MAKING HEALTH SERVICES FUNCTIONAL FOR EDUCATION
IN ELEMENTARY SCHOOLS OF CITIES WITH
POPULATION OF FIFTEEN THOUSAND

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MAKING HEALTH SERVICES FUNCTIONAL FOR EDUCATION
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By

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CHAPTER I

INTRODUCTION

The Need of a Health Program

A major problem facing this nation is the improvement of the health of its people. During the First World War, the people of these United States were shocked by the realization that the youth of the land were lacking in the physical and emotional stamina which were necessary to endure the strain of training and active duty on the battle front. At the close of that war much discussion and some effort to improve the health status were begun, yet in a few years the good intentions were enveloped by complacency, and public opinion finally dragged the efforts to correct this national weakness into oblivion. At the conclusion of the Second World War, there was a national awakening to the need for immediate action when it was revealed through the Selective Service Act that the draft-age young men were a fair sample of our whole population so far as health was concerned. This meant that one out of every six citizens has chronic disease or physical impairment.¹

Health advancement depends upon informed public opinion, and this information can best be disseminated through

¹Health Committee, "How's Our Health?" Independent Woman, XXIV, No. 6, 159.
cooperative efforts of the home, school, and community. It is the school's responsibility to coordinate the work of these agencies for helping children achieve healthful living.

A Point of View

The writer of this study believes that (1) health education is not concerned with health knowledge acquired in an isolated situation, but that it is concerned with the development of the whole child -- the mental, social, emotional aspects, as well as the physical; (2) a child's health behavior is the result of all his experiences whenever and wherever they may take place, and hence health education is a twenty-four hour job involving the full cooperation of the home, school, and community; (3) the responsibility for the health education of a school does not belong to a few specialists, but every teacher should be classed as a health teacher; and (4) finally, all health services should be planned as experiences that will assist the child in the voluntary practice of wholesome habits which he understands. This article is particularly concerned with the best methods for making health services more fruitful in terms of tangible results for those served.
The Purpose of the Study

The writer's interest in this study was stimulated by observations and experiences had while principal of a small elementary school in a city of some 18,000 inhabitants. Two discoveries served as a basis for this interest; namely, that a few executives and health specialists could not successfully inaugurate a satisfactory health program, and that the classroom teacher held the key that would open the door to shaping attitudes with respect to good health behavior in the pupils in her room. The purpose of this article is to indicate the scope of the health services that an elementary school needs and to show how these services might be made most fruitful in terms of tangible results. The educational values of the health services will be stressed, as well as the cooperative nature of the administration of the program by pupils, teachers, specialists, administrators, and community. In order to ascertain the scope of any health program, it is necessary to start with the diagnosis of the needs of the pupils and a survey of the environmental needs. Since the classroom teacher holds the key position in the program, her health work and in-service training will be explained as fully as possible. And, too, since no educational activity can progress as it should without an evaluation of the experiences as they develop, a simple criteria of evaluation with a check-list
of the important features will complete the study.

Finally, there are selfish motives on the part of the writer which are to secure a wider knowledge of the health problem and its implication for education; to acquire a better understanding of the purpose and function of health services as used in a present-day elementary school; and to collect and organize the best available opinions on the subject in an accessible form for personal use and in a small way, as a service to others facing similar problems.

The Limitations of the Study

Since the author of this article is not actively engaged in teaching, the data and procedures proposed will naturally be limited in scope. Information secured from books, bulletins, and research articles, written by the best authorities available to the author, together with the knowledge acquired by some thirty-odd years of experience in teaching in the public schools of Texas, will constitute the source of the material used in developing the subject.

The scope of the discussion will be limited to the experiences in the health program which will give educational value to the health services and does not propose to cover the methods or techniques by which these services are rendered except as they show tangible results for education.
Some Evaluative Criteria for Health Services

In order to understand better the significance of terms used, to establish a clear concept of health services, and to set up standards by which the program could be evaluated, the following terms are explained:

"Health Education" is the sum of experiences which favorably influence habit, attitudes, and knowledge relating to individual, community and racial health.2

"School Health Education" is that part of health education that takes place in school or through efforts organized and conducted by school personnel.

"Hygiene" is the applied science of healthful living; it provides the basic scientific knowledge upon which desirable health practices are founded.

"Sanitation" is the application of scientific measures for improving or controlling the healthfulness of the environment.

"Health" in the human organism is that condition which permits optimal functioning of the individual enabling him to live most and to serve best in personal and social relationships.

"Health Service" comprises all those procedures designed to determine the health status of the child, to enlist his cooperation in health protection and maintenance, to inform parents of the defects that may be present, to prevent disease and to correct remediable defects.

"Health Instruction" is that organization of learning experiences directed toward the development of favorable health knowledges, attitudes, and practices.

2 Thomas D. Wood in Fourth Yearbook of the Department of Superintendence of the National Education Association, 1926, p. 226.
"Healthful school living" is a term that designates the provision of a wholesome school environment, the organization of a healthful school day, and the establishment of such teacher-pupil relationships as make a safe and sanitary school, favorable to the best development and living of pupils and teachers.

"Health examination" is that phase of health service which seeks through examination by the physicians, dentists, and other qualified specialists to determine the physical, mental, emotional health of an individual.\(^3\)

"Mental health" in its broadest sense has come to mean the measure of a person's ability to shape his environment, to adjust to life as he has to face it, and to do so with a reasonable amount of satisfaction, success, efficiency and happiness.\(^4\)

"Mental hygiene of the school child" includes a study of the habit life of the school period, an evaluation of moods and cravings, impulses and imaginations, play reactions and social relationships.\(^5\)

The Aims of Health Services

Health services are concerned primarily with protective and preventive activities that will result in conditions which contribute to normal growth and development of children, yet it should be emphasized that the important object is to make the health service of educational value to children and their parents. When the aims are viewed from this angle, the health service aims and the aims of

\(^3\)Joint Committee on Health Problems in Education of the National Education Association and the American Medical Association, *Health Education*, p. 16.

\(^4\)Joint Committee on Health Problems in Education of the National Education Association, *How Would You Help a Child Like This? -- Mental Hygiene in the Classroom*, p. 9.

\(^5\)Joint Committee on Health Problems, *Health Education*, p. 122.
health education are identical and may be briefly stated as follows:

1. To instruct children and youth so that they may conserve and improve their own health.
2. To establish in them habits and principles of living which throughout their school life and in later years will aid in providing that abundant vigor and vitality which are a foundation for the greatest possible happiness and service in personal, family, and community life.
3. To promote satisfactory habits and attitudes among parents and adults through parent and adult education and through the health education program for children, so that the school may become an effective agency for the advancement of the social aspects of health education in the family and in the community as well as in the school itself.
4. To improve the individual and community life of the future; to insure a better second generation; to build a healthier and fitter nation and race.  

Since we may judge any program only by what it accomplishes in the end, it is well to set up some objectives by which a finished product may be measured. We find such standards set forth from the health standpoint by the Educational Policies Commission as follows:

The Educated Person Understands the Basic Facts Concerning Health and Disease.
The Educated Person Protects His Own Health and That of His Dependents.
The Educated Person Works to Improve The Health of the Community.  

The Scope of Health Services

Authorities differ in detail if not in principle, as to what constitutes adequate health service for an elementary

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6Ibid., p. 15.

school. Some even complain that it is difficult to differentiate the health services from health instruction. This probably is more indicative of a well-integrated program than where well-cut lines can be drawn between the two phases of health education. In order to establish a clear concept of health service, it is well to explain the administrative purpose, the protective measures approved, and the activities involved.

Health services comprise the several administrative procedures designed to determine the health status of the child, to inform parents of the defects that may be present, to educate parents and children in ways of preventing common defects, to aid teachers in the recognition of the early signs of disease and defects and to assist in the correction of remediable defects.⁸

Health service includes the following protective measures adopted by schools and colleges to conserve and improve the pupils and students: (1) health examination; (2) the follow-up programs and correction of remediable health defects; (3) daily health inspection for prevention and control of acute and communicable diseases; (4) school sanitation; (5) first aid and safety provisions; (6) hygiene instruction and school management; (7) health of teachers, janitors or custodians and other school officials or employees coming in contact with school children.⁹

The health service program includes the following activities: health examination; follow-up work for the purpose of securing correction of remediable defects; clinic's daily inspection by teacher or nurse for the purpose of detecting symptoms of communicable diseases; periodic inspection and checking by the teacher or nurse, such as weighing and measuring, inspecting teeth, testing vision, etc.; health habits inspection;


hygiene and sanitation of school plant and equipment. (This includes all the steps taken to secure the healthful conditions in and about the school. The most important person in the success of this part of the program is the school janitor.) Other activities are: provision for safety and first aid; hygiene instruction. (This includes all provisions made by the school for preventing the instructional program from injuring the health of the children.) The health service program is not strictly educational since it embraces those things done for the child rather than those things done by the child. However, it would be a mistake to regard the health service program unrelated to health instruction. For example, the child who has learned that he is ten pounds underweight has an excellent reason for being interested in the study of nutrition.\(^{10}\)

Health service . . . the activities of medical examiner, nurse, dentist, oculist and nutrition worker. The sanitation of the school plant -- light, heat, ventilation, water supply, etc., are all included in this department.\(^{11}\)

Although the foregoing statements of health services are classified differently and variations occur in the lists, the general plans are the same. The purpose of this study, then, is to discover some practical means of making these services functional for education to each individual of a school community.

\(^{10}\)A. F. Myers and O. C. Bird, Health and Physical Education for Elementary Schools, p. 20.

\(^{11}\)F. W. Maroney, Physical Education for Public Schools, p. 4.
CHAPTER II

SOME SUGGESTIONS FOR MAKING HEALTH SERVICES

FUNCTIONAL FOR EDUCATION

The Coordination of Community and
School Health Services

The child is not only a member of his school group but
he is also a member of a larger social group, the community.
In the point of view expressed at the beginning of this
study, it was stated that health education is a twenty-four
hour job. Then what happens to a child during out-of-school
hours is just as important in the final outcome as what hap-
pens in school. The health of the child is influenced by
many factors outside of the realm of school control. Since
inheritance, economic resources of the family, environment,
babyhood care, as well as the community provision for pro-
tection, are factors of the total growth, the use of the
community resources is a necessity.

Every agency, professional group or individual
who has any contribution to make to the mental, so-
cial or emotional growth of boys and girls should be
asked to join in the formation of plans and policies
for a school program. 1

The effectiveness of the health service activities will

1The Interpretation of Basic Instructional Policy,
Bulletin No. 3017, Lansing, Michigan, Public Schools, 1943,
p. 11.
depend upon the quality of cooperation between the school and community agencies. The implication for the community is that the community must bear the responsibilities through outside help or direct support of an adequate and varied program of health services.

Moreover, school administrators, health personnel and teachers are important links in the functioning of these community health services with respect to the needs of the child of school age. They are the interpreters of disease prevention, remediable defects, healthful living to the child and his parents. They also have the duty to teach the child and indirectly the parents how to use the existing professional services in the community, both public and private.

Then the foregoing statements indicate that the need for this community relationship seems to be an accepted opinion. How to obtain it and keep it as an active force in the health advancements is equally as important. Some of the best methods are briefly stated as follows:

A. Asking parents to furnish information that will help the school understand the child better, e. g., health practices at home, recommendations of family physicians, interests of the child, etc.
B. Discussing the school health education program with parents and community agencies and asking their advice and help.
C. Learning about the purposes and functions of community agencies interested in health.
D. Including community and parent representation on school committees which discuss health problems.

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2Educational Policies Commission, op. cit., p. 176.
E. Providing parents with understandable reports about the health status of their children whenever health studies of the children are undertaken by the school. These studies may sometimes be conducted cooperatively with public health and community agencies.

F. Enlisting the assistance of community agencies in planning and establishing school policies regarding health services, e.g., health examinations, prevention of communicable diseases, first aid, other special services of a health nature.

G. Contributing to the development of programs sponsored by community groups and intended to enrich community living.

H. Recognizing cooperation and assistance as a give and take proposition.  

Although the preceding statements duplicate some of the ideas already expressed, yet the suggestions were quoted in their entirety to give added emphasis to the schedule.

Another way to increase this feeling of "oneness" between the school and the community is the use of the experienced and well-trained personnel who work for the various youth organizations, such as Campfire Girls, U.S.O., Boy Scouts of America, etc. Especially valuable will be their contributions in planning and directing after-school activities designed to care for the surplus leisure time of boys and girls of which more shall be said under a later discussion. This assistance will not only add to the school's efficiency but the teachers will receive valuable and otherwise unobtainable courses in activities promoting all phases of healthful living -- physical, mental, and emotional.

Having once established this friendly contact with the

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3Department of Public Instruction, Lansing, Michigan, Interpretation of the Basic Instructional Policy, p. 4.
community, how the schools will effectively keep in touch with the community resources and how the community health agencies will keep in touch with the school health education program will depend largely upon local conditions.

While there is no general rule that would apply to all communities, utilization of community resources is usually facilitated by some form of group organization. This may be an educational council whose purpose is augmenting and integrating the school program on a city or county basis. It may be a more or less formal community council whose major objective is general community stimulation. Whether the school administrator is the organizer of the group or participating as the representative of the schools, the result will be the same -- securing for the school program the advantages of group thinking and concerted action.4

Schools and communities have for years stood with their backs to each other, each blaming the other for the ills that befall their children, little comprehending the function of the other in the solution of their common problems or little suspecting that each bound to the other held the key to an informed citizenry in their hands. It is high time for the schools to make the most of a public opinion which approves better health services.

Health Examinations

Preparing boys and girls for such activities as medical examination, dental examination, immunizations and vaccinations is just as important as the experience itself and probably more so, if the preparation makes the examination

4Ibid., p. 11.
meaningful. There is nothing so interesting to an individual as self, and during a health examination is an excellent time to capitalize on this interest. It is important to encourage parents to participate in and contribute to these health experiences and conferences. It is wise to request parents to attend all physical and dental examinations especially in the case of young children. Some authorities doubt the wisdom of parents and teachers being present during the examination of older children. The writer believes that practice would depend entirely upon the personality of the child examined.

The importance of the preparation for these health examinations cannot be over-estimated. Understanding the "whys and wherefores" of an examination and knowing his own health status increases a child's interest in his growth, his awareness of his own needs, the importance of periodic health examination and immunization, and his willingness to cooperate in suggested remediable measures. The parent, too, will have a better understanding of the need for regular health and dental examinations and the value of immunization and vaccination. They will learn how to use the community resources for a follow-up program.

Several days before the appointed day for health examinations, the classroom teacher should invite the nurse, doctor, or dentist to pay a visit to the class. Every
person connected with the health program should understand why health services are practiced. The experience the teacher, children, and parents have in preparing for the activity will largely determine their attitude toward the experience. For example, in preparing for the physical examinations, the personality of the specialist is important. Does he dispel fear? Does he explain the instruments used? Does he demonstrate the experiences involved? Like questions concerning the dentist should be answered. Then the teacher can further clarify the experiences by answering such questions as: What is the purpose of the examination? What is normal growth? Do all people grow alike? Why are teeth important? These and many more questions will appear to stimulate interest. The questions asked and the value derived from the preliminary service will largely depend upon the maturity and previous experience of the group.

If such experiences happen the day before the day of the examination arrives, the pupils have been properly conditioned. For many children the only professional health services which they will ever experience are those given by the doctor, nurse, or dentist in the school. Such an examination should be termed "partial," for it is not practical to give a very thorough examination. It should be used as a guide in the use of the medical facilities of the community. Besides this partial examination which includes
eyes, ears, throat, teeth, chest thyroid, posture, feet, general appearance, and nutrition, the doctor holds a health conference with the child in the presence of his parents, teacher, and nurse. This probably is the most vital part of the specialist's work. Nothing should be withheld from the parent concerning the nature of the conditions found. He should point out the physical assets of the child as well as the defects. Each member of the conference should contribute to the final report by giving his observations as to the health habits, social habits, and diets; in fact, anything known about the child. If there is a mental hygiene problem, the child should be dismissed before this discussion is brought up. If parents are not present, a written report should be sent to the home of each child examined with a request for a conference if needed.

On the surface, this appears to be a time-consuming ordeal, and yet with little initiative and adequate cooperation, it could easily constitute the whole curriculum activities during the examination period. For example, the physician might furnish data which would be valuable to the physical education instructor in the grouping of children for exercises, or in planning activities to be used. Then, too, these services are not daily occurrences. The frequency is, however, a subject of much discussion. From information gathered from the majority of health authorities,
it seems agreed that every two to four years is sufficient, on entrance to school, on transfer to intermediate grades, on entrance to high school, and at graduation. However, allowances should be made for the variation in needs of children. Once a year seems to be common practice for dental examination. With few exceptions, immunizations take place normally during pre-school age; vaccination is checked at time of entrance to school and every seven years thereafter. Yet, there is always ample opportunity for securing educational value as these experiences occur through the school year.

The medical and dental care of school children is a cooperative enterprise which demands a strong follow-up program. It is a waste of time to give an examination unless remediation follows when recommended. It is to secure this cooperation of the home and the community that the school assumes the lead in educating the child and the parents to the necessity of such examinations. The school bears no responsibility for the final diagnosis or treatment; these rightfully belong to the family physician and dentist. The school's purpose is to reveal the need for professional care.

All the data gathered should be carefully recorded by the teacher on the cumulative record. Any comments or remarks made by the specialists could be done in red ink. Too much emphasis cannot be placed on the value of keeping
a complete health service record. It is a brief statement of all important data that are important to all members of the staff as well as the health specialist. Special care should be used to safeguard these records for professional use only.

The personal health record of the child should be a part of the school record. This health record should contain:

1. The pre-school examination.
2. The school health service examination (history, findings, advice).
3. Correspondence with family.
4. Correspondence with family medical advisers.
5. Correspondence with clinics and agencies.
6. School health service; notes: reports from teachers, special teachers, nutritionist, and psychologists; and the doctors' summary.
7. Nurse's reports.
8. Notes of counselors and record of use made of these data for guidance purposes.
9. A chronological record of examinations, tests, corrections, illnesses, and observations from all sources.5

While the health specialists perform obligations more definitely classed as health services, it is important to remember that their main purpose is to assist the classroom teacher who is responsible for the guidance of the pupils in her class. Too many specialists function independently of their co-workers, without consideration of the ways they could help teachers. Cooperation between the teacher and specialist is a necessity if real educational opportunities

5American Association of School Administrators, Health in Schools, p. 55.
are to be utilized.

In the operation of a well-ordered program for health it is not always easy to draw sharp distinctions between the activities which may definitely be classed as health services and those which are more closely allied to the major phases of the broader program of health, namely school hygiene, physical education, health instruction, special classes for physically handicapped and cooperation with the general health program of the community. The various staff members who are engaged to perform specialized services in the field of health service may also function with reference to other aspects of the health program.6

And yet it is this very lack of ability to draw sharp distinctions between these activities that constitutes the key to discovering the integratedness of the entire program for health.

If seeing the dentist twice a year and participating in a dental examination are to become valuable experiences for education, many other bits of useful information must be made functional. Some such facts are (1) What is proper care of teeth? (2) What kind of brush and dentifrice is recommended? (3) Why do teeth decay? (4) What is the relation of food to healthy teeth and gums? (5) How teeth may add to personal appearance! (6) Is tooth decay preventable? (7) Is health an individual responsibility? (9) Of what are teeth made?

Tooth building is a life-long process which begins before the child is born and continues until early adult life when the last tooth emerges from the jaw. During all this period and continuing as long as

life lasts, repair and protective processes are also in operation. Teeth are living parts of the body.\textsuperscript{7}

It is important to consider these examinations as valuable opportunities for constructive teaching.

In general, health services, such as medical and dental examinations, daily inspections and communicable disease control have not been viewed as teaching situations. One of the chief functions of such services is educational, yet schools persist in managing these services as if they were chores to be gotten out of the way with as little inconvenience as possible; some schools even discourage parents from attending medical and dental examinations.\textsuperscript{8}

It is equally important to use the findings of such examinations as keys to guidance programs and curriculum planning. "Physical examinations serve to depict conditions which an instruction program must combat."\textsuperscript{9}

In order to appreciate the relative educational value of these examinations, some of the significant results are briefly stated:

1. Encourages parents to assist the child in improving his own health.

2. Gains information valuable to a teacher in guidance program and curriculum planning.

3. Helps overcome most prejudices of pupils and parents toward health protection and improvement.

4. Educates the public in child hygiene and preventative

\textsuperscript{7}Texas State Department of Health, \textit{Nutrition and Dental Health}, p. 1.

\textsuperscript{8}Otto, \textit{op. cit.}, p. 429.

\textsuperscript{9}Martha Crumpton Hardy and Carolyn H. Hoffer, \textit{Healthy Growth}, p. 57.
measures.

5. Improves the pupil's attitude toward doctors, nurses, and dentists.


7. Discovers most of the urgent cases of physical defects.

8. Serves as a useful preliminary for specialists by revealing where to concentrate their efforts.

9. Increases the children's health and happiness while relieving the teacher of grave responsibilities.

Weighing and Measuring

Learning the process of weighing and measuring accurately is the first step in making it an educational function. The health nurse or other qualified persons can help the teacher and the children learn how to weigh and measure accurately. Even if the teacher already knows the procedures, it is wise to have a second person, preferably some mother who is interested, to assist in the initial weighing and measuring. Then the children should carry on the activity by themselves, keep their own records, and make their own reports except probably the primary grades.

The method of recording weight and height should fit in appropriately with school methods that are endeavoring to keep complete cumulative records. Participation by the
children is part of the educational value. Scales are a "must" in every health clinic equipment. Conditions under which these services are given should be standardized, that is, taken at the same time of day.

Since gaining is an individual matter, emphasis should be placed on the pupils' own growth and on the interpretation of the facts that influence individual growth. Since children differ in body build and rate of growth, due to hereditary and environmental influences, it is not practical to compare a particular child's growth with tables of average height and weight for a certain age. Facts about the way children grow should be the common knowledge of every teacher.

Using the findings constructively is important. Children should compare previous measures to their present weight and height to find gains made. Careful individual records of progress should be kept and parents should be notified of this progress. Any child who fails to gain over a period of four to six months should be referred to the family physician. Under no circumstances should a child's failure to increase in weight be stressed to a point where it might become an emotional disturbance. Furthermore, the educational value of this weighing experience can be increased if it is used as an approach to study of factors leading to health status, such as nutrition, sleep, exercise, freedom from remediable defects and diseases.
The School Lunch

A community school lunch program which originated as an emergency and surplus food distribution measure is reaching millions of children daily. Any school that has not taken advantage of the offer of the government to provide a well-balanced meal for its children once a day has fallen short of planning adequately for the growth of the whole child.

A school program which fails to take due account of nutritional factors in the health of children is neglecting not only an important factor in the health of children but a most important factor in the establishment of favorable conditions for learning.10

School lunch period should be long enough to permit food to be eaten leisurely and to permit the normal social hour which makes eating a pleasurable experience. The lunchroom should be attractive, spacious, and free from undue noise. It should be so planned and operated that it will serve as a laboratory for practice of health rules and social manners taught in a school room.11

It is surprising how slow education has been in recognizing the many ways in which constructive school lunch programs can contribute to the health, development, and education of children. The school’s interest in lunchrooms is how the eating habits of children affect their health and growth and how the cafeteria may be made an educational experience.

Possibilities for acquiring health habits in connection with school lunch periods are almost limitless. Some of the

10Myers and Bird, op. cit., p. 55.

11American Association of School Administrators, Health in Schools, p. 243.
desirable habits are as follows:

To wash hands and face and comb hair.
To eat slowly.
To use napkin.
To chew food with closed lips.
To use spoon, knife and fork and not to handle food with fingers.
To drink with empty mouth.
To talk only when mouth is empty.
Not to eat food dropped on ground or floor.
Other suggestions for the educational use of the cafeteria are as follows:

Relate health teaching about food selection to the study of value of foods served in lunchroom.
Allow children to plan and carry out a party in which a well-balanced plate is served.
Care and value of milk pasteurization.
Maintenance of proper equipment and refrigeration.
Health of food handlers.
Sterilization of utensils and dishes.
Selecting and decorating a lunchroom.
Practicing what is taught by no sale of soft drinks and candy and providing handwashing facilities in cafeteria.
Children should be placed in charge of their own groups, acting as host and hostess where they will assume the responsibility for practicing their own health rules and
good manners.

There is a generally accepted theory that the daily diet of growing children should contain the following types of food: (1) from a pint to a quart of milk, preferably a quart; (2) cereals; (3) in addition to a potato, at least two vegetables, one of which should be a leafy vegetable; (4) fruits; and (5) no tea or coffee.

If the cafeteria is separated from school control, the cooperation of the cafeteria manager should be asked in serving one balanced plate each day with a choice of salads or desserts; give a free bottle of milk to each child. This is the type of lunch the government is sponsoring in its educational program for school lunches. The writer can recommend this type of lunch as a sure means of teaching children to eat vegetables which they need, and which they have been allowed to believe they do not like. Frequently children will refuse milk on pretense that they do not like it, but with few exceptions they will accept it when they realize there is nothing to be substituted.

Arrange a rest period at the end of the lunch period. It will, however, be necessary to break down a precedent that a lunch period is an intermission before a noon recess. School schedules must be revised to provide for equal time for play in addition to the period following the lunch period for the children to enjoy relaxation and freedom. This is a good period for a school sing-song, especially
for the intermediate grades. The idea back of all this change is the need for relaxation following a lunch period in place of engaging in strenuous exercise.

School Environment

Since the school contributes favorably or unfavorably to the wholesome development of youth, it is essential to give consideration to the health factors involved in school environment. "The term 'environment' may be used in a broad sense to apply to all the forces which play upon the child because of the surroundings in which he lives."12

... environment has its psychological as well as its physical aspects, and the tensions or emotional stresses under which a child lives have direct but important bearing upon his physical state and functions.13

It is a basic assumption of this chapter that quiet harmonious surroundings, comfortable equipment, adequate light, proper ventilation, effective heating, and other factors calculated to provide good teaching environment become health assets of first importance.14

School environment can become instrumental in developing those attitudes toward life which are necessary to happy, healthful living. Youth is particularly responsive to attractive surroundings. For years the writer saw the effect

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12 Joint Committee on Health Problems in Education, Health Education, p. 49.
13 Ibid., p. 50.
14 American Association of School Administrators, Health in Schools, p. 232.
that a clean, attractive entrance had upon children who entered it daily. In haste "to arrive" sometimes muddy shoes were forgotten, but upon entering the clean hall, the owners were always possessed with a desire to return to the foot-scrapers. They grew to respect the atmosphere of cleanliness which prevailed throughout the school and to feel a pride in maintaining it. The school has an obligation to children, particularly those who live in unattractive places, to provide healthful and beautiful surroundings.

The care and maintenance of the school plant are important elements of the total school environment. An untidy, unclean, neglected school building provides a poor environment in which to teach habits of personal cleanliness and respect for public property.\(^{15}\)

In the experience of the writer, one instance stands out which illustrates the psychological effect of an uncared-for building. During the summer each year window panes were broken out by boys with air-guns. Each year it was some time after the beginning of the school term before they were replaced; during that time many more panes were shattered. But, just as soon as the panes were replaced, window breaking ceased.

This question of school sanitation and school maintenance does not stop with the provision of these facilities but must include the instruction in the proper use and care and proper pupil supervision and responsibility to see that

\(^{15}\text{bid.},\ p.\ 238.$
supplies and equipment are not misused.

School environment . . . encompasses every aspect of the school's and communities' influence upon the health of children. Buildings may meet all requirements and be so operated as to lack many essentials of healthful living.16

A study of the causes of delinquency reveals the alarming contribution made by poor environment. Yet all over the country most school doors are locked after school and during week-ends; thus they become emblems of lack of imagination and understanding.

The school authorities need not only to provide adequate school buildings, properly equipped and cared for, but also a schedule which will give ample time to do the work necessary to promote health. "No allotments or claims of other subjects should be allowed to crowd out time for appropriate health instruction."17

A janitor finds it utterly impossible to keep a building respectable unless the pupils do their part. The leadership of the teacher is the potent force in directing the classroom environment. Her role is to see that the room serves better the needs of her pupils by building in their minds an awareness of the many factors relating to health. The class and the teacher should set up some guiding principles. The following items are suggestive but others should be added:

17 Joint Committee on Health Problems in Education, Health Education, p. 179.
1. The teacher's desk should serve as a standard for the class in good housekeeping.
2. Develop the habit of using the wastebasket.
3. Acquire the habit of placing wraps in proper places.
4. Have a place for everything used in classroom and teach pupils to replace articles following use.
5. Keep desks and table tops free of instructional materials at the end of day so that they may be properly cleaned.
6. Have a thermometer and maintain normal temperature for health and comfort.
7. Provide as nearly as possible proper ventilation throughout the school day.
8. Adjust window shades for best possible light in keeping with changing light conditions during the day.
9. Appropriate classroom decorations should be encouraged, but teacher should not place posters and plants in windows or use dark curtains because these obstruct the light.
10. Keep blackboards clean when not in use.
11. Train pupils to make suggestions for improvement.  

The classroom teacher has a definite opportunity and also a responsibility for developing in her room a physical environment favorable to healthful living. Her room should be a laboratory in which pupils will strive for the improvement of their surroundings.  

Safety, Fire Prevention, and First Aid

No program of health service would be complete without proper provision for safety education which includes fire prevention, first aid, as well as all other phases of safety. Students may recite safety pledges and safety rules until "doom's day" and still not use these precautions in everyday living. To train children to live successfully in the

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18 American Association of School Administrators, Health in Schools, p. 246.

19 Ibid., p. 240.
presence of danger is the best means of controlling safety hazards.

In the development of this subject . . . the objectives should be: the formation of attitudes of mind, the formation of habits; the acquiring of skills, and the acquiring of information. Of these, by far the most fundamental and important is the first, the formation of attitudes of mind, for if this is accomplished the rest will, to a considerable extent, take care of itself, and if this is not accomplished the rest will be so superficial as to be practically useless.20

This attitude of the mind is not something to be taught abstractly. It must come about by the child's adoption of principles to be followed which have been acquired by actual experiences in his own life. There are many dangerous situations which arise out of school living such as the crossing of the street or using playground equipment, which should be used in carrying on a safety program. The school patrols can be especially valuable, in the development of attitudes and practices as well as actually saving lives. Organizations of safety councils may also be used advantageously as a means of enlisting the active support of the student body in eliminating accidents. This development of the right attitude toward danger is something that transfers to all danger; it goes beyond merely crossing the street safely. There is a certain attitude which has almost attained the proportion of a philosophy that accidents just "will happen." It needs to be settled once and for all that

20American Association of School Administrators, Health Education, p. 91.
every accident has a cause and could have been prevented by removing the cause.

The objectives of safety education in the elementary school have been published by the American Association of School Administrators. This splendid statement reads as follows:

1. To help children recognize situations involving hazards.
2. To develop habits of conduct which will enable children to meet situations of daily life with as little danger as possible to themselves and others.
3. To develop habits of carefulness and obedience to safety rules at home, on the streets, in the school, or at play.
4. To teach children to read, understand and obey safety rules and regulations.
5. To teach children safe conduct in the use of streetcars, private automobiles and buses.
6. To develop habits of orderliness, and carefulness in the use of playthings, tools, common articles of home and school, and the use of fire.
7. To develop alertness, agility, and muscular control through rhythmic exercises, play games, and other activities.
8. To teach children to cooperate to prevent accidents and the taking of unnecessary risks involving physical dangers.
9. To develop wholesome attitudes concerning: (a) law and law enforcement officers; (b) safety of themselves and others; (c) organized efforts to assure safety for all.
10. To give children actual experiences in desirable safety practices.21

There are many phases of the safety program of a school. Fire prevention and fire prevention education constitute another important phase which cannot be minimized. The use of fire drills may train the youths to act calmly and

21American Association of School Administration, Safety Education, Eighteenth Yearbook, 1940, p. 67.
deliberately in the face of danger if conducted correctly and regularly. The knowledge of how to use the fire extinguisher is more important than how it is made. The organization of the entire school under a fire brigade is probably the best method of securing full participation by the school.

Accidents in the use of school equipment increases as the pupils advance from the first grade through the intermediate grades. It is the teacher's obligation to help children locate all potential hazards in and around the school and to plan carefully measures to prevent accidents. In this way part of the responsibility for prevention is transferred to the learners who control the attitudes adopted by the students.

Schools can be proud of their safety efforts and the contributions they have made toward the major problem of our present culture. Since 1922, the year which marked the introduction of school safety education on a national scale, fatal accidents in automobiles among children five to fourteen years of age have decreased 30 per cent. Twenty-five years ago there was nowhere to be seen in this country so splendid an example of positive regard for law as is today manifested by young people in their service on and obedience to school traffic patrols.22

These facts are proof enough that the type of instruction used and the opportunities offered for safe living within the school domain do have some effect upon preventing accidents.

In spite of the excellent showing of improvement, there is still much left to be done as revealed by a report of losses for the year 1944:

It was a year destined to see approximately 98,000 persons in the United States lose their lives, 9,800,000 seriously injured, and $4,900,000,000 lost through accidents — as accidents go, a better than average. 23

In the face of this there can be no period of relaxation. Checking accidents is not an over-night adventure. It is a slow, every-day affair, requiring careful planning, tedious months and even years of work of every man, woman, and child in the United States.

Children should know how to behave if present when occasions calling for first-aid treatment occur such as when someone faints, has a nosebleed, falls and is hurt, or is injured on the playground. They should know what procedure to follow in cases such as bites of dogs, snakes, or insects; contact with poison ivy or other poisonous plants, and how to apply treatment for minor injuries. 24

It is part of the school's duties to formulate procedures to be used in emergencies, to instruct pupils and teachers concerning them. An emergency card should be easily accessible for every child stating the parents' name and address, with directions for making contact in case of necessity and with the family physician's name and telephone number. Such planning will save time and nerves during an emergency.


24 Ibid., p. 151.
Major and minor injuries are relatively common in childhood. Since the school should teach pupils how to do better the desirable things they are sure to do in life, some first aid should be given in the elementary school.  

Children should acquire most of their first-aid information through demonstrations on the level of their ability. Such levels of first aid may easily be used in primary groups.

When something gets in the eye do not rub it. Try closing the eye so that tears accumulate and wash it out.

For nosebleed, hold head far back, place a handkerchief over the nostrils, and take slow deep breaths. Cold cloths placed on the nose will help.

If any parts of the body, such as the hands or feet, are frostbitten, use cold water not warm water, in rubbing the part.

Any hurt that breaks the skin should be kept clean. It is a good thing to let the wound bleed a little.

If clothing catches on fire, lie on the ground and roll, or wrap yourself in a rug and roll.  

By the end of the elementary school the pupils should "know how to behave during certain emergencies, what to do with respect to certain potential serious injuries and how to apply first aid in certain types of minor injuries."  

A first aid kit should be available to every child where he may practice his own first aid skills on minor bruises and scratches. Furthermore, there is nothing more

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26 Joint Committee on Health Problems in Education, Health Education, p. 150.
27 Ibid., p. 151.
conducive to good mental hygiene of a pupil than the opportunity of accompanying a companion to the clinic to administer to his first aid needs. This is service and cooperation of the most desirable type.

**Mental Hygiene**

The following quotations support the idea that mental hygiene is an important phase of the health of any child and that the surroundings and the way he uses them influence his mental behavior:

There are a number of phases of mental hygiene which directly relate to school administration and organization. The general philosophy of the school system, the manner in which curriculums are prepared, the selection and appointment of teachers, type of supervision, administrative attitude toward discipline, and school procedures in promotion and grade placement all affect the emotional health of pupils.28

In the elementary school mental hygiene is not a subject to be taught. There are no topics or projects to be taught. Mental hygiene is the direct yet deliberate and positive contributions to emotional and personality development and to social adjustment which the school makes through the way in which the teachers, the curriculum, methods of teaching and administrative practices relate themselves to the children.29

These opinions also refute the ever-present tendency of thinking of health as physical with an utter disregard of the individual as a whole. The fundamental requirement in the guidance for mental health is respect for the individuality of the students. There are many things the


administration can do to promote the wholesome personality which is a sure sign of mental health. Schools must show interest in the growth -- social, emotional, and physical, as well as the mental -- of all the children of all the people. There is no better way of demonstrating this interest than by providing opportunities for every student to develop his own talents to their fullest extent.

The most important person in this plan is the classroom teacher. Any measure or procedure which affects her mental health will have a reflecting influence on the pupils in the class. There are many things the administration can do which will improve her efficiency, namely: (1) use merit system in selecting teachers, (2) make satisfactory service basis of tenure instead of prejudice, (3) adopt supervision methods which will give feeling of security and belonging, (4) give adequate consideration to the emotional and social atmosphere of the school by giving careful consideration of pupil accounting, home-work, and classification practices, (5) arrange a flexible schedule, and (6) publish teacher salary schedule.

Before a teacher can plan a positive program of prevention, she must understand thoroughly what goals have been set. The significant characteristics of a healthy personality -- emotional, moral, and social health -- have been briefly stated as follows:
The child possesses intelligence adequate to meet the demands of life. He is able to concentrate his attention on the matter before him and to perceive the important elements of the situation with accuracy and alertness. He is interested in the world about him and is curious to understand it. He is generally self confident; he expects success and achieves it with reasonable frequency. He is active in overcoming difficulties; he does not day-dream so much that he fails to meet the actual situation.

His predominating emotional qualities are happiness, cheerfulness, courageoussness. He is not troubled by unnecessary fears, shyness or timidity. His emotional responses are those that are appropriate and useful for the occasion. He does not ordinarily brood, sulk, or indulge in morbid introspection.

He has many objective interests -- friends, hobbies, games in which he finds adequate self-expression. He is companionable and mingle freely with other children. He adapts himself easily to cooperative enterprises; to leadership and fellowship. His relationships with children of the opposite sex are wholesome.

He has a sense of responsibility for the happiness and well-being of his friends, schoolmates, and members of his family.30

These are ideals. It is not expected that all personalities will possess all or equal parts of the various elements, but each personality will be characterized by each quality in varying degrees and combinations.

With this pattern of wholesome personality firmly fixed in the mind and heart of the classroom teacher, she will need to do some rearranging of her own behavior to give ample opportunity for the development of wholesome personalities in her students. She will need to do many things;

30 Joint Committee on Health Problems in Education, Health Education, p. 39.
some of the most important are listed briefly as follows:

1. Use every available means of improving her own personality as it is more important than her technical knowledge. Special attention should be given to improving her voice.

2. Make her classroom as attractive as available means and her own ingenuity can do, in order to improve the emotional tone of the classroom.

3. Provide every opportunity within her power to develop the individuality of her students. She should strive to fit her purpose to the pupils' needs.

4. Improve her own knowledge of growth and development of children.

5. See that all classroom activities are adapted to the level of the children in her care.

6. Avoid all undemocratic and unscientific methods of discipline, especially ridicule and sarcasm.

7. Help school identify all social and emotional maladjustments and help organize remedial program.

8. Provide democratic opportunities in the class.

Another element of classroom activities which affords satisfying experiences is that found in the physical education class.

Physical education also contributes to mental health through the personal satisfaction, joy and pleasure which accompany participation in various activities. When an individual participates in play, his body,
mind and emotions are working together; he is functioning as an integrated personality; and it is the foundation for mental health. 31

A great many other opportunities come to teach health protection during intramural games such as, use of paper cups, cleanliness, individual towels, proper clothing. And pupils participating in the games often ask the teacher about rest, diet, minor injuries because of their interest in maximum individual performance.

It is recognized that there is a mental hygiene value of the absorbing interest and emotional release of recreative activities. Our modern industry has stripped the business world of all the recreative opportunities. And so schools must educate children in ways to overcome these deficiencies of industry. Absorbing interest, pleasure, and opportunity of expression make recreative activities an ally of mental hygiene. Boys and girls engaged in special interest organizations, such as dramatic, sport, music, etc., have little time for loafing or delinquency. Participation in such organizations should be voluntary and should give pupils with special talents an opportunity to explore these talents. Such clubs should be viewed as channels for meeting individual differences, and as channels for enriching the program for pupils with special talents.

CHAPTER III

THE DIAGNOSIS AND EVALUATION OF THE

HEALTH PROGRESS

The Work of the Classroom Teacher

Observation of children. -- The sources for discovering health needs is the diagnosis of the problem. The teacher is the front-line officer in locating the most urgent needs of the children in her class. In the early days of health service, authorities believed that only the nurses and doctors were qualified to do this work, but it is now generally conceded that the observant teacher, because of her strategic relationship with the children, is better able to discover early signs of changes in health and health behavior than the doctor or nurse who sees the child only occasionally. One early objection to the teacher's observation was that she was too narrow in her observations, that is, that she devoted her time almost entirely to cleanliness or neatness. The more recent concern of the teacher has been the wholesome growth of the "whole" child.

Early methods of observing children were rather crude. Children were lined up each morning for inspection as if they were so many sheep. Such a policy has long since been
dropped by the best teachers except in cases of an epidemic of some kind. The most up-to-date plan is for the teacher to observe the children informally throughout the day, showing consideration for all phases of the children's growth. "Informally" here, however, means that there is a definite plan. Daily inspections are used for three purposes, namely, (1) to find symptoms or signs of communicable diseases, (2) to create a personal and group responsibility, and (3) to help improve the health habits of each individual.

The teacher should not only be quick to recognize any symptoms associated with communicable diseases, but she should also be aware of any changes in social or emotional behavior as well. It is how the individual acts that indicates the progress he is making in health habits. The way the boys and girls live in their school environment, the way they use water and light, the way they work and play together throughout the school day, the resourcefulness with which they meet their daily problems, indicate the progress in health education.

The value of observations. -- With this kind of a viewpoint the teacher's observations would have a practical value to her.

Careful and continuing observations should help the teacher to (1) become aware of the needs of the children as a basis for teaching, (2) to find children in the group about whom conferences should be held with the parent, the family physician, the dentist and nurse for medical and dental examination
and follow-up remedial care, (3) exclude from school and report to health department all children who show symptoms of communicable diseases or who, for other reasons, might be considered sources of infection, and (4) develop continuous records of child development during the entire school life of the child.¹

In the light of these broad values, the teacher's observations of the health status and health activities and behaviors assume real value in the course of the development of each individual child. It is apparent that she will need to know many facts related to growth and development of children, as well as have the ability to recognize the symptoms of communicable diseases.

In order to attain the optimum health status of the school population, it is necessary to adopt some daily procedure for recognizing the communicable diseases in their early stages and for noting any deviations from normal health or behavior.

Policy on exclusion of communicable disease. -- Every school should set up certain policies and procedures for the control of communicable diseases. These policies, when formulated, should not be buried in the files of the principal's office, but should be printed and put in the hands of every teacher and sent to every home represented in the school. In this way every person concerned could understand the regulations and their purposes.

A splendid policy on exclusion has been set forth by

¹Otto, op. cit., p. 394.
the American Association of School Administrators as follows:

To summarize, children should be excluded from school whenever they manifest any of the following symptoms:

- flushing
- repeated sneezing
- sniffles
- red or watery eyes
- eyes sensitive to light
- running nose
- sore throat
- listlessness
- abnormal irritability
- palor
- fever
- nausea or vomiting
- diarrhea
- skin eruption
- skin peeling
- rash
- pain
- cough
- dizziness

In order to get the full value from the exclusion of the child from school, the symptoms should be discussed with the class so they, too, would learn and understand the real purpose of the exclusion. The two most important reasons are (1) to protect the individual who has the symptoms from undue exposure and further complications, and (2) to protect other people from exposure and possible serious illness. If the health nurse would make a home visit to explain further the purposes of the exclusion, the home would benefit educationally, too, from the exclusion.

The fact that a great many diseases begin with the symptoms of a common cold make it imperative that the teacher or school official who excludes the child from school refrain from expressing an opinion on the type of illness. This kind of policy will often have the advantage of saving the embarrassment of a friction with the home or some local

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Policy for readmission. -- It is equally as important to have a definite policy on readmission after exclusion as to send the child home in the first place. Parents and children should understand the requirements for readmission in order that every child should be treated impartially.

When a child has been excluded from school on suspicion of a communicable disease or when they return after illness, consideration should be given to whether or not it is safe to re-admit them. Re-admission policies will depend upon the existing health facilities. The following are mentioned in the order of their importance: (a) medical certificate from medical school advisor or family physician, (b) certificate from school nurse or health department, (c) a note from the parents, (d) judgment of teacher or principal.  

Home visits. -- Most of the child's behavior, eating, drinking, exercise, rest, elimination, fresh air, sunshine, takes place outside of the schoolroom. So, the teacher's observations have to be supplemented by reports of children's health behavior at home. This demands genuine cooperation between teacher and parent. Some desirable facts may be secured by sending questionnaires home for parents to check on child's behavior habits.

However, it is generally recognized that an essential feature of knowing the child is by becoming aware of the home conditions and home relationships, through first-hand methods. This affords an excellent opportunity for studying the parents, too. Every home visit should be carefully planned.

3Otto, op. cit., p. 397.
Although it is thought wise to seize some unusual occasion such as the arrival of a new baby or the moving into a new home for such visits, it demands skill on the part of the teacher to visit in such a way that both parents and teacher will be benefited and a feeling of friendship and mutual interest be established.

Every teacher should visit the home of every child in her room sometime during the year. The administrative plan should provide school time for most of the home visits. This will help to break down the barrier between the home and the school. It is too late to wait until some unhappy school incident occurs to establish friendly relations. If this has already been done, the problem can easily be solved. This policy of visiting all homes, too, will tend to destroy the implication of trouble where there are children with problems. All conferences with parents should be confidential if full value is to be derived from the expenditure of the time and effort. Parents should be informed of the value of confidential talks in the adult education program of the Parent-Teacher Association. This is a splendid time to let the parent do all or most of the talking, giving him a free rein to unload his problems on an interested listener.

In making a home visit, the teacher should observe such major points as the following:
The physical environment of the outside and inside of the house.

The neatness, the adequate play space, sanitary conditions.

The personnel of the family group, including the servants.

The child's place in the group -- only child, youngest of five, etc.

The affectionate relations of the family.

The child's out-of-school companions.

The use of leisure time.

The cultural evidences -- hobbies, etc.

The financial status.

The educational background.

The health of the family.

The community relationships.

And many other items related to the child's home life.

This information added to the teacher's other observations should furnish valuable information in planning experiences for the child's growth and development.

Not all the problems belong to the child; schools create problems because of their own shortcomings. Some of them come from inadequate light in classrooms, from improper methods of discipline, from the lack of improper contact with the home. It is the teacher's duty to adjust as many of these problems as possible. She supplies the more
objective tools for the locating of the individual problems of each child in her screening tests for vision, periodic measuring and weighing, mental and achievement tests, and anecdotal records. Then she records all her findings where they may be used by other interested individuals on the cumulative records.

The teacher who is vitally interested in education as a process of growth will use these observations and cumulative records as guides in selecting experiences that will fit the individual needs of the child.

The Work of the School Nurse

In the first chapter of this study, the importance of the cooperation between the health specialists and the classroom teacher was pointed out. "Next to the teacher, the school nurse is the most important factor in the communicable disease control program."^4

Her function is to observe children, make inspections, consult with teachers and principals about exclusion and re-admissions, and to interpret to the home the reasons for apparent unreasonable exclusions. She should interpret . . . the principles and practices involved in protecting the school against communicable disease by a policy of exclusion upon suspicion without waiting for diagnosis. She should exercise her influence to promote immunization against communicable diseases wherever practicable. She should assist the school physician in his contacts not only with the home, but with the practicing physicians in the community.^[5]

^4Joint Committee on Health Problems in Education, The Nurse in the School, p. 40.

^5American Association of School Administrators, Health in Schools, p. 100.
She can also be of service in contacting the local agencies which desire to do remediable work for school children and in scheduling the various pupils for appointments with the dentists, doctors, or other specialists. Besides the work she does in preventative and remediable work, she may make some valuable contributions to the information collected on the cumulative records. She is particularly valuable in all follow-up work which is a definite responsibility of the classroom teacher. She can, through cooperation with the teachers, make home visits and suggest ways to have corrections made and when these are finished record them on the cumulative records.

Self Evaluation by the Pupils

The teacher can study, plan, diagnose, and guide the child in her efforts to do her job well and yet in the last analysis, what she accomplishes will depend entirely upon what the individual child does to help himself. All improvement comes from "within."

The children in the upper grades, the fourth grade and above, can answer a large number of questions in regard to their health behavior and thereby give much valuable information which will supplement the teacher's observations. As has been pointed out earlier, the health practices take place twenty-four hours of the day. And a large part of that time, the teachers have no opportunity of knowing the
behavior of their pupils. However, the pupils will have to be tutored in the art of observing, for they are frequently not aware of the implications of their behavior for health.

Self reports are easy to use and abuse. If some children are censured and others praised when honest reports are given, then a tendency to check items which would secure the teacher's approval would be adopted. Self evaluation should not be used too often. When it is used, great care should be exercised in order to avoid any ill effects.

The Use of Tests

Attitude tests. -- The attitudes one holds are fairly indicative of what he practices. A child's attitude can be measured by asking questions about what he believes and thinks, or how he feels toward approved customs, what should be done in certain situations, whether he believes in established policies, what he likes or dislikes in the way of activities or foods. Two tests of health attitudes have been standardized. They are Health Awareness Tests devised by Frazen, Derryberry, and McCall\(^6\) as a result of research carried out cooperatively by the American Child Health Association and N. E. Brigham.\(^7\)

Health knowledge tests. -- The health knowledge is the

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\(^6\)Ramon Frazen, Mahew Derryberry, and W. A. McCall, *Health Awareness Test*, Grades 4-8, published by Teachers College Press, Columbia University, 1937.

\(^7\)N. E. Brigham, *Teaching Nutrition in Biology*. 
easiest of health education to measure. However, one cannot assume anything about the health practices and health attitudes from health information tests. They may be purely a memory test and reflect little of the personal practices of the pupil. For example, a child may know how many teeth he has and yet never care for them. Gates and Strang have devised a very acceptable test of this type.8

Social development tests. — The testing program in the social and emotional fields is far behind the information available in these phases of growth. Some of the general facts to be remembered in testing the personal-social adaptability of children are:

1. The term "personality" is unfortunately used for measuring personal-social adaptability, for personality is the sum total of traits and reactions acquired in the development of all phases of growth, physical, mental, emotional, as well as social.

2. Although the testing program for emotional and social development is far behind the testing program for abilities and achievements, there is no lack of tests. The quality of refinement and understanding of their uses is surpassed in other areas.

3. Personal-social tests should not be used in lieu of other techniques for evaluating the child's needs, but

in addition to them.

4. They should never be used to satisfy curiosity or
to justify an opinion, but to reveal to what extent the
child is adjusting to problems and conditions confronting
him.

5. The continuous or longitudinal series are more val-
uable than other types.

6. The simpler the terminology, the more meaningful.

7. The more categories tested, the more significant
and useful in pupil adjustment and guidance.

There are several types of measuring techniques that
may be used:

1. Controlled observations.

2. Rating scales.

3. Interviews.


Two of these types are listed below with a description of
one test of each kind. The writer has found these more de-
sirable for small elementary schools.

A. Rating scale -- Haggerty-Olson-Wickman.

1. Description.

   a. Consists of two schedules.

      (1) Schedule A is designed to
          locate problem children.

   9M. E. Haggerty, W. C. Olson, and W. K. Wickman, Hagg-
   gerty-Olson-Wickman Behavior Rating Scales, published by the
   World Book Company, New York.
(2) Schedule B covers personal characteristics on a variety of traits regardless of the type of child.
b. Both schedules may be used but B should be used when only one is used.

2. Advantages.
   a. Practical and reliable if teacher is trained in its use.
b. Suitable for young children.

3. Disadvantages.
   a. Bias of teacher may enter into the score.
b. Unwise or untrained teachers may add to maladjustments.

E. Interviews, -- California Personality Tests.\(^{10}\)

1. Description.
   a. Consists of five batteries extending from kindergarten to college.
b. Divided into two sections.
      (1) Life adjustments -- six categories.
      (2) Self adjustments -- six categories.

\(^{10}\)California Personality Tests, devised by the California Test Bureau, Hollywood.
2. Advantages.
   a. Less personal than direct questioning.
   b. Profile reveals individual status.
   c. Consumes little time to give (45 minutes).
   d. Plans for improvement activities.

With such devices to aid school personnel in discovering maladjustments in early stages, the use of mental hygiene ought to advance rapidly. No modern movement offers greater opportunity to teachers or greater promise to children than the concern for personality development. In the opinion of a great many authorities it is only a matter of time until the chief emphasis will be placed where it rightfully belongs, on the emotional and social growth of the child.
CHAPTER IV

SOME TECHNIQUES FOR RECORDING CUMULATIVE CASE DATA

Collecting and Organizing Cumulative Records

If the teacher's obligation is the wholesome development of the "whole" child, then the teacher needs to have some practical means of gathering significant data about as many areas of the child's life as seem necessary to evaluate the "whole" child. Furthermore, these data should be organized in such a simple fashion as to consume only a reasonable amount of the teacher's time. It should also be cumulative and accessible to the teacher and the health personnel for competent guidance programs.

Although it is not practical to list every possible area related to the development of individual children,

Yet it seems that there are several broad areas in which selected types of information might be helpful in giving a teacher a broader perspective of the growing child, his needs, and his idiosyncrasies. These broad areas are: (a) home and neighborhood associations and patterns of life, (b) physical factors, (c) physical development, (d) mental development, (e) educational development, and (f) social and emotional development, including his adjustment to the teacher, to other adults, and to other children.¹

These broad areas are just as vital in securing

¹Henry J. Otto, Cumulative Development Case Data That Classroom Teachers In Elementary Schools Can Get and Use.
pertinent data which are directly related to the physical and mental health of a child as they are to other phases of growth. Even though there may be specific items which are not considered as immediate results of health services, yet each classroom teacher will need to know all facts concerning a child if she is to interpret the success of the health program for each pupil. With this viewpoint, the gathering of significant data about each child in school becomes a health service that can be made functional for education through the improvement of the guidance program.

The cumulative case data are not to be substituted for any permanent records which are ordinarily found in superintendents' offices. They are to be gathered by the teacher for the teacher's use in her classroom work. Such cumulative records may consist of the following: (1) a folder for each child, (2) a heavy paper card which is suitable for the case history, (3) anecdotal record, (4) samples of the child's work, copies of tests and rating scales, (5) notes to and from parents, (6) student's activities and interests. The gathering of these data should begin when the child first enters the school. Each year the classroom teacher should make the necessary additions to the cumulative record and add such other material as is considered pertinent to the child's history.

There are several types of data that are valuable in securing a full picture of each child which in turn would
help the teacher form intelligent opinions and make proper
decisions. Henry J. Otto has listed seven types of data:

1. "Child's identifying data which are secured at
the time the child enters school for the first
time. This includes such information: full
name, birth, sex, home address, schools at-
tended, occupation of parents.

2. "Home and neighborhood." This includes the
child's relation to his parents, to siblings,
to other members of the household, and any
other unusual facts about the parents and en-
virnoment which might be helpful to know. It
would be desirable to make a home visit to se-
cure this information.

3. "School history." This should indicate the grade
classification each year and his daily attendance
record for each year.

4. "Physical factors." The child's health condi-
tions are important factors of his conduct and
performance. Any deviations from normal health
behavior should be noted, as well as the find-
ings of health examinations and classroom ob-
servations of the teacher which have been dis-
cussed earlier in the study.

5. "Physical development." The more types of meas-
urements that can be secured, the better will be
the picture of growth of an individual child.
It is necessary to record the height and weight
twice a year and grip twice a year and count
the number of erupted teeth bi-annually in order
to get an accurate record of the physical develop-
ment of a child.

6. "Mental and educational development." To com-
plete the total growth picture, the mental age
should be obtained every two years and the
achievement age at least once a year.

7. "Social and emotional development." The intangi-
bility of personality, social and emotional
growth, has made it almost impossible to plan
tests which will picture accurately these two
phases of growth. Some methods used to reveal
these phases are the anecdotal record, social
analysis of the class, such as the "Guess Who"
technique for learning the social reputation of
pupils held by the classmates, the behavior rating scales and the interview which is both formal and informal. The informal type will probably yield more valuable information, for it can be used to learn the special interests and dislikes, attitude toward school, home duties, ambitions, etc., of each child.  

Some practical values of the cumulative records to the teacher are stated as follows:

1. To know pupils when the school year begins.
2. To determine what work a pupil is capable of doing.
3. To provide learning activities suitable to each pupil.
4. To formulate a basis for the intelligence guidance of pupils.
5. To explain the behavior characteristics or unhappy conditions of any pupil.
6. To make possible the development of unusual capacities or exceptional talents.
7. To identify and make provisions for the mentally slow.
8. To make assignments to committee work and monitorial positions.
9. To make periodic reports correctly and on time.
10. To be properly informed when conferring with parent and others about a pupil.  

Anecdotal Record

Each teacher will find it helpful to devise a card file or a notebook plan on which she records observations of physical and behavior conditions of her individual pupils which seem significant. Each statement should be dated. They should be evaluated in terms of the child's total personality. This activity or plan is called an anecdotal record.

\(^2\)Ibid., p. 243.

\(^3\)C. M. Keinoehl and F. C. Ayer, Classroom Administration and Pupil Adjustment, p. 304.
There are certain criteria for writing a good anecdotal record that should be observed, namely:

1. It should be objective to the point that it does not include the teacher's opinions.

2. It should contain the dates and sequences of behavior incidents.

3. It should be limited to a center of attention in which details not supporting the center of attention are subordinated.

4. It should be recorded promptly before any attempts are made to separate it and analyze its significance.

5. It should indicate positive, as well as negative qualities.

Some of the pitfalls to avoid in writing anecdotal records are as follows:

1. The tendency to record incidents that annoy rather than incidents relating to the child's own welfare.

2. The incident observed may be one not typical of the child's behavior.

3. The tendency to confine the incidents to classroom situations only, excluding the playground.

4. A specified number of anecdotes a week may be of little value.

5. The incident, lifted out of its setting, might give a wrong interpretation.

From the practical view, the anecdotal record has many
values. Briefly summarized, they are:

1. A collection of anecdotes from a competent observer gives diagnostic material for the study of the "whole" child.

2. It supplies data for the increased understanding of the individual's problem and improves the relationship between teacher and pupil.

3. It provides information of value in the conferences with the pupil.

4. It lends aid in administering a remedial program.

5. It provides a basis for interpreting pupil development to parents and may aid in a better understanding between the home and the school.

6. It provides data for curriculum design where curricular materials aim to meet the individual needs.

7. It provides data for evaluation of the success of the health program with individual pupils.

8. It serves as a supplement to achievement records.

9. It substitutes exact descriptions for vague generalities.

10. It directs the attention away from subject matter to individual pupils.

Anecdotes may be on any aspect of the child's behavior, but from the point of view of health, a teacher would note and make record of episodes having a health significance, either physical or mental.
It must be remembered always that many children in good mental health show some of the signs of poor mental health occasionally which are parts of the changes in growth, and as such should not be a matter of concern at all. These facts tend to show that a knowledge of how children grow is invaluable.

Persistent behavior that seems out of the ordinary needs study and understanding, too. The aggressive child needs guidance in more acceptable behavior while the timid child needs special held so that he will feel at home with the group. Neither child may be helped by punishment.

Social Analysis of the Classroom

Schoolrooms are often divided into spheres of influence.

In things academic, the teacher usually yields the balance of power, but in social affairs the trend of events is often determined by the pupils. This division is unfortunate, for it deprives children of the wisdom, experience, and guidance which they have a right to expect from adults in this sphere as well as in others. . . . The social training which children give each other tends to accentuate their personality deviations rather than remove them. The child who withdraws from the group is ignored and allowed to continue his behavior. The child who is aggressive meets resistance which strengthens his tendency to fight. The leader and the follower seldom have their roles reversed by their fellows, so that such practice makes for increased dominance in the one and greater submissiveness on the part of the other.4

Several studies have been made in recent years in order to acquire techniques for measuring social sensitiveness.

4Stuart M. Stokes, "The Social Analysis of the Classroom" (mimeographed), issued by the American Council on Education, Chicago, p. 13.
One of these is the "Guess Who" technique, mentioned in Stokes' mimeographed bulletin, which is valuable in gaining an insight into the social esteem of different children as held by their classmates.

Another similar plan is obtained in informal methods of naming preferences for companions, selecting best friends, or similar choices. For example, a child is asked to name three choices for a field trip in the order of their preference. Then a picture is drawn of these social relationships showing the choices of children with the reciprocal choices. J. L. Moreno has named such an activity "sociometry."^5 "It is in these person-to-person relationships in various sizes and types of groups that many social needs are met and personality development has its roots."^6 From the standpoint of the psychology of group relationships, it is important to note the large percentage of isolated children. The psychological effect of not being wanted becomes increasingly serious in the upper grades for there seems to be general agreement that in the democratic type of society the desire for group status increases as one grows into maturity. To alter the situation in the classroom, the teacher will wisely rearrange the group so as to increase the popularity of the isolated individuals.

^5J. L. Moreno, Who Shall Survive?"pp. 10-11.

^6Otto, Cumulative Developmental Case Data That Classroom Teachers in Elementary Schools Can Get and Use, p. 172.
The Case History

"The cumulative record should present a moving picture of the whole child growing healthfully in wholesome relationships to others." The cumulative record summarizes the whole development of the child, while the anecdotal record gives only one technique for gathering valuable information that will help complete the picture. Frequently another method is used in the diagnosis and evaluation of a particular child whose conduct has been much of an enigma. This is writing a case history of such a child. Of course, it would not be practical to write many such histories in each class because of the time element. Yet, such a narrative will be valuable to the teacher and to succeeding teachers in checking the changes in growth, behavior, and attitudes of a given child in the process of growing up. The material used should be gathered from every available source -- cumulative records, anecdotal records, interviews, both with parents and child, former teachers, or anyone else who might give valuable information about the child studied.

Pupil Products

Another concrete method of gathering clues for guidance in interpreting the child's personal, social adjustments is by collecting the writings, stories, drawings, and handicrafts of individual children made with complete freedom.

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7Joint Committee on Health Problems in Education, Health Education, p. 172.
from direction or regimentation. Sometimes this expressive art may give leads to causes of frustration, aspiration, or needs. Important observations in this field should be recorded on the anecdotal record in order to determine its frequency and implications. Working with finger paints, moist clay, and mud is a way that some children find release. It is the interpretation of this release that gives the teacher direction for guidance in arranging other activities which in turn provide desirable experiences in the right directions. For example, one teacher watched a child mold a figure of a man out of clay, and then watched him strike his handiwork with his fist and say, "Take that, and that, you old mean thing!" When he discovered that the teacher saw him, he was embarrassed for a moment. When the teacher said, "That's all right, James; I know how you feel," he was relieved to know that she understood. The teacher did understand, for she knew he had a brutal and cruel father. And so, it is these little means of self-expression that are often more revealing of the inmost problems than their outward expressions and behavior which are often very misleading. Children are good actors, and to understand them perfectly one must study them when they are off-guard, in their moments of release and freedom.
CHAPTER V

THE IN-SERVICE TRAINING OF TEACHERS

The Need for In-Service Training

The individual teacher needs guidance to assure her that in meeting the health needs of her children as she finds them, she is not overlooking less apparent factors that are essential to an adequate program, to help her compare the behavior of her own children with that of children of corresponding maturity level based on accepted standards, and to help her formulate goals and plans for the continuous growth of children. "The best training in-service is growth in-service. The stimulation of such growth is the heart of supervision."¹ "The education of a teacher is a process of growth, and growth comes slowly, no matter how we try to accelerate the process."²

The professional needs of teachers are great, particularly those former teachers who have returned to teaching during the war emergency, because education has undergone many changes in philosophy and practice during the last decade.

¹American Association of School Administrators, Health in Schools, p. 16.

²Kate V. Wofford, "In-Service Education," Progressive Education, XIX (April, 1942), 219.
It is just within recent years that colleges have shown the proper recognition of the needs of prospective teachers.

Consequently, if today's children are to benefit from our newer understandings, in-service study is called for. If such study is to take place and be effective, that is, lead to better guidance of growth of children, appropriate encouragement must be provided by school administrators. Teachers on the job must be helped to learn more about the principles of growth and development. They must be helped to deepen and extend their insights through the close consideration of the cases of typical boys and girls.\(^3\)

It is also coming to be generally recognized that there is danger that teachers will deteriorate if, after they become well established in teaching positions, they do not continue to study quite as vigorously as they did during the years when they were attending the institutions which gave them their initial preparation. Furthermore, in a world where advances in knowledge in all fields are being made every day, even the knowledge of subject matter which every teacher acquired in the course of preparation, is sure to become obsolete unless there is constant in-service study.\(^4\)

Some Types of In-Service Education

There are several types of in-service education that are employed at the present time. Perhaps the easiest and least taxing methods from the standpoint of teachers are the ones secured by enrolling in summer courses or evening extension courses. Certainly these have been the most widely used methods of all. Yet these methods may not prove entirely satisfactory except when they are used to

\(^3\)Karl W. Bigelow, "In-Service Teacher Education," *Childhood Education*, XXII, No. 5, p. 227.

acquire additional information on a particular subject or for "refresher" purposes. Far too often they represent the methods used to meet a required course for an extension of school contract and do not in any way have any connection with the growth of a teacher in her actual school work.

Still a different in-service work is explained by Reavis and Judd as follows:

Some colleges have brought back their recent graduates for a week of intensive study. Members of the senior class of the college were sent out to substitute for the returning graduates; in that way it served a double purpose.\footnote{\cite{5} Ibid., pp. 558-559.}

In another normal school, a senior is sent out for six weeks to substitute for a regular teacher; the teacher in turn enrolls for advanced work at the institution.\footnote{\cite{6} Ibid.}

Other institutions have made provisions for follow-up assistance to their graduates in other ways. One university has a member of its staff who visits graduates of that institution in the classrooms where they are teaching. It also holds conferences on the campus or at convenient centers elsewhere where groups of graduates may come together.\footnote{\cite{7} Ibid.}

In these ways the colleges responsible for the training of teachers can continue their guidance as long as the new teachers feel the need for such assistance.

Schools which are anxious to utilize the best talents of their teachers advantageously can plan worth-while teachers' meetings for their re-education. A schedule for regular conferences and staff meetings should be conducted...
by the supervisor or principal which would offer opportunities for the teachers to select or create their own materials and methods as they go along on the basis of genuine insight into the developmental tasks and adjustment problems of their several pupils. In connection with this type of teacher growth, time for visiting schools with similar problems has been allowed teachers. This, it is hoped, will clarify some of their own problems.

A newer method has been used quite successfully by some schools. It gives an opportunity for the teachers, while employed, to engage in studies involving their immediate problems under the direction of a competent advisor from some college or university.

In general, the program has four characteristics, namely, (1) it is built upon the needs of the teachers as they see them, not as the administrator alone sees them, (2) the goals established for the solution of the problem are set up by the teachers, (3) the program is developed by the teachers, and (4) the teachers evaluate all their activities and all their results. In this way all of the initial desire for the improvement originates with the teacher, who has to make all the changes in her classroom. Adults grow as much as children; they are motivated and react about like children. The chief difference is that adults have a better background and more experience to guide them.
The administrative machinery in this new method consists of organized groups which are small and informal. This type of organization tends to create a free and easy atmosphere in which every teacher can work in her own chosen fields based on her own individual needs.

Sometimes teachers of a given grade level or subject found it profitable to work together; sometimes the teachers from a particular building formed a group; sometimes the subject of interest resulted in organization of a more heterogeneous body. In every case it proved advantageous to rely on voluntary participation.  

In a recent experience of the Commission on Teacher Education in in-service teaching and teacher training, members of the staff concluded:

that, given proper conditions, teachers will readily join together in an effort to do better what they conceive to be their jobs; that when people go to work on jobs that to them seem important, personal growth and program improvement become closely related; and that given proper conditions, the teacher's conceptions of their jobs will broaden and also come to relate more closely to the needs of contemporary society.

The work of the American Council on Education in the field of in-service training demonstrated the need for competent leadership for child-study groups and for the help that can be provided by experts secured only from university and college faculties. Such advisors can be of most value if they spend several days at the beginning of a training program and then return at regular intervals throughout

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8Bigelow, op. cit., p. 228.

9C. E. Frall and C. L. Cushman, Teacher Education in Service, pp. 441-442.
the school year.

Even when teachers are most enthusiastic and time pressure upon them least harassing, what they can accomplish in study group meetings scattered throughout the regular school year has certain limitations. For this reason some school systems have established a local summer workshop, or two-week work conferences just before school opens, at which intensive child study has been featured. Special consultants, preferably including those employed throughout the year, have given full time to such enterprises. The results have been eminently satisfying. 10

Another alternate plan is to have certain representative persons from schools where child study was emphasized, attend university centers where workshops featuring child growth are held. These people usually receive a small scholarship from the school attended. They may return to the school from whence they came to act as special advisors or leaders in the organization of the new program.

... the quality of the leadership was a most important if not a determining factor in determining the program's success or failure.... In every situation the essential functions of leaders must be worked out in terms of the characteristics of the available people, of their status in the system and their relation to each other and of the philosophy of administration that obtains in the system. 11

The preceding reports of various methods used in inservice training indicate that all such programs do not need to follow the same plan for study. Just which method could best serve the school purpose would be determined by the local needs. Each school system has its own combination of


11Staff of the Division on Child Development and Teacher Personnel, Helping Teachers Understand Children, p. 446.
resources, teacher personnel, child problems, and background for study which must be considered in planning any type of program. And the success of any undertaking will largely depend upon the teachers engaged in the study.

The way participants feel about any program in which they are engaged has a marked influence on its success or value. This is especially true of activities that are undertaken cooperatively and that require the collaboration of large numbers of persons of diverse background and interests.12

Some Criteria for Evaluating Professional Growth

The sole purpose of any in-service training of teachers is to help teachers do better the job they will do anyway. Of course, there are many ways of evaluating the professional growth. The following items reveal some of the most obvious checks on improvement:

1. In improved procedures with children.
2. In the ability to hold one's own in discussion.
3. In awakened interest in original research.
4. In increased professional reading.
5. In the writing of professional papers.
6. In developing in short, new skills, new powers in handling classroom situations.13

The Financial Support for In-Service Education of Teachers

Traditionally, the in-service education of teachers has been considered an individual affair, particularly for those who lacked bachelor's or master's degrees. The

12Ibid., p. 438.
13Wofford, op. cit., p. 226.
programs of in-service training that have been dealt with in this study belong to the school as a whole except where the teacher has used them to secure credit in college. Then, if the teachers do this work during the school term to improve the work of the school, "the cost of such programs must be considered as fundamentally constituting a proper and necessary charge against school system budgets." 14

Too, many teachers do not feel financially able to contribute to a program that is designed to help the teacher do her job in a particular school better and in so doing increase the standing of the school. She has a right to feel that her contributions of time and energy would constitute a larger expenditure than any financial support given by the school board.

Guiding the growth of children is not a simple job. How to do it well cannot, even under the best of circumstances, be fully and finally learned during the period in which a teacher is prepared. How it is done, moreover, will depend not only on a teacher's understanding but also on the stimulus and satisfaction offered by the conditions under which he works. For both of the reasons school administrators should provide opportunities that enable teachers to make the most of their existing powers and that facilitate their growth in professional competence. 15

All teachers, wherever their work lies, can grow in-service with a little intelligent guidance from supervisors, administrators, or even from one of their own fellow teachers. It is not necessary to engage in

14 Bigelow, op. cit., p. 231.
15 Ibid., p. 251.
concentrated study in order to grow in-service. Any alive, alert teacher will grow in spite of all handicaps.
CHAPTER VI

CONCLUSIONS AND RECOMMENDATIONS

Conclusions

Health services can be made valuable for education if all aspects of growth -- mental, social, emotional, as well as physical -- are emphasized. Any good program of health service must involve the community and the home, as well as the school. The school is the laboratory for developing the home and community problems which constitute the twenty-four hour program of living boys and girls.

The effectiveness of the health service activities will depend upon the quality of the cooperation between the school and community health agencies, between the school and the home, between the school health specialists and the classroom teacher, and between the teacher and the children under her care.

The administrative duties are to provide health services designed to determine the health status of the child, to educate the parent and the child in ways of preventing common defects, to detect early signs of defects and disease, and to help correct all remediable defects.

The protective measures adopted by the school should
include such health services as health examinations and follow-up work to correct the defects revealed, continuous observation for prevention and control of communicable diseases, proper school sanitation, first aid and safety provisions, hygienic instruction and school management, hot lunch facilities, psychological environment conducive to good mental health of pupils and teachers, and a faculty with health of accepted standards.

The classroom teacher is the front-line officer in a health program. She can determine health services and health facilities and values by the methods she uses in interpreting them to the children. Through her daily observations of the health status and the health activities and habits of each child, she becomes aware of his needs as a basis for teaching, she discovers children about whom conferences should be held, and she excludes the child who shows signs of contagious diseases. She makes home visits in order to understand her pupils in their family relationships. She plans all her work on the basis of individual needs and levels of ability. She records all her findings in the cumulative records of the school.

The school specialists have special duties to perform in rendering health services, but their chief duties are to assist the teacher in acquiring a better understanding of the growth and development of children and to make the health services valuable in terms of tangible results for the health
of each child now and in days to come.

In order to diagnose and evaluate the growth and development of each child as a whole, the teacher needs some practical ways of gathering significant data about as many of the areas in the child's life as seem pertinent to an understanding of him and his problems.

Finally, since education is a process of developmental growth, the teacher needs a continuous program of professional education on the job combining voluntary study groups during the school year and some suitable type of workshop conducted by the school. By such progressive methods she can increase her efficiency by learning scientific principles that describe human development and character, by acquiring skill in studying children, and by learning adequate methods of recording the significant data. It is the school's obligation to finance any program adopted by the teachers that is designed to improve their efficiency in any particular job from which the school will profit.

Recommendations

In the light of the foregoing conclusions, the following recommendations are made:

1. The school should utilize the community resources by some form of group organization based upon the local conditions so that a high quality of cooperation can be maintained between the community health agencies and the school system.
2. The school should employ as many health specialists as are needed to render adequately the appropriate form of health service to the child, to the classroom teacher, to the school authorities, and to the community. In schools covered by this study, it is recommended that a full-time health nurse be employed, and that a doctor and a dentist be employed sufficient time to render the kind of service needed to fulfill the health obligations of the school to the children enrolled. This obligation will vary according to the heredity and environment of the children.

3. The health education and the functioning of the health service should be the task of the general classroom teacher.

4. The teacher should be qualified to perform such school health services as daily observation to detect suspicious signs of illness, screening tests for selection of those who need special examination by specialists, administration of first aid and safety measures to meet emergencies, correlation and application of health teachings to any situation.

5. A teacher should maintain her own good health and cultivate a genuine spirit of interest for the health of others.

6. The administration should supply adequate buildings, desirably located, comfortably equipped, properly lighted and ventilated, and effectively heated.
7. The teacher and the children should learn to use these facilities in a way that will produce healthful living conditions for the children and the school personnel.

3. The school specialists' work should be an integrated part of the whole health program. A close relation with the classroom teacher should be maintained by reporting to the teacher pertinent facts.

9. The administration, in collaboration with the other health personnel, should formulate policies and plan procedures in administering the health services that are widely accepted by health authorities.

10. The school should make a definite effort to acquaint all persons affected with the regulations regarding exclusion and readmission after communicable diseases.

11. The health services should be given in a way that will produce desirable changes in the behavior and health habits of the people served.

12. An adequate system of recording the health data accumulated should be given the time and facilities for gathering significant data.

13. The primary purpose in gathering such data should be to plan a more valuable health program for the children involved.

14. Discussion groups consisting of the teachers, principals, administrators, health specialists should be inaugurated in order to establish close cooperation among them.
15. Some plan of in-service training should be adopted by the teachers on a voluntary basis.

16. The school should include in its budget financial support for the in-service training of teachers and library facilities with sufficient scientific material and professional books and magazines to help the teachers become more efficient in understanding children.
APPENDIX

EVALUATIVE CRITERIA FOR A HEALTH SERVICE PROGRAM

The only valid evaluation of a functionalized health program is the judgment and practice which are exercised by those same people throughout adult life. Such standards were pointed out in the introduction of this study. Since such an evaluation is beyond the realm of this study, the next best method is to evaluate the school and not the child.

Since the ideal of health is the realization of the highest physical, mental, and spiritual possibilities of the individual, then the measure of success attained by a school in the development of this optimum health of its individual members will be determined by the opportunities it offers them to grow into wholesome personalities. The following list of questions is given as cues for ascertaining the educational value of the health services rendered the children of cities in the category of this study:
Does the administration provide adequate buildings?  

... proper equipment?  

... health facilities?

Is there a health certificate required of all school personnel?

Does the school employ a full-time nurse?  

Does the school employ a part-time physician?

Does the school employ a part-time dentist?

Are teachers allowed to assist in planning the policies and procedures adopted for the healthful living of the pupils?

Does the classroom teacher assume the responsibility for the daily observation of the children's health status in her room?

Is there a cumulative record for each child in the school?

Does this record provide a place for all the pertinent data needed in understanding the child?
Does each child have an opportunity to keep his own score on health improvement?  

Are health records kept where all school personnel may easily use them?  

Do teachers modify their teaching programs for pupils who suffer from some personal handicap?  

Is there sufficient reading and research material for an adequate health program on the level of teachers and pupils?  

Is there a vigorous effort made to follow up all defects detected in physical and health and dental examinations?  

Is there corrective work provided for all children whose parents are not financially able to pay for remedial work?  

Does the school offer special clubs and activities on equal basis for all students?  

Is the safety program operated as a joint responsibility of pupils and teachers?  

Is the success of the health education measured in terms of knowledge acquired?  

Or improvements in attitudes and behaviors?  

Are the needs for an in-service training determined by the teachers?
Does the school budget include the financial support of in-service training of teachers? ______  ______

Is the physical environment conducive to good mental health? ______  ______

Is the psychological environment conducive to good mental health? ______  ______

Is there a planned program to meet emergencies of sudden sickness and accidents? ______  ______

Is a written report given to the parents of each child concerning any physical effects discovered at school? ______  ______

Does the school help secure institutional care for any child whose parents are unable to pay? ______  ______

Is the lunchroom used as a laboratory for educational purposes? ______  ______

Are undernourished children unable to pay provided free lunches daily? ______  ______

Does the school recognize the importance of mental health as a prerequisite of a wholesome personality? ______  ______

Is there an organization of community health agencies and the school system whereby cooperation between the school and the community can be maintained? ______  ______
Is there a member of the school staff appointed to represent the school in the coordination of health service programs of the school and community?

Is there an interchange of information not confidential between the school and community agencies regarding pupils and their families?

Is there a friendly relation between the school health personnel and the local physicians?

Are the school health activities the result of cooperation in planning with the administrators, health specialists, classroom teachers, and pupils participating?

Are health services given with a view to achieving educational value for all the participants?

Is the emphasis placed upon the prevention of physical handicaps rather than the cure?

Is participation in all recreational activities open to all pupils of the age level or grade level for which an activity is planned?

Is supervision administered on the democratic basis of cooperation?
<table>
<thead>
<tr>
<th>Question</th>
<th>Yes</th>
<th>No</th>
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</thead>
<tbody>
<tr>
<td>Are teachers chosen because of their abilities and training?</td>
<td></td>
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<tr>
<td>Do tenure and training determine the salary of a teacher?</td>
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<tr>
<td>Does the school have a known single salary schedule?</td>
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<tr>
<td>Does the curriculum meet the individual differences of the pupils?</td>
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<tr>
<td>Is there provision made for relaxation and rest?</td>
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<tr>
<td>Do new children adjust to the school readily?</td>
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<tr>
<td>Is there any provision made for the use of school and grounds for recreational purposes after school and on Saturdays?</td>
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