

THE ROLE AND FUNCTIONS OF THE SCHOOL NURSE  
AS PERCEIVED BY 115 PUBLIC SCHOOL TEACHERS  
FROM THREE SELECTED COUNTIES

by

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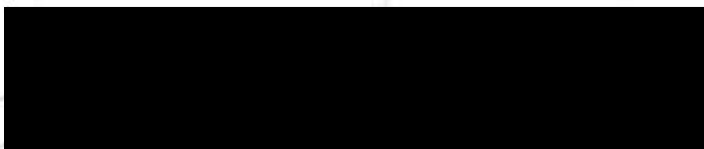
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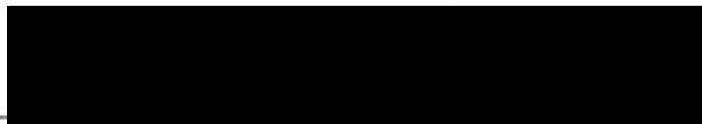
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APPROVED:

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Lucile Gregerson / Associate Professor

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Chairman, Graduate Council

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## CHAPTER I

### INTRODUCTION

#### Introduction to the Problem

Since 1902, when Miss Lina Rogers became the first nurse to devote her full time to working with school children in New York City, the position of school nurse has increased not only in quantity but in quality, as indicated by an increasing number of qualified nurses in those positions. (16)

Although leaders in school nursing (10, 18, 39, 41) have indicated that the nurse and teacher need a better understanding of the potential contribution of the nurse in the schools, few studies have been conducted to identify the teachers' expectations of the nurse's role and functions in the schools.

Research studies have been conducted by Poe, Bland, Grossman, Day and others (7, 12, 15, 24) in an effort to define and analyze the role and functions of the school nurse as perceived by the school nurses themselves in accordance with set functions and qualifications for that position. An important question is, how do teachers perceive the role and functions of the school nurse? The consumers of nursing service do not always view nurses as nurses see themselves. Hansen and Levy (17) have presented an important aspect of role analysis and, in particular, role analysis of the nurse,

in the opening statement of their study, Families Speak for Themselves:

The specification of functions for nursing practice is appropriately the prerogative of the practitioners themselves. The actual practice of nursing functions, however, may be determined by many factors, including the perception of the nurse and her work by individuals and groups who are in a position to influence her practice.

#### Statement of the Problem

How do public school teachers perceive the role and functions of the school nurse? What problems do teachers encounter in their relations with the school nurse or her services? What preparation do teachers regard as necessary for the nurse in the schools? Which of twenty selected school nurse activities do teachers perceive as important for the nurse to perform?

#### Purpose of the Study

The purpose of this study was:

- 1) to identify and analyze the role and functions of the school nurse as perceived by public school teachers;
- 2) to determine to what extent, if at all, differences in role and function perception are related to specific aspects of the teachers' professional experiences, level of grades taught and present administrative structure of school nursing service;

- 3) to identify and analyze problem areas in school nursing services as perceived by public school teachers;
- 4) to determine what educational preparation the teachers regard as important for the nurse in the school setting;
- 5) to identify and analyze the importance of twenty selected school nursing activities as perceived by public school teachers;
- 6) to determine to what extent, if at all, differences in perception of these activities are related to specific aspects of the teachers' professional experiences, level of grades taught and present administrative structure of school nursing service.

#### Limitations

The findings of this study were limited to information obtained by use of an interview guide and activity rating check-list of twenty selected school nursing activities.

The sample for the study was selected from teachers currently employed in four first class unified districts, one first class elementary district, and one union high school district, in the Oregon counties of Washington, Clackamas and Multnomah. The sample was further limited to 115 public school teachers--60 teachers from the elementary grades (kindergarten through six) and 55 teachers

from the secondary grades (nine through twelve). Teachers in the seventh and eight grades were not included in this study because of the different patterns of classroom structure in these grades throughout the districts.

There are variables, the nature of which are still unassessed, and which could have affected the responses of the interviewees. Among these are past personal experiences, professional educational backgrounds, the ability to express oneself and the structure of the health service program in the different districts.

#### Assumptions

It has been assumed that members of the faculty who were selected for the study gave honestly their answers to the questions asked, and further that the teachers had a concept of the nurse's role in the school setting. It was also assumed that the interview guide was satisfactory for purposes of this study.

#### Definitions

For purposes of the study the following definitions have been adopted.

Activity--the performance of a single act, such as a hearing test. (2)

Board of education--the legal administrative authority created by Oregon Law and responsible for the educational program in each school district. (12)

Department of health--official agency vested with authority to render on-the-spot, direct health service in six fundamental areas to a local governmental jurisdiction and the people it includes. (12)

First class elementary district--a school district that operates elementary schools only, and has a school census of 1,000 or more. (23)

First class unified district--a school district that maintains schools from the first through twelfth grade under one administrative head, and has a school census of 1,000 or more. (23)

Function--a broad area of responsibility composed of many activities pertaining to a position. (2)

School nurse--a registered nurse working in a school setting either on a full time appointment or as part of a generalized public health nursing appointment.

Union high school district--a school district that operates high schools only. (23)

#### Steps of the Study

Steps in the development of this study were as follows:

1. A general survey of the literature on school nursing was conducted.
2. The problem was identified, purposes of the study formulated, and limitations and assumptions established.

3. An interview guide was constructed for this study and an activity rating check-list of twenty selected school nursing activities was adopted from Day's study with two minor revisions; see Appendix B. All parts of the data-collecting tool were designed to elicit information that would be consistent with the purposes of the study.
4. The interview guide and activity rating check-list were reviewed by 14 professional nurses.
5. A pilot study was conducted on 15 elementary and secondary teachers from Washington, Clackamas, and Multnomah counties. Two revisions were made before the data-collecting tool was used in the main study.
6. Permission was obtained to conduct the study in 6 school districts--20 schools--involving 115 public school teachers.
7. One hundred fifteen interviews were conducted between March 31, 1965 and May 12, 1965.
8. The data were analyzed, interpreted and presented in this report.
9. The study was summarized, conclusions drawn and recommendations made for further study.

#### Overview of the Study

Chapter one includes an introduction to the broad problem, statement of the problem and purpose of the study.

Assumptions, limitations and definitions for purposes of this study are set forth in chapter one.

A review of the current literature and related research is presented in chapter two. An introduction, examination of the status of school nursing in the past, present and future and report of research studies in school nursing compose this chapter. Chapter three includes the methodology and findings of the study. This chapter contains an introduction, development of the tool, selection of the sample, steps in the collection of the data, and report of the study.

Summary, conclusions drawn, and recommendations for further study are included in chapter four of this report.

## CHAPTER II

### SURVEY OF RELATED LITERATURE

#### The Status of School Nursing in the United States Past

With the opening of the Henry Street Settlement House in New York City by Lillian Wald and Mary Brewster the general public health nursing movement of this country was begun. (44, 46) The program was based upon, " . . . the solid and stable ground of well-recognized and permanent social necessity." (14)

The problem of the poor health status of the school child became the focus of attention of Miss Wald and her workers. One of their biggest jobs was the tending of children referred to them by the school medical inspector for exclusion from school.

In 1897, Miss Wald persuaded the city health department to designate a school physician to inspect the children in attendance at public schools and excluded infected individuals. The examination included a check on eyes, throat, hands, and hair as the children passed by. One hundred fifty medical examiners, in the first year of the program, excluded 6,829 infected children from school; 108,628 children had been inspected. The following year, 17,986 children were excluded from classes. (43, 45) "The experience of the nurse in the settlement was that the medical inspection was deficient from



the standpoint of the child, in that it excluded him but did not advise nor treat (nor care for) him." (13)

In 1902, Miss L. L. Dock wrote, "Miss Wald . . . has always cherished the hope that the trained nurse might be introduced into the large public school of the crowded foreign quarters of the city, and has lost no opportunity of making the 'school nurse' of London known to those who might be interested in a similar movement here." (13) Miss Wald went before the New York City Board of Health and brought to their attention the problems which had been revealed by her work and that of the medical inspectors. She suggested that a nurse work with the doctor to help "keep the children in school." When her program was approved by Dr. Lederle of the board of health and Mr. Burlington of the department of education, Miss Wald placed her most able student, Miss Lina Rogers, in the position of school nurse. Miss Rogers was assigned to four schools with a total enrollment of 4,100 children. She assumed her duties on October 1, 1902.

The information Miss Rogers was able to present to the board of health established the school nurse as an excellent liaison between school and home environments. The board promptly appropriated \$30,000 (1903) for expansion of the school nursing services. (27, 28, 29, 30)

In 1910, Wood (19) wrote:

The introduction of the graduate nurse into public education has been rapid and dramatic . . . Little time will be

required to convince most school authorities of the wisdom of expenditures involved in the cost of the school nurse.

Los Angeles initiated an organized school nurse program in 1903 under the auspices of the Visiting Nurse Society. In 1904, in San Francisco, Misses Ashe and Johnson of the local nurses' settlement convinced the school board there of the need for medical inspectors and school nurses to supplement the inspectors' work. In Philadelphia Ann Stanley organized the school nurse program. (20) With the cooperation of the Maryland State Federation of Women's Clubs, the nurses and doctors were added to the school system simultaneously, in 1905.

Day included an extensive description of the history of school nursing in Oregon in her study. She recorded that in 1902 the Portland City Bureau of Health assigned one nurse to work in the schools. The Portland Visiting Nurse Association also participated in school nursing activities as early as 1904, when nurses were taking part in "Mothers Club" in a Portland school. The Tuberculosis and Health Association was instrumental in providing five nurses in 1924 as part of a demonstration project of what nurses could do in a school program. Public Health certificates were requested of nurses in the school at this time.

By 1925 the salaries for 11 nurses were provided by Portland's school district. An agreement was reached whereby

the city school district continued to pay a percentage of the nurses' salaries to serve in the schools while under the supervision of the city health bureau. Secondary schools also received school nursing services after 1930. Specialized school nursing services continued until 1952, at which time the services became a part of the generalized public health nursing program. Accounts of school nursing in other parts of the state are few. Estella Warner described, in Children of the Covered Wagon (47), some of the activities of nurses in the health department of Marion county. The nurses were assigned to the school to render nursing services seven hours a week.

Activities of the school nurses centered around inspection for communicable diseases, exclusion from school, and subsequent follow-up of infected children. Health screenings also occupied a large portion of the nurses' time. This was true of school nursing activities throughout the country during the early phase of school nursing. (27)

#### Present

As of January 1, 1964, there were 13,257 nurses hired by boards of education to serve as school nurses; an additional 14,738 public health nurses working in official local agencies may have had part-time school nursing activities as part of their generalized program. Although 10,000 nurses have been added to local health agencies and boards of

education since 1950, only an 11% increase obtained for local agencies. Boards of education, in contrast, have employed 124% more nurses than in 1950. (16)

This latter increase has precipitated in the literature some thought-provoking articles concerning the status of school nursing at the present time. One question is, should there be specialized or generalized school nursing? This question was the central theme of an article by Richie (26) that appeared in 1961 in the American Journal of Public Health. Richie questioned the general increase in the position of specialized school nursing, which seemed to be at the expense of generalized public health nursing, at a time when greater demands are being placed on public health nurses in the areas of chronic illness, rehabilitation, and accident prevention.

Richie questioned specialized school nursing services on several points. First, although specialized school nurses perform a variety of activities within the school district, these activities are not always recognized as appropriate nursing responsibilities. Part of the problem seems to be the fact that school administrators and public health personnel disagree on the appropriateness of certain school nursing functions. Chilman has brought this out in her study. (8)

The concentration of public health nursing personnel on a segment of the population which has few health problems--

the school-age child--is another point criticized by Richie. She pointed to the need for increased services to the infant and pre-schooler which cannot be fulfilled by the present number of public health nurses.

Most public health nurses doing generalized nursing feel that services should be provided to families in a continuous manner instead of the interrupted summer pattern of the specialized school nurse. Along with this argument of course stands the fact, according to Richie, that the public is paying for the same service twice.

Cromwell (11), in contrast, expressed the thought that nurses prepared for public health nursing service may not be able to adjust their training to the school setting, and to the school health program as "educators are coming to visualize it."

McAleer (18) reasoned that the school-age child has become the healthiest individual due to the contributions the school nurse has made to obtain that status. School nurses, she wrote, are attempting, along with workers in other areas, to solve school nursing service problems. Such problems are also attacked by certain agencies, through research, meetings, institutes, conventions and workshops.

School nursing services are offered either under generalized public health nursing, specialized school nursing or a combination of the two in most communities today. The fact remains, however, according to the latest publication

of Nurses in Public Health, which lists all nurses working in local government, private, or board of education administered agencies, that whereas in 1960, 34% of the public health nurses had a college degree, in 1964, 39.7% had a college education. More public health nurses serving under the board of education administered agencies have obtained a college degree; a slightly higher percentage of public health nurses in government or private agencies have had public health nursing experience than those working for boards of education. (16)

In February of 1965, Nursing Outlook devoted a major portion of that issue to The Nurse in the School. Cromwell (9) briefly described the role of the nurse in the educational setting as being a liaison between the school and home settings. "It is between the parents and teachers that the nurse finds her place in the school child's scheme of life," she writes. Cromwell wrote that the school's role in society is not to alter conditions but rather to aim ". . . towards creating a better, more understanding climate for living as well as for learning." The nurse has a key position in any school setting to enhance this philosophy.

In the same issue, Schroeder (34), a school psychologist, emphasized the role of the nurse as a liaison officer between home and school. Specifically cited were the contributions the nurse can make to the work of the psychologist

in interpreting home situation to him. Seminars on mental hygiene and school psychology services are being offered to the school nurses around one community in Minnesota, and are being received with great success by all of the nurses.

Radke (25), speaking as a classroom teacher, wrote that a nurse must be a professional person, who has an understanding of the child's total physical, social and psychological make-up. Above all, however, cooperation between nurse, administrator, and teacher is essential to the success of the school health program for the child, she concluded.

#### Future

Most experts in the field, in looking toward the future of school nursing, are careful to report that school nursing must rely on the development of the school health program in order to develop its own program. (10, 38, 40, 42)

Anderson (4) examined the situation further, and wrote:

It is essential to view the . . . school health program in the light of the overall change in American education. Because the American concept has been changing from a traditional, classical education to a functional education which deals in terms of life requirements, health has become a natural concern of the school.

However, a more important aspect of school nursing which must be explored further in the future is that of interpreting the role of the nurse in the schools to the school personnel.

"Nursing and the teaching profession need a better understanding of the potential contribution of the nurse in the school," wrote Tipple. (41) McAleer (18) questioned whether or not the nurse has adequately projected her true image and philosophy to those with whom she works. She stated further:

It is necessary now that, and all indications are that in the future, the school nurse must continue using her efforts to project their image of dedicated health workers to combat the unenlightened people who question their value and the cost of their services.

Numerous other articles and research studies express concern with the understanding and interpretation of the role of the nurse and other members of the school's personnel who contribute to the over-all school health program.

#### Functions, Qualifications and Certification

Great strides have been made in establishing statements and descriptions of functions and activities that can be utilized by school nurses in local school districts. In setting forth the specific functions and qualifications for school nurses, the committee of the American Nurses Association Section on School Nursing (2) stated in its introduction:

School administrators, realizing the relationship of health to learning, are expanding health programs in the schools so that all pupils have the opportunity to reach their maximum learning potential. School nursing services, as a part of this program, must be expanded in scope and quality to meet these demands.



Included in their report, Functions and Qualifications for School Nurses, were eight major functions relating to some aspect of the school nurses' responsibility to the school health program.

The American School Health Association (3) has established similar areas of Recommended Policies and Practices for School Nursing. These areas are listed under 1) general responsibilities; 2) selection of the nurse; 3) pupil load of the nurse; 4) areas of school nursing services approved for offering in schools; and 5) supervision.

Currently, 34 of the 50 states have no certification requirements for school nurses. Two states, Colorado and Indiana, issue certificates but do not require them. In five states, schools are served by the public health nurses as a part of their generalized nursing program. Of the sixteen states that have certification, Idaho, Maine, Nevada, Oklahoma and Wyoming require no more than that the individual be a registered nurse. Alaska, California, Delaware, Minnesota, New Mexico, New Jersey, Pennsylvania, South Dakota, Texas, Vermont and Washington require courses beyond the nursing diploma, including public health training. Except for New Jersey all of these states require a bachelor's degree before issuance of a permanent school nurse certificate. Requirements vary within each of the states for the different types of certificate; i.e., one-year, two-year, five-year or permanent. According to Allanson (1), who

conducted the survey of certification requirements of the fifty states, a number of states have teacher-nurse certification that is required if the nurse teaches regularly in the classroom.

#### REVIEW OF RELATED STUDIES

Although the position of the school nurse has been described in detail by various committees, the interpretation of the position varies from school setting to setting. It is important to discover how to evaluate the work of the nurse, and most studies have concentrated on identifying and analyzing the role and functions of the nurse in various geographical settings, according to set standards.

Grossman (15) pointed out the need for studies to locate gaps which exist between theoretical "best practice" and actual practice. He undertook a study in 1953 to explore current practicing nurses' perceptions of problems and responsibilities in hopes that data obtained from such a study could be used in planning educational experiences in school nursing. Using a random sample technique, 65 California nurses who had completed a one-year program of public health nursing or the equivalent were selected proportionately from two main categories--board of education employed or board of health employed--to be interviewed. The data were presented in five sections after analysis of the interview responses:

- 1) responsibilities in terms of broad areas of high priority;

2) problem areas; 3) areas of training considered most valuable; 4) responses to a check-list of 29 activities; and 5) summary of in-service education activities.

Fourteen areas of high priority were identified by Grossman from analysis of the interviews. The process of finding and correcting defects and being a liaison with the home, which are closely related activities, were rated highly by the nurses whereas safety of pupils and sanitation of the school were areas rated low. Responses identifying ultimate goals of the nurse in the school health program seemed more difficult to express. Responses to this question seemed to be vague and textbook oriented; "health of the child and the community" and "educability of the child" were typical.

When the researcher asked school nurses to identify problem areas related to their work in the schools, most nurses indicated as the major problem area, ". . . a lack of understanding and/or mutual agreement between the nurse and the school staff as to their mutual and specific roles in the school health program." Many of the problems which were listed as physical or material seemed to be related to the lack of understanding and communications which most nurses mentioned. Relationships with parents were mentioned as a problem by some; however, relationships with children were not specifically mentioned as a problem.

Each nurse was asked during the study to rank 29 school nursing activities on a 5-point scale ranging from "most important" to "least important." One activity, "confer with teachers concerning health needs and problems," was given a 5-point mean score by the respondents. This same activity was also ranked highly by the teachers interviewed in this study.

From analysis of the responses, Grossman suggested that the nurse's training seems to be centered around nursing skills and other technical aspects, rather than being concerned with equipping her to communicate effectively with school personnel who are part of the school health program.

Grossman suggested studies on perception of school administrators and teachers of their own role and the nurses' role in the school health program and the nurses' perception of the role of others.

Stobo, Teachers College, Columbia University, has also attempted to relate theory to practice and to identify existing gaps between theory and practice by illustrating desired practice of objectives through actual cases in the study Relating Theory and Practice in the School Health Program. (36)

The procedure for the study, conducted in 1957, included: 1) formulation of a statement of objectives of the school health program; 2) a statement, endorsed by a jury of nurses, of functions of responsibility of the nurse working in the schools; and 3) a comparison of the health objectives and

nursing functions. Practices demonstrating the functions were obtained and a jury of nurses was asked if the practices set forth as examples met the criteria outlined by the school health objectives.

The results indicated that functions and responsibilities established in theory actually could be substantiated in practice. Stobo recommended further study to, 1) determine to what extent practices similar to those described in the study were being carried out in various schools, and 2) develop evaluation tools to help determine how completely a nurse is fulfilling her functions in meeting school health objectives. Stobo wrote:

Her contribution is enhanced when her role is understood and appreciated by the school administrator and by other members of the school staff. Through increased understanding and cooperative endeavor the health obligations of schools can certainly be met.

Basco (5) conducted a pilot project, Evaluation of School Nursing Activities, considering several independent variables; nurse/pupil ratio, socio-economic level of school, number of sessions held per day, educational background of the nurse, length of experience of the nurse, and type of service rendered by the nurse (generalized or specialized). The study was conducted by means of a questionnaire in Baltimore and included 60 nurses who were in a generalized school nursing service and 11 who were in a specialized school nursing service. The purpose of the study, undertaken in the

school year 1959-60, was an attempt to measure school nursing activities of the selected sample of nurses according to specific nursing functions by means of a scored questionnaire.

As the nurse/pupil ratio decreased indications were that accomplishments of the nurse increased. Nurses in specialized service accomplished more activities than generalized nurses until influences of other variables, such as nurse/pupil ratio, were equal. On the basis of educational background, socio-economic level of the school, number of sessions held per day, there seemed to be little statistical difference in scores obtained.

Basco recommended that this type of study method be refined by broadening the areas of functions included in the questionnaire, administering the questionnaire in other ways and testing it in different settings.

The purpose of a study by Poe (24) was:

. . . to identify the functions of a nurse as perceived by the nurses working in the school health program and to analyze the functions according to their perceptions of frequency, importance, and complexity.

Poe surveyed 686 nurses in Ohio, Illinois, Michigan, and Wisconsin by means of a mailed questionnaire and included 310 of the returned instruments in the data presented. The data suggested that nurses perform a wide variety of activities, and that a larger number was performed by nurses employed by boards of education. Poe reasoned that this

finding was more directly connected to the time the nurse is in the school. There was considerable agreement among nurses sampled as to problems that were thought to affect the performance of functions in the schools. The need for more nurses and the need for over-all school health planning were expressed by most nurses as the main deterrents to good performance.

Nurses also expressed a desire for more courses in education, public health, school nursing, and health guidance and counseling. This indicates a desire for broader educational background and experience on the part of the school nurse.

Recommendations for further study in the area of role interpretations and understanding by members of the school health program was emphasized by Poe along with some recommendations for curriculum revision in schools of nursing.

Bland (7) conducted the same type of study in Indiana in 1956. One hundred and seventy-two nurses employed by boards of education were interviewed by Bland and asked to rate 141 items in seven categories according to difficulty, appropriateness and frequency of performance. Purposes for conducting this study were directly concerned with interpreting the work of the school nurses to the State Board of Education in Indiana to assist in the planning for establishing licensure regulations compatible with "good school nursing practice." Bland found, as did Poe, that there was a

wide range of activities performed by the school nurses, since all 141 items were performed by the nurses in the sample. One activity performed by 100% of the nurses responding was that of "conferring with teachers regarding health status of children." Grossman found that all of the nurses he interviewed regarded this activity as important for the nurse to perform. Thirty-seven activities were analyzed against the license types possessed by the nurses and little difference in performance was found. Bland recommended that, in view of the purpose of the project (evaluation of licensing procedures in Indiana), other studies be conducted to evaluate all phases of the school nurses' activities.

Day (12) surveyed, by mailed questionnaire, 89 school nurses employed either by boards of education or departments of health in the state of Oregon in November, 1961. She hoped to 1) identify the activities of the nurse in the elementary and secondary schools, 2) analyze the activities according to frequency and concentration of services, 3) to determine to what extent scope of activities varied with the administrative structure, and 4) to determine with what importance 20 nursing activities were rated by the sample.

Some of the findings indicated, as did those of Poe (24) and Bland (7), that nurses performed a variety of activities in the schools and nurses employed by boards of education performed slightly more activities than did generalized



public health nurses. Most of the activities were concerned with health appraisal and follow-up for correction of defects.

Significant findings were encountered in five of the seven broad function areas when activities of the nurses employed by boards of education were compared with activities of nurses employed by departments of health. Nurses employed by boards of health had higher performance scores in Area III--functions relating to community activities. Nurses employed by boards of education had higher performance scores in Area I--functions relating to the administration of the school health program, Area II--functions relating to the nurse's role as a faculty member, and Area V--functions relating to counseling and guidance. Area VII--functions relating to health protection and safety, showed the greatest difference between the groups. Nurses employed by boards of education concentrated services in providing first aid whereas nurses in generalized programs performed more immunization connected activities. Area IV--functions relating to health appraisal and Area VI--functions relating to health education were performed equally by both groups.

Day (12) concluded that verbatim comments by the nurses indicated the need for greater understanding between school administrators and the nurses as to the scope of the nurses' activities and effective utilization of their services. These comments, she wrote, reflected the nurses' desire for a more positive definition of their role.

The scope of activities of the secondary school nurse was studied by Roth. (31) Twelve schools, in DuPage, Cook and Will counties in Illinois were studied. Each school had an enrollment of over 500 students and provided school nursing services for at least half of each school day. Roth speculated that there were differences in the duties of the nurse in the secondary school because of the organization of the secondary schools and the different age group involved, i.e., adolescents. She found, by means of a questionnaire and interviews, that activities of the nurse in the secondary school studied included primarily administering first aid, holding conferences, screening and follow-up procedures. In the field of health education, the nurse supplied health education materials but seldom did actual teaching. Other interesting findings were that students seemed to refer themselves to the nurse first and then were referred by teachers to the nurse. Office visits took up a major portion of the nurses' time; six of the twelve nurses did not make home visits.

Three recent studies--those of Shetland (33), Chilman (8), and Simpson (35)--involved the interpretation by public school personnel of the functions and role of the nurse in the school setting. Shetland's study, A Method For Exploring Bases of Curriculum Development, was undertaken in 1950 when the State University of New York assumed control of the Department of Public Health Nursing at Syracuse University College of Medicine. The purpose of the study was to

ascertain the expectations of the co-workers and consumers of public health nursing services in order to develop further the curriculum of public health nursing in the new setting. Shetland conferred with four groups of teachers, with the groups ranging in size from eight to twenty-two teachers, as to their expectations of the nurse in their schools. Most of the responses to the question, "What do you expect of the school nurse?" included the more traditional duties of the nurse such as giving first aid, giving injections and diagnosing for communicable disease. Other members of the groups felt that the nurse should work more closely, ". . . with teachers, more meetings to discuss whole health program." One group, composed of teachers in the secondary and college level, had had little contact with public health nurses and expressed the idea that "public health nursing services are for the indigent." One principal felt that, ". . . the nurses needed more help in interpersonal relations so that they could work more constructively with teachers and parents; that they need to learn ways of working to get cooperation rather than hostility . . ."

Shetland concluded that the nurse going into the school, aside from needing to possess nursing skills, needs to be able to interpret her job and her philosophy of school health to teachers and other people in the schools.

Chilman conducted a study, Survey of Elementary School Administrators Opinions Regarding Nursing Responsibility for

Various Activities in a School Health Program, in Rochester where generalized school nursing was performed in all of the schools. At the time the study was undertaken, nurses were spending sixty percent of their time in the schools and 46.6% of the activities they were performing in the schools were considered to be non-nursing responsibilities by their supervisors. (8) Sixty-four principals from public and parochial schools, plus ten city public health nursing administrators and supervisors, were included in the sample. A questionnaire was used to gather the opinions of the two groups and to test for agreement or disagreement between the two groups about nursing responsibilities for selected activities. School administrators, on the whole, indicated that preventive health, health education, health consultation, health inspection and first aid were nursing responsibilities. The public health nurses rated preventive health, health education and consultation services as most important nursing responsibilities but disagreed about the appropriateness of health inspection and first aid administration as primary nursing responsibilities. The major aspects of nursing services which principals disliked had to do with the amount of time the nurse was in the school--which seemed to be limited--and the activities which took the nurse out of the school unexpectedly. The principals' recommendations for improvements dealt with bettering communications and in-service programs and the added use of nursing assistants.

Using a three-part questionnaire, Simpson (35) surveyed one hundred and ninety-one teachers attending summer school at the University of Colorado in 1956 on their perception of specific school nursing activities. The purpose of the study was to develop and apply a tool which would measure group perceptions of a professional role and to analyze the data obtained by use of that tool.

Part one of the study included specific nursing activities, which the teachers rated according to whom should perform the activity--nurse, teacher, or other. In part two, functions of public health nurses were rated by teachers as usually, seldom or never performed. Simpson found that, ". . . as a whole, the respondents are not consistent on some of the related activities." She arrived at this conclusion because teachers did not agree that the nurse usually "works with groups on child development," but agreed that she usually "interprets patterns of growth and development." She also concluded from the respondents' comments that the nurse is valued for her technical skills more than for any consultation or interpretation she might have to offer. The main suggestion of teachers for improvement of health services was the addition of "more nursing services." The suggestions for improving nursing time devoted to the schools was to have the nurse perform more health services.

## SUMMARY

In view of the recent growth in the position of school nurse, particularly specialized school nursing, the literature on history and related studies has been presented in this chapter. The emphasis in research conducted in this field seems to be in identification of the role and functions of the school nurse as perceived by the nurses themselves. There has been an attempt to locate "gaps which exist between theoretical best practice and actual practice." (15)

Statements of functions, standards and qualifications for school nurses have provided a guide for many of the studies which were reviewed.

Certification requirements seem to vary greatly from state to state but recent Public Health Service Statistics show that the nurses serving in the school are better prepared educationally today than they were as recently as four years ago. (16)

Other areas of school nursing services that have received notice in the literature are 1) the need to explore perceptions of the role of the school nurse in the school health program by other members of the school personnel and 2) the need to explore the nurses' perceptions of the positions of other school members on the health program. Few studies have been conducted in either area.

### CHAPTER III

#### METHODOLOGY AND FINDINGS

##### Introduction

This study was undertaken in order to identify the perceptions of a selected group of public school classroom teachers of: 1) role and functions of the school nurse; 2) problems encountered with school nursing services; 3) courses which nurses should take in order to serve better in the schools; and 4) the importance of twenty selected school nursing activities. Another purpose was to determine to what extent, if at all, differences in perception were related to specific aspects of the teacher's professional experiences, level of grades taught and administrative structure of school nursing services present. The need for this type of study has been noted by Grossman (15) and Day (12), among others, who suggested that knowledge of the perception of the nurse's role in the school setting will enable nurses to define and strengthen the position of school nurse.

Development of the tool. An interview guide and activity rating check-list were developed after a review of the literature, and specifically after review of the tools used by Grossman and Day. Part I of the guide included general information and identification of the independent variables. Part II was composed of six open-end questions constructed to solicit teachers' general perceptions of the role and

functions of the school nurse, problems encountered with school nursing services, and pre-service education that teachers thought desirable for school nurses. Part III of the guide presented an activity rating check-list of twenty selected school nursing activities which was used by Day (12) in her study. Two of the twenty activities were revised for use in this study. A five-point scale ranging from 4 (highest degree of importance) to 0 (no importance) was designed to permit the participants to indicate their opinion of the importance of each activity. The interview guide is found in Appendix B.

After verification of the tool by 14 professional nurses during a statistics class exercise, a pilot study, using 15 public school teachers from Multnomah, Washington and Clackamas counties in Oregon was conducted. Two revisions were made before the data-collecting tool was used in the main study. The activity rating check-list was unchanged.

Steps in the selection of the sample. In studies where assessment of personal qualities is involved the interview seemed to be the method best suited for collection of the data. (32) Therefore, in order to complete the study by interviewing the participants, the sample was limited to teachers currently employed in unified first class school districts, first class elementary school districts, and union high school districts, in the Oregon counties of Washington, Clackamas and Multnomah. The school districts



meeting these criteria were identified for each county with information furnished by the Oregon Education Association research department.(22) From these, districts offering a combination of school nurse services, through both board of education and department of health were eliminated. The remaining school districts were identified as to type of school nursing services offered.

Three first class school districts (including an elementary school district and a secondary school district within the same community) that offered board of education-administered school nursing service, were selected randomly by drawing the names of the districts from a box. Three first class school districts providing department of health school nurse services were also selected randomly for part of the sample. From within each district, representative numbers of elementary and secondary schools were randomly selected. The final sample of 115 classroom teachers also was selected randomly by using numbers for each teacher's name, and drawing these numbers from a box. On two occasions a teacher was substituted by the principal of an elementary school for an individual teacher who was absent the day of the interviewing.

Steps in collection of the data. The superintendents of each district were contacted by letter and telephone call, or in person. The purpose of the study was outlined and

interview guides reviewed. Permission to conduct the study was given by all districts contacted except for one department of health-administered district, who did not give notice of the rejection until it was too late for a new district to be selected.

The teachers were interviewed either singly or in groups, according to what was the most expedient for the school. The number of teachers to be interviewed varied from one to six. The interview consisted of the investigator introducing herself and giving instructions for completion of the guide and activity rating check-list. The groups were free to ask questions or make additional comments during the interviewing sessions.

Although the teachers usually disclosed that they were not qualified to answer the questions they also stated that they would do their best.

Tables 1, 2 and 3 show the distribution of teachers for the study.

Table 1. Distribution of 115 Teachers According to the Administrative Structure of School Nursing Services in Their Employment Setting

Number Employed where School Nurse Service is Administered by Board of Education	Number Employed where School Nurse Service is Administered by Department of Health	Total
(1)	(2)	(3)
56	59	115

Table 2. Distribution of 115 Teachers According to the Level of Grades Taught

Number who Taught in Elementary Schools	Number who Taught in Secondary Schools	Total
(1)	(2)	(3)
60	55	115

Table 3. Distribution of 115 Teachers According to the Total Number of Years Teaching Experience

1 through 5 years	6 through 20 years	21 and over years	Total
(1)	(2)	(3)	(4)
35	64	16	115

## REPORT OF THE STUDY

Part IGeneral Information

1. School. Twenty schools including seven secondary schools and thirteen elementary were represented in this study.

2. District. Four first class unified school districts, one first class elementary district and one union high school district were selected for the study. For purposes of this study, the one first class elementary school district and the one union high school district were combined since they are in the same community.

3. County. Two first class unified school districts, one first class elementary district and one union high school district were in Clackamas county; one first class unified school district was in Multnomah county and another in Washington county.

4. School and District Enrollments. School district enrollment ranged from 78,970 with 3,135 teachers to 1,780 enrollment with 155 teachers. School enrollments ranged in secondary schools from 2,650 with 115 teachers to 1,105 with 56 teachers. In elementary schools the range was from an enrollment of 920 with 48 teachers to 140 with 8 teachers.

5. Time nurse is in school per week. The range for the time the nurse is in the schools was 1 hour per week to

5 days per week in secondary school settings. In elementary schools, a nurse was on duty from 1 hour per week in one school to 1½ days per week. The nurse/pupil ratio was not ascertained in this study.

6. Administrative structure of school nurse services.

Three school districts, including the combined districts, offered school nurse services administered by the boards of education. The departments of health administered the school nurse services in two districts.

7. Grade or grades taught. The grades represented within the sample of elementary school teachers are shown in Figure 1.

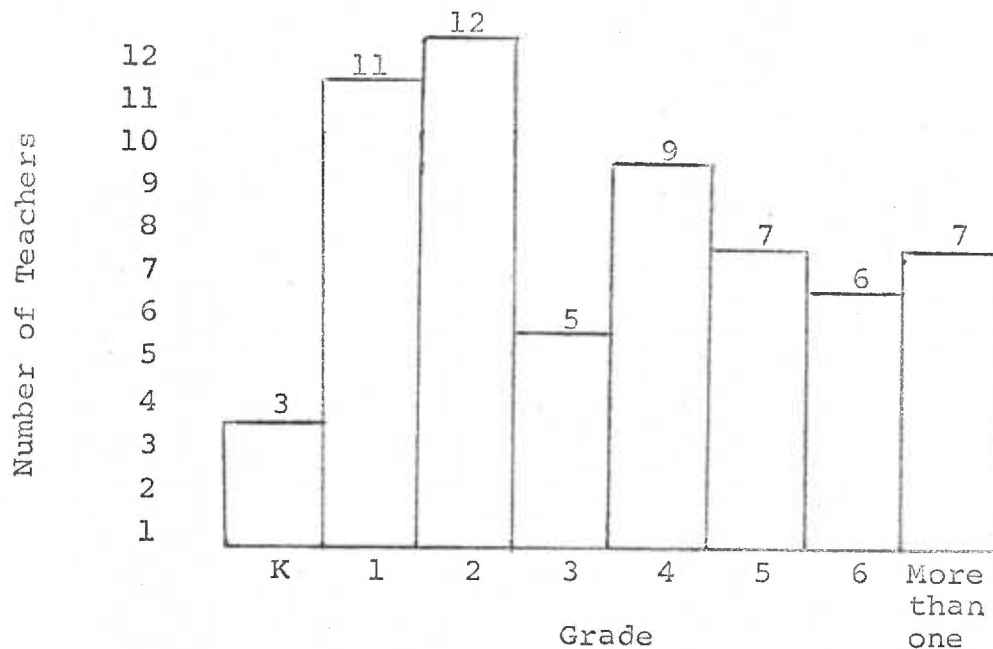


Figure 1. Distribution of 60 Teachers According to Elementary Grades Taught

Secondary teachers taught more than one grade in 80% of the cases. The number of grades taught varied greatly within each school and within the districts. A frequency distribution for grades taught in secondary level are shown (Figure 2).

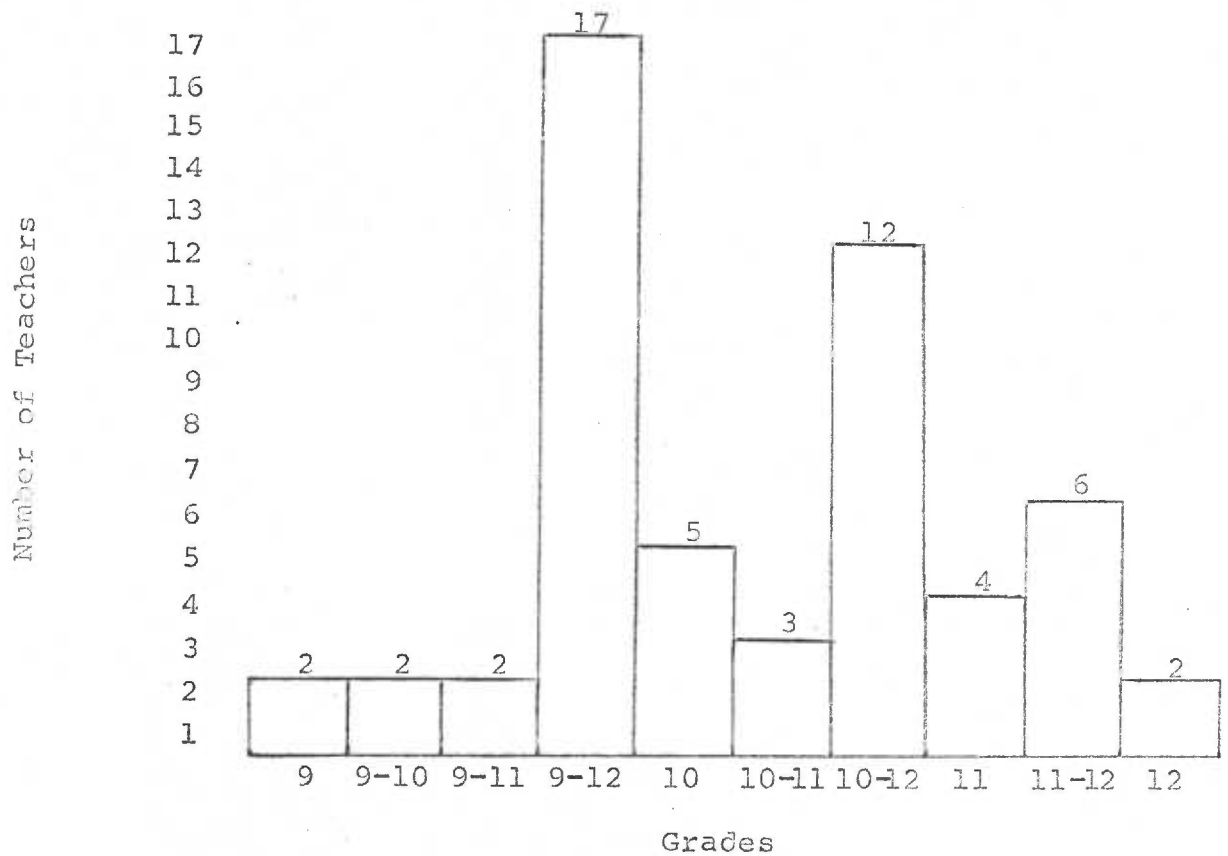


Figure 2. Distribution of 55 Teachers According to Secondary Grades Taught

8. Number of years' teaching experience. The mean teaching experience for elementary school teachers was 12.9 years; for secondary school teachers 9.5 years with 11.2 years the mean for the total group.

9. Number of years' teaching experience within the district. The mean teaching experience for elementary school teachers within a given district was 7.1 years. This differs from the mean of 5.7 years reported by the Oregon Education Committee on teacher tenure for the school districts comprising the study. (21) At the secondary level, the mean number of years' teaching experience within a district was 6.6 years. The Oregon Education Association (21) listed 4.4 as the average number within the school districts for this sample for secondary teachers. This distribution agreed with the report of the Oregon Education Association that elementary school teachers have longer tenure with the districts.

## Part II

### Finding from Six Open-end Questions

Part II of the study consisted of six open-end questions. Information obtained for each question has been identified, analyzed and presented separately.

1. What are some of the functions that the nurse performs in your school?

The responses to this question were placed into appropriate activities within the seven broad areas of school nurse functions established for the study by Day. (12) A description of each activity and function is included in Appendix C.

Some examples of responses to this question were:

Looks at children referred to her, as rashes, marks etc. Makes house calls especially if children are absent a great deal.

Follows up vision test. Serious health problems followed. Teaches the teacher special procedures.

Observes but does not diagnose rashes, etc. Refers children for community health services - vision and dental.

Health room supervisor, screens student. Assists teachers in personal health matters. Types up absentee list. Keeps teachers informed on health problem. Instructs teachers as to special health problems.

#### Comparison According to Administrative Structure of School Nurse Services

##### Board of Education (Group B) or Department of Health (Group D)

Area I. Functions relating to administration of the school health program. Groups B and D mentioned activities within this function very rarely. Although both groups rated the activity "assists with planning a modified program for children with defects," rather high in the check-list of 20 activities in part III of the guide, only two respondents



mentioned the activity in the responses to open end questions. Only one response of ten pertained to the nurse "working with committees on school health program planning." Nurses themselves feel that this is a weak area of responsibility. Those whom Poe (24) questioned definitely felt that they should do more in helping to plan the over-all school health planning.

Area II. Functions relating to the nurse's role as a faculty member. This area was rarely mentioned by Group B or Group D. The responses centered around the activity which has the nurse "supervising ill, injured or isolated pupils at school." Day (12) found that more nurses employed by boards of education performed the activities in the two broad areas I and II than did nurses employed by the department of health. She attributed this to the fact that nurses employed by boards of education may have better working relationships with administrative personnel than do nurses employed by departments of health.

Area III. Functions relating to the community. Interestingly, the board of education-employed nurses were perceived as performing more of the activities in this area by the teachers receiving their services. Day, in contrast, found from the responses of the nurses that nurses employed to do generalized school nursing spend more time in community related activities than did specialized nurses.

Area IV. Functions relating to health appraisal. Both Groups B and D ranked this as the main function of responsibility which a nurse performs in the school. Slightly more of the total activities were mentioned by the teachers in the board of education sample. Grossman, Day and Basco have found that nurses concentrate their activities in this area when they rated the functions of the school nurse as they performed these. Grossman felt that the nurses are concerned first of all with the process of finding and correcting defects and most other activities such as "home visits as follow-up" are directly connected to the first activity. He questions the foundation which nurses have established for themselves in concentrating in this area. Teachers questioned by Simpson (35) consistently felt that nurses should assume responsibility for screening procedures and follow-up instead of teachers or other personnel. In the study by Chilman, 65.5% of the principals agreed that the activity "routinely testing visual acuity, weighing and measuring children" was a nursing responsibility, whereas 90.0% of the nursing supervisors disagreed. The responses of the teachers in this study centered around the screening procedures. Several of the teachers, especially in the secondary level, questioned the use of Snellen Charts to test for visual acuity.

Area V. Functions relating to counseling and guidance.

Although Group B mentioned more of the activities here as being performed by the specialized nurses, both Groups B and D devoted a similar percentage of the total responses to this area. Studies such as those by Day and Poe show that nurses find this an important area for performance. Grossman found that as nurses' experience increased so did their awareness for the area of "mental health" of students. There was very little disagreement as to the appropriateness of the activity "individual pupil health counseling" by the participants in Chilman's study. Principals and public health personnel agreed that this was a nursing responsibility.

Area VI. Functions relating to health education.

Generalized nurses, according to the sample, perform more of the activities under health education more frequently than do specialized school nurses. These activities were directly connected with "interviewing children referred by the teacher" and "obtaining or teaching health materials." Both Group B and Group D perceived essentially the same two activities with the greatest frequency. All nurses in Day's study performed these two activities with 96.8% to 100% frequency.

Area VII. Functions relating to health protection and safety. Both Groups B and D emphasized the activity which has the nurse "administering first aid while she is in the building," but on the other hand some of the respondents

stated that "accidents always seemed to happen when she's away." The second activity which the groups emphasized was that of "diagnosing communicable diseases."

Analysis of responses according to this first variable--administrative structure of school nursing services--is shown in Table 4.

In summary, the most significant finding within this variable seems to be the perception by teachers in this study of more activities being performed by nurses employed by boards of education than nurses employed by departments of health. Studies done by Day, Poe and Basco (12, 24, 5), have shown that according to school nurses, nurses employed by boards of education perform more of the tested activities than do nurses employed by departments of health. Basco (5) attributes this in part to the nurse/pupil ratio which seems to favor the nurses hired by boards of education. Poe (24) attributes it to the added time the nurses hired by boards of education have in the schools. In Oregon, Day (12) found that nurses in both groups had a comparable nurse/pupil ratio, but nurses doing generalized school nursing were responsible to a larger number of schools. Teachers also emphasized that the nurse was available "on call" when she was hired by the board of education to serve only in the school district. This seemed to give the teachers a sense of security which teachers receiving generalized services did not express.

Table 4. A Comparison of Responses to Question 1 Part II by 115 Teachers According to Administrative Structure of School Nursing Services Using Seven Broad Areas of School Nursing Functions\*

Area	Teachers Receiving School Nurse Service from Boards of Education. N 56	Teachers Receiving School Nurse Service from Departments of Health. N 59
	Per Cent Activities in Areas Responses in Areas	Per Cent Activities in Areas Responses in Areas
(1)	(2)	(3)
I. Administration	41.66	2.22
II. Faculty Member	33.33	12.97
III. Community	64.28	7.40
IV. Health	46.42	33.33
V. Appraisal	60.00	15.55
Counseling and	37.50	5.18
Guidance	40.00	23.33
VI. Health Education		
VII. Health Protection		
and Safety		
	Activities Mentioned = 57	Activities Mentioned = 43
	Responses = 270	Responses = 167

\*Description of Seven Broad Areas of School Nursing Functions found in Appendix C

Comparison According to Level of Instruction

Elementary (Group E) or Secondary (Group S)

Area I. Functions relating to administration of the school health program. Generally, teachers in the secondary setting, Group S, indicated more activities being performed, but few responses were devoted to this area by either Group E or S.

Area II. Functions relating to the nurse's role as a faculty member. Although Groups E and S perceived about the same number of activities, the secondary school groups devoted more responses to this area. The responses for Groups E and S highlighted the activity, "supervises the ill, injured or isolated child while in school." This seems to emphasize the more traditional skills of the nurse.

Area III. Functions relating to the community. Both Groups E and S mentioned an equal number of activities as being performed by the nurse; however, the Group E perceived the nurse as performing activities more frequently in this area than Group S. This is probably related to two different phenomena. First, the classroom structure is such in the elementary level that the teacher is aware of all factors influencing the child in "her" class. Second, since most of the screening activities are assumed in the elementary school level there is more opportunity for the nurse to do follow-up work, which involves community agencies, in correction of defects.

Area IV. Functions relating to health appraisal. The elementary school teachers mentioned the nurse as performing more of the activities most often. This may be due in large part to the fact that screening procedures are performed or scheduled in the elementary setting by the nurse, whereas in the secondary school setting the physical education department was mentioned as routinely performing some of the screening procedures. This area was mentioned as the main area of function by the elementary group and mentioned as the second main area of function by the secondary teachers.

Area V. Functions relating to counseling and guidance.

Very little difference in the number of responses was found to exist in this area. Secondary teachers did perceive the nurse as performing counseling and guidance activities slightly more often. Grossman (15) found that there was a significantly higher awareness among nurses in the secondary setting for doing individual counseling with students. In the latter section of the interview guide, which dealt with rating a check-list of nursing activities, teachers in the secondary setting ranked counseling activities by the nurse either on referral or voluntary basis as important for the nurse to perform. Elementary school teachers responded that it was important for the nurse to be a health counselor on referral but perhaps not so important on a voluntary basis.

Area VI. Functions relating to health education. The elementary teacher was more aware of activities being performed .

in this area. In the secondary setting health classes are regularly offered to students, and, therefore, teachers thought that health education did not need to take up the nurse's time. Roth (31) found that nurses in the secondary schools whom she interviewed did very little health teaching. Most of their activities in this area were concentrated on securing health information and materials for the teacher to use.

Area VII. Functions relating to health protection and safety. The same number of activities were perceived as being performed by both groups. Secondary school teachers did perceive the nurse as performing first aid duties more frequently while she was in the school. Roth (31) found that the nurse in the secondary school spends half of her time taking care of routine office calls, which might involve small emergencies.

In summary, teachers in the elementary school setting perceived the nurse as performing more activities than she was thought by secondary teachers to perform. There may be various reasons for this finding. However, generally, elementary school classroom teachers who have the responsibility of one class group during the course of the year may be more aware of the activities which involve their pupils with special personnel in the schools; in this case, the nurse. Teachers in the secondary setting, who may be responsible



for five class sessions during the day, may not be as aware of the activities of the students in the health field. Roth (31) has found in her study that most of the referrals to the nurse's office came from the students themselves; referrals from teachers were secondary. It may be that the nurse in the secondary school needs more communication skills and public relation skills to project her role in the setting. Table 5 shows the ranking of functions by each group.

Table 5. A Comparison of Responses to Question 1 Part II by 115 Teachers According to Elementary or Secondary Level of Instruction Using Seven Broad Areas of School Nursing Functions\*

Area	Elementary School Teachers N 60		Secondary School Teachers N 55	
	Activities in Areas	Per Cent Responses in Areas	Activities in Areas	Per Cent Responses in Areas
(1)	(2)	(3)	(4)	(5)
I. Administration	25.00	1.56	41.66	3.31
II. Faculty Member	33.33	10.90	26.66	15.93
III. Community	71.42	6.37	42.85	6.59
IV. Health Appraisal	50.00	37.25	39.28	21.97
V. Counseling and Guidance	60.00	12.54	53.33	17.03
VI. Health Education	50.00	12.15	25.00	4.91
VII. Health Protection and Safety	28.00	19.21	28.00	30.21
	Activities Mentioned = 56	Responses = 255	Activities Mentioned = 45	Responses = 182

\*Description of Seven Broad Areas of School Nursing Functions found in Appendix C

Comparison According to Amount of Professional  
Experience of the Teacher

The sample for this variable included Group 1 (35 teachers with 1 through 5 years' experience), Group 2 (64 teachers with 6 through 20 years' teaching experience), and Group 3 (16 teachers with 21 years' teaching experience and over).

Area I. Functions relating to administration of the school health program. This area was mentioned very little by the Groups 1, 2, and 3 as had previous variable groups.

Area II. Functions relating to the nurse's role as a faculty member. Few differences were noted in perception of activities between Groups 1, 2, and 3. Group 2 mentioned more activities in most areas. This may be due to the fact that a larger number of teachers are in Group 2.

Area III. Functions relating to the community. Group 3 gave a slightly higher number of the total responses to this area. It may be that teachers with more experience have become more aware of resources which the nurse uses in the community because the experienced teachers would have had more students throughout the years receiving these services.

Area IV. Functions relating to health appraisal. This area was rated first by Groups 1 and 2 and second by Group 3. As has been mentioned, this seems to be the area in which nurses concentrate their activities, and nurses' performance has been perceived by the teachers in this study.

Area V. Functions relating to counseling and guidance.

Groups 1 and 2 seemed to devote a larger amount of the responses to this area than did teachers in Group 3. Perhaps teachers with more experience do more health counseling themselves. There is no evidence to indicate, however, that this is true of the teachers in this sample.

Area VI. Functions relating to health education. Group 1, which has 1 through 5 years' experience, mentioned that the nurse either furnished health materials or taught in the classroom more often than did the other two groups. Group 3 noted these functions as being performed infrequently. It may be that the teachers with more experience have accumulated more teaching materials in the health field and therefore use the nurse less in the area of health education. A new teacher, in contrast, would be adding to the materials and would request more assistance from the nurse.

Area VII. Functions relating to health protection and safety. Groups 1, 2, and 3 considered this to be an important performance area. Group 3, teachers with 21 years' experience and over, rated this activity as the main area of performance.

In summary, teachers with 6 through 20 years' experience named more of the activities as being performed in most areas. This was due in part to the number comprising this group when compared to the other two groups. The responses from all groups were quite similar. Table 6 gives a resume of the responses by the groups under this category.

Table 6. A Comparison of Responses to Question 1 Part II by 115 Teachers According to Professional Experience Using Seven Broad Areas of School Nursing Functions\*

Area (1)	1 Through 5 Years Experi- ence N 35		6 Through 20 Years Experi- ence N 64		21 Years and Over Experience N 16	
	Activ- ities in Areas	Per Cent Responses in Areas	Activ- ities in Areas	Per Cent Responses in Areas	Activ- ities in Areas	Per Cent Responses in Areas
I. Administration	8.33	.74	50.00	2.88	16.66	3.27
II. Faculty Member	26.66	13.33	53.33	13.99	20.00	8.19
III. Community	28.57	5.18	64.28	6.17	35.71	9.83
IV. Health Appraisal	46.42	32.59	50.00	30.04	25.00	29.50
V. Counseling and Guidance	33.33	16.29	53.33	15.22	20.00	6.55
VI. Health Education	50.00	12.59	37.50	7.81	25.00	9.83
VII. Health Protection and Safety	24.00	19.25	32.00	23.86	36.00	32.78
	Activities Mentioned = 41		Activities Mentioned = 59		Activities Mentioned = 33	
	Responses = 135		Responses = 243		Responses = 61	

\*Description of Seven Broad Areas of School Nursing Functions found in Appendix C

Additional responses to this question are quoted verbatim:

Our present nurse is with us so little that when I do refer a child asking her to visit, not much seems to come of it.

To my knowledge - none.

Haven't any idea!! - was not aware whether or not one was present in our school.

Didn't know that we had a nurse at --.

I don't know.

I have not used her services in at least 10 years.

First aid mainly, although this should be secondary.

Our health nurse does very little. She has to go to so many schools she can't possibly function properly in any one school.

Makes out absentee list.

The second question in Part II was posed as:

2. What do you think the role of the school nurse is in your school?

Verbatim responses included:

Provide assistance to students re: health problems of students.

To examine and recommend treatment or referral of youngsters; to instruct teachers on special health problems of individual students.

Supervises school's health program.

To give professional assistance for welfare of students and teachers.

With few exceptions, teachers felt that this was a very difficult question to answer. Most of the interviewees asked for a definition of the word "role" as used in this study. Bennis, et. al. (6), have defined role as "the cluster of functions that come to be expected of a given class of workers within the position they typically occupy in the organization in which they work." They further point out the problems which arise in the social sciences because of the "lax and often confused" manner in which the term is used.

For purposes of this study, however, it was desired to solicit free responses of the perception of the role of the nurse in the school setting. Therefore, no definition of "role" was given to the interviewees. Hastorf, et. al. (37), noted that when categories are set for perception descriptions, there may be considerable interpretation of the descriptions among the subjects. They suggest, therefore, that, "Researchers should make more of an attempt to study the perceptual categories that are actually employed by, and thus relevant to, the perceiver under consideration."

There are a number of conditions which will determine the extent of perception. Heider (37) states that stimulus patterns basic to person perception are usually more extended in time than those relevant to thing perception. Teachers in this study were interviewed the last two months of the school year in order to avoid some of the unawareness a new

teacher might have of the nurse in the school. Also, there was the possibility that a new nurse might have been employed in the setting. Other determinants of the perception will be past experiences directly or indirectly with the individual one is perceiving, the environmental conditions when the communications took place, exchange of verbal communication, and the understanding of that communication.

After reviewing the responses to question 2, answers were categorized into three main headings. This was accomplished while avoiding knowledge of any of the variables being tested in order to avoid bias on the part of the investigator. After the responses were coded according to one of the three categories they were placed into the proper heading with the different groups comprising the independent variables.

The three categories were: 1) activity related--e.g. "diagnosing contagious diseases and separating them from the other children, explaining the condition of a child so that the teacher will have a better understanding of him, taking care of emergencies - accidents, etc."; 2) over-all--e.g. "Girl Friday in the area of health, coordinator and supervisor of health programs"; and 3) "little or none"--e.g. "Very little - she is not here enough to have any real role in the school."

After the responses were categorized, tables were established and Chi-square tests used to test for differences in role perception within each variable.



A probability of less than .01 was found when the concept of role of the board of education group was compared to the concept of role of teachers receiving department of health nursing services. The contributing factor was that in most cases when the teachers stated that the nurse did not have a "role in the school" it was due to the limited time the nurse was present in the school, (Table 7).

Table 7. Responses by 115 Teachers of "Role" Concept According to Administrative Structure of School Nursing Services

Structure of Services	Activity	Over-all	None	Total
(1)	(2)	(3)	(4)	(5)
Board of Education	21	30	5	56
Department of Health	27	14	18	59
Totals	48	44	23	115

d.f. = 2       $\chi^2 = 13.84$       P = .01

There was no significant difference when the descriptions of the elementary teachers were compared to the responses of the secondary school teachers, (Table 8).

Table 8. Responses by 115 Teachers of "Role" Concept  
According to Level of Grades Taught

Level of Grades	Activity	Over-all	None	Total
(1)	(2)	(3)	(4)	(5)
Elementary	23	25	12	60
Secondary	25	19	11	55
Totals	48	44	23	115

d.f. = 2       $\chi^2 = .73$       P = N.S.

No differences were found when the experience of the teachers was compared, (Table 9).

Table 9. Responses by 115 Teachers of "Role" Concept  
According to Professional Experience of  
the Teacher

Experience of Teachers	Activity	Over-all	None	Total
(1)	(2)	(3)	(4)	(5)
1 through 5 years	15	13	7	35
6 through 20 years	28	21	15	64
21 years and over	5	10	1	16
Totals	48	44	23	115

d.f. = 4       $\chi^2 = 4.97$       P = N.S.

Some additional examples of the teachers' responses to this question, of interest were:

Very little--I really don't know of any importance.

Girl Friday in the area of health.  
Coordinator and supervisor of health programs.

Nurse is not used much in the district.  
Parents handle their own health problems.

The nurse is here very seldom--thus her value is nil. I believe the secretary is more of a nurse.

Probably not an active role.

The third question of Part II was worded thus:

3. What do you think the role of the school nurse should be?

Some verbatim responses are cited.

She should be full time. All students should be programmed through her perhaps twice a year for routine checks. She should check eyes, ears, nose, and throat of each student.

Perhaps do more for proper testing of vision, other than Snellen. Checking teeth more closely. Parent education.

Health advisor (for health problems of student which influence his educational progress--advice to teacher or student).

The teachers were asked to speculate as to the role a nurse should assume in the school if they could perceive an ideal situation. Responses were categorized according to the three main headings established for question 2. Chi-square tests for difference were applied within each

variable, as they were for question 2. No significant differences were found in any of the variables. In all cases the responses to the question showed that fewer than five teachers within each variable perceived the nurse as having "no role"; therefore, the findings for each variable were not depicted in table form.

There were no significant findings of differences when the board of education group was compared to the group receiving services from the department of health. The greatest change perceived was with the department of health group from having "no role" category to either an "activity" one or an "over-all" one.

When responses of elementary teachers were compared to those of secondary teachers, there were no differences noted. There was a shift from the nurse having "no role" to one of the two other categories. Analysis of the interview guides further disclosed that those individuals who did not view the nurse as having a "role" felt that she should be available to perform an "activity-centered" role. A few who had viewed her as "activity-centered" perceived her as taking a more important "over-all" position if she were available more of the time to the schools. Some of the responses to this question were:

I think she is doing an exceedingly good job in fulfilling the role--supervisor of health in school.

This system is ideal--person plays an important part.

If it were a registered nurse, more could be done.

I should think her role could be given more recognition by the administration, her functions more clearly outlined for new teachers.

The problem which we now have in this school is that the nurse sometimes does not recognize those areas which belong to the social worker and those areas which belong to her.

In summary, the responses to the questions 2 and 3 fell into three main categories describing the role of the nurse in the school as: 1) activity centered; 2) over-all; and 3) of little or no importance. Grossman defined professional role as "The sum total of the patterns associated with and generally accepted as appropriate for individuals occupying a particular professional status." The findings of this study seem to indicate that teachers have not developed a concept of the professional role of the nurse. Grossman found also, however, that in questioning nurses about their over-all aims in the school's health program they gave vague "text-book" oriented answers such as "health of the child and the community." There are indications that the concept which the teacher has of the role of the nurse in the school is directly concerned with the time the nurse is in the school to render her services.

The fourth question of Part II asked:

4. What problem areas are present, if any, in your school regarding any aspects of the school nursing service?

Verbatim responses included:

In this school - too clinical an attitude in front of students.

Often a visit by a nurse is interpreted as criticism by parents. A tactful approach can establish rapport. If this is not done, the school can have serious problems in working with the child as a result.

For all practical purposes we have no nurse; hence, that is the greatest problem for our school this size. There is a miserably inadequate health room.

Should have a professionally trained nurse in this setting.

After examining responses to this question, a frequency distribution list was established. There seemed to be no different patterns according to the different variables tested in other questions. The time aspect of the school nursing service was mentioned most often by the 115 respondents. This involved either providing more nursing time or more nurses to the schools. The main response for each teacher was included in Table 10.

Table 10. Frequency Distribution of Problems Perceived by 115 Public School Teachers Concerning School Nursing Services They Receive

Problems Encountered by the Teachers	Number of Responses
(1)	(2)
Lack enough nursing time or nurses . . . . .	38
Lack of communications between the nurse and the teacher on health matters . . . . .	11
Lack of communications between the nurse and the students . . . . .	6
Lack of communications between the nurse and the parents . . . . .	5
Need for registered nurse in the setting . . . . .	5
Poor public relations with teachers . . . . .	4
Poor public relations with parents . . . . .	4
Lack knowledge of the role of the nurse in the school setting . . . . .	4
Poor nursing facilities . . . . .	3
Lack knowledge of when nurse is in the building . . . . .	3
Nurse should be able to do more teaching . . . . .	3
	86
None (meaning no problems) . . . . .	24
No response . . . . .	5
Total . . . . .	115

Nurses in the study conducted by Poe (24) indicated that if they had more time in the schools they could perform activities with greater frequency. Simpson (35) found that the main suggestion for improving health services on the part of the teachers she interviewed was to add "more nursing services." Principals in Chilman's (8) study suggested that the addition of nursing assistants might improve nursing services.

Apparently nurses and teachers, the consumers of those services, perceive the same problem as hampering the school's health program and the frequency with which nurses can perform in the health program.

Many of the teachers thought that communications were poor only as they affected knowing something about a child who had been referred to the nurse for health reasons. Some mentioned that the nurse was not known by the children. A few teachers seemed to be aware of the fact that nurses often had to share an office with other school personnel, which made it hard for the nurse to function properly. In most instances the teachers were also quite aware of the fact that many of these matters were administrative in nature and that money was not available for providing more nurses to the district.

The fifth question of Part II was posed thus:

5. What kinds of courses do you think the professional nurse should take in order to better her service in the school setting?

Invariably the teachers would respond that they had no idea what the nurse took in her "training." If a member of the family or friend had been through a professional nursing program, they had more insight into this question. One can speculate that since the largest collegiate school of nursing in this state does not exist on a main campus, the curriculum is not as well known by members of other professional disciplines as it might otherwise be. All of the courses



which were mentioned have been listed in Table 11.

Table 11. Courses Suggested by 115 Public School Teachers as Necessary for the Nurse to Better her Service in the School Setting

Courses Suggested	Number of Responses
(1)	(2)
Child psychology . . . . .	26
Psychology . . . . .	25
Adolescent psychology . . . . .	14
Child growth and development . . . . .	12
Public health experience . . . . .	11
General education courses . . . . .	11
Counseling and guidance . . . . .	9
Public relations . . . . .	9
Sociology . . . . .	5
Communicable diseases . . . . .	4
First aid . . . . .	4
Health education . . . . .	4
School nursing experience . . . . .	4
Mental hygiene . . . . .	4
Educational psychology . . . . .	4
Nutrition . . . . .	3
Curriculum materials . . . . .	2
School and society . . . . .	2
Maladjusted child . . . . .	1
Educational methods . . . . .	1
Work with parents . . . . .	1
Speech . . . . .	1
Learning theories . . . . .	1
Abnormal psychology . . . . .	1
Teachers' role in the school . . . . .	1
School health . . . . .	1
Mental retardation . . . . .	1
Typing and filing . . . . .	1
Rehabilitation . . . . .	1
Interviewing . . . . .	1

The final question in Part II asked:

6. What additional comments do you wish or can you make on the subject of school nursing or school nurse service?

This question was included in order that areas which were not covered by the interview guide could be mentioned if the interviewee desired. Some of the comments have been listed here verbatim:

I'd suggest non-professional people to record data on health cards so professional people can be free to do more important work.

School nursing should be a service given by each school, but it is very poor in this state.

Our nurses do an excellent job despite limited time.

A pleasant, cooperative personality is desirable . . . ability to work with children.

I do not feel that the nurse should go into homes; I consider this an infringement on people. Problems can be solved through parent-teacher conferences in school.

It seems a necessity forced upon schools by incompetent parents.

There is a variety of philosophies in schools as to the health aspects which will be covered by the schools as opposed to parents. In this setting parents seem to handle most of their own problems.

Teachers at this level need more education as to the role of the school nurse - now she may be of help to us and our students and we of help to her.

Lack of funds prevent more nursing time and facilities.

### Part III

#### Analysis of Twenty Selected School Nurse Activities

In Part III of the study the participants were asked to rate twenty school nursing activities according to how important it was for the nurse to perform the activity. Items 19 and 16 were revised from the original list used by Day. (12) Grossman had originally used 29 activities and had asked nurses to perceive their importance in the school nurse's performance on a 5-point system. Day (12) revised some of Grossman's activities to use in her study. See Appendix B for the list.

#### Comparison According to Administrative Structure of School Nurse Services

##### Board of Education or Department of Health

Groups B and D rated the same activities 1, 7, 12 and 13 in the first four places. (See Tables 12 and 13). Activity 4, "home visits as follow-up," was rated low by the board of education group when compared to the teachers receiving services from the departments of health. This slight difference may be attributed in part to the expressed philosophy which teachers noted who receive services from the boards of education. In all cases these districts are in suburban areas and the teachers commented that parents han-

dled most of their own health problems and there was little need for "follow-up" activities. Shetland (33), in contrast, found that the teachers she had interviewed had little respect for the right of parents to care for their children's health problems.

Nurses in Day's study who were categorized according to employing agency, boards of education or departments of health, rated essentially the same activities 1, 7, 12 and 16 as important for the nurse to perform. Activity 13, however, "first aid administration" was ranked low by all nurses and high by all teachers.

Table 12. A Tabulation and Mean Scores of 20 Selected School Nursing Activities Ranked as to Importance by 56 Public School Classroom Teachers Receiving Nursing Services under the Board of Education

Activity*	Mean Score	Total of Sample Selecting Each Rank**				
		4	3	2	1	0
(1)	(2)	(3)	(4)	(5)	(6)	(7)
13. First aid administration	3.59	40	11	3	2	0
7. Correction of defects	3.54	39	10	5	2	0
1. Conferences with teachers	3.43	35	13	3	2	0
12. Visual rescreening	3.39	36	12	3	4	1
10. Data on health records	3.38	33	11	12	0	0
16. Health counselor to pupils upon referral	3.25	29	15	9	3	0
19. Health counselor to pupils	3.21	25	21	7	3	0
11. First aid equipment	3.21	31	11	10	3	1
2. Resource person to teachers	3.07	24	16	13	2	1
17. Guidance for teachers	3.00	22	20	8	4	2
20. Modified program for pupils	2.95	20	20	12	1	3
5. Classroom health instruction	2.86	18	19	13	5	1
8. Health and social needs	2.84	15	22	14	5	0
3. Studies in health educational programs	2.82	17	18	16	4	1
4. Home visits as follow up	2.61	13	22	11	6	4
15. Health materials	2.21	5	19	20	7	5
14. First aid classes	1.95	8	13	16	6	13
18. Transportation for ill or injured children	1.89	8	11	17	7	13
9. School lunch menus	1.64	3	10	19	12	12
6. Curriculum committees	1.57	6	3	18	19	10

\* Complete statement is found in Appendix C.

\*\*Rankings based on following scale: 4--extreme importance; 3--considerable importance; 2--medium importance; 1--some importance; 0--no importance

Table 13. A Tabulation and Mean Scores of 20 Selected School Nursing Activities Ranked as to Importance by 59 Public School Classroom Teachers Receiving Nursing Service under the Department of Health

Activity*	Mean Score	Total of Sample Selecting Each Rank**				
		4	3	2	1	0
(1)	(2)	(3)	(4)	(5)	(6)	(7)
7. Correction of defects	3.75	47	9	3	0	0
12. Visual rescreening	3.53	38	14	7	0	0
13. First aid administration	3.49	42	12	4	0	1
1. Conferences with teachers	3.46	37	15	4	3	0
16. Health counselor to pupils upon referral	3.46	34	18	7	0	0
20. Modified program for pupils	3.25	27	21	10	1	0
17. Guidance for teachers	3.22	31	14	11	2	1
10. Data on health records	3.17	28	18	10	1	2
4. Home visits as follow up	3.17	27	20	8	3	1
19. Health counselor to pupils	3.03	21	20	17	1	0
2. Resource person to teachers	2.95	22	17	16	3	1
11. First aid equipment	2.93	24	17	11	4	3
3. Studies in health educational programs	2.73	14	19	23	2	1
5. Classroom health instruction	2.63	10	23	20	6	0
8. Health and social needs	2.54	8	24	17	5	5
15. Health materials	2.49	11	20	19	5	5
14. First aid classes	2.07	6	15	21	11	6
6. Curriculum committees	1.71	0	15	18	20	6
18. Transportation for ill or injured children	1.56	3	11	17	13	15
9. School lunch menus	1.39	3	5	20	15	16

\* Complete statement is found in Appendix C.

\*\*Rankings based on following scale: 4--extreme importance; 3--considerable importance; 2--medium importance; 1--some importance; 0--no importance

Comparison According to Level of InstructionElementary or Secondary

Essentially Groups E and S listed activities under health appraisal and follow up 7, 12, 1, and 10 as important for the nurse to perform. Most significant was the higher rating which secondary school teachers gave to Activity 19 (4th) and 16 (3rd) when compared to elementary school teachers who rated Activity 19 (13th) and Activity 16 (6th). Activity 16 states that the nurse is a "health counselor to pupils upon referral" and 19 states that the nurse is a "health counselor to pupils." Grossman found that nurses in secondary schools seemed to be more aware of the need to do individual counseling. Teachers in Group S questioned in this study felt that the nurse probably did more counseling and guidance than they were aware of and responded that this was an important activity. Elementary school teachers thought that they should refer the student to the nurse instead of having the nurse come to the room to seek out individuals to counsel.

Table 14. A Tabulation and Mean Scores of 20 Selected School Nursing Activities Ranked as to Importance by 60 Public School Classroom Teachers in the Elementary School Level

Activity*	Mean Score	Total of Sample Selecting Each Rank**				
		4	3	2	1	0
(1)	(2)	(3)	(4)	(5)	(6)	(7)
7. Correction of defects	3.72	50	5	3	2	0
12. Visual rescreening	3.61	44	11	3	2	0
1. Conferences with teachers	3.55	43	10	4	3	0
13. First aid administration	3.43	38	13	6	2	1
10. Data on health records	3.28	33	13	13	0	1
16. Health counselor to pupils upon referral	3.20	28	19	10	3	0
17. Guidance for teachers	3.15	27	20	9	3	1
4. Home visits as follow up	3.13	29	17	9	3	2
2. Resource person to teachers	3.07	24	20	13	2	1
11. First aid equipment	2.98	26	17	9	6	2
20. Modified program for pupils	2.97	23	18	15	2	2
3. Studies in health educational programs	2.83	13	27	18	1	1
19. Health counselor to pupils	2.80	16	20	20	4	0
5. Classroom health instruction	2.75	12	28	14	5	1
8. Health and social needs	2.58	11	23	18	6	2
15. Health materials	2.43	4	29	20	3	4
14. First aid classes	2.25	9	19	17	8	7
6. Curriculum committees	1.72	2	10	24	17	7
18. Transportation for ill or injured children	1.58	5	10	16	13	16
9. School lunch menus	1.13	0	7	17	13	23

\* Complete statement is found in Appendix C.

\*\*Rankings based on following scale: 4--extreme importance; 3--considerable importance; 2--medium importance; 1--some importance; 0--no importance



Table 15. A Tabulation and Mean Scores of 20 Selected School Nursing Activities Ranked as to Importance by 55 Public School Classroom Teachers in the Secondary School Level

Activity*	Mean Score	Total of Sample Selecting Each Rank**				
		4	3	2	1	0
(1)	(2)	(3)	(4)	(5)	(6)	(7)
13. First aid administration	3.65	44	6	3	1	1
7. Correction of defects	3.56	36	14	5	0	0
16. Health counselor to pupils upon referral	3.53	35	14	6	0	0
19. Health counselor to pupils	3.47	30	21	4	0	0
1. Conferences with teachers	3.33	29	18	5	3	0
12. Visual rescreening	3.29	30	15	7	2	1
10. Data on health records	3.25	28	16	9	1	1
20. Modified program for pupils	3.25	24	23	7	0	1
11. First aid equipment	3.16	29	11	13	1	1
17. Guidance for teachers	3.09	26	14	10	4	1
2. Resource person to teachers	2.95	22	13	16	3	1
8. Health and social needs	2.80	13	24	13	4	1
5. Classroom health instruction	2.73	16	14	19	6	0
3. Studies in health educational programs	2.71	18	10	21	5	1
4. Home visits as follow-up	2.64	11	25	10	6	3
15. Health materials	2.27	12	10	19	9	5
9. School lunch menus	1.93	6	8	22	14	5
18. Transportation for ill or injured children	1.87	6	12	18	7	12
14. First aid classes	1.75	5	9	20	9	12
6. Curriculum committees	1.56	2	11	13	20	9

\* Complete statement is found in Appendix C.

\*\*Rankings based on following scale: 4--extreme importance; 3--considerable importance; 2--medium importance; 1--some importance; 0--no importance

Comparison According to Professional  
Experience of the Teacher

There seemed to be little differences in ranking of activities according to experience of the teachers, (Tables 16, 17, 18). Group 1 (teachers with 1 through 5 years' experience) and Group 3 (21 years' experience and over) seemed more alike in responses.

In summary, the ratings teachers in this study gave to the school nursing activities agreed closely with the ratings school nurses themselves gave the activities. (12) These activities centered around health appraisal and follow-up for correction of defects. The main difference in teacher and nurse perception appears to be Activity 13, "administers first aid," which nurses do not view as important for the nurse to perform. In some instances, teachers rated Activity 13 as the most important of the twenty for the nurse to perform.

Table 16. A Tabulation and Mean Scores of 20 Selected School Nursing Activities Ranked as to Importance by 35 Public School Classroom Teachers with one through five years' teaching experience

Activity*	Mean Score	Total of Sample Selecting Each Rank**				
		4	3	2	1	0
(1)	(2)	(3)	(4)	(5)	(6)	(7)
13. First aid administration	3.45	23	7	3	2	0
12. Visual rescreening	3.37	19	12	2	2	0
7. Correction of defects	3.34	23	8	3	1	0
16. Health counselor to pupils upon referral	3.31	17	13	4	1	0
10. Data on health records	3.25	17	12	5	0	1
19. Health counselor to pupils	3.22	17	11	5	2	0
1. Conferences with teachers	3.17	15	14	3	3	0
11. First aid equipment	3.11	14	14	4	3	0
2. Resource person to teachers	2.97	13	8	14	0	0
17. Guidance for teachers	2.97	14	10	8	2	1
20. Modified program for pupils	2.97	11	15	7	1	1
5. Classroom health instruction	2.82	10	13	9	2	0
8. Health and social needs	2.60	7	14	9	3	2
4. Home visits as follow-up	2.48	5	16	7	5	2
3. Studies in health educational programs	2.37	4	11	15	4	1
15. Health materials	2.22	6	9	10	7	3
14. First aid classes	2.11	4	10	12	4	5
9. School lunch menus	1.71	3	3	16	7	6
6. Curriculum committees	1.68	2	5	12	12	4
18. Transportation for ill or injured children	1.60	3	7	8	7	10

\* Complete statement is found in Appendix C.

\*\*Rankings based on following scale: 4--extreme importance; 3--considerable importance; 2--medium importance; 1--some importance; 0--no importance

Table 17. A Tabulation and Mean Scores of 20 Selected School Nursing Activities Ranked as to Importance by 64 Public School Classroom Teachers with 6 through 20 years' teaching experience

Activity*	Mean Score	Total of Sample Selecting Each Rank**				
		4	3	2	1	0
(1)	(2)	(3)	(4)	(5)	(6)	(7)
7. Correction of defects	3.71	50	10	4	1	0
1. Conferences with teachers	3.62	48	10	4	2	0
12. Visual rescreening	3.56	45	11	7	1	0
13. First aid administration	3.54	47	9	5	2	1
16. Health counselor to pupils upon referral	3.45	39	16	8	1	0
17. Guidance to teachers	3.28	33	20	8	2	1
19. Counselor to pupils	3.28	26	22	15	1	0
20. Modified program for pupils	3.23	29	24	9	1	1
10. Data on health records	3.21	34	13	15	1	1
2. Resource person to teachers	3.06	27	20	12	4	1
11. First aid equipment	3.03	31	14	12	4	3
3. Studies in health educational programs	3.00	25	18	18	2	1
4. Home visits as follow-up	2.96	26	20	11	4	3
8. Health and social needs	2.68	12	27	19	5	1
5. Classroom health instruction	2.67	15	21	20	8	0
15. Health materials	2.45	9	23	24	4	4
14. First aid classes	1.90	8	10	24	12	10
18. Transportation for ill or injured children	1.73	5	14	19	11	15
6. Curriculum committees	1.60	1	13	20	20	10
9. School lunch menus	1.51	2	11	20	16	15

\* Complete statement is found in Appendix C.

\*\*Rankings based on following scale: 4--extreme importance; 3--considerable importance; 2--medium importance; 1--some importance; 0--no importance

Table 18. A Tabulation and Mean Scores of 20 Selected School Nursing Activities Ranked as to Importance by 16 Public School Classroom Teachers with 21 years' teaching experience and over

Activity*	Mean Score	Total of Sample Selecting Each Rank**				
		4	3	2	1	0
(1)	(2)	(3)	(4)	(5)	(6)	(7)
13. First aid administration	3.75	13	2	1	0	0
7. Correction of defects	3.68	14	0	1	1	0
10. Data on health records	3.56	11	3	2	0	0
12. Visual rescreening	3.56	12	2	1	1	0
1. Conferences with teachers	3.50	11	3	1	1	0
4. Home visits as follow-up	3.31	9	4	2	1	0
11. First aid equipment	3.18	9	2	4	1	0
20. Modified program for pupils	3.12	8	4	3	0	1
16. Health counselor to pupils upon referral	3.06	7	4	4	1	0
19. Health counselor to pupils	2.93	4	8	3	1	0
8. Health and social needs	2.93	6	5	3	2	0
2. Resource person to teachers	2.87	7	3	4	1	1
3. Studies in health educational programs	2.81	2	9	5	0	0
5. Classroom health instruction	2.81	4	6	5	1	0
17. Guidance for teachers	2.81	7	3	3	2	1
15. Health materials	2.31	1	8	4	1	0
18. Transportation for ill or injured children	2.00	3	2	6	2	3
14. First aid classes	1.93	2	6	1	3	3
6. Curriculum committees	1.68	1	3	4	6	2
9. School lunch menus	1.06	1	1	3	4	7

\* Complete statement is found in Appendix C.

\*\*Rankings based on following scale: 4--extreme importance; 3--considerable importance; 2--medium importance; 1--some importance; 0--no importance

### Summary

The responses of 115 public school classroom teachers to the interview guide and activity rating check-list used in this study were analyzed and presented in this chapter.

The functions of the nurse in the school are perceived by teachers to be centered around health appraisal and follow-up and also health protection and safety. Less frequently, she is viewed by the teachers as doing health counseling or health education activities. Infrequently, she is viewed as assisting in the administration of the school's health program and as a faculty member.

The role of the school nurse as perceived by public school teachers seems to be determined largely by the amount of time the nurse is in the schools. Her role seems to be centered around "activities" to the majority of the teachers in this study. Some also viewed her as an "over-all" health supervisor or consultant. A few see her as having no role.

Problems which teachers encountered with the school nurse or her services were closely related to the already-presented aspect, "the inadequate time the nurse is in the schools." Courses which the nurse should take to work in the schools better include mainly psychology courses, but teachers do not perceive the nurse as functioning in psychology-oriented areas in the school. Teachers did not verbalize that the nurse functioned in this area in any capacity.

It appears that teachers rank the same activities as nurses in Oregon do, of twenty selected school nurse activities, as important for the nurse to perform in the schools. Activity 13, "administers first aid," which nurses ranked low, was ranked high by teachers.

CHAPTER IV  
SUMMARY, FINDINGS, CONCLUSIONS AND RECOMMENDATIONS FOR  
FURTHER STUDY

Summary of the Findings

One hundred fifteen elementary and secondary public school classroom teachers from six school districts in Clackamas, Washington and Multnomah counties were interviewed in an effort to identify their perception of: 1) the role and functions of the school nurse; 2) problems encountered with school nursing services; 3) courses considered as important for the school nurse to study in order to better her services to the schools; and 4) importance for the school nurse to perform twenty selected school nurse activities. Responses from the teachers were analyzed in order to determine to what extent, if at all, differences in perception were related to specific aspects of the teachers' professional experiences, level of grades taught and type of administration of school nursing services; namely, board of education or department of health.

As a whole, public school classroom teachers perceive the nurse as mainly functioning in two main areas: 1) functions relating to health appraisal and 2) functions relating to health protection and safety of seven school nursing functioning areas. Nurses themselves see functions relating to health appraisal as important to perform.



Although teachers considered the processes of screening for physical defects as important, they verbalized some dissatisfaction with the procedures used in the screening, e.g., Snellen Chart. Other screening procedures and their effectiveness are questioned by the teachers who feel that the nurse, as an authority in health, should relate this information to the administrator.

The nurse's role as a counselor seems to be recognized with some importance; however, her role in the administration of the school health program or as a faculty member is less well perceived. In the area of health education, her services are useful as a resource person and less as a teacher.

The nurse's role in the school setting seems to be viewed as either "activity centered," "over-all" or as one of "little importance." The perception of the role is greatly affected by the actual time the nurse is in the school to render services.

Problems encountered with the school nurse or school nursing services are related closely to the time the nurse is in the school or the number of nurses within a district.

Courses which the teachers deemed necessary for the nurse to take in order to serve better in the schools are centered around psychology. The nurse's role in mental health or counseling and guidance was infrequently verbalized by the teachers.

Perceptions as to the importance for the nurse to perform twenty selected school nursing activities seem to correlate closely to those of nurses whom Day questioned in Oregon.

### CONCLUSIONS

On the basis of the findings of this study, no widespread generalizations can be made; the findings do indicate that:

1. Teachers perceive the nurse as performing most frequently in the areas of health appraisal and follow-up and health protection and safety.
2. Teachers receiving services of the nurse employed by boards of education perceive the nurse as performing more nursing activities in the schools than nurses employed by departments of health.
3. Teachers in the elementary schools perceive the nurse as performing more activities than do teachers in the secondary schools.
4. Length of experience of the teachers does not seem to influence their perception of school nurse's role or functions.
5. The role of the nurse in the school is greatly determined by the amount of time the nurse is in the school to render school nursing services.

6. Problems encountered with school nurses or school nursing services are directly related to the time the nurse is in the schools.

7. Teachers perceive psychology courses as important for the nurse to take to serve better in the school. In contrast, the teachers infrequently verbalized that nurses should perform in the areas of mental health or counseling and guidance.

8. The ratings teachers gave to twenty selected school nursing activities were in agreement with the ratings school nurses gave to those same activities, as reported in Day's study.

#### RECOMMENDATIONS FOR FURTHER STUDY

After reviewing the present study's findings and general conclusion, the following recommendations for further study seem in order:

1. A study be conducted within one school district of the role and functions of the school nurse as perceived by administrators, special personnel, classroom teachers, students, para-medical personnel, and parents.

2. A job-time study be made for the purpose of determining exactly what constitutes the functions of the school nurse and what per cent of her time is devoted to each function. The findings might well be compared with the list of activities used as the basis for this and other studies.

✓ 3. An instrument be developed which would evaluate the performance of the school nurse.

4. A survey be conducted of the academic preparation of school nurses in the state of Oregon, and the feasibility for adopting certification requirements be studied. This is another study and may be pertinent in view of action in other states.

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## APPENDICES

APPENDIX A

CORRESPONDENCE

Letter to Superintendents of School Districts Requesting  
Permission to Conduct Study

Dear

In partial fulfillment of requirements for a Master of Science degree at the University of Oregon School of Nursing, I am undertaking a study, "Role and functions of the school nurse as perceived by public school teachers." The study is to be conducted by personally interviewing the teachers selected for the final sample. The interview requires approximately 20 minutes per person and will be administered after class time.

From the high school and elementary schools a total of \_\_\_\_\_ teachers would be interviewed. A self-addressed post card is enclosed for your convenience in indicating your willingness to assist with the study.

Upon completion of the study, copies of the report will be placed in the library at the University of Oregon Medical School.

Yours sincerely,

Orcilia Forbes (Mrs.)

Mrs. Orcilia Forbes is a regularly enrolled graduate student at the University of Oregon School of Nursing. Any assistance you can offer Mrs. Forbes will be greatly appreciated.

LUCILE GREGERSON, Assoc. Prof.  
Thesis Adviser

## APPENDIX A

(continued)

Postal Card Verifying Permission to Conduct the Study

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We will be able to participate in the study

---

We will not be able to participate in the  
study

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Signed

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## APPENDIX A

(continued)

## Letter to Superintendents Reporting Termination of the Study

Dear Sir:

I wish to express my gratitude to you for allowing me to conduct part of my study, "Role and functions of the school nurse as perceived by public school teachers," in the \_\_\_\_\_ schools.

May I say that the principals and each teacher whom I interviewed were most considerate and helpful.

The thesis will be submitted to the University of Oregon School of Nursing in its final form during August, 1965. A report of the study will be mailed to your office in the fall. Again, thank you for your courtesy and assistance.

Sincerely,

Orcilia Forbes (Mrs.)

## APPENDIX B

INTERVIEW GUIDE AND ACTIVITY RATING CHECK-LIST  
USED FOR THIS STUDYPart I

## Identification of Variables:

## General Information:

1. School\_\_\_\_\_
2. District\_\_\_\_\_
3. County\_\_\_\_\_
4. School population\_\_\_\_\_
5. Time nurse is in school per week\_\_\_\_\_
6. Administrative structure of school nurse services:  
Board of Ed.\_\_\_\_\_ Dept. of Health\_\_\_\_\_
7. Grade or grades taught\_\_\_\_\_
8. Number of years' teaching experience\_\_\_\_\_
9. Teaching experience in this district\_\_\_\_\_

Part II

## Open-end Questions:

1. What are some of the functions that the nurse performs in your school?
2. What do you think the role of the school nurse is in your school?

## APPENDIX B

(continued)

3. What do you think the role of the school nurse should be?
4. What problems are present, if any, in your school regarding any aspects of the school nursing service?
5. What kind of courses do you think the professional nurse should take in order to better her service in the school setting?
6. What additional comments do you wish or can you make on the subject of school nursing or school nurse services?

Part III

Activity Rating Sheet

## APPENDIX B

(continued)

Directions: Below are listed twenty (20) activities which school nurses perform. On the right-hand side of the column would you please rank these activities according to what you, as a teacher, perceive as their degree of importance. How important is it for the school nurse to perform these activities?

Spaces have been provided for you to check each activity using the code listed below.

- 4 - extreme--highest or utmost degree of importance
- 3 - considerable--somewhat large in amount of importance
- 2 - moderate--medium or fair amount of importance
- 1 - some--a little importance
- 0 - not important--no importance

<u>ACTIVITY</u>	<u>4</u>	<u>3</u>	<u>2</u>	<u>1</u>	<u>0</u>
1. Participates in conferences with teachers concerning health needs and problems of pupils.....	___	___	___	___	___
2. Serves as a resource person in matters of health education.....	___	___	___	___	___
3. Participates in studies of the health educational programs suited to the individual needs of pupils.....	___	___	___	___	___
4. Visits in homes of selected pupils absent because of illness	___	___	___	___	___
5. Participates in classroom health instruction and demonstrations upon request.....	___	___	___	___	___
6. Serves on curriculum committees	___	___	___	___	___
7. Follows up pupils referred for correction of defects.....	___	___	___	___	___

## APPENDIX B

(continued)

<u>ACTIVITY</u>	<u>4</u>	<u>3</u>	<u>2</u>	<u>1</u>	<u>0</u>
8. Interprets health and social needs and resources to school and community groups.....	_____	_____	_____	_____	_____
9. Makes suggestions on school lunch menu planning.....	_____	_____	_____	_____	_____
10. Compiles pertinent health data on the health record cards.....	_____	_____	_____	_____	_____
11. Cares for first-aid supplies and equipment.....	_____	_____	_____	_____	_____
12. Retests vision of pupils.....	_____	_____	_____	_____	_____
13. Administers first aid.....	_____	_____	_____	_____	_____
14. Teaches first aid classes.....	_____	_____	_____	_____	_____
15. Assists teachers in procuring health materials to be used for instruction.....	_____	_____	_____	_____	_____
16. Serves as health counselor to pupils upon referral.....	_____	_____	_____	_____	_____
17. Guides teachers in making class-room inspection of all pupils when exposure to communicable disease occurs.....	_____	_____	_____	_____	_____
18. Transports sick and injured pupils.....	_____	_____	_____	_____	_____
19. Serves as health counselor to school personnel.....	_____	_____	_____	_____	_____
20. Makes suggestions regarding a modified program for children with physical impairments.....	_____	_____	_____	_____	_____



## APPENDIX C

## SEVEN BROAD AREAS OF SCHOOL NURSING FUNCTIONS

These areas of functions used in the study by Day (12 ) have been adopted for use in categorizing answers to Question 1, Part II of the interview guide.

I. Functions Relating to the Administration of the School Health Program.

Activity

1. Plans with the school personnel and parent teacher organizations for educational programs designed to inform parents and community about community health projects.
2. Works with advisory groups on the school health program.
3. Plans with the school administrators and local health authority policies and procedures regarding the exclusion and re-admission of pupils and staff for health reasons.
4. Participates with administrators, physical, principal, sanitarian, firemen, building custodian in annual check of entire buildings and grounds.
5. Follow-up recommendations given for conditions needing improvement.
6. Inform administrator and teachers regarding prevalence of diseases and control measures to be followed.
7. Compiles lists of pupils with defects for each teacher's records and information.
8. Notes on health record any restrictions of activities as recommended by physician or health department.
9. Assists with planning a modified program for children with physical impairments.
10. Assists with planning for educational adjustment for handicapped pupils.

## APPENDIX C

(continued)

11. Works with school and dietary personnel on school lunch menu planning.
12. Recommends children to receive school lunch.

II. Functions Relating to the Nurse's Role as a Faculty Member  
Activity

1. Assists faculty in planning and evaluation of the curriculum for health instruction.
2. Assists school personnel in planning safety programs-- fire drills, disaster procedures, accident prevention.
3. Participates in faculty in-service program.
4. Serves on committees concerned with the school health program.
5. Participates in research of school nursing methods, procedures, and service accomplishments.
6. Participates in research necessary for the provision of health educational programs suited to the individual health needs of pupils.
7. Supervises a rest program for students excused from physical education.
8. Supervises ill, injured or isolated pupils at school.
9. Visits in home for follow-up of pupils' illnesses.
10. Contacts private physician (when available) or community agency for continuity of care for pupils with illnesses.
11. Investigates pupils absent from school due to unknown causes.
12. Inspects new entrants into school when physician is not immediately available and no health records are transferred.

## APPENDIX C

(continued)

13. Shares information concerning social, emotional or physical factors in the home which tend to affect pupils' adjustment to school.
14. Participates with faculty of schools of nursing in planning for students' field of experience in school nursing.
15. Serves as a student advisor for nursing students participating in field experience in public health nursing and school nursing.

## III. Functions Relating to the Community

Activity

1. Meets with parents of pupils starting school to inform them of health services.
2. Interprets health program to school and community groups.
3. Interprets health and social needs and resources to school and community groups.
4. Participates in health programs which originate in the schools and are implemented within the community.
5. Encourages the family to use services of private physician or community resources.
6. Notifies, when indicated, groups of parents concerning prevalence and symptoms of certain diseases to which their children may be possible contacts.
7. Works with private physicians in arranging for specialists examination for specific pupils to secure diagnosis, if necessary.
8. Works with private physician or Health Officer in making referrals for pupils to official and non-official agencies.
9. Investigates the action taken on referrals made to the agencies.
10. For pupils excluded from school, gives information and instruction to parents by note, phone, or in person.

## APPENDIX C

(continued)

11. Sends notices regarding any defects to parents.
12. Investigates regarding correction of defects to see if action has or had not been taken.
13. Follow-up epidemiologic investigation for tuberculin "reactors."
14. Serves as a liaison between the school personnel, parents and community to ensure cooperation for meeting needs of pupils.

## IV. Functions Relating to Health Appraisal

Activity

1. Obtains health histories through parent interviews.
2. Interprets health histories from Oregon Pupil Medical Record Form, to parents, to teachers.
3. Records information from Oregon Pupil Medical Record Form on Oregon School Health Record card.
4. Organizes school health examination programs.
5. Assists with health examinations.
6. Gives initial inspections.
7. Gives dental inspections as a part of general check of pupils referred for health reasons.
8. Assists with dental inspections made by dentist or oral hygienist.
9. Follow-up recommendations on above.
10. Periodically weighs, measures, and informs parents of abnormalities.
11. Gives initial visual screening to pupils using Snellen Vision Test.
12. Gives visual rescreening test to pupils referred by teacher.

## APPENDIX C

(continued)

13. Follow-up recommendations for correction of visual defects.
14. Schedules group audiometer tests.
15. Gives audiometer retests to referred pupils.
16. Schedules pupils with hearing loss for special screening clinics.
17. Follow-up recommendations on correction for hearing loss.
18. Gives tuberculin tests.
19. Makes referrals to tuberculosis clinic.
20. Follows up recommendations made by tuberculosis clinic, health agency, private physician.
21. Makes referrals to child guidance clinics.
22. Participates in referrals to the Guidance Committee in the school.
23. Follows up referrals on above.
24. Makes referrals to Crippled Children's Service.
25. Follows up referrals to Crippled Children's Service.
26. Makes referrals to Cardiac Clinic.
27. Follows up referrals to Cardiac Clinic.
28. Records all test results on school health record.

## V. Functions Relating to Counseling and Guidance

Activity

1. Recognizes and calls teachers' attention to deviations from normal growth and development.
2. Recognizes and calls parents' attention to deviations from normal growth and development.

## APPENDIX C

(continued)

3. Recognizes and calls teachers' attention to deviations from good mental health.
4. Recognizes and calls parents' attention to deviations from good mental health.
5. Records on permanent cumulative record any deviation from normal.
6. Interviews teachers to discuss pupil's health conditions and interprets physician's recommendations.
7. Interviews pupils in school regarding prescribed treatments.
8. Interviews parents at home regarding pupil's health conditions and physician's prescribed treatment.
9. Participates in conferences with teachers to discuss health problems of pupils--groups or individuals.
10. Participates in group conferences with pupils having the same health problems.
11. Participates in School Guidance Committee meetings.
12. Assists parents in accepting and planning for pupils with limitations.
13. Serves as health counselor to pupils.
14. Serves as health counselor to parents.
15. Serves as health counselor to school personnel.

## VI. Functions Relating to Health Education

Activity

1. Makes periodic check of hygienic practices as washing hands, showers, use of tissues, in the school.
2. Inspects and interviews pupils returned from illness absence.

## APPENDIX C

(continued)

3. Inspects and interviews pupils referred by teachers because of variations from normal.
4. Records causes of illness absences on health cards.
5. Teaches first aid informally when opportunity arises.
6. Teaches Red Cross first aid classes.
7. Teaches home nursing in classroom.
8. Assists teacher with class presentation of health units through talks, demonstrations, etc.
9. Assists teachers with observation for deviation from normal growth and development.
10. Guides teachers in making classroom inspections of all pupils when exposure to communicable disease occurs.
11. Demonstrates visual screening to teachers or lay groups.
12. Participates in sex education for girls.
13. Participates in sex education for boys.
14. Serves as a resource person to the various teachers in matters of health education.
15. Assists teachers in procuring health materials to be used in instruction.
16. Gives formal groups health instruction in the classroom.

## VII. Functions Relating to Health Protection and Safety

Activity

1. Makes inspection of drinking fountains, toilets, and wash rooms.
2. Observes and brings to parents' and administrators' attention hazards in homes, schools, and community.

## APPENDIX C

(continued)

3. Interprets to teachers and pupils laws and regulations regarding sanitation of school facilities.
4. Prepares instructions for care of emergencies.
5. Explains emergency instructions to teaching staff, pupils, and parents.
6. Demonstrates proper emergency procedures to use.
7. Administers first aid.
8. Locates and inspects first aid stations in school.
9. Records on school health record minor and major accidents.
10. Reports (written) accidents to administrator.
11. Reviews and summarizes accident reports.
12. Makes recommendations directed towards avoiding accidents.
13. Follows up accidents in school and in home.
14. Transports ill or injured pupils home or to hospital physician's office, or clinic if condition warrants this.
15. Contacts parents to have them come for ill or injured pupils.
16. Observes lunch room facilities and food handling techniques as they affect the health of the pupils.
17. Reviews health records to determine the immunization status of the pupils.
18. Prepares immunization lists.
19. Notifies parents of needed immunizations and solicits their consent.
20. Notifies pupils and parents of date and time of immunization clinics.



## APPENDIX C

(continued)

21. Organizes immunization clinics.
22. Participates in immunization clinics.
23. Records immunization on health records.
24. Inspects students and school personnel with suspected communicable disease.
24. Makes classroom inspection of all pupils when exposure to communicable disease occurs.

## APPENDIX D

## MASTER TABULATION

A Composite of Information on School Districts  
Included in the Study: Listed in order of  
Completion of Interviews

District	County	Enroll- ment	Teacher popula- tion	Administration of School Nurse Services	Inter- views Held
(1)	(2)	(3)	(4)	(5)	(6)
I	Clackamas	5,000	230	Board of Ed.	19
II	Clackamas	8,195	320	Board of Ed.	20
III	Clackamas	1,780	155	Dept. of Health	17
IV	Washington	15,800	720	Board of Ed.	17
V	Multnomah	78,970	3,135	Dept. of Health	42

## APPENDIX E

A Composite of Information on Schools  
Included in the Study

District & School	Enroll- ment	Teacher Popula- tion	Inter- views Held	School Level	Time nurse is in School Per Week
(1)	(2)	(3)	(4)	(5)	(6)
I-A	1,105	56	9	Sec.	1 day
B	840	32	5	Elem.	1½ days
C	395	14	5	Elem.	½ day
II-D	1,450	75	10	Sec.	5 days
E	610	24	5	Elem.	1½ days
F	395	16	5	Elem.	1½ days
III-G	1,110	56	9	Sec.	1 hour
H	405	18	5	Elem.	½ day
I	140	8	3	Elem.	1 hour
IV-J	2,270	110	8	Sec.	½ day
K	515	20	4	Elem.	2 hours
L	415	18	5	Elem.	½ day
V-M	2,650	115	6	Sec.	1½ days
N	2,300	105	6	Sec.	1 day
O	1,475	70	7	Sec.	1 day
P	920	48	4	Elem.	½ day
Q	765	28	4	Elem.	1 day
R	750	32	5	Elem.	1 day
S	670	24	5	Elem.	½ day
T	525	22	5	Elem.	½ day

## APPENDIX F

Frequency Distribution of 115 Teachers for  
Total Number Years' Teaching Experience and  
Number of Years' Teaching Experience Within  
a School District

Total Number of Years' Teaching Experience		Number of Years' Experi- ence Within a District	
Years	Number of Teachers	Years	Number of Teachers
(1)	(2)	(3)	(4)
1	6	1	15
2	7	2	18
3	9	3	10
4	9	4	2
5	4	5	12
6	6	6	6
7	8	7	12
8	6	8	12
9	5	9	5
10	2	10	2
11	5	11	4
12	7	12	4
13	2	13	2
14	2	14	1
15	8	15	1
16	3	16	0
17	3	17	0
18	3	18	0
19	0	19	0
20	4	20	0
21	0	21	0
22	2	22	1
23	3	23	1
24	0	24	2
25	1	25	0
26	2	26	0
27	0	27	0
28	0	28	0
29	1	29	0
30	1	30	2
31	0	31	0
32	0	32	0
33	1	33	0
34	0	34	0
35	1	35	2
36	1		
37	1		
38	0		
39	1		
40	1		

## APPENDIX G

Frequency Distribution of Total Teacher Responses  
in the Seven Broad Areas of School Nursing  
Functions Described in Appendix C

Area of Functions	Activity Number	Number of Responses
(1)	(2)	(3)
I. Administration	1	1
	3	1
	7	2
	8	1
	9	2
	12	2
II. Faculty Member	8	31
	9	5
	10	1
	11	6
	12	1
	13	12
	15	1
III. Community	1	1
	2	2
	3	1
	5	2
	6	1
	7	2
	8	8
	9	3
	12	4
	13	1
	14	3
IV. Health Appraisal	2	4
	3	8
	6	1
	9	3
	10	14
	11	16
	12	25
	13	18
	14	6

## APPENDIX G

(continued)

Area of Functions	Activity Number	Number of Responses
(1)	(2)	(3)
IV. Health Appraisal (cont.)	15	12
	16	2
	17	2
	18	8
	20	1
	21	4
	22	1
V. Counseling and Guidance	1	3
	2	1
	3	1
	4	1
	5	1
	8	26
	9	10
	10	2
	12	3
	13	11
	14	2
	15	2
VI. Health Education	2	4
	3	15
	8	3
	11	1
	12	1
	13	1
	14	3
	15	6
	16	4
VII. Health Protection and Safety	6	1
	7	50
	8	1
	9	1
	10	2
	13	1
	14	3
	15	4
	21	8
	22	7
	24	26

Typed by  
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