NURSES' ATTITUDES ABOUT THE LEARNING ABILITY OF THE OLDER ADULT

A Thesis

Presented to

The Graduate Faculty of The University of Akron

In Partial Fulfillment

of the Requirements for the Degree

Master of Science in Nursing

Edwardine Baznik, S.J.S.M.

May, 1980

1980

NURSES' ATTITUDES ABOUT THE LEARNING ABILITY OF THE OLDER ADULT

Edwardine Baznik, S.J.S.M.

Thesis

Approved:

Dolores W. VanDerwood
Adviser

Accepted:

Lillian Deyrup
Dean of the College

Faculty Reader

A. N. Brent
Dean of Graduate Studies and Research

Virginia B. Keenberg
Faculty Reader

May 9, 1980
Date

ABSTRACT

This study examined nurses' attitudes about the learning ability of persons in a patient education situation. A total of sixty-three registered nurses from two district groups of the state nurses' association participated in the study.

A General Information Sheet provided descriptive information about the subjects from the two data collection settings. Data indicated marked differences between the two groups in terms of level of nursing education attained, area of employment, and participation in further study on the topic of patient education.

The investigator developed the Patient Learning Ability Opinion Survey instrument to measure attitudes about the learning ability of the older and younger patient. Subjects were asked to indicate their opinion about ten statements related to a hypothetical patient education situation. A four-point Likert-type scale was used; the scale offered four possible opinion responses (Strongly Agree, Agree, Disagree, and Strongly Disagree). At each of the two data collection settings, approximately one-half of the subjects received a patient education situation describing a 75-year-old adult and the other

half received a patient education situation describing a 32-year-old adult.

Scores determined by arbitrarily assigned values for degree and direction of response were analyzed to address the research questions on which the study was based: (1) What are nurses' attitudes about the learning ability of the older adult? (2) What are nurses' attitudes about the learning ability of the younger adult? (3) Is there a difference in nurses' attitudes about the learning ability of the older adult compared to nurses' attitudes about the learning ability of the younger adult?

Based on the median score of the total sample, results of the study indicated that a larger number of responses reflected a less positive attitude about the learning ability of the older adult when compared to responses which reflected a more positive attitude about the older adult's learning ability. For the younger patient education situation, there was a larger number of responses reflecting more positive attitudes about the learning ability of this age group when compared to responses reflecting less positive attitudes about learning ability for the 32-year-old adult. Using the median test, data failed to show that there was a significant difference in nurses' attitudes about the learning ability of the older adult when compared to nurses' attitudes about learning ability of the younger adult.

ACKNOWLEDGMENTS

I would like to express my gratitude to the many people who have contributed to the completion of this thesis.

I wish to express my gratitude to my adviser, Dr. Dolores W. VanDervort, for her continued support and direction throughout the preparation of this paper. Her enthusiasm for research was a constant source of strength. I also would like to express my appreciation to Mrs. Ella Kick and Dr. Virginia B. Newbern for their contributions as faculty readers.

I wish to acknowledge the assistance of the members of District Three and the Summit and Portage District of the Ohio Nurses' Association.

I would like to recognize the statistical consultation offered by Lawrence Burant, Jr.

To my religious community and to my family, I extend my sincere gratitude for their encouragement, patience, and interest throughout this endeavor. Without their loving support, this thesis could not have been completed.

TABLE OF CONTENTS

CHAPTER Page

Page

APPENDICES (continued)

LIST OF TABLES

LIST OF FIGURES

FIGURE Page

CHAPTER I

DEVELOPMENT OF THE PROBLEM

Introduction

Lifespan research done during the past decade provides a scientific basis for the belief that learning can take place at all developmental levels. Persons in the middle and late years, not only the young, ". . . are capable of an educative response to instructional stimulation."[1] Information is accumulating from recent research about intellectual functioning in the older adult that ". . . the aged have considerable intellectual potential and ability to learn and benefit from education."[2]

However, there is evidence this belief has not been integrated into the American ideology. An impression of the elderly is ". . . that older persons characteristically show a loss of recent memory and impaired learning ability. . ." despite the fact that ". . . empirical data concerning intellectual changes in the aged do not fully support this impression but instead are complex and contradictory."[3]

There is still widespread acceptance of the decremental model of aging supported by a half century of

gerontological research which describes aging as being "synonymous with intellectual and physical decline, decreasing social effectiveness, and the extinction of intellectual and sensual stimulation and pleasures."[4] According to this model, the human organism experiences gradual but cumulative deterioration as the individual passes through middle to old age.[5]

Nurses are beginning to identify an absence of health teaching among the elderly.[6] Numerous factors affect implementation of patient education for the older adult. Among the variables which need to be researched on this topic are: beliefs and attitudes about the older learner, knowledge and skills of the health professional concerning teaching methods to be used with the elderly, and organizational policies and priorities which affect the nature and amount of health teaching done with older patients.

This study will focus on attitudes that nurses have about the learning ability of the older adult. How the health professional perceives the older adult will affect health teaching done with persons in that age group. An effective teacher-learner relationship is predicated on the ability of the teacher to view each learner as a unique person with individual abilities. Stereotypes and prejudices based on generalizations about the learner

as a member of a group can block the accomplishment of this relationship.[7]

Teaching is one of the activities the nurse performs in attempting to accomplish the basic purpose of nursing--the promotion of health.[8] A general definition of teaching is ". . . any interpersonal influence aimed at changing the way in which other persons can or will behave."[9] Health teaching done with the elderly will be affected by the nurse's beliefs and attitudes about the learner's potential for effecting behavioral or attitudinal change.

Knowledge can direct nursing action, but this action is initiated and maintained by feeling and will.[10] Exploration of nurses' attitudes about the learning ability of the older adult is an essential step in studying the topic of patient education for the older adult.

Conceptual Framework

The formation of attitudes toward the elderly can be explained by means of the concept of labeling, using a symbolic interactionist perspective. Labeling is a part of the circular process in which interaction among individuals shapes the social structure and the social structure, as a network of interaction, molds the individual.[11] The importance of the self-concept (". . . that organization of qualities that the individual attributes to

himself")[12] in the interaction process, is based on the following assumptions:

1. the individual's conception of himself is based on his perception of the way others are responding to him

2. the individual's conception of himself functions to direct his behavior (defined broadly to include action, appearance . . .)

3. the individual's perceptions of others' responses are an accurate reflection of the actual responses that the others are directing toward the individual

4. these actual responses are based on their (others') reaction to the individual's behavior[13]

Self-concept is the result of messages conveyed by the persons, objects, and groups that are meaningful components of the individual's lifespan. Mead describes this process of development of the self or self-concept:

> The individual experiences himself as such, not directly, but only indirectly, from the particular standpoints of other individual members of the same social group, or from the generalized standpoint of the social group as a whole to which he belongs . . . and he becomes an object to himself only by taking the attitudes of other individuals toward himself within a social environment or context of experience and behavior in which both he and they are involved.[14]

Although the development of the construct of self-concept is essential to understanding symbolic interactionism, attitude is the pivotal concept which explains the relationship of labeling and social interaction within the symbolic interactionist perspective. An attitude is ". . . a learned predisposition to respond in a

consistently favorable or unfavorable manner with respect to a given object."[15]

Attitudes toward the elderly develop from the person's perception of the older adult's interaction within society. If the older person views himself as inadequate in terms of physical, mental, or social functioning, he will convey this self-concept by means of his behavior. This behavior in turn will become the basis for others' beliefs and attitudes about the older person which has the consequence of reinforcing his negative self-concept. Labeling a person as "old" connotes that a certain behavior is expected of the individual, based on the definition of "old" which society holds. Societal definitions are ". . . the medium through which behavioral norms are communicated."[16]

The process of labeling involves beliefs and stereotypes in conjunction with the concept of attitude. Beliefs are the fundamental building blocks for any mental conceptualization. It is the totality of an individual's beliefs which serves as ". . . the informational base that ultimately determines his attitudes, intentions and behaviors."[17] Stereotypes are beliefs or opinions based on illogical reasoning in which characteristics which are factually inaccurate are attributed to a person or group. The nature of the stereotype, whether positive or negative, will determine what behavior

society will expect of the individual or group being labeled. Labels ". . . are simply the reflections of the expectations of others or . . . the symbolic representations of prescriptive and proscriptive social norms."[18] It is the definition of the label which sets in motion the symbolic interactionist process of self-concept resulting in the behavioral response.

Review of the Literature

The paucity of published studies which address the specific topic of nurses' attitudes about learning ability of the older adult necessitated a review of the literature addressing the broad topic of attitudes toward the elderly. The first part of the literature review addresses attitudes of the general population toward the elderly. Attitudes of health care personnel toward the elderly are covered in the second part of the literature review.

Attitudes of the General Population Toward the Elderly

Tuckman and Lorge measured attitudes toward old age among a group of 147 graduate students. The researchers used a questionnaire consisting of 137 statements based on misconceptions and stereotypes about old people. Data indicated a substantial acceptance of these misconceptions and stereotypes by the subjects. Results

illustrated subjects perceived old age as ". . . a period characterized by economic insecurity, poor health, loneliness, resistance to change, and failing physical and mental powers."[19] Tuckman and Lorge perceived these responses to be a reflection of existing cultural expectations of the elderly.

In a later study, Tuckman and Lorge administered their original questionnaire about misconceptions and stereotypes of the elderly to a sample of eighty-nine subjects aged sixty to eighty. The sample was composed of three groups: persons living in the community, those living in an apartment house, and patients in an institution for the aged. The investigators hypothesized that as individuals became less capable of managing day-to-day living in the community, they would subscribe to more misconceptions and stereotypes about the elderly. Data indicated a significant difference among the three groups of subjects in their responses to certain categories of the questionnaire related to the older person's ability to function in the community (i.e., physical decline, insecurity, personality characteristics, mental deterioration, financial matters). Agreement with misconceptions and stereotypes about old people tended to increase progressively among subjects who were less capable of living in the community. A comparison of subjects' responses to the attitude questionnaire and the Cornell

Medical Index and Supplement supported the investigators' observations that the subjects projected their own experiences when responding to statements about old people. Tuckman and Lorge offered the following explanation for the results:

> Differences between these groups in subscribing to the stereotypes about old people stem not only from the acceptance of the cultural expectations about the role and activities of old people and the individual's observations of old people around him, but also from the realization and acceptance of these statements as applied to themselves.[20]

Golde and Kogan used a matched experimental-control sentence completion test to elicit spontaneous feelings about various aspects of old people's lives from a sample of one hundred undergraduate students ranging in age from seventeen to twenty-three. The purpose of the study was to test the hypothesis that attitudes toward the elderly are qualitatively different from attitudes about the broader class of people in general. Data demonstrated that specific terms applied to old people differed significantly from those used to describe people in general although these differences were not always in a direction unfavorable to old people. Analysis of the responses used in conceptualizing old people as compared to people in general identified several main themes which reflect sociocultural norms: dependency or activity, degree of interest in an achievement-success goal, and loneliness as opposed to satisfying interpersonal relations.[21]

Aaronson also emphasized the existence of socially created norms as an important factor in determining human behavior:

> These norms or stereotypes, arise both from cultural prescription of how people are supposed to behave and from observations of how they do behave. They enable an individual to determine when certain responses are appropriate and to adjust his behavior accordingly.[22]

The Gough Adjective Rating Scale was administered to a sample of forty evening school students with an age range of seventeen to forty-two for the purpose of testing the hypothesis that there are certain identifiable behavioral stereotypes of people at various age levels. Words which showed the highest level of correlation for the last three decades of the lifespan could be categorized according to two main characteristics: anergic constriction and asocial inefficiency. Both factors are related to the process of socialization which continually reinforces a progressively restricted range of behavior culminating in the phenomenon of the older person being "socialized out of life."[23]

Hickey and Kalish investigated some of the attitudes and perceptions which children and young adults have toward older adults and the elderly. Based on the assumptions that society in general stereotypes the aged with negative images and that older persons tend to maintain negative self-concepts, the investigators speculated that

the individual's view of himself is learned not only by the way others see him but also by his early learning of social roles. Results of this study involving 335 students aged eight to twenty demonstrated the following: (1) children of all ages do perceive age-related differences between distinctly different adult age groups; (2) these perceived differences become greater as the child becomes older; and (3) the older the adult, the less pleasant image the child has of him.[24]

The existence of a predominantly negative stereotype of old age is identified in the majority of the gerontological studies on this subject. Brubaker and Powers suggested the need for research to clarify elements of the negative stereotype/self-concept process.

The character of the stereotype of old age

> . . . is at issue because it affects not only the manner in which younger persons perceive and interact with aged individuals but also influences the self definitions and behavior of older persons.[25]

The researchers questioned the currently held assumption that the aged individual necessarily accepts a negative stereotype of old age. They proposed an alternative model in which the self-concept formed at an earlier age mediates between the definition of self as old and the acceptance of a stereotype of old, whether positive or negative.[26]

Attitudes of Health Care Personnel Toward the Elderly

There has been a limited number of published studies on the topic of nurses' attitudes toward the elderly during the past decade. Most of these studies have utilized standardized instruments from gerontological research (i.e., Tuckman-Lorge questionnaire, Kogan's Old People Scale) to measure nurses' attitudes toward the elderly. Relationships between these attitudes and variables pertaining to the nursing population being studied often reflect sociocultural factors which influence beliefs and feelings about older adults.

Campbell investigated the relationship between acceptance of stereotypes about old people and specific characteristics of three levels of nursing care personnel (i.e., registered nurses, licensed practical nurses, and nursing assistants). These characteristics included: age, educational level, recency of nursing education, shift most frequently worked, special training in geriatric nursing, amount of time spent in caring for the elderly, and experience with the elderly. Data analysis of subjects' responses to the Tuckman-Lorge questionnaire indicated that none of the three categories of nursing care personnel tested in this study demonstrated a lack of stereotyped attitudes concerning the elderly. Level of

education of the subject and time spent caring for the elderly were the two most significant variables in this study. Findings related to these variables included: (1) as the level of education increased, the stereotype acceptance decreased: (2) childhood and current experiences with the elderly did not influence stereotype acceptance; and (3) the more time the subject spent with the elderly patient, the more likely one was to accept stereotyped statements.[27]

In a similar study, Gillis attempted to determine differences in attitudes toward the elderly among registered nurses, licensed practical nurses, and nurses' aides. Attitudes were studied in relation to four selected variables pertaining to the health care employee: (1) age, (2) education, (3) length of employment, and (4) type of agency where employed. Data were collected using a revised form of Lowy's instrument for measuring attitudes toward the elderly. Results of data analysis rejected the hypothesis that baccalaureate degree nurses forty-five years of age and older who have cared for elderly patients for more than nine years and who are employed in hospitals would have more positive attitudes about older people in general. In contrast to Campbell's findings, data indicated that associate degree and diploma nurses in this study had more positive attitudes toward the elderly than did baccalaureate nurses. Those

nurses having two years or less experience in caring for the elderly had more positive views of this population than nurses with a longer period of experience in geriatric nursing.[28]

A basic premise of Futrell and Jones' study is that the socialization process of the health professional does not encourage the development of positive attitudes toward the elderly. The researchers compared three samples (i.e., physicians, nurses, and social workers) in terms of attitudes toward the elderly and their beliefs about the provision of health maintenance services for the elderly. Findings indicated the total sample had a slightly positive attitude toward the elderly using Kogan's Old People's Scale. Of these three categories of health professionals, social workers had the most positive attitudes toward the elderly, followed by nurses, and then physicians. There was no significant relationship between nurses' attitudes and the importance they assigned to health needs for the elderly. Data correlating attitudes and personal characteristics of the subjects indicated that older, better educated, and more experienced nurses had more positive attitudes toward the elderly. Futrell and Jones conclude that nurses in this sample who had extensive experience with the elderly would have more positive attitudes toward this age group because

of the contact with the elderly associated with their work.[29]

Hatton utilized Kogan's Old People's Scale and a process of content analysis of written observations of nurse-patient interactions to determine whether attitude toward the aged correlated with an increased or decreased response to individual geriatric patient needs. Two of the assumptions identified in the study were: (1) the aged are a culturally defined group, and (2) attitudes about the aged are products of learning. Due to a number of methodological limitations of the study such as small sample size and the effect of an observer on subject behavior, findings could not be generalized outside of the study population. However, results of the study did support the assumption that the nurses with a more favorable disposition toward the aged exhibit a high percentage of positive interactions with them. Favorable disposition toward the aged was operationally defined as decreased acceptance of culturally defined stereotypes.[30]

Recognizing that nurses are a product of society, Taylor and Harned studied attitudes of nurses who care for or direct the care of the elderly to determine if these nurses reflected the negative attitudes of society in general concerning older people. Data indicated that nurses under 40 years of age with less than ten years' experience with the elderly, who lived in neighborhoods

that did not include old people, had more positive attitudes toward the elderly.[31] These findings conflicted with the results of Futrell and Jones' study which identified the older and more experienced nurse as having more positive attitudes toward the elderly.[32] Taylor and Harned's data about the relationship of nurses' attitudes and length of experience in caring for the elderly were consistent with Gillis' findings. In the latter study, nurses having two years or less experience in working with the elderly demonstrated more positive attitudes about the elderly than nurses having a longer period of experience with them.[33] These findings suggested that although stereotypes can result from lack of knowledge about a group, it is not possible to predict that exposure to or contact with the group will effect a decrease in stereotyped beliefs about that group. The quality of the experience would need to be examined as one of many variables related to the formation and modification of stereotyped beliefs.

Attitudes and stereotypes about the elderly have been the subject ~~of much~~ research in the past few decades. Sociocultural norms influence people's perceptions of the characteristics and abilities of this age group.

There have been few studies in the behavioral sciences which specifically address the topic of attitudes about the learning ability of the older adult. Recent

gerontological literature is lending support to the idea that learning can take place at all stages in the life cycle. Yet studies which measure attitudes toward the elderly have indicated people in general often believe or perceive mental functioning to be limited or impaired in the older person.

Nursing research has demonstrated that nurses do reflect the attitudes of society in general concerning the elderly. There is a need to explore the relationship of nurses' attitudes about learning ability in the elderly and their behavior toward that population in such nursing activities as patient education.

Statement of the Problem

This study will examine nurses' attitudes concerning the learning ability of the older adult in a patient education situation.

Purpose of the Study

The purpose of this study is to explore nurses' attitudes about the learning ability of the older adult using a hypothetical patient education situation.

Research Questions

The review of the literature and statement of the problem generated the following research questions:

1. What are nurses' attitudes about the learning ability of the older adult in a patient education situation?
2. What are nurses' attitudes about the learning ability of the younger adult in a patient education situation?
3. Is there a difference in nurses' attitudes about the learning ability of the older adult compared to nurses' attitudes about the learning ability of the younger adult?

Definition of Terms

For the purpose of this study, the main terms used in the problem statement will be defined in the following manner:

1. Nurses: registered professional nurses licensed to practice nursing in the state of Ohio.
2. Attitudes: positive or negative responses to selected statements related to a hypothetical patient education situation measured by the Patient Learning Ability Opinion Survey instrument.
3. Learning ability: the capacity to acquire information, skills, or attitudes which are the basis for actual or potential change in the individual's response to the environment.[34]

4. Older adult: any person sixty-five years of age or older.

5. Patient education situation: a hypothetical patient teaching situation developed for the Patient Learning Ability Opinion Survey instrument.

FOOTNOTES

CHAPTER I

[1]Howard Y. McCluskey, "Education for Aging: The Scope of the Field and Perspectives for the Future," in Education for the Aging. Living with a Purpose as Older Adults through Education: An Overview of Current Developments, eds. Stanley M. Grabowski and W. Dean Mason (Syracuse, New York: Eric Clearing House on Adult Education, 1974), p. 325.

[2]Samuel Granick and Alfred S. Friedman, "Educational Experience and the Maintenance of Intellectual Functioning by the Aged: An Overview, in Intellectual Functioning in Adults: Psychological and Biological Influences, eds. Lissy F. Jarvik, Carl Eisdorfer, and June E. Blum (New York: Springer Publishing Company, Inc., 1973), p. 61.

[3]Carl Eisdorfer, "Intelligence and Cognition in the Aged," in Behavior and Adaptation in Late Life (2nd ed.), eds. Ewald W. Busse and Eric Pfeiffer (Boston: Little, Brown and Company, 1977), p. 212.

[4]Neville Strumpf, "Aging--A Progressive Phenomenon," Journal of Gerontological Nursing 4 (March-April, 1978):18.

[5]Elizabeth M. Barton, "Recent Findings on Adult and Gerontological Intelligence: Changing a Stereotype of Decline," in Age in Society, ed. Anne Foner (Beverly Hills: Sage Publications, 1976), p. 93.

[6]Dorothy V. Lundin, "Must Taking Medications be a Dilemma for the Independent Elderly?" Journal of Gerontological Nursing 4 (May-June, 1978):25-26.

[7]Margaret Pohl, Teaching Function of the Nursing Practitioner, 3rd ed. (Dubuque, Iowa: Wm. C. Brown Company, Publisher, 1978), pp. 41-42.

[8]Ibid., p. 1.

[9]Barbara K. Redman, The Process of Patient Teaching in Nursing, 3rd ed. (St. Louis: The C. V. Mosby Company, 1976), p. 9.

[10]Frances Storlie, Patient Teaching in Critical Care (New York: Appleton-Century-Crofts, 1975), p. 1.

[11]Jonathon H. Turner, The Structure of Sociological Theory (Homewood, Illinois: The Dorsey Press, 1974), p. 152.

[12]John W. Kinch, Social Psychology (New York: McGraw-Hill Book Co., 1973), p. 79.

[13]Ibid., pp. 80-81.

[14]George H. Mead, Mind, Self and Society, ed. Charles W. Morris (Chicago, Illinois: The University of Chicago Press, 1934), p. 138.

[15]Martin Fishbein and Icek Ajzen, Belief, Attitude, Intention and Behavior: An Introduction to Theory and Research (Reading, Massachusetts: Addison-Wesley Publishing Company, 1975), p. 6.

[16]Ronald A. Farrell and Victoria Lynn Swigart, Social Deviance (Philadelphia: J. B. Lippincott Co., 1978), pp. 2-3.

[17]Ibid., p. 14.

[18]Agnes A. Cullen, "Labelling Theory and Social Theory," Perspectives in Psychiatric Care 12 (July-September, 1974):125.

[19]Jacob Tuckman and Irving Lorge, "Attitudes Toward Old People," Journal of Social Psychology 37 (May, 1953):259-60.

[20]Jacob Tuckman and Irving Lorge, "The Effect of Institutionalization on Attitudes Toward Old People," Journal of Abnormal and Social Psychology 47 (July-September, 1952):338.

[21]Peggy Golde and Nathan Kogen, "A Sentence Completion Procedure for Assessing Attitudes Toward Old People," Journal of Gerontology 14 (July, 1959):359.

[22]Bernard S. Aaronson, "Personality Stereotypes of Aging," Journal of Gerontology 21 (July, 1966):458.

[23]Ibid., p. 461.

[24]Tom Hickey and Richard A. Kalish, "Young People's Perceptions of Adults," Journal of Gerontology 23 (April, 1968):218-19.

[25]Timothy H. Brubaker and Edward A. Powers, "The Stereotype of 'Old': A Review and Alternative Approach," Journal of Gerontology 31 (July, 1976):442.

[26]Ibid., p. 446.

[27]Margaret E. Campbell, "Study of the Attitudes of Nursing Personnel toward the Geriatric Patient," Nursing Research 20 (March-April, 1971):149-50.

[28]Sister Marion Gillis, "Attitudes of Nursing Personnel toward the aged," Nursing Research 22 (November-December, 1973):517-19.

[29]May Futrell and Wyatt Jones, "Attitudes of Physicians, Nurses, and Social Workers toward the Elderly and Health Maintenance Services for the Aged: Implications for Health Manpower Policy," Journal of Gerontological Nursing 3 (May-June, 1977):43-45.

[30]Jean Hatton, "Nurse's Attitude Toward the Aged: Relationship to Nursing Care," Journal of Gerontological Nursing 3 (May-June, 1977):26.

[31]Kathleen H. Taylor and Thomas L. Harned, "Attitudes Toward Old People: A Study of Nurses Who Care for the Elderly," Journal of Gerontological Nursing 4 (September-October, 1978):43.

[32]Futrell and Jones, p. 45.

[33]Gillis, "Attitudes of Nursing Personnel toward the Aged," p. 519.

[34]Pohl, Teaching Function of the Nursing Practitioner, p. 13.

CHAPTER II

METHODOLOGY

Introduction

Literature reviewed in Chapter I indicated that the general population does accept negative stereotypes about the elderly. Nursing research has addressed the topic of nurses' attitudes in general about the elderly. This chapter describes the methods used to explore nurses' attitudes about the learning ability of the older adult. The design of this exploratory descriptive study is cross-sectional in nature and includes: (1) selection of a nonprobability sample of volunteers, and (2) development and administration of an instrument to measure attitudes about learning ability.

Sample and Setting Design

A nonprobability sample of registered nurses was obtained from an accessible population consisting of the membership of two district groups of the state nurses' association. Nonprobability sampling utilizes the most readily available persons from the population being studied.[1] This method of sampling was selected because

it provided access to a population of nurses to whom an instrument could be administered in a group setting. No attempt was made to control for the variables of age, sex, length of nursing experience, educational background, and agency of employment.

Since each of the two districts had an average attendance of thirty-five to forty-five members at their monthly meetings, the investigator made arrangements to request volunteers for participation in the present study at both district meetings in order to obtain an adequate sample size. The districts will be identified in the study as Groups I and II. Members in Group I consisted of nurses from two counties in a large midwestern state. Members in Group II represented nurses from a large industrial city in the Midwest. A total of eighty-five members attending the two district meetings was approached to participate in the study; sixty-six members volunteered to participate in the study. The criterion for participation in the study was that potential subjects be registered professional nurses licensed to practice nursing in the state of Ohio.

Instrument Design

Instruments used for data collection consisted of: (1) a General Information Sheet, and (2) the Patient Learning Ability Opinion Survey. A sample of the

instrument packet used for data collection is included in appendix A.

The General Information Sheet was developed to provide background infomation about the subjects as follows: age, sex, highest level of nursing education attained, total years of nursing experience, current or most recent place of employment, age range of patients with whom they would prefer to work, and participation in further study on the subject of patient education.

The Patient Learning Ability Opinion Survey instrument was developed by the investigator since a review of the literature failed to identify an instrument which specifically measured attitudes about learning ability. This instrument consists of two patient education situations and ten accompanying statements related to the situations. The two patient education situations describe a seventy-five-year-old adult and a thirty-two-year-old adult. The Patient Learning Ability Opinion Survey instrument will be used to measure attitudes of nurses about patient learning ability.

This opinion survey instrument utilizes a self-report method which indicates the subject's opinion about patient learning ability. An indirect method of attitude measurement was used to avoid the bias of testing directly for attitude since a direct test of attitude often represents ". . . individual views of the social norms

(psychosocial scales) defining how persons should act, not how they themselves do or would act."[2]

The title Patient Learning Ability Opinion Survey was chosen to decrease the possibility of the subject developing negative feelings which may occur with tests which explicitly indicate attitude measurement. Attitudes are inferred from actions and responses.[3] For the purpose of this study, an opinion will be considered to be the written expression of an attitude.

Content of statements related to the patient education situations was drawn from four sources: (1) gerontological literature pertaining to attitudes and stereotypes of the elderly, (2) literature about the adult learner, (3) interviews with registered nurses involved in patient education, and (4) the investigator's experience in teaching older adults. Information included in the statements focused on opinions about such topics as the older person's potential for behavioral change, concentration and motivational levels which may affect the older person's learning ability, and changes in cognitive processes related to learning in the older person. Age as a possible variable in assessing learning ability was addressed directly in two of the ten statements.

Statements in the Patient Learning Ability Opinion Survey instrument were worded so that a given direction of response such as a positive or negative attitude would be

indicated by agreement with some of the statements and disagreement with others. It was assumed that a positive attitude about the learning ability of the older/younger patient would elicit an opinion indicating agreement with statements 2, 6, 10 and disagreement with statements 1, 3, 4, 5, 7, 8, 9. Disagreement with statements 2, 6, 10 and agreement with statements 1, 3, 4, 5, 7, 8, 9 would indicate a generally negative attitude about the learning ability of the older/younger patient.

For scoring purposes numerical values were arbitrarily assigned to each of the four possible choices indicating direction of opinion. This scoring procedure is summarized in table I. A high total score would indicate a negative attitude about the learning ability of the older/younger adult; a low total score would indicate a positive attitude about patient learning ability.

Validity and Reliability of the Instruments

Development of the instrument design included an analysis of the Patient Learning Ability Opinion Survey instrument for validity and reliability. Validity and reliability of the General Information Sheet was not assessed because this instrument was designed to elicit demographic data.

TABLE I

ASSIGNED VALUES FOR RESPONSES TO THE PATIENT LEARNING ABILITY OPINION SURVEY

Statement	Strongly Agree	Agree	Disagree	Strongly Disagree
1	2	1	-1	-2
2	-2	-1	1	2
3	2	1	-1	-2
4	2	1	-1	-2
5	2	1	-1	-2
6	-2	-1	1	2
7	2	1	-1	-2
8	2	1	-1	-2
9	2	1	-1	-2
10	-2	-1	1	2

A panel of three registered nurses critiqued the Patient Learning Ability Opinion Survey for content validity. This panel included a patient educator, a clinical specialist in gerontological nursing, and a coordinator of career development for professional nurses.

After this critique was done, a pilot study was conducted with fourteen registered nurses as subjects in order to determine the variability and direction of responses to the statements in the opinion survey instrument. As a result of the findings of the pilot study, four of the fourteen original statements were deleted from the instrument due to a lack of variability in response to these statements. Several statements were reworded to clarify direction of response and to eliminate ambiguity of wording.

Each subject in the pilot study was given both the older and younger patient education situations. The subject was directed to indicate opinions about the same set of statements for both of the case situations. A sequence effect was observed in the pilot study data. This phenomenon can be operationally defined for this study as the tendency to respond in a similar manner to both patient education situations due to a lack of interval time in administering the case situations. The decision was made for future data collection to use a split sample in which half of the study sample would receive

the older patient education situation and the other half would receive the younger patient education situation. The rationale for using this approach is offered by Axelrod and Eisdorfer:

> . . . the responses given by S_s in different groups represent, uncontaminated by the effects of the sequence, the responses that would be given by the same S_s referring the statements to each of the stimulus groups.[4]

External validity of subject responses from the two data collection sessions (Groups I and II) was not attempted through statistical analysis. In examining the histogram (figure 1) representing the overall scores of Groups I and II on the Patient Learning Ability Opinion Survey, variance of data was observed between the two groups. Therefore, responses from Groups I and II are considered to be the result of two independent samples.

Internal validity of the Patient Learning Ability Opinion Survey instrument was tested using Kendall's Tau with tied ranks, a nonparametric measure of correlation based on ranks of observations. This test for reliability is based on the premise that ordinal measurement of both X and Y variables (responses to sets of statements on the opinion survey instrument) has been achieved. Since every subject can be assigned a rank on both X and Y variables, this statistic will measure the degree of association or correlation between the two sets of ranks and can be subjected to tests of significance.[5]

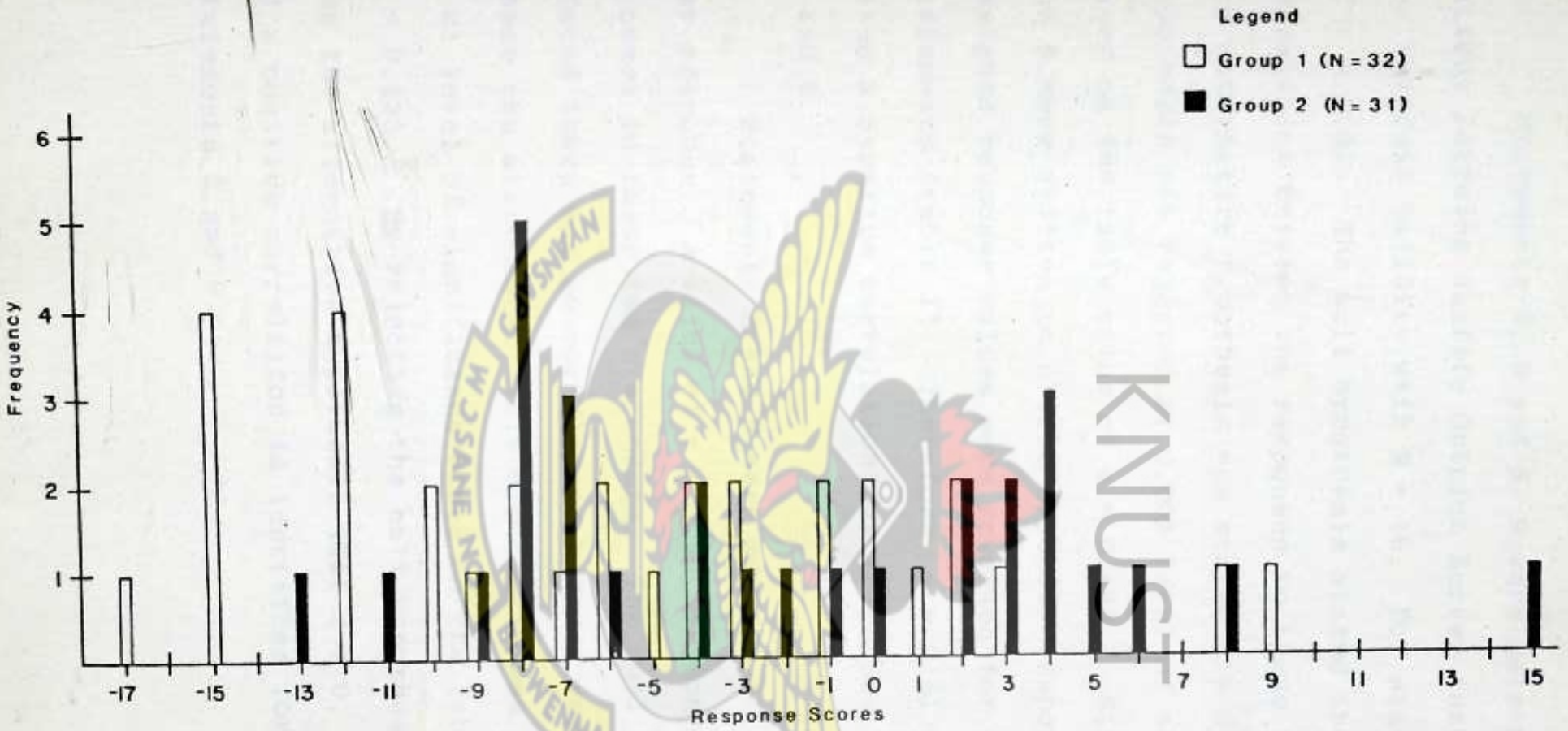

Figure 1. Histogram Demonstrating Frequency of Response Scores Derived from Patient Learning Ability Opinion Survey

Statements 6, 8 and 5, 9 were selected from the Patient Learning Ability Opinion Survey instrument to test for internal validity with N = 16. For statements 6 and 8, $\tau = 0.81$. The null hypothesis stated there was no correlation between the responses to these two statements. The alternative hypothesis was stated $\tau > 0$. The null hypothesis was rejected at 0.005 level of significance based on the table value of $\tau = 0.483$.[6] Statements 6 and 8 were written to elicit opposite responses. The assigned response values were reversed for these two statements (table I). Therefore, $\tau = 0.81$ actually indicates a negative correlation for responses to statements 6 and 8.

Statements 5 and 9 were written to elicit a similar response. A value of $\tau = 0.46$ was computed for responses to these two statements. The null hypothesis stated there was no correlation between responses to these two statements. This hypothesis was rejected at 0.01 level of significance based on the table value of $\tau = 0.433$.[7] By rejecting the null hypothesis and accepting the alternative hypothesis that $\tau > 0$, the existence of a positive correlation is identified for responses to statements 5 and 9.

Administrative Design

Prior to contacting potential subjects, a letter of introduction and explanation about the proposed study was sent to the presidents of two districts of the state nurses' association (appendix B). Tentative approval was granted to request volunteers from members attending the scheduled monthly meetings of the two districts. The study design was approved by the Committee for the Protection of Humans in the Area of Research at The University of Akron. Written approval to conduct the study at the monthly meetings of the two district nurses' organizations was then secured from the respective advisory boards.

Due to differences in meeting agendas of the two district nurses' organizations, it was necessary to use a different method in administering the instruments at each of the data collection sessions. Group I was given a printed Statement of Introduction and Explanation (appendix C) as members arrived at the meeting. Subjects in Group II had the same Statement of Introduction and Explanation read to them at a preset time during the meeting (see appendix C).

Both district meetings were scheduled for the same date and time. An assistant who was a member of Group I administered the instrument at that meeting.

The investigator administered the instrument to subjects in Group II. To assure consistency in communication with subjects, the investigator met with the assistant prior to the data collection sessions. Instructions concerning data collection were given and possible questions with suggested responses were identified.

Information and Consent Forms (appendix D) were signed by both the investigator and subjects, with a duplicate copy being retained by the subject. Subjects then received the instrument packet (appendix A) containing the General Information Sheet and the Patient Learning Ability Opinion Survey. Code numbers were assigned to the instrument packets in the following manner: odd numbers designated the patient education situation which described an older adult; even numbers designated the patient education situation describing a younger adult. For example, number 1 indicated the older patient situation; number 2 indicated the younger patient situation. Instrument packets were distributed according to code numbers at both meetings as follows: every other subject received either an odd or even numbered packet so that one half of the subjects in each data collection session received the older patient situation and half received the younger patient situation.

When data collection was completed for each group, subjects placed the instrument packets in a marked

box in the meeting room. Sixty-six instrument packets were distributed at the two data collection sessions. Three instrument packets were eliminated from the study; two were incomplete and the third packet was not returned at the time of the data collection session.

Scope and Limitations of the Study

The design of this study provides descriptive data related to nurses' attitudes about patient learning ability. This is meant to be a preliminary study which can be used as a basis for future research on the broader topic of patient education for the elderly.

Characteristics of the subjects resulting from the self-selective nature of the population from which the sample was drawn could influence subjects' responses. The process of self-selection occurs

> . . . when the members of the groups being studied are in the groups, in part, because they differentially possess traits or characteristics extraneous to the research problem, characteristics that possibly influence or are otherwise related to the variables of the research problem.[8]

Methodology for data collection was not uniform since it was necessary to have assistance in administration of the instruments to Group I. A printed Statement of Introduction and Explanation was distributed to Group II; this same information was given verbally to Group I.

FOOTNOTES

CHAPTER II

[1]Denise F. Polit and Bernadette P. Hungler, Nursing Research: Principles and Methods (Philadelphia: J. B. Lippincott Company, 1978), p. 454.

[2]Muzafer Sherif and Carolyn W. Sherif, Social Psychology (New York: Harper and Row, Publishers, 1969), p. 345.

[3]Ibid., p. 336.

[4]Seymour Axelrod and Carl Eisdorfer, "Attitudes Toward Old People: An Empirical Analysis of the Stimulus-Group Validity of the Tuckman-Lorge Questionnaire," Journal of Gerontology 16 (January, 1961):76.

[5]Sidney Siegel, Nonparametric Statistics for the Behavioral Sciences (New York: McGraw-Hill Book Company, 1956), pp. 213-14.

[6]Wayne W. Daniel, Applied Nonparametric Statistics (Boston: Houghton Mifflin Company, 1978), p. 467.

[7]Ibid.

[8]Fred N. Kerlinger, Foundations of Behavioral Research, 2nd ed. (New York: Holt, Rinehart and Winston, Inc., 1973), p. 381.

CHAPTER III

ANALYSIS AND INTERPRETATION OF DATA

Introduction

The study design used to explore nurses' attitudes about the learning ability of the older adult was described in Chapter II. The General Information Sheet and Patient Learning Ability Opinion Survey instrument were developed to obtain background information about the study sample and to measure attitudes about patient learning ability. Data obtained from the instruments are described in this chapter.

Data were analyzed according to the following procedures: (1) description of the sample based on subject responses to the General Information Sheet, and (2) analysis of data from the Patient Learning Ability Opinion Survey instrument utilizing the research questions generated from the problem statement and purpose of the study indicated in Chapter I.

Nonparametric statistics were selected for data analysis due to the nature of the data obtained. Data had the following characteristics: (1) ordinal data were placed in rank order, and (2) it was assumed that data

lacked a normal distribution pattern due to the sample design.[1]

Description of Sample

Characteristics of subjects are presented in table II for the two groups of subjects differentiated according to data collection setting (Groups I and II). These characteristics were obtained from subject responses to questions on the General Information Sheet. Responses to seven of the eight questions are summarized in the table. Data about age range of patients with whom the subject would prefer to work were not computed since since 16 percent of the subjects participating in the study either left this question unanswered or gave more than one answer. Differences were noted between Groups I and II as follows: (1) level of nursing education attained, (2) current or most recent place of employment, and (3) participation in further study regarding patient education.

In Group I, 46.9 percent of the subjects had a baccalaureate degree as opposed to 16.1 percent of subjects in Group II. Twenty-one of the thirty-one subjects in Group II or 67.7 percent were graduates of a diploma nursing program compared to eleven subjects of the thirty-two nurses or 34.4 percent in Group I whose highest level of nursing education was a diploma program.

TABLE II

CHARACTERISTICS OF SUBJECTS BASED ON SELECTED INFORMATION FROM THE GENERAL INFORMATION SHEET

Characteristics	Group I N-32 f	(%)	Group II N=31 f	(%)
Age				
18-25	0	0	1	3.2
26-30	5	15.6	3	9.7
31-35	3	9.4	4	12.9
36-40	1	3.1	5	16.1
41-45	3	9.4	6	1913
46-50	7	21.9	2	6.5
51-55	3	9.4	2	6.5
56-60	8	25.0	3	9.7
61-65	1	3.1	1	3.2
66+	1	3.1	4	12.9
TOTAL	32	100.0%	31	100.0%
Sex				
Male	1	3.1	1	3.2
Female	31	96.9	30	96.8
TOTAL	32	100.0%	31	100.0%

TABLE (continued)

TABLE II (continued)

Characteristics	Group I N=32 f	(%)	Group II N=31 f	(%)
Highest Level of Nursing Education Attained				
Associate Degree	0	0	3	9.7
Diploma	11	34.4	21	67.7
Baccalaureate Degree	15	46.9	5	16.1
Master's Degree	5	15.6	2	6.5
Doctoral Degree	1	3.1	0	0
TOTAL	32	100.0%	31	100.0%
Total Years of Nursing Experience				
0- 5	4	12.5	1	3.2
6-10	4	12.5	6	19.3
11-15	4	12.5	6	19.3
16-20	1	3.1	7	22.5
21-25	7	21.9	2	6.5
26-30	5	15.6	2	6.5
31-35	3	9.4	2	6.5
36-40	3	9.4	2	6.5
41-45	1	3.1	1	3.2
46-50	0	0	0	0

TABLE (continued)

TABLE II (continued)

Characteristics	Group I N=32 f	(%)	Group II N=31 f	(%)
Total Years of Nursing Experience (continued)				
51-55	0	0	0	0
56-60	0	0	0	0
TOTAL	32	100.0%	31	100.0%
Current or Most Recent Place of Employment				
Hospital	7	21.9	17	54.8
Community Health Agency	17	53.1	0	0
Long-Term Care Facility	0	0	5	16.1
Industry	0	0	1	3.2
School of Nursing/ College	6	18.8	0	0
Physician's Office	0	0	0	0
Other	2	6.2	8	25.9
TOTAL	32	100.0%	31	100.0%
Further Study on Subject of Patient Education				
Yes	24	75.0	18	58.1
No	8	25.0	13	41.9
TOTAL	32	100.0%	31	100.0%

In Group I, 53.1 percent of the subjects were employed in community health agencies. None of the subjects in Group II indicated this category as a place of employment. Hospitals employed 21.9 percent of the subjects in Group I and 54.8 percent of the subjects in Group II.

Further study on the topic of patient education was reported by 75 percent of the subjects in Group I. In Group II, 58.1 percent of the subjects indicated attendance at seminars, conferences, classes, or inservice programs dealing specifically with the topic of patient education.

Analysis of Data

Data obtained from the Patient Learning Ability Opinion Survey instrument were analyzed utilizing the median score. The median score of subject responses to the two age-related patient education situations of the opinion survey was computed from the total sample. The median derived from ranking the scores of the total sample was -5. Assigned values for responses to the Patient Learning Ability Opinion Survey instrument as noted in Chapter II resulted in the following score interpretations: (1) a positive total score indicated a negative attitude about the learning ability of the older/younger adult, and (2) a negative total score indicated a positive

attitude about the learning ability of the older/younger adult. Thus a median score of -5 out of a possible total score of -20 indicated a slightly positive attitude about the learning ability of the older/younger adult.

The median was computed to answer Research Questions 1 and 2 posed in Chapter I. Results of the median test were used to answer Research Question 3. These questions will be stated separately when introducing data relevant to the question.

Research Question 1

1. What are nurses' attitudes about the learning ability of the older adult?

Thirty-three instrument packets were administered describing an older patient education situation. Data revealed twenty-one scores derived from the opinion survey instrument equal to or above the median; twelve scores were below the median of -5 (table III). Twenty-one subjects having scores equal to or above the median demonstrated a less positive attitude about the learning ability of the older adult when compared to the twelve subjects having scores below the median; the latter scores indicated a more positive attitude about the learning ability of the older adult.

TABLE III

FREQUENCIES OF ATTITUDE SCORES ABOVE AND BELOW THE MEDIAN FOR THE PATIENT LEARNING ABILITY OPINION SURVEY

	Patient Education Situation		
	Older f	Younger f	Total
Above the median	21	13	34
Below the median	12	17	29
Total	33	30	63

Research Question 2

2. What are nurses' attitudes about the learning ability of the younger adult?

Thirty instrument packets describing a younger patient education situation were administered. Scores from thirteen of the opinion survey instruments were equal to or above the median of -5, indicating a less positive attitude about the learning ability of the younger adult. A total of seventeen scores were below the median, indicating a more positive attitude about the learning ability of the younger adult (table III).

Research Question 3

3. Is there a difference in nurses' attitudes about the learning ability of the older adult compared to nurses' attitudes about the learning ability of the younger adult?

The median test was utilized to answer Research Question 3 since this statistical tool compares the medians of two independent samples having distributions which differ according to means and variances. Subjects from the two data collection settings (Groups I and II) comprised the independent samples. The basic premise of the median test is that in two samples drawn from the same population, equal observations in each sample will fall above the joint median as will fall below the joint median.[2] The null hypothesis tested was that there is

no difference in nurses' attitudes regarding the learning ability of older and younger adults. To reject the null hypothesis at the 0.05 level of significance, it was necessary to obtain a test statistic (T) equal to or greater than 1.96.[3] Data contained in table III were computed to determine whether the proportions of subject score responses above and below the median differed significantly between the two groups. Statistical analysis revealed the value of T to be 1.615. Thus the data failed to demonstrate significant differences in nurses' attitudes about the learning ability of the older and younger adult.

Discussion of Findings

Data summarized in table IV revealed a larger number of scores indicating less positive attitudes about the learning ability of the older adult when compared with those scores reflecting more positive attitudes about the learning ability of the older person. Due to the limited size and lack of homogeneity of the sample, it is not possible to conclude that the results of this study are reflective of society's acceptance of negative attitudes about the elderly. These limitations influenced the choice of statistical measures used in data analysis. Therefore, data from this study can be interpreted only in terms of less positive or more positive attitudes about learning ability.

TABLE IV

ATTITUDE SCORES DERIVED FROM PATIENT LEARNING ABILITY OPINION SURVEY ACCORDING TO GROUP AND PATIENT EDUCATION SITUATION

Scores	Older Patient Education Situation		Younger Patient Education Situation	
	Group I N=17	Group II N=16	Group I N=15	Group II N=15
-17	0	0	1	0
-16	0	0	0	0
-15	2	0	2	0
-14	0	0	0	0
-13	0	0	0	1
-12	3	0	1	0
-11	0	0	0	1
-10	1	0	1	0
-9	1	0	0	1
-8	0	2	2	3
-7	0	1	1	2
-6	1	1	1	0
-5	0	0	1	2
-4	0	1	2	1
-3	2	0	0	1
-2	0	0	0	1
-1	1	1	1	0

TABLE (continued)

TABLE IV (continued)

Scores	Older Patient Education Situation		Younger Patient Education Situation	
	Group I N=17	Group II N=16	Group I N=15	Group II N=15
0	2	0	0	1
1	0	0	1	0
2	2	2	0	0
3	0	2	1	0
4	0	3	0	0
5	0	1	0	0
6	0	1	0	0
7	0	0	0	0
8	1	0	0	1
9	1	0	0	0
10	0	0	0	0
11	0	0	0	0
12	0	0	0	0
13	0	0	0	0
14	0	0	0	0
15	0	1	0	0
TOTAL	17	16	15	15

According to the results of this study, no significant difference was demonstrated in nurses' attitudes about the learning ability of the older adult and younger adult. The following possibilities are offered to attempt to account for these findings.

One such possibility is that the age of the patients described in the patient education situations on the opinion survey was not identified as significant information by some of the subjects. Information given the subjects in the Statement of Introduction and Explanation as well as in the Information and Consent Form emphasized that the purpose of the study was to determine nurses' attitudes about patient learning ability. The purpose was stated in general terms; age was not addressed in the investigator's explanation in order to avoid biasing subject responses. Subject responses may have indicated the subject's interpretation of the situation based on the variable of diagnosis (diabetes mellitus) rather than on the age of the patient.

Another possibility which may have influenced the results of this study is that of social desirability set on attitude measurement. This response set involves the tendency of subjects to misrepresent their attitudes by giving responses which they think are consistent with socially accepted norms.[4] Nurses may be socialized to identify with professional norms which indicate that

patient education should be implemented with all patients regardless of age. Subject responses might reflect acknowledgement of this ideal rather than personal beliefs and attitudes about patient learning ability.

Test construction may also have influenced subject responses. Because the investigator was unable to establish construct validity of the Patient Learning Ability Opinion Survey instrument, there is a possibility that the instrument may have measured both attitudes and knowledge related to patient education. Subject responses may be indicative of knowledge about this topic rather than attitudes about the learning ability of the person described in the patient education situation.

Recommendations

While the results of this study failed to demonstrate significant differences in nurses' attitudes about the learning ability of older and younger adults, several recommendations for future research can be identified from the findings. This research would influence both nursing education and practice.

Refinement of this study is recommended using a random sample of nurses from a larger population. An initial study about nurses' attitudes pertaining to the learning ability of patients in general would need to be done in order to establish a reference point for later

age-related studies on this topic. Using this refined instrument, the variables of nursing education, place of employment, and further study on the topic of patient education could be studied for statistical significance in relation to nurses' attitudes about patient learning ability.

Studies concerning attitudes of the general population toward the elderly have been useful in comparing attitudes of health care professionals toward this population. Studies which measure attitudes of people in general about learning ability of elderly persons could provide data with which to compare nurses' attitudes on this subject. Such research may further indicate the necessity of educating the general public about the abilities of the elderly. Among these abilities is the potential for change regardless of age. This includes the ability to learn about one's health and to implement behaviors which promote health for that individual. Since nurses are a part of the general population, education of the general public would indirectly influence attitude formation toward the elderly among health care professionals.

The labeling process related to attitudes about learning ability of the older adult involves the interface of self-concept, abilities, and behavior within a social interaction framework. Development and reinforcement of self-concept is influenced by social interaction.

Abilities of the older adult are often evaluated in terms of social norms which define behavioral expectations for this age group. A modification of this study including the variable of self-concept could be used to measure attitudes of the elderly about their learning ability.

The findings of this study indicate a need to explore the subject of nurses' educational preparation for patient teaching. An initial step in determining the effect of educational preparation on patient teaching done with the elderly would be to measure attitudes of nurse educators on this subject. Results of a study of this nature could be correlated to the information and role models presented by nurse educators about teaching the elderly.

FOOTNOTES

CHAPTER III

[1]Jum C. Nunnally, Introduction to Statistics for Psychology and Education (New York: McGraw-Hill Book Company, 1975), p. 282.

[2]George A. Ferguson, Statistical Analysis in Psychology and Education, 4th ed. (New York: McGraw-Hill Book Company, 1976), p. 384.

[3]Wayne W. Daniel, Applied Nonparametric Statistics (Boston: Houghton Mifflin Company, 1978), p. 397.

[4]Denise F. Polit and Bernadette P. Hungler, Nursing Research: Principles and Methods (Philadelphia: J. B. Lippincott Company, 1978), p. 368.

CHAPTER IV

SUMMARY

This study examined nurses' attitudes about the learning ability of persons in a patient education situation. A total of sixty-three registered nurses from two district groups of the state nurses' association participated in the study.

A General Information Sheet provided descriptive information about the subjects from the two data collection settings. Data indicated marked differences between the two groups in terms of level of nursing education attained, area of employment, and participation in further study on the topic of patient education.

The investigator developed the Patient Learning Ability Opinion Survey instrument to measure attitudes about the learning ability of the older and younger patient. Subjects were asked to indicate their opinion about ten statements related to the hypothetical patient education situation. A four-point Likert-type scale was used; the scale offered four possible opinion responses (Strongly Agree, Agree, Disagree, and Strongly Disagree). At each of the two data collection settings, approximately

one-half of the subjects received a patient education situation describing a 75-year-old adult and the other half received a patient education situation describing a 32-year-old adult.

Scores determined by arbitrarily assigned values for degree and direction of response were analyzed to address the research questions on which the study was based: (1) What are nurses' attitudes about the learning ability of the older adult? (2) What are nurses' attitudes about the learning ability of the younger adult? (3) Is there a difference in nurses' attitudes about the learning ability of the older adult compared to nurses' attitudes about the learning ability of the younger adult?

Based on the median score of the total sample, results of the study indicated that a larger number of responses reflected a less positive attitude about the learning ability of the older adult when compared to responses which reflected a more positive attitude about the older adult's learning ability. For the younger patient education situation, there was a larger number of responses reflecting more positive attitudes about the learning ability of this age group when compared to responses reflecting less positive attitudes about learning ability for the 32-year-old adult. Using the median test, data failed to show that there was a significant

difference in nurses' attitudes about the learning ability of the older adult when compared to nurses' attitudes about learning ability of the younger adult.

BIBLIOGRAPHY

BIBLIOGRAPHY

Books

Barton, Elizabeth M. "Recent Findings on Adult and Gerontological Intelligence: Changing a Stereotype of Decline." In Age in Society, p. 93. Edited by Anne Foner. Beverly Hills: Sage Publications, 1976.

Daniel, Wayne W. Applied Nonparametric Statistics. Boston: Houghton Mifflin Company, 1978.

Eisdorfer, Carl. "Intelligence and Cognition in the Aged." In Behavior and Adaptation in Late Life, 2nd ed., p. 212. Edited by Ewald W. Busse and Eric Pfeiffer. Boston: Little, Brown and Company, Inc., 1977.

Farrell, Ronald A., and Swigart, Victoria Lynn. Social Deviance. Philadelphia: J. B. Lippincott Co., 1978.

Ferguson, George A. Statistical Analysis in Psychology and Education. 4th ed. New York: McGraw-Hill Book Company, 1976.

Fishbein, Martin, and Ajzen, Icek. Belief, Attitude, Intention and Behavior: An Introduction to Theory and Research. Reading, Massachusetts: Addison-Wesley Publishing Company, 1975.

Granick, Samuel, and Friedman, Alfred S. "Educational Experience and the Maintenance of Intellectual Functioning by the Aged: An Overview." In Intellectual Functioning in Adults: Psychological and Biological Influences, p. 61. Edited by Lissy Jarvik, Carl Eisdorfer, and June E. Blum. New York: Springer Publishing Company, Inc., 1973.

Kerlinger, Fred N. Foundations of Behavioral Research. 2nd ed. New York: Holt, Rinehart and Winston, Inc., 1973.

Kinch, John W. Social Psychology. New York: McGraw-Hill Book Company, 1973.

McCluskey, Howard Y. "Education for Aging: The Scope of the Field and Perspectives for the Future." In Education for the Aging. Living with a Purpose as Older Adults through Education: An Overview of Current Developments, p. 325. Edited by Stanley M. Grabowski and W. Dean Mason. Syracuse, New York: Eric Clearing House on Adult Education, 1974.

Mead, George H. Mind, Self and Society. Edited by Charles W. Morris. Chicago: The University of Chicago Press, 1934.

Nunnally, Jum C. Introduction to Statistics for Psychology and Education. New York: McGraw-Hill Book Company, 1975.

Pohl, Margaret. Teaching Function of the Nursing Practitioner. 3rd ed. Dubuque, Iowa: Wm. C. Brown Company, Publisher, 1978.

Polit, Denise F., and Hungler, Bernadette P. Nursing Research: Principles and Methods. Philadelphia: J. B. Lippincott Company, 1978.

Redman, Barbara K. The Process of Patient Teaching in Nursing. 3rd ed. St. Louis: The C. V. Mosby Company, 1976.

Sherif, Muzafer, and Sherif, Carolyn W. Social Psychology. New York: Harper and Row, Publishers, 1969.

Siegel, Sidney. Nonparametric Statistics for the Behavioral Sciences. New York: McGraw-Hill Book Company, 1956.

Storlie, Frances. Patient Teaching in Critical Care. New York: Appleton-Century-Crofts, 1975.

Turner, Jonathon H. The Structure of Sociological Theory. Homewood, Illinois: The Dorsey Press, 1974.

Periodicals

Aaronson, Bernard S. "Personality Stereotypes of Aging." Journal of Gerontology 21 (July, 1966):458-62.

Axelrod, Seymour, and Eisdorfer, Carl. "Attitudes Toward Old People: An Empirical Analysis of the Stimulus-Group Validity of the Tuckman-Lorge Questionnaire." Journal of Gerontology 16 (January, 1961):75-80.

Brubaker, Timothy H., and Powers, Edward A. "The Stereotype of 'Old': A Review and Alternative Approach." Journal of Gerontology 31 (July, 1976):441-47.

Campbell, Margaret E. "Study of the Attitudes of Nursing Personnel Toward the Geriatric Patient." Nursing Research 22 (November-December, 1973):147-51.

Cullen, Agnes A. "Labelling Theory and Social Theory." Perspectives in Psychiatric Care 12 (July-September, 1974):123-25.

Futrell, May, and Jones, Wyatt. "Attitudes of Physicians, Nurses, and Social Workers Toward the Elderly and Health Maintenance Services for the Aged: Implications for Health Manpower Policy." Journal of Gerontological Nursing 3 (May-June, 1977):42-46.

Gillis, Sister Marion. "Attitudes of Nursing Personnel Toward the Aged." Nursing Research 22 (November-December, 1973):517-20.

Golde, Peggy, and Kogan, Nathan. "A Sentence Completion Procedure for Assessing Attitudes Toward Old People." Journal of Gerontology 14 (July, 1959): 355-63.

Hatton, Jean. "Nurse's Attitude Toward the Aged: Relationship to Nursing Care." Journal of Gerontological Nursing 3 (May-June, 1977);21-26.

Hickey, Tom, and Kalish, Richard A. "Young People's Perceptions of Adults." Journal of Gerontology 23 (April, 1968):215-20.

Lundin, Dorothy V. "Must Taking Medications be a Dilemma for the Independent Elderly?" Journal of Gerontological Nursing 4 (May-June, 1978):25-27.

Strumpf, Neville. "Aging--A Progressive Phenomenon." Journal of Gerontological Nursing 4 (March-April, 1978):17-21.

Taylor, Kathleen H., and Harned, Thomas L. "Attitudes Toward Old People: A Study of Nurses Who Care for

the Elderly." Journal of Gerontological Nursing 4 (September-October, 1978):43-47.

Tuckman, Jacob, and Lorge, Irving. "Attitudes Toward Old People." Journal of Social Psychology 37 (May, 1953):249-60.

_____. "The Effect of Institutionalization on Attitudes Toward Old People." Journal of Abnormal and Social Psychology 47 (July-September, 1952): 337-43.

APPENDICES

APPENDIX A

GENERAL INFORMATION SHEET

AND

PATIENT LEARNING ABILITY OPINION SURVEY

Code No. _____

GENERAL INFORMATION SHEET

Directions: Please check one answer for each of the following categories:

1. AGE: (check one)

____ 18-25	____ 31-35	____ 41-45	____ 56-60
____ 26-30	____ 36-40	____ 46-50	____ 61-65
		____ 51-55	____ 66+

2. SEX: (check one)

____ Male ____ Female

3. HIGHEST LEVEL OF NURSING EDUCATION YOU HAVE ATTAINED: (check one)

____ Associate Degree	____ Baccalaureate Degree
____ Diploma	____ Master's Degree
	____ Doctoral Degree

4. TOTAL YEARS OF NURSING EXPERIENCE: (check one)

____ 0- 5	____ 16-20	____ 31-35	____ 46-50
____ 6-10	____ 21-25	____ 36-40	____ 51-55
____ 11-15	____ 26-30	____ 41-45	____ 56-60

5. CURRENT PLACE OF EMPLOYMENT: (check one)

____ Hospital	____ School of Nursing/College
____ Community Health Agency	____ Physician's Office
____ Long-Term Care Facility	____ Other _____ (please specify)
____ Industry	

Code No. _____

GENERAL INFORMATION SHEET (continued)

6. IF UNEMPLOYED AT PRESENT, PLEASE GIVE PLACE OF PREVIOUS EMPLOYMENT: (check one)

____ Hospital
____ School of Nursing/College
____ Community Health Agency
____ Physician's Office
____ Long-Term Care Facility
____ Other _____ please specify
____ Industry

7. AGE RANGE OF PATIENTS WITH WHOM YOU WOULD PREFER TO WORK: (check one)

____ Birth to 12 years
____ 36-50 years
____ 13-18 years
____ 51-64 years
____ 19-35 years
____ 65+ years

8. HAVE YOU ATTENDED ANY SEMINARS, CONFERENCES, CLASSES, OR INSERVICE EDUCATION PROGRAMS DEALING SPECIFICALLY WITH THE TOPIC OF PATIENT EDUCATION?

____ Yes ____ No

Code No. _____

PATIENT LEARNING ABILITY OPINION SURVEY

Directions:

Please read the following patient education situation carefully. The statements that follow are opinions about patient learning ability related to that person described in the situation. There are many differences of opinion about each of these statements. I would like to know what you think about these statements. Each of them is followed by four choices:

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

Please check (✓) in the space provided the one choice which comes closest to saying how you feel about each statement. There are no right or wrong answers--I am interested only in your opinion.

PATIENT EDUCATION SITUATION:

You have been assigned to develop and implement a teaching plan for the person described in this patient education situation: 75-year-old patient, parent of two, recent diagnosis of Diabetes Mellitus, has been started on 15 Units of NPH insulin daily, is on a 1,500 Calorie Diabetic diet.

Code No. _____

STATEMENTS ABOUT PATIENT EDUCATION SITUATION:

1. You would use an individualized teaching approach because this patient's powers of concentration and motivational level are probably somewhat limited.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

2. This patient probably will be able to change his/her dietary habits.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

3. The patient's ability to remember the content of the lesson from the previous day would be a significant factor in determining whether you should continue your teaching program with this patient.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

4. This patient probably will have difficulty in learning new information and skills related to his/her diabetic condition.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

5. If the patient is unable to manage self-administration of insulin during the first day or two of your teaching program, you will probably need to teach a family member or a neighbor of the patient to assist with this responsibility.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

Code No. _____

STATEMENTS (continued)

6. Educational background and previous experience would be more important to consider than age when assessing the learning ability of this patient.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

7. This patient will have difficulty in understanding written instructions about diabetic care, even if given extra time to study these instructions.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

8. The age of the patient, rather than educational background or previous experience, would be a prime consideration when assessing the patient's learning ability.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

9. The reason for including a family member or a neighbor in your teaching plan is that this patient may not be able to remember all the information and skills necessary for diabetic care.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

10. This patient is capable of setting his/her own learning pace.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

Code No. _____

PATIENT LEARNING ABILITY OPINION SURVEY

Directions:

Please read the following patient education situation care fully. The statements that follow are opinions about patient learning ability related to that person described in the situation. There are many differences of opinion about each of these statements. I would like to know what you think about these statements. Each of them is followed by four choices:

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

Please check (✓) in the space provided the one choice which comes closest to saying how you feel about each statement. There are no right or wrong answers--I am interested only in your opinion.

PATIENT EDUCATION SITUATION:

You have been assigned to develop and implement a teaching plan for the person described in this patient education situation: 32-year-old patient, parent of two, recent diagnosis of Diabetes Mellitus, has been started on 15 Units of NPH insulin daily, is on a 1,500 Caloric Diabetic diet.

Code No. _____

STATEMENTS ABOUT PATIENT EDUCATION SITUATION:

1. You would use an individualized teaching approach because this patient's powers of concentration and motivational level are probably somewhat limited.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

2. This patient probably will be able to change his/her dietary habits.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

3. The patient's ability to remember the content of the lesson from the previous day would be a significant factor in determining whether you should continue your teaching program with this patient.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

4. This patient probably will have difficulty in learning new information and skills related to his/her diabetic condition.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

5. If the patient is unable to manage self-administration of insulin during the first day or two of your teaching program, you will probably need to teach a family member or a neighbor of the patient to assist with this responsibility.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

Code No. _____

STATEMENTS (continued)

6. Educational background and previous experience would be more important to consider than age when assessing the learning ability of this patient.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

7. This patient will have difficulty in understanding written instructions about diabetic care, even if given extra time to study these instructions.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

8. The age of the patient, rather than educational background or previous experience, would be a prime consideration when assessing the patient's learning ability.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

9. The reason for including a family member or a neighbor in your teaching plan is that this patient may not be able to remember all the information and skills necessary for diabetic care.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

10. This patient is capable of setting his/her own learning pace.

Strongly Agree	Agree	Disagree	Strongly Disagree
_____	_____	_____	_____

APPENDIX B

LETTERS OF INTRODUCTION AND EXPLANATION

February 12, 1980

Nettie McCullion, R.N.
President
District Three of the Ohio
Nurses Association
Stackhouse Building - Suite 213
3119 Market Street
Youngstown, Ohio 44507

Dear Mrs. McCullion:

I am writing as a follow-up to our phone conversation of Monday, February 11, 1980 in which I requested permission to attend the March 12, 1980 meeting of the District Three Nurses Association.

I am a second-year graduate student in the College of Nursing at The University of Akron. As a part of my thesis project, I am doing a survey on nurses' attitudes about the learning ability of persons in patient teaching situations.

Since I am hoping to obtain a sample of nurses with varied educational and work backgrounds, it would be very helpful if I could ask for participants from your membership. Anonymity of the participants would be assured. The participants would be asked to spend approximately ten minutes in completing a Consent form, a General Information Sheet, and a Patient Learning Ability Opinion Survey.

I would appreciate if this request could be presented to the Advisory Board of the District Three Nurses Association for a decision. Thank you for your assistance.

Sincerely,

Sister Edwardine Baznik, R.N.

February 12, 1980

Joan Breza, R.N.
President
Summit & Portage District of
the Ohio Nurses Association
2113 Front Street
Cuyahoga Falls, Ohio 44221

Dear Ms. Breza:

I am a second-year graduate student in the College of Nursing at The University of Akron. As a part of my thesis project, I am doing a survey of nurses' attitudes about the learning ability of persons in patient teaching situations.

Since I am hoping to obtain a sample of nurses with varied educational and work backgrounds, it would be very helpful if I could ask for participants from your membership. May I attend the March 13, 1980 meeting of the Summit & Portage District Nurses Association for the purpose of conducting this survey?

The participants would be asked to spend approximately ten minutes in completing a Consent form, a General Information Sheet, and a Patient Learning Ability Opinion Survey. Anonymity of the participants would be assured. Participation is on a volunteer basis.

I appreciate your consideration of this request and will await your decision. Thank you for your assistance.

Sincerely,

Sister Edwardine Baznik, R.N.

APPENDIX C

VERBAL STATEMENT OF INTRODUCTION AND EXPLANATION

VERBAL STATEMENT OF INTRODUCTION

AND EXPLANATION

Good evening! I am a registered nurse interested in research. I am here this evening with the approval of your Advisory Board to ask for volunteers to participate in a short survey which is part of a thesis project. The purpose of this survey is to gather information related to nurses' attitudes about the learning ability of persons in a patient education situation.

In order to participate in this study, you must be a registered professional nurse and must be licensed to practice nursing in the state of Ohio.

Your participation in this study is purely voluntary. You are free to withdraw consent and discontinue participation in this study at any time without prejudice.

Anonymity will be assured since a numerical coding system will be used on the two forms you will complete. Results of the study will be presented as group data and no attempt will be made to identify individuals.

Participation in this study includes completion of a General Information Sheet and the Patient Learning Ability Opinion Survey. The purpose of the General Information Sheet is primarily to obtain data pertaining to your role as a nurse. The Patient Learning Ability Opinion Survey consists of a patient education situation followed by ten statements related to the situation.

You are asked to read the patient education situation and give your opinion about each of the statements by placing a check in the

space provided which indicates the one choice that comes closest to saying how you feel about the statement: Strongly Agree, Agree, Disagree, or Strongly Disagree. There are no right or wrong answers--I am only interested in your opinion.

It should take approximately ten minutes to complete the forms.

Do you have any questions? (PAUSE)

I will distribute the Information and Consent forms. (DISTRIBUTE FORMS) Please read the form and sign it if you have decided to participate in the study. You are to keep the yellow copy of the consent form. When the signed consent forms have been collected, I will distribute the General Information Sheet and the Patient Learning Ability Opinion Survey. (COLLECT CONSENT FORMS AND DISTRIBUTE GENERAL INFORMATION SHEET AND THE OPINION SURVEY)

I will remain in the room to answer any questions that you may have. When you are finished, please place your completed forms in the box on the table. If you should decide not to complete the study, you are free to turn in your incomplete forms at any time during the study.

Your participation in this study will help provide information which can be used to improve the effectiveness of the nurse's role in patient education. I will be happy to share the results of this study with your organization upon request.

Thank you for your assistance.

APPENDIX D

INFORMATION AND CONSENT FORM

INFORMATION AND CONSENT FORM

The purpose of this study is to gather information related to nurses' attitudes about the learning ability of persons in a patient education situation.

I understand that in order to participate in this study, I must be a registered professional nurse and must be licensed to practice nursing in the state of Ohio.

My participation in this study is purely voluntary. I am free to withdraw consent and discontinue participation in this study at any time without prejudice.

I have been informed that my anonymity will be assured by the investigator and that the results of this study will be presented as group data; no attempt will be made to identify individuals.

Participation includes completion of a General Information Sheet and a Patient Learning Ability Opinion Survey. Completion takes approximately ten mintues.

My participation in this study will help provide information which can be used to improve the effectiveness of the nurse's role in patient education. The results of this study will be made available by the investigator upon request of this nurses' association.

If I have any questions, I may contact Sister Edwardine Baznik, investigator, at (216) 875-5562.

SIGNATURE OF PARTICIPANT _____

SIGNATURE OF INVESTIGATOR _____

DATE _____

(Participant to retain yellow copy)