69-16, 176

RANDALL, Joyce Lorraine, 1919-A STUDY OF THE EMERGENCE AND DEVELOPMENT OF AN ASSOCIATE DEGREE NURSING CURRICULUM AT LANSING COMMUNITY COLLEGE, LANSING, MICHIGAN.

Michigan State University, Ph.D., 1969 Education, general

University Microfilms, Inc., Ann Arbor, Michigan

JOYCE LORRAINE RANDALL 1969

ALL RIGHTS RESERVED

A STUDY OF THE EMERGENCE AND DEVELOPMENT OF AN ASSOCIATE DEGREE NURSING CURRICULUM AT LANSING COMMUNITY COLLEGE, LANSING, MICHIGAN

By

Joyce Lorraine Randall

A THESIS

Submitted to
Michigan State University
in partial fulfillment of the requirements
for the degree of

DOCTOR OF PHILOSOPHY

College of Education

1969

ABSTRACT

A STUDY OF THE EMERGENCE AND DEVELOPMENT OF AN ASSOCIATE DEGREE NURSING CURRICULUM AT LANSING COMMUNITY COLLEGE, LANSING, MICHIGAN

By

Joyce Lorraine Randall

The purpose of this study was to collect and analyze
empirical and descriptive evidence concerning the planning phase of
a curriculum for an associate degree nursing program. This study
developed from a previous study conducted by the author on the need
and feasibility of establishing a two-year nursing program at the
Lansing Community College. The results of the first study clearly
documented such a need. The study and recommendations were
accepted by the Board of Trustees, the Administration and faculty,
and the Advisory Council of the Lansing Community College.

The present study is a compilation of an account of the emergence and development of the curriculum of the Lansing Community College Associate Degree Nursing Program. This study was developed due to the encouragement given me by my doctoral

committee and my professional colleagues to supplement the earlier study by additional exploration, analysis, description, and proposals. It was felt that this study would benefit community college administrators, faculty, and nurse educators contemplating the establishment of an associate degree nursing program.

Literature was reviewed which presented views of general and nursing educators which would contribute to the understanding and background knowledge necessary for the planning of a new curriculum. The areas included in the review were the function of education, values and beliefs, the learning process, curriculum theory, determination of educational objectives, guides to the selection of learning experiences, characteristics of a discipline, social forces which contribute to the need for change in education, the process of organizing content, the re-education of teachers, characteristics of a new two-year nursing program, and an experimental audio-tutorial systems approach to learning.

These particular areas were chosen to assist the nurse educator, faced with the problem of developing a new curriculum, in recognizing the various concepts of curriculum planning which must be studied in depth prior to the selection of subject material.

The review of the national, State of Michigan, and Lansing
Community College requirements for establishing the new nursing

program indicated the need for careful planning of the curriculum in order to meet all of these requirements.

The results of the survey of educational facilities at the Lansing Community College gave evidence that a nursing program could use these facilities with careful planning. It was important to note that the approval from the Michigan Board of Nursing would be based on the fact that new facilities would be available in the near future.

According to the results of the hospital surveys which were conducted, there are many excellent clinical facilities available for selected learning experiences for students. It was also noted that the community is rich in related health-service agencies which are not adequately utilized in existing nursing education programs.

Meetings were held throughout the study with administrators and faculty of the Lansing Community College and with the Nurse Education Consultant from the Michigan Board of Nursing. The purpose of these meetings was to determine the areas for investigation and to discuss and draw conclusions from the results of the investigations. This group was called the Nurse Study Group.

The philosophy and purpose of the college and the general philosophy of associate degree nursing programs were studied.

Discussion of the Nurse Study Group led to the selection of general education courses which would meet the proposed objectives of the nursing program. Nursing courses were proposed and these were combined with the general education courses to formulate the proposed curriculum pattern for the associate degree nursing program at the Lansing Community College.

Conclusions which were drawn with regard to the purpose of the study were:

- 1. The Nurse Study Group was in accord that the discussions on general education and the new two-year nursing programs contributed greatly to the understanding and the planning of the curriculum.
- 2. The support and assistance given throughout the study, by the Administrators and faculty of the Lansing Community College, contributed to the success of the curriculum planning sessions.
- 3. It was found that health agencies are all increasing in size, the population continues to increase, nurses are expected to assume more responsibility, and fewer nurses are being graduated from schools of nursing.
- 4. It was established, by the Nursing Study Group, that national, state, and college requirements for

- establishing an associate degree nursing program were rather broad and general and could be met at the Lansing Community College without difficulty.
- 5. The survey of educational facilities at the Lansing Community College gave evidence of limited facilities at present but plans presented for the near future assured very good facilities.
- 6. The survey of clinical facilities of the four major hospitals in the area indicated that excellent learning experiences could be selected for students. It was also noted that extreme care must be taken in planning and scheduling these facilities due to the number of students that would be on the wards at certain periods.
- 7. The philosophies of the Lansing Community College and the proposed nursing program were studied. It was determined, by the Nurse Study Group, that the nursing program could become an integral part of the college since the philosophies were comparable.
- 8. Specific objectives were formulated for the associate degree nursing program. These were based on the probable needs of the nursing students and on the needs of the community.

9. Eight meetings of the Nurse Study Group resulted in the final selection of appropriate general education courses and nursing education courses were proposed. A curriculum pattern evolved from these meetings.

Recommendations of the study include:

- 1. It is highly recommended that nursing faculty be appointed at least six months prior to the opening of an associate degree nursing program. Nursing faculty would benefit from all of the planning sessions and should participate in all planning.
- Studies should be conducted to determine the need for inclusion of a year or less of chemistry, and if chemistry should be included in an integrated science course.
- The nursing faculty appointed for this program should develop the philosophy and objectives with the director of the program.
- 4. Careful planning will be necessary for use of the clinical facilities due to use by other schools of nursing.
- 5. Evaluation techniques should be developed at the same time that definite objectives are formulated.
- 6. Continuous evaluation should take place in order that the curriculum be continuously improved.

- 7. Formal agreements should be made between the college and the health agencies which will be utilized for student experience.
- 8. Formal agreements should contain a statement that all instruction of nursing students would be by college faculty.
- 9. Scholarships for students should be investigated.
- A recruitment program should be organized for the people of the community.

This study was focused upon the emergence and development of a curriculum pattern for the Lansing Community College. It is hoped that the study will contribute to the background knowledge and understanding of other educators who may be attempting to develop a new associate degree nursing program in a community college setting.

ACKNOWLEDGMENTS

I would like to acknowledge the assistance and encouragement given me by the members of my Doctoral Guidance Committee:

Dr. Walter E. Freeman, Dr. Vernon Hicks, Dr. David Smith, and

Dr. Edward Schuler. I particularly wish to express my deep appreciation to Dr. Troy L. Stearns, Chairman of my Doctoral Committee, for his continuous encouragment, support and guidance throughout all phases of my doctoral program.

The writer is also indebted to President Philip J. Ganon, of the Lansing Community College, for the opportunity given to conduct this study as the appointed director of the associate degree nursing program. Appreciation is also extended to the arts and science faculty for their many valuable suggestions and support.

I am also most grateful for the assistance of Miss Mildred
Seyler, former Nursing Education Consultant for the Michigan Board
of Nursing.

This study would not have been carried to completion without the encouragement rendered by my colleagues, friends, and family. I owe particular gratitude to my daughter, Sharon, and to my three sons, Richard, Craig, and Robert, for their understanding and wholehearted support.

TABLE OF CONTENTS

		Page
ACKNOWLE	EDGMENTS	iii
CHAPTER		
I.	INTRODUCTION TO THE STUDY	1
	Introduction	1
	Statement of the Problem	3
	Significance of the Study	5
	Scope and Overview of the Study	7
	Delimitations	8
	Definition of Terms	8
	Historical Background for the Study	12
II.	REVIEW OF RELATED LITERATURE	15
	Introduction	15
	Section I	16
	Selected Studies in the Area of Education .	16
	Section II	31
	Selected Studies in the Area of Nursing	
	EducationTwo-year Programs	31
	Summary	40
III.	METHODOLOGY AND PROCEDURES	41
	Introduction	41
	Sources of Data	43
	Procedures for Data Collection	46
	Summary	49

CHAPTER		Page
IV.	BASIC DETERMINANTS OF A NURSING CURRICULUM	51
		01
	Introduction	51
	Community Need and Feasibility	52
	National and Regional Requirements	
	State and College Requirements	57
	Survey of Educational Facilities at the	
	Lansing Community College	60
	Survey of Clinical Facilities at Lansing	
	Area Hospitals	62
	Summary	6 9
V.	AN EMERGING CURRICULUM PLAN	71
	Introduction	71
	Philosophy and Purpose of the Lansing	11
	Community College	75
	Philosophy and Purpose of the Associate	
	Degree Nursing Program	78
•	General Education Courses	
	Nursing Education Courses	
	The Curriculum Pattern	
	Summary	86
VI.	SUMMARY, CONCLUSIONS, RECOMMENDA- TIONS AND SUGGESTIONS FOR FURTHER	
	STUDY	89
	Summary	89
	Conclusions	90
	Recommendations	92
	Suggestions for Further Study	
APPENDIX		
Α.	STATE-BY-STATE GROWTH OF ASSOCIATE	0.6
	DEGREE NURSING PROGRAMS1962-1967	96
В.	ASSOCIATE DEGREE NURSING PROGRAMS	
	BY HIGHER EDUCATION ACCREDITING REGIONS	97

Page
. 98
. 99
. 107
. 109
. 113
. 118

CHAPTER I

INTRODUCTION TO THE STUDY

Introduction

In December, 1965, the American Nurses Association published a position paper on Nursing Education in the American Journal of Nursing. The purpose of the paper was to report to members of the profession on a two-year study made by nursing leaders and by educators on the nature and scope of nursing practice and the type and quality of education needed by nursing practitioners. The immediate effect of the report on the nursing profession was to bring into the open the controversy concerning the many levels of nursing education—one year, two year, three year, and four year programs. The report also brought recognition of the rapid rise nationally in the number of two-year associate degree nursing programs. The recommendations made by the American Nurses Association in the report were:

1. The education for all those who are licensed to practice nursing should take place in institutions of higher education.

- 2. Minimum preparation for beginning professional nursing practice at the present time should be baccalaureate degree education in nursing.
- 3. Minimum preparation for beginning technical nursing practice at the present time should be associate degree education in nursing. (27:107)

One of the most controversial statements in the report was one which predicted that in the near future there would be only two levels of nursing education for the undergraduate student: the four-year baccalaureate nursing degree earned in a four-year university or college and the two-year associate nursing degree earned in a two-year community college.

In essence the report was official professional recognition of the more than 200 associate degree nursing programs already established in community or junior colleges across the nation.

Though an attempt was made in the report to define "professional" and "technical" nursing practice, the authors made no reference to changes in the curriculum which would ultimately produce nurses at these two educational levels. The effect was not one of reassurance to the leaders and directors of the two-year associate degree programs since they were committed to establishing a curriculum which would produce the "technical" nurse. The controversy over the definition of "professional" and "technical" nurse continues at present. Assistance is being given in interpretation by leaders in education, psychology, sociology, business, labor, and industry.

A study of the existing associate degree nursing programs by the professional accrediting agency--the National League for Nursing--gave evidence that there were almost as many differences in the two-year nursing curriculums as there were programs. (35:23)

Statement of the Problem

The purpose of this study was to analyze the necessary steps involved in the pre-planning phase of a curriculum for a relatively new program in professional nursing education. underlying problem which gave rise to the need for this analysis is the rapid growth of community colleges accompanied by rapid growth of associate degree nursing programs in these colleges. Due to this rapid growth in number of programs, it has become nearly impossible to obtain the service of qualified nursing directors. The term "qualified" meaning with administrative and teaching experience in nursing education and experience in planning, directing, and evaluating a nursing education program in an institution of higher education. In a meeting with Michigan directors of associate degree nursing programs it was found that seven out of eleven directors attending were appointed a month prior to the opening of the school year with the hope that a curriculum could be planned in time for the first term or semester. Where this situation has occurred it should also be

noted that college officials have been realistic enough to allow the directors to attend workshops and conferences which would assist in this "on-the-job" training. This study emphasized the need for preplanning of the curriculum and describes the implementation of a planned curriculum for the Associate Degree Nursing Program to be established in Lansing Community College, Lansing, Michigan.

The present study was preceded by a two-year study, (1962-1964), by the author, to determine the need and feasibility of establishing a two-year nursing program at Lansing Community College. The results of the first study clearly documented the need and feasibility for the establishment of a two-year nursing program. The study and recommendations were accepted by the Board of Trustees, the Administration and Faculty, and the Advisory Council of the Lansing Community College.

The specific dimensions for which data were collected for the first study included the community's immediate need for nurses, the number of nurses employed and the number of budgeted vacancies, the number of high school graduates who might enter the nursing field, the type and number of schools of nursing in the area and the number of graduates each year, the number of graduates remaining in the area to work, the educational and clinical facilities that might be utilized, the financial support available and the number of available qualified faculty.

The present study is a compilation of an account of the emergence and development of the Lansing Community College Associate Degree Nursing Program. This study developed due to the encouragement given me by my doctoral committee and my professional colleagues to supplement the earlier study by additional exploration, analysis, description, and proposals. It was felt that this study would benefit community college administrators, faculty, and nurse educators contemplating the establishment of an associate degree nursing program.

Specific data for this study were collected on national and state requirements for accreditation, curriculum requirements of the Michigan Board of Nursing, philosophy and purpose of associate degree nursing programs and the philosophy and purpose of the Lansing Community College, curriculum programs for associate degree nursing currently in use in Michigan, specific educational and clinical facilities available in the Lansing area, and course content in general education courses at the Lansing Community College that might contribute to or become a part of the nursing education curriculum.

Significance of the Study

It was significant that a preliminary search of the literature revealed no study which describes or analyzes the emergence of a

curriculum pattern for this new type of nursing program related to the health needs of the community and which will utilize the nursing services provided.

It was hoped that this study would contribute to the background knowledge and understanding of other nurse educators who may be attempting to develop a new nursing curriculum in a community college setting.

The scope of any proposed curriculum in the para-medical field poses problems when one considers the rapid advances in science and medicine. Scientific knowledge must be utilized on a basis for both professional and technical nursing education. Nurse educators agree, "The primary aim of nursing education is to provide an environment in which the nursing student can develop self-discipline, intellectual curiosity, the ability to think clearly, and acquire the knowledge necessary for practice." (35:21)

This study attempted to show that the Lansing Community

College offered the potential for an educational environment necessary for the growth and effectiveness of the associate degree nursing program in achieving this aim.

The importance of the present study is the planning and the implementation of a two-year nursing curriculum at the Lansing Community College. This curriculum will provide the scientific

base, the technical skills and the opportunity to develop skills, along with the evolving theory needed by the practicing nurse.

Scope and Overview of the Study

The study was limited to the pre-planning phase of the curriculum for the Associate Degree Nursing Program to be established at the Lansing Community College, Lansing, Michigan.

Chapter Two combined a review of related literature in the field of education and in the more specific area of nursing education and two-year nursing programs.

Chapter Three is a descriptive account of methods and procedures utilized as a basis for preliminary planning of the nursing curriculum.

Chapter Four is a presentation of the basic determinants of the nursing curriculum.

Chapter Five is an account of how the data were analyzed and describes the specific curriculum for the two-year nursing program at the Lansing Community College.

Chapter Six contains a summary, conclusions which were drawn from the analysis of the data, recommendations, and suggestions for further research in the area of pre-planning for a two-year nursing curriculum.

Delimitations

- This study will be confined to an analysis of the steps leading to the emergence and development of a curriculum plan for a new Associate Degree Nursing Program.
- II This study will be confined to the Tri-county area

 (Clinton, Eaton, and Ingham Counties of Michigan),

 with Lansing Community College, Lansing, Michigan,
 as the focal point.

Definition of Terms

The Associate Degree Nursing Program:

(Length--two years). Defined by the Michigan Board of Nursing as: "A program in nursing leading to an associate degree, is conducted by an educational unit in nursing (department or division) that is an integral part of a community or junior college and is organized and controlled in the same way as similar units in the institution."

Associate Degree Nursing Curriculum:

Defined by the National League for Nursing, 1967: "Refers to course content, instruction, and sequential arrangement of courses leading to the associate degree in nursing."

The Diploma Program:

(Length--three years). Defined by the Michigan Board of Nursing as: "A program leading to a diploma in nursing is conducted by a single-purpose school under the control of a hospital or other authority."

The Baccalaureate Degree Program:

(Length--may be four or five years). Defined by the Michigan Board of Nursing as: "A program in nursing leading to a baccalaureate degree is conducted by an educational unit in nursing (department, division, school or college) that is an integral part of senior college or university and is organized and controlled in the same way as similar units in the institution."

Nursing Laboratory:

Defined by the National League for Nursing, 1967: "Includes the hospital(s), other community agencies, and/or the laboratory areas within the college plant that are designated for students' planned learning activities."

Pre-planning Phase:

A one-year period of study previous to the establishing of an Associate Degree Nursing Program in a Community College. This study to include the need and feasibility for such a program; the educational and clinical facilities available; the selection of qualified faculty; the provision of an adequate budget; and the overall curriculum planning.

Professional Nursing:

Defined by the American Nurses Association, 1955, as:

"The practice of professional nursing means the performance for compensation of any act in the observance, care, and counsel of the ill, injured, or infirm, or in the maintenance of health or prevention of illness of others, or in the supervision and teaching of other personnel, or in the administration of medications and treatments as prescribed by a licensed physician or dentist; requiring substantial specialized judgment and skill and based on knowledge and application of the principles of biological, physical, and social science. The foregoing shall not be deemed to include acts of diagnosis or prescription of therapeutic or corrective measures."

Technical Nurse:

Defined by the National League for Nursing, 1967: "A registered nurse with an associate degree licensed for the practice of nursing who carries out nursing and other therapeutic measures with a high degree of skill, using

principles from an ever-expanding body of science. The technical nurse performs nursing functions with patients who are under the supervision of a physician and/or professional nurse and assists in planning the day-to-day care of patients, evaluating the patients' physical and emotional reactions to therapy, taking measures to alleviate distress, using treatment modalities with knowledge and precision, and supervising other workers in the technical aspects of care."

Technical Nursing:

The American Journal of Nursing, December, 1965:

"Nursing practice which is unlimited in depth but limited in scope. Its complexity and extent are tremendous. It must be rendered, under the direction of professional nurse practitioners, by persons who are selected with and educated within the system of higher education. . . . Education for this practice requires attention to scientific laws and to scientific principles with emphasis on skill. It is education which is technically oriented and scientifically founded, but not primarily concerned with evolving theory."

Practical Nursing:

(Program length--approximately one year. Varies nationally from ten months to eighteen months.) Defined by State of

Michigan Nursing Practice Act of 1967 as: "Practice of practical nursing means the performance for compensation of acts in the care, treatment or observation of the ill, injured or infirm, or for the maintenance of the health or the prevention of illness of others, performed in accordance with education and preparation which has provided the practitioner with a lesser degree of specialized skill, knowledge, education or training than that required to practice as a registered nurse. A licensed practical nurse shall perform such acts only under the direction of a registered nurse or licensed physician or dentist."

Historical Background for the Study

In 1949 the National League of Nursing Education proposed to the American Association of Junior Colleges that a committee be formed to study ways in which junior colleges could participate in nursing education. In 1952 the nursing organization was reorganized and was named the National League for Nursing. At this time provision was made within the League for a Department of Diploma and Associate Degree Programs.

Under the auspices of the American Association of Junior
Colleges and the National League for Nursing an experimental
program was conducted, under the direction of Mildred L. Montag,

Professor of Nursing Education, Teachers College, Columbia University. This experiment, the "Cooperative Research Project in Junior and Community Colleges for Nursing," resulted in an entirely new type of program in nursing education -- the two-year associate degree program.

Montag's book, Community College Education for Nursing, is a report of this five year project -- (1952-1957). The report was -published in 1959. The Cooperative Research Project included eight participating schools: five two-year junior colleges, two fouryear institutions of higher education, and one hospital school of nursing. These schools were assisted in developing nursing programs that would prepare a nurse graduate who could qualify for licensure as a registered nurse, and as a graduate of the seven collegiate programs could meet the colleges' requirements for an associate degree. The report stated that the unique characteristics of these seven collegiate associate degree nursing programs were:

- 1) they were not diploma programs transplanted into college settings;
- 2) they were not truncated or diluted baccalaureate degree programs;
- 3) they were an entirely new type of nursing program. (13:v)

It was also noted in the report that the associate degree nursing programs adhered to a general philosophy for these programs but each differed in specific statements of philosophy according to the college in which it was integrated.

By 1959 the number of associate degree nursing programs had grown to 48. Today there are approximately 215 programs; the majority are being conducted within community colleges.

The community college has been called the fastest growing collegiate enterprise in America today. Leading educators feel that its major purpose remains unchanged--providing essential services to meet the community's needs.

CHAPTER II

REVIEW OF RELATED LITERATURE

Introduction

This study utilized both general education and nursing education concepts of curriculum planning proposed by leaders in these areas. The review of related literature included basic philosophies, definitions, and values and beliefs of the authors. Emphasis is on fairly current inquiry in these areas. Selection of related research was made on the basis of providing an overview of the major factors in curriculum development. The first section of literature viewed as appropriate for this study was focused on the general area of education; the second section dealt with studies in the area of nursing education—two—year programs.

Specific areas which are reviewed in this chapter are: The function of education, the learning process, curriculum theory, determination of educational objectives, guides used in the selection of learning experiences, characteristics of a discipline, social forces contributing to a change in education, the process of

organizing content, re-education of teachers, the characteristics of the new two-year nursing programs, and an experimental audiotutorial systems approach to learning.

These areas were chosen to assist the college administrator and faculty, and the nurse educator, faced with the problem of developing a new nursing curriculum, in recognizing the various concepts of curriculum planning which must be studied prior to selection of subject material.

Section I

Selected Studies in the Area of Education

Saylor has voiced the opinion of educators when he stated that there is a large body of skills, knowledge, attitudes, appreciations, ways of working, and ways of behaving that should be learned in common by all. (17:55) He also stated that education must primarily seek character and behavior, all-round character of a kind to lead to proper behavior leading to a well-adjusted personality. Education must be concerned with the development of the total personality including behavior, attitudes, character, value patterns, and human relations. Saylor postulated that curriculum decisions are philosophical decisions—they represent a choice of values. (17:82)

One of the major issues in education today is the lack of emphasis on values in the development of a curriculum. Carpenter, in a discussion of this issue, writes, "It is even possible that there can be neither intellectual integrity nor freedom unless we insist upon critical thinking about our own attitudes towards the discoveries of our times, and unless we know how to re-examine our own lives in the light of the values to which we give priority." (5:xv) Saylor quotes Huston Smith as making the following statement, "That there is a lostness, and anxiousness, a bewilderment in contemporary life which the arts express and statistics on . . . delinquency, divorce, insanity, and alcoholism . . . confirm." (17:1) Smith is further quoted in answer to the question of the function of education, "It has the means by which the adult generation transmits to the oncoming generation the internal equipment it deems necessary for the good life--knowledge, skills, appreciations, and motivations." (17:2) Carpenter feels that the American college does not see it as its task to further human virtues as a whole. It restricts its responsibility to intellectual virtues. Intellectual attitude analyzed yields intellectual virtues such as:

- a. Intellectual honesty: the determination, insofar as possible, to keep personal bias from distorting one's vision of things.
- b. Scope of knowledge. Other things being equal, a rich and varied stock of information renders life more interesting and competent.

- c. Dialectical agility, or "sharpness" as we say. Not only should minds be informed; they should be able to work with their information nimbly, skillfully, and in an orderly fashion.
- d. Aesthetic sensitivity.

These, Carpenter stated, are the values colleges as institutions really believe in. Other values which she discussed were diligence, moral honesty, and academic freedom. (5:4) It was further stated that the general feeling among faculties was that virtues of this sort were not the responsibility of the college. It was pointed out:

- a. Enlightment view of man--reason is the key to the good life. Free the mind of superstition and ignorance and it will prove capable of discerning the good and persuading the rest of the self to follow it.
- b. The belief that all values are relative. Anthropology's doctrine of cultural relativism, philosophy's emotive theory of value, psychology's discoveries about conditioning, and existentialism's thesis that existence precedes essence have combined to create an impression in the academic mind that values are arbitrary in the sense that there being no universally valid standards by which to judge better from worse. Such a view reduces the urgency of value instruction.
- c. The Cult of objectivity--the less education gets entangled with preferences and emotion--the better it will be able to perform its appointed task.
- d. Division of labor--(doubt that the place to nuture values is in the college). Value concerns distract from truth (home and church should look after moral values).
- e. Respect for autonomy--students should be free to shape their own values--should have freedom, individuality, autonomy, and subjective self-hood. (5:6)

Stratemeyer claims that any curriculum design stems from a set of values--fundamental beliefs relating to the type of citizen desired and the part to be played by the school in his development.

She lists the following as critical factors in curriculum development:

- 1. need to consider the nature of society and of learner
- 2. recognition of what has meaning for the learner
- 3. concern for society's basic values. (20:86)

A similar statement made by Saylor is that the most important influence in shaping the curriculum of any school is the cultural pattern and value system of the society that establishes and supports the school. He further stated that teachers and all educators should:

- 1. understand thoroughly the basic social aims and values which the American people accept
- 2. assume an active role in helping citizens themselves more thoroughly analyze and understand these values
- 3. seek a broad base of decision-making so that minority opinion and the views of pressure groups or vested interest groups are not mistakenly assumed to be the voice of the people. (17:81)

A statement of values is made in the book Schools for the Sixties as follows: "Every society is directed and sustained by a core of values which represents its ideals, its standards, and its norms of what is desirable." (18:7) The National Committee reporting in this book also states that the following values are vital as criteria for assessing present practices and as guides to future improvement of our schools:

- 1. Respect for the worth and dignity of every individual
- 2. Equality of opportunity for all children
- 3. Encouragement of variability

In the 1957 Yearbook of the National Education Association, curriculum development is described as, "Identification and analysis of the problem, development of new insights and perspectives—an analysis of needs which requires reorientation of the conceptions and attitudes regarding what is important in learning and teaching."

(17:62) This report further stated.

The persistent problem of all education is simply the problem of influencing the behavior of individuals in desired ways to the result of educational experiences. Education is concerned with learning. Any knowledge which enables us to understand how human beings develop and learn is basic knowledge in curriculum study and development. Education is social in its nature and setting. Studies of the role of the school in the community and in society, of the nature of persistent problems of living, and of normative behavior, illustrate studies suggested by the social nature of education. (17:85)

In Foundations of Curriculum Planning and Development
Hugh B. Wood stated,

The most practical method of determining educational objectives for modern education is the needs-centered method, which is based on analysis and introspection. All needs are individual because they concern the individual, either as a single person or as a member of a group. But we must recognize and deal with the basic needs of the community . . . and those of the broader world order, as well as those of the individual himself-always mindful of their various interrelationships--there is a danger of over emphasis of self to the detriment of the social welfare. (21:84)

The philosophy of learning must be considered when planning any curriculum. Kilpatrick summarizes a philosophy of learning in the following four principles:

- 1. Learning has taken place when any part or aspect of the ongoing experience remains with one to come back later at the appropriate time into the life process to help shape that process.
- 2. I learn what I live and I learn it as I accept it to live by it.
- 3. Anything—a thought, an attitude, a bodily movement—has been learned in the degree that it therefore tends to get back into life at the right time to play there its appropriate part.
- 4. I learn anything in the degree that I live it, in the degree that I count it important for me to know and use it, and further in the degree that I understand it and can fit it in with what I already know and believe. (19:95)

The basic principles of learning as recommended by Hugh B.

Wood are described as the natural process of the human organism interacting in its environment:

- a) Learning is the result of the constant efforts of the organism to maintain a normal equilibrium and balance:
- b). The immediate environment, together with one's past experiences, provides the source of all new meanings-the richer the environment, the greater, more significant, and richer the meanings;
- c) All learning is based on the ability of the learner to 1) associate the values or learnings of previous experiences, with new situations in which they are pertinent, 2) create new responses or patterns of behavior to fit the new situations, and 3) incorporate or integrate the resulting values in the organism for subsequent use;
- d) Learning is active, not passive; the learner must be active mentally, emotionally, physiologically, and/or physically if learning is to take place--knowledge, concepts, principles, attitudes, skills, appreciations--all types of learnings--emerge from, and are the product of, an experience, either actual or vicarious. (21:99)

Criteria to be used as guides to the selection of learning experiences are given by Wood:

- 1. A learning experience should satisfy a recognized need. (Goals and purposes of the learner are attained)
- 2. A learning experience should be appropriate to the maturity and understanding of the learner.
- 3. A learning experience should build toward consistent, continuing and dynamic goals.

 (Learner must recognize long-term or life-time goals)
- 4. A learning experience should be based on social values. (Experiences based on socially accepted goals)
- 5. A learning experience preferably should be positive.
 (Negative experiences may have a strong learning value but are a threat to individual and social welfare)
- 6. A learning experience should be realistic.
 (Little real learning takes place in artificial situations)
- 7. A learning experience should be efficient.

 (Maximum amount of learning should take place in the least amount of time, effort, and expense)
- 8. A learning experience should not be limited by artificial barriers such as the four walls of the classroom, subject-matter lines . . . etc.
 (Reach out into the community for experiences)
- 9. A learning experience should involve total behavior. (Mental, muscular, emotional activity)
- A learning experience should be feasible of accomplishment. (21:114)

Basically, education has three major purposes; the transmissive, the adaptive, and the developmental. These purposes are described by Inlow as transmission of the past, adaptive to skills, knowledge and emotional adjustment, and developmental guidance toward growth and maturity. Inlow also stated,

Along the process dimension, we conceive curriculum as including such efforts of educational personnel as the following: (1) determining educational goals; (2) translating goals into the substance of learning; (3) selecting and employing instructional methods designed to make learning effective and economical; and (4) evaluating how well any educational echelon has achieved its predetermined goals. Along the product dimension, we conceive curriculum as including the tangible manifestations of

educational planning and implementation. Illustrative are statements of goals; the tangible results of instruction . . . and instruments and profiles of evaluation. (11:7)

Inlow also proposed,

Education, within the framework of approved cultural values, first carves out its operational goals and then implements them by selecting content from the traditional disciplines, from the emerging disciplines, and from the on-going social order. (11:23)

A well-designed curriculum should relate both to the present and to the future; it should reward students not only with immediate but with delayed benefits; it should reveal specific evidences of mastery while progressing down a path of long-term development. (11:26)

According to Inlow, "a discipline possesses three characteristics: it consists of knowledge and concepts that emanate from and relate to a given life area; it consists of demonstrable and describable methods of discovering and validating knowledge and hypotheses within that life area; and it is ever evolving." (11:9)

The fundamental purpose of a discipline is described by Inlow, "To develop in individuals disciplined thinking and disciplined attitudes, with the outcome a disciplined way of life." (11:18)

In <u>Schools for the Sixties</u>, the National Education Association's report of the project on instruction, it is stated,

The purpose which runs through and strengthens all other educational purposes—the common thread of education—is the development of the ability to think. The ability to think rationally, to use reason and evidence in solving problems and making decisions, extends one's control over the environment. Where immediate control is beyond the individual, the ability

to understand and follow the reasoning behind events and confusing issues brings some order to bear on situations in which people may otherwise retreat into apathy or react destructively with blind emotion. (18:iii)

In The Emerging Curriculum, Inlow defined thinking as,
"A quality to be released, not one to be injected into a learning—
organism." He further stated, "Thinking (problem solving) may be
taught in these three ways: 1) by a teacher removing the blockages
which stand in the way of thinking, 2) by a teacher's stimulating an
environment of learning, and 3) by a teacher's helping a learner to
proceduralize his thinking." (11:99)

Questions which the curriculum planner must be concerned with are raised by Inlow:

Is the curriculum in its totality extensive enough and flexible enough to relate to the uniqueness of each student? Does the curriculum have the sanction of such agencies of assessment as the state, the federal government, and the professional groups? Does it have unity? Does it lend itself to systematized instruction? Does it lead to further learning? Are curriculum content and curriculum organization in harmony? (11:27)

In Role of Supervisor and Curriculum Director in a Climate of Change, Ole Sand stated, "The aims of education should serve as a guide for making decisions about curricular organization as well as a guide for making decisions about all other aspects of the instructional program." (16:39) Sand also proposed an analysis of the forces which shape education:

a) analyzing three kinds of data-sources that are bases for decisions--including societal forces causing change,

knowledge of the human being as a learner and the accumulated body of organized knowledge about the world and man:

- b) screening the data from these sources against the values and educational aims which society sets for education;
- c) identifying important kinds of decision; and
- d) determining what can be and what should be. (16:31)

Two approaches discussed by Van Til and quoted by Inlow

are:

Educators may accept the tendencies of the times in which they find themselves and develop school programs which reflect all prevalent social forces. Or educators may appraise the tendencies of the times and develop school programs through which the learners can reflect upon and shape social forces. The second approach conceives the school as an instrument for the improvement of individuals and society. (11:16)

Sharp cautioned that the curriculum worker cannot presume to change either individuals or society in accordance with his views no matter how right he may think himself to be. He suggested the following as sources of data to be used in curriculum development: "Sociology and anthropology will yield clues to the nature of the society; child development has data on the nature of the young; social psychology, mental hygiene, and psychology of learning all provide insights into the nature of the process of integration, while educational philosophy and the history of education can clarify the role of the school." (19:16)

The report of the project on instruction by the National Education Association, 1963, contains several recommendations for

decision-making levels in education. These levels are described

as:

- I Societal level and educational decisions--this level would include school board members, state legislators, and federal officials. Decisions made at this level would include special programs for the handicapped, funds for closed circuit TV, financing of levels of education, school lands, rights of minority groups, etc.
- II Institutional level and educational decisions--would include administrators and teachers and would include the making of decisions on specific curricular sequences and relating of various subject-fields.
- III Instructional level and educational decisions--these decisions would be made by teachers and would include daily instructional decisions, units of work, selection of materials, and the setting up of learning situations. (18:13)

In the 1963 NEA report the following is given as a recommendation on deciding what to teach and ways of achieving balance:

The school can provide and maintain a curriculum which is appropriately balanced for each student by offering a comprehensive program of studies, making early and continuous assessment of individual potentialities and achievements, and providing individualized programs based on careful counseling. To avoid the imbalance that can result from limiting financial support to certain selected subjects and services, general financial support should be provided for the total program. This applies to local, state, and federal support. (18:47)

Another recommendation given in the above report sets a basis for selecting content:

Content earns its place in the curriculum by its contribution to the achievement of educational objectives. The establishment of the objectives. The establishment of the objectives should, therefore, precede any effort to determine content of the instructional program and to determine relative emphasis to be placed on various aspects of the program. (18:50)

In a discussion of decision-making, Doll suggested:

As soon as objectives have been accepted, means of evaluating their achievement should be sought. . . . Time gaps develop between formulation of objectives and their evaluation process is characteristically short-circuited by moving directly to the experiences through which objectives may be achieved. As soon as the objectives are clear, then, the means of their evaluation should be considered, and these means will in turn suggest learning experiences. (8:24)

Doll has also made suggestions on the utilization of the various disciplines in curriculum building. His reference to the contribution of psychology is as follows:

Psychology bears upon four facets of curriculum improvement: the objectives we establish for and with learners, the means we use in gauging the attainment of these objectives, and the ways in which we organize educational experiences, and the kinds of experiences we utilize to achieve the objectives. (8:21)

Further recommendations from the NEA 1963 report emphasized the above points:

Since the real purpose of education is to bring about desired changes in the behavior of students--changes in thinking, feeling, and acting--statements of objectives should indicate specifically the kinds of behavior sought. Each curriculum area should be under continuous study and evaluation and should be reviewed periodically. One purpose of such review is to determine whether recent findings in the academic disciplines are, or should be, reflected in the instructional program. The review should utilize the knowledge and skills of the teacher, the school administrator, the scholar in the academic disciplines, the scholar in the profession of teaching, and the lay citizen, each contributing his special competence to the total task. (18:51)

The process of organizing content also requires major decisions. Decisions must be made on the arrangement of learnings

in sequence so that one learning builds upon another. In considering these decisions the above report stated:

In making [these] decisions, one deals with the curriculum vertically. There are also problems of arranging learnings so that they support one another. In making these decisions, one views the curriculum horizontally. (48:58)

In School for the Sixties it is also recommended:

In each curricular area, the vertical organization of subject matter should take account of: a) the logical structure of the subject; b) the difficulty of material as related to the students intellectual maturity; c) the relation of the field to other fields. (48:67)

The content of the curriculum must be organized in such a way that students may be guided toward a mature utilization and organization of their knowledge. The above report stated, "Helping learners see interrelationships and achieve unity from the diversity of knowledge is basic to any organization of content." (48:58)

Ralph W. Tyler suggested the following questions with reference to an area of learning proposed for inclusion in the instructional program:

- 1. Is it learning that is based substantially upon bodies of organized knowledge, such as the arts and sciences?
- 2. Is it learning of complex and difficult things that requires organization of experience and distribution of practice over long periods of time?
- 3. Is it learning in which the essential factors must be brought specially to the attention of the learner?
- 4. Is it an experience that cannot be provided directly in the ordinary activities of daily living?
- 5. Is it learning that requires a more structured experience than is usually available in life outside the schools?

6. Is it learning that requires reexamination and interpretation of experience? (10:47)

Sharp's main thesis is, "The curriculum develops basically as the result of the development of teachers' personalities." He further stated the problem as, "Helping to reorganize the experience of many teachers who have been conditioned, trained, and successful in the use of traditional methods and values." (19:8)

In Teaching in a World of Change, Anderson proposed:

The nature of the tasks will depend on the teacher's skill as a clinical observer of each pupil and as a diagnostician of each pupil's needs. He is, in a sense, a student of learners—a professional scholar of children. This diagnostic relationship which resembles that of a physician to a young patient, serves as the principle basis for the teacher's educational planning and decisions. The teacher has certain knowledge, skills, insights, and attitudes and it is his responsibility to pass these on—either in a didactic fashion or in some indirect or subtle way. The teacher must also have a special commitment to the knowledge he is to teach. (2:16)

Anderson also discussed team teaching as a means of utilizing the experience and talents of the teacher who has been successful in the use of traditional methods. He defines team teaching as, "A formal type of cooperative staff organization in which a group of teachers accepts the responsibility for planning, carrying out, and evaluating an educational program, or some major portion of a program, for an aggregate of pupils." (2:83) Anderson does not propose that all teachers have the necessary qualifications for the role of team leader. He lists these qualifications as:

- 1. Above-average to superior talents as a classroom teacher.
- 2. A particular teaching strength.
- 3. Unusual ability in curriculum planning
 - a) analysis of instructional problems and procedures
 - b) diagnosis and evaluation of pupil behavior
- 4. Skills associated with group leadership and a sound understanding of group dynamics.
- 5. Ability to assume responsibilities associated with a leader's role. (2:86)

Sharp proposed the following as advice to the curriculum planner: "In working through his relationship with the staff, the curriculum worker should place consistent and continuous emphasis upon the human and individual aspects of problems rather than upon their official and institutional aspects." (19:iii)

Section II

Selected Studies in the Area of Nursing Education--Two-year Programs

Montag's report described the success of the Cooperative

Research Project in establishing seven collegiate level programs.

The increased need for terminal-education programs and the success of these seven programs combined to encourage community colleges to plan immediately to institute this new program for nursing.

In 1958 the National League for Nursing published, through the League Exchange, a report developed at a workshop on associate degree programs at the University of California. The report,

32

"Preliminary Steps in Establishing an Associate Degree Program in Nursing in the Junior College," confined itself to a discussion of questions as to the needs of a community and the basic factors in beginning a program. Qualifications of the nurse director and faculty were discussed as were problems of curriculum development and evaluation of available teaching facilities. (36:12)

A report published by Katherine Cafferty, through the <u>League</u> Exchange, in 1960, described the administrator's duties and responsibilities in organizing the program, and the various problems which must be faced in interpreting the program to personnel, new faculty, and to the surrounding community. (23:20-22)

In October 1961, the Department of Diploma and Associate

Degree Programs of the National League for Nursing published a list
and a discussion of "Characteristics of College-Controlled Programs
in Nurse Education Leading to an Associate Degree." The identifiable
characteristics of this college controlled program were listed as:

- 1. The program is controlled, financed, and administered by the college in the way that other programs in the college are controlled, financed, and administered.
- 2. This collegiate pattern makes it possible for the nursing program to utilize the over-all standards and policies of the college; the educational leadership of the institution, the administration, and the faculty; the interdisciplinary curriculum committees; and the student personnel program.
- 3. Policies and procedures pertaining to faculty personnel apply to the nursing faculty in the same way as to all other faculty members.
- 4. The nursing faculty plans, organizes and implements the nursing courses, and the nursing instructors select.

- supervise, and evaluate all learning experiences, including those in the clinical practice area.
- 5. By means of written agreements with hospitals and other agencies in the community, the college provides for clinical facilities essential to the learning of nursing.
- 6. Students meet the requirements of the college and its nursing program for admission, continuation of study, and graduation. They share in the responsibilities and privileges of the total student body. (24:2)

Another publication of the National League for Nursing which is very helpful in understanding this type of program is "Guiding Principles for Junior College Participation in Education for Nursing," published in December, 1961. In this report guiding principles are established and differentiation is made between the community college controlled associate degree nursing program and the instruction provided by the college for students of hospital controlled schools of nursing. (30:6)

At a biennial convention in Cleveland, Ohio, April, 1961, the National League for the Nursing Department of Diploma and Associate Degree Nursing Programs prepared statements for current programs in nursing. The associate degree program is described in the statements as a program which:

Provides a means of correlating the philosophy and standards of nursing education with those of general education. The overall standards and policies of the specific college apply to the program in nursing as well as to the other types of programs within the college. All share in (1) the educational leadership and administration of the college, (2) the cooperative responsibility of the whole faculty and the curriculum committees concerned with various fields of study in the college, (3) the benefits of the student personnel program.

The purpose of the programs, as defined in the National League statements:

The associate degree program is designed to fulfill the educational needs of qualified high school graduates who (1) want to prepare for nursing in a relatively short time, (2) want to study in a multi-purpose collegiate institution where they share responsibilities, privileges, intellectual and social experiences with other students.

A survey study conducted by the National League for Nursing of all associate degree nursing programs was published in 1961.

General characteristics of these programs were included in the study, Report on Associate Degree Programs in Nursing. The report expressed feelings of nurse educators:

Perhaps no aspect of associate degree programs in nursing has stimulated more interest among nursing educators than have their curriculums. To those who, for years, have been revising "old" curriculums, sometimes making considerable changes but still conforming to the traditional mold, the very thought of a fresh start in curriculum-building has been an exciting one. (37:10)

The above report dealt strictly with course content without reference to present day values and beliefs, function of education, or the major tasks of curriculum development.

In <u>Curriculum Development</u>, by Amy Frances Brown, the many factors related to planning a new curriculum were discussed. Brown related, "Values include aesthetic qualities, ideals, objects, and activities which learners are expected to develop loyalty to or interest in as a part of the educational program."

Brown explained the above statement:

An example would be regard for the dignity and worth of every individual. This would be an organizing element which might have been introduced first at home, or school, or church. Values become increasingly important to the nurse as she studies the ethical basis for behavior and applies what she learns to every facet of her nursing experience. Values appear to be the organizing elements which relate to such objectives as the development of attitudes, interests, and appreciations. From this value of the essential (inherent) dignity and worth of every individual stem several practices which must be understood in order to provide good medical and nursing care to the individual patients. (4:254)

Brown suggested a list of values categorized under these headings: attitudes toward self, attitudes toward others, attitudes toward social groups to which one belongs, and intellectual and aesthetic values. She also stated, "Acceptance of the democratic tenets does not require that our respect for the individual and our respect for his right to his own beliefs must also be accompanied by respect for the particular beliefs he holds." (4:255)

The Tylerian rationale of curriculum development was quoted by Brown as, "The four major tasks of curriculum development are: (1) formulation of educational goals, (2) selection of learning experiences by which students may attain these goals, (3) effective and efficient organization of these learning experiences, and (4) evaluation of the extent to which the goals have been attained." (4:94) The first three of these goals must form the basis for the pre-planning stages of the curriculum. The fourth goal--evaluation--

must be planned with the nursing faculty responsible for the instruction of students.

The formulation of educational goals for the associate degree nursing program may be achieved by a combined effort of the college faculty in various disciplines and the nursing director or curriculum planner. (Community colleges in general cannot envision the necessity of appointing the nursing faculty for the pre-planning phase due to the over-all cost of the new nursing program--though the ideal situation would be the inclusion of the faculty in all phases of planning.)

One of the basic principles offered by Brown in selection of learning experiences for students is, "The student must have the experiences which give the student opportunities to practice the kinds of behavior and to deal with the kinds of content implied by the objectives of instruction." (4:220)

Excerpts from the dissertation of Dorothy T. White are contained in a study published by the League Exchange in 1961. The dissertation is titled Abilities Needed by Teachers of Nursing in Community Colleges, and problems are discussed from the point of view of the administrator versus the point of view of the instructor. For example: the chief administrators and the nurse administrators see as the major problem of the nurse faculty a lack of knowledge in

the actual teaching methods and inability in interpersonal relations.

The nurse instructors, on the contrary, identify their problems as lack of criteria for the selection of learning experiences and insecurity in the classroom. (40:35)

The lack of criteria for selecting learning experiences may be due to the lack of knowledge of the learning process. It may also be due to lack of organization of learning experiences. Tyler stated, "The primary educational function of organization is to relate the various learning experiences which together comprise the curriculum so as to produce the maximum cumulative effect in attaining the objectives of the school." Tyler also proposed that if the experiences provided build upon earlier experiences, there will be greater depth and breadth in the development of the concepts and skills. (4:48)

A new approach to education as described by Mary E.

Jensen promoted the audio-tutorial method. Jensen stated, "Oakland Community College is dedicated to the application of a supervised, self-instruction, audio-tutorial method of instruction to achieve the best possible student learning and performance." Oakland College subscribes to the philosophy that conventional methods of teaching are basically teacher-oriented and that students play a passive role in the learning process. The college therefore has embarked on a systems approach to learning which actively involved the student in the learning process.

Jensen described the systems approach as the utilization of many and varied techniques to accomplish the stated objectives. She stated that the approach demanded that all terminal performances and specifications be detailed and written in behavioral terms identifying the student performance at the completion of the course. The terminal performance and the specifications must be formulated prior to offering the course. These are the detailed descriptions of the "need to know" and "need to do" element of performance—the behaviors the student will be expected to demonstrate at the completion of the course.

The courses in nursing under the systems approach are set up as general assembly sessions (G.A.S.) and small assembly sessions (or S.A.S.). Jensen reported a weekly schedule as follows:

- 1. G.A.S. -- 1 hour, once a week, attended by all students.
- 2. S. A. S. -- held as specified and as needed in each course.
- 3. Laboratory--for large enrollment courses, open from 8 a.m. 10 p.m., Monday-Friday; not open for as many hours in smaller-enrollment courses. Students arrange their own laboratory hours. Nursing students are assigned to specific days for clinical (hospital) laboratory experience.
- 4. Testing--majority of written tests are given in G.A.S. Oral testing may be done in laboratory or S.A.S.

Oakland Community College conducted a workshop for the college faculty prior to the implementation of the systems approach.

Consultants from the Instructional Materials Division of Litton

Industries had a prominent role in the workshop. Jensen reported

that prerequisite readings were required of the faculty before beginning the detailed analysis of the systems approach. Three of the required readings were: Preparing Instructional Objectives, by Mager, Why the Instructional Systems Approach, by Corrigan and Kaufman, and An Integrated Approach to Learning, by S. N. Postlewait. (32:42-43)

Nursing educators need to be constantly aware of the changing role of the nurse and of the societal forces which contribute to this change. Henderson made the following statement, "To what extent nursing can and should control its own destiny is a philosophical question . . . to deny the existence of conditions conducive to change seems to me to deny the lessons of history." (31:12) The changing role of the nurse should be emphasized throughout the two-year nursing curriculum with particular emphasis given in the nursing seminar and post-conference discussions in order to prepare the graduate nurse to meet and accept change. Henderson proposed the following as goals toward which we might work:

- 1. An understanding of our times. The development of nurse philosophers and statesmen, effective citizens who see nursing in relation to other services.
- 2. Nurse participation in planning health services or in policy making at national, state, and local levels. Possibly the initiation of new and more effective interdisciplinary planning bodies.
- 3. Development of a stronger professional organization. . . .
- 4. Marriage of education and service so that students will see practiced the kind of nursing they are taught.

- 5. Placement of all nursing education programs within the country's educational system. This means seeking legislation for support of public nursing schools and developing endowments for private nursing schools.
- 6. Last, and most important, a recognition by nurses themselves and by society of the nurse practitioner equal to that accorded the nurse administrator and teacher. (31:43)

Summary

The selection of related literature presented views of general and nursing educators which contribute to the understanding and the planning of a curriculum. The areas discussed were values and beliefs, the function of education, the learning process, curriculum theory, determination of educational objectives, guides to the selection of learning experiences, characteristics of a discipline, social forces which contribute to the need for change in education, the process of organizing content, the re-education of teachers, characteristics of a new nursing two-year program, an experimental audio-tutorial systems approach to learning, and the changing role of the nurse.

These particular areas were chosen to assist the nurse educator, faced with the problem of developing a new curriculum, in recognizing the various concepts of curriculum planning which must be studied in depth prior to the selection of subject material.

CHAPTER III

METHODOLOGY AND PROCEDURES

Introduction

A tentative proposal of the present study was outlined, in brief form, at a meeting on October 11, 1965, which was attended by the President of the Lansing Community College, Hospital Administrators, Directors of Nursing Service and the Directors of Nursing Education of the greater Lansing area. This group previously acted in an advisory capacity for the need and feasibility study. The group had no further suggestions for the study but asked that they be kept informed of the progress made and offered to assist in any way they could.

A meeting was held on December 10, 1965, with the President and the Administrative Council of the college. The purpose of this meeting was to acquaint the council with the proposal for the study and to explain associate degree nursing programs in general. The council members (Deans of each department in the

college) were enthusiastic about the proposed study and agreed to discuss the proposal in departmental meetings.

Following this initial discussion of the proposal at departmental meetings, a regular schedule of meeting was planned with department heads and faculty who would be primarily concerned with the planning of an associate degree nursing program. The Nursing Education Consultant from the Michigan Board of Nursing was included in these weekly meetings. Others included in these meetings were the Director of the Learning Resource Center, the Director of the Audio-visual Center, the Registrar, and the Director of Counseling at the Lansing Community College.

Separate conferences were held with Miss Mildred Seyler, the Nursing Education Consultant from the Michigan Board of Nursing. These conferences were valuable in presenting steps which should be considered when a program of this nature is being considered for a community college. Current literature on the associate degree programs was explored and discussed. Problems, which other community colleges had faced, and are facing, in establishing this type of program were also explored.

Dr. Mildred Montag, Professor of Nursing Education,

Teachers College, Columbia University, also served as a consultant
by means of telephone group conferences.

Sources of Data

The data collected for the present study came from a variety of sources. The initial source was basic data collected for the exploratory need and feasibility study conducted for the Lansing Community College 1962-1964. This data is discussed in this chapter under the heading "Procedures for Data Collection."

Other sources in the greater Lansing area:

Interviews were held with the four Hospital Administrators, the four Directors of Nursing and twenty Head Nurses to determine the clinical areas which might be utilized in each of the four area hospitals for the best clinical learning experience for the associate degree nursing student.

Interviews were held with staff nurses in the four area hospitals to determine their understanding of the philosophy and objectives of the new associate degree nursing programs. Meetings were then scheduled, according to clinical division, for groups of staff nurses so that common questions about the program could be discussed.

Interviews were held with the directors of the following community health agencies: The Visiting Nurses

Association, Public Health Nursing Division-Ingham County Public Health Department, Mental Health Clinic, Child Guidance Clinic, Spartan Day Nursery, Rehabilitation Center, and the Monticello and Provincial Nursing Homes. These interviews were held to determine how these community health agencies could participate in the associate degree nursing program by providing field observational experience for the student nurses. Informal discussions were also held with some of the staff members of these agencies.

Conferences were held with the Nursing Education

Consultant from the Michigan Board of Nursing to

investigate the steps which would need to be followed

to meet the requirements of the Board to establish an

associate degree nursing program.

Conferences were held with Dr. Mildred Montag, founder of the associate degree nursing programs and Professor of Nursing Education, Columbia University. These conferences were held via Bell Telephone Conference System. The purpose of the conferences was to have the guidance of Dr. Montag in selecting science courses for the curriculum.

Conferences were also held with two members of the National League for Nursing Accreditation visiting team.

These conferences were held to review the development of the curriculum.

Interviews were held with the directors of the two schools of nursing and the director of the practical nursing center to determine the days and hours these students were using the clinical facilities in the four area hospitals and how, with planning, a new nursing program could also utilize these facilities. Informal discussions were also held with the nursing faculty and students of these schools to explain the philosophy and purpose of the associate degree nursing program.

Group meetings were held with Administrative officials and faculty members of the Lansing Community College relative to educational facilities available and general education courses offered which might be considered for the new nursing curriculum.

Associate Degree Nursing Programs reviewed were those in operation in Michigan--at Delta College, University Center; Flint Community Junior College,

Flint; Henry Ford Community College, Dearborn;
Highland Park Community College, Highland Park,
Detroit; Kellogg Community College, Battle Creek;
Macomb County Community College, Warren; Petoskey
Community College, Petoskey; Port Huron Junior College, Port Huron; Northwestern Michigan College,
Traverse City; and Schoolcraft Community College,
Livonia.

Surveys of the four major hospitals in the Lansing area were conducted to determine clinical facilities for students in the area of medical-surgical, obstetrics, pediatrics and psychiatric nursing.

A review was made of written requirements for a school of nursing from the National League for Nursing, Michigan League for Nursing, Michigan Board of Nursing, State Board of Education, and requirements for an associate degree at the Lansing Community College.

Procedures for Data Collection

The need and feasibility study conducted for the Lansing

Community College from 1962-1964 was reviewed with the Nursing

Education Consultant from the Michigan Board of Nursing. It was

determined that surveys of clinical and educational facilities be made for purposes of the present study and that the recommendations of the first study be reviewed. The recommendations were:

- The entire college faculty be made aware of the philosophy and objectives of the associate degree nursing program.
- 2. Investigate the need for an Advisory Council.
- 3. The Michigan Board of Nursing Education Consultant's services be requested for the pre-planning phase of the program.
 - 4. Appointment of the Director for one year previous to the admission of students to the program.
- 5. Appointment of nurse faculty members at least six months previous to the admission of students to allow time for planning.
- 6. Academic appointments for the Director and faculty to allow time for advanced study.
- 7. Check with the National League for Nursing and the Michigan Board of Nursing for approval of the use of the Lansing General Osteopathic Hospital for clinical experiences.
- 8. Investigate scholarships available for students entering this program.

- 9. An application be made for a grant under the Nurse

 Training Act of 1964 to provide funds for building and
 for curriculum planning for the Associate Degree Program. (Appendix D)
- 10. The Nurse Director and faculty meet with other Directors of Associate Degree Nursing Programs in Michigan to determine the course of action in planning for the Psychiatric Nursing Course.
- 11. The Medical Society, hospital and other health agency personnel be given detailed information of the philosophy and objectives of this program. (48:45)

These recommendations were discussed with the President and administrative council of the college; the outcome of these discussions was that the writer was appointed Nurse Director of the Associate Degree Nursing Program with one year available for planning prior to the opening of the program. The administrative council did not consider it advisable to appoint nurse faculty for the planning period due to the estimated cost of the program.

Catalogs, brochures, and other published materials were reviewed on the Michigan Associate Degree Nursing Programs, and visits were made to each of the colleges previously noted. Discussions were held with the faculty of each program on curriculum

patterns, methods of teaching and evaluation, and problems encountered in establishing and implementing the programs.

Surveys were conducted at the four major hospitals in

Lansing to determine clinical facilities and at the Lansing Community

College to appraise the educational facilities.

Summary

Schmidt has stated, "The quality of administrative support appears to be the hidden factor that influences the successful establishment of associate degree nursing programs in community colleges." (38:84)

It is important to note that each stage of development for this program was discussed with administrative officials of the college. Quality of support from administration is dependent upon full awareness of problems and possible solutions—one of the major beginning responsibilities of the Nurse Director.

It is equally important that faculty immediately concerned with the planning of the program be kept fully informed of all developments. As stated, this was accomplished through formal and informal group meetings and conferences.

The recommendations, from the need and feasibility study, which were pertinent to this phase of planning were investigated.

Surveys were made of clinical and educational facilities and the information compiled for the study.

CHAPTER IV

BASIC DETERMINANTS OF A NURSING CURRICULUM

Introduction

The increased demand for nursing service is due to both an increase in population and to social changes which have resulted in an increase in the services which nurses are expected to perform.

The number of nurses needed for the future can only be estimated.

A projection, published by the National League for Nursing, suggests a need of 700,000 for 1970 in the United States.

The Michigan Board of Nursing report stated,

Programs in nursing education leading to registration are provided in hospital schools, in community colleges and universities. Despite the existence of these programs the supply of registered nurses is not keeping pace with the population in Michigan. Based on the population to be served, Michigan ranks 27th among the 50 states in registered nurse supply. Most alarming is Michigan's downward trend in the number of registered nurses per 100,000 people to be served while the national average has shown a steady gain.

An additional source of registered nurses is being developed as a result of the participation in nursing education by an increasing number of community colleges. The 2-year nursing programs in community colleges have experienced a dramatic

growth and expansion in the past 10-12 years and are the fastest growing type of nursing education today. (41:20)

The need for nurses in the greater Lansing area is discussed under "Community Need and Feasibility" in this chapter.

The requirements to be met in establishing an associate degree nursing program are reviewed on the national, state, and local level, and included in the plans for establishing the new program. These requirements are also discussed in this chapter.

The surveys of clinical and educational facilities are analyzed and suggestions are made as to proper use of the facilities within the plan for this program.

Community Need and Feasibility

In the exploratory study dealing with the need and feasibility of a two-year nursing program for the Lansing area, the question was asked, "Is there a real need for more nurses in the greater Lansing area?" Since employers are the best indicators of need, and for the purposes of the present study, interviews were held with the current administrators and directors of nursing service in the four hospitals in Lansing.

The above question elicited the following answers as indications of need:

1. The rise in population continues to surpass earlier projections.

- Hospital expansion programs are being studied continually and are being revised to meet the most immediate needs of the community.
- 3. There is a shortage of nurses today--how will expanded facilities be staffed? (The directors of nursing services listed 61 R.N. budgeted position vacancies.)
- 4. The number of graduates from the two schools of nursing in the area is much too small to meet the need for general duty nurses.
 - a. The majority of graduates from the baccalaureate program enter teaching, public health, administrative or other supervisory positions upon graduation.
 - b. The majority of graduates from the diploma program either remain at the hospital where they are trained, return to their home area, or enter positions in other health agencies.
- 5. Due to the rise in population, a larger percentage of "new" doctors open practices, nursing homes increase in number, the Public Health Department, Visiting Nurse Association, and Red Cross all anticipate needs for an increase in staff--all utilizing the services of the R. N.

When these same employers were asked how an associate degree program might help to alleviate some of the above problems, there was a general consensus on the following points:

- 1. Students trained in their home area might remain after graduation.
 - a. Student could be married and live at home.
 - b. More male students might enter the profession.
 - c. Students generally might enjoy a combination of campus and home social life.
- The cost of such a program would be shared by the student and the community--and not be reflected in higher cost to patients.

Nurse educators have been aware of, and concerned with, the limited number of graduates from schools of nursing. It is obvious that an increased number of nurses must be prepared, and it is equally evident that the associate degree nursing program may be a partial solution to the problem of a shortage of nurses in Lansing, Michigan.

Many students enrolled as freshmen at the Lansing Community College have not selected major areas for study and are listed as non-preference students. Would an associate degree program attract these students? According to directors of other

programs in Michigan, the number of applicants exceeds the number which can be admitted.

Another question which is raised frequently: Will this program, if instituted in the local community college, detract students from the two existing schools of nursing? Montag's point would apply to this question when she states, "Certain individuals who might otherwise not have been attracted to or able to attend another type of nursing school found these programs particularly desirable and accessible." (13:340)

High school graduates and high school counselors raised the question: What advantages are there to the student in a two-year college nursing program? Literature from the League Exchange lists the advantages as:

- 1. Schooling is directed by education-centered institutions rather than by service-centered hospitals.
- 2. There are better facilities for general education.
- 3. There is less duplication and repitition with resultant reduction in time needed to complete the training.
- 4. There is better direct-line communication between the community college and high school counselors than is possible between high schools and hospitals. (24:2)

National and Regional Requirements

The National League for Nursing, Department of Associate

Degree Programs, published a revised edition of the "Criteria for
the Evaluation of Educational Programs in Nursing Leading to an

Associate Degree" in 1967. This publication lists criteria which are requirements to be followed in establishing a new program.

"The organization, the administration, and the policies of the unit in nursing are in accord with the general policies that govern the organization and the administration of other units in the college that offer programs of comparable type and academic level." (26:10)

Under organization and administration the following are listed as criteria:

- I. The organization and the administration of the unit in nursing are comparable to those of other units within the college with respect to:
 - A. Relationships with the administrative authorities.
 - B. Relationships with other units.
 - C. Privileges, responsibilities, and policies.
 - D. Representation on central councils, committees, and other agencies of the faculty.
 - E. Publicity and recruitment.
 - F. Long-term planning.
- II. The college administration provides for the resources and the facilities needed by the unit in nursing to achieve its purpose.
 - A. Financial support to implement the objectives of the unit in nursing is assured, with provision for the budget and its operation made in accordance with college policy.
 - B. There are contracts or agreements covering the use of any part of the facilities of another agency or institution.
 - 1. Such contracts or agreements are initiated by the college, are in written form, and are periodically reviewed by the parties thereto.
 - 2. Such contracts or agreements ensure that the faculty members have control of the students and freedom to teach and guide them and to select the patients assigned for nursing laboratory experiences in consultation with the appropriate members of the agency staff but unhampered by obligations to provide nursing service. (26:5)

The section on curriculum development and program of instruction provides the following guidelines:

The curriculum reflects the philosophy and the objectives of the program in nursing. It is developed and revised by the faculty in nursing in accordance with college policy.

- I. The nursing program is developed to fulfill the stated objectives, the college requirements for the associate degree, and the state requirements for eligibility to write the State Board Test Pool Examination.
 - A. The objectives of each nursing course reflect the purposes of the program and are periodically reviewed by the faculty in nursing.
 - B. The curriculum includes the areas in nursing, natural sciences, social sciences, and the humanities.
- II. The nursing curriculum demonstrates the generally accepted pattern for associate degree education and is consistent with the college policy. (26:11)

The above criteria for evaluation of associate degree nursing programs were studied and discussed with the Nurse Study Group and the administrative council of the Lansing Community College.

It was agreed that these requirements could be met.

State and College Requirements

At the state level, the Michigan Board of Nursing has published a booklet, Minimum Standards and Educational Criteria for Schools of Professional Nursing in Michigan, 1964, which lists the following as requirements for the curriculum of an associate degree program in nursing:

A. The curriculum shall be consistent in quality with other associate degree programs in the college:

- 1. The program should be planned within the college calendar and meet the requirements for an associate degree.
- 2. There should be a reasonable balance between general and nursing education courses.
- 3. The nursing curriculum shall be organized to help the student develop knowledge, skills, and attitudes which are essential for beginning practice as a nurse.
- 4. Preparation insuring nursing competencies should be provided through selected and supervised experiences.
- 5. Credit hours for lecture and clinical experience shall be consistent with the existing college pattern.
- 6. The ratio of students to instructor in clinical experience should not exceed 10:1.
- B. The study, development, implementation, and evaluation of the nursing curriculum shall be the responsibility of the nursing faculty and the college administration:
 - 1. Studies in nursing of a statistical, experimental, and follow-up nature, should be conducted by the department in the college charged with this responsibility in cooperation with the nursing department; and,
 - 2. Cooperative planning, problem solving and evaluation between the nursing and college faculty and the nursing department and cooperating agencies are essential for the effective conduct of the program. (33:35-36)

Eligibility to write the state board examinations is dependent upon the successful completion of a nursing education program which has the approval of the Michigan Board of Nursing. The application to take the examinations is made following the completion date, and must be signed by the director of the program and must be notarized.

The Michigan State Board of Education also requires that a course in Political Science (or equivalent) be included in the curriculum.

The procedure for receiving approval from the Michigan Board of Nursing to establish an associate degree nursing program was not established during the time this study was being conducted. Steps suggested by the Nurse Education Consultant were followed: The director of the nursing program submitted a proposal to the Michigan Board of Nursing which described in detail all proposed aspects of the curriculum, proposed budget, proposed faculty, proposed date of admission of students, and number of students to be enrolled in the first class. This proposal was approved by the Michigan Board of Nursing. Conferences were then held with the Consultant on each area of the proposal—these conferences were also attended by the administrative officials of the college. Approval of the program is given by the board after the program is in operation. Any changes in the curriculum must be approved by this board.

The requirements for an Associate Degree to be met at the Lansing Community College were:

- Complete a two-year course of study adapted to needs, interests, and capacities, and conform to a plan acceptable to the College. The course of study should: (a) be suitable for transfer to admit the student to the level of upperdivision work in a four-year college of his choice; or (b) form a program of study to be completed at the end of two years at the Lansing Community College.
- 2. Maintain a minimum grade point average of 2.0.
- 3. Earn toward graduation at least 30 credits in attendance at Lansing Community College.
- 4. File with the Registrar's Office a petition for graduation one term preceding the term of graduation.

- 5. Satisfy all general and specific requirements of Lansing Community College including fulfillment of all financial obligations.
- 6. Be in attendance at the commencement exercise of his class unless a petition of basence is approved by the President.
- 7. Have the approval of the faculty and the Board of Trustees.

 Associate degrees are granted to all who meet the graduation requirements. (44:9)

The associate degree nursing program could meet the above requirements with the exception of 1. (a).

Survey of Educational Facilities at the Lansing Community College

The educational facilities at Lansing Community College could be utilized for a beginning class of nurses. However, projected enrollment figures pointed out the possibility of crowded class-rooms in the near future. The addition of a probable class of forty nursing students would create heavy teaching loads in the Arts and Sciences Department and would require additional faculty.

Proposed building plans, which may be utilized in the near future, include plans for a professional nursing program. Included in these plans are lecture-demonstration rooms, classrooms, multipurpose rooms, and faculty office space. The following points are recommendations which should be used as a guide for new programs from the U.S. Department of Education, Health and Welfare study, Nursing Educational Facilities:

- A. To provide flexibility for future expansion, it is recommended that:
 - 1. Lecture rooms be planned to accommodate the maximum enrollment projected.
 - 2. The number of smaller classrooms be sufficient to permit scheduling additional sections of a class as enrollments and faculty increase.
 - 3. Teaching methods commonly used that will influence the architectural planning include demonstration within the classroom and monitoring of demonstrations by closed-circuit television. The architect should be informed of plans for projecting films, video tapes and slides, and the use of tape recordings and other audiovisual aids.
- B. Space Requirements for Teaching:

Lecture-demonstration room--the room should be designed for film and slide projection. The amphitheater design with tiered seats increases visability of demonstrations. Number of seats should be determined according to the largest projected figure on enrollment.

Classrooms--one large classroom that can be partitioned or two smaller classrooms should be provided for small lecture discussion groups.

Multipurpose room--this room should be designed to hold pediatric and adult hospital units. The first year class could be divided into four sections for supervised laboratory practice. This room should also be scheduled for independent study by the individual student (practice techniques).

Conference rooms--these small rooms are essential for the privacy needed for counseling and evaluative conferences for students. Pre- and Post-conference discussions of patient care are usually held in conference rooms allocated within the hospital or other health agency.

Library-the college library should contain references and periodicals which are specifically designated in a section allocated for study in view of increased enrollment.

- C. Faculty Space--
 - 1. Privacy is a fundamental requirement for faculty offices. Each office should accommodate only one faculty member. If locker space is provided, it can be omitted from faculty lounge.
 - 2. A conference room is needed for faculty meetings, conferences and work groups.

- 3. Administrative space includes offices for the director and her secretary. It also provides a lobby reception area for visitors and space for clerk-typists as well as for storing supplies.
- 4. Lounges for the faculty as well as for male and female students and visitors are required. Lockers will be needed for changing from street clothes to uniforms.
- 5. Supporting space--includes provisions for storage of educational media such as anatomical models, films, projectors, and tape recorders. (34:10-13)

The proposed building plans for Lansing Community College-the Health Sciences building--were approved by the Board of Trustees.

The plans included one section on the first floor of the science building, which utilized the above guidelines for the associate degree
nursing program.

Survey of Clinical Facilities at Lansing Area Hospitals

For the purpose of the present study, the hospitals in the Lansing area were revisited and a survey conducted to determine the clinical areas which might be utilized for student learning experiences. It was also a suggestion of the Nurse Study Group that the understanding and attitudes of hospital personnel, toward an associate degree nursing program, be determined while conducting the survey.

The National League for Nursing has, in numerous articles, stressed the significant aspects to be considered in the selection of clinical agencies. One of these aspects is the area of the "intangible,"

the values, beliefs, attitudes of the personnel in the agency, which may be directed toward associate degree nursing education. The League has suggested a serious exploration, of the questions of attitudes toward a college centered type of educational program, be conducted prior to any definite decision on the selection of an agency for use for student learning experiences.

The desire to include the associate degree program should be accepted by the nursing service personnel, the agency administration, the Board of Trustees, and the medical board. It has been stated by the Nursing League that the more groups and individuals that become interested and informed of the degree program, the greater the possibility of understanding its purposes and plan of operation.

The hospitals surveyed were Edward W. Sparrow Hospital, Ingham Medical Hospital, Lansing General Hospital, and St.

Lawrence Hospital. All of the clinical areas and service areas were observed in each hospital. A form was completed for each hospital showing total bed capacity, patient capacity in specific areas—Medical-Surgical, Nursery, Obstetrics, Pediatrics, Rehabilitation, and Intensive Care. (Appendix F) The form also lists all service areas offered in each hospital since students were to be assigned to these areas on a rotation schedule. Other information gathered and

recorded on the survey form was the projected increase of facilities prior to and including 1968; the number of professional nurse students and practical nurse students utilizing the areas for experience, and the staffing pattern showing the currently employed number of Registered Nurses, Licensed Practical Nurses and Nurse Aides.

(Nurse Aides are trained on-the-job by the hospital for a three or four week period and assist the Registered Nurse or Licensed Practical Nurse in giving patient care.)

During the period of time covered by the surveys (February-April, 1966), interviews were held with the directors of nursing service. Interviews were also held with head nurses in the clinical areas--medical, surgical, pediatrics and obstetrics. In addition to the interviews, the day supervisors and head nurses in the above clinical areas were asked to complete a questionnaire. The questions were formulated to assist in determining the attitude of this group toward an associate degree nursing program. (A composite of the answers is contained in the questionnaire--Appendix E.)

Every ward in each of the clinical areas, in each hospital, was observed and the following points checked:

Cleanliness of patient unit

Good lighting and ventilation

Sufficient space per patient unit

Utility rooms centrally located

Clean and unclean areas easily identifiable

Supplies and equipment for patient care available on each ward

Emergency trays and equipment checked by each shift of personnel

Narcotics cupboards kept locked at all times when not in use

Narcotics checked and signed for by each shift of personnel

Medication areas--ample room for preparation of medications

Dietary department -- in charge of all food service and checking of trays

Ward clerks assigned to each ward

Messenger service system operating throughout the hospital

Conference room available for each ward

Treatment room available for each ward

All pertinent information on the patient included on the Kardex

Ward Library on each unit--containing appropriate current information on treatments and drugs; a medical dictionary, hospital policies and procedure manuals,

66

fire and disaster manuals, and textbook on related clinical care of patients

Physicians orders noted by head nurse

Complete charting of care given patient recorded on each patient chart by professional personnel on each shift

The results of the survey and observation of the clinical areas produced evidence of a good variety of clinical learning experiences available for new nursing students in the four area hospitals. Areas which did not meet standards required by the National League for Nursing were discussed with the hospital administrator, director of nursing service, and area supervisor. It appeared evident that the areas which were in question could meet the requirements with a minimum of change. For example—the ward libraries all needed to have updated materials and information available to ward staff and nursing students.

It was also noted that both professional and practical nursing students utilize the clinical areas between the hours of 8:00 a.m. and noon--Monday through Friday. It therefore would be necessary to schedule meetings with the Directors of Nursing Service and the Directors of the schools of nursing to formulate a plan for cooperative use of these facilities. It was also evident that additional students could be accommodated during the afternoon or early evening hours since the other schools do not schedule these hours.

Interviews which were held with the administrative level in each hospital provided the following information:

- 1. Administrators had a very good understanding of the philosophy and objectives of the associate degree nursing program.
- 2. Administrators expressed willingness to make any necessary changes on the wards to meet the requirement standards set by the nursing school accreditation body--National League for Nursing.
- Administrators proposed plans for informing all nursing staff and personnel of the philosophy and objectives
 of the associate degree nursing program.
- 4. Administrators proposed that faculty office space, conference and classrooms, and student locker space would be made available for the new nursing program.
- 5. One of the directors of nursing service advised that the recruitment program be geared to the older women, as well as the high school graduate. The other directors, when questioned in interview, agreed with the promotion of this idea since the "older" student might be expected to remain and serve the community after graduation.

6. The hospital administrators were all very enthusiastic about the plan to develop an associate degree nursing program in the Lansing area.

Head nurses were in agreement about a definite shortage of nurses in the Lansing area. These nurses also agreed that they have limited knowledge about the associate degree program and therefore are rather skeptical about the type of graduates that may be produced. All were willing to work with the students and instructors to provide the best possible learning experiences.

Further study should be made by the Administrator of the College and the Director of the Associate Degree Nursing Program into the possible use of the Osteopathic Hospital for student clinical experience. Approval for use of these facilities must be obtained from the Michigan Board of Nursing and from the National League for Nursing.

Other health agencies

Contacts were made and discussions were held with other health agencies in the Lansing area. The purpose of these meetings was to discuss the nature and philosophy of the associate degree nursing program and to determine how these agencies could participate in the program.

The agencies visited were the Visiting Nurses Association,
Adult Mental Health Clinic, Child Guidance Clinic, Nursing Homes,
Ingham County Public Health--Nursing Division, four physicians'
offices--general practice, three physicians' offices--pediatricians,
Lincoln School--mentally disturbed children, Spartan Nursery, and
the Rehabilitation Center.

The personnel in these agencies appeared to be very interested in assisting with the learning experiences for students, and arrangements were made for later meetings which would include the nursing faculty.

Summary

Information reviewed from the study on the need and feasibility of establishing an associate degree nursing program in

Lansing, Michigan, appeared to indicate that a two-year nursing program would be a partial solution to present and future needs of the community for an increased number of registered nurses.

Prospective employers explained the shortage of R.N.'s as being due to, (1) the rapid rise in population, (2) the necessary expansion of hospital facilities which then must be staffed by a greater number of nurses, (3) the necessary expansion of other health agencies which require nursing service, (4) the limited number of students graduated from the two existing schools of nursing, and

(5) the nation-wide shortage which reduces the potential number of nurses that might be expected to move to this community from other areas.

The review of the National, State, and the Lansing Community College requirements indicated the need for careful planning of the curriculum in order to meet all of these requirements.

The results of the survey of educational facilities at

Lansing Community College gave evidence that a nursing program

could use these facilities with careful planning, and that approval

from the Michigan Board of Nursing would be based on the fact that

new facilities would be available in the near future.

According to the results of the hospital surveys, there were many excellent clinical facilities available for selected learning experiences for students. Many of the hospital units were not being used by other nursing programs, particularly on the afternoon schedules.

The Lansing Community is rich in related health-service agencies which were not adequately utilized in the two existing nursing education programs. A thorough study and investigation should be made on the utilization of these agencies within the associate degree nursing program. These arrangements should be made only when nursing faculty are available and can be included in the planning.

CHAPTER V

AN EMERGING CURRICULUM PLAN

Introduction

The national and state curriculum patterns for associate degree nursing programs were studied as background material for the present study. This chapter deals with the general curriculum patterns, the philosophy and purpose of the Lansing Community College, the philosophy of the proposed associate degree nursing program, and the general education and nursing education courses which evolved into the curriculum pattern for the Lansing Community College Associate Degree Nursing Program.

The general curriculum patterns which were reported in the National League for Nursing 1961 report were found to have remained essentially the same as reported at the biennial convention in April, 1967. The report stated that the length of associate degree programs varied from two academic years to two calendar years. In the majority of programs, this consisted of four semesters, or six quarters, and one or two summer sessions. This

variability in the length of programs is reflected in the number of credits required for graduation. These requirements range from 64 to 126 credits. In a study of 44 programs it was noted that the median number of credits was 77. Class-hour credit, which includes independent study, was usually a ratio of 1:1. Credit for laboratory was justified when using a 3:1 ratio.

Generally, a fairly even balance was maintained between the number of credits in nursing courses and those in general education. Distribution of the student's clock-hour times was usually one-third in general education classes and laboratories and two-thirds in nursing classes and laboratory. General education courses included Humanities, Communication Skills, Behavioral Sciences, and Physical and Biological Sciences. Nursing courses were divided into the four major areas of Fundamentals of Nursing, Maternal and Child Health, Medical-Surgical Nursing, and Psychiatric Nursing.

It was interesting to note that the greatest variation in the nursing courses was in the area of Psychiatric Nursing. The programs range in this area from offering a three credit course which provided two hours of class throughout one semester and a one-week summer workshop to a nine credit course requiring twenty-five hours of class and a twelve-week laboratory.

The variation is understandable when a check is made on this problem in other types of nursing programs. Fully qualified

faculty are not available and clinical facilities are not always within easy commuting distance for students. The National League 1961 report stated that Psychiatric Nursing was being taught in these ways: (1) including psychiatric nursing experience in medical-surgical nursing courses, (2) through short-term, intensive courses in psychiatric nursing, (3) through semester-length courses in which instruction is less concentrated. (37:11)

According to Montag, the pattern of general education courses should not be changed for nursing students, though some necessary adjustments may need to be made in the biological and physical sciences. (13:212) One such area which needs further investigation is the need for the inclusion of Inorganic and Organic Chemistry in the nursing program. Some programs included Chemistry under the course titled "Integrated Sciences." This course introduced the student to the nature of matter and energy, scientific measurements, basic mechanics, and the fundamental principles of Inorganic and Organic Chemistry. The second half of this course dealt with a study of specific chemical integrating systems of the body. Considered also were the structures and functions of the skeletal, nervous, muscular, circulatory, digestive, and reproductive systems. It would seem that the integration of so many basic principles into one course would lead to mere familiarity rather than an understanding of the principles by the student.

Guidelines, proposed by the National League for Nursing, and discussed by nurse educators at the 1967 biennial N.L.N. meetings, provided the following information on purpose and objectives of the associate degree nursing program:

Focusing on helping students gain desired objectives, the nursing faculty reduces repetitive practice in the clinical area to a desired minimum by, (1) selecting learning experiences in terms of student needs and program objectives, and (2) arranging these experiences in nursing courses that closely relate theory and practice.

The associate degree program is complete for its own purpose and is not equivalent to the first two years of a baccalaureate nursing program.

Graduates are prepared to give care to patients as beginning general duty nurses, drawing upon their scientific knowledge and understanding of human behavior and needs. They are prepared to develop satisfactory relationships with people, to cooperate and share the responsibility for their patients' welfare with other members of the nursing and health staff, and to be self-directive in learning from experience as practicing nurses. Graduates of associate degree nursing programs are eligible to take state examinations for licensure as registered nurses. (37:10-11)

Curriculum patterns which were studied, at the state level, were those currently in effect (1967-1968) at the following Michigan institutions of higher education: Delta College, University Center; Flint Community Junior College, Flint; Henry Ford Community College, Dearborn; Highland Park Community College, Highland Park, Detroit; Kellogg Community College, Battle Creek; Macomb County Community College, Warren; Petoskey Community College, Petoskey; Port Huron Junior College, Port Huron; Northwestern

Michigan College, Traverse City; and Schoolcraft Community College, Livonia.

between these programs as they were at the national level. It was noted that constant study and evaluation was being carried on in all of these programs. The faculty at Henry Ford Community College and at Delta College were involved in formal research to determine the best use of audio-tutorial equipment in the nursing program.

The faculty at Delta College also planned revisions of curriculum following the 1967 workshop on Psychiatric Nursing at Purdue University. One of the most notable changes would be the inclusion of principles of Psychiatric Nursing throughout the Medical-Surgical nursing course. The integration would require a change in methods of teaching and in the assignment of student clinical experience. The change would also be a move toward meeting the health needs of the community.

Philosophy and Purpose of the Lansing Community College

The Lansing Community College is influenced by the community to meet the needs of business, industry, government, and the increasing demand of students for higher education. It has a strong

individual-oriented approach which attracts students who might otherwise not consider attempting a college program.

The philosophy is contained in the following statements:

The College staff, concerning itself with fundamental questions regarding student and college responsibilities, has determined that:

- 1. The student will be aided in realizing his intellectual potential through an individualized approach to his education. Small classes and personal faculty guidance will aid the student in achieving this objective.
- 2. The student must be encouraged to bear responsibility for his educational goals and to pursue academic excellence to the limits of his ability.
- 3. The student and the institution, aware that the world is rapidly changing, culturally and technologically, must search diligently for the truth concerning the heritage of this republic and its roots in Western civilization and other cultures as they pertain to the dignity and freedom of man. This search should enhance the student's awareness of his responsibility as a citizen of his community, state, nation, and the world.
- 4. The student, whatever his selected program of study, must gain further insight into his values as these values relate to himself and his fellow man.

In accord with this philosophy Lansing Community College has made the statement that fulfilling and useful life can best be obtained through sound scholarship and training. The college lists the following objectives:

- 1. Contribute to good citizenship by helping students to understand democratic processes.
- 2. Prepare the student to make a contribution to the economic life of his community.
- 3. Expose the student to our cultural, social, scientific, and spiritual heritage out of which he may construct a satisfying and consistent world view by which to guide his life.
- 4. Foster self-reliance on the part of the student by encouraging him to think critically in solving problems.

- 5. Encourage the student to participate in some form of satisfying creative activity and in appreciating the creativity of others.
- 6. Develop within the student increased understanding of the political and socio-economic problems confronting our nation and the world contributing to a sense of social responsibility.
- 7. Help the student to understand his relationship to his biological and physical environment so that he may better adjust to and improve that environment.
- 8. Develop within the student an appreciation and understanding of the contributions afforded by other ideas, races, and religions.
- 9. Develop within students skills in writing, speaking, reading, and listening which lead to improved self-expression and communication. (44:9)

Three meetings were held with the administrator of the college, the arts and science faculty, the nursing education consultant, and department chairman for the purpose of discussing the philosophy and purpose of the college and the philosophy and purpose of the associate degree nursing program. The areas discussed were those reviewed in Chapter II: Review of Related Literature in this study: the function of education, the learning process, values and beliefs, determination of educational objectives, social forces which contribute to the need for change in education, guides to selection of learning experiences, the process of organizing content, the reeducation of teachers, and the characteristics of a new two-year nursing program.

It was the general consensus of the group that the philosophy and objectives of the college would pertain and be acceptable to an

associate degree nursing program. It was stated that a philosophy should be developed by the nursing faculty and director which would be in accord with the overall philosophy of the college. It was also stated that more specific objectives would be developed by the nursing faculty for the program.

Philosophy and Purpose of the Associate Degree Nursing Program

and the nursing education consultant that the general philosophy
(as described in the introduction of this chapter) should be followed
until sufficient nursing faculty were available to evaluate the general
philosophy and purpose changes. It was necessary to state specific
objectives in order that these could be discussed with the arts and
science faculty to assist in determining courses and content to be
included in the curriculum. Objectives were discussed with Janice
Olsen, graduate student at Teachers College, Columbia University,
who was undertaking a study of objectives in associate degree nursing programs. Objectives which evolved from the Olsen study were:

- 1. To increase competency in expressing thoughts clearly, speaking and writing precisely, and gaining understanding through listening, reading, and observing.
- 2. To develop further understanding of ethical values, and social, economic, and legal factors influencing the practice of nursing.
- 3. To grow in understanding and ability to develop personal relations that better enable one to become self-directive

- and to make satisfactory family, marital, and professional adjustments.
- 4. To gain an understanding and appreciation of the physical and mental health concepts of the individual's needs and their interrelationships.
- 5. To develop an understanding and ability to utilize basic mental health concepts as they apply to the nurse, to her patients and to the community.
- 6. To develop understanding of the patient as an individual, a member of a family and a worker in the community.
- 7. To develop and use judgment in the application of principles of the biological and social sciences to nursing care including the promotion of health.
- 8. To develop the ability to plan, administer, and evaluate nursing care (including rehabilitative aspects) of patients with varying nursing needs. To develop the ability to interpret these needs.
- 9. To coordinate nursing care with the care of medical and allied professional workers.
- 10. To develop a basic understanding and ability to utilize available community resources in the rehabilitation and care of patients.
- 11. To develop an understanding of the scope and the limitations of the role of the professional nurse and trends which affect nursing. (47:11)

These objectives were initially accepted for the new nursing program by the arts and science faculty, the nursing education consultant, and the director of the nursing program. This group decided that the above objectives were those generally stated for other associate degree programs in the Olsen study. It was stated that these objectives should be reviewed and revised as needed by the nursing faculty. The above group held scheduled meetings to determine the general education and nursing education courses for the nursing curriculum.

Following the acceptance of the above objectives the arts and science faculty, the nursing education consultant, and the director of the nursing program formed a Nurse Study Group to determine the general education and nursing education courses for the nursing curriculum.

General Education Courses

The College of Arts and Sciences attempts to confront the student with the full scope of man's knowledge about himself and his world. The curriculum is designed to stimulate knowledge and understanding of past and present cultural and social forces, and to acquaint the student with the ways in which these forces have been interpreted, thus providing educational resources whereby a student may better equip himself to make important cultural, social and economic contributions to society. Emphasis is given to individual growth and human development and a desire to make available to all students intellectual training and knowledge that will add meaning, breadth, motivation, and interest to their lives regardless of vocational aspirations. (44:30)

The Nursing Study Group, after a series of eight meetings, selected the general education courses to be offered in the associate degree nursing program. Long discussions were held and there was never unanimous agreement on the courses included in the curriculum.

Each of the various disciplines represented felt that at least a sequence of three courses in their area should be included in order to meet the objectives of the program. Since this was impossible, the final decision was reached to offer: English 101, 102, 103; Speech 104; Social Science 101, 103; Psychology 201, 202, 205; Anatomy 201, 202; Microbiology 203; and Chemistry 101, 102, 103. (Course Description--Appendix G)

The study group reached the decision on these courses by considering requirements for the program and objectives of the college and of the associate degree nursing program. It was suggested that the nursing faculty conduct a continuous evaluation study to determine whether objectives would be met by the courses offered in the curriculum.

It was agreed, by the Nurse Study Group, that students should be encouraged to elect courses in the humanities wherever possible.

Nursing Education Courses

The nursing education courses were planned with the assistance of the nursing education consultant. An ideal sequence of courses would be such that a student would be exposed to the physical, psychological, sociological problems of the normal human being from birth through senescence. Realistically, one can only approach

this type of sequence. The following course descriptions are suggestions for desirable content for the proposed nursing education courses.

Nursing Education 101 and 102 -- Fundamentals of Nursing

This course should be designed to introduce the student to the profession of nursing. It would include history, professional responsibilities, and the principles and related procedures which are basic to the understanding of the physical and emotional needs of all individuals. Topics studies would be: Observation of overt and covert needs and nursing intervention; personal and community hygiene; community health resources: basic problems related to nutrition, elimination, the need for oxygen, fluid and electrolyte balance, medical and surgical asepsis, administration of medications, and rehabilitation. Selected clinical experiences would provide the student with the opportunities to identify and apply beginning skills in nursing care. This course would cover two terms. Faculty teaching the course would determine the division of content and the clinical facilities to be utilized.

Nursing Education 103--Obstetrics

The course should be designed to help the student understand the normal maternity cycle. Clinical experience would be selected to provide the student with the opportunity to develop basic skills in giving care during labor, delivery, and the puerperium. Utilizing the basic concepts presented in Fundamentals I and II, this course would provide further understanding and skills in the nursing care of mothers and newborn infants.

Nursing Education 104--Pediatrics

Selected experiences would be provided for the student in observation and care of the well child emphasizing phases of growth and development—as well as nursing care of the ill child. Pharmacology and diet therapy would be integrated.

Nursing Education 205 and 206--Physical and Mental Illness I and II

These courses would be designed to give further concepts of medical-surgical-psychiatric problems of the young adult and adult patient. Emphasis would be placed on the patient, his family, and the community. Content would include dynamics of observation, interpersonal relationships of the nurse and patient and nursing care problems presented by the mentally and physically ill. Nutrition and Pharmacology would be integrated in the first term.

Selected clinical experience would be provided in the general

hospital and in a hospital for the mentally ill. Faculty teaching these courses would need sufficient background in both medical-surgical nursing and psychiatric nursing.

Nursing Education 207--Seminar

The content would include discussions of professional ethics, trends in nursing, professional opportunities, and research in nursing. Selected clinical experiences would provide the opportunity to develop a research design based on a nursing care problem.

Nursing Education 208--Practicum

The concepts, skills, and understanding necessary for comprehensive nursing care would be emphasized. Principles of ward management and administration would be introduced. Supervised clinical experience would be provided during the second half of the term in the clinical area selected by the student.

Specific content and methods of teaching would need to be studied and outlined by the nursing faculty. The objectives of each course and the evaluation techniques would also need to be developed.

The Curriculum Pattern

The pattern of courses was arranged with the more difficult general education courses being required the first three terms

during the period when the nursing courses would be less complex.

The second year courses in general education do not have laboratory sections, are considered less difficult, and would be offered at the time the nursing education courses become more complex.

The Nursing Study Group accepted the suggestion of the director that a "thread of learning" be followed throughout the program in the area of psychology. Therefore, psychology is offered in general education courses the first three terms and is integrated and continued in the four remaining terms, in the nursing education courses.

Anatomy and chemistry are offered concurrently with the first nursing course. With the background knowledge and understanding of these courses the student would be better prepared to understand the third term of chemistry (organic), microbiology, and obstetrics. Offering microbiology the third term would prepare the student for the medical-surgical asepsis section of pediatrics. English and speech courses would be offered during the first half of the second year to prepare the student for participation in the nursing seminar.

The integration of psychiatric nursing with medical-surgical nursing would need careful study and evaluation. Clinical experiences would be provided in the psychiatric ward of a general hospital and in the mental health clinics.

Curriculum Pattern

Freshman Year			Credit	Sophomore Year		Year	Credit	
Fall Term				Fall Term				
Psy	201	Introduction	4	Eng	102	Composition	3	
Cem	101	Inorganic	3	SS	103	Political Sci.	4	
Ant	201	Anatomy/		NE	205	Phy./Mental		
		Physiology	4			Illness	$\frac{10}{17}$	
NE	101	Fundamentals	$\frac{5}{16}$			•	17	
			16					
Winter Term				Winter Term				
Psy	202	Personality	3	Eng	103	Composition	3	
Cem	102	Inorganic	3	Sph	104	Fundamentals		
Ant	202	Anatomy/		NE	206	Phy. /Mental		
		Physiology	4			Illness	10	
NE	102	Fundamentals	$\frac{5}{15}$				17	
			15					
Spring Term				Spring Term				
Psy	205	Hu. Growth		NE	207	Nursing		
•		and Dev.	3			Seminar	· 5	
Cem	103	Organic	3	NE	208	Nursing		
Mic	203	Microbiology	4			Practicum	10	
NE	103	Obstetrics	_5				15	
			15					
Summer Term				Total				
Eng	101	Composition	3					
SS	101	Sociology	4	General Education 51				
NE	104	Pediatrics	5	Nursing Education 55				
•			12		-		106	

These courses are all required for the Associate Degree Nursing Program. Elective courses may be added with departmental approval.

Psy	 Psychology	Eng	 English
Cem	 Chemistry	SS	 Social Science
Ant	 Anatomy	Mic	 Microbiology
NE	 Nursing Education	Sph	 Speech

The nursing practicum would provide additional clinical experience and supervision in the area of the student's choice.

The nursing seminar would provide the senior student with the opportunity to spend some time in reviewing and discussing any of the major clinical areas. Time would also be provided to discuss with guest lecturers the job opportunities available for R.N.'s in various fields such as the armed services, public health departments, visiting nurse associations, school nursing, and others which are not directly related to hospital nursing.

The previous page gives the complete listing of the total curriculum pattern for the Associate Degree Nursing Program at the Lansing Community College.

Summary

The general statements concerning the philosophy of associate degree nursing programs reported by the National League of Nursing at the biennial meeting in 1961 were reviewed in the introduction to this chapter. The Nursing study review of the philosophy and purpose of the Lansing Community College and the proposed objectives for this associate degree nursing program were discussed.

A choice was made of general education courses which would meet these objectives and nursing education courses were

proposed, and from these course selections a curriculum pattern developed.

CHAPTER VI

SUMMARY, CONCLUSIONS, RECOMMENDATIONS AND SUGGESTIONS FOR FURTHER STUDY

Summary

This chapter contains a summary of the data presented, conclusions drawn from the data, recommendations for the Nurse Study Group at the Lansing Community College and for other community college groups studying the pre-planning phase for a program of this nature; suggestions for further study are also included.

The purpose of this project was to study the planning and development activities necessary during the pre-planning phase for establishing an associate degree nursing program at the Lansing Community College, Lansing, Michigan.

Literature which could contribute to the understanding and the planning of a curriculum was selected from the areas of general education and nursing education--two year programs. This related literature was reviewed, and it was proposed that the areas covered should be studied in depth prior to establishing a new curriculum.

A previous study on the need and feasibility of an associate degree nursing program at Lansing Community College was re-examined. The national, state, and college requirements for establishing a new nursing program were studied, and surveys of the educational and clinical facilities were made.

Meetings were held throughout the study with administrators, college faculty, and the nurse education consultant to determine the areas for investigation and to draw conclusions for the results of the investigations. This group was called the Nurse Study Group.

The philosophy and purpose of the college and the general philosophy of associate degree nursing programs was studied. Discussion then led to general education courses which would meet the proposed objectives of the nursing program. Nursing courses were then proposed. These courses, combined with the general education courses, which would meet the objectives of the college and the nursing program, formulated the proposed curriculum pattern for the nursing program at the Lansing Community College.

Conclusions

The following conclusions can be drawn with regard to the purpose of the study:

- 1. The Nursing Study Group gave evidence that the seminars which were held contributed greatly to the understanding and the planning of the curriculum.
- 2. The support of the administrators of the college is essential if a successful associate degree nursing program is to be established.
- 3. It was found that health agencies are all increasing in size, the population continues to increase, nurses are expected to assume more responsibility, and fewer nurses are being graduated from schools of nursing.
- 4. It was determined, by the Nurse Study Group, that national, state, and college requirements for establishing an associate degree nursing program were rather broad and general and could be met at Lansing Community College without difficulty.
- 5. The survey of educational facilities at the Lansing

 Community College gave evidence of limited facilities

 at present but plans presented for the near future

 assured very good facilities.
- 6. The survey of clinical facilities of the four major
 hospitals in the area indicated that excellent learning
 experiences could be selected for students. It was also

- noted that extreme care must be taken in planning and scheduling these facilities due to the number of students that would be on the wards at certain periods.
- 7. The philosophies of the Lansing Community College and the proposed nursing program were studied. It was determined that the nursing program could become an integral part of the college since the philosophies were comparable.
- 8. Specific objectives were formulated for the associate degree nursing program. These were based on the probable needs of the nursing students and on the needs of the community.
- 9. Eight meetings of the Nurse Study Group resulted in the final selection of appropriate general education courses and nursing education courses were proposed. A curriculum pattern evolved from these meetings.

Recommendations

1. It is highly recommended that nursing faculty be appointed at least six months prior to the opening of an associate degree nursing program. Nursing faculty would benefit from all of the planning sessions and should participate in all planning.

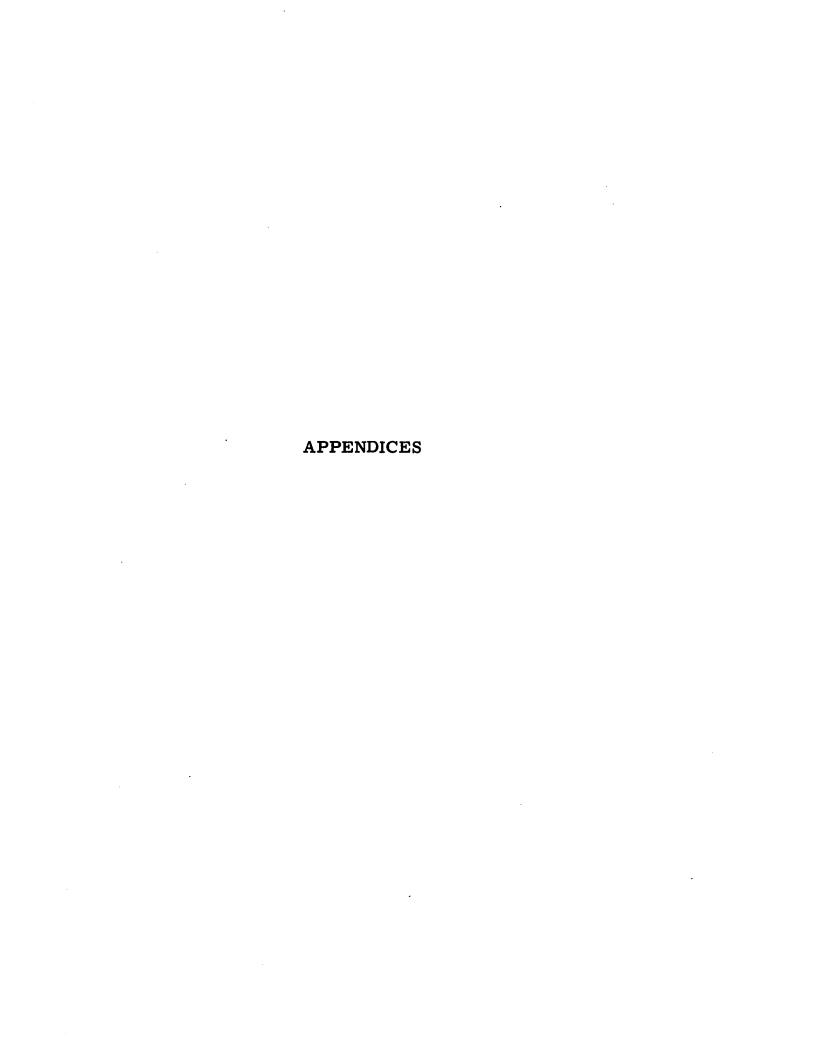
- Studies should be conducted to determine the need for inclusion of a year or less of chemistry, and if chemistry should be included in an integrated science course.
- The nursing faculty appointed for this program should develop the philosophy and objectives with the director of the program.
- 4. Careful planning will be necessary for use of the clinical facilities due to use by other schools of nursing.
- 5. Evaluation techniques should be developed at the same time that definite objectives are formulated.
- 6. Continuous evaluation should take place in order that the curriculum be continuously improved.
- 7. Formal agreements should be made between the college and the health agencies which will be utilized for student experience.
- 8. Formal agreements should contain a statement that all instruction of nursing students would be by college faculty.
- 9. Scholarships for students should be investigated.
- A recruitment program should be organized for the people of the community.

Suggestions for Further Study

Suggestions for further study are as follows:

- 1. A study should be conducted by the science department and the nursing department to determine the principles which could be combined from anatomy, physiology, chemistry, and microbiology into an integrated science course for the nursing students.
- A study should be made by the nursing faculty and director on the use and participation of community health agencies in meeting the objectives of the nursing program.
- 3. A recruitment plan should be formulated to inform and encourage the older age groups (20-45 years) in the community to consider the two-year nursing program as a career.
- 4. Investigation should be made for methods of assisting nursing faculty who have not had the opportunity to teach in a community college or in the two-year nursing program.
- 5. Further study should be made in the potential utilization of the audio-tutorial systems approach in the nursing program.

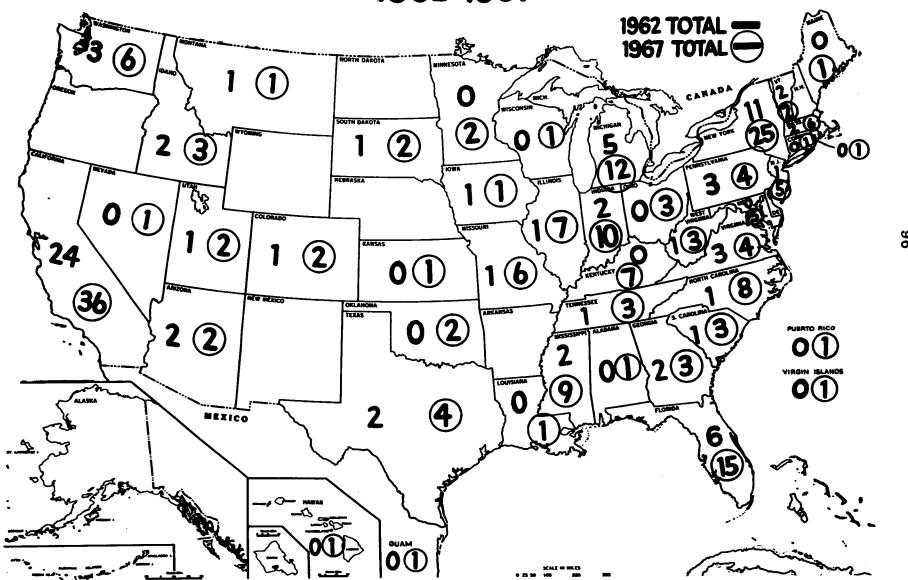
6. A follow-up study of graduates should be made to determine the effectiveness of the associate degree nursing program.



APPENDIX A

STATE-BY-STATE GROWTH OF
ASSOCIATE DEGREE NURSING PROGRAMS
1962-1967

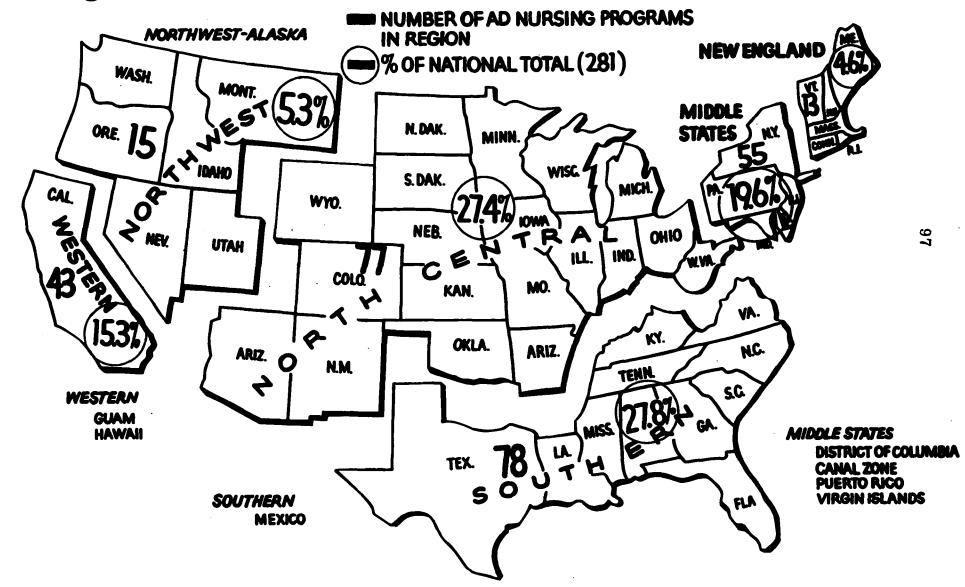
State-by-State Growth of Associate Degree Nursing Programs 1962-1967



APPENDIX B

ASSOCIATE DEGREE NURSING PROGRAMS
BY HIGHER EDUCATION ACCREDITING REGIONS

Associate Degree Nursing Programs by Higher Education Accrediting Regions

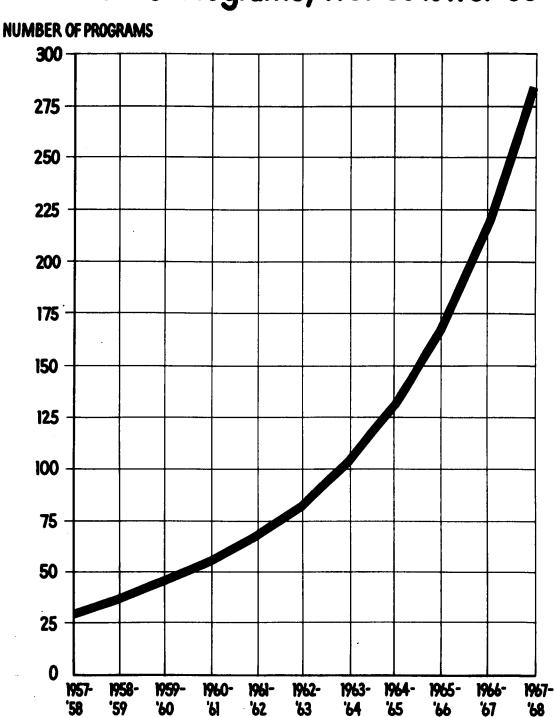


APPENDIX C

10-YEAR GROWTH PATTERN
ASSOCIATE DEGREE PROGRAMS IN NURSING
NUMBER OF PROGRAMS/1957-58 TO 1967-68

APPENDIX C

10-Year Growth Pattern Associate Degree Programs in Nursing Number of Programs/1957-58 to 1967-68



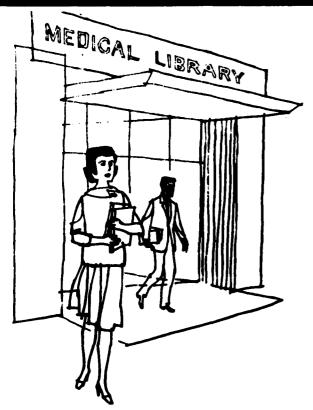
APPENDIX D

NURSE TRAINING ACT OF 1964



NURSE TRAINING ACT ()1-1964

PROCRISS • 1965-1967







U. S. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE - Public Health Service Bureau of Health Manpower Division of Nursing



NURSE TRAINING ACT OF 1964 PROJECT GRANTS FOR IMPROVEMENT IN NURSE TRAINING

PROVISION:

Grants to help schools of nursing sharpen their teaching resources and improve their educational programs.

ACCOMPLISHMENTS

The projects are making possible educational improvements that go far beyond the awards to individual schools. Many other schools are already becoming acquainted with better teaching methods resulting from the development of multimedia techniques. Content of specific courses, such as maternal and child health, is also being enriched and made more meaningful in relation to the responsibilities of modern day nursing. Of special and timely importance, this program is encouraging a cooperation among schools that is extending the effectiveness of the very limited supply of well qualified faculty.

PARTICIPATION:

Awards have been made to 95 schools in 37 States and territories. Although a grant is awarded to a single school, any number of schools of all three types may take part in a particular project, including schools that are not accredited. Thus far, an additional 143 programs are benefiting from these grants by sharing directly in the projects. Of these programs, 64 are associate degree; 51 are baccalaureate; 28 are diploma. An estimated 33,000 nursing students are taking part in educational programs improved under this provision of the Nurse Training Act.

AWARDS:

Over \$7.4 million has been awarded for teaching improvement.

D	Schools	Funds awarded			
Program	receiving grants	1965	1966	1967	
Associate degree	5		\$ 236,952	\$ 199,904	
Baccalaureate	49	\$1,436,348	\$1,157,854	\$2,373,785	
Diploma	41	\$ 553,216	\$ 532,814	\$ 945, 144	
Total	95	\$1,989,564	\$1,927,620	\$3,518,833	

U. S. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE - Public Health Service Bureau of Health Manpower - Division of Nursing



NURSE TRAINING ACT OF 1964 STUDENT LOAN PROGRAM

PROVISION:

Loans of up to \$1,000 per year repayable in 10 years with 50 percent forgiveness for 5 years full-time employment as a nurse.

ACCOMPLISUMENTS:

More than 32,000 loans have been awarded to help nursing students. It is too soon, however, to document the program's effect on the increase in enrollment in nursing schools and on the number of nurses in active practice.

PARTICIPATION:

During the fiscal year 1967, 655 nursing programs in 52 States, Puerto Rico, and the Virgin Islands received loan funds.

1965	1966.	1967
6	30	55
105	141	149
286	390	414
8	12	37
	6 105 286	6 30 105 141 286 390

AWARDS:

The average loan to a student has increased from \$437 in 1965 to an estimated \$680 in 1967.

Duamana	Amount of loans 1/				
Programs	1965	1966	1967		
Associate Degree	\$ 14,931	\$ 265,177	N.A.		
Baccalaureate	743,501	3,212,107	N.A.		
Diploma	823,651	3,457,438	N.A.		
Graduate	17, 191	17,637	N.A.		
Total	\$1,599,274	\$6,952,359	\$12,724,155 ^{2/}		

^{1/} Includes Federal capital plus institutional share (one-tenth) from the school.

^{2/} Allocated funds.

U. S. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE - Public Health Service Bureau of Health Manpower Division of Nursing

NURSE TRAINING ACT OF 1964
CONSTRUCTION GRANTS

Matching grants of up to 66 2/3 percent for construction of new schools and major expansion of existing schools.

Matching grants of up to 50 percent for replacement or rehabilitation of existing educational facilities.

ACCOMPLISUMENTS

• While most of the construction is in the beginning stages, more than 2,600 new first year places will result. The schools are showing ingenuity in planning new facilities that are both practical and adaptable to the opportunities of modern education. For example, one award is making possible an up-to-date teaching center that will be used jointly by three hospitals providing nursing education.

PARTICIPATION:

Since the program began in fiscal year 1966, 71 schools in 29 States, Puerto Rico, and the Virgin Islands have received grants. It is significant that 62 of the awards have gone for replacement of obsolete buildings, thus maintaining student places that might otherwise be lost and providing settings in which quality education can occur. Nine new schools have received this Nurse Training Act support.

AWARDS:

During the first 2 years of operation, over \$37.7 million has been awarded for construction.

Program and awards	Total	1966	1967
Associate Degree			
No. of grants	8	2	6
Funds awarded	\$ 2,353,517	\$ 585,864	\$ 1,767,653
Baccalaureate			
No. of grants	26	8	18
Funds awarded	\$19,886,045	\$4,907,511	\$14,978,534
Diploma			1
No. of grants	37	19	18
Funds awarded	\$15,494,312	\$5,559,219	\$ 9,935,093

U. S. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE - Public Health Service Bureau of Health Manpower - Division of Nursing

NURSE TRAINING ACT of 1964

AUTHORIZED FUNDS AND ELIGIBILITY

This is a broadly based program of support to schools and students of professional nursing intended to increase the numbers of practicing nurses and to improve the quality of education. Appropriations of \$283 million over a 5-year period are authorized.

(In thousands of dollars)

Duranisian	Fiscal years					Total
Provision	1965	1966	1967	1968	1969	lotai
Construction Project grants Formula grants Traineeships Loans to students .	2,000 4,000 8,000 3,100	15,000 3,000 7,000 9,000 8,900	25,000 4,000 10,000 10,000 16,800	25,000 4,000 10,000 11,000 25,300	25,000 4,000 10,000 12,000 30,900	90,000 17,000 41,000 50,000 85,000
Total	17, 100	42,900	65,800	75,300	81,900	283,000

Public and nonprofit private associate degree, baccalaureate, and diploma schools of nursing are eligible to apply provided they meet the requirements for educational quality contained in the legislation. For other than two provisions — the Professional Nurse Traineeship Program and Payments to Diploma Schools — programs must be accredited by a body or bodies designated by the Commissioner of Education or have demonstrated that there is reasonable assurance they will meet accreditation standards within a specified time. Colleges and universities participating in the Professional Nurse Traineeship Program must have approved nursing programs that provide an academic degree in nursing for registered nurses. To be eligible for payments to diploma schools, nursing programs must be fully accredited.

Schools Eligible to Participate in the Nurse Training Act: September 1967 Compared to January 1965

_	January 1965		September 1967		
Type program	Total number of schools	Total eligible	Total number of schools	Total eligible	
Diploma	840 130 188 1,158	619 16 141 776	796 235 210 1,241	630 123 175 928	

U. S. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE - Public Health Service Bureau of Health Manpower Division of Nursing



NURSE TRAINING ACT OF 1964 PAYMENTS TO DIPLOMA SCHOOLS

PROVISION:

Reimbursement to accredited hospital-based programs for partial costs of educating students whose enrollment can be reasonably attributed to the provisions of the Nurse Training Act.

Schools must apply for the formula payments which are based on (1) the increase in the full-time enrollment for the current year over the average for the years 1962, 1963, 1964, and/or (2) the number of full-time students enrolled who have received for that year a loan under the Nurse Training Act. The payments may be used however the school chooses and carry no requirement for reporting.

ACCOMPLISUMENTS

The information schools have shared, since reporting is not required,
 shows they are using the payments for such educational improvements as expanding libraries and buying teaching materials.

PARTICIPATION:

Grants have been awarded to schools in 46 States and Puerto Rico.

For various reasons, not all schools have applied for formula grants. Several had increased their enrollments during the years 1963 and 1964 and have thus been unable to show an increase over the 1962, 1963, 1964, average enrollment.

AWARDS:

Awards	Total	1965	1966	1967
No. of grants	910	190	337	393
Funds awarded	\$5,997,150	\$771,900	\$2,156,350	\$3,068,900

U. S. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE - Public Health Service Bureau of Health Manpower - Division of Nursing

NURSE TRAINING ACT of 1964



PROFESSIONAL NURSE TRAINEESHIP PROGRAM

PROVISION:

Long-term traineeships to support advanced preparation of graduate nurses for leadership positions as teachers, administrators, supervisors, and clinical specialists.

Short-term traineeships to assist graduate nurses in positions of leadership to upgrade their knowledge and skills by means of short intensive courses.

ACCOMPLISHMENTS

Maximum use has been made of all funds, and schools report that the number of eligible applications exceeds the traineeships available. Simultaneously, the most critical need in nursing continues to be for leaders prepared to teach, supervise and direct nursing care.

PARTICIPATION:

Approximately 17,000 nurses have received traineeships since the Nurse Training Act authorized continuation and expansion of this program, which began in 1956. Two-thirds of these nurses have participated in the long-term traineeship program for full-time study. Of the trainees enrolled in short-term courses, roughly 60 to 70 percent have been nurses without degrees.

AWARDS:

	1965	1966	1967
Long-term			
No. of schools	97	99	108
Funds awarded	\$7,000,000	\$8,000,000	\$9,000,000
Short-term	i.		
No. of courses	125	106	140
Funds awarded	\$1,000,000	\$1,000,000	\$1,000,000

U. S. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE - Public Health Service Bureau of Health Manpower Division of Nursing



NURSING EDUCATIONAL OPPORTUNITY GRANTS

PROVISION:

A new program authorized by amendment that provides opportunity grants of up to \$800 a year to students of exceptional financial need who could not otherwise enter a school of nursing. The amount of the opportunity grant is determined by the student's financial need and must be matched with an equal or greater amount of financial assistance from other sources.

ACCOMPLISHMENTS:

This program is anticipated to increase the number of students entering nursing by widening the base from which young men and women are recruited.

PARTICIPATION:

Opportunity grants will be awarded through all types of schools of professional nursing. Applications have been received from 255 schools for the 1967-68 academic year.

AWARDS:

The appropriation authorization is \$15,000,000 extending over a 3-year period beginning in fiscal year 1967. The allocation for the 1967-68 school year is \$5,000,000.

APPENDIX E

LANSING COMMUNITY COLLEGE QUESTIONNAIRE

APPENDIX E

LANSING COMMUNITY COLLEGE QUESTIONNAIRE

Position		e	
	Clinical Area		
		Yes*	No*
1.	In your opinion, is there an actual shortage of registered nurses?	31	0
	Comment:		
2.	Have you had any experience, in your work situation, with graduates of an associate degree nursing program? Comment:	12	19
3.	Do you understand the philosophy of the associate degree nursing programs? Comment:		11
4.	Would a program of this nature be advisable in the Lansing area? Comment:	27	4_

^{*}Composite of supervisor and head nurses answers to questionnaire (total 31).

		Yes*	No*
5.	If such a program were instituted, would clinical facilities in this hospital provide adequate experience for students?	28	3
	Comment:		
6.	Are facilities too crowded, or is patient census too low to provide good experience?	0	31
	Comment:		
7.	Would you be willing to work with instructors and students to provide the necessary experiences?	31	0
	Comment:		
8.	Are you directly responsible to the director of Nursing Service?	31	0
	Comment:		
9.	Are you directly responsible to the Hospital Administrator?	0	31
	Comment		

^{*}Composite of supervisor and head nurses answers to questionnaire (total 31).

APPENDIX F

CLINICAL SURVEY FORMS

Edward W. Sparrow Hospital

Services:

Total Bed Capacity	362	Dietary Supervisor
Medical-surgical	272	Medical Record Department
Nursery	60	Clinical Laboratory
Obstetrics	53	Pathology Laboratory
Pediatrics	27	X-ray
Rehabilitation	40	Blood Bank
Intensive Care	10	Medical Library
:		Emergency Room
		Operating Room
•		Out-patient
		Staff Health Service
•		Rehabilitation Center
		Alcoholic Unit
		Social Service Department

Projected increase of facilities: An increase of 75 beds--1968

Number of professional nurse students 70; practical nurse students 33

	R.N.	L.P.N.	Nurse Aides
Currently employed	99	80	143
Budgeted vacancies	30		40 MD MD

Ingham Medical Hospital

Services:

Total Bed Capacity	180	Dietary Supervisor
Medical-surgical	70-50	Medical Record Department
Nursery	14	Social Service
Obstetrics	14	Clinical Laboratory
Pediatrics	24	Pathology Laboratory
Intensive Care	8	X-ray
		Blood Bank
		Medical Library
		Emergency Room
•		Operating Room
		Staff Health Service

Projected increase of facilities:

Plans have been approved for an increase of 100 beds by 1970

Number of professional nurse students 12; practical nurse students 8

	R.N.	L. P. N.	Nurse Aides
Currently employed	86	33	29
Budgeted vacancies	24		

Lansing General Hospital

Services:

Total Bed Capacity	165	Dietary Supervisor
Medical-surgical	50-55	Medical Record Department
Nursery	18	Clinical Laboratory
Obstetrics	18	Pathology Laboratory
Pediatrics	24	X-ray
		Blood Bank
		Medical Library
		Emergency Room
		Operating Room
•		Staff Health Service

Projected increase of facilities:

Plans under discussion--no figures available

Number of professional nurse students 0; practical nurse students 12;

	R.N.	L.P.N.	Nurse Aides
Currently employed	30	35	68
Budgeted vacancies	15	15	

St. Lawrence Hospital

Services:

Total Bed Capacity	364	Social Services
Medical-surgical	95-74	Dietary Supervisor
Nursery	49	Clinical Laboratory
Obstetrics	55	Pathology Laboratory
Pediatrics	45	X-ray
Intensive Care	10	Blood Bank
Psychiatric	35	Medical Library
		Medical Record Department
		Emergency Room
·	·	Operating Room
		Staff Health Service
		Out-patient Department

Projected increase of facilities:

New psychiatric unit planned to be in operation in 1970

Number of professional nurse students 95; practical nurse students 22

G	R.N.	L.P.N.	Nurse Aides
Currently employed	150	83	72
Budgeted vacancies	30	15	

APPENDIX G

GENERAL EDUCATION COURSE DESCRIPTIONS

APPENDIX G

GENERAL EDUCATION COURSE DESCRIPTIONS

English 101--Composition

The first of a series of three consecutive reading and writing courses designed to develop the student's reading and to teach him to think and write clearly and cogently.

Careful analysis of integrated specimens of professional writing; an introduction to the use of a library and the fundamentals of preparing and writing the college research paper; the writing of one student essay each week.

English 102--Composition

A continuation of English 101. Special attention is given to the careful reading of works in prose fiction, especially the short story, upon which the writing of weekly essays is based; the writing of one student essay each week.

English 103--Composition

A continuation of English 102 with special attention devoted to the study of argumentation principles and research

processes. The term's work will focus on the preparation and composition of an argumentative research paper of 2500-3000 words.

Speech 104--Fundamentals of Speech

The introduction of the fundamentals of public speaking.

Emphasis is placed upon the development of clear articulation, pleasing vocal quality, adequate loudness and projection, a varied and expressive voice and correct habits of pronunciation.

Social Science 101--Sociology

A survey of major concepts and methods of sociology and anthropology. Attention given to selective aspects of culture, socialization, social stratification, primary groups, associations, collective behavior, population-ecology, and cultural history.

Social Science 103--Political Science

A basic course dealing with political institutions in their social context. A study of the social situation of modern nation-state systems in cross-cultural perspective to provide understanding of modern political systems. Emphasizes political sociology to draw attention to the nature of democracy and the problems which affect the democratic institutions.

Psychology 201--Introduction to Psychology

A course designed to give the student a general understanding of the science of psychology. Treats such topics as intelligence, motivation, emotions, sensation, perception, learning, and group processes. Emphasizes the relation between psychology and life.

Psychology 202--Psychology of Personality

A course designed to provide the student with an explicit concept of healthy personality. Attention given to the recognized theories of personality. Investigates the origin and modification of behavior in order that the student may understand the application of principles of mental hygiene.

Psychology 205--Human Growth and Development

Study of human growth and development from birth to senescence. Individual's development from the prenatal stage through post-adolescence stressed. Biological, psychological and sociological factors in human development emphasized.

Anatomy and Physiology 201

A course devoted to the study of the machinery of the human body, designed for students continuing in biology or related applied fields such as nursing and mortuary science. Divides the work into two terms, the first of which is a prerequisite to ANT 202. Covers the skeletal, muscular, nervous, special sensory and circulatory systems.

Anatomy and Physiology 202

A course designed to include study of the following systems: respiratory, digestive, excretory, endocrine, and reproductive. Stresses the physiology of each system.

Microbiology 203

A course designed as an introduction to medical bacteriology with emphasis on the most important communicable disease agents. A study of yeasts, fungi, and protozoa of medical importance, and also of culture media, isolation of pure culture, staining methods, practical sterilization, and the collection and handling of specimens.

Chemistry 101--An Introduction to Inorganic Chemistry

Presents basic inorganic chemical principles and theories.

Deals with the nature of atoms, molecules, chemical change, stoichiometry and the solid, liquid, gaseous states of matter. Student applies the basic laws of inorganic chemistry to problem-solving situations. Assumes no previous course in chemistry. A good understanding of algebra is necessary, and an understanding of geometry is desirable.

Chemistry 102--Inorganic Chemistry

Continuation of 101. Student is also introduced to chemical kinetics and chemical thermodynamics. Opportunity is provided for investigation of chemical phenomena after developing a more thorough understanding of inorganic chemical principles. Emphasis placed on chemical equilibrium, ionic equilibrium and electrochemistry.

Chemistry 103--Introduction to Organic Chemistry

Survey of basic organic principles. Develops student's understanding of homologous series and understanding of appropriate terminology. Relates basic organic concepts to the process of life and industry. (44:70)

BIBLIOGRAPHY

BIBLIOGRAPHY

Books

- 1. Alcorn, Marvin D., Linley, James M., <u>Issues in Curriculum</u>

 <u>Development</u>, World Book Company, Yonkers-onHudson, New York, 1959.
- 2. Anderson, Robert, <u>Teaching in a World of Change</u>, Harcourt, Brace and World, Inc., New York, 1966.
- 3. Beauchamp, George A., Curriculum Theory, The Kagg Press, Wilmette, Illinois, 1961.
- 4. Brown, Amy Frances, <u>Curriculum Development</u>, W. B. Saunders Company, Philadelphia, Pennsylvania, 1960.
- 5. Carpenter, Marjorie, The Larger Learning--Teaching Values to College Students, Wm. C. Brown Company Publishers, Dubuque, Iowa, 1960.
- 6. Conant, James Bryant, Shaping Educational Policy, McGraw-Hill Book Company, New York, 1964.
- 7. Conner, Forrect E., Ellens, William J., Curriculum Handbook for School Administrators, American Association of School Administrators, 1201 Sixteenth St., N.W., Washington, D.C., 20036, 1957.
- 8. Doll, Ronald C., Curriculum Improvement: Decision Making and Process, Allyn and Bacon, Inc., Boston, 1964.
- 9. Good, Carter V. and Scates, Douglas E., "Survey of Related
 Literature and Library Techniques," Methods of
 Research, Appleton-Century-Crofts, Inc., New York,
 1954.

- 10. Herrick, Virgil E. and Tyler, Ralph W., Toward Improved

 Curriculum Theory: The Organization of Learning

 Experiences, University of Chicago Press, Chicago,

 1950.
- 11. Inlow, Gail M., The Emergent in Curriculum, John Wiley and Sons, Inc., New York, 1966.
- 12. Koopman, Robert G., <u>Curriculum Development</u>, The Center for Applied Research in Education, New York, 1966.
- 13. Montag, Mildred L., Community College Education for Nursing, Division, McGraw-Hill Book Co., Inc., New York, 1959.
- 14. Oliver, Albert I., Curriculum Improvement: A Guide to Problems, Principles and Procedures, Dodd, Mead and Company, New York, 1965.
- 15. Rosenbloom, Paul C., Modern Viewpoints in the Curriculum:

 National Conferences on Curriculum Experimentation,

 McGraw-Hill Book Company, New York, 1964.
- 16. Sand, Ole, Role of Supervisor and Curriculum Director in a

 Climate of Change, Association for Supervision and
 Curriculum Development, (A department of the National
 Education Assoc.), 1201 Sixteenth St., N.W., Washington 6, D.C., 1965 Yearbook.
- 17. Saylor, J. Galen and Alexander, William M., Curriculum Planning for Better Teaching and Learning, Rinehart and Company, Inc., New York, 1955.
- 18. Schools for the Sixties, National Education Association, A
 Report of the Project on Instruction, McGraw-Hill
 Book Company, New York, 1963.
- 19. Sharp, George, Curriculum Development as Re-Education of the Teacher, Bureau of Publications, Teachers College, Columbia University, New York, 1951.
- 20. Stratemeyer, Florence B., Forkner, Hamden L., McKimm,
 Margaret G., Passow, A. Harry, Developing a Curriculum for Modern Living, 2nd edition revised,
 Bureau of Publications, Teachers College, Columbia
 University, New York, 1957.

21. Wood, Hugh B., Foundations of Curriculum Planning and

Development, The American-Nepal Education Foundation, Cascade-Pacific Books, Seattle, 1963.

Booklets, Pamphlets and Periodicals

- 22. Buechel, J. F. Marvin, "Why Junior College Education for Nursing," Nursing Outlook, Vol. 4, August, 1956.
- 23. Cafferty, Katherine W., "The Role of the Administrators of the Nursing Program in the Community-Junior College,"

 The League Exchange, No. 51, National League for Nursing, New York, 1960.
- 24. Characteristics of College-Controlled Programs in Nurse Education Leading to an Associate Degree, National League for Nursing, Department of Diploma and Associate Degree Programs, New York, October, 1960.
- 25. Criteria for the Evaluation of Educational Programs in Nursing

 Leading to an Associate Degree, National League for

 Nursing, Department of Diploma and Associate Degree

 Programs, New York, 1962.
- 26. Criteria for the Evaluation of Educational Programs in Nursing

 Leading to an Associate Degree, National League for

 Nursing, Department of Diploma and Associate Degree

 Programs, New York, 1967.
- 27. "Education for Nursing," American Nurses' Association,

 <u>American Journal of Nursing</u>, Vol. 65, No. 12, December, 1965.
- 28. Guide to Selection of Clinical Facilities for an Associate Degree

 Nursing Program, New York State Associate Degree

 Nursing Project, New York, New York, 1967.
- 29. Guiding Principles for College Controlled Nursing Programs in

 Michigan Leading to an Associate Degree and Eligibility

 for Registered Nurse Licensure, Michigan Board of

 Nursing, Lansing, Michigan, February 26, 1960.

- 30. Guiding Principles for Junior College Participation in Education for Nursing, New York, December 16, 1961, National League for Nursing.
- 31. Henderson, Virginia, "Is the Role of the Nurse Changing?" The Weather Vane, Vol. XXXVII, October, 1968, No. 5, West Virginia Nurses Association, Charleston, West Virginia.
- 32. Jensen, Mary E., "A Now Approach to Education," <u>Leadership</u> for Quality, National League for Nursing Report, New York, 1966.
- 33. Minimum Standards and Educational Criteria for Schools of Professional Nursing in Michigan, Michigan Board of Nursing, Lansing, Michigan, September, 1962.
- 34. Nursing Education Facilities, U.S. Department of Health,
 Education and Welfare, Public Health Service, June,
 1954.
- 35. Nursing Education Programs Today, prepared by the National League for Nursing at the biennial convention, Cleveland, Ohio, April, 1961.
- 36. Preliminary Steps in Establishing an Associate Degree Program in Nursing in the Junior College, The League Exchange, No. 31, National League for Nursing, New York, 1958.
- 37. Report on Associate Degree Programs in Nursing, National League for Nursing, New York, 1961.
- 38. Schmidt, Mildred S., "Factors Affecting the Establishment of Associate Degree Programs in Nursing in Community Junior Colleges," <u>League Exchange</u>, No. 77, National League for Nursing, New York, 1966.
- 39. Selection of Qualified Directors and Faculty Members for Nursing Education Programs Leading to an Associate

 Degree, National League for Nursing, Department of Diploma and Associate Programs, New York, January, 1961.

40. White, Dorothy T., "Abilities Needed by Teachers of Nursing in Community Colleges," The League Exchange, No. 56, National League for Nursing, New York, 1961.

Other Sources

- 41. Annual Report 1964-1965, Michigan Board of Nursing, Lansing, Michigan.
- 42. General Corporation Act, copy from Michigan Board of Nursing, Lansing, Michigan, March, 1962.
- 43. Information for an Agency Applying for Initial Approval to

 Develop a Program in Nursing, Michigan Board of

 Nursing, Lansing, Michigan, August 14, 1962.
- 44. Lansing Community College Catalog, Lansing, Michigan, 1967-68.
- 45. Laws Relating to the Practice of Nursing, Michigan Dept. of Nursing, Lansing, Michigan, 1957.
- 46. Michigan Population by County, Michigan Department of Health, Lansing, Michigan, September 9, 1962.
- 47. Olson, Janice F., A Plan for the Kellogg Community College

 Associate Degree Nursing Program, (unpublished)

 Battle Creek, Michigan, November, 1960.
- 48. Randall, Joyce L., "A Study to Determine the Need of the Greater Lansing Community for a Two-Year, Associate Degree Program in Nursing," Lansing Community College, Lansing, Michigan, Part I, 1962; Part II, 1964.
- 49. Seyler, Mildred, Michigan Board of Nursing Education Consultant, Conferences, Lansing, Michigan, 1964-1967.
- 50. State of Michigan, 74th Legislature, Regular Session of 1967, Enrolled House Bill No. 2597, October, 1966.

- 51. "Title VIII-Nurse Training, Public Law 88-581, 88th Congress, H. R. 11241, September 4, 1964.
- 52. Thaden, J. F., Enrollment Projections in Lansing Community

 College, Lansing Area Community College Survey,

 July, 1963.