for student practice with supervision available
10:00-11:00					
11:00-12:00	Open Scheduling			Open Scheduling	
12:00- 1:00	Nurs 5205 Lab for 40 students Section 2	Open Scheduling	Nurs 5403 Lab for 40 students Section 2	Nurs 5403 Lab for 40 stu- dents	Cont. Ed. Intensive Care Nsg
1:00- 2:00		Nurs 5205 Lab for 40 stu- dents		Nurs Elec. ICU 6 stu- dents Sec.2	
2:00- 3:00	Open Scheduling				
3:00- 4:00	Nurs 5205 Lab for 40 students Section 3			Nurs 5402 Lab for 40 students	
4:00- 5:00		Open Scheduling	Open Scheduling		Open Scheduling

Children's Lab (Sample quarter)

	<u>MONDAY</u>	<u>TUESDAY</u>	<u>WEDNESDAY</u>	<u>THURSDAY</u>	<u>FRIDAY</u>
8:00- 9:00	Nurs 8003 Health Assessment 10 students Section 1	Nurs 5206 Tools 15 stu- dents every other week	Nurs 8003 Health Assessment 10 students Section 2	Nurs 5206 Tools 15 stu- dents every other week	Nurs 8003 Health Assessment 10 students Section 3
9:00-10:00	↓	↓	↓	↓	↓
10:00-11:00	↓	Open Scheduling	↓	Nurs 5206 Tools - 15 students every other week	↓
11:00-12:00	Nurs 5614 15 students every other week	Nurs 5206 Tools 15 students every other week	Nurs 5614 15 students every other week	↓	Open Scheduling
12:00- 1:00	↓	↓	↓	Nurs 5614 15 students every other week	Research Projects
1:00- 2:00	Open Scheduling	Nurs 5206 Tools - 15 students every other week	Open Scheduling	↓	↓
2:00- 3:00	Nurs 5614 15 students every other week	↓	Nurs 5614 15 students every other week	Nurs 5614 15 students every other week	↓
3:00- 4:00	↓	Open Scheduling	↓	↓	↓
4:00- 5:00	Open Scheduling	↓	Open Scheduling	Open Scheduling	↓

Adult Health Assessment Lab

	<u>MONDAY</u>	<u>TUESDAY</u>	<u>WEDNESDAY</u>	<u>THURSDAY</u>	<u>FRIDAY</u>
8:00- 9:00	Nurs 8003 Health Assessment 12 students Section 1	Nurs 8311 12 students Section 1	Nurs 8003 Health Assessment 12 students Section 2	Nurs 8311 12 students Section 2	Nurs 8003 Health Assessment 12 students Section 3
9:00-10:00	↓	↓	↓	↓	↓
10:00-11:00	↓	↓	↓	↓	↓
11:00-12:00	-----Open Scheduling-----				
12:00- 1:00	Nurs 5404 12 students every other week	Nurs 5404 12 students every other week	Student extra practice time	Nurs 5404 12 students every other week	Nursing Electives Undergraduate
1:00- 2:00	↓	↓	↓	↓	↓
2:00- 3:00	Nurs 5404 12 students every other week	Nurs 5404 12 students every other week	↓	Nurs 5404 12 students every other week	↓
3:00- 4:00	↓	↓	↓	↓	↓
4:00- 5:00	-----Open Scheduling-----				

Projective Teaching Space Utilization Based on Scheduled Hours and Student Occupancy
 Shared Divided Classrooms

Classroom #1

Nursing

Graduate
9%

Undergraduate
22% = 31%

Pharmacy

Shared use

Classroom #2

Nursing

Graduate
7%

Undergraduate
38% = 45%

Pharmacy

Shared use

Helping Relationship Labs (Group and Individual)

Nursing

Graduate
40%

Undergraduate
49%

Pharmacy

11%

=

Total Utilization

100%

Adult Health Assessment

Nursing

Graduate
50%

Undergraduate
50%

=

Total Utilization

100%

Children's Laboratory

Nursing

Graduate
42%

Undergraduate
58%

=

Total Utilization

100%

Nursing Skills Laboratory

Nursing

Graduate
0%

Undergraduate
100%

=

Total Utilization

100%

Use of Audiovisual Equipment in the Curriculum

Approximately 10% of the School of Nursing's equipment allocation would be utilized for television and other audio-visual equipment to be used directly in support of the curriculum. Dr. David Garloff, Director of Health Science Learning Resources, has been the primary consultant regarding use of media in the curriculum. He in turn utilizes the specialized media services of the University, for consultation. The program toward which the School and Dr. Garloff are working has aimed at obtaining in this setting, the facilities to allow media to be fully utilized in the curriculum. With the emphasis on advanced placement by challenge exam, opportunity for acceleration or deceleration in moving through the program, use of common A-V stimuli in large classes, incorporation of simulated clinical testing as one means for evaluation of students, and firm belief in active practice of skills in a lab setting as well as a clinical setting, easy access to media is essential. Work is moving ahead on all of these, with faculty members using Dr. Garloff and Dr. Redman, Associate Dean of Nursing, as consultants, and Dr. Redman and the School's Curriculum Development and Evaluation Committee, as policy makers.

Media will assist in meeting the programs objectives through providing a broader range of instructional experiences which can both supplement that student's learning but which also can be designed and used by the faculty to maximize learning. A nursing program can no longer be without these resources; expectations of the program - the norms for education - require their incorporation.

Some faculty are actively working on the tasks outlined above in the first paragraph of this section, and are in the process of becoming oriented to the media. Dr. Garloff's office, and the Health Science Learning Resources Committee of which the Associate Dean is a member, are charged with on-going orientation of faculty to media and other learning resources.

At present, the School hires a student part-time to maintain A-V equipment, transport and operate the more complex equipment. This service would need to be continued in a new building but would likely be incorporated into the central Health Science service of this kind, which is part of Dr. Garloff's office. In addition, the School anticipates hiring within the next year if at all possible, a Media Developer, to have a joint appointment with Health Sciences Learning Resources, and the School of Nursing. This person will have particular facility in clarifying instructional intentions with faculty and in translating them into media. Dr. Garloff will provide supervision to this person (who will likely be baccalaureate prepared and whose position is part of the Civil Service staff) in the Health Science system of media resources and in educational development.

Continuing Education

Program Setting and Its Organization Within the University

The continuing education program in the School of Nursing consists of non-degree credit offerings in the form of short (1-2 day) programs, courses and independent study which are presented through the University's Continuing Education and Extension Division. Recognition for participation in a continuing education offering is given in the form of continuing education units or certificate credits.

Two positions in the School are designated for continuing education; one full time and two half time (2 nurses and 1 secretary). The nurses have academic appointments and carry the same responsibilities and benefits as all faculty.

Philosophy and Objectives

The faculty of the School of Nursing believes that man has the potential and the responsibility to learn throughout his lifetime. In today's complex highly technical and rapidly changing society, the need for continuous learning experiences is essential. We believe in promoting the discovery and sharing of new trends and developments in nursing by facilitating an exchange of nursing knowledge.

The faculty supports the Regents' statement that the "University has a responsibility for maintaining and developing the competence of health professionals". We assume our responsibility as a School by participating in joint planning for interdisciplinary offerings and by providing for continuing education programs based on felt and observed needs of the nurse practitioners throughout the state. The courses of the continuing education program are presented throughout the state as a contribution to

the maintenance of effective communication with the nursing practitioner, the consumer, and the faculty of the School of Nursing. Planning is in conjunction with programs offered by other educational institutions, health agencies, and professional organizations.

The continuing education program provides an outreach to the community through a variety of single courses and series of related courses. The focus of these offerings reflects the overall philosophy of the School of Nursing, with emphasis on the further development of professional practice. Continuing education courses maintain the same level of excellence that is characteristic of other University offerings.

The overall objective of continuing education is to provide educational opportunities to improve the quality of nursing practice for the individual, groups, and community. Objectives for program planning are as follows:

- 1) To provide varied opportunities for practitioners to maintain or upgrade their competency in nursing by making offerings geographically accessible, and by gearing offerings to particular practice area (such as staff-clinical specialty-teaching).
- 2) To provide orientation to concepts, methods and research finding which influence nursing practice and which are of current interest.
- 3) To facilitate self-directed learning through various means.
- 4) To promote two-way communication between the School of Nursing and nurses throughout the state.
- 5) To present approaches for the nurse to use in determining need for change and in facilitating change when appropriate.
- 6) To promote inter-disciplinary efforts and approaches to continuing education.

- 7) To assist other health organizations and education institutions to develop continuing education opportunities.
- 8) To identify continuing education needs which may be met or supplemented by School of Nursing Continuing Education.

Program Plans

The major program is planned for the entire academic year and published during the summer months to permit interested persons to make plans as well as to inform other agencies of the topics to be presented. This is done in an attempt to avoid duplication and conflict of dates whenever possible.

The topics selected are based on areas of high priority interest as identified by a variety of means: from nurses who attended programs the previous year, from professional and voluntary organizations and from a variety of community and personal contacts. At the present time a systematic survey is being conducted of approximately 35,000 registered nurses in Minnesota using a 3152 sample, to determine the topics, content emphasis and format. The data from this survey will be used in planning the 75-76 program.

An average of 15-20 programs are developed and presented during the nine months. The major enrollment and investment of resources are for the "tele-lecture" programs. These offerings are transmitted by telephone conference call to 37 different locations throughout the State. The planning and coordination requires numerous small groups conferences and the presentation requires space especially designed to accommodate the necessary equipment and facilities for both the resource persons and the School of Nursing Coordinator.

Participants (students) in the continuing education programs are recruited from the approximate 35,000 registered nurses in the State. However, although the programs are designed for registered nurses, registration is open to

Future Programs

The new facility will make possible a number of improvements which will contribute to better meeting the needs of the nurses throughout the State. Specific plans include expansion of use of media such as closed circuit television, improved teaching aids to accompany lecture presentations, availability of materials developed for continuing education programs to students in the baccalaureate or masters program plus having them accessible to other persons who were unable to attend the offering. The new facility will contribute to improved coordination and time utilization by having the entire continuing education staff in close proximity.

Faculty and Their Qualifications

The faculty for all continuing education programs are recruited from a variety of settings depending on the expertise needed. They are contracted for each offering. The qualifications and names of the present continuing education staff are as follows:

Chairman, Continuing Education

Julia S. Randall, Associate Professor (full time)

Education - Bachelor of Science, Nursing Education
Master's Nursing Administration

Experience - 1940-42 Head Nurse, University of Minnesota Hospitals
1942-46 Supervisor, University of Minnesota Hospitals
1946-1948 Educational Director, V.A.H., Minneapolis
1948-49 Chief Nurse, V.A.H. Lincoln, Nebraska
1949-59 Area Chief Nurse, V.A. St. Paul Area
1959-64 Consultant, U.S. Agency for International Development
1964-65 Consultant, H.E.W., Division of Nursing
1966-70 Consultant, Pan American Health Organization
1970-present Chairman, Continuing Education, University of
Minnesota

Assistant Chairman, Continuing Education

Betty M. Pederson, Instructor (50% time)

Education - Bachelor of Science with major in Nursing Education
Master's Nursing Administration
(both at the University of Minnesota)

anyone who feels they will benefit by the content. Practical nurses as well as representatives of other health disciplines are frequently enrolled. Publicity regarding the offerings is accomplished in two ways: 1) a once-a-year publication giving dates, topics, location and brief general statements regarding content, and 2) a brochure for each offering is mailed 4-6 weeks prior to the program and contains specific objectives, programs, faculty and information regarding recognition and registration forms.

Number and Type of Program Offered in the Past Year

Telelectures

Mental Health Issues	547
Problem Oriented Medical System	690
Updating in Medications	997
Patient with Respiratory Inadequacies	570
The Baccalaureate Degree in Nursing for RN	267
Directions and Goals of School Nursing	304
	<hr/>
Total	3286

Workshops

Realistic Programming for Patient Education	68
Goal Directed Nurse Interviews	131
Helping Battered Children and Their Parents	141
Emotional Aspects in Nursing	111
Nursing Techniques in Respiratory Care	109
	<hr/>
Total	560

Other

The Master's Degree in Nursing	56
Alumni Day Program	106
Reunion, Class of 1924	19
	<hr/>
Total	181

GRAND TOTAL 4116

Experience - 1940-41 Assistant Nursing Arts Instructor, University of
Minnesota
1941-42 Instructor, School of Nursing, University of Minnesota
1942-45 1 year staff, 2 years instructor, Army Nurse Corps
1946-48 Head Nurse, V.A.H. Minneapolis
1948-50 Chief Nurse, V.A.H., Des Moines, Iowa
1950-59 Chief Nurse, V.A.H., Omaha Nebraska
1959-59 Assistant Director, Mt. Sinai Hospital, Minneapolis
1959-71 Assistant Director, Associate Director and Acting
Director, University of Minnesota Hospitals
1974-75 Instructor, Continuing Education, University of
Minnesota

Description of the Facility
Item #10

Environmental Assessment

The Environmental Impact Analysis required in accordance with the National Environmental Policy Act of 1969 (Public Law 91-190) is submitted with this application as Part II of the grant request.

The analysis has been prepared in detailed response to the Initial Criteria as outlined in Chapter 30-15 HEW General Administration Manual-Environmental Affairs.

Facilities Design

Master Plan

The University of Minnesota Health Sciences Expansion provides facilities for the consolidated units of the Health Sciences: School of Medicine, University Hospitals, School of Dentistry, School of Public Health, School of Nursing and the College of Pharmacy.

The complex of new and remodeled existing buildings comprising the Health Sciences facilities is the Architects' response to the University's goal of physical and curricular integration of the Health Science units with each other and the rest of the Minneapolis campus of the University.

The problem as defined by this goal was to develop a high density building system on a tight urban site with strong relationships to major existing facilities. This system needed to respond to the initial phase of expansion as well as to the continuing need for growth and change inherent in health sciences units.

The Architects' initial effort was to develop a master plan which provided for short and long term expansion and responded to the integrated relationships called for in the program. This master plan serves as a framework for growth by establishing the major paths of circulation knitting together new and existing buildings. A centralized receiving unit (Unit E) is the focus of a separate service circulation network connecting existing buildings and new construction two floors below grade. The centralized receiving with material distribution tunnels to Health Science areas will replace 18 widely dispersed receiving areas. The master plan also provides for an eventual major pedestrian spine with branches to existing buildings and new construction to the 2,000 car parking ramp providing the capability of moving to all parts of the Health Sciences without being exposed to the frequently severe weather (see site plan, following pages).

The master plan is comprised of Units A, B/C, K/E and F as shown on the site plan attached.

Unit A houses the School of Dentistry, Basic Sciences teaching laboratories which provide all health science basic science teaching, Auditoria, programs from the Schools of Public Health and Medicine and Health Sciences shared space. Occupancy of Unit A occurred in the Fall of 1974.

The general criteria which established the basic planning framework are as follows:

- 1) Because of the great investment from public and private sources in existing facilities, the plan must conserve and enhance the desirable characteristics of the present Health Sciences Center.
- 2) The plan must be adequate in scale to serve all contemplated programs of the Health Sciences Center--programs that include substantial enrollment increases in all areas.
- 3) The plan must facilitate and, in fact, encourage interaction among persons in all Health Sciences programs.
- 4) The plan must provide maximum flexibility for adaptation to anticipated but unspecified changes in programs in the wake of social and scientific progress.
- 5) The plan must be compatible with other aspects of University development and enhance the involvement of the Health Sciences with the rest of the University and the community.
- 6) The plan must provide opportunity for development beyond any programs now contemplated.

Unit B/C, now under construction, is primarily a Medical School facility and will include auditorium and general shared classrooms, a Learning Resources Center, outpatient clinics and seminar rooms, faculty offices and teaching faculty research and support space. Unit B/C is designed as a continuation of the recently completed Unit A, both physically and functionally.

Unit E, as previously mentioned, constitutes the centralized receiving unit for the Health Sciences. Above Unit E, Unit K houses a Cardiovascular Research Center.

Unit F will house the College of Pharmacy and School of Nursing.

The current B/C program consists of two parts. One part will be completely finished space. The other part will be shell, or unfinished space at present. The finished space will include auditorium and general classrooms, a Learning Resources Center, outpatient clinics and seminar rooms, faculty offices and teaching faculty research and support space.

The Health Sciences Expansion project is bounded almost entirely by existing University dormitories, libraries, hospitals, and classroom buildings. The notable exception is an area to the North and East of the site along Washington Avenue. This contains some commercial and housing

functions, part of the area has been considered a logical direction for long-range future expansion. The University has initiated discussions with the community regarding future land acquisition in the area so that property owners are apprising of the time-table well in advance of any University acquisition. In 1967 the Regents of the University established official boundaries for the campus.

With the exception of the area mentioned, and the space discussed in this application, future expansion of the Health Sciences will involve remodeling and renovating vacated space, most of which is of the early 1900 vintage and must be updated for use as health professions training facilities, but is structurally sound and ideally located within the Health Science complex.

The present facility does preclude any expansion of enrollment. (Please note the comment regarding space of the Minnesota Board of Nursing, April, 1970, in Appendix.) While some shared facilities (classrooms, learning center, etc.) are part of the master plan in Buildings A and B/C, capability of meeting nursing's needs is dependent on a significant amount of space which can conform to the School's programmatic needs. Nowhere in the shared facilities will there be available a nursing skills facility, such as that outlined in this application.

More specifically, the present facilities of the School of Nursing:

- 1) require double occupancy offices for almost all faculty, even though they must do confidential counseling with students.
- 2) require faculty offices to be located in 2 different buildings, 2 blocks distant from each other,
- 3) contain no facilities for practice of any of the nursing skills with the exception of one 8 bed lab for learning nursing procedures and another temporary 8 bed lab,
- 4) require use of shared classrooms which are scheduled so heavily that any normal schedule change creates a crisis,
- 5) provide extremely limited office and work space for funded Projects and Research.

The planning process has stressed adequate amounts of general teaching space to accommodate the major expansion. In addition, the primary concept of the Master Plan to provide physical and curricular integration of the Health Sciences units dictated close proximity of teaching spaces to provide ease of movement of students and faculty to and from major teaching facilities. Accordingly, the total Health Sciences project of Units A, B/C and F are designed to accommodate the Schools of Medicine, Dentistry, Pharmacy and Nursing. Shared space throughout the complex, including auditorium, classrooms, seminar rooms and educational resources retrieval areas are located on the main student traffic concourses which interconnect the three Health Sciences units.

The Learning Resources Center, planned within the complex, is located and designed to accommodate all disciplines. The Center is planned in juxtaposition to the Bio-Medical Library and will contain space for 250-300 carrels for student use of audio-tapes, slides, film strips, and cassettes. Terminals for computer-aided instruction are included. Space for storage and study of print materials and models as well as study space for sixty students is a feature of the unit. Support areas include a service desk and approach area, audio and video playback equipment (Dial Access) and an audio-visual library. Office space for the coordinator of learning resources and curriculum coordinators is included. "Interaction" rooms occupy a portion of the facility. In these rooms will occur student-faculty conferences, film previews, and small group discussion and viewing of audio-visual or video materials. Technical support is included.

Allocation of space within the University is administered by the Office of Space Allocation. This office operates under a set of policy guidelines established with the counsel and advice of a faculty advisory committee. Actual allocations are based upon the guidelines which are modified by statements of programmatic needs submitted by faculty and administrators at the departmental and collegiate levels.

Dean's Office	300 square feet
Assistant Dean	300 square feet
Assistant to Dean	100 to 130 square feet
Department Head	195 square feet
Department Assistant Head	195 square feet

Departmental Multi-purpose	200 square feet and up (400 maximum)
Faculty Office	130 square feet
Double Faculty Office	195 square feet
First Secretarial Position (General Office)	195 square feet (1 person + files) 65 square feet (for each additional person)
Classroom	15 square feet per student station
Study Room	25 square feet (up to) per student station
Laboratory	According to number of people, function and equipment

The units designated by the master plan to be housed in new construction were analyzed for common systems criteria. These criteria generated one building system which, with appropriate variations, could respond to the requirements of teaching and research labs, dental clinics hospital outpatient clinics, offices, classrooms and auditoria. In addition, a high degree of flexibility and expandability was provided.

The building system employs a module of 12'-4" x 12'-4" throughout the site area. Service towers 12'-4" x 12'-4" (nominal are spaced 49'-4" apart in two directions creating a tartan grid which is broken in one direction by a pair of columns placed midway between the towers. A one-way structural system integral with the service shafts has steel grids spanning the 24'-8" direction and steel trusses spanning the 49'-4" direction (see Building Systems Framework Isometric and Dimensional Characteristics Diagram). Building services are distributed vertically through the service shafts and horizontally through the depth of the floor construction. The frequency of the service towers allowed a minimum 4'-4" floor depth which is divided into separate strata for power and communication, mechanical, plumbing, and lighting. In general, all partitioning stops at a totally accessible continuous ceiling plane 9'-0" above the floor permitting the services above to be distributed without interference. Typical floor height is 13'-4".

All sub-systems were developed and designed to accommodate the criteria generated by the program functions. A detailed description follows of several sub-systems which will establish the degree of thought that has gone into the development and coordination of the various subsystems resulting in the overall building flexibility.

SUPER STRUCTURE:

Typical floor slab construction is a composite cellular steel deck with a lightweight concrete topping. The selection of this floor construction is based on the economics inherent in the lightness of the floor itself as well as the supporting steel framing and foundations. The system provides electrical raceways within the floor construction both for present and future needs and provides the required two-hour fire rating without the need for additional fireproofing on the underside of the deck.

"Regular Weight" concrete floor slabs shall be used for mechanical equipment floors. This is necessary to provide additional load carrying strength for these floor areas as well as to produce sufficient mass to reduce vibrations in the building frame which will result from the operation of the equipment.

Two beams provide a horizontal slot at each typical floor level between the corner columns of the mechanical and electrical shafts. This "slot" creates maximum size access openings to the areas between the floor and ceiling below. The upper, and shallower, beam supports the floor and shaft walls with the lower deeper beam providing the rigid-frame action, acting with the columns to resist lateral wind loads on the building.

Open-web trusses are provided as floor supporting members to provide maximum flexibility for lateral distribution of the mechanical and electrical systems between the floor slab and ceiling below.

STAIRS:

The stairs have been designed with an aim to minimize field labor. Two alternates are to be considered; one varying from the other only in the run and suspended landing components with the second alternate assembling similar components into angle framework, two or three stories in height per unit. It is proposed that the component and unit concepts be tested competitively in the market place.

CEILING SYSTEM DESCRIPTION:

The ceiling system will facilitate a degree of planning flexibility equal to that afforded by the structural and mechanical system. The ceiling is conceived as a continuous suspended plane extending from exterior wall to exterior wall under which partitions can be located and relocated as necessary. Above the ceiling ducted mechanical services can be arranged and rearranged as required without interference from walls or other vertical barriers.

To accomplish this the ceiling has to embody the following characteristics:

1. The suspension system must be capable of supporting the head of all partitions and door frames and provide adequate lateral stability without additional bracing. Walls must be attached and detached without damage to the ceiling. Although most walls occur in modular locations, attachment at random locations must be possible.

2. The suspension system must provide a framework in which light fixtures, air supply and return elements, sprinklers, smoke detectors, speakers, laboratory service columns and infill panels can be located and rearranged in various combinations.
3. The ceiling must offer architectural characteristics suitable for small, intermediate and large areas.
4. The ceiling must be accessible to allow routine maintenance and rearrangement of mechanical equipment at any location above the ceiling.

The proposed ceiling system is composed of continuous service strips and of infill. The service strips are oriented in an east-west direction and are located 6'-2" o.c. at the quarter points of the 12'-4" architectural grid. The infill closes the space between the all purpose strips and provides for access to the plenum and acoustal separation of rooms.

The service strip furnishes the location for all mechanical service penetrations in the ceiling system. It is made up of alternating 4'-0" fluorescent light fixture locations and 2'-2" service panel locations. The modular locations of a 4'-0" fluorescent fixture is centered on the quarter points of the architectural grid but such a fixture must be relocatable at any point in the strip to accommodate non-modular rooms.

The service panel provides locations for sprinklers, smoke detectors, speakers, laboratory service columns and down lights.

Linear supply air handling elements are located as required, perpendicular to the service strip astride the cross runners with point returns located as required at the service panels.

N-S and E-W partitions may be attached to the ceiling system by bolting the partition head to cross runners which run perpendicular to the service strip on 2'-2/3" centers. E-W walls may thus be attached along any line in the zone between service strips. N-S partitions are located astride the cross runners. Non-modular N-S partitions require an additional cross runner for support.

In order to insure that partitions can be freely moved without unnecessary difficulty or damage to the ceiling system mechanical services passing between partition and plenum above are minimized. Plumbing fixtures located in areas not subject to change, are loop-vented underfloor. We recommend low-voltage switch legs be used in these areas. In areas subject to extensive future change, piped services to laboratory benches shall be fed down from the plenum space in umbilical chases.

Detailed study of code requirements regarding fire rated walls indicates that each level be divided by only one partition which must interrupt the suspended ceiling plane. In each case the penetrating wall has been chosen as being the one least likely to be relocated.

The wall system has been designed to provide an STC rating of 45 (plaster) 54 (drywall). A one inch sound blanket increases these ratings respectively to 49 and 58. The ceiling typically provides an STC rating of 43. This may be increased by the use of acoustically backed board and hold-down clips. Areas which require additional isolation will be separated from adjoining areas by acoustical blanketing hung directly above the wall in the ceiling plenum. Alternatively, walls surrounding non-flexible areas such as auditoria may be extended to the structural slab to insure acoustical isolation.

PARTITIONING SYSTEM:

The partitioning system achieves the degree of economy and flexibility at the planning level provided by the basic mechanical and structural systems.

The total project was studied to find the basic sets of functions to be served by partitioning systems. Seen in conjunction with the ceiling system, the basic approach to the partitioning system is that it should be floor to ceiling light-weight space division. The partitions should be removable without damaging the floor or ceiling and without interrupting the activities in adjoining spaces. In this approach, doors and glass are treated as panels in the partitioning system and attached at the ceiling and floor in the same manner. The partitioning system must be locatable according to the module developed by the ceiling system - and the mechanical services provided by it, but it also must be able to adjust to non-modular conditions when functional requirements necessitate it. Prefabricated cold rooms, freezers and the like will be used and the partitioning system must accept them. There will also be several spaces which require R-F shielding and partitioning systems must be able to provide this.

Several alternatives for each required basic type were proposed and studied. The cost of each proposal was compared to the requirements for adequate sound isolation, flexibility, durability and the particular requirements of each type. Resulting from this study a selection was made.

1. Gypsum plaster on gypsum lath screw attached to channel studs is proposed as the basic system on floors 1 through 9. These floors contain outpatient clinics which will be intensively used by large numbers of patients, undergraduates, and therefore are subject to infrequent change.
2. Drywall on channel studs is proposed as the basic system for the laboratory and office functions located on floors 10 through 14. These functions will require constant rearrangement of plan and will be used by a limited number of staff and graduate personnel.
3. Fireproof gypsum paneling is proposed to achieve the required fire rating around the floor to floor penetrations at stairs, mechanical cores, and elevator shafts.
4. Masonry is proposed for two applications:
 - a. Masonry with acoustic treatment will be used for the auditoria.
 - b. Both finished and unfinished masonry is proposed on mechanical floors and the animal room complex on Floor B, B1, 1.

In areas of high humidity and/or where a high degree of cleanliness is required, a glazed coating is proposed such as the animal room complex or the manufacturing suite. This application may be used on plaster, dry wall and masonry.

CASEWORK:

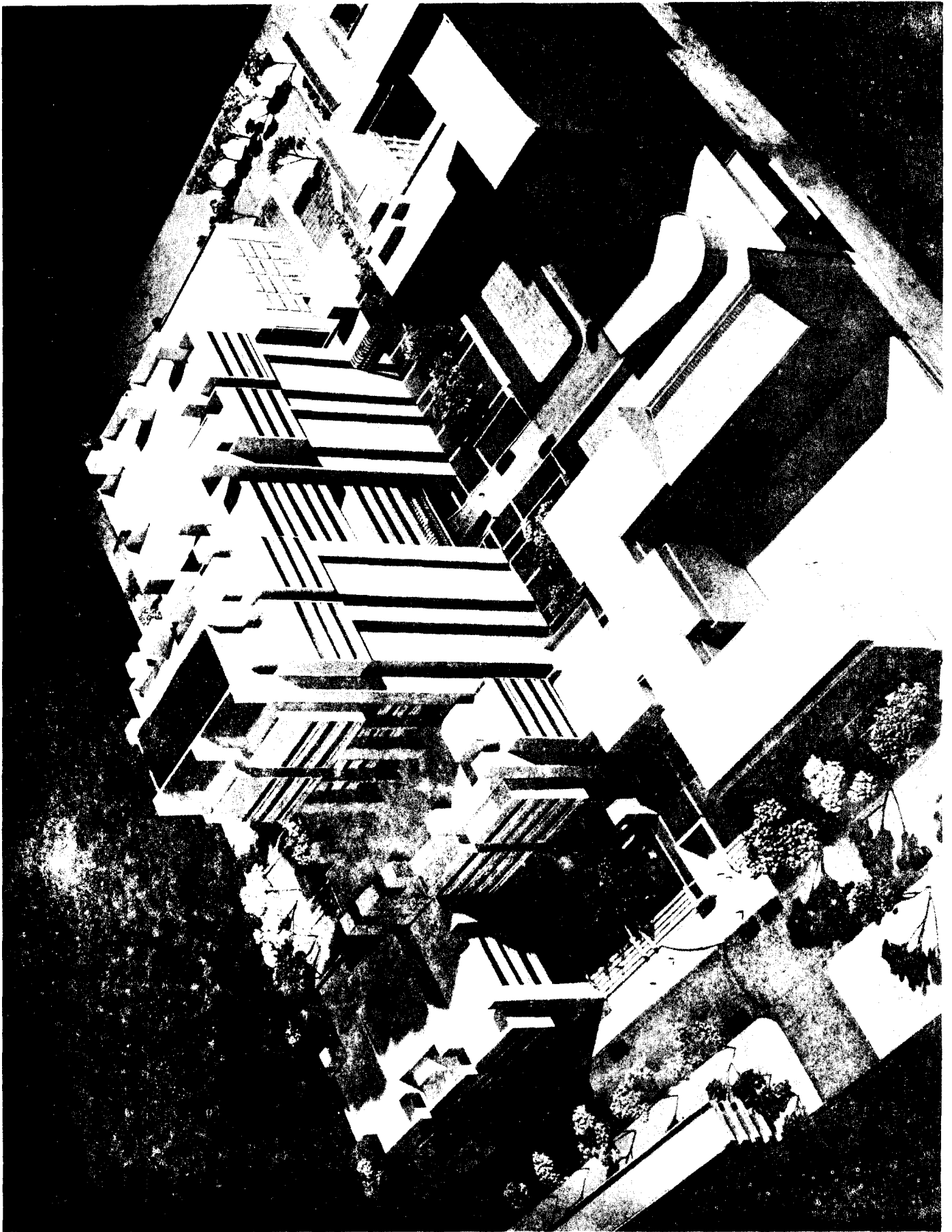
The flexibility afforded by the structural/mechanical system, interior partitions and ceilings will be matched by the system of casework. Elements will be dimensionally coordinated and capable of simple rearrangement to suit changing needs,

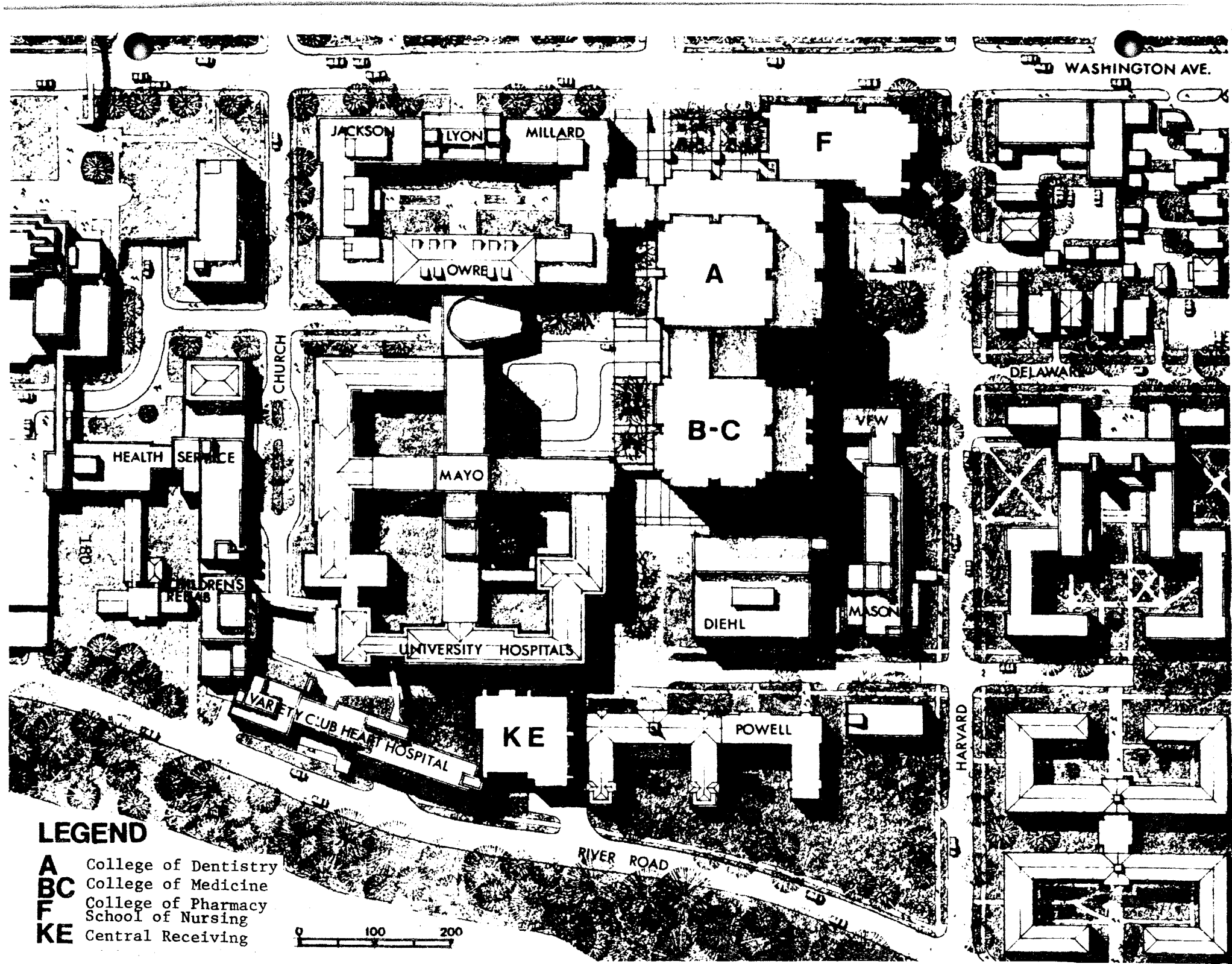
Historically casework for a project such as this has assumed five distinct forms--namely, hospital casework, laboratory cabinetry, special cabinetry such as that used in darkrooms and dental labs, dental operatory casework and station concept units as in medication and nourishment units. This has been so, primarily due to the sources of manufacture and a preoccupation on the manufacturers part to limit his production to one, two or three types of the specialized casework mentioned above.

We proposed to develop a single specification for all of the casework. The attempt would be to consolidate all of the inconsistencies of the traditional system and to develop a truly interchangeable cabinetry. This would appear to be particularly desirable in view of the fact that the whole tendency in good health science planning, is to stress the interrelationship of patient care, teaching and research. If the cabinetry to accommodate these disciplines can be coordinated, the esthetic and utilitarian possibilities are manifold. A consistency of design detail, fittings and finish would be assured. The

maintenance management would be made consistent and simpler. And least, the initial cost should be less, due to the magnitude of the order.

The recommendation is to produce a non-proprietary performance specification which will lay emphasis on the consistency of design and detail to be maintained and that will delineate the differences of working surfaces and base conditions that can be accommodated. This specification will be accompanied by a catalogue of modularly coordinated casework components. Elevations and basic dimensions of units that will be used consistently throughout the facility.





WASHINGTON AVE.

JACKSON LYON MILLARD

LOWRE

A

F

DELAWARE

CHURCH

HEALTH SERVICE

B-C

VIEW

MAYO

OBL

CHILDREN'S
REHAB

DIEHL

MASON

UNIVERSITY HOSPITALS

VARIETY CLUB HEART HOSPITAL

KE

POWELL

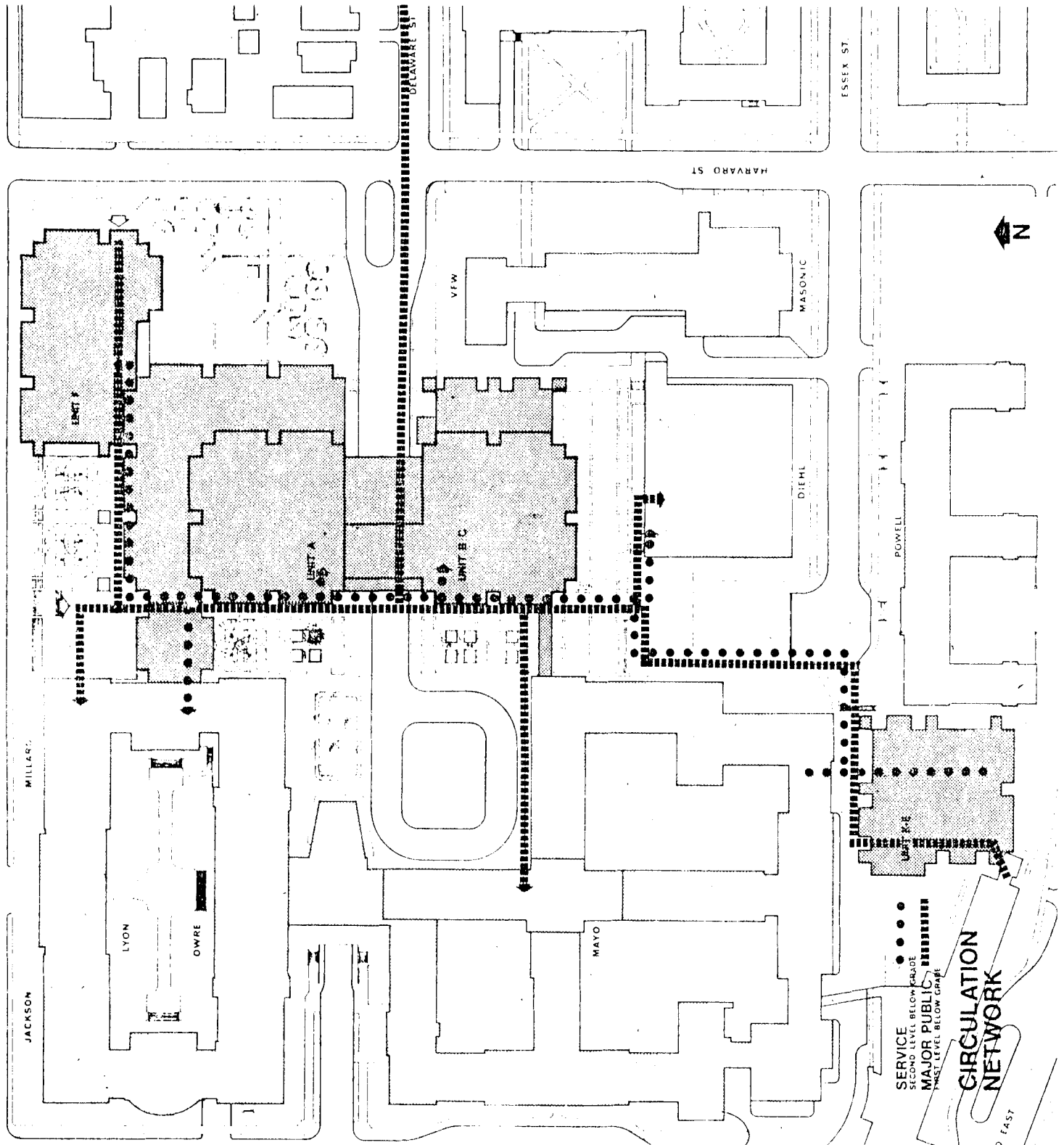
HARVARD

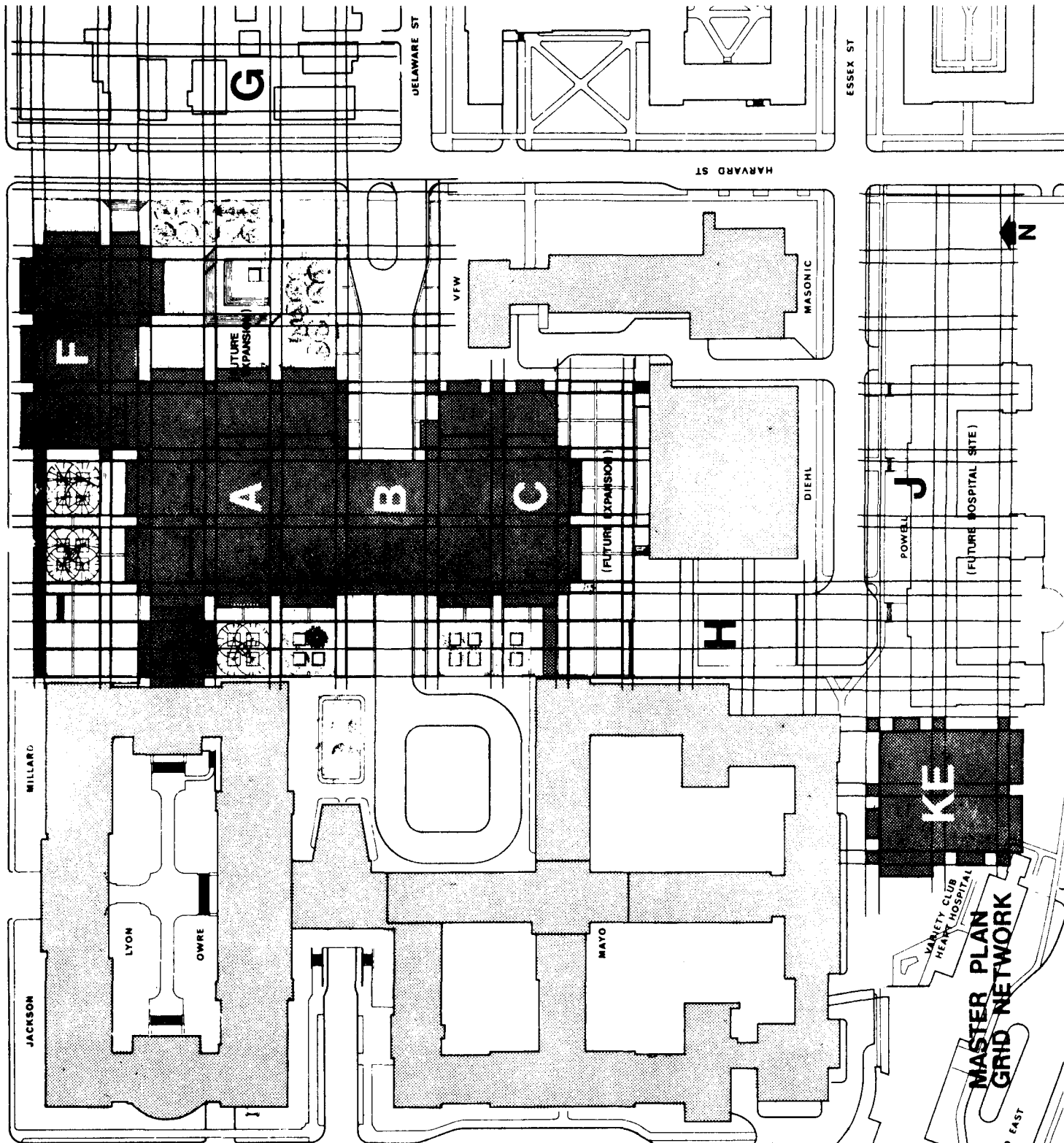
RIVER ROAD

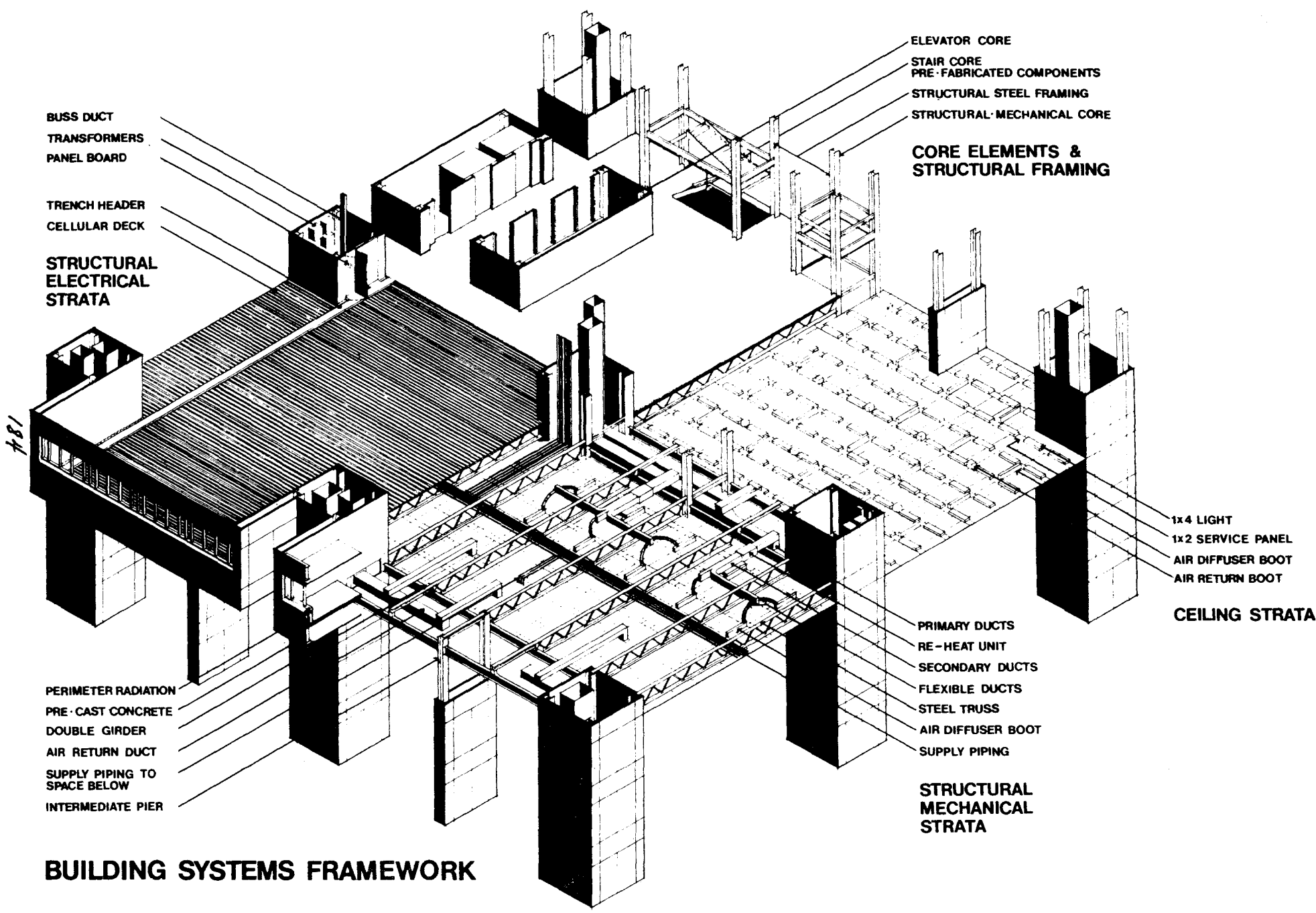
LEGEND

- A** College of Dentistry
- BC** College of Medicine
- F** College of Pharmacy
- S** School of Nursing
- KE** Central Receiving









BUSS DUCT
TRANSFORMERS
PANEL BOARD

TRENCH HEADER
CELLULAR DECK

STRUCTURAL
ELECTRICAL
STRATA

781

PERIMETER RADIATION
PRE-CAST CONCRETE
DOUBLE GIRDER
AIR RETURN DUCT
SUPPLY PIPING TO
SPACE BELOW
INTERMEDIATE PIER

ELEVATOR CORE
STAIR CORE
PRE-FABRICATED COMPONENTS
STRUCTURAL STEEL FRAMING
STRUCTURAL MECHANICAL CORE

CORE ELEMENTS &
STRUCTURAL FRAMING

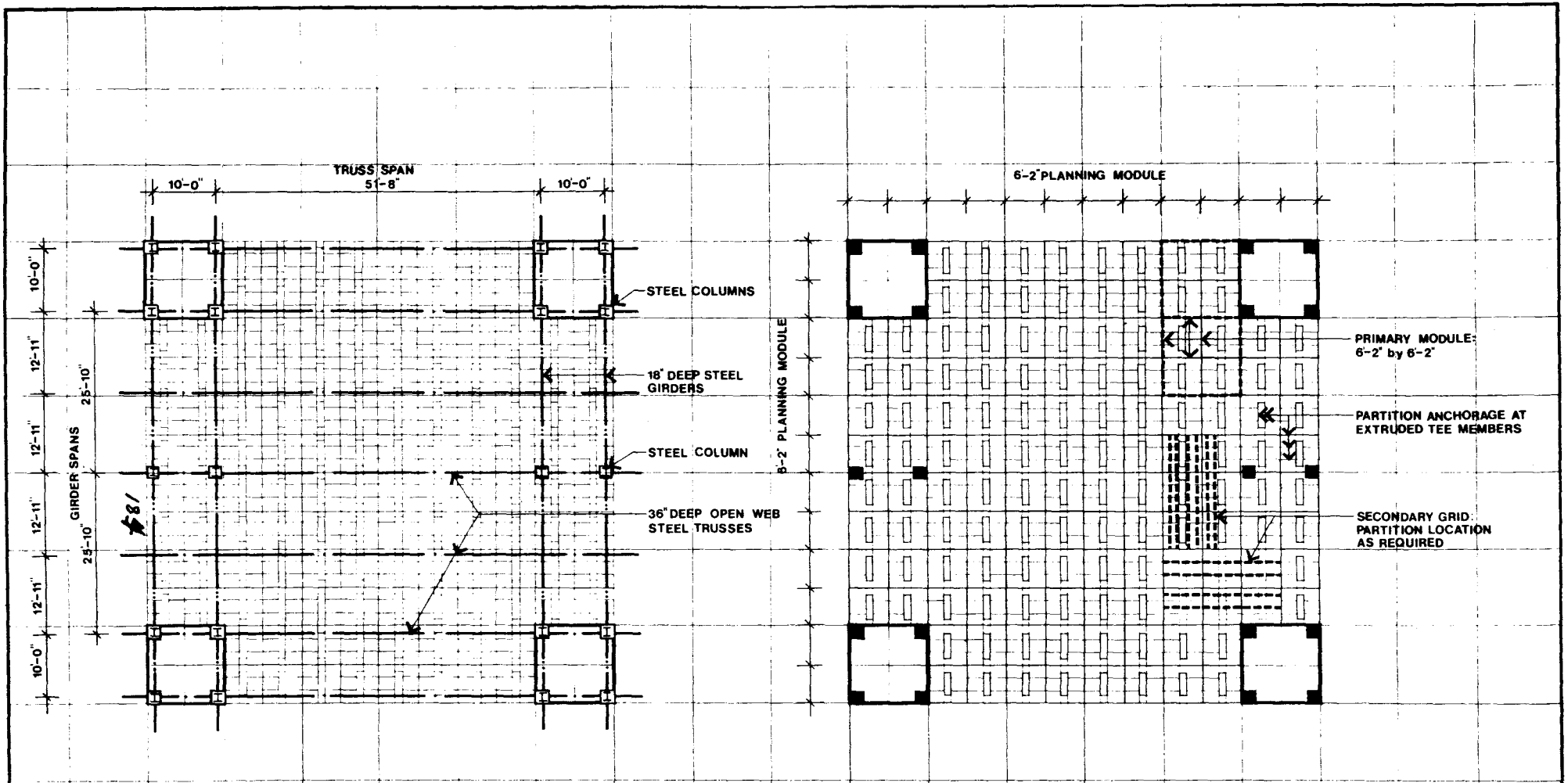
1x4 LIGHT
1x2 SERVICE PANEL
AIR DIFFUSER BOOT
AIR RETURN BOOT

CEILING STRATA

PRIMARY DUCTS
RE-HEAT UNIT
SECONDARY DUCTS
FLEXIBLE DUCTS
STEEL TRUSS
AIR DIFFUSER BOOT
SUPPLY PIPING

STRUCTURAL
MECHANICAL
STRATA

BUILDING SYSTEMS FRAMEWORK



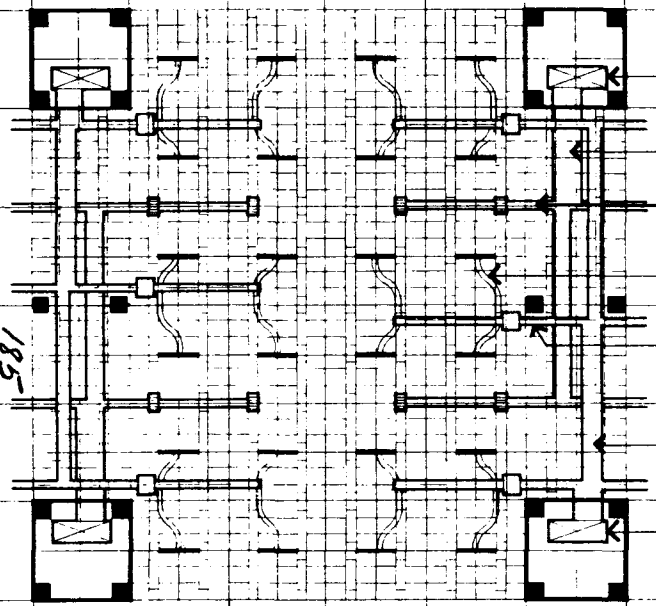
STRUCTURAL GRID

PLANNING GRID

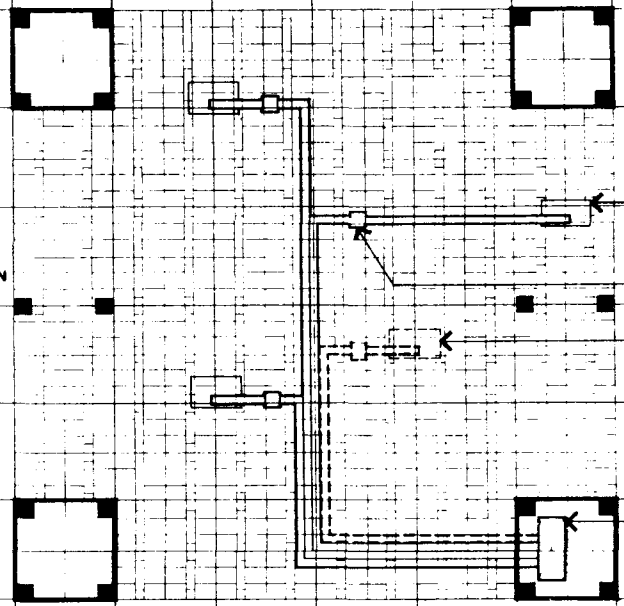
FOR MODULAR OR NON-MODULAR FUNCTIONS

DIMENSIONAL CHARACTERISTICS

185



- RETURN AIR RISER
- MAIN HORIZONTAL AIR RETURN DUCT
- SECONDARY AIR RETURN DUCT WITH GRILL
- FLEXIBLE DUCT CONNECTION TO LINEAR DEFFUSER
- SECONDARY AIR DISTRIBUTION WITH TERMINAL RE-HEAT UNITS
- MAIN HORIZONTAL AIR DISTRIBUTION
- LOW VELOCITY SINGLE DUCT AIR SUPPLY



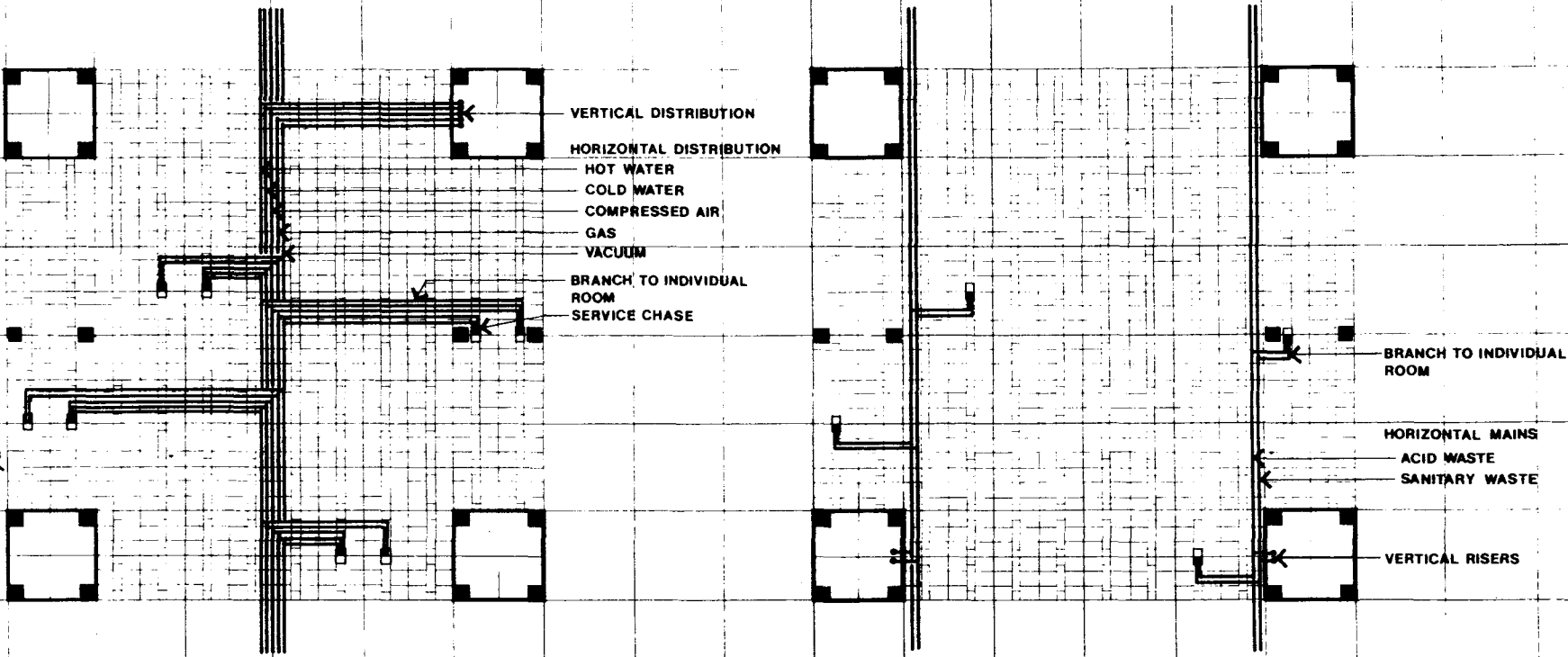
- FUME HOOD WITH INDIVIDUALLY DUCTED HORIZONTAL RETURN
- IN-LINE VANE-AXIAL FAN
- FUTURE FUME HOOD WITH DUCTED RETURN
- EXPLOSION PROOF SINGLE FUME EXHAUST RISER SIZED TO PERMIT ADDITIONAL FUME HOODS

AIR DISTRIBUTION

FUME HOOD EXHAUST

H-V-AC

981

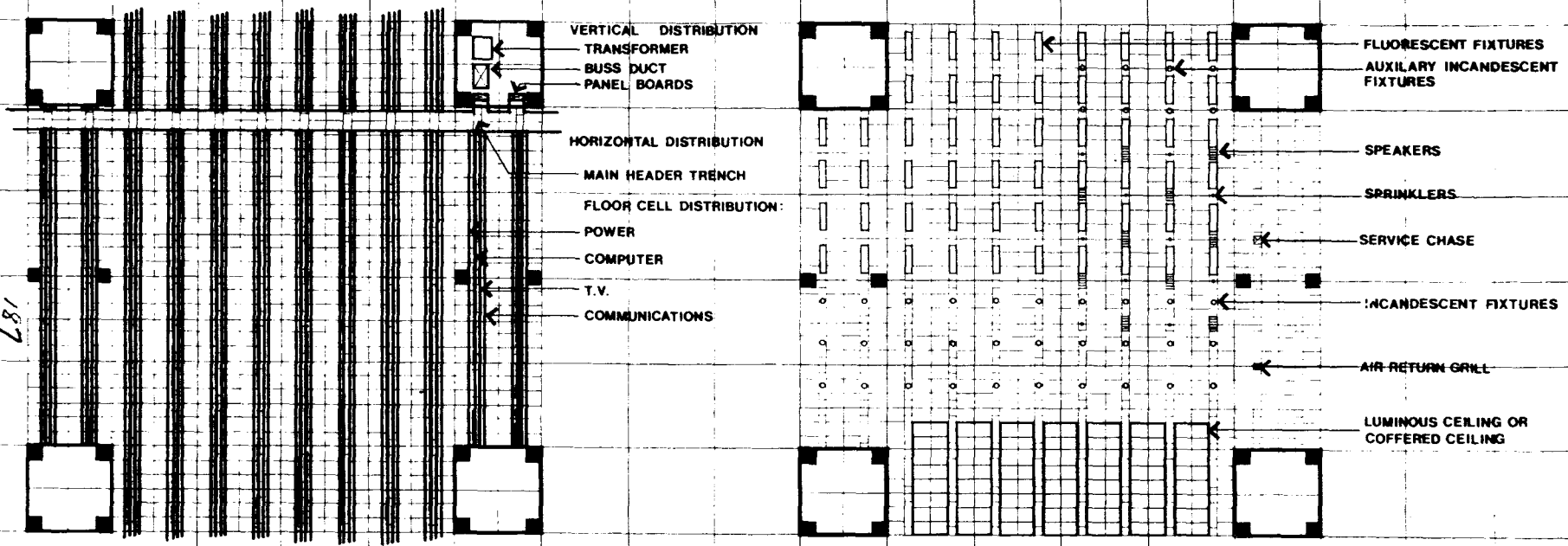


SUPPLY

WASTE

PIPED SERVICES

187



DISTRIBUTION OF SERVICES

LIGHTING PATTERNS - REFLECTED CEILING

ELECTRICAL SERVICES

Detailed Description of Unit F

This facility is designed to house the School of Nursing and the College of Pharmacy. Unit F consists of eleven floors, with three floors below ground level.

The following description provides a summary of floor by floor plans for the entire facility, followed by a tabular summary of each floor by room number, and assignment by program of new assignable square feet, and the planned use of each room. This proposal, in terms of eligible costs for each program has considered only net assignable square feet as eligible for federal funding. The tabular summary for each floor is accompanied by a floor plan which is shaded and coded to designate nursing space, pharmacy space and applicant space. Page 192 provides a summary chart indicating the net assignable square feet by program and the amount of non-assignable space and/or shared space for all health sciences in which the Federal government is not being requested to participate.

The final chart on page 219 provides the required secondary breakdown of space by function for the School of Nursing.

C. Detailed Description of Unit F

Unit F, designed to house the School of Nursing and the College of Pharmacy, will consist of eleven floors of space located directly north of adjoining Unit A. Three levels are below grade. A detailed floor by floor description of function follows.

Basement

This level will be the primary location for major mechanical components serving the new construction. Mechanical space on this floor will be an expansion of the facilities provided in Unit A. Steam from the University central plant will be piped via the tunnel to Unit A on this level. Switch gear, pumps, chillers, emergency generating equipment will be located on this floor as well as on Floor 8. Major utilities will be distributed in vertical utility shafts 12'-4" x 12'-4" in dimension located typically 49'-4" apart. Elevators for Unit F consist of three cars grouped in one bank with two of the cars primarily for public traffic, with the other car having two openings to serve as both a passenger-freight elevator. A separate receiving room adjoined or in close proximity with the passenger-freight elevator occurs on all floors.

Floor 1

The Central Service Corridor for the Health Sciences on this level connects with a service corridor in Unit F and will provide access to the new receiving center, Unit E. Major program elements accommodated on this floor are: The Nursing Educational Development and Research Area; Shared Facilities; Central Supply with its support rooms of Receiving, Instrument Repair, Mechanical Workshop, and Glass Washing. Student Locker Facilities, along with general storage for the College of Pharmacy and the School of Nursing will also be provided on this level.

Floor 2

Floor 2 of Unit F, one floor below street level, will be a main entry point for students attending lectures in the Auditoria and classrooms. Two 150 seat auditoriums with projection booths and support facilities in addition to two classrooms for 75 students which can be divided into smaller subunits are on this floor. The College of Pharmacy's Biological processes undergraduate lab is also on this floor along with support space. This laboratory accommodates up to 48 students per section.

Floor 3, Ground Level

Unit F at ground level will be occupied by the chemical processes undergraduate lab and the accompanying instrumentation lab. The pharmaceutical processes lab is also located on this floor. The Drug Reference area is located so that it might be used in conjunction with the undergraduate laboratories and have easy access for use by the rest of the College. Formal entry for the building is on this level with a stair connecting floor 2 and floor 4, permitting undergraduate students to walk either up or down one level to attend their laboratories without taxing the elevator system.

Floor 4

The primary focus of this floor is the School of Nursing area for special teaching laboratories such as Nursing Skills, Helping Relationships, Children's Laboratories and Health Assessment Laboratories. In connection with the heavy utilization of audio visual aids in these labs, the A-V storage and assembly area is located on this floor.

Floor 5

Floor 5 of Unit F will provide a major horizontal connection between Millard Hall, Unit A, Unit B/C, and the Mayo Building. Functions which will be located on this floor include College Administration and the Department of Pharmacy Administration. In addition, shared space for Education Development by the School of Nursing and College of Pharmacy and associated production, dark room, audio-visual, auto-tutorial space, and computer space will occupy this floor.

Floor 6

Graduate teaching and faculty laboratories along with the shared spaces of Chemical and Equipment storage, Central Instrument room, and Radiation Synthesis and Counting will be housed on this floor. Graduate labs have been planned on an open, modular basis so that they may be subdivided in the future if it is so desired. Faculty offices and laboratory space has been organized in conjunction with the graduate labs so as to achieve an appropriate distribution between the number of faculty members and graduate students. Special rooms, such as hydrogenation lab, chromatography lab, bio-process lab and a cold room are also accommodated on this floor. Student study space is also found on this floor.

Floor 7

The majority of Floor 7 will house graduate laboratories, faculty offices, and laboratories for graduate teaching and faculty research. Shared animal quarters are located on this floor directly behind the elevator bank so that a connection for service, cage washing, and use by other departments is easily accessible. A student study space is also provided on this floor space for basic research (wet-bench) for the School of Nursing.

Floor 8

This floor houses faculty and graduate space for the clinical staff and Pharm. D. students within the College of Pharmacy. The School of Nursing's Administration selected faculty offices and conference rooms will be accommodated on this floor.

Floor 9

School of Nursing faculty will be accommodated on this floor with offices and conference rooms.

Floor 10

Greenhouse facilities for the College of Pharmacy are located on this level so as to permit the best possible exposure to natural light. The remainder of the space on Floor 10 will be occupied by Mechanical Equipment.

Space by Program

Breakdown of space by Floor:

	<u>Pharmacy</u>	<u>Nursing</u>	<u>H.S. Shared</u>
Floor 1	0	2,991	8,434
Floor 2	4,153	0	5,490
Floor 3	9,057	0	887
Floor 4	0	10,652	0
Floor 5	10,611	0	762
Floor 6	15,211	0	0
Floor 7	11,690	578	2,170
Floor 8	4,683	10,090	0
Floor 9	0	13,146	0
Floor 10	<u>979</u>	<u>0</u>	<u>0</u>
TOTALS	56,384	37,457	17,743

SPACE SUMMARY BY FLOOR

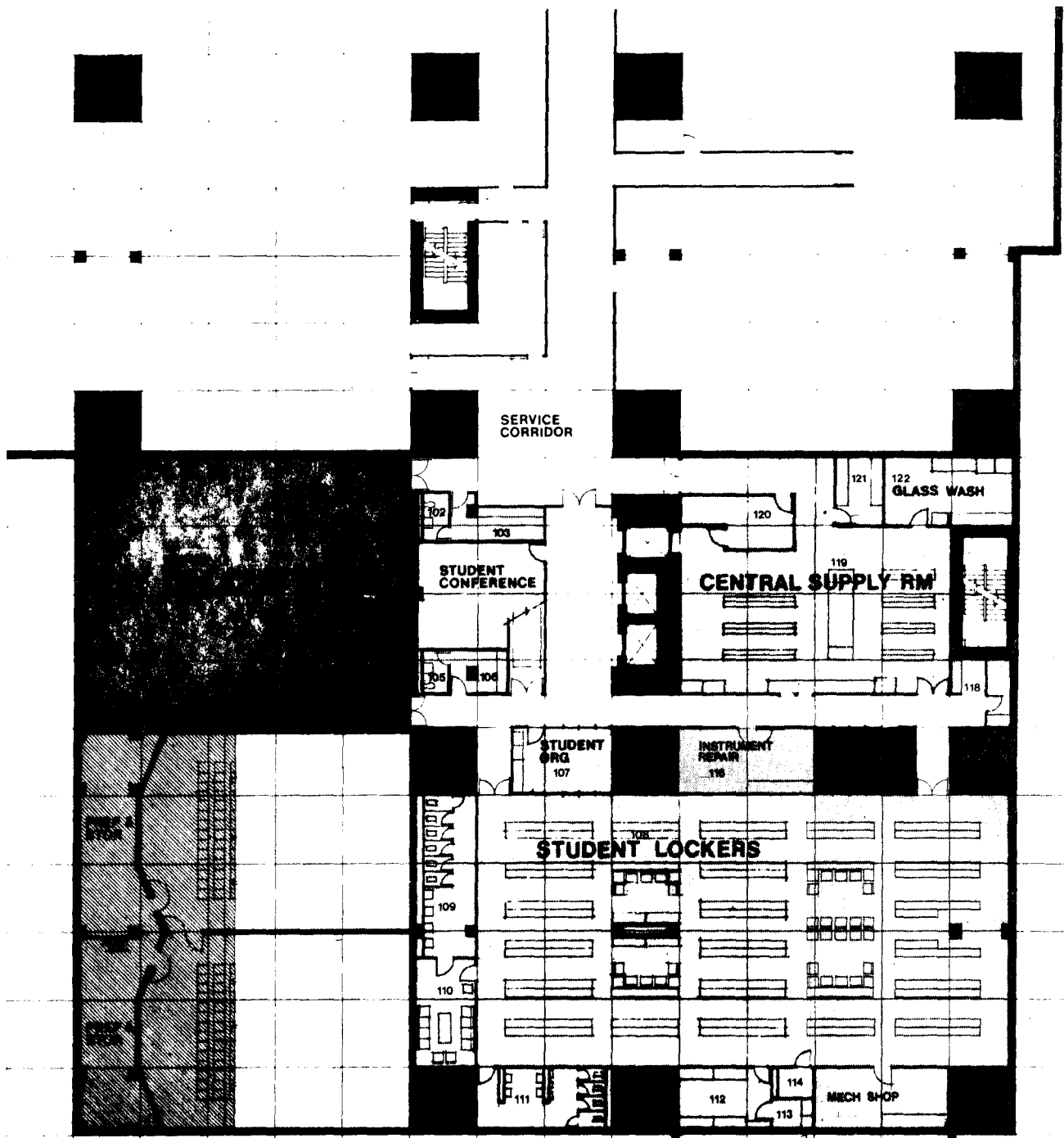
BUILDING UNIT F	ASSOC SQ FT BY FLOOR	ASSIGNED SQ FT BY FLOOR	NSF BY FLOOR	UNASS SQ FT BY FLOOR	SFG BY FLOOR
Basement			0	14,521	14,521
Floor 1	2,964	11,425	14,389	7,709	22,098
Floor 2	9,341	9,643	18,984	2,698	21,682
Floor 3	2,244	9,944	12,188	3,641	15,829
Floor 4	1,365	10,652	12,017	4,311	16,328
Floor 5	3,708	11,373	15,081	3,650	18,731
Floor 6	3,513	15,211	18,724	4,166	22,890
Floor 7	3,507	14,438	17,945	4,945	22,890
Floor 8	3,665	14,773	18,438	4,452	22,890
Floor 9	5,565	13,146	18,711	4,179	22,890
Floor 10	5,776	979	6,755	5,535	12,290
TOTAL	41,648	111,584	153,232	59,807	213,039

Floor 1 Unit F

ROOM NUMBER	ROOM ASSIGNMENT	ROOM NAME	SFN PER ROOM	TOTAL ASSOC	TOTAL UNASS	TOTAL SFN	TOTAL SFG
F1-99		Corridor		1506			
101	N	Nursing Educ. & Research Dev.	2991				
102		Toilet		40			
103		Locker		102			
104	HSS	Student Conf.	583				
105		Toilet		40			
106		Locker		80			
107	HSS	Student Org.	226				
108	HSS	Student Lock	4818				
109		W-Toilet		289			
110		W-Lounge		220			
111		M-Toilet		268			
112		Storage		191			
113		Janitor		38			
114		Toilet (Handicapped)		51			
115	HSS	Mech. Shop	275				
116	HSS	Inst. Repair	304				
117	HSS	Student Org.	226				
118		Janitor		139			
119	HSS	Cent. Supply	1464				
120	HSS	Trash Rm.	180				
121	HSS	Solvent Stor.	90				
122	HSS	Glass Wash	268				
		TOTAL	11,425	2,964	7,709	14,389	22,098

194

P - College of Pharmacy
 N - School of Nursing
 HSS - Health Sciences Shared Space (Applicant space)



NSF 14,389
 SFG 22,098
 NURSING PHARMACY 5,144
 PHARMACY 6,281

LEGEND
 [Tree pattern] STATE FUNDED AREA
 [Hatched pattern] PHARMACY
 [Solid black] NURSING

TAC

COLLEGE OF PHARMACY & SCHOOL OF NURSING
 UNIVERSITY OF MINNESOTA
 HEALTH SCIENCES EXPANSION

PROGRAM UNITS:
 SHARED FACILITIES

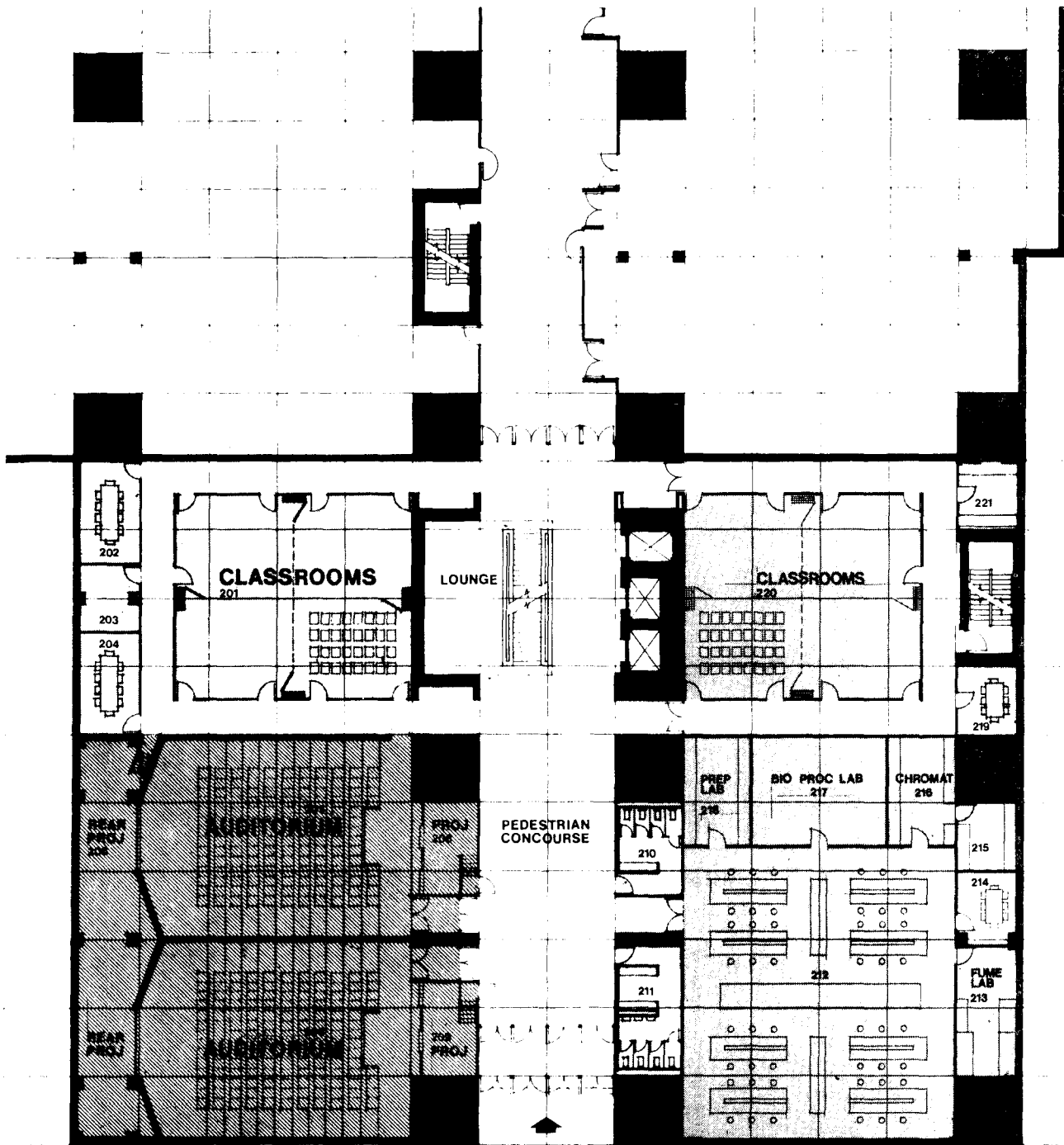
FLOOR
1

Floor 2 Unit F

ROOM NUMBER	ROOM ASSIGNMENT	ROOM NAME	SFN PER ROOM	TOTAL ASSOC	TOTAL UNASS	TOTAL SFN	TOTAL SFG	STATE FUNDED
F2-99		Corridors		4945				
201		Classroom		1596				
202		Conf.		208				
203		Storage		140				
204		Conf.		208				
205	HSS	Auditorium						2100
206	HSS	Rear Proj. Room						365
206A	HSS	Rear Proj. Room						365
207	HSS	Auditorium						2100
208	HSS	Proj.						210
209	HSS	Proj.						210
210		W-Toilet		210				
211		Men's Toilet		271				
212	P	Under G. Lab	2619					
213	P	Fume Lab	267					
214	HSS	Conf.	140					
215	P	Inst. Repair	140					
216	P	Chromat	247					
217	P	Bio Proc Lab	493					
218	P	Prep Lab	247					
219		Conf.		140				
220		Classroom		1596				
221	P	Inst. Lab	140					
		TOTAL	4,293	9,341	2,698	18,984	21,682	5,350

196

P - College of Pharmacy
 N - School of Nursing
 HSS - Health Sciences Shared Space (Applicant space)



NSF 18,984
 SFG 21,682
 PHARMACY 4,293
 STATE 5,350

LEGEND
 STATE FUNDED AREA
 PHARMACY
 NURSING

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COLLEGE OF PHARMACY & SCHOOL OF NURSING
 UNIVERSITY OF MINNESOTA
 HEALTH SCIENCES EXPANSION

PROGRAM UNITS:

SHARED FACILITIES
 PHARMACY UNDER GRAD LAB

FLOOR

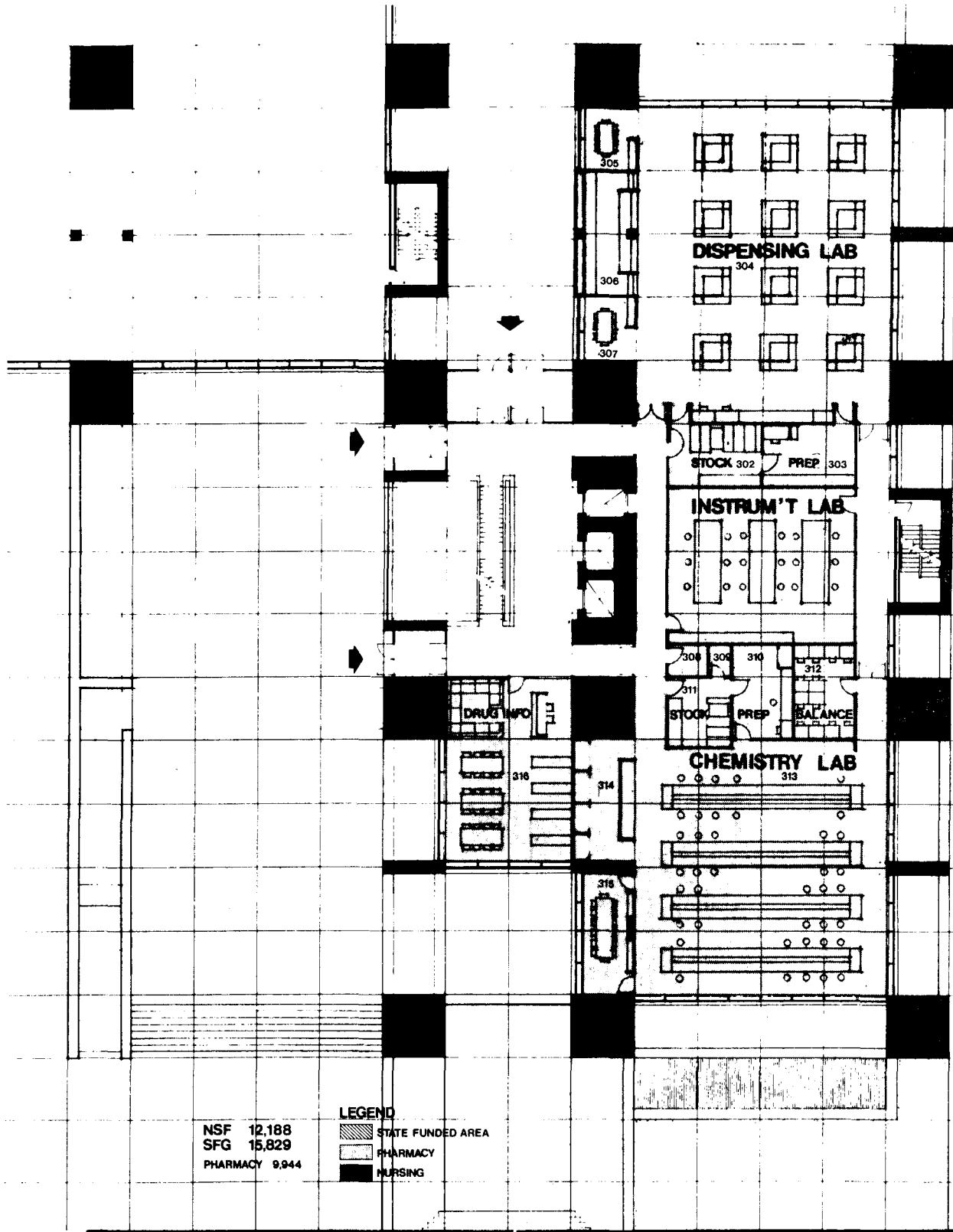
2

Floor 3 Unit F

ROOM NUMBER	ROOM ASSIGNMENT	ROOM NAME	SFN PER ROOM	TOTAL ASSOC	TOTAL UNASS	TOTAL SFN	TOTAL SFG
F3-99		Corridor		2194			
301	P	Instrument Lab	1170				
302	P	Stock	226				
303	P	Prep	226				
304	P	Dispensing Lab	3176				
305	P	Conf.	127				
306	P	Drug Display	225				
307	P	Conf.	127				
308		Janitor Clo.		50			
309	P	Storage	28				
310	P	Prep Lab	226				
311	P	Stock	172				
312	P	Balance	226				
313	P	Chemistry Lab	2568				
314	P	Fume Lab	304				
315	P	Conf.	256				
316	HSS	Drug Info	887				
		TOTAL	9,944	2,244	3,641	12,188	15,829

108

P - College of Pharmacy
 N - School of Nursing
 HSS - Health Sciences Shared Space (Applicant space)



NSF 12,188
 SFG 15,829
 PHARMACY 9,944

LEGEND
 [Hatched Box] STATE FUNDED AREA
 [Light Gray Box] PHARMACY
 [Dark Gray Box] NURSING

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COLLEGE OF PHARMACY & SCHOOL OF NURSING
 UNIVERSITY OF MINNESOTA
 HEALTH SCIENCES EXPANSION

PROGRAM UNITS:
 SHARED FACILITIES
 PHARMACY UNDER GRAD LAB

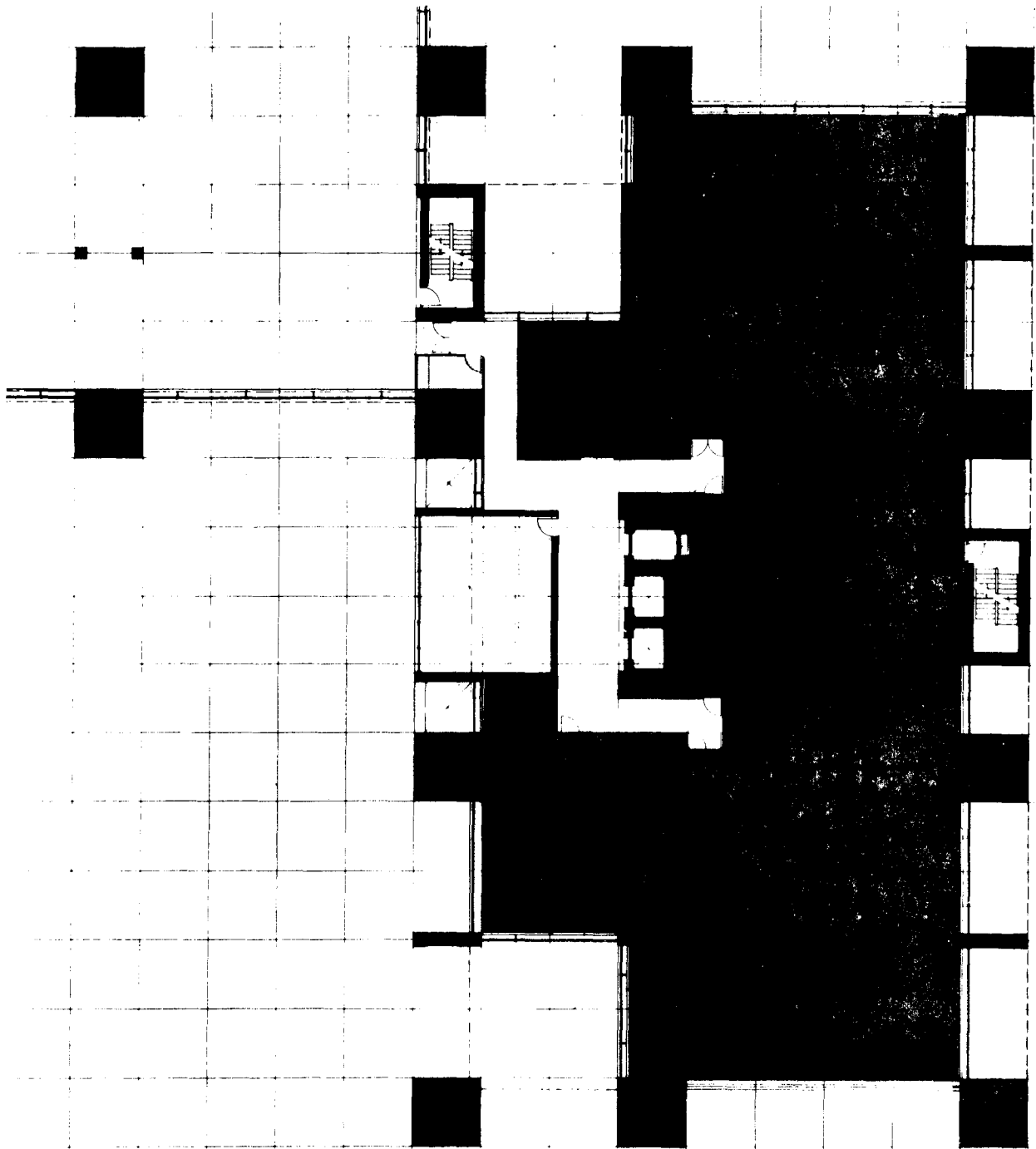
FLOOR
3

Floor 4 Unit F

ROOM NUMBER	ROOM ASSIGNMENT	ROOM NAME	SFN PER ROOM	TOTAL ASSOC	TOTAL UNASS	TOTAL SFN	TOTAL SFG
F4-99		Corridor		1365			
401	N	AV Storage & Assembly	350				
402	N	Nursing Skills Lab	3302				
403	N	Helping Relation Group Lab	300				
404	N	Helping Relation Group Lab	300				
405	N	Helping Relation Group Lab	1200				
406	N	Helping Relation Ind Lab	2600				
407	N	Children's Observ. Lab	1000				
408	N	Children Lab	200				
409	N	Health Assessments Lab Tea.	200				
410	N	Health Assessments Lab	1200				
		TOTAL	10,652	1,365	4,311	12,017	16,328

200

P - College of Pharmacy
 N - School of Nursing
 HSS - Health Sciences Shared Space (Applicant space)



NSF 12,017
 SFG 16,328
 NURSING 10,852

LEGEND
 [Diagonal Lines] STATE FUNDED AREA
 [Stippled Pattern] PHARMACY
 [Solid Black] NURSING

TAC

COLLEGE OF PHARMACY & SCHOOL OF NURSING
 UNIVERSITY OF MINNESOTA
 HEALTH SCIENCES EXPANSION

PROGRAM UNITS:
 NURSING

FLOOR
4

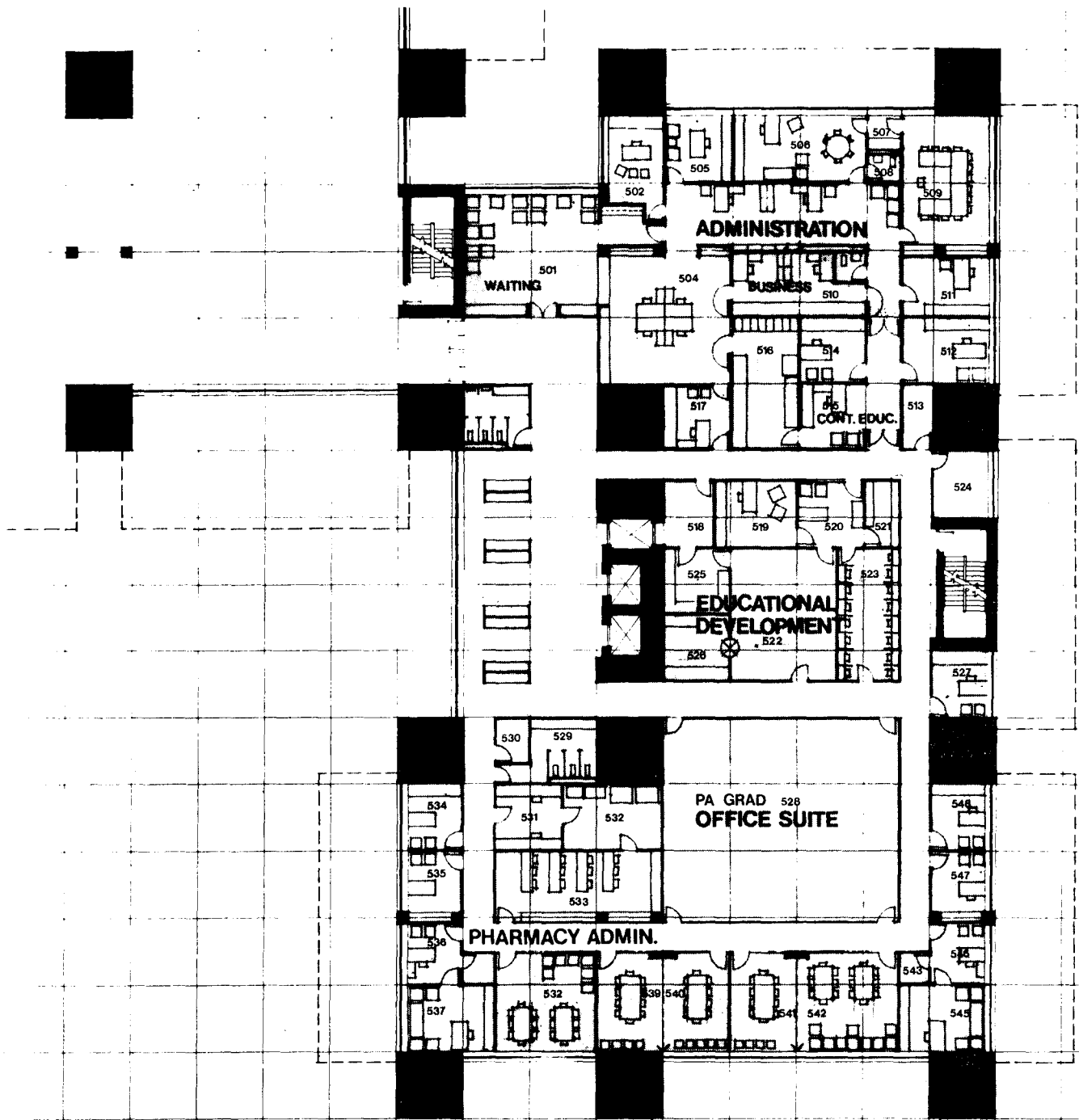
Floor 5 Unit F

ROOM NUMBER	ROOM ASSIGNMENT	ROOM NAME	SFN PER ROOM	TOTAL ASSOC	TOTAL UNASS	TOTAL SFN	TOTAL SFG
F5-99		Corridor		3336			
501	P	Waiting	598				
501A		W-Toilet		152			
502	P	Ass. Dean	168				
503	P	Administration Office	532				
504	P	Joint Offices	578				
505	P	Ass. Dean	152				
506	P	Dean	304				
507	P	Prep Room	40				
508	P	Private Toilet	36				
509	P	Conf	430				
510	P	Business Office	304				
511	P	Office	228				
512	P	Office	228				
513	P	Storage	76				
514	P	Office	152				
515	P	Cont. Educ.	152				
516	P	Supplies	304				
517	P	Office	152				
518	P	Storage	110				
519	P	Office	191				
520	P	Office	152				
521	P	Storage	78				
522	HSS	Shared Office Space	426				
523	HSS	Classroom	336				
524	P	Storage	152				
525	P	Storage	152				
526	P	Inst. Room	152				
527	P	Office	127				
528	P	PA. Grad Office Suite	1810				

201

529		W-Toilet		168			
530		Janitor		52			
531	P	Inst. Storage	152				
532	P	Inst. Repair	226				
533	P	Inst. Room	339				
534	P	Office	127				
535	P	Office	130				
536	P	Office	117				
537	P	Office	201				
538	P	Conf.	320				
539	P	Conf.	226				
540	P	Conf.	226				
541	P	Conf.	226				
542	P	Conf.	320				
543	P	Storage	36				
544	P	Office	226				
545	P	Office	127				
546	P	Office	127				
547	P	Office	127				
		TOTAL	11,373	3,708	3,650	15,081	18,731

P - College of Pharmacy
 N - School of Nursing
 HSS - Health Sciences Shared Space (Applicant space)



NSF 15,081
 SFG 18,731
 PHARMACY 11,375

LEGEND
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 [Solid Black Box] NURSING

TAC COLLEGE OF PHARMACY & SCHOOL OF NURSING
 UNIVERSITY OF MINNESOTA
 HEALTH SCIENCES EXPANSION

PROGRAM UNITS:
 PHARMACY

FLOOR
5

Floor 6 Unit F

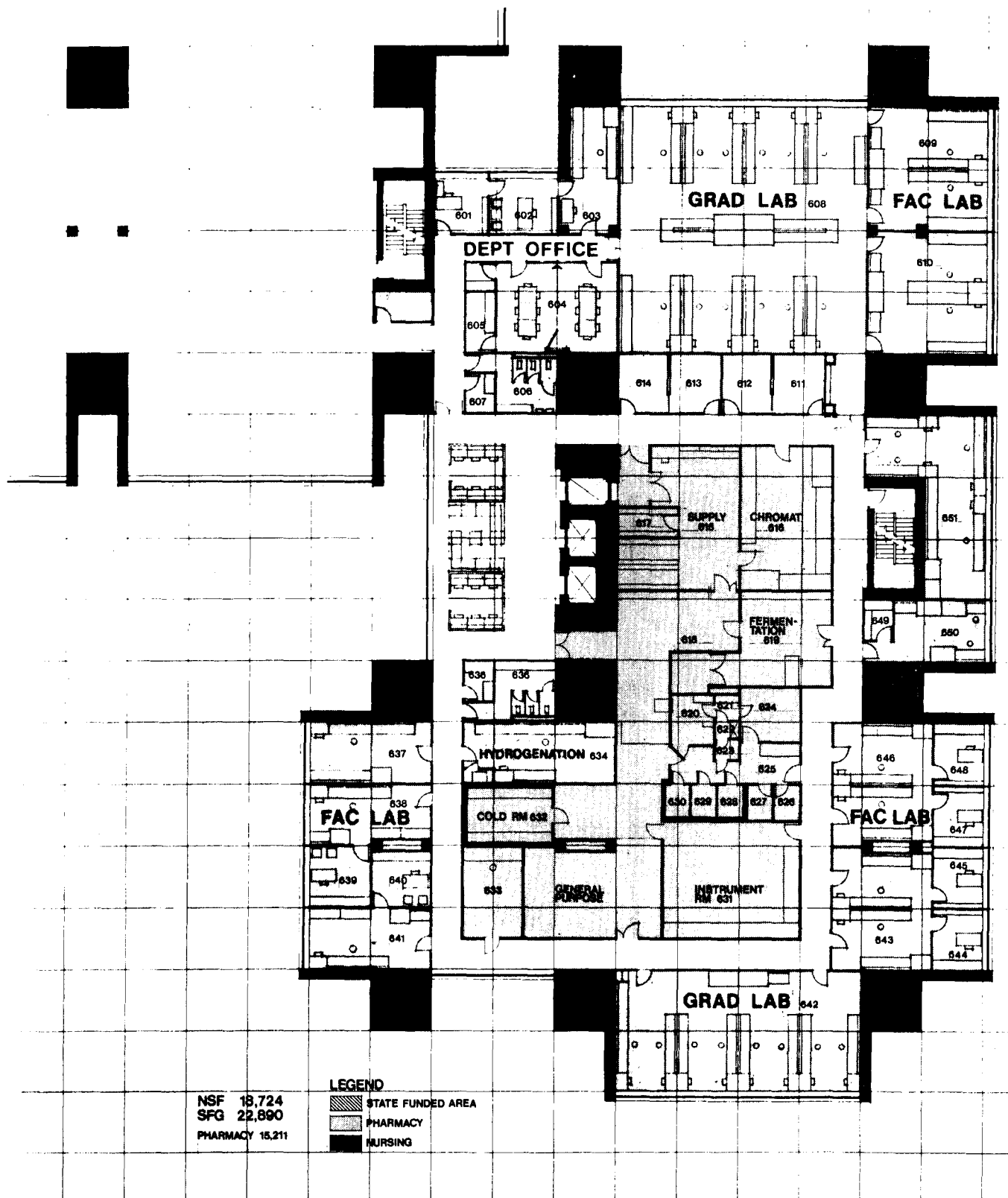
ROOM NUMBER	ROOM ASSIGNMENT	ROOM NAME	SFN PER ROOM	TOTAL ASSOC	TOTAL UNASS	TOTAL SFN	TOTAL SFG
F6-99		Corridor		3065			
601	P	Sec	110				
602	P	Dept Head	144				
603	P	Dept Head Lab	278				
604	P	Conf	452				
605	P	AV. Storage	74				
605A	P	Kitchen	36				
606		M-Toilet			176		
607		Jan.			48		
608	P	Grad Lab	2608				
609	P	Fac Office	608				
610	P	Fac Lab	608				
611	P	Faculty Office	124				
612	P	Faculty Office	124				
613	P	Faculty Office	124				
614	P	Faculty Office	124				
615	P	Supply	553				
616	P	Chromat	541				
617	P	Storage	74				
618	P	Gen Purpose Lab	1174				
619	P	Fermentation	348				
619A	P	Sterilizer RM	64				
620	P	Clean Rm	90				
621	P	Lam Flow Rm	25				
622	P	Shower	25				
623	P	Locker Rm	25				
624	P	Transfer Rm	135				
625	P	Const Temp	188				
626	P	Micro	41				
627	P	Micro	41				
628	P	E.C.R.	41				

629	P	E.C.R.	41				
630	P	E.C.R.	41				
631	P	Instrument	662				
632	P	Cold Rm	226				
633	P	Grad Lab	226				
634	P	Hydrogenation	382				
635		W-Toilet		176			
636		Janitor Clo		48			
637	P	Post Dock Lab	304				
638	P	Fac Lab	304				
639	P	Office	152				
640	P	Office	152				
641	P	Fac Lab	304				
642	P	Grad Lab	1216				
643	P	Fac Lab	501				
644	P	Office	127				
645	P	Office	127				
645	P	Fac Lab	501				
647	P	Office	127				
648	P	Office	127				
649	P	Dark Rm	48				
650	P	Rad Rm	256				
651	P	Grad Lab	608				
		TOTAL	15,211	3,513	4,166	18,724	22,890

P - College of Pharmacy

N - School of Nursing

HSS - Health Science Shared Space (Applicant space)



TAC

COLLEGE OF PHARMACY & SCHOOL OF NURSING
 UNIVERSITY OF MINNESOTA
 HEALTH SCIENCES EXPANSION

PROGRAM UNITS:
 PHARMACY : FACULTY
 GRADUATE STUDENTS,

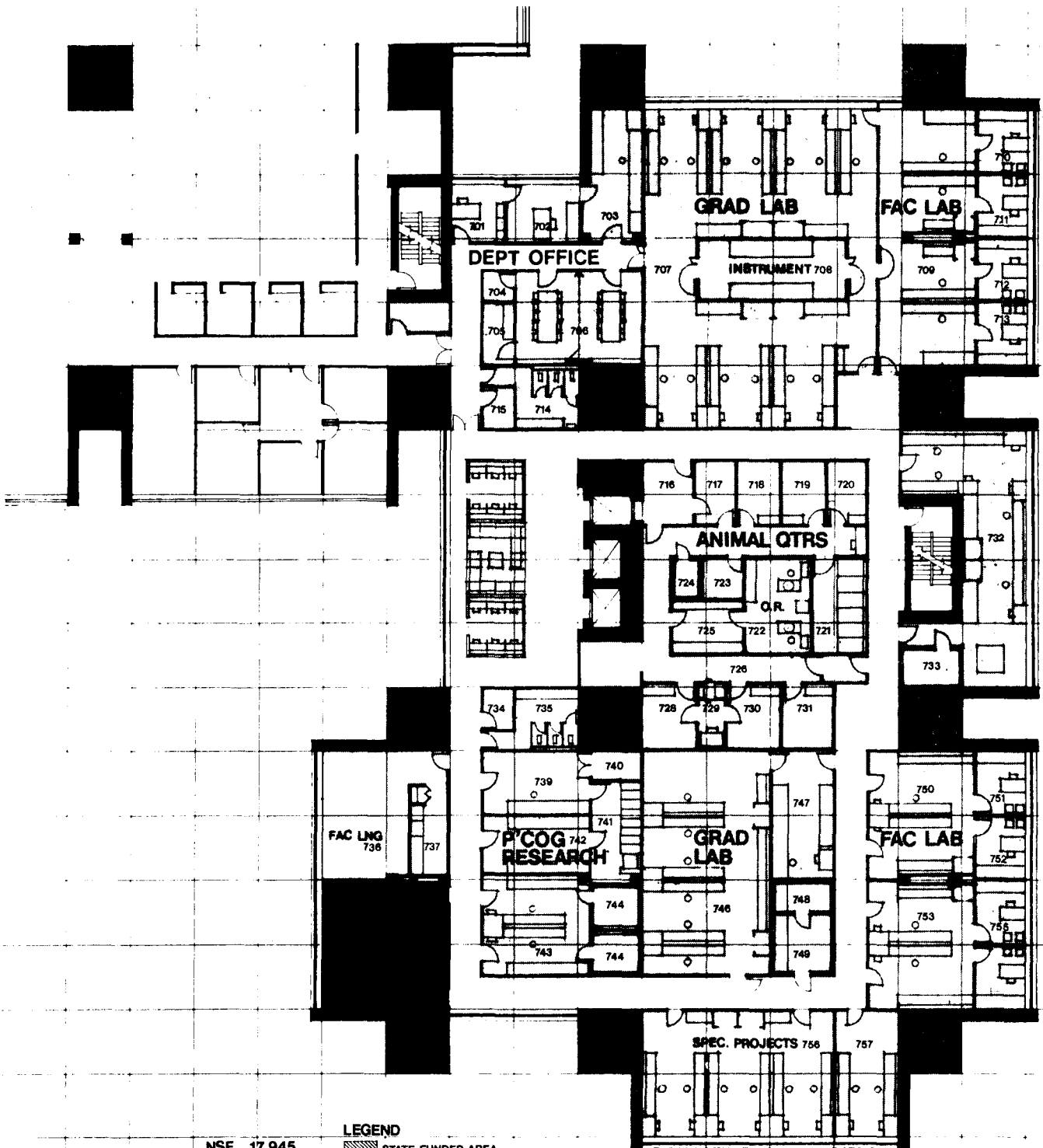
FLOOR
6

Floor 7 Unit F

ROOM NUMBER	ROOM ASSIGNMENT	ROOM NAME	SFN PER ROOM	TOTAL ASSOC	TOTAL UNASS	TOTAL SFN	TOTAL SFG
F7-99		Corridor		3059			
701	P	Sec	110				
702	P	Office	144				
703	P	Dept Head Lab	278				
704	P	Kitchen	36				
705	P	AV Storage	74				
706	P	Conf	452				
707	P	Grad Lab	2083				
708	P	Instrument	353				
709	P	Fac Lab	900				
710	P	Office	127				
711	P	Office	127				
712	P	Office	127				
713	P	Office	127				
714		M-Toilet		176			
715		Janitor		48			
716	HSS	Receiving	111				
717	HSS	Animal	106				
718	HSS	Animal	106				
719	HSS	Animal	106				
720	HSS	Animal	94				
721	HSS	Dog Rm	200				
722	HSS	Surgery	242				
723	HSS	Feed Bed	65				
724	HSS	Cold Room	48				
725	HSS	Prep Recovery	144				
726	HSS	Corridor	400				
727	HSS	Storage	106				
728	HSS	Animal	123				
729	HSS	Injection	65				
730	HSS	Animal	131				

731	HSS	Animal	123				
732	P	Med Chem Grad Lab	710				
733	P	E.C.R.	90				
734		Janitor			48		
735		W-Toilet			176		
736	P	Faculty Lounge	461				
737	P	Vending	127				
738	N	Nursing Lab	578				
739	P	Drying & Milling	254				
740	P	Dust Rm	53				
741	P	Drug Storage	200				
742	P	Extraction Lab	234				
743	P	Post Dock Lab	405				
744	P	Envir Plants	87				
745	P	Envir Plants	80				
746	P	Grad Lab	900				
747	P	Test & Cont	304				
748	P	E.C.R.	73				
749	P	E.C.R.	152				
750	P	Fac Lab	450				
751	P	Fac Office	127				
752	P	Fac Office	127				
753	P	Fac Lab	450				
754	P	Office	127				
755	P	Office	127				
756	P	Spec Prov Lab	910				
757	P	C.P. Office Lab	304				
		TOTAL	14,438	3,507	4,945	17,945	22,890

P - College of Pharmacy
 N - School of Nursing
 HSS - Health Science Shared Space (Applicant space)



NSF 17,945
 SFG 22,890
 PHARMACY 578
 NURSING 13,860

LEGEND
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 [Solid Black Box] NURSING

TAC

COLLEGE OF PHARMACY & SCHOOL OF NURSING
 UNIVERSITY OF MINNESOTA
 HEALTH SCIENCES EXPANSION

PROGRAM UNITS:

SHARED FACILITIES
 PHARMACY: FACULTY
 GRADUATE STUDENTS

FLOOR

7

Floor 8 Unit F

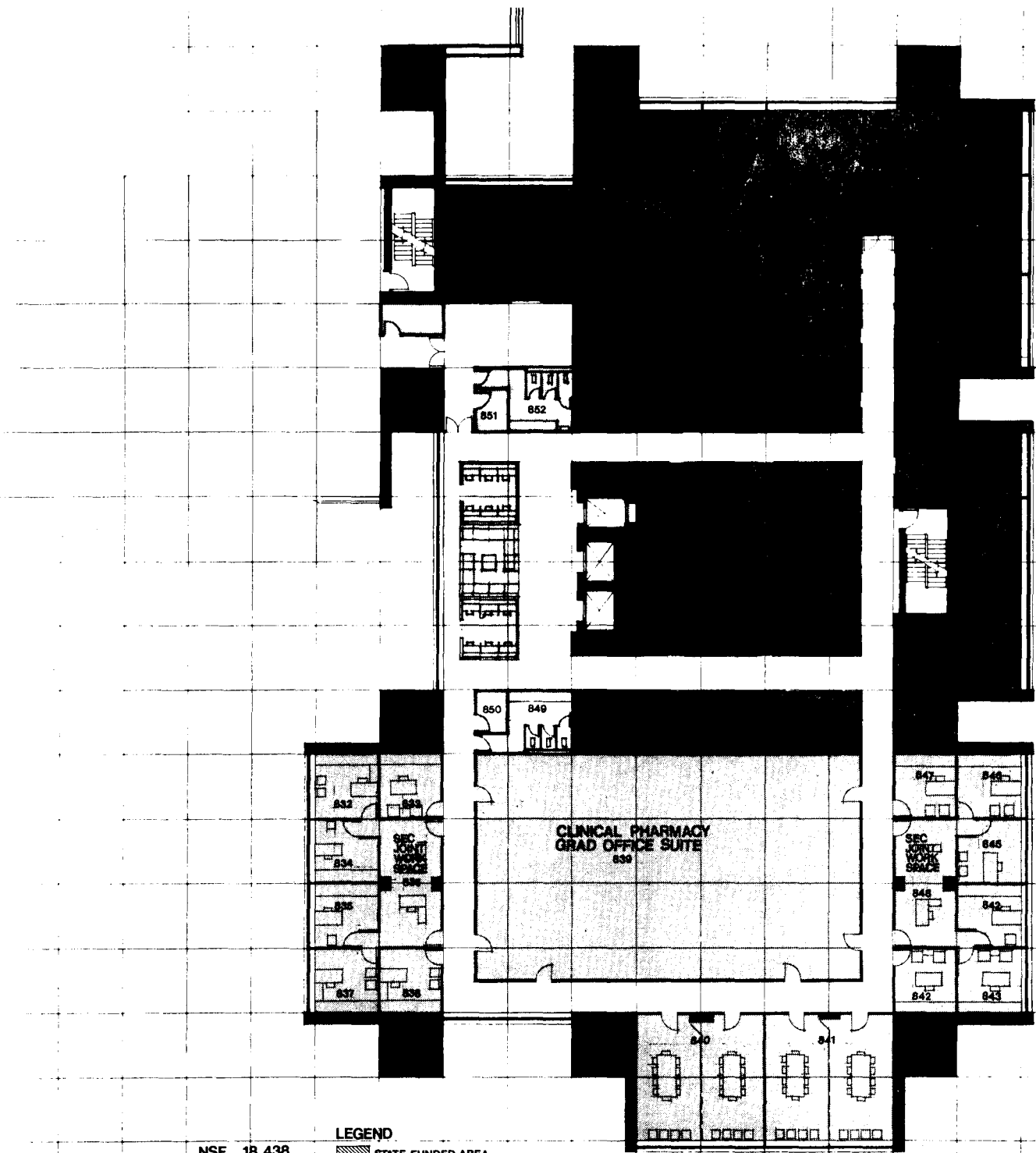
ROOM NUMBER	ROOM ASSIGNMENT	ROOM NAME	SFN PER ROOM	TOTAL ASSOC	TOTAL UNASS	TOTAL SFN	TOTAL SFG
F8-99		Corridor		3217			
801	N	Waiting	608				
802	N	Ass Dean	152				
803	N	Administration Office	608				
804	N	Ass Dean	152				
805	N	Assoc Dean	152				
806	N	Dean	226				
807	N	Conference Prep Area	36				
808	N	Staff Toilet	36				
809	N	Conf	304				
810	N	Shared Office	227				
811	N	Office	152				
812	N	Shared Office	227				
813	N	Office	152				
814	N	Staff Toilet	36				
815	N	Machine Rm, Duplicating	191				
816	N	Work Room	227				
817	N	Shared Office	227				
818	N	Office	142				
819	N	Office	142				
820	N	Office	142				
821	N	Sec Joint Work	790				
822	N	Sec Joint Work	1139				
823	N	Office	143				
824	N	Office	143				
825	N	Office	143				
826	N	Conf	304				
827	N	Research Support	1549				
828	N	Office	131				
829	N	Office	131				
830	N	Office	131				

831	N	Office	131				
832	N	Office	152				
833	N	Office	152				
834	N	Office	152				
835	N	Office	152				
836	N	Storage space	304				
837	N	Office	152				
838	N	Office	152				
839	P	Clinical Pharm Grad Office Suite	2251				
840	P	Conf	608				
841	P	Conf	608				
842	P	Office	152				
843	P	Office	152				
844	P	Office	152				
845	P	Office	152				
846	P	Office	152				
847	P	Office	152				
848	P	Sec Joint Work Space	304				
849		M-Toilet			176		
850		Janitor Clo.			48		
851		W-Toilet			176		
852		Janitor Clo			48		
TOTAL			14,823	3,665	4,452	18,434	22,890

P - College of Pharmacy

N - School of Nursing

HSS _ Health Sciences Shared Space (Applicant space)



NSF 18,438
 SFG 22,890
 PHARMACY 6,840
 NURSING 7,933

LEGEND
 [Diagonal lines] STATE FUNDED AREA
 [Stippling] PHARMACY
 [Solid black] NURSING

TAC

COLLEGE OF PHARMACY & SCHOOL OF NURSING
 UNIVERSITY OF MINNESOTA
 HEALTH SCIENCES EXPANSION

PROGRAM UNITS:
 NURSING
 CLINICAL PHARMACY

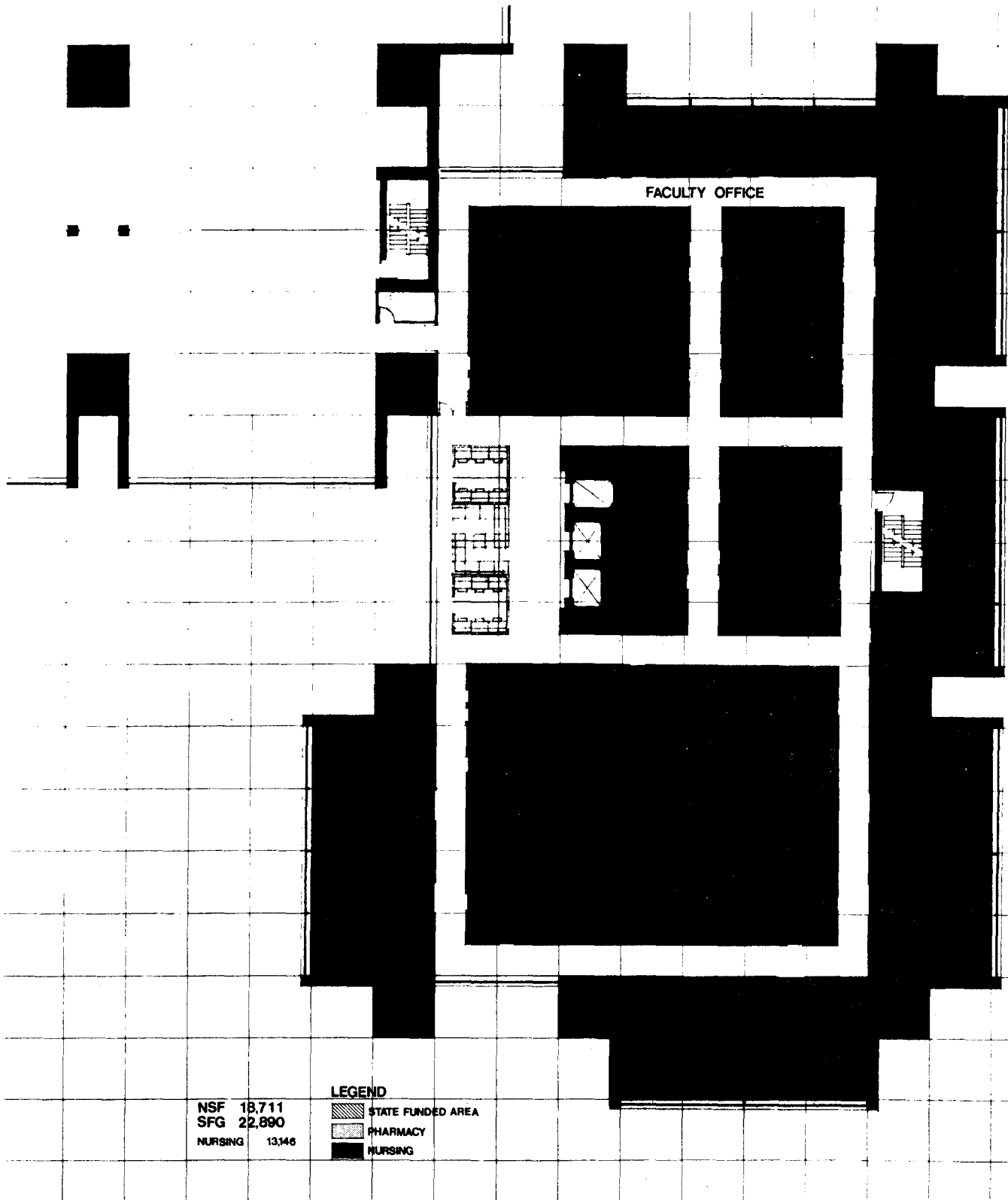
FLOOR
8

Floor 9 Unit F

ROOM NUMBER	ROOM ASSIGNMENT	ROOM NAME	SFN PER ROOM	TOTAL ASSOC	TOTAL UNASS	TOTAL SFN	TOTAL SFG
F9-99		Corridor		5117			
901	N	Fac Office	127				
902	N	Fac Office	152				
903	N	Fac Office	152				
904	N	Fac Office	152				
905	N	Fac Office	152				
906	N	Fac Office	152				
907	N	Shared Office	304				
908	N	Faculty Office Suite	779				
909	N	Fac Office	127				
910	N	Fac Office	127				
911	N	Fac Office	127				
912	N	Fac Office	127				
913	N	Fac Office	127				
914	N	Fac Office	127				
915	N	Fac Office	127				
916	N	Fac Office	127				
917	N	Fac Office	127				
918	N	Fac Office	127				
919	N	Fac Office	127				
920	N	Fac Office	127				
921	N	Fac Office	127				
922	N	Fac Office	304				
923	N	Fac Office	152				
924	N	Fac Office	152				
925	N	Fac Office	152				
926	N	Fac Office	152				
927	N	Fac Office	152				
928	N	Fac Office	152				
929	N	Fac Office	152				
930	N	Fac Office	152				

931	N	Fac Office	152					
932	N	Fac Office	152					
933	N	Conference	608					
934	N	Conf	304					
935	N	Faculty Office Suite	3724					
936	N	Fac Office	152					
037	N	Shared Office	304					
938	N	Shared Office	304					
939	N	Fac Office	152					
940	N	Fac Office	152					
941	N	Fac Office	152					
942	N	Fac Office	152					
943	N	Shared Office	304					
944	N	Shared Office	304					
945	N	Fac Office	152					
946	N	Fac Office	152					
947	N	Shared Office	304					
948	N	Shared Office	304					
949	N	Fac Office	152					
950	N	Fac Office	152					
951		W-Toilet				176		
952		Janitor				48		
953		M-Toilet				176		
954		Janitor				48		
		TOTAL	13,146	5,565	4,179	18,711	22,890	

P - College of Pharmacy
 N - School of Nursing
 HSS - Health Sciences Shared Space (Applicant space)



NSF 18,711
 SFG 22,890
 NURSING 13,146

LEGEND
 [Diagonal lines] STATE FUNDED AREA
 [Grid pattern] PHARMACY
 [Black] NURSING

TAC

COLLEGE OF PHARMACY & SCHOOL OF NURSING
 UNIVERSITY OF MINNESOTA
 HEALTH SCIENCES EXPANSION

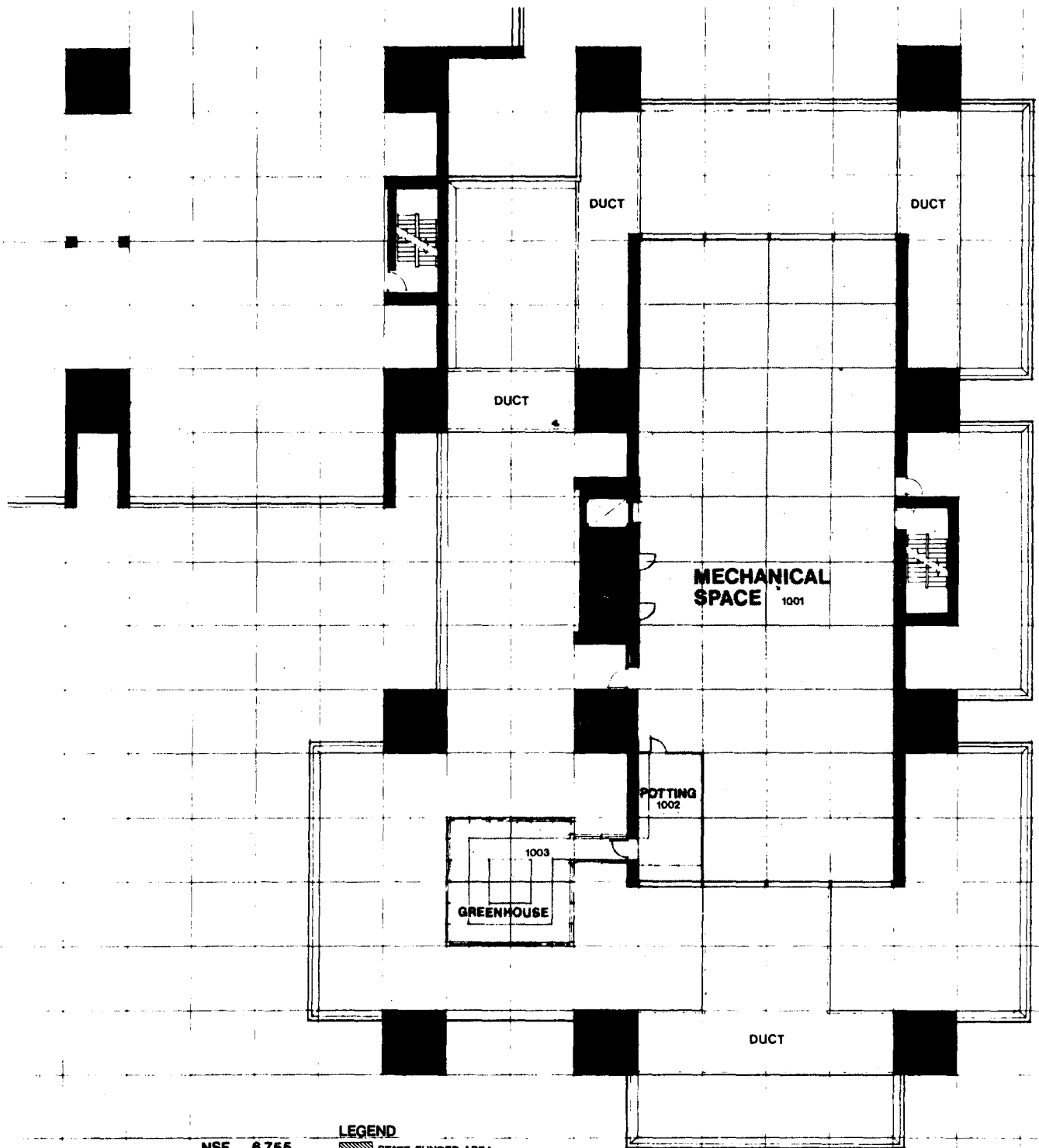
PROGRAM UNITS:
 NURSING

FLOOR
9




Floor 10 Unit F

ROOM NUMBER	ROOM ASSIGNMENT	ROOM NAME	SFN PER ROOM	TOTAL ASSOC	TOTAL UNASS	TOTAL SFN	TOTAL SFG
1001		Mechanical Space		5776			
1002	P	Potting	304				
1003	P	Greenhouse	675				
		TOTAL	979	5,776	5,535	6,755	12,290

P - College of Pharmacy
 N - School of Nursing
 HSS - Health Sciences Shared Space (Applicant space)



NSF 6,755
 SFG 12,200
 PHARMACY 979

- LEGEND**
-  STATE FUNDED AREA
 -  PHARMACY
 -  NURSING

TAC

COLLEGE OF PHARMACY & SCHOOL OF NURSING
 UNIVERSITY OF MINNESOTA
 HEALTH SCIENCES EXPANSION

PROGRAM UNITS:
 PHARMACY

FLOOR

10

Space Tabulation
Percentages and Net Assignable Sq. Ft. by Program in Nursing

Teaching Space

<u>ROOM NUMBER</u>	<u>ROOM NAME</u>	<u>NET AREA</u>	<u>BACCALAUREATE</u>		<u>MASTERS</u>	
			<u>%</u>	<u>NET</u>	<u>%</u>	<u>NET</u>
401	A-V Storage & Preparation	350	60	210	40	140
402	Nursing Skills Laboratory	3302	100	3302		
403	Helping Relations Group Lab	300	60	180	40	120
404	Helping Relations Group Lab	300	60	180	40	120
405	Helping Relations Group Lab	1200	60	720	40	480
406	Helping Relations Individual Lab	2600	60	1560	40	1040
407	Childrens Observation Laboratory	1000	58	580	42	420
408	Childrens Lab	200	58	116	42	84
409	Health Assessment Teaching Lab	200	50	100	50	100
410	Health Assessment Laboratory	1200	50	600	50	600
738	Nursing Laboratory	578			100	578

2.9

Administrative Space

<u>ROOM NUMBER</u>	<u>ROOM NAME</u>	<u>NET AREA</u>	<u>BACCALAUREATE</u>		<u>MASTERS</u>	
			<u>%</u>	<u>NET</u>	<u>%</u>	<u>NET</u>
802	Assist. Dean	152			100	152
803	Administration Office (Admin. Clerical Support)	608	60	364.4	40	243.2
804	Assist. Dean	152	100	152		
805	Assoc. Dean	152	60	91.2	40	60.8
806	Dean	226	60	135.6	40	90.4
807	Conference Preparation	36	60	21.6	40	14.4
811	Chairman of Research	152	20	30.4	80	121.6
812	Business Office	227	45	102.15	55	124.85

813	Administration Office	152	60	91.2	40	60.8
815	Machine Room (Duplicating)	191	60	114.6	40	76.4
816	Work Room & Office Supplies	227	60	136.2	40	90.8
817	Graduate Counselor					
	Undergraduate Counselor	227	50	113.5	50	113.5
818	Admissions and Records					
	Director	142	60	85.2	40	56.8
819	Student Personnel Worker	142	60	85.2	40	56.8
820	Admissions Counselor	142	60	85.2	40	56.8
821	Admissions & Records	790	60	474	40	316
	(sec joint work)					
822	Secretarial Pool	1139	57	649.23	43	489.77
	(sec joint work)					
827	Research Support	608	20	121.6	80	486.4
101	Educational Development and Research	2991				
	(2391)*		20	478.2	80	1912.8

*600 sq. ft. to Continuing Education

Faculty Offices

<u>ROOM</u> <u>NUMBER</u>	<u>ROOM</u> <u>NAME</u>	<u>NET AREA</u>	<u>BACCALAUREATE</u> <u>%</u>	<u>NET</u>	<u>MASTERS</u> <u>%</u>	<u>NET</u>
823-825	Faculty Offices (3)	429	57	244.53	43	184.47
828-831	Faculty Offices (4)	524	57	299.68	43	255.32
832-835	Faculty Offices (4)	608	57	346.56	43	261.44
837-838	Faculty Offices (2)	304	57	173.28	43	130.72
901-932	Faculty Offices (32)	5445	57	3103.65	43	2341.35
	(Including Shared Multiple office suites)					
935-950	Faculty Offices (16)	6916	57	3942.12	43	2973.88
	(Including Shared Multiple office suite)					

School Support Space

<u>ROOM NUMBER</u>	<u>ROOM NAME</u>	<u>NET AREA</u>	<u>BACCALAUREATE</u>		<u>MASTERS</u>	
			<u>%</u>	<u>NET</u>	<u>%</u>	<u>NET</u>
801	Waiting Reception	608	60	364.8	40	243.2
809	Conference	304	60	182.4	40	121.6
826	Conference	304	60	182.4	40	121.6
933	Faculty Conference	608	60	364.8	40	243.2
934	Conference	304	60	182.4	40	121.6
836	Storage	304	60	182.4	40	121.6
		<hr/>		<hr/>		<hr/>
		36,558		20,954.43		15,603.57

Other Space

<u>ROOM NUMBER</u>	<u>ROOM NAME</u>	<u>NET AREA</u>
810	Continuing Ed.*	227
101	Continuing Ed.*	600
808	Staff Toilet	36
814	Staff Toilet	36
		<hr/>
		899
		<hr/>
		37,457

*The Program of Continuing Education is directed towards the further education of nurses at any and all levels and thus can not be separated into baccalaureate and masters.

The project was funded through the Minnesota Higher Education Coordinating Commission by the Northlands Regional Medical Program, Inc. The Project Director was Dr. Donald Draine, Assistant Executive Director for Academic Planning. The research was conducted by Dr. Robert Rustad, Director of Budget Review, who served as research associate for the project.

The members of the Minnesota Higher Education Coordinating Commission Advisory Committee on Nursing Education (Appendix A) were appointed to serve for the duration of the project by Mr. Richard Hawk, Executive Director of the Minnesota Higher Education Coordinating Commission.

This project was a component of the Northlands Regional Medical Program, Inc. supported by HEW Grant #G03 RM-0021. Opinions expressed represent those of the authors and do not imply official endorsement by Northlands Regional Medical Program, Inc. or the U. S. Department of Health, Education and Welfare.

SUMMARY

The purpose of the project was to develop a statewide process that could provide guidelines for the planning of nursing education. These guidelines would, on adoption by the Higher Education Coordinating Commission (HECC), become state policy.

The approach was to combine expert opinion with reliable information regarding present and projected supply of and demand for nurses, in order to plan appropriately to meet nursing education needs.

An advisory committee representing educators, employers, professionals, students and planners reviewed relevant data and their implications and recommended planning guidelines for the state, which were adopted by the HECC in July 1973* and became state policy.

The information that was utilized in the study included data regarding existing supply of nursing personnel and existing capacities of educational programs. A method was developed for projecting future demand for nurses, future desire of students to enter nursing, and future supply of nurses.

Supply and demand were found to be in relative equilibrium. The demand for nurses was expected to increase by 19% between 1973 and 1980, rising from about 31,000 to about 37,000.

In response to the increasing demand for nurses, annual enrollments were also expected to increase. The projection methods produced two sets of figures, high estimates and low estimates. If the high estimates were to prevail, the projected enrollment in Practical Nurse programs would exceed the design capacity of

*Minutes, Higher Education Coordinating Commission, July, 1973.

1,200 entering students by about 200 at the peak enrollment predicted for 1977. Low estimates placed the 1977 peak enrollment at only 50 above the design capacity.

The state's total capacity of about 620 students in Baccalaureate programs was seen as more than adequate for the highest enrollment projected up to 1980, unless there were to be a change in the trend of program choices made by entering students.

Associate Degree programs, if existing trends were to continue, would show increased enrollments with the phasing out of Diploma programs. Associate Degree program enrollment would exceed the design capacity of 1,000 in 1974 if high estimates were to prevail, and in 1975 under the low estimates. Enrollments were projected to exceed capacity by 30% or 50% by 1980.

In view of these findings, the Advisory Committee recommended that the Fall 1972 enrollment level of nursing education programs be maintained for the next year. (This level included both operating programs and those programs that had been approved but had not yet opened.) Annual review was recommended to ensure that plans can be responsive to changing needs.

Within the limits of the 1972 level, it was recommended that programs being terminated be replaced as much as possible by new programs located in underserved areas of the state.

The Advisory Committee also recommended the approval of a planning process whereby a representative committee working with statewide and regional health planning organizations would have continuing responsibility for recommending policies. The committee would utilize reliable, updated information in its deliberations. The Minnesota Board of Nursing would continue its responsibility for review of new programs relevant to curricula, faculties and clinical facilities. Further research and exploration of issues beyond the scope of this study were also recommended by the Advisory Committee.

The most significant results of the project were the establishment of a data base for planning, and the demonstration that experts in the field, functioning as an advisory committee and working with reliable data, could produce guidelines for planning for nursing education that were acceptable to the educators, employers, professionals and to the HECC.

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I INTRODUCTION

How best to plan for nursing education has been the concern of professionals, educators and planners for a number of years. This project is an outcome of the individual and joint efforts of several such groups in the state.

The Higher Education Coordinating Commission (HECC) is involved with planning for nursing education through its responsibility for review of new and existing educational programs. The HECC program review process involves measuring against four criteria: consistency of the program with the mission of the educational institution, cost-benefit of the program, extent to which the program duplicates similar ones and whether such duplication is appropriate, and need for the program. The HECC approach to planning has been to develop planning processes that preserve faculty initiative and the autonomy of institutions at the same time that it ensures the filling of state needs.

The nursing profession in Minnesota has a history of concern with the education and utilization of nurses. During the last ten years the Minnesota Board of Nursing, the Minnesota League for Nursing, and the Minnesota Nurses' Association have engaged in a series of study and planning activities. In 1966 they sponsored the creation of the Citizen's Committee for Nursing in Minnesota. The Citizen's Committee made a number of recommendations* in May 1970, based on Nursing in the Upper Midwest**, a study concerning

*Citizen's Committee, To Meet the Need, Recommendations to the Legislature, (St. Paul, May 1970).

**Ivan J. Pahs and Kathryn Barchas, Nursing in the Upper Midwest, Focus on Minnesota, (Minneapolis: Upper Midwest Research and Development Council, December, 1969).

the supply of nurses, financial support for nursing education, accreditation, faculty, career mobility, continuing education, nurse utilization and community and regional nursing.

In 1970, the National Commission on Nursing and Nursing Education published a series of recommendations on the future of nursing as well as suggestions for successfully implementing the recommendations at the state level. A central recommendation contained in its summary report was that:

Each state have, or create, a master planning committee that will take nursing education under its purview, such committees to include representatives of nursing, education, other health professions, and the public, to recommend specific guidelines, means for implementation, and deadlines to ensure that nursing education is positioned in the mainstream of American educational patterns.*

In response to that charge, representatives from the Minnesota Board of Nursing, Minnesota Nurses Association, Minnesota League for Nursing, Minnesota Licensed Practical Nurses Association and Northlands Regional Medical Program, Inc. proposed that the HECC, with financial support from the Northlands Regional Medical Program, undertake the development of a statewide plan for nursing education. This Nursing Education Project is the outcome of that proposal.

PURPOSE

The Nursing Education Project set out to design and test an ongoing statewide planning process that could produce, review, evaluate and modify an effective and broadly acceptable plan for nursing education in Minnesota that was both comprehensive and coordinated. This process would produce a set of recommended guidelines which, on approval of the HECC, would become statewide policy. As such, they would guide the legislature in program deliberations and would provide criteria for the HECC in its review

*National Commission for the Study of Nursing and Nursing Education, An Abstract for Action, (New York: McGraw-Hill Book Company, 1970), p. 107.

and evaluation of new and existing programs. The guidelines would not constitute directives to program planners, but would rather provide a sense of direction to guide educational institutions in their planning.

The specific objectives of the project were:

1. To prepare a data base for review and discussion of
 - a. the nursing student pool -
 - b. the statewide design capacity in all levels of nursing education -
 - c. the character, distribution and utilization of the nursepower pool, both present and projected
2. To develop a comprehensive nursing education plan, through study and discussion by a representative group, that will
 - a. determine the statewide need for nursing personnel of all kinds on a succession of target dates
 - b. take account of the need to implement previous state and national recommendations
 - c. seek ways to provide needed personnel, with appropriate balance and distribution of types of nursing education programs
 - d. gear recommendations to produce prompt action and meaningful changes in nursing education
 - e. recommend sources of financial support capital and operating expenses of programs
 - f. maintain continued planning and evaluation of programs
3. To design and appoint a broadly representative Advisory Committee on Nursing Education which will engage in the production of a comprehensive plan for recommendation to the Minnesota Higher Education Coordinating Commission
4. To test this kind of planning process as a means of effective and acceptable planning for nursing education in Minnesota.

APPROACH

The combination of expert opinion and reliable data was chosen as the way to develop an effective plan for nursing education that would be acceptable to all concerned groups. This approach was seen as consistent with a process for statewide coordination in the voluntary mode.

Expert opinion was to be provided through an advisory committee made up of educators, employers, students, and professionals from different parts of the state. Further expertise was to be supplied by consultants representing state bodies, professional groups and planners.

The data needed for effective planning was seen to fall into three categories:

1. The demand for nurses
2. The number of students choosing nursing as a career
3. The design capacity of nursing education programs -- that is, the total number of nurses that could be graduated annually if all resources committed to nursing education were utilized as planned

These three interact in a circular manner. Demand for nurses affects the number of students choosing to enter nursing. The capacity of nursing programs affects the number being graduated, and the number of graduates affects future demand for additional nursepower.

Left to itself, a state of equilibrium is eventually achieved through the normal interaction of supply and demand. There is always a time lag, however, in the achievement of this equilibrium, during which either waste can occur in the form of overproduction of nurses or famine can occur in the form of underproduction. The planning process envisioned here would anticipate the demand for nurses and would maintain the level of program capacities in realistic proportion to that demand.

In order to provide the data necessary for planning, it would be necessary to develop a method for predicting both supply and demand. (Such a method was developed and is described in Chapter 2.)

The Advisory Committee on Nursing Education, working with the data supplied by the project staff, was to develop the proposed planning process and its guidelines. Final approval rested with the HECC, whereupon the recommendations would become state policy.

The planned feedback loop between the employers of nursing personnel and the educators, it was hoped, would encourage a dialogue along three lines: the determination of the appropriate number of nurses to be trained, the more effective utilization of nurses in the health care delivery system, and the development of educational program curricula that are appropriate to on-the-job requirements.

II METHODOLOGY

The methodology for this project involved the structuring of advisory committee participation to ensure maximum benefit from its expertise, the use of data collected by other agencies, and the design of a research method to make reasonably reliable projections of supply of and demand for nurses in future years.

EXPERT OPINION

The membership of the Advisory Committee on Nursing Education was viewed as a key element of the project. Careful consideration was given both to the categories of membership and to the individuals appointed.

The 21-member committee provided representation from public and private institutions; from programs in universities, state colleges, state community colleges, area vocational-technical institutes, hospitals and private colleges; from programs for practical nursing, the three levels of registered nursing programs (Associate Degree, Diploma and Baccalaureate) and graduate nursing programs; from users of nursepower including physicians and directors of nursing services; from the state student nurses association; and from all geographic areas of the state. (See Appendix A, p. 57 for a full list.)

Eleven additional persons sat with the Advisory Committee as consultants. They represented the State Board of Nursing, the Department of Public Welfare, the Department of Health, the State Comprehensive Health Planning Agency, the Minnesota League of Nursing, the Minnesota Nurses Association, the Minnesota Licensed

Practical Nurses Association, the Minnesota Medical Association, the Minnesota Hospital Association, the Minnesota Association of Health Care Facilities, and the Northlands Regional Medical Program.

Staff for the Advisory Committee was provided by the HECC.

The Roles of the Experts

The members of the Advisory Committee were responsible for the evaluation of staff documents (research design, data analysis, etc.), review of the process as it was developed, the collaborative development of planning guidelines for proposal to the HECC, and recommendations of next steps.

During the committee's deliberations, additional issues emerged that were beyond the scope of the present study but the consideration of which were essential for long range planning. Therefore, two task forces were appointed from the membership of the Advisory Committee to prepare recommendations for consideration by the full committee.

The Task Force on Criteria for the Ratio of Nursing Education Programs was charged with determining how such a ratio might be established--that is, what data would be needed and what criteria would be the best basis for arriving at an appropriate ratio for Baccalaureate, Diploma, Associate and Practical Nurse program entry positions.

The Task Force on Recommendations for Future Action in Nursing Education was charged with identifying and preparing recommendations about nursing education to be included in the proposed guidelines. These recommendations were to include specific recommendations for 1973 and for the planning process, but were also to include other issues such as career mobility, clinical facilities, curriculum planning, etc.

Consultants provided special technical assistance as needed, and functioned as liaison between the Advisory Committee and their respective agencies, reporting developments to their boards as the project proceeded, and bringing board reactions back to the Advisory Committee.

The HECC staff was responsible for developing the research design, collecting and analyzing data, acting as staff to the committee in clerical, professional and liaison functions, and producing the final report.

The Advisory Committee met regularly during the course of the project. All materials were disseminated in advance of each meeting for study and review by the committee members. The task forces met independently, and their reports were discussed by the committee and incorporated into its recommendations.

RESEARCH DESIGN

Research was directed at providing the necessary information for planning for nursing education up to 1980.

The three basic sets of information needed for planning were seen to be the student pool, the capacity of nursing programs, and the demand for nurses. Comparison of these would reveal correlations, inconsistencies or needs, the identification of which would show the directions that planners should follow to arrive at good policy proposals.

Program capacities were, for purposes of this study, assumed to be equivalent to the 1972 enrollments. The main challenge to the research staff was to develop a reliable method for predicting the future demand for nurses and the number of students that would be entering nursing education programs.

Design capacity could then be evaluated in relation to this information.

Definition of Terms

Student Pool has been used in this study to represent the numbers of students admitted to nursing programs. It is understood that not all who enter will complete their training.

Program entry positions refer to the capacity to accommodate beginning students.

Design Capacity refers to the maximum number of students who could be graduated from a program per year utilizing existing resources and without sacrificing program quality.

Enrollment refers to the actual number enrolled in a given year.

Supply refers to available licensed nursepower, including those in the active labor force, new graduates, and others who are not working but who are licensed and willing to work. "Supply" and "demand" have been used in conventional economic terms in this analysis of the nursing market.

Stock refers to all licensed nursepower in the state, including those who do not wish to work at a given time but might be available to join the labor force in the future.

Demand refers to the economic factors that determine how many personnel a hospital, or any other firm, can afford to employ, which in turn, is determined by how much money is available to buy health care in that community. Discussions of manpower requirements frequently fall into two categories: demand and need.

Need refers to the personnel required to deliver a quality of health care that meets the criteria, standards or values specified by health professionals.*

Scope of the Study

In this study the staff examined the economically determined supply of nurses and the economically determined demand for nurses in Minnesota between 1972 and 1980. In the absence of agreed upon standards for defining "quality" or "need" for nursing care, and in the absence of tested behavioral measures of nursing care, it seemed inappropriate to pursue a line of inquiry involving quality or need. Rather, the analysis was directed at estimating the economically determined quantitative demand for nurses and supply of nurses in Minnesota as a first step, leaving the more provocative and important questions about the quality of nursing service for a later study.

*Division of Nursing, Department of Health, Education and Welfare, Planning for Nursing Needs and Resources, (Washington: U. S. Government Printing Office, April 1972), p. 73.

In order to estimate the demand for nursing personnel in Minnesota, it is necessary to anticipate the demand for the kind of health care that involves the service of nurses. The demand for health care generally is determined by a variety of interrelated socio-economic variables such as income, health insurance, age distribution of the population and a variety of other factors. As the demand for health care fluctuates, so does the demand for nurses and other health care professionals.

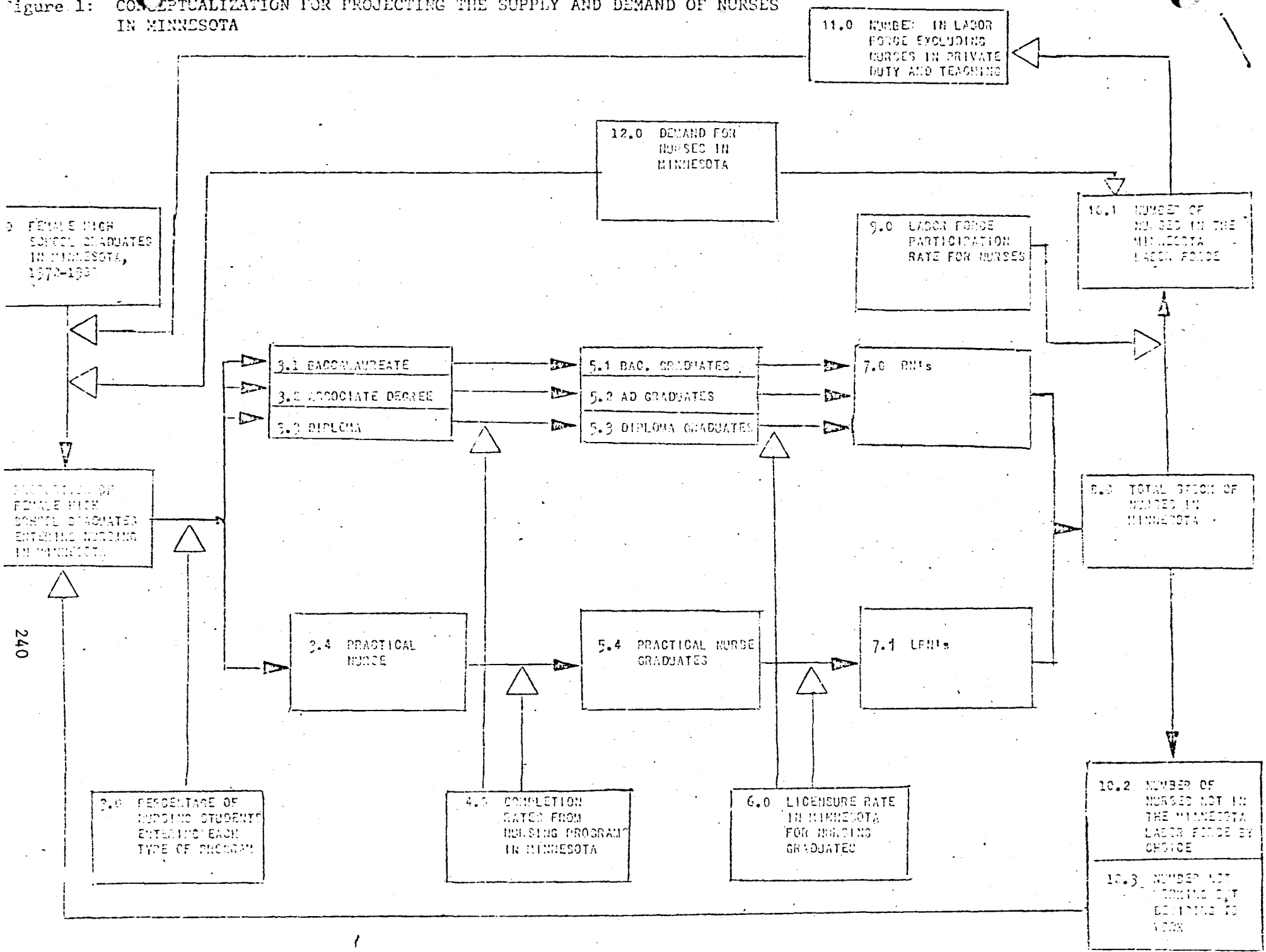
The supply of nurses is determined by the number of trained nurses in Minnesota who are willing to work. That number presumably varies over time, reflecting new graduates, retirement, and migration into and out of the state. By comparing the projected demand for nurses in Minnesota in future years with the projected supply of nurses for those years, it is possible first to estimate whether the supply of nurses will meet the demand, and second, to determine the number of nurses that the state should be educating each year to keep the supply and demand forces in balance. This comparison can then be evaluated in terms of the state's design capacity to educate the appropriate number of nurses each year.

The Interaction of Supply and Demand

Figure 1 shows the logical steps employed to arrive at supply and demand estimates. The proportion of high school graduates entering nursing is seen to be a function of how the demand for nurses relates to the supply of nurses. The black arrows on the diagram carry the entering student through various stages of training and licensure into the stock of nurses in the state. White arrows show the various influences that affect the numbers passing from one stage to the next.

The main thrust of the research design was to find ways to estimate numbers of persons that would be involved at each of these stages in a given year. The considerations involved in each are described in the detailed discussion below, and statistical methods and equations are given in Appendix B. To test the reliability of this method of making projections, the process was applied to data from past years, and the resulting predictions were compared with the actual data for those years. There were no statistically significant differences, year by year, between the predictions calculated for the years between 1950 and 1972 and the historical record. The staff felt it could, therefore, safely use the method to make estimates for future years.

Figure 1: CONCEPTUALIZATION FOR PROJECTING THE SUPPLY AND DEMAND OF NURSES IN MINNESOTA



The research covered three main categories of information: student pool, nursepower and nursing education programs. The following discussion of how estimates were made is keyed to Figure 1 by the number of each block in the diagram.

A. Student Pool and Program Outputs

Techniques were developed to estimate numbers passing through each stage from entry into nursing programs through graduation and licensure. These are described below.

Future studies may develop tested behavioral theories for predicting demand for program entry. This study, as discussed in detail in Appendix B, employed a sanctioned model of economic behavior to make such predictions.

1: Projected Female High School Graduates

The selection of female high school graduates as the starting point for estimating future nursing personnel should not be taken as a statement of values about the future composition by sex of the nursing profession. The Advisory Committee was emphatic in its support for all efforts to recruit males as well as minorities into the nursing profession. For analytical purposes, however, it was necessary to use female high school graduates as the predicted variable, since the data base available to the research staff was in fact almost completely confined to females and would not be valid for predicting male choices.

The first step in estimating the number of female graduates for each year through 1980 was made by advancing the present number of all students in each grade through each successive grade level to graduation.

The number of females was then estimated as a percentage of the total, based on a linear extension of the percentage of females in each high school graduating class in Minnesota during the last decade.*

*The State Department of Education makes available annual grade level enrollments for public and private elementary and secondary education. Advancement rates between grade levels (the percentage of students in each grade that advance to the succeeding grade each year) were calculated from grade level enrollment data for the years 1966-1971. The average of five years for each grade was used to make the projections of future high school graduates in Minnesota.

2. Percentage of Female High School Graduates Expected to Enter Nursing

Determination of this percentage was based on a consideration of two key socio-economic factors contributing to student choice. Many factors were recognized to be involved, but the two selected for measurement did in fact prove to be valid indicators of the likelihood of a high school graduate's choice of nursing as a career. The first of these was the demand for nurses, and the second was the difference between entry level teachers' wages and entry level nurses' wages during the period just prior to the high school graduate's career choice. (The differential between nurses' and teachers' wages was chosen because teaching was one of the other major career choices female high school graduates were likely to consider at the time the study was made. It was recognized that changing conditions in the job market for teachers might necessitate the selection of a different proxy for making predictions for the next decade.)

To predict percentages of graduates entering nursing in future years, two sets of calculations were made based on two different periods in the past 20 years during which nurses' wages increased at different rates. These yielded "high" and "low" estimates for the future. Other predictions made in the study were based on these two estimates, providing a range of expectation rather than a single average figure. (Details of the process by which these predictions were made, together with a discussion of the limitations of the method, are given in Appendix E on page 59.)

3. Projected Number Entering Each Type of Nursing Education Program through 1980

These projections were made by extending the trend of entry rates during previous years. There are four types of nursing programs. Registered Nurses (RNs) are graduates of either a four-year Baccalaureate program, a three-year Diploma program, or a two-year Associate Degree program. Licensed Practical Nurses (LPNs) are graduates of a one-year Practical Nurse program.

(Detailed discussion of these projections will be found in Appendix B, page 62)

4. Projected Completion Rate for Each Program

Completion rates were derived from past history. The completion rate was calculated for each type of nursing degree based on enrollment data maintained by the Minnesota Board of Nursing. An average completion rate was used for the Baccalaureate, Diploma and Practical Nurse programs, based on the average of the most recent five years. The first Associate Degree programs opened in 1964, and their graduation rates at an aggregate level have been distorted by the addition of several new programs in recent years. Therefore, the Associate Degree rate for 1971 graduating classes was used.

5. Projected Number of Graduates From Each Type of Program through 1980

These numbers were arrived at by applying the completion rates to the numbers of students expected to enroll each year.

B. Nursepower: Supply and Demand

Graduates of nursing programs once they are licensed, become part of the total stock of nurses in the state. The number of nurses in the labor force (fewer than the total stock), depends on the desire of nurses to work and on the demand for their services. Methods for predicting supply are based on adding the number licensed to the existing stock, and modifying the stock by such factors as retirement and migration. Methods for predicting demand draw on demographic characteristics of the state's population that serve as proxies for health status information.

6. Licensure Rates for Each Type of Degree

Following graduation, each nurse must successfully pass a licensure examination conducted by the Minnesota Board of Nursing. The rate of successful licensure is defined as the percentage of each new graduating class that passes the examination within one year of graduation. The rates were calculated from records of the Minnesota Board of Nursing.

7. Projected Number of Nurses Licensed for Each Type of Degree

These were obtained by applying the estimated licensure rates to the number of graduates projected for each type of degree program in each year up to 1980.

8. Projected Total Stock of Nurses *

The stock of nurses for a given year is defined as the total number of licensed nurses in Minnesota. This is estimated by adding up the nurses graduating from nursing programs in Minnesota and receiving licensure, plus the number of previous nursing graduates in Minnesota that were licensed, plus the number of nurses that have moved to Minnesota and obtained licensure here, minus the number of nurses that have either retired, died, or moved to another state or country. There is no precise way to make a count of the stock of nurses in the state, since nurses are free to immigrate or emigrate without transferring their licenses and are not compelled to maintain their licenses when they are not practicing, and since many nurses work beyond the traditional retirement age of 65.

Despite these limitations, estimates were made using available records from the Minnesota Board of Nursing. The number of nursing graduates each year was determined beginning in 1925 for Registered Nurses and in 1948 for Licensed Practical Nurses. To these figures the number of nurses that were endorsed to Minnesota each year was added, and the number of nurses that were endorsed to other states was subtracted. By calculating the aging through time of each graduating group until retirement, and subtracting appropriate numbers reaching age 65, an estimate of the stock of nurses was made. This procedure was followed for both Registered Nurses and Licensed Practical Nurses.

*Patrick D. Meagher and William C. Weiler, Supply and Demand for Nurses in Minnesota, (Office of Budget Planning and Information Services, University of Minnesota), pp. 3-13.

9. Labor Force Participation Rate for Nurses

This is defined as the percentage of the total stock that are active members of the labor force. Other researchers have established participation rates for different age groups of Registered Nurses*. The participation rate of Licensed Practical Nurses was assumed to be close enough to that of Registered Nurses to justify the use of Registered Nurse rates in making estimates for all nurses in the labor force.

10.1 Number of Nurses in Minnesota Labor Force

The number in the labor force in a given year was calculated by simply multiplying the stock of nurses in each age group by the participation rate for that age group. Numbers in age groups were derived by analyzing the information used to determine the total stock of nurses.**

The nurse labor force for each health planning region was estimated for the years 1972-1980 on the basis of employment figures for each region in 1966 and 1970, as reported in Nursepower in Minnesota, 1970,*** published by the Northlands regional Medical Program. (That study was based on records from the Minnesota Board of Nursing.) The future distribution of nurses by planning region was projected by finding the average value of the percentage of all active nurses in Minnesota in those two years that were employed in each planning area, and by applying that percentage to the statewide projections for the years of 1972-1980.

*Stuart Altman, The Present and Future Supply of Registered Nurses, (Washington: U. S. Government Printing Office, June 1971), p. 102.

**Minnesota Board of Nursing.

***Joyce M. Schowalter and Lynda F. Cole, Nursepower in Minnesota, (St. Paul: Northlands Regional Medical Program, 1970).

10.2 Projected Number of Nurses not in Labor Force

This number could be calculated simply by finding the difference between the total stock of nurses and the number working either full or part time. This number would include those who choose not to work, and those who would like to work but have not found employment. The computations were not made because the results were not seen to be needed for this study.

11. Adjusted Number in Labor Force

The estimated demand for nurses, (see item 12) based on population, age and income variables, was not to include demand for nurses who would be employed in education or private duty. The number of nurses in the labor force, however, was computed on the basis of information that included all licensed nurses in the state. This number, therefore, had to be reduced by a factor that reflects the percentage of the total number in the labor force in education or private duty. (See Appendix B, page 54 for details on how this adjustment is made.)

12. Projected Demand for Nurses in Minnesota in 1973-1980

Estimates of demand were based on the relation between the number of active nurses in the labor force and three socio-economic variables selected for their effect on health care demand.*

Health care can be divided into two categories: 1) non-discretionary health care, in life-or-death situations that cannot be ignored, and 2) discretionary health care, for conditions that may not require immediate treatment.

The demand for non-discretionary medical care is assumed to be independent of economic constraints. Non-discretionary care would be sought regardless of income or health insurance coverage. The number of Minnesotans up to age 4 and the number over 65 were selected as the variables representing non-discretionary health care demand.

*Meagher and Weller, pp. 13-20.

Discretionary health care demand, on the other hand, is viewed as being tied to average per capita income: the greater per capita income, the greater demand for discretionary health care.

Details as to how these variables were used to predict demand for nurses are given in Appendix B, page 63. The method was tested by application to data from past years, and the predicted annual demand was found to correspond closely with actual demand for those years. Predictions of population* and income*** were drawn from published sources.

Nursing services to fill the demand for health care are provided by both Registered Nurses and Licensed Practical Nurses. There is a great deal of variety in how necessary nursing tasks are distributed between the two groups, and therefore a single combined figure is used to describe demand for nurses.

Nurses employed in private duty and in education are not included in this model.

C. Nursing Education Programs

The location and 1972 enrollment of all nursing programs in the state were available from the Minnesota Department of Education, Vocational-Technical Education Division, and from the Minnesota Board of Nursing. Since a majority of the programs had waiting lists, the 1972 enrollment was taken to be equivalent to the design capacity for entering students, for the purposes of this study.

Projected enrollments in each type of program through 1980 were based on the trends evidenced in years prior to 1972 (see Appendix B, p. 62).

Projected enrollments in nursing education from each region were based on prorating the statewide number of enrollments for a given year, according to the region's percentage of the total projected number of high school graduates in the state.*** The

*Minnesota Department of Health, Minnesota Population, (Minneapolis, 1970).

**Minnesota Department of Manpower Services.

***Minnesota Higher Education Coordinating Commission, Projecting Institutional Enrollments, 1973-1989, (St. Paul, 1973).

procedure assumed that the demand for admission to nursing programs would be distributed among all planning regions in the same proportion as the population distribution. It took into account neither the effect that the location of a program might have on the point of origin of its applicants nor the effect of local employment opportunities. The prorating approach was admittedly limited, but it was adequate to provide a general feeling for the number of high school graduates in each health planning region that might enter nursing programs. It could be assumed to give a more accurate sense of the numbers that would be enrolling if programs were available close by.

III RESEARCH FINDINGS

The selected findings given here are keyed to the diagram in Figure 1, p. 12 and are presented in the same order as they are discussed in Chapter II, "Methodology." A summary of the way these findings interrelate, together with their implications, appears at the end of this chapter.

The selection of findings reported in this chapter was based on their importance in drawing conclusions and making recommendations. More detailed findings are given in Appendix C.

The numbers reported as estimates or projections in the findings are precise results of mathematical calculations. It should be kept in mind, however, that these precise numbers represent "central tendencies" rather than absolute values. In other words, each number should be viewed as representing the midpoint of a range of expectation.

A. Student Pool and Program Outputs

Using an economic model to predict numbers entering nursing education, and then applying historical rates of progression, program output projections were arrived at as shown below:

I. Projected Female High School Graduates

Female high school graduates were projected at about 37,000 in 1973, were expected to rise to a peak of about 40,000 in 1978, and then to drop to about 39,000 in 1980. (See Table C-1 in Appendix C, p. 65.)

2. Percentage of Female High School Graduates Expected to Enter Nursing

The percentages entering nursing between 1953 and 1972 ranged between 8.12% and 11.74% of all female high school graduates. (See Table B-1 in the Appendix.) Percentages projected for 1972-1980 ranged between 7.76% and 9.10%. (See Table C-2 in the Appendix.) The numbers were projected at a high of about 3,400 in 1972, and were expected to reach a peak in 1977 with a high estimate of about 3,600 and then to drop to about 3,500 in 1980.

3.0 Percentage of Nursing Students Entering Each Type of Program

Percentages of all nursing students entering each type of nursing program are shown in Figure 2. Actual percentages for 1952-1972 are given, and the trends are projected to 1980. (Also see Table C-3 in the Appendix.)

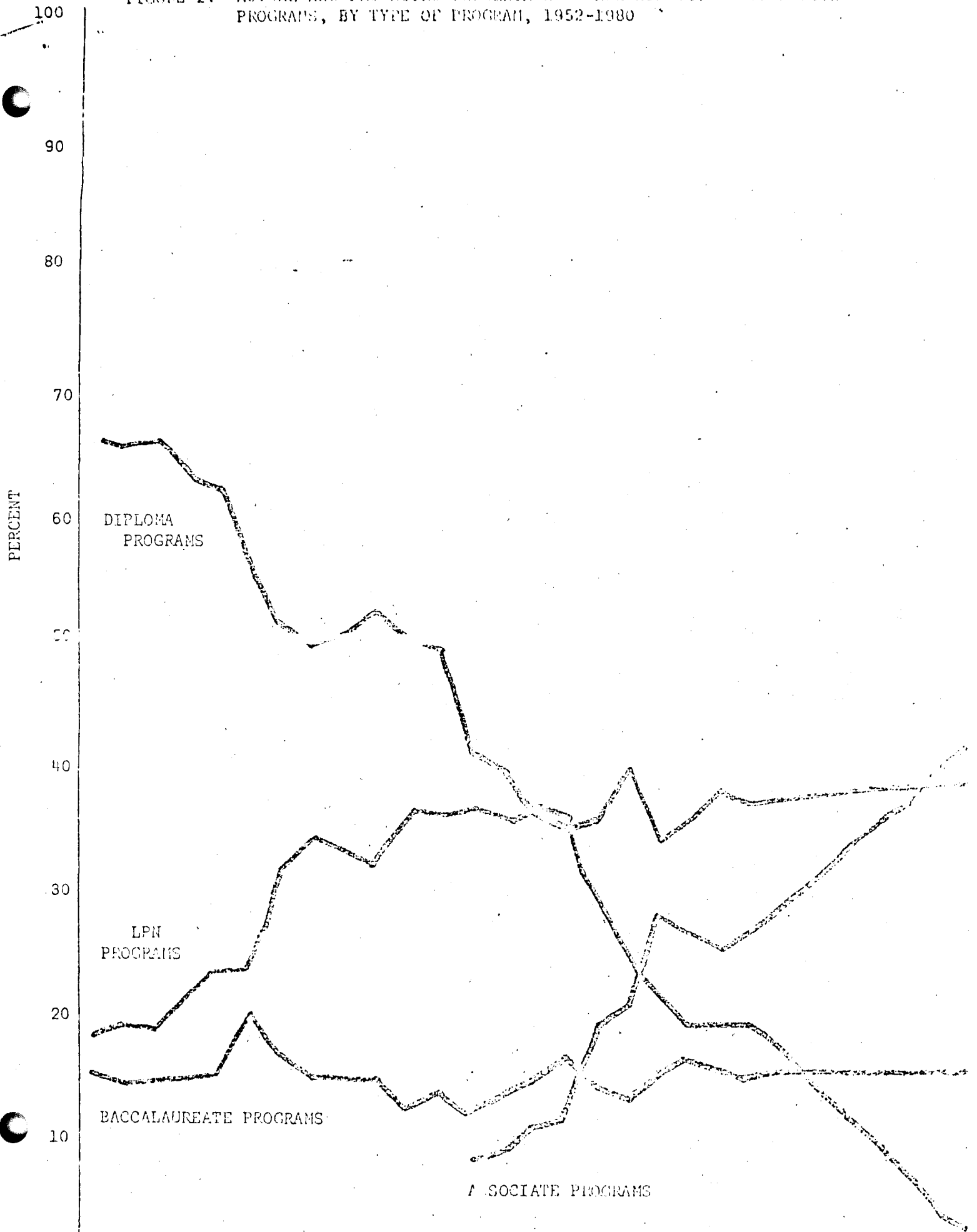
The first Associate programs were offered in 1964, and enrollment has been climbing ever since as new programs open or expand. Diploma program enrollments have been dropping at approximately the same rate as those programs are phased out. (The Division of Nursing of the Department of Health, Education and Welfare predicted that all Diploma programs will be phased out by the end of the decade.*)

In 1972 about 37% of all nursing students entered Practical Nurse programs, and about 63% entered Registered Nurse programs. Of the Registered Nurse programs Associate Degree programs enrolled about 28% of all nursing students, Diploma programs accounted for about 20%, and Baccalaureate programs enrolled the lowest percentage (about 16%). This distribution was expected to change by 1980 with Associate Degree programs passing up the Practical Nurse programs to attract about 42% of all admissions. Baccalaureate and Practical Nurse programs were expected to show very slight increases, if there were to be no change from the present trend.

It should be emphasized strongly that the estimates of future rates of entrance into each type of degree program were based solely on historical trends, in the absence of any tested behavioral theory. A number of other ways of estimating percentages of students that will enter different types of nursing programs should ideally be tested.

*Altman, op. cit., p. 86..

FIGURE 2: ACTUAL AND PROJECTED PERCENTAGE OF ALL ADMISSIONS TO NURSING PROGRAMS, BY TYPE OF PROGRAM, 1952-1980



3.1-4 Projected Number Entering Each Type of Nursing Education Program

When the projected percentages for each type of program were applied to the estimated number of female high school graduates entering nursing education, the estimated headcount enrollment for each type of program was derived for 1972-1980. The headcount enrollment estimates are given in Table 1.

It is expected that enrollments in Practical Nurse programs will climb from about 1,200 or 1,300 in 1972 to an estimated peak of about 1,250 or 1,400 in 1977, and will drop again slightly by 1980.

Enrollments in Associate Degree programs are expected to climb steadily from about 800 or 900 in 1972 to between 1,300 and 1,500 in 1980.

By projecting the steady rate of decline of Diploma programs, those enrollments were expected to drop from 1972's estimated 600 or 700 to about 100 in 1980.

Enrollments in Baccalaureate nursing programs were projected at about 500 in 1972. The projected peak was for less than 600 in 1977, and a slight drop was then projected to occur by 1980.

Figures 3 and 4 show in graphic form the headcount enrollment for each type of program from 1952 through 1971 and estimates for 1972 to 1980.

Table 1: PROJECTED NUMBER OF STUDENTS ENTERING NURSING PROGRAMS, BY TYPE OF PROGRAM, 1972-1980.

YEAR	PRACTICAL		ASSOCIATE		DIPLOMA		BACCALAUREATE		CUMULATIVE	
	LOW	HIGH	LOW	HIGH	LOW	HIGH	LOW	HIGH	LOW	HIGH
1972	1210	1293	822	878	622	665	504	538	3158	3374
1973	1197	1278	875	935	626	669	497	531	3195	3413
1974	1205	1300	943	1017	552	595	500	539	3200	3451
1975	1235	1346	1029	1122	511	558	511	558	3261	3555
1976	1220	1344	1077	1187	402	443	504	556	3203	3530
1977	1252	1394	1168	1301	333	371	517	576	3270	3642
1978	1220	1390	1198	1364	248	283	503	573	3169	3610
1979	1202	1381	1238	1423	170	196	494	568	3104	3568
1980	1183	1376	1276	1483	95	111	486	565	3040	3535

4. Completion Rates for Each Type of Program

The number of graduates of a program is usually less than the number of enrollees. The completion rates in Table 2 were derived from averages of past history. Practical Nurse programs had the highest completion rate (95%). Baccalaureate programs were next highest (89%), and then Associate Degree programs (85%). Diploma programs had the lowest completion rate (72%).*

Table 2: COMPLETION RATES BY TYPE OF NURSING PROGRAM

TYPE OF PROGRAM	AVERAGE COMPLETION RATE
Practical Nurse	.9504
Associate Degree	.8507
Diploma	.7208
Baccalaureate Degree	.8932

5. Projected Number of Graduates from Each Type of Program

Table 3 shows the high and low estimates of the number of graduates from each type of program up to 1980. Where only one figure is given instead of a high and a low, that figure was based on projected completion by presently enrolled students.

The total number of graduates from all types of programs was not expected to change very much from year to year. About 3,000 graduates were predicted for 1972 and between 2,800 and 3,100 for

*The completion rates for each type of nursing program were calculated from enrollment data maintained by the Minnesota Board of Nursing.

FIGURE 3: ACTUAL AND PROJECTED NUMBER OF ENROLLMENTS IN REGISTERED NURSE PROGRAMS, BY TYPE OF PROGRAM, 1950-1980

2,000

1,900

1,800

1,700

1,600

1,500

1,400

1,300

1,200

1,100

1,000

900

800

700

600

500

400

300

200

100

DIPLOMA PROGRAMS

BACCALAUREATE PROGRAMS

ASSOCIATE DEGREE PROGRAMS

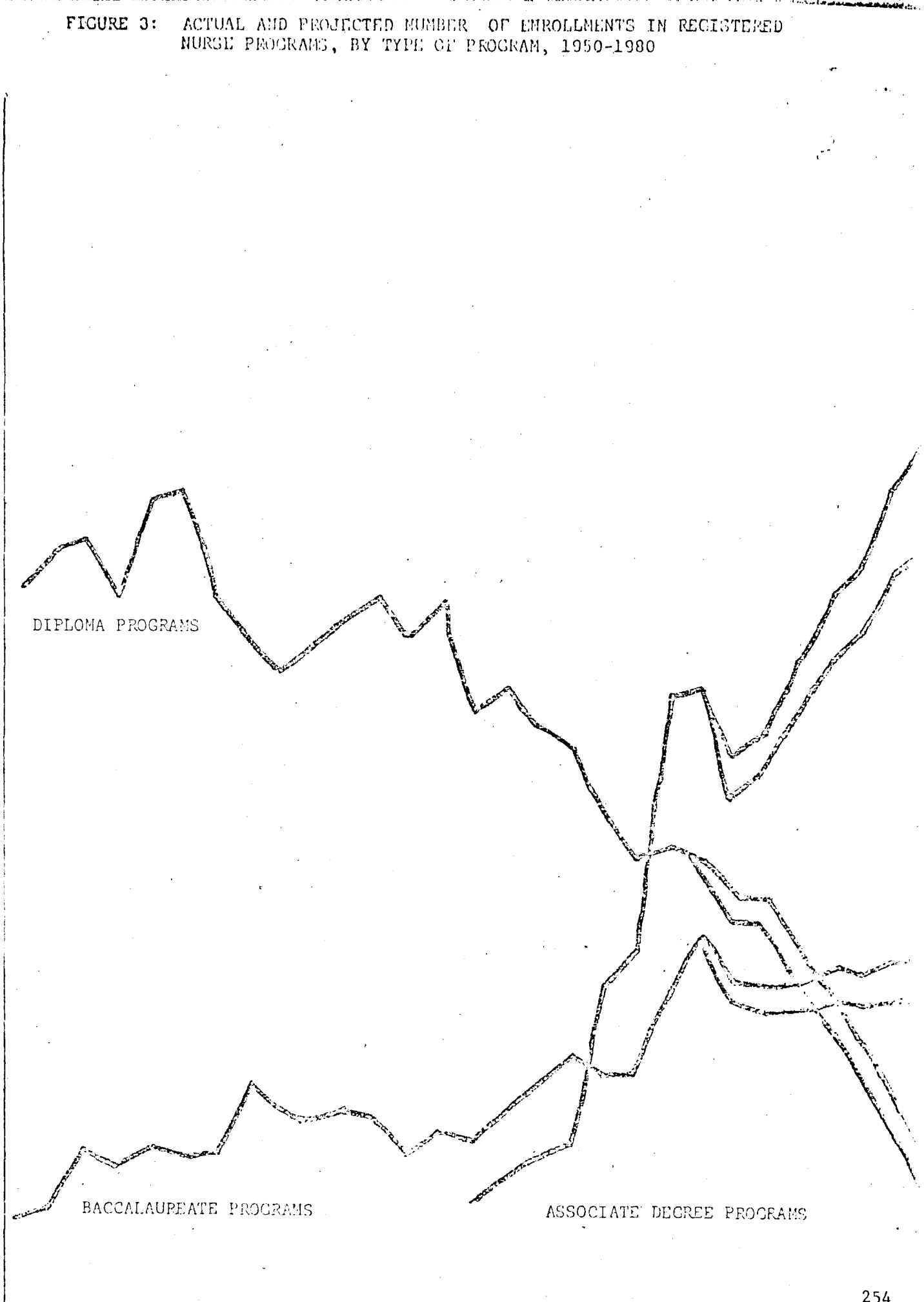
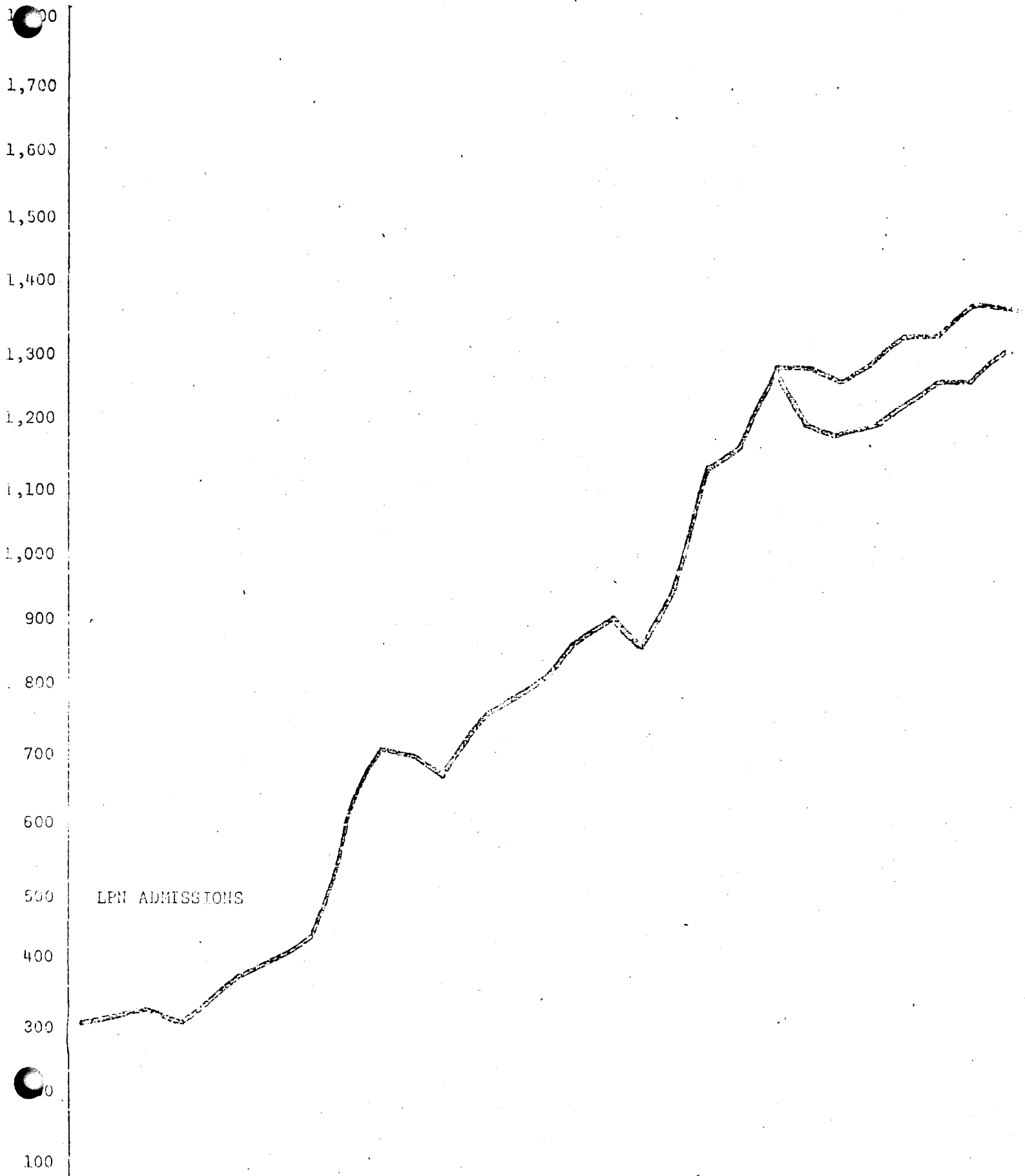


FIGURE 4: ACTUAL AND PROJECTED NUMBER OF STUDENT ENROLLMENTS IN LICENSED PRACTICAL NURSE PROGRAMS, 1950-1980



1980. This total figure, however, included a substantial drop for some program types and an increase for others.

Graduates from Associate Degree programs were expected to increase from 760 in 1972 to between about 900 or 1,100 in 1980. The estimates for Diploma programs were 528 for 1972, with a drop to about 250 in 1980. The estimates for the Baccalaureate program held fairly steady at about 500. The number of graduates from Practical Nurse programs was also expected to hold fairly steady with an estimate of about 1,200 in 1972 and between 1,100 and 1,300 in 1980.

Table 3: PROJECTED NUMBER OF NURSING GRADUATES BY TYPE OF PROGRAM, 1972-1980

YEAR	PRACTICAL		ASSOCIATE		DIPLOMA		BACCALAUREATE		TOTAL	
	LOW	HIGH	LOW	HIGH	LOW	HIGH	LOW	HIGH	LOW	HIGH
1972	1234		760		528		476		2998	
1973	1149	1228	766		542		552		3009	3088
1974	1137	1214	700	682	513		450	480	2738	2889
1975	1145	1235	679	726	448	479	443	474	2715	2914
1976	1173	1279	732	790	451	482	446	481	2802	3032
1977	1159	1277	799	871	397	428	456	498	2811	3074
1978	1189	1324	836	922	350	381	450	496	2825	3123
1979	1159	1321	907	1010	289	319	461	514	2816	3164
1980	1142	1312	930	1059	240	267	449	511	2761	3149

B. Nursepower: Supply and Demand

The projections of future supply of nurses as given here were made utilizing data on existing stock of nurses and newly licensed nurses. Projections of demand were based on projected characteristics of the state's population.

6. Licensure Rates for Each Type of Degree

Almost but not quite all nursing program graduates become licensed or registered following graduation. Licensure rates have ranged from 94% to 99%, as show in Table 4. It is expected that these rates will remain valid for the rest of this decade.

Table 4: PROJECTED LICENSURE RATES BY TYPE OF DEGREE

TYPE OF PROGRAM	PROJECTED RATE
Practical Nurse	.9855
Associate Degree	.9366
Diploma	.9797
Baccalaureate Degree	.9844

7. Projected Number of Graduates Licensed for Each Type of Degree

The number of graduates expected to pass the licensure examinations each year are given in Table 5. The same pattern of distribution among programs is reflected here as in the estimated number of graduates above. The projections show that about 3,000 will be licensed in 1972 and between 2,750 and 3,100 in 1980.

Table 5: PROJECTED NUMBER OF GRADUATES LICENSED, BY TYPE OF DEGREE, 1972-1980

YEAR	PRACTICAL		ASSOCIATE		DIPLOMA		BACCALAUREATE		TOTAL	
	LOW	HIGH	LOW	HIGH	LOW	HIGH	LOW	HIGH	LOW	HIGH
1972	1215		710		516		467		2908	
1973	1126	1203	716		529		542		2913	
1974	1119	1195	653	698	501		442	472	2715	2866
1975	1127	1216	636	743	437	468	435	466	2695	2893
1976	1155	1259	750	809	440	471	438	473	2783	3012
1977	1141	1257	818	982	388	418	448	489	2795	3056
1978	1171	1304	861	949	342	372	441	487	2815	3112
1979	1141	1301	934	1040	282	311	452	505	2809	3157
1980	1124	1232	958	1091	234	261	440	502	2756	3146

8. Projected Total Stock of Nurses

It was estimated that there were about 40,000 Registered Nurses in the state in 1962, and about 53,000-54,000 were predicted for 1980. There were an estimated 7,000 Licensed Practical Nurses in 1962, and 26,000-27,000 were predicted for 1980. The total stock of nurses in the state in 1980 was expected to be almost double that of 1962 -- about 80,000, as compared with about 46,000. (See Table 6 and Figure 5.) The rise in total stock, despite the leveling off of new licensures, was attributed to the rapid increase in numbers of students that were being graduated annually from nursing programs between 1950 and 1972. All these nurses would still be of working age in 1980, and thus part of the total stock.

Table 6: ESTIMATED STOCK OF NURSES IN MINNESOTA, BY TYPE, 1962-1980

YEAR	RN STOCK		LPN STOCK		TOTAL STOCK	
	LOW	HIGH	LOW	HIGH	LOW	HIGH
1962	38,716		7,073		45,789	
1963	39,504		8,323		47,827	
1964	40,252		9,055		49,307	
1965	40,966		10,103		51,069	
1966	42,037		10,630		52,667	
1967	42,907		11,431		54,338	
1968	43,442		12,465		55,907	
1969	44,645		13,613		58,258	
1970	45,704		14,640		60,344	
1971	46,648		15,639		62,287	
1972	47,002		16,866		63,868	
1973	48,058		18,018	18,095	66,076	66,153
1974	48,874	48,946	19,172	19,325	68,046	68,271
1975	49,651	49,829	20,313	20,555	69,964	70,384
1976	50,520	50,818	21,468	21,814	71,983	72,632
1977	51,283	51,719	22,639	23,101	73,922	74,820
1978	52,027	52,620	23,846	24,441	75,873	77,061
1979	52,789	53,560	25,013	25,768	77,802	79,328
1980	53,442	54,428	26,152	27,075	79,594	81,503

100,000

IN MINNESOTA, WITH HIGH AND LOW ESTIMATES, 1962-1980

90,000

80,000

70,000

60,000

50,000

40,000

30,000

20,000

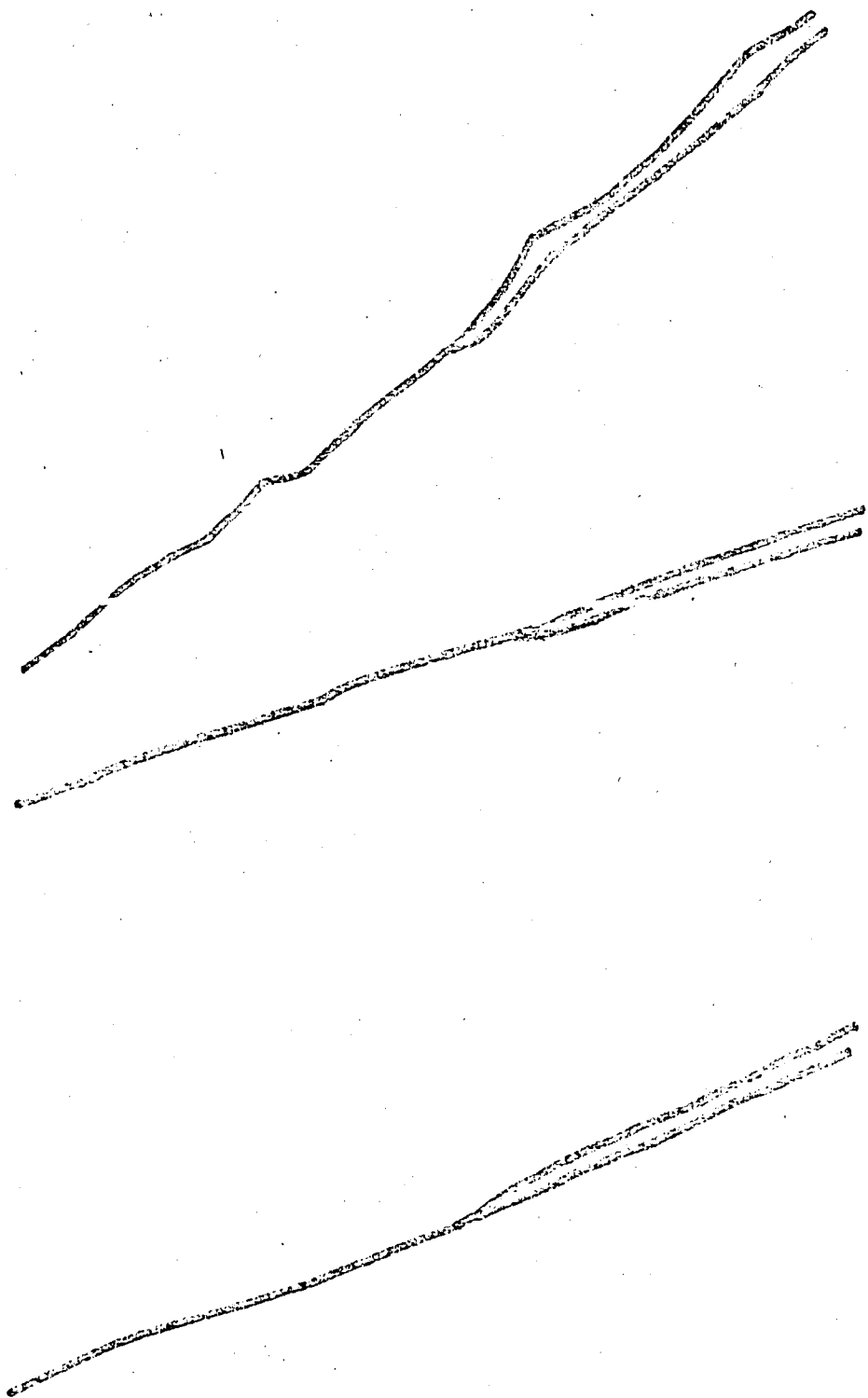
10,000

5,000

TOTAL STOCK
OF NURSES

REGISTERED NURSES
IN MINNESOTA

LICENSED PRACTICAL
NURSES IN MINNESOTA



9. Labor Force Participation Rate for Nurses

The highest percentage of Registered Nurses working either full or part-time was found among recent graduates (72%). There was a drop in the labor force participation rate to 49% for nurses aged 25-34, and then a rise to a 55-57% level for ages 35-64. Among nurses 65 years of age and over, 37% continued to work.

Table 7 shows Registered Nurse participation rate. No labor force participation rate for Licensed Practical Nurses has been established. For purposes of this study it was assumed to be similar to that of Registered Nurses.

Table 7: LABOR FORCE PARTICIPATION RATES FOR REGISTERED NURSES

AGE GROUP	RATE
20-24	.724
25-34	.489
35-44	.545
45-64	.566
65 and over	.365
All ages combined	.553

10. Projected Number of Nurses in the Minnesota Labor Force, 1962-1980

As shown in Table 8, there were about 22,000 Registered Nurses working in 1962 and about 30,000 or 31,000 were expected to be in the labor force in 1980. Licensed Practical Nurse employment was expected to rise from about 4,000 in 1962 to about 15,000 in 1980. These projections were arrived at by applying the Labor Force Participation Rate to the estimated total stock of nurses. They exceed the demands projected in Table 7 because they include nurses in education and private duty.

Table 8: PROJECTED NUMBER OF NURSES IN THE MINNESOTA LABOR FORCE, 1962-1980

YEAR	RN		LPN		TOTAL	
	LOW	HIGH	LOW	HIGH	LOW	HIGH
1962	21,689		4,144		25,833	
1963	22,157		4,916		27,073	
1964	22,577		5,350		27,927	
1965	22,959		5,900		28,859	
1966	23,633		6,196		29,829	
1967	24,193		6,625		30,818	
1968	24,514		7,219		31,733	
1969	25,219		7,881		33,100	
1970	25,903		8,461		34,364	
1971	26,437		9,029		35,466	
1972	26,676		9,737		36,413	
1973	27,539		10,377	10,433	37,716	37,772
1974	27,807	27,858	11,013	11,124	38,820	38,982
1975	28,184	28,313	11,649	11,825	39,833	40,138
1976	28,633	28,849	12,289	12,539	40,922	41,388
1977	29,003	29,318	12,892	13,227	41,895	42,545
1978	29,334	29,764	13,540	13,954	42,874	43,718
1979	29,742	30,283	14,167	14,677	43,909	44,960
1980	30,082	30,754	14,766	15,378	44,848	46,132

11. Adjusted Number in the Labor Force

Since nurse demand estimates did not include nurses engaged in teaching or private duty, labor force participation figures were adjusted to be compatible with demand figures. Results are given in Table 9. There are no high figures for the years for which actual student enrollments were available, since it was not necessary to make estimates using two sets of computations for those years. Adjustments were also made for the estimated number of licensed nurses emigrating from Minnesota.

The combined number of Registered Nurses and Licensed Practical Nurses in the labor force was projected to increase by between 23% and 27% by 1980, rising from about 31,000 in 1972 to 39,000 or 40,000 in 1980. Registered Nurses were expected to increase by about 13% or 15% during that period, and Licensed Practical Nurses were expected to increase by about 52% or 58%, depending

on whether the low estimates or the high estimates would prevail. (Table C-2 in the Appendix shows percentage increases for each year.)

Table 9: PROJECTED NUMBER AND PERCENT INCREASE OF NURSES IN THE MINNESOTA LABOR FORCE, ADJUSTED TO EXCLUDE TEACHING AND PRIVATE DUTY NURSES, 1972-1980

YEAR	RNs		LPNs		TOTAL	
	LOW	HIGH	LOW	HIGH	LOW	HIGH
1972	22,680		8,638		31,318	
1973	23,244		9,206	9,255	32,450	32,499
1974	23,642	23,685	9,769	9,868	33,411	33,553
1975	23,963	24,072	10,334	10,490	34,297	34,562
1976	24,344	24,528	10,902	11,123	35,246	35,651
1977	24,569	24,926	11,437	11,734	36,006	36,660
1978	24,940	25,306	12,011	12,379	36,951	37,685
1979	25,287	25,747	12,568	13,020	37,855	38,767
1980	25,576	26,147	13,099	13,642	38,675	39,789
Percent increase:						
1972 -						
1980	12.8%	15.3%	51.6%	57.9%	23.5%	27.0%

Regional* projections of numbers of nurses in the labor force were made for future years by simply calculating each planning area's percentage of the statewide estimates for those years, as shown on Table 9, according to each area's share of the state's population. Projections are given in Table 10. These projections, it should be noted, would have to be modified if regional changes in population distribution or health service delivery patterns were to occur.

*Boundaries of the regions can be seen on the map on p. 38.

Table 10: PROJECTED NUMBER OF NURSES IN LABOR FORCE, BY PLANNING AREA, 1972-1980

YEAR	A NORTHWEST		B NORTHEAST		C WEST CENTRAL		D CENTRAL		E SOUTHWEST		F SOUTHEAST		G METRO	
	RN	LPN	RN	LPN	RN	LPN	RN	LPN	RN	LPN	RN	LPN	RN	LPN
1972	564	365	1796	878	823	389	1483	558	1288	775	3952	1791	12762	3920
1973	579	392	1841	941	844	416	1520	598	1320	830	4061	1919	13079	4157
1974	590	418	1876	1004	860	444	1549	637	1345	885	4138	2046	13327	4433
1975	599	445	1907	1067	874	472	1574	678	1367	841	4205	2174	13545	4712
1976	611	472	1943	1131	890	501	1604	719	1393	998	4285	2306	13801	4996
1977	621	498	1974	1193	905	528	1630	758	1416	1053	4355	2432	14026	5271
1978	630	525	2004	1259	919	557	1655	800	1437	1110	4421	2566	14239	5561
1979	641	552	2039	1324	935	586	1684	841	1452	1168	4498	2699	14487	5849
1980	651	578	2071	1387	949	614	1710	881	1485	1224	4568	2828	14713	6128

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Note: High estimates were used to simplify the tables. These data allow for maximum anticipated employment. Low estimates were not significantly different.

12. Projected Demand for Nurses

The demand for nurses in Minnesota was expected to increase by 19%, rising from about 31,000 in 1973 to about 37,000 in 1980. The increase was expected to occur linearly and at the approximate annual rate of 2.5%. Demand for Registered Nurses and Licensed Practical Nurses is combined in Table 11.

Table 11: PROJECTED DEMAND FOR NURSES IN MINNESOTA AND PERCENT INCREASE EACH YEAR, 1973-1980

YEAR	DEMAND FOR RNs & LPNs	PERCENT INCREASE
1973	31,153	
1974	32,006	2.74
1975	32,888	2.76
1976	33,667	2.37
1977	34,552	2.63
1978	35,422	2.58
1979	36,276	2.41
1980	37,117	2.32

C. Nursing Education Programs

There were entry positions for about 3,450 students in nursing programs in 1972. This included about 2,300 entry positions in 25 Registered Nurse programs and about 1,150 entry positions in 26 Practical Nurse programs.* (See Table 12.)

There were nine Baccalaureate programs with an aggregate enrollment of about 650 in 1972. The nine Associate Degree programs in the state had an aggregate enrollment of about 1,000. The seven diploma programs that were still enrolling new students had an aggregate enrollment of about 600. The 26 Practical Nurse programs that were enrolling new students in the state in 1972 had an aggregate enrollment of about 1,200. (Existing programs that were no longer enrolling new students were not included in these data.)

*Minnesota Department of Education, Vocational-Technical Education Division.

Table 1.2: NUMBER AND ENTRY CAPACITY OF NURSING EDUCATION PROGRAMS IN MINNESOTA, BY EDUCATIONAL LEVEL, 1972

	NUMBER OF PROGRAMS	STATEWIDE CAPACITY (ENTRY POSITIONS)
Registered Nurse		
Associate	9	1032
Diploma	7	581
Baccalaureate	9	667
RN Subtotal	25	2280
Practical Nurse	26	1164
TOTAL	51	3444

Geographic Location of Programs

Maps 1 and 2 show the 1972 enrollment in each program throughout the state. (Programs scheduled for phasing out were not included in this display, and one program scheduled to open in 1974 was included to make the data more useful for planning.)

The greatest number of Registered Nurse programs was located in Region G, the Metropolitan area. There were 13 programs with a total of about 1,300 entry positions in 1972. The second highest concentration of Registered Nurse programs was in Region F, in southeast Minnesota, with about 700 entry positions in 7 programs. There were no Registered Nurse programs in Regions A, C or E, the whole western portion of the state.

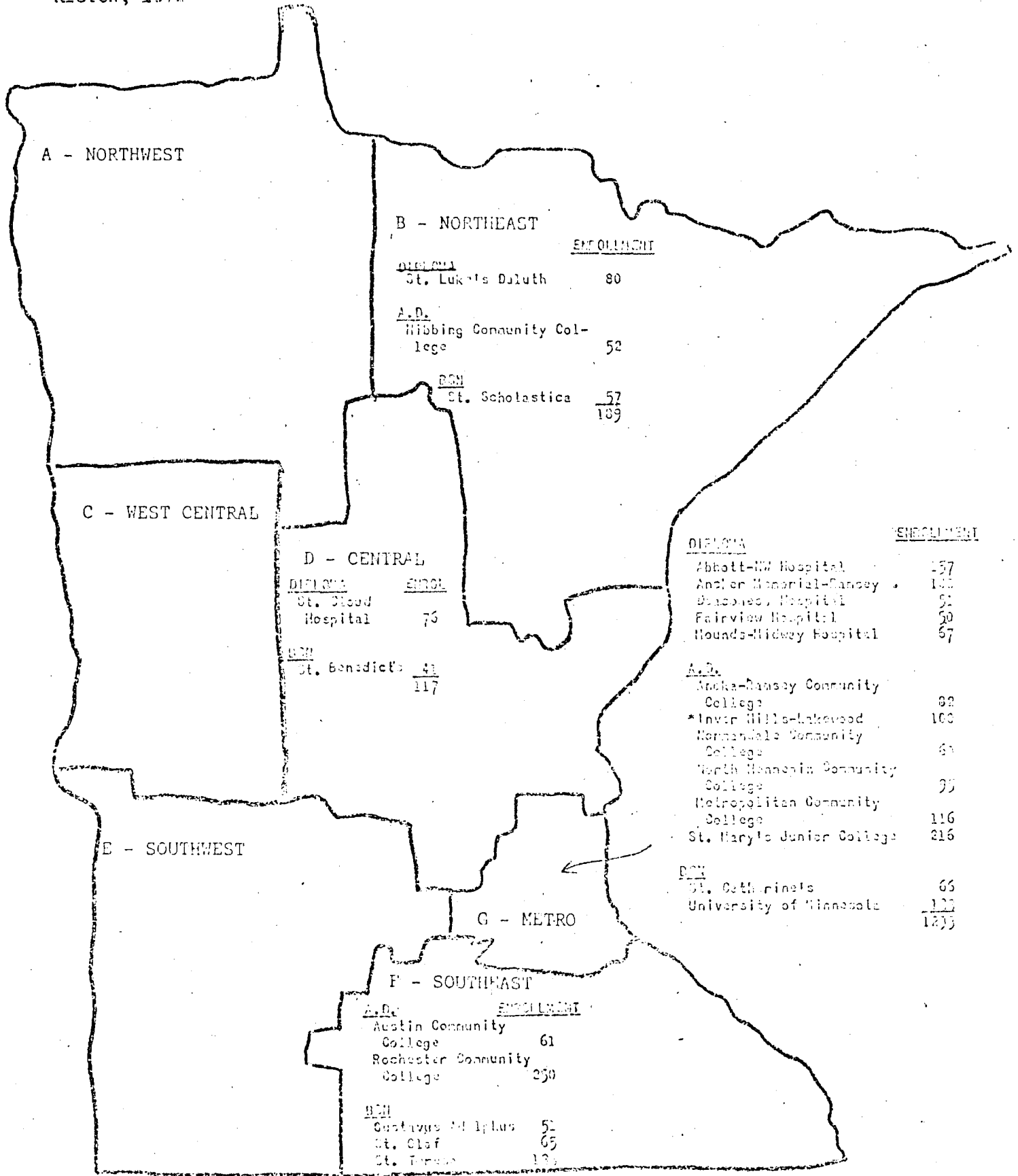
Practical Nurse programs were available in every region of the state, though the greatest number of programs and entry slots was to be found in Regions G and F, as was the case with Registered Nurse programs. The Metropolitan region had almost 400 entry positions in five programs, and the southeast Region had almost 300 entry positions in eight programs.

Comparison of Nurse Employment and Student Enrollment, by Region

The estimates of nurses' employment* and the actual numbers of students entering nursing education programs in 1972 were

*Labor force data for 1972 were projected from actual employment records of earlier years.

MAP 1: NUMBER OF STUDENTS ENTERING INDIVIDUAL REGISTERED NURSE PROGRAMS, BY PLANNING REGION, 1972

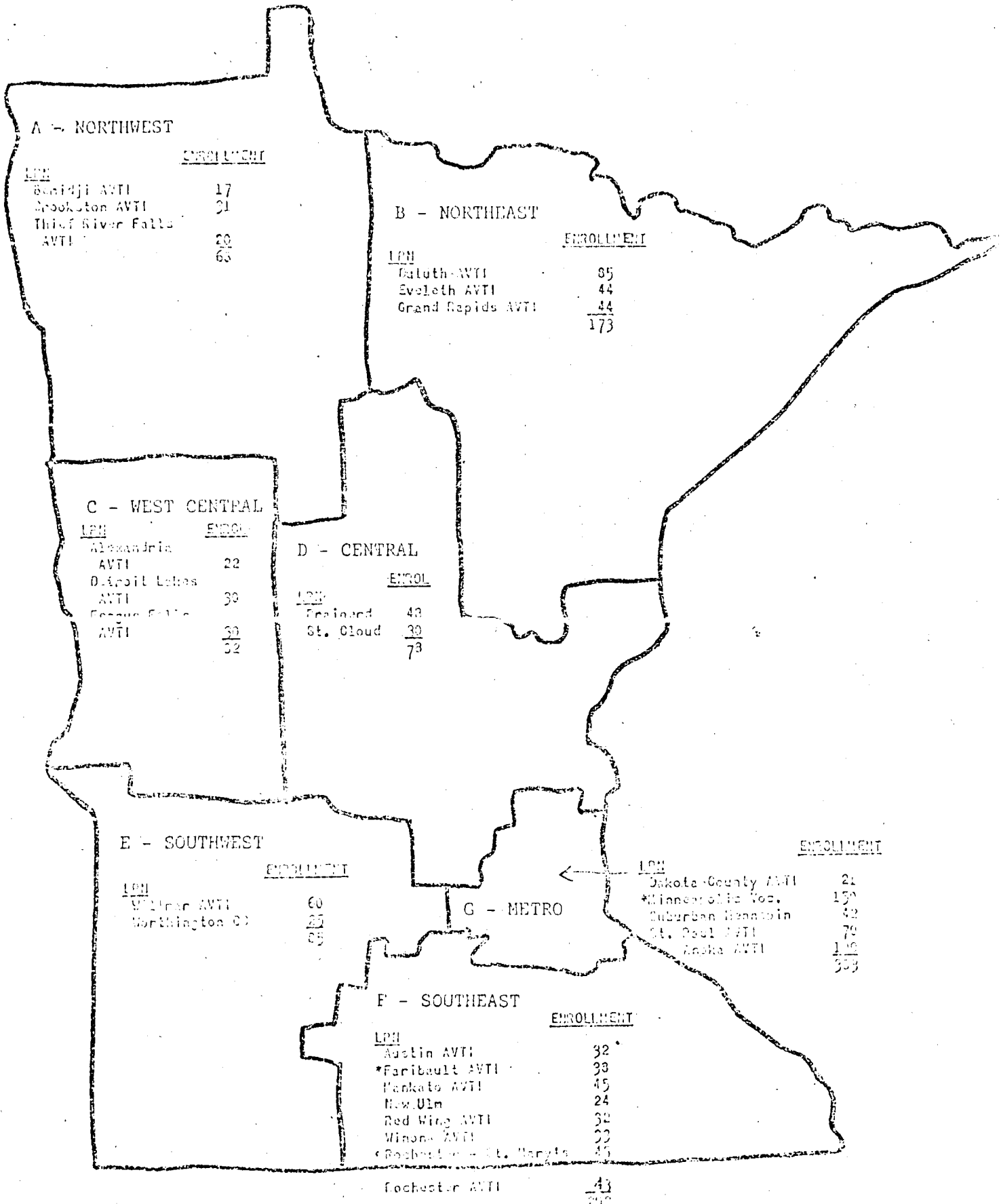


ANNUAL ADMISSION CAPACITY, DIPLOMA:	591
A.D.	1932
BSN	667
TOTAL	2880

Winona State College - 61
 Marquette Univ. - 61
 Total: 61/61

*SCHEDULED TO OPEN IN T. APRIL, 1974

MAP 2: ENROLLMENT OF INDIVIDUAL LICENSED PRACTICAL NURSE PROGRAMS*, BY PLANNING REGION, 1972



TOTAL 1972 ENROLLMENT IN LPN PROGRAMS: 1,163
 *Programs scheduled to be discontinued were not included.

broken down according to geographic areas as shown on Map 3. (Demand for health care, as reflected in demand for nurses, was not broken down by planning areas. It was recognized that there were maldistribution problems -- that is, discrepancies between demand and numbers in the labor force in a given area. However, maldistribution, a problem of recognized importance, was not within the scope of this study.)

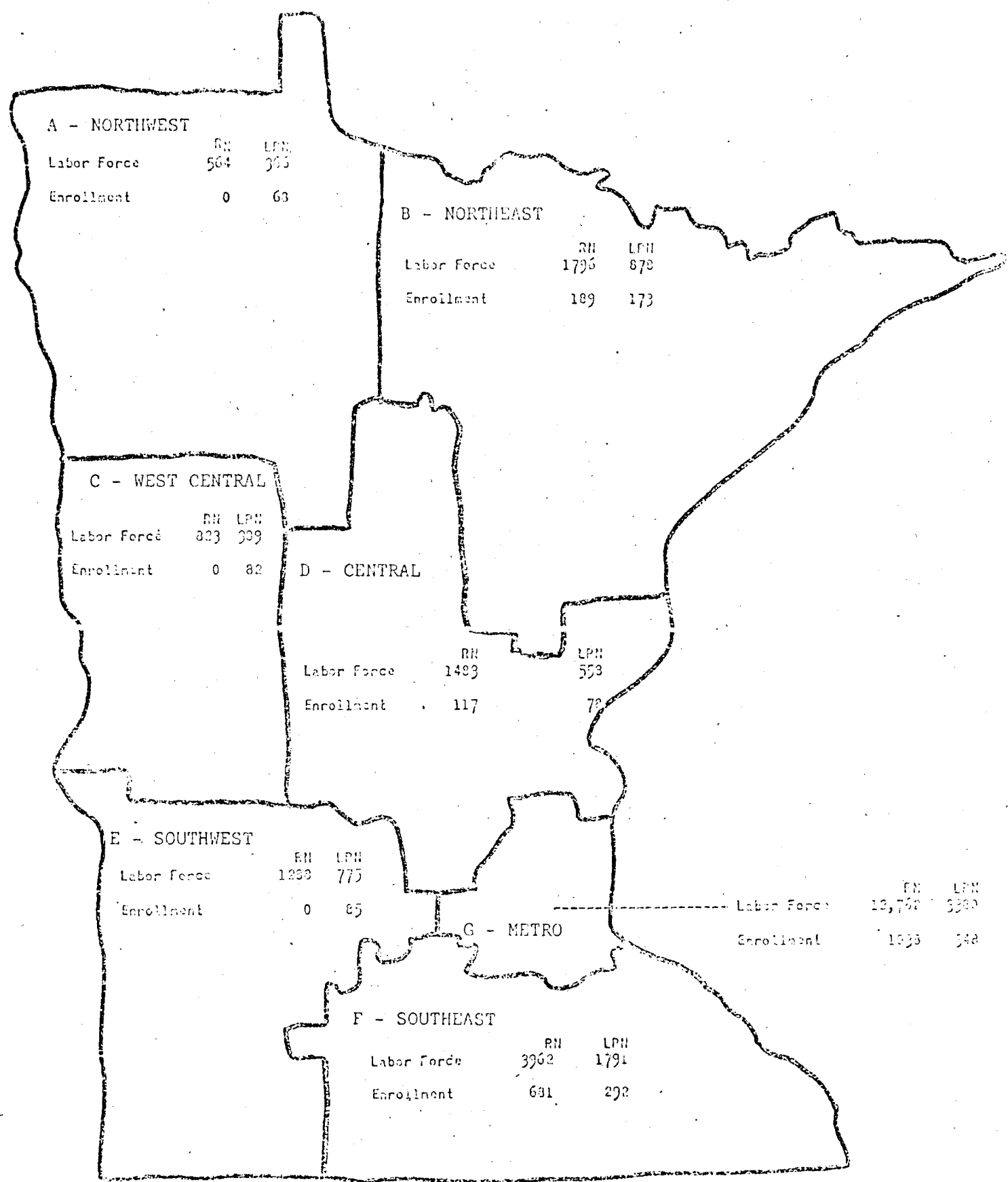
In 1972, the Metropolitan Planning Area G had the greatest concentration of nurses (about 16,500) and the Southeast Planning Area F had the second greatest number (about 6,000). The Northwest Planning Area A had the smallest number of nurses working (about 900).

Aggregate enrollment of all Registered Nurse and Practical Nurse programs in each area for 1972, as given on Map 3, shows that the distribution of nursing education programs through the state roughly paralleled the proportionate number of nurses in the labor force in each area. The Metropolitan Planning Area G led with a 1972 enrollment of about 1,400 for all types of nurses. The Southeast Planning Area F followed with about 1,000 enrollment. The smallest enrollment (about 70) was reported in the Northwest Planning Area A.

It can be seen from these data that the proportion of Licensed Practical Nurses to Registered Nurses in the labor force was generally higher in areas that offered Practical Nurse programs but did not have Registered Nurse programs. This suggests that patterns of nursing utilization reflect to some extent the availability of locally trained personnel.

No data were available to show the geographic points of origin of nursing students. A hypothetical projection was made, however, showing how many students would come from each area if the statewide enrollment figures were broken down according to the percentage of distribution of the population in each area. (See Map 4.) The resulting estimates suggest how applicants to nursing programs might be distributed if all other things were equal -- that is, if there were fairly uniform proximity to programs, prevailing economic conditions, employment opportunities, etc., throughout the state. This hypothetical distribution can be compared with the actual distribution of educational programs, but it should be kept in mind that ease of access is only one of many factors determining optimum location of programs.

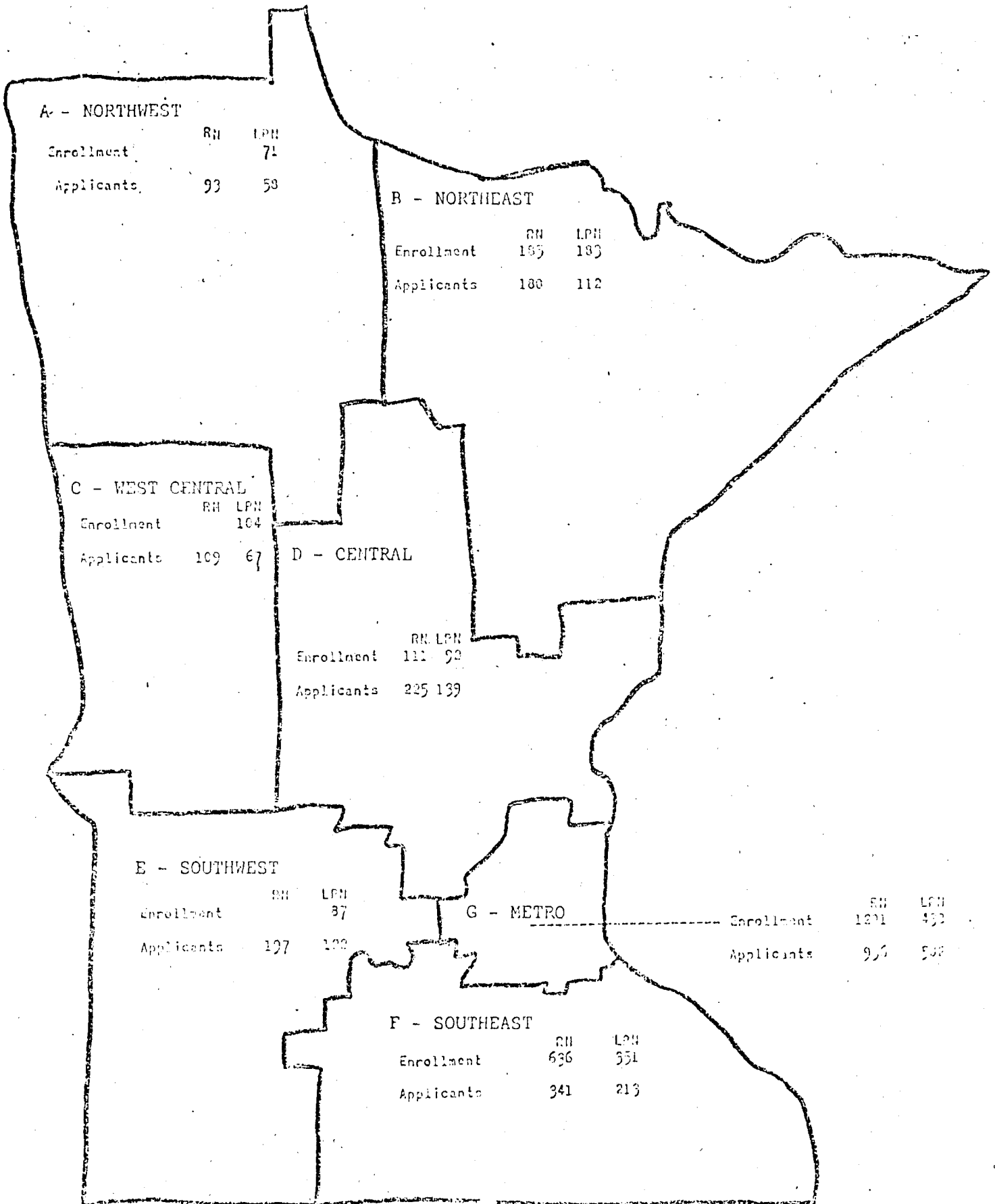
MAP-3: NURSES IN LABOR FORCE, ENROLLMENT IN NURSING EDUCATION PROGRAMS, BY REGION, 1972



TOTAL MINNESOTA

Category	RN	LPN	TOTAL
Labor Force	22,673	3,657	21,015
Enrollment	2,025	1,186	3,211

MAP 4: HYPOTHETICAL DISTRIBUTION OF APPLICANTS TO NURSING EDUCATION PROGRAMS, ACCORDING TO PERCENTAGE OF STATE'S POPULATION IN EACH AREA, AND 1972 ENROLLMENT IN PROGRAMS ACTUALLY OFFERED



SUMMARY OF FINDINGS

The data collected and the projections made in this study yielded supply and demand estimates for nurses in Minnesota through 1980, which could then be compared to the design capacity of nursing education programs in order to evaluate the state's ability to meet nursepower needs for the decade. Table 13 below shows the projected demand for nurses each year, together with the projected supply of nurses. The percentage differences between supply and demand are also given. Figure 6 shows graphically the comparison of projected supply and demand.

Demand

The demand for nurses in Minnesota was expected to increase by about 19% between 1973 and 1980, rising from about 31,000 to about 37,000, according to projections made in the study. The annual rate of increase was projected at about 2.5%.

Supply

The combined supply of Registered Nurses and Licensed Practical Nurses, that is, the number in the labor force exclusive of teaching and private duty nurses, was projected to increase by between 22% and 25% by 1980, rising from about 32,000 in 1973 to about 39,000 or 40,000 in 1980. The number of Registered Nurses was expected to increase by between 10% and 13% during that period, and the number of Licensed Practical Nurses was expected to increase by between 42% and 46%.

Table 13: PROJECTED DEMAND FOR NURSES AND SUPPLY OF NURSES IN MINNESOTA, EXCLUDING TEACHING AND PRIVATE DUTY NURSES, AND PERCENTAGE DIFFERENCES, 1973-1980

YEAR	DEMAND FOR NURSES	SUPPLY OF NURSES		PERCENT DIFFERENCE BETWEEN SUPPLY AND DEMAND	
		LOW	HIGH	LOW	HIGH
1973	31,153	32,450	32,499	4.16	4.32
1974	32,006	33,411	33,553	4.39	4.83
1975	32,888	34,297	34,562	4.28	5.09
1976	33,667	35,246	35,651	4.69	5.89
1977	34,552	36,096	36,060	4.47	6.10
1978	35,422	36,951	37,685	4.26	6.39
1979	36,276	37,855	38,767	4.35	6.87
1980	37,117	38,675	39,753	4.20	7.20

The projected supply and demand for nurses were expected to remain in an approximate state of equilibrium. The 4%-7% range in difference between projected supply and demand does not contradict this, since all data in Table 13 are estimates, and since demand figures were projected in terms of full-time nurses, but supply figures included some part-time nurses. (Table C-2 in the Appendix shows how the projected supply broke down to Registered Nurses and Licensed Practical Nurses.)

Projections of supply of nurses were based on a number of variables, among them the percentage of female high school graduates choosing to enter nursing programs. The assumption was made in making these projections that there would be entry positions for those seeking them; and that a predictable percentage would within a few years become part of the supply of nurses in the state.

Program Enrollments and Capacities

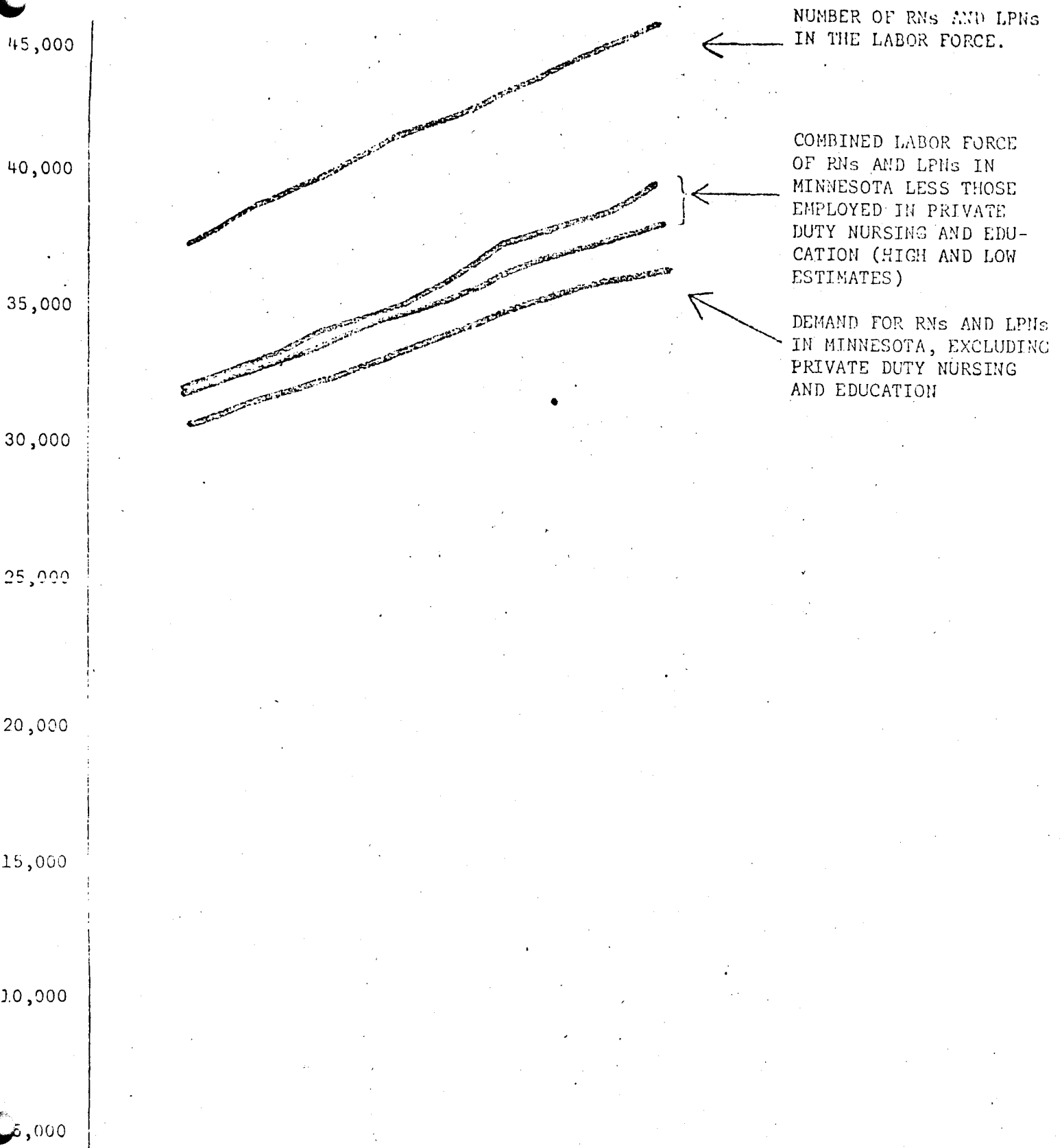
The aggregate level of enrollment in each type of nursing program in 1972 was assumed, for purposes of this study, to be at or close to the statewide design capacity. A comparison of the actual 1972 enrollment with projected enrollments for future years can, then, suggest the adequacy of the state's capacity to produce the number of nursing graduates required to maintain the projected supply.

Minnesota has about 26 Practical Nurse programs, with an aggregate design capacity of about 1,200. This capacity would be adequate to accommodate projected applicants through 1974, if the low estimates were to prevail. The peak enrollments under the low estimates would be about 1,250 in 1977, or about 6% above 1972 capacity. If the high estimates were to prevail, the peak enrollment would be about 1,400, or 200 above capacity, in 1977.

The state's nine Baccalaureate nursing programs had an aggregate design capacity of about 650, and enrollments were not expected to go over that number before 1980 if the percentage distribution of program choices remain unchanged. However, the closing of Diploma programs may effect a change in the percentage of entry nursing students that choose Baccalaureate programs.

In 1972, seven Diploma nursing programs, with an aggregate graduate capacity of about 600, were still enrolling entering students.

PRACICAL NURSES IN MINNESOTA, PROJECTED DEMAND FOR NURSES
IN MINNESOTA (LESS THOSE INVOLVED IN EDUCATION AND PRIVATE
DUTY NURSING), AND PROJECTED SUPPLY OF NURSES (LESS THOSE
INVOLVED IN EDUCATION AND PRIVATE DUTY NURSING), WITH HIGH
AND LOW ESTIMATES, 1973-1980



If all such programs were to be discontinued by 1980, as suggested*, it could be assumed that about 500 more students per year would be entering either one of the remaining kinds of Registered Nurse programs by that time. The trend has been for most of these students to choose Associate Degree programs, but this trend would be subject to change consistent with new directions in the health service delivery system or new educational policy decisions.

Associate Degree programs went through a period of rapid expansion between 1966 and 1970. If that rate of expansion were to continue because of the phasing out of Diploma programs, capacities might soon prove inadequate. In 1972 there were nine programs reported, with an aggregate design capacity of about 1,000. Projected enrollments would exceed this capacity in 1974 if the high estimates were to prevail, and in 1975 under the low estimates, unless the trend were to change and a greater percentage of Registered Nurse students were to enter Baccalaureate programs. The projection of the existing trend placed enrollments in Associate Degree programs for 1980 at a high estimate of about 1,500, or 50% over the 1972 capacity and at a low estimate of about 1,300, or 30% above the 1972 capacity.

Geographic Distribution of Nursing Education Programs

Practical Nurse programs were operating in every one of the planning regions, ensuring reasonably good access throughout the state. The largest number of student entry slots was in the Metropolitan region (about 400), and the Southeast region came second with about 300 slots.

Registered Nurse programs were not available in the Northwest, West Central or Southwest planning regions. Baccalaureate and Associate Degree programs were offered in the Northeast, Southeast and Metropolitan planning regions. The Central region had one Baccalaureate program and one Diploma program. The greatest number of Registered Nurse programs was offered in the Metropolitan area, with about 1,300 student entry slots. In the Southeast planning region, there were about almost 700 student places.

*Altman, op. cit., p. 86.

IV CONCLUSIONS AND RECOMMENDATIONS

The Advisory Committee reviewed and evaluated the findings of the research staff, the existing process of planning for nursing education, and the approach to planning that was introduced in the course of this study. The Committee saw the study as a valuable first step in an ongoing process, a process for which the study could serve as a model, with the understanding that no process can long remain valid without revisions to keep it in step with the times.

THE DATA

The approach of the project was to utilize expert opinion in interpreting and making recommendations based on reliable, up-to-date information. To establish a data base, the research staff developed and/or brought together for the first time statewide information from a number of sources regarding the demand for and supply of nurses and the enrollments, capacities and locations of nursing education programs. They projected supply, demand and program output information up to 1980.

The Advisory Committee felt that while changes occur constantly in the health care delivery system, it was not likely that anything presently foreseen would significantly alter the demand for nurses during the three to five years following the study. The projections of demand made in this study, then, would probably remain valid for that period of time, and could therefore be used safely as a basis for determining the appropriate number of nurses that should be trained during that time.

If any deviations from the projected number of students desiring to enter nursing were to occur, it would be expected that the deviations would be in the direction of an increased interest of high school graduates in nursing. The problem facing planners, then, would be in limiting admissions, all other things being equal, rather than finding ways to attract students.

The data utilized in this study was judged adequate for making recommendations regarding an aggregate ceiling on the number of program entry positions that should be available statewide for new students.

The next step would be to determine how the admissions should be distributed among the types of programs -- that is, how many Baccalaureate, Associate, Diploma and Practical Nurses should be trained. The Advisory Committee appointed a task force to deal with this problem.

The task force saw a lack of knowledge about the relationship between preparation and practice in nursing care, and consequently an inadequate differentiation between levels of preparation in terms of nurse competencies. It recommended that the Advisory Committee undertake a study that would lead to the development of a competency statement defining the different levels of nursing practitioners and evaluating their effects on quality of patient care. (The report of the Task Force on Criteria for the Ratio of Nursing Education Programs can be found in Appendix D.)

THE EXPERTISE

The broad representation in the Nursing Education Planning Project reflected the realities of planning. The project was designed to establish a closer coordination among planners, educators and employers of nursepower, and the practitioners and students, so that supply and demand could be kept in relative equilibrium, so that the responsiveness of nursing education programs to changing needs in the health service delivery system could be facilitated, and so that effective utilization of nurses could be ensured.

All the concerned groups were represented either on the Advisory Committee or among the consultants and project staff. Regional representation was also ensured through the selection of committee members.

The Advisory Committee felt that this involvement should be recognized and formalized in its recommended planning policy. The Committee specifically recommended the inclusion of the following groups in the appointment of a continuing Advisory Committee to conduct future planning activities.

- The Community Health Education Consortia which, working with area-wide Comprehensive Health Planning B agencies, have a particular role in evaluating needs within a planning region regarding kinds of programs and their locations
- The Minnesota Board of Nursing, which is responsible by legislative mandate for approving clinical facilities and curricula for nursing education programs
- The State Comprehensive Health Planning Program, which is responsible for developing policies and making recommendations to the Governor and the Legislature concerning health manpower facilities and services
- The HECC, which through its Curriculum Advisory Committee reviews proposals for new or expanded programs

RECOMMENDATIONS FOR FUTURE ACTION

Review and evaluation of the products of research were performed by the full membership of the Advisory Committee, meeting in five subgroups. Their deliberations are reflected in the recommendations and guidelines presented in this chapter, and also provide a long-range perspective for many aspects of planning for nursing education. It was recommended that the Advisory Committee include the following concerns among its subsequent activities or efforts:

- Upward educational mobility
- Transfer of credit among and within post-secondary systems
- Continuing education for upward mobility and for specialization
- Clinical facilities for educational programs

- Academic preparation of nursing educators
- Tuition reciprocity between Minnesota and North and South Dakota
- Systematic communication between nursing educators and nursing service administrators regarding mutual goals
- Coordination and communication between the Minnesota Board of Nursing and the Minnesota Higher Education Coordinating Commission
- Ongoing research

A Task Force on Recommendations for Future Action was appointed by the Advisory Committee to examine and summarize the reports of the five subgroups. The Task Force summary appears in Appendix E.

GUIDELINES

The report of the Nursing Advisory Committee was adopted by the Commission in July of 1973. Based on this report the Commission recommended several guidelines for nursing education in Minnesota which we outlined below. The recommendations fell into two groups: specific recommendations for the 1973-74 academic year regarding the number of program admission and the location of new programs, and general recommendations regarding the ongoing planning process.

Specific Recommendations

1. The total number of entry positions to Licensed Practical Nurse and Registered Nurse programs in 1972 shall be maintained

*Minutes, Higher Education Coordinating Commission, July 1973.

during 1973, with annual review for subsequent years. The 1972 total is understood to include new programs that have already been reviewed favorably by the Curriculum Advisory Committee but have not yet been implemented. This does not prevent a shift in the proportion of new nursing students entering each type of program; it only affects the statewide number of entry level positions.

2. New programs and/or an increase in entry positions in existing programs shall be encouraged by the HECC to replace programs being discontinued or reduced, in order to maintain the Fall 1972 level of entry positions.

3. In order to improve accessibility, new programs shall preferably be located in areas presently underserved by nursing education programs.

The Planning Process

1. The Advisory Committee on Nursing Education shall have continuing responsibility for making recommendations to the Higher Education Coordinating Commission for statewide nursing education policies. The committee shall include representatives of all sectors concerned with the education of nurses and the delivery and utilization of nursing services. The committee's responsibilities shall include the periodic review and updating of the planning process.

2. Statewide and regional health planning organizations shall be involved in the planning process. Proposals shall reflect input from the Minnesota Board of Nursing, which is responsible for certifying clinical facilities and curriculum; Comprehensive Health Planning, whose responsibilities include the development of policies and recommendations to the Governor and Legislature concerning health personnel; and the Curriculum Advisory Committee of the Higher Education Coordinating Commission which reviews new and existing educational programs. Comprehensive Health Planning B agencies, regional planning commissions and Community Health Education Consortia shall share in deliberations concerning the location of nursing programs within a particular planning region.

3. A data base shall be maintained, providing up-to-date information regarding nursing education resources and capacities; current enrollments and student pools; employment of and demand for nurses, and other appropriate information projected far enough into the future to allow for intelligent planning.

4. An annual review of data shall be conducted to provide the basis for recommendations for the coming year.

5. Criteria for program review shall include the following:

a. Numbers of program entry positions shall contribute toward maintaining a balance between supply and demand for nursepower.

b. The geographic distribution of new programs shall meet the HECC criterion that "relevant programs should be as accessible as possible to all potential students....(consistent with) (1) maintenance of high quality, (2) economy of effort considering relative costs of duplicative programs, and (3) the judicious use of resources to meet the total needs of the state for post-secondary education."

c. The ratio of the different educational levels of nursing programs -- that is, the proportionate division among Baccalaureate, Associate Degree, Diploma and Practical Nurse programs -- shall be consistent with recommendations to be developed by the Advisory Committee.

PROJECT EVALUATION

The project posed several objectives, and the work and acceptance by the participants comprised the major portion of the testing of those objectives.

The first of the four objectives aimed at developing a data base useful for statewide planning in nursing education. The participants developed planning guidelines around a tri-partite data base: student pool or predicted nursing education program entry choices; inventory and capacities of nursing education programs by level and type, both regional and statewide; and the manpower issues of supply and demand. The participants found the data

*Minnesota Higher Education Coordinating Commission, Proposal for Progress, Guidelines for State Policy and Comprehensive Planning of Post-Secondary Education, (St. Paul, January, 1969), p. 11.

base to be satisfactory in the development of their recommendations. They suggested continued use of similar data in the future, and also outlined additional studies to produce data for subsequent expanded planning efforts.

As its second objective, the project aimed to develop six points of a comprehensive nursing education plan through study and discussion by a representative group. Three points were fully addressed:

- Determine the statewide need for nursing personnel of all kinds on a succession of target dates
- Take account of the need to implement previous state and national recommendations
- Maintain continued planning and evaluation of programs

Two more points were partially addressed:

- See ways to provide needed personnel with proper balance and distribution of nursing education programs
- Gear recommendations to produce prompt action and meaningful changes in nursing education

The quantitative ceiling on program capacities related to Registered Nurse and Practical Nurse education was acceptable and considered sufficient for the period under consideration. Participants identified for subsequent activities the data and studies necessary to develop a data base for planning the balance and ratios between levels of nursing education. The recommendations that were produced gained prompt action from the Higher Education Coordinating Commission, and set the direction for further activities. The recommendations were solely quantitative and did not address the nature or content of nursing education. Nevertheless, participants were aware that a beginning had been made and were comfortable that curriculum design questions would indeed be treated, particularly after completion of the preparatory studies concerning competencies by level and ratios for nursing practice.

The project, in the time allotted and with limited resources, failed to attend to issues of financial support of programs.

As its third objective, the project aimed to design and establish a broadly representative Advisory Committee that would be effective in gaining adoption of recommendations. This was generally successful and the HECC adopted the concept of continuation of a

committee that would serve to monitor study design and collection of data, to analyze relevant information, to unite producers and users of nursepower, to develop policy recommendations and to establish two-way communications with the constituencies in the Minnesota nursing community.

While the design of any future committee should approximate the Project Advisory Committee and should become a permanent Commission structure, representation may be expanded, particularly in the areas of rural and consumer representation.

Finally, as a test of the process, it was shown that an acceptable, reiterable planning process was effective through the use of an Advisory Committee that joined educators and users in a state professional community.

APPENDIX A

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APPENDIX B - DETAILS OF METHODOLOGY

Methodology for the collection of data and making projections for 1972-1980 is given briefly in Chapter II of this report. Details are given here for some of the more intricate processes.

Estimating the Percentage of Female High School Graduates Entering Nursing

The individual decision to enter nursing is only one of several possible career choices available to high school graduates in Minnesota. The problem was to make an accurate estimate of the number of individuals in Minnesota that will enter the nursing profession at a given time. How could that be best accomplished? One method was to formulate a behavioral theory of the decision to enter nursing and test it in a multiple regression model.

According to our theory it is factually correct, however socially undesirable, that the great majority of students entering the nursing profession are female. Available data, therefore, for the most part concerns female nursing students. For the purposes of the theory, then, we considered only the decision of females to enter nursing.

Since the greatest proportion of people entering post-secondary education was recent high school graduates, we thought of the number enrolling in nursing education as a percentage of female high school graduates (PFHSG) in any year (t). This facilitated the prediction of the future number of female high school graduates in Minnesota, which could be done simply and with an acceptable degree of accuracy.

At any particular time, what accounts for the PFHSG entering nursing in Minnesota? Because a number of socio-economic variables contribute to that development, far too many to be reasonably considered

here, we selected two important choice factor variables: first, the individual's judgment of employment opportunities following graduation; and second, the relative financial rewards in nursing relative to other occupations. Hence, if the job market seems promising and nursing salaries appear to be satisfactory relative to other occupations, a greater proportion of female high school graduates (PFHSG) could be expected to make the decision to enter nursing. Concomitantly, if the job market for nurses is depressed and equal or higher wages are available in other occupations, a smaller proportion of female high school graduates would choose to enter nursing.

To test our theory, we selected two proxy variables to represent relative wages and the perceived job opportunities for nurses in the regression model. The opportunity for employment was represented in the model as the number of Registered Nurses and Licensed Practical Nurses actively working in the labor force (RNLPN) at the time prior to the decision to enter nursing (t-1).^{*} It was assumed that in the absence of an expanding job market, the larger the number of active nurses, the less opportunity for employment.

Since a large number of females also enter the teaching profession, we selected the annual difference between entry level teachers' wages (T_w) and entry level nurses' wages (N_w) at the time prior to the decision to enter nursing (t-1) as the measure of relative wages. A shortage of nurses would be assumed to drive nurses' wages up, and thus would be reflected in this variable. Observations for these two variables were collected for years 1953-1971.^{**}

^{*}The Minnesota Board of Nursing licensure records were used to estimate the number of nurses actively employed in Minnesota. Nurses employed in private duty nursing and education were not included in the estimate of the number of nurses that were actively employed in the labor force between 1953-1971.

^{**}Historical entry level teacher wages in Minnesota were obtained from the Minnesota School Boards Association for the years 1959-1971, and the Minnesota Education Association for the years 1951-1958. Historical entry level wages for Registered Nurses were obtained from the Minnesota Nurses Association for the years 1959-1972 and the Minnesota State Civil Service Commission for the years 1951-1958.

The theory of the proportion of female high school graduates in Minnesota entering nursing, then, takes the assumed form in a multiple linear regression equation:

$$\text{PFHSG}_t = a + b (\text{RNLPN})_{t-1} + c(N_w - T_w)_{t-1} + e_t,$$

where,

e_t = the net random effect of the excluded unknown variables on PFHSG_t

The outcome of this analysis confirmed the validity of the theory we constructed to explain the proportion of female high school graduates in Minnesota entering nursing. The difference between the predicted values of PFHSG_t and the observed values between 1953 and 1972 are presented in Table A-1. The error was small and appeared to be random. The theory was confirmed.

Table B-1: ACTUAL AND PREDICTED PERCENTAGE OF FEMALE HIGH SCHOOL GRADUATES ENTERING NURSING IN MINNESOTA, 1953-1972

YEAR	ACTUAL PFHSG _t	CALCULATED PFHSG _t	ERROR
1953	11.74	11.67	00.07
1954	10.57	11.21	-00.64
1955	11.49	10.88	00.61
1956	10.73	10.79	-00.06
1957	10.05	10.47	-00.42
1958	10.50	10.23	00.27
1959	10.35	10.36	-00.01
1960	10.62	10.00	00.62
1961	9.63	09.77	-00.14
1962	9.30	09.44	-00.14
1963	9.55	09.24	00.31
1964	10.21	09.20	01.01
1965	8.65	08.94	-00.29
1966	8.17	08.89	-00.72
1967	8.49	08.75	-00.26
1968	8.12	08.64	-00.52
1969	8.82	09.44	-00.62
1970	8.68	09.16	-00.48
1971	10.38	08.88	01.50
1972	9.14	08.67	00.47

With this result, we were then able to predict the future PFHSG in Minnesota who would choose a nursing career by predicting the number of Registered Nurses and Licensed Practical Nurses actively working in the Minnesota labor force and the difference between entry level nurses' wages and entry level teachers' wages in any given year.

In order to generate a range of future enrollments, entry level nursing wages were projected based on two different trends. The low estimates were based on entry level nursing wages for the years 1953-1971, when the growth in wages was relatively smaller. The high estimates of entry level nursing wages were based on the period 1967-1972, when the annual rate of increase was relatively higher. The difference between these two trends was reflected in all estimates of the supply of nurses after 1972, beginning with the number of high school graduates seeking admission to nursing and extending to the number of nurses actively employed in the labor market. The low estimates reflect the effects of the relatively slower rate of increase in entry level nursing wages and the high estimates reflect the relatively greater rate of increase in entry level nursing wages. These high and low estimates also serve as estimates of the upper and lower boundaries between which the actual supply of nurses may fluctuate depending on the prevailing relative difference between entry level teachers' wages and entry level nurses' wages.

Projecting Number of Female High School Graduates Entering Each Type of Nursing Education Degree Program, 1973-1980

Once we projected the percentage of female high school graduates in Minnesota that will choose to enter the nursing profession, the next step was to estimate the percentage that will enter each type of program (Practical Nursing, Diploma, Associate Degree and Baccalaureate Degree).

The proportion of nursing students entering each type of nursing program was estimated by extending the linear trend of entrance rates to programs during the period 1952-1971. In the case of the Associate Degree programs the base years 1964-1971 were used, while the period between 1960 and 1971 was selected for the Practical Nursing Programs. Because the sum of the predicted entrance rates for the four types of programs was greater than 1.00 after 1973, the percentage entering Associate Degree programs was controlled as the difference between 1.00 and the sum of the rates of enrollment in Baccalaureate, Diploma and Practical Nursing programs. The effect of this procedure was to permit the Baccalaureate and Practical Nursing programs the slight increase in their share of

the nursing market predicted by the linear regression estimate, while allowing the Associate Degree program admissions to grow at the general rate of decline of the Diploma programs. This procedure reflects the general historical pattern of shifts in the allocation of nursing students among the four types of programs between 1952 and 1971.

It should be emphasized strongly that the estimates of the future entrance rate into each type of degree program, in the absence of any tested behavioral theory, was a matter of intuition or best guess based on experience or less precise data. In other words, there are other reasonable approaches to estimating the future allocation of students to degree programs that should be tested. For the purposes of this project, however, the method of estimating seemed to reflect the recent historical trend. Admittedly, the optimal approach to this issue would be to conduct a number of simulations that would test several alternative futures.

Estimating the Demand for Nurses

Future demand for nurses in Minnesota, like the projected portion of the female high school graduates entering the nursing profession, was based on a behavioral theory of the socio-economic variables that determine health care demand.

Theoretically, the demand for nurses $(RNLPN)_t$ is directly related to the demand for health care. Since we focused on the demand for health care, we first needed to determine the relationship between the number of active nurses in the labor force and some socio-economic variables that account for health care demand. Again we selected only three variables to simplify the process, recognizing that there are a number of other important variables determining health care demand not specified in the model.

The demand for non-discretionary health care was assumed to be independent from economic constraints. The number of Minnesotans below the age of four $(POP_{0-4})_t$, and the number over the age of 65 $(POP_{65+})_t$ were selected as the variables representing non-discretionary health care demand. Discretionary health care demand was viewed as being related to per capita income $(PCI)_t$.

The functional mathematical form of this theory is:

$$(RNLPN)_t = F(POP_{0-4}, POP_{65+}, PCI)_t$$

The algebraic form assumed for the purposes of multiple-regression analysis is:

$$RNLPN_t = (d + e) \cdot \log (POP_{0-4} + POP_{65+}) + f \cdot \log (PCI)_t$$

The test outcome was significant. Calculated values of d, e, and f in the equation were significant at the .05 level and the R² was .99. This theory of health care demand was confirmed.

With this result, it was possible to estimate future demand for nurses in Minnesota by predicting future per capita income and the number of people in Minnesota below the age of four and over 65.

Adjusting Estimates of Labor Force to Exclude Educators and Private Duty Nurses

Nurse demand estimates did not include those working in private duty nursing and education, but labor force estimates did include those individuals. As a result, it was necessary to reduce the labor force participation rate by a factor that accounted for educational and private duty nursing activities.

According to the Health Manpower Source Book, 4% of the Registered Nurses were involved in education.* No Licensed Practical Nurses were assumed to be involved in nursing education.

The percentage of Registered Nurses and Licensed Practical Nurses working in private duty nursing was unknown. Between 1951 and 1966 it declined from 31.5% to 14%, nationally. For the purposes of this study, the Advisory Committee recommended that 5% of the Registered Nurses and Licensed Practical Nurses should be considered to be engaged in private duty nursing.

Table 9 contains the adjusted number of nurses in the labor force after subtracting 9% from the Registered Nurses and 5% from the Licensed Practical Nurses for both low and high estimates. No high estimates were made during the first two or three years due to the lag between enrollment and graduation. The low estimate during those years was actually an extension of the historical trend.

*Manpower Analysis Branch, Division of Nursing, Health Manpower Source Book, Section 2, Nursing Personnel, (Washington: U. S. Government Printing Office, 1966).

APPENDIX C

DETAILED FINDINGS

Essential findings of this study are given in Chapter III. Further details are included here.

Table C-1: PROJECTED FEMALE HIGH SCHOOL GRADUATES IN MINNESOTA, 1973-1980

YEAR	HIGH SCHOOL GRADUATES	PER CENT FEMALE	NUMBER OF FEMALE HIGH SCHOOL GRADUATES
1973	69,474	.5409	37,100
1974	70,657	.5382	37,578
1975	73,232	.5355	38,027
1976	73,082	.5328	39,215
1977	75,954	.5301	40,263
1978	75,746	.5274	39,948
1979	75,400	.5247	39,502
1980	75,099	.5220	39,201

Table C-2: PROJECTED PERCENTAGE OF FEMALE HIGH SCHOOL GRADUATES AND ESTIMATED NUMBER ENTERING NURSING IN MINNESOTA, 1972-1980

YEAR	PERCENTAGE		NUMBER	
	LOW	HIGH	LOW	HIGH
1972	.0852	.0910	3100	3376
1973	.0851	.0909	3198	3416
1974	.0842	.0908	3202	3453
1975	.0832	.0907	3263	3557
1976	.0823	.0907	3205	3532
1977	.0813	.0905	3273	3644
1978	.0803	.0904	3172	3611
1979	.0794	.0903	3107	3570
1980	.0776	.0902	3042	3536

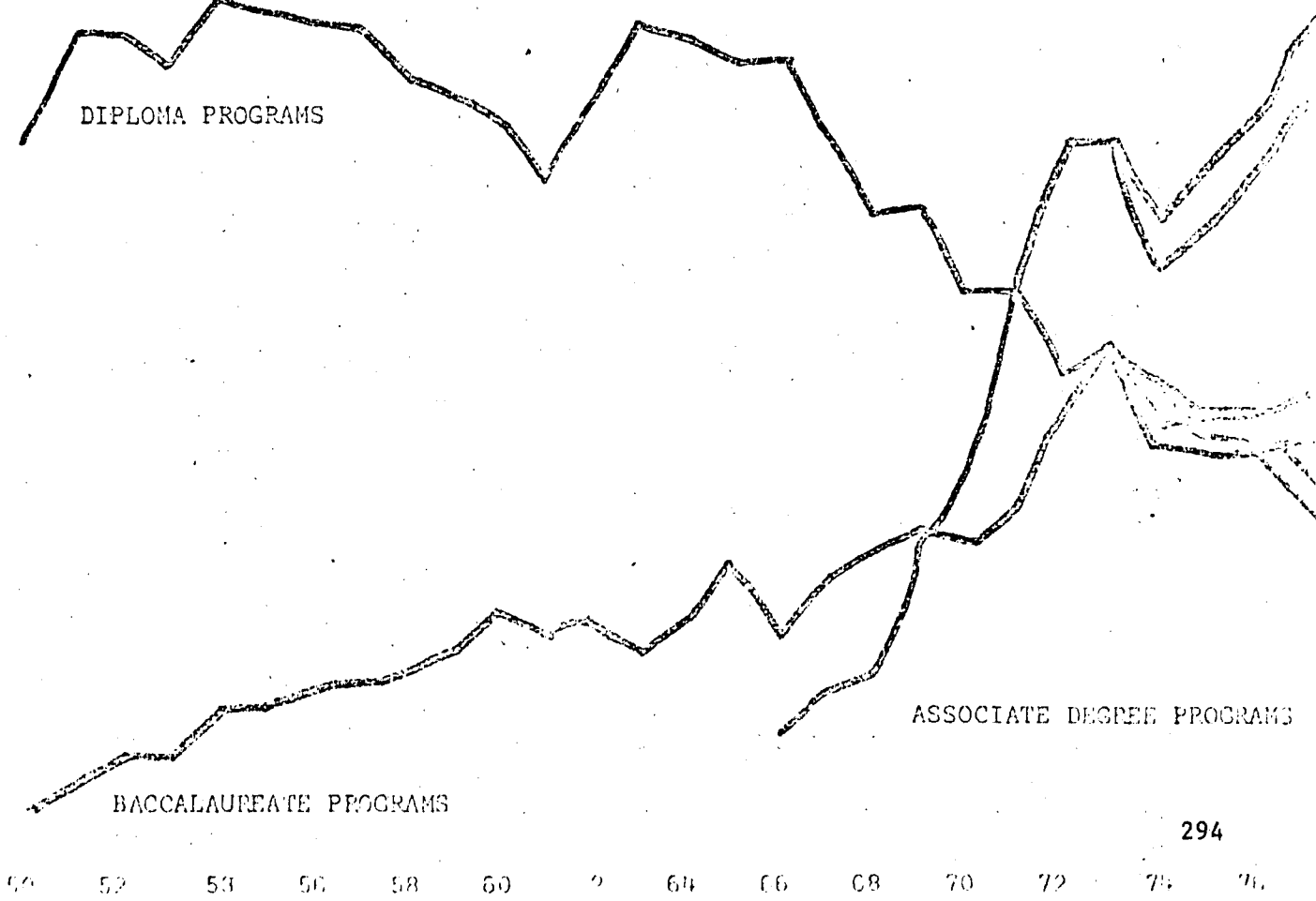
Table C-3: ACTUAL AND ESTIMATED PERCENTAGE OF ALL ADMISSIONS INTO NURSING PROGRAMS BY TYPE OF PROGRAM, 1952-1980

YEAR	LPN	BSN	AD	DIP	TOTAL
1952	.1853	.1543	NA	.6604	1.00
1953	.1895	.1497	NA	.6608	1.00
1954	.1882	.1487	NA	.6631	1.00
1955	.2169	.1478	NA	.6353	1.00
1956	.2376	.1540	NA	.6084	1.00
1957	.2397	.2029	NA	.5574	1.00
1958	.3169	.1711	NA	.5120	1.00
1959	.3459	.1531	NA	.5010	1.00
1960	.3359	.1529	NA	.5112	1.00
1961	.3237	.1511	NA	.5253	1.00
1962	.3664	.1288	NA	.5048	1.00
1963	.3635	.1371	NA	.4994	1.00
1964	.3685	.1299	.0882	.4134	1.00
1965	.3637	.1382	.0969	.4012	1.00
1966	.3687	.1504	.1115	.3694	1.00
1967	.3527	.1705	.1202	.3566	1.00
1968	.3585	.1475	.1962	.2973	1.00
1969	.4006	.1373	.2077	.2544	1.00
1970	.3431	.1546	.2840	.2183	1.00
1971	.3590	.1710	.2728	.1972	1.00
1972*	.3723	.1551	.2754	.1972	1.00
1973	.3744	.1557	.2727	.1972	1.00
1974	.3765	.1563	.2947	.1725	1.00
1975	.3786	.1569	.3155	.1490	1.00
1976	.3807	.1575	.3363	.1255	1.00
1977	.3828	.1581	.3571	.1020	1.00
1978	.3849	.1587	.3779	.0785	1.00
1979	.3870	.1593	.3987	.0550	1.00
1980	.3891	.1599	.4195	.0315	1.00

* estimated values, 1972-1980

MATHS, 1950-1980

1,900
1,800
1,700
1,600
1,500
1,400
1,300
1,200
1,100
1,000
900
800
700
600
500
400
300
200
100



1,800
1,700
1,600
1,500
1,400
1,300
1,200
1,100
1,000
900
800
700
600
500
400
300
200
100
00

LPN GRADUATES

YEAR 50 52 54 56 58 60 62 64 66 68 70 72 74 76 78

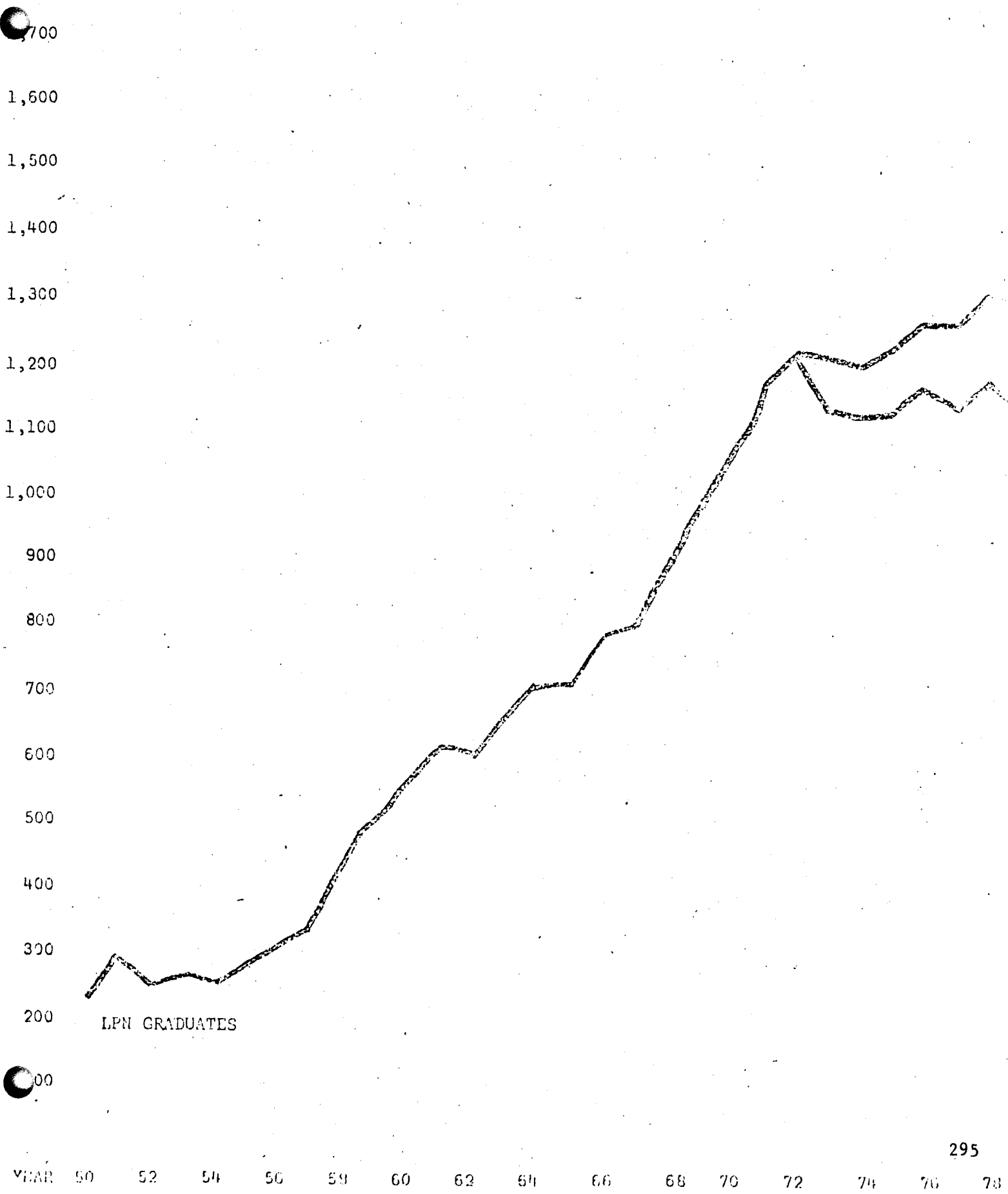


TABLE C-4: PROJECTED SUPPLY OF NURSES IN MINNESOTA, AND PERCENTAGE ANNUAL INCREASE BY TYPE OF NURSES AND TOTAL, 1972-1980

YEAR	RN				LPN				TOTAL			
	LOW	PERCENT INCREASE	HIGH	PERCENT INCREASE	LOW	PERCENT INCREASE	HIGH	PERCENT INCREASE	LOW	PERCENT INCREASE	HIGH	PERCENT INCREASE
1972	22,680				8,638				31,318			
1973	23,244	2.49			9,206	6.58	9,255		32,450	3.61	32,499	
1974	23,642	1.71	23,685		9,769	6.12	9,868	6.62	33,411	2.96	33,553	3.24
1975	23,963	1.36	24,072	1.63	10,334	5.78	10,490	6.30	34,297	2.65	34,562	3.01
1976	24,344	1.59	24,528	1.89	10,902	5.50	11,123	6.03	35,246	2.77	35,651	3.15
1977	24,569	0.92	24,925	1.62	11,437	4.91	11,734	5.49	36,096	2.41	36,660	2.83
1978	24,940	1.51	25,306	1.52	12,011	5.02	12,379	5.50	36,951	2.37	37,685	2.80
1979	25,287	1.39	25,747	1.74	12,568	4.64	13,020	5.18	37,855	2.45	38,767	2.87
1980	25,576	1.14	26,147	1.55	13,099	4.23	13,642	4.78	38,675	2.17	39,789	2.64

APPENDIX D

REPORT OF THE TASK FORCE ON CRITERIA FOR THE RATIO OF NURSING
EDUCATION PROGRAMS

Committee Members: Barbara Redman, Chairperson
Ruth Gabrielson
Martha Schelling
Melvin Conley
Alma Sparrow

The charge of the Task Force from the Advisory Committee was to:
(1) determine the data needed to arrive at an appropriate ratio
of nurses with various levels of nursing preparation, and (2)
establish criteria by means of which a future study could arrive
at a ratio.

The basic difficulty underlying the work of the Task Force was
that there is an inadequate differentiation between levels of
preparation in terms of nurse competencies, and a lack of know-
ledge about the relationships between preparation and quality
of nursing care. After lengthy discussion by the Task Force
and interviews with nurse manpower employers, the Task Force
concluded that:

1. There would be a considerable hazard in making any recommen-
dations at this point in time since we lack basic data. Our
limited assessment leads us to think that there may be consider-
able variance among employers in the preferences for various
levels of nurse preparation.
2. The most satisfactory criteria would be based on evidence of
the effect on patient welfare as well as cost.

Therefore, the Task Force recommends that the Advisory Committee
on Nursing Education take the necessary steps to ensure that

criteria for the establishment of a ratio should include competency statements indicating clear differentiation between levels of nurse practice, based on information and research measuring the effects of nursing on patient care.

The Task Force also recommends that the Advisory Committee on Nursing Education undertake a two-phase study following the completion of this project, provided that funds are available, to:

1. Survey nurse educators and nurse employers in Minnesota about the appropriate performance behaviors of nurses with different levels of educational preparation and the desirable proportion of Registered Nurses, Licensed Practical Nurses and nursing assistants to staff different types of health care facilities, and,

2. Survey consumer expectations about the effects on patient care of nurses with different levels of preparation.

The outcome of this study should be a competency statement defining the different levels of the nurse practitioners.

The second phase of the project would be the design of a pilot study for evaluation of the effect on quality of patient care of different levels of nurse preparation.

APPENDIX E

REPORT OF THE TASK FORCE ON RECOMMENDATIONS FOR
FUTURE ACTION IN NURSING EDUCATION

Committee Members: Helen Jameson, chairperson
Adella Espelien
Annie Baldwin
Thelma Hennnes
Ann Larson
Sister Anne Joachim Moore, Ex-Officio
Bob Rustad, Ex-Officio

This task force was appointed to examine and summarize the recommendation reports from each of the five discussion groups at the February 8, 1973 meeting of the Nursing Education Advisory Committee.

Summary Recommendations

- I. That the Minnesota Higher Education Coordinating Commission be responsible for maintaining the Statewide Nursing Education Advisory Committee, whose membership is composed of groups which represent the statewide interest in the education of nursing manpower at all levels of post-secondary education in Minnesota:
 - A. That the functions of the Advisory Committee be to update, review, and foster implementation of the Statewide Plan for Nursing Education:

1. That the Statewide Plan be reviewed at least biennially
 2. That the Advisory Committee participate in identifying the relevant data to be collected by the Minnesota Board of Nursing for the continual updating of the Statewide Plan.
- B. That the Minnesota Board of Nursing review and update its Guidelines to facilitate implementation of the Statewide Plan.
 - C. That the Minnesota Board of Nursing utilize the Statewide Plan in its decisions relative to approval of new programs and expansion of existing ones.
- II. That the total number of admissions to nursing programs in Minnesota be maintained at the present level until the fall of 1974, at which time the Statewide Plan will be reviewed:
- A. That the total admissions within the Registered Nurse and Licensed Practical Nurse classifications be held at the same level.
 - B. That recommendations concerning the ratio and geographic location of Baccalaureate, Diploma, Associate Degree, and Licensed Practical Nurses be deferred until completion of Phase A of the study proposed by the Advisory Committee
- III. That upward educational mobility be encouraged within and between post-secondary systems in Minnesota.
- IV. That provisions be made for transfer of credit between and within post-secondary systems in Minnesota.
- V. That, providing there are qualified faculty and adequate clinical facilities, continuing education for nurses be conducted by public and private nursing programs in all regions of the state:
- A. That emphasis on continuing education for Licensed Practical Nurses provide for movement toward achieving the Registered Nurse.
 - B. That short-term, post-Registered Nurse specialization programs be established in post-secondary institutions.
 - C. That the Minnesota Board of Nursing, in conjunction with appropriate nursing organizations, prepare and implement guidelines for short-term specialization programs in Minnesota.

- VI. That, as soon as possible, a study be conducted by the Minnesota Board of Nursing on the use, needs, and availability of acute and community health care facilities for Registered Nurse and Licensed Practical Nurse preparing programs:
 - A. That the purpose of this study be for establishing guidelines for priority of use.
 - B. That this information be utilized by the Minnesota Board of Nursing in making decisions about the establishing of new programs, as well as making recommendations for upgrading existing programs.
 - C. That this information be utilized to improve communications and planning between educators and staff of agencies used for student learning.
- VII. That the Minnesota Board of Nursing make available a survey report to the Advisory Committee on the present level of academic preparation of faculty members in schools of Registered Nurse and Licensed Practical Nurse preparing programs.
 - A. That the survey data be utilized to evaluate the quality of faculty preparation in schools of nursing in Minnesota.
 - B. That the Advisory Committee determine what provisions need to be made for faculty upgrading through continuing education, as well as initial preparation.
- VIII. That tuition reciprocity be encouraged between Minnesota and North and South Dakota.
- IX. That the Advisory Committee encourage the Minnesota Board of Nursing, the Minnesota Nurses Association, the Minnesota Licensed Nurses, and the Minnesota Licensed Practical Nurses Association to cooperatively develop a systematic plan for nursing service administrators and nursing educators to discuss their mutual goals in light of changing health trends.
- X. That there be close coordination and communication between MBN and HECC.

BIBLIOGRAPHY

- Stuart Altman, The Present and Future Supply of Registered Nurses, (Washington: U. S. Government Printing Office, June 1971).
- Citizen's Committee, To Meet the Need, Recommendations to the Legislature, (St. Paul, May 1970).
- Comprehensive Health Planning Program, State Planning Agency, Planning for Allied Health Personnel in Minnesota, (St. Paul, Minnesota, 1972).
- Division of Nursing, Department of Health Education and Welfare, Planning for Nursing Needs and Resources, (Washington: U. S. Government Printing Office, April 1972).
- Ivan J. Fahs and Kathryn Barchas, Nursing in the Upper Midwest, Focus on Minnesota, (Minneapolis: Upper Midwest Research and Development Council, December 1969).
- Manpower Analysis Branch, Division of Nursing, Health Manpower Source Book, Section 2, Nursing Personnel, (Washington: U. S. Government Printing Office, 1966).
- Patrick D. Meagher and William C. Weiler, Supply and Demand for Nurses in Minnesota, (Minneapolis Office of Budget Planning and Information Services, University of Minnesota).
- Minnesota Department of Health, Minnesota Population, (Minneapolis, 1970).
- Minnesota Higher Education Coordinating Commission, Projecting Institutional Enrollments, 1973-1989, (St. Paul, 1973).
- Minnesota Higher Education Coordinating Commission, Proposal for Progress, Guidelines for State Policy and Comprehensive Planning of Post-Secondary Education, (St. Paul, January 1969).
- National Commission for the Study of Nursing and Nursing Education, An Abstract for Action, (New York: McGraw-Hill Book Company, 1970).
- Joyce M. Schowalter and Lynda F. Cole, Nursepower in Minnesota, (St. Paul: Northlands Regional Medical Program, 1970).

Minnesota Higher Education Coordinating Commission

CHAPTER

NURSING EDUCATION IN MINNESOTA: A STATUS REPORT

The Commission's Academic Planning section reports the collaborative planning pursued in certain fields, including nursing education. It also reports the planning procedures tested to address existing programs.

The first and most productive test involved statewide nursing education. External funds mainly supported development of procedures for planning. Several policy guidelines emerged and were adopted by the Commission in June, 1973 along with a blueprint for future development (See Planning Report 11, Statewide Planning for Nursing Education in Minnesota). The guidelines have already assisted planning and review of nursing programs by the Commission, the State Board of Nursing, the State Planning Agency, the Department of Health, and the post-secondary institutions.

In August of 1974, the Commission reactivated the Advisory Committee on Nursing Education to address this blueprint for further planning. The Committee enjoys an expanded membership to include representation from the developmental and experimental nursing programs currently under discussion.

The Committee meets regularly and has adopted a statement of purpose and objectives:

Purpose: To develop recommendations and policy guidelines on nursing education for the Minnesota Higher Education Coordinating Commission. These recommendations and guidelines will address the concerns of nurse educators, nurse practitioners, and employers of nurses, since the goal of nursing education is to prepare competent persons for practice in a variety of settings.

Recommendations will be based on the following objectives:

1. To identify those segments of the nursing community in Minnesota whose needs, goals, and objectives are similar or interrelated and initiate a system of communication between them to facilitate cooperation at developmental and operational levels.
2. To determine the appropriate proportion of students to be graduated from the various types of nursing programs annually, with attention to geographic distribution.
3. To delineate the state's need for graduate programs in nursing and outline the process to meet this need.
4. To coordinate efforts to provide opportunities for post-basic specialization and continuing education.
5. To develop and support a statewide plan to increase the availability of career mobility opportunities, with a focus on articulation between educational programs.
6. To explore and develop a coordinated plan for the use of Minnesota clinical facilities by surrounding states through State Boards of Nursing.
7. To definitively describe the expected competencies mastered by nursing assistants, licenses practical nurses, associate degree/diploma nurses, baccalaureate degree nurses and master's degree nurses in order to establish a common frame of reference for ACNE and for all those concerned with implementing ACNE recommendations.

This statement lays the foundation both for areas of priority and for specific work projects. With external assistance from the linkage contract with DHEW and the staff it provides, the Advisory Committee on Nursing Education is establishing competency descriptors for levels of nursing programs in preparation for a study to determine policy guidelines for program outcomes from several types of nursing education with a target date in the spring of 1975. The work-plan also entails development of local/regional/state linkages for sharing information and planning. Innovative curriculum development involves cooperative efforts to unite planners around responses to pressing needs for career-ladder programs widely available throughout Minnesota.

Finally, the consensus of the Committee, based on expert knowledge and national studies, has expressed a need for priority attention to improvement of graduate nursing education. Both in Minnesota and nationally, the traditional focus on undergraduate production of nursing practitioners has sharpened the needs for training of nurse educators, of people to teach in graduate programs in nursing, of nurse administrators, of graduate nursing specialists and of researchers to provide necessary content to the field of nursing.

SOCIAL & PSYCHOLOGICAL ASPECTS
OF
DEATH AND DYING

School of Nursing and School of Pharmacy

Phar 5-255

SPRING TERM
1975

This is an interdisciplinary course open to a limited number of nursing and pharmacy students. It will meet as a two hour late afternoon or early evening seminar once a week in the Fenwick (CHIP) lounge. The course surveys the role and social organization of death in society and the relationship of the pharmacist and nurse to the terminally ill patient in the community or institutional setting. Issues, attitudes, and beliefs of students as health professionals and as human beings will be discussed. This course was offered last year and was very successful and imformative, so it will be offered Spring term.

2 hours credit; prerequisite permission of instructors

Instructors:

C. Reese
B. Beadsley
D. Griffin

After registering for the class and when your Spring term schedule is known, please call Bob Beardsley at 376-5218 (work) or 920-8573 (home) to arrange an appropriate time for the class meeting. Call before March 13.

Social and Psychological Aspects of Death and Dying

"It is not an easy task to help the dying patient - but then it is not an easy task to die."

FORMAT

The course will be conducted on a seminar basis - that is, each of us (student and staff) will contribute to the construction of a knowledge base and the sharing of our own personal experiences and feelings. Major focus will be placed upon the operational and affective components for dealing with the concept of death and the process of dying. The discussion session will develop a preassigned theme and will lend strongly from the readings and clinical experience. Each class member is expected to do the required reading and if time and interest permit, to do the optional readings. Throughout the quarter, individuals will be asked to be discussion leaders and to develop a scheme for discussing selected views and opinions as expressed in the literature.

A clinical component will be completed by each class participant. This phase will consist of 1) a sensitivity session 2) a funeral experience 3) a mortuary/morgue experience and 4) several sessions with an ambulatory and/or hospitalized terminal patient. These experiences are designed to broaden your own views and at the same time force you to begin dealing, on a personal basis, with the role of a health care professional in the dying process.

EVALUATION

A grade of "b" will be equivocal to an "S" (on S/N) and these grades (B or S) will be minimum competency levels which must be achieved by each student. The only grades to be issued lower than the "B" or "S" level will be "N".

The following are the minimum requirements for a "B" or "S":

1. evaluative critique of the required readings
2. completion of the clinical experience
3. a paper of no less than ten pages (topic to be chosen in consultation with the instructional staff)

For a grade of "A", the student will complete in addition to the requirements of a "B" or "S" the following:

1. the reading of a book on the reading list or five articles on the reading list that have not been required reading. An evaluative critique must be prepared for the book and/or the articles.
2. complete a self-designed external experience which has been based upon your own personal achievement goals. The results of these experiences are then to be shared with the course participants.

COURSE TEXTS (available in Main Engineering Bookstore)

Kastenbaum and Aisenberg, The Psychology of Death (New York: Springer Publishing Company), 1972.

Sudnow, David, Passing On: The Social Organization of Dying (Englewood Cliffs: Prentice-Hall, Inc.), 1967.

Grollman, Earl (ed), Explaining Death to Children, (Boston, Beacon Press), 1967.

Pharmacy 5-255

Readings - Session I

Modern societies attitudes toward death: a cultural and historical evaluation.

REQUIRED

Kastenbaum and Aisenberg

Chapter 1 - Death as a Thought

Chapter 8 - The Cultural Milieu of Death 1: Yesterday

Chapter 9 - The Cultural Milieu of Death 2: Today

Grollman

Chapter 1 - Fulton, On the Dying of Death

OPTIONAL (See bibliography for complete citations)

Elder, 1973

Morrison, 1973

Parsons, Fox and Lidz,

May,

Eckhardt,

Vernon, 1970, pp. 3-91

Pharmacy 5-255
Winter, 1974

H. Manasse
C. Reese
Instructors

Discussion Topics and Dates*

Thursdays 6:30-8:30 PM 350AH

Session I January 10, 1974	Modern Societies' Attitudes Toward Death: A Cultural and Historical Evaluation
Session II January 17, 1974	The Social Organization of Death, Death Functionaries and the Institution
Session III January 24, 1974	The Meaning of Death through Cross-Cultural Examination of Race, Age and Ethnicity
Session IV January 31, 1974	Death of the Self and the Fear of Death
Session V February 7, 1974	Psychological Examination of Fear, Loss, Denial, Anger and Hostility
Session VI February 14, 1974	Lethal Behavior and Psychosocial Intervention
Session VII February 21, 1974	Issues of Pharmaceutical/Nursing Ethics and the Terminally Ill
Session VIII February 28, 1974	The Terminal Patient and Drug-Related Issues
Session IX March 7, 1974	Issues in Euthanasia and Prolongation of Life
Session X March 14, 1974	Project Discussions and Evaluation

NOTE: A sensitivity session will be scheduled based upon a convenient time for students/staff

*May be subject to revision based upon student needs and interest.

UNIVERSITY OF MINNESOTA

Pharmacy 2-255
Spring 1975

"Social and Psychological Aspects of Death and Dying"

Objectives

At the completion of this course the students will be able to:

1. Discuss the meaning of death for different cultures, societies, and age groups.
2. Examine the historical attitudes, beliefs, and practices that have influenced current beliefs.
3. Discuss the social issues of death and dying (i.e., euthansia) and the expectations society conveys about the behavior of the dying.
4. Discuss the literature which conveys people's experiences, opinions, attitudes and beliefs about death.
5. Discuss their own beliefs and opinions and attitudes about death and the dying.
6. Recognize the behaviors in people which reflect stages in the process of dying.
7. Project ways in which they will or could work with dying patients.
8. Understand how they, as nurses/pharmacists and human beings, can assist dying patients.

UNIVERSITY OF MINNESOTA
School of Nursing

Guidelines for Degree Credit Courses Outside the Twin Cities

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| a. Resources | a. the outside group requesting course(s) will assume financial responsibility for all resources, including faculty, physical facilities, related services, and locally provided supportive courses |
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| b. Mission and Role | <p>b. 1.</p> <ul style="list-style-type: none">- Role of the School of Nursing may be one of consultation or direct service- The consultation/facilitator role may include:<ul style="list-style-type: none">consultation in leadershipconsultation on demonstration pilot projects, esp. undergraduate levelfacilitating local take-over of courses at termination of demonstration, if mutually desireddirect services may range from offering a single course to a complete degree- A definite contract should be formulated that specifies goals, time allotments and budget <p>b. 2. Graduate course offerings:</p> <ul style="list-style-type: none">- would focus on providing direct service.- courses may differ from those offered in our own graduate program.- if a group like the U of N Dakota started their own program, our role would probably change from direct service to consultation. |
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| c. Relationship to Present Curriculum | <p>c. - in cases where the U of M gives the degree, objectives should be congruent with our philosophy, and the program planning group should give evidence to that effect, and there should be common terminal objectives</p> <ul style="list-style-type: none">- both consultation and direct service are feasible roles for the School of Nursing to assume- for State Board approval and for League accreditation of our extended programs, we should plan close similarity to our present curriculum (i.e., as an arm of regular program, our approval and accreditation should cover it) |
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| d. Relationship to State-wide plan for nursing education | <p>d. - all programs should have a reasonable potential for approval by HECC and the State Board of Nursing and for NLN Accreditation</p> <ul style="list-style-type: none">- graduate programs would require graduate school approval as well as meet the School of Nursing's terminal objectives- it would be the responsibility of the local area to determine desirable numerical mix of generic students with career mobilist students and to obtain HECC approval. This may mean a decrease in numbers of locally educated AD and diploma students to accommodate baccalaureate students under HECC guidelines. |
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- e. Evidence of Need and Commitment
- e. - the local area should be responsible for collecting and presenting data to us to demonstrate need for the desired courses and program
 - the local area should be able to identify how many people actually would take the course offered
 - the local area would assume responsibility for computing the number of students necessary to make economically feasible to provide course offerings
 - the number of students would depend on resources available; e.g., financial, available faculty, etc.
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- f. Definition of qualified students
- f. - operating admission criteria and selection policies should be the same as for our regular program.
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g. Other considerations.

We would agree that rationale for direct service or consultation be based on any or a combination of the following:

- a) Provide career mobility opportunities in Non-Twin Cities areas.
- b) Provide an option for generic programs in Non-Twin Cities areas.
- c) Use resources and facilities more effectively around the state.

Areas of concern in the past have been:

- 1) the length of residence and transfer, especially for graduate school.
- 2) transfer of upper division courses in basic sciences in undergraduate program.

Other areas to be considered included:

- 1) Relationship with local educational institutions
 - a) other nursing schools
 - b) for other supportive courses
- 2) Relationship to present faculty
- 3) Availability of clinical facilities

Admission procedures should be comparable to the Twin Cities campus practices and should be outlined in the contractual agreement.

In light of all our school goals we would put high priority on initial consultation. Subsequently, the priority of other activities will be determined upon school goals.

We suggest, for internal functioning at the present time, requests should be routed to EPPC for coordination of school consideration.

UNIVERSITY OF MINNESOTA
School of Nursing

Guidelines to Assure Quality Control for Degree Credit
Courses Outside the Minneapolis Campus

Purpose of Guidelines:

1. Provide assurance to those submitting requests that courses presented in their area will represent the same quality as on-campus offerings.
2. Provide assurance to U of M that credits and/or degrees granted for coursework outside the Minneapolis campus reflect the same quality of preparation and be based on the same objectives as coursework provided on the Minneapolis campus.

I. Faculty
Qualifications
and Recruitment

- a. Recruitment must be both internal and external.
- b. Applicants must have same qualifications as other faculty members
- c. Applicants must go through regular faculty recruitment channels and be recommended for appointment
- d. Final decision on the selection of faculty would be the jurisdiction of the U of M School of Nursing

II. Type of
Appointment

- a. Actual appointments must be Full-time, part-time, regular, temporary or joint appointments with salary and benefits as specified by University and School of Nursing policies
- b. Members of the regular faculty of the School of Nursing who move into the new offerings would retain their same appointment, i.e., if regular, would keep a regular appointment
- c. Faculty hired especially for new offerings would usually receive a temporary appointment
- d. New faculty hired for the Minneapolis campus offerings to replace faculty moving into the new offerings would usually receive temporary appointments.
- e. Opportunity would be open for faculty with a temporary appointment to be considered for a regular appointment if vacancies should arise on the regular faculty.

III. Definition of
Qualified
Students

Operating admission criteria and selection policies will be the same as for our regular program.

IV. Providing
Continuity with
School of
Nursing
Curriculum

1. If a single course is being offered at least one faculty member who is experienced with the appropriate curriculum here should be a part of the teaching group, preferably a full-time teaching member.
2. If an entire program is being offered, it is suggested that the ratio of experienced U of M faculty to new faculty be 1:3.
3. Assignment of present faculty to new offerings
 - a. Faculty members who want to be considered should make their request to the Faculty, Student, Staff Welfare and Resources Committee.
 - b. Assignment of present faculty to these offerings would be contingent on the consent of the individual involved.

4. There would be the possibility for movement of faculty between the Minneapolis Campus and other offerings when appropriate.
5. Once the offerings are well established and faculty have some experience with the curriculum it might be possible to maintain continuity by assigning someone to serve as an ongoing liaison between the Minneapolis faculty and other teaching groups.

V. Continuity of Curriculum

1. The Curriculum Development and Evaluation Committee would consult with faculty as they made plans for specific courses to be offered and would also serve as a screening mechanism for consistency with School of Nursing philosophy, objectives and theoretical framework.
 2. Faculty from offerings outside the Minneapolis campus would have representation as members of the faculty on appropriate faculty committees as well as other teaching groups if there are groups on the Minneapolis campus concerned with similar offerings. This would provide input for the Minneapolis faculty as well as promoting consistency with various offerings.
 3. Teaching groups for course offerings outside the Minneapolis campus would not have the authority to make independent curriculum decisions.
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Suggestions for orientation of new faculty for these offerings (some suggestions)

1. Involvement in teaching on Minneapolis campus for 1 quarter.
2. Team from current faculty go out and work with new faculty.
3. Develop intensive learning experience with curriculum concepts, apart from other orientation activities.

Approved by General Faculty 4/10/74

CK:scg 4/5/74 :vl 2/19/75