THE UNIVERSITY OF OKLAHOMA

GRADUATE COLLEGE

AN EVALUATION OF ATTITUDINAL OUTCOMES OF FIFTH AND SIXTH GRADE STUDENTS FOLLOWING A PERIOD OF SCHOOL CAMPING

A DISSERTATION

SUBMITTED TO THE GRADUATE FACULTY

in partial fulfillment of the requirements for the

degree of

DOCTOR OF PHILOSOPHY

BY

GENEVIEVE CARTER STACK

Norman, Oklahoma

1960

Downloaded from SHAREOK. Persistent Handle URL: https://hdl.handle.net/11244/1455

AN EVALUATION OF ATTITUDINAL OUTCOMES OF FIFTH AND SIXTH GRADE STUDENTS FOLLOWING A PERIOD OF SCHOOL CAMPING

APPROVED BY

Earl Chapman

(illegible)

Mary Clare Petty

Virginia Harris

F. F. Haithcock

DISSERTATION COMMITTEE

ACKNOWLEDGEMENT

To Dr. Gail Shannon, chairman of the doctoral committee and director of this study, the writer wishes to express genuine gratitude for the cooperation, support, and guidance amply provided at successive stages of development of the investigation.

To the members of the committee, Dr. W. R. Fulton, Dr. F. F. Gaither, Dr. Mary Clare Petty, and Miss Virginia Morris, appreciation is expressed for their appraisals and helpful suggestions. To Dr. O. J. Rupiper, thanks are extended for his counsel regarding the design of the study.

The writer wishes to express sincere appreciation to Dr. Julian W. Smith for his assistance in establishing a locus for the study, and to Dr. Don Randall and members of the staff of Clear Lake Camp for their cooperation freely extended.

The gratitude of the writer is generous in regard to the encouragement provided by her husband, Reford B. Stack, to begin and conclude this study; to her son, Carter, for his accompaniment to the camp site and technical assistance provided, and to her son, Richard, for the inspiration and cooperation extended during the writing of this report, heartfelt thanks are expressed.

TABLE OF CONTENTS

	Page
LIST OF TABLES	v
Chapter	
I. INTRODUCTION	1
Background of the Problem	4
Statement of Problem	7
Review of Related Research	8
Limitations of the Study	13
Sources of Data	14
Definition of Terms	15
Assumptions	17
II. DESIGN OF STUDY	18
Procedures	19
Development of Instruments	21
III. ANALYSIS AND PRESENTATION OF DATA	32
Attitudes toward Classmates	33
Sociometric Test	38
Incomplete Sentences	43
Attitude toward School	47
Attitude toward Teacher	56
Attitude toward School Camping	65
Attitude toward Self	75
Attitude toward Friends	85
Summarization of Data	94
IV. SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS	105
Summary of Findings	107
Conclusions	109
Recommendations	110
BIBLIOGRAPHY	112
APPENDICES	120

LIST OF TABLES

Table		Page
1.	Procedures Followed in Design of Study	22
2.	Pretest and Posttest Responses of 77 Fifth- and Sixth-Grade Students to Concept: My Classmates	35
3.	Pretest and Posttest Mean Responses of 77 Fifth- and Sixth-Grade Boys and Girls to Concept: My Classmates	36
4.	Pretest and Posttest Mean Responses of 77 Fifth- and Sixth-Grade Students to Concept: My Classmates	37
5.	Pretest and Posttest Distribution of Sociometric Choices of 79 Fifth- and Sixth-Grade Students	39
6.	Pretest and Posttest Distribution of Sociometric Choices by Sex	40
7.	Distribution of Posttest New Sociometric Choices of 79 Fifth- and Sixth-Grade Students .	41
8.	Distribution of Posttest Sociometric Choices of 79 Fifth- and Sixth-Grade Boys and Girls ...	42
9.	Content Analysis of Responses of 24 Students in Class D to Incomplete Sentence: The Pupils in This School	44
10.	Content Analysis of Responses of 24 Students in Class D on Word Association Test to Concept: My Classmates	45
11.	Pretest and Posttest Responses of 77 Fifth- and Sixth-Grade Students to Concept: School	49

Table Page

12. Pretest and Posttest Mean Responses of 77 Fifth- and Sixth-Grade Boys and Girls to Concept: School 50

13. Number of Fifth- and Sixth-Grade Boys and Girls Marking Higher, Lower, or Same Item on Posttest Inventory of Concept: School 51

14. Pretest and Posttest Mean Responses of 77 Fifth- and Sixth-Grade Students to Concept: School 52

15. Content Analysis of Responses of 24 Students in Class D to Incomplete Sentence: This School .. 54

16. Content Analysis of Responses of Word Association Test of 24 Students in Class D to Concept: School 55

17. Pretest and Posttest Responses of 78 Fifth- and Sixth-Grade Students to Concept: My Teacher .. 58

18. Pretest and Posttest Mean Responses of 78 Fifth- and Sixth-Grade Boys and Girls to Concept: My Teacher 60

19. Pretest and Posttest Mean Responses of 78 Fifth- and Sixth-Grade Students to Concept: My Teacher 61

20. Content Analysis of Responses of 24 Students in Class D to Incomplete Sentence: My Teacher ... 62

21. Content Analysis of Responses of Word Association Test of 24 Students in Class D to Concept: My Teacher 64

22. Pretest and Posttest Responses of 78 Fifth- and Sixth-Grade Students to Concept: School Camping 67

23. Pretest and Posttest Mean Responses of 78 Fifth- and Sixth-Grade Boys and Girls to Concept: School Camping 68

24. Pretest and Posttest Mean Responses of 78 Fifth- and Sixth-Grade Students to Concept: School Camping 69

Table Page

25. Content Analysis of Responses of 24 Students in Class D to Incomplete Sentence: School Camping 70

26. Content Analysis of Responses of 24 Students in Class D to Interview Question: Reaction to School Camping 72

27. Content Analysis of Responses of 24 Students in Class D to Interview Question: Most Important Feature of Camp 73

28. Content Analysis of Responses of 24 Students in Class D to Interview Question: Best Liked Camp Activity 74

29. Pretest and Posttest Responses of 78 Fifth- and Sixth-Grade Students to Concept: Self ... 78

30. Pretest and Posttest Mean Responses of 77 Fifth- and Sixth-Grade Students to Concept: Self 79

31. Pretest and Posttest Mean Responses of 77 Fifth- and Sixth-Grade Students to Concept: Self 80

32. Content Analysis of Responses of 24 Students in Class D to Five Negative Incomplete Sentences about Concept: Self 81

33. Content Analysis of Responses of 24 Students in Class D to Five Positive Incomplete Sentences about Concept: Self 83

34. Cumulative Percentages on Content Analysis Items of Incomplete Sentences of Class D about Concept: Self 84

35. Pretest and Posttest Responses of 76 Fifth- and Sixth-Grade Students to Concept: My Friends 87

36. Pretest and Posttest Mean Responses of 76 Fifth- and Sixth-Grade Boys and Girls to Concept: My Friends 88

Table Page

37. Pretest and Posttest Mean Responses of 76 Fifth- and Sixth-Grade Students to Concept: My Friends 89

38. Distribution of Posttest New Sociometric Choices of Fifth- and Sixth-Grade Students 90

39. Distribution of Pretest and Posttest Sociometric Choices of 79 Fifth- and Sixth-Grade Students of Same and Opposite Sex 91

40. Content Analysis of Responses of 24 Students in Class D to Incomplete Sentences Relating to Friends 92

41. Pretest and Posttest Mean Responses of 78 Fifth- and Sixth-Grade Students to Inventory of Key Concepts 95

42. Total Changes in Pretest and Posttest Responses of 78 Fifth- and Sixth-Grade Students to Six Key Concepts 97

43. Pretest Aggregate Percentages of Values, Determined by Responses of 24 Students in Class D to Incomplete Sentences 98

44. Posttest Aggregate Percentages of Values, Determined by Responses of 24 Students in Class D to Incomplete Sentences 99

45. Content Analysis of Responses of 24 Students in Class D to Interview Questions 101

46. Content Analysis of Responses of 24 Students in Class D on Word Association Test 102

AN EVALUATION OF ATTITUDINAL OUTCOMES OF FIFTH AND SIXTH GRADE STUDENTS FOLLOWING A PERIOD OF SCHOOL CAMPING

CHAPTER I

INTRODUCTION

Education in and for the outdoors is a significant modern trend. A development in curriculum from its inception, outdoor education includes a variety of projects and activities ranging from excursions to school camping. Outdoor education is a broad term, including those learning experiences that make use of the physical environment in achieving the goals of education.

Since learning takes place most effectively through direct experiences, the media of natural environment, simplicity of the outdoors, and the wholeness of nature are conducive to more direct experiences and challenge the learning capacities of the students through utilization of all the senses, through participation in group-planned activities, and through exploration of the interests of the students. Proponents of outdoor education proceed under the assumption that education is the chief aim;

essential life experiences are provided in an outdoor camping experience which could not be accomplished as well, or not at all, in the classroom; every resource is employed to enable students to become better acquainted with the out of doors, their natural environment.

Present-day conditions have increased the need for outdoor education. The change in our culture from a rural society to one of city dwellers has deprived youth of the opportunity to be close to nature and the soil. Students lack the knowledge, skills, and attitudes to appreciate or enjoy the outdoors. At school, the modern student is usually exposed to science conservation and agriculture through abstractions, rather than through concrete experiences. Unless the schools provide the opportunities, the great majority of children today will not have a first-hand acquaintance with the physical universe. However, certain factors in modern life are operative in influencing participation in outdoor activities; with increased leisure time, more money at their disposal, better roads and automobiles, and better-developed natural facilities, youth and their families are able to participate in the out of doors in unprecedented numbers. Although outdoor education is developing in the school curriculum, it remains largely an unexplored and uncharted area, challenging the creativity of adventurous teachers and administrators.

Since the curriculum is the means by which the objectives of education are reached, all kinds of worth-while learning experiences, within the classroom and beyond the classroom, should be provided so that each child may be free to grow in knowledge, skills, and attitudes which contribute to human happiness and to the welfare of society. The school camp affords unique opportunities for all who attend to have successful experiences. As children participate in the activities and explore nature, they are developing valuable understandings and appreciations and are acquiring knowledge, skills, and desirable attitudes concerning the conservation of natural and human resources. In the school-camp environment, students are provided rich opportunities to make meaningful use of the democratic process through participation in activities requiring group-planning, decision-making, and evaluating, as well as sharing of essential responsibilities.

Students, through the school camp program, learn to live more effectively and happily within a small community. Attitudes developed in this medium cannot develop without affecting others: family and neighbors. Group attitudes are developed as each individual within the group acts and reacts. Contributing attitudes lying within the individual include self-respect and a sense of responsibility. Activities which contribute to the strengthening of these attitudes can be justified in a program aiming toward development of

the individual and his ability to live within our social framework.

Background of the Problem

Many problems have confronted the proponents of school camping in the initial stages of its development. Critical areas of philosophy and objectives had to be wisely propounded. Next, and sometimes concomitantly, came problems in administration, legislation, program development, and leadership. Research has lagged somewhat because of the pressures in justifying the educational implications of camping.

The objective of democratic social living is widely accepted in the camping movement; leaders in camping have urged research investigators to evaluate the outcomes to ascertain if this objective is being met.

> Possibly because of the many intangible factors involved, such as measurement of interpersonal relationships, this kind of experimental research is conspicious by its absence. In fact, one searches in vain for a body of evidence to substantiate the claims of school camping enthusiasts. The school administrator is therefore confronted with the necessity of initiating research in an attempt to answer such provocative questions as the following:
>
> Is educational camping an effective medium for meeting the objective of education?
>
> Is educational camping a unique medium for extending pupils' experiences in living together democratically?
>
> Should camping education be initiated into the school program?[1]

---

[1]William Jansen, Extending Education through Camping (New York: Outdoor Education Association, 1948), p. 9.

The 1950 Report of the American Camping Association's Research Committee issued the following statements concerning research in camping:

> Within the camping field sufficient attention has not been given to research. During recent years there has been a considerable increase in studies of the camping field, but the surface has scarcely been scratched.[1]

In an important related study made by the School-Camp Steering Committee of Camp Cuyamaca of the San Diego, California City-County Camp Commission, which was seeking to estimate certain contributions of camping, the following statements seem apropos:

> Because of the nature of the problem, it would have been pointless to seek absolutely conclusive data capable of elaborate statistical manipulation. The value of the studies presented here lies in the evidence concerning the educational potential of camping, in the guides the data furnish for future research and development of camp curriculum and camp method, and in the estimates (less precise than measurements but none the less dependable) of the results actually achieved in certain important areas.[2]

Values of camping in personality development and techniques of securing information prior to the enrollment of campers are mentioned as two specific fields of research needed at the present time, by the American Camping Association's Research Committee.[3]

---

[1]Robert E. McBride, Camping at the Mid-Century (Chicago: American Camping Association, 1953), p. 38.

[2]James Mitchell Clarke, Public School Camping (Stanford, Calif.: Stanford University Press, 1951), p. 108.

[3]McBride, op. cit., p. 38.

The Board of Education of the City of New York in cooperation with Life Camps, and with the aid of the Lindlof Camps Committee for Public School Children undertook an experiment to ascertain if camping was an effective medium for meeting the objective of education and also if camping served as a unique medium for extending pupils' experiences in living together democratically. Positive conclusions seemed to be indicated. However, a word of caution was inserted.

> Those conclusions apply to the universe of children from which the present sampling was drawn. The experimental groups are above average in intelligence. There is more research needed--research on different kinds of school populations, with different grade pupils, and with pupils of different socio-economic background.[1]

California's Pilot Project in Outdoor Education, Camp Cuyamaca, produced several suggestions for future research, while developing evidence and conclusions of significance to all communities anticipating the future development of a school-camping program.

> A most important area requiring study is the place which camping occupies in the continuity of children's education, and the means for integrating camp and classroom. Within such a study, three particular phases would deserve special attention. The first phase is the relationship between the school's health education program and the camp. The second is the relationship between the school's mental hygiene program and the camp. The third is the psychological impact of the camping experience. That this impact is powerful is well-substantiated, but the observations concerning particular changes in behavior, attitudes, and so forth, are

---

[1]Publication Committee, Board of Education, Extending Education through Camping (New York: Outdoor Education Association, 1948), p. 100.

> general, and in the scientific sense, crude. A great deal more needs to be known about the changes which take place in children, how these changes can be made favorable, and particularly how they may be continued and reinforced.[1]

Statement of Problem

The problem is: What kinds of attitudes toward selected concepts do students have following a period of school camping? Answers to the following questions will be sought.

Following a period of school camping:

1. Will there be a greater freedom of choice of companions?

2. Will there be a gain in social status for students of lowest sociometric acceptability?

3. Will there be a more positive attitude reflected toward school?

4. Will there be a more favorable attitude toward the homeroom teacher?

5. Will there be a more positive attitude toward school camping?

6. Will there be a more favorable attitude in relation to the self-concept of the camper?

7. Will there be an increase in the number of friendships formed?

---

[1]Clarke, op. cit., p. 143.

Review of Related Research

In the earlier history of school camping and outdoor education, research was somewhat limited with only a few studies beginning to appear by early 1940. Elder's[1] study in 1941 and Moore's[2] investigation in 1943 were more usual, since matters of organization and administration were of utmost concern. By 1948, school camping began to establish a place for itself, particularly in the city of New York. That year, the Board of Education published with Life Camps, Inc., the most exhaustive study, at that date, on educational camping.[3]

Scoles[4] produced a thesis describing a school camping development in the Los Angeles County schools, at about the same time that Sleight's[5] research dealing with a program

---

[1]Joseph Marcus Elder, "A Recommended Plan of Administration and Organization of a School Camp for the Lexington Junior High School, Lexington, Kentucky" (unpublished Doctor's dissertation, University of Kentucky, 1941).

[2]Harriett Brown Moore, "A Plan for the Organization of Camps as an Integral Part of the Public School System of the City of New York" (unpublished Doctor's dissertation, Teachers College, Columbia University, 1943).

[3]New York City Board of Education, "Extending Education through Camping" (New York: Outdoor Education Association with Life Camps, Inc., 1948).

[4]Robert Scoles, "A Proposed Plan of Outdoor Education Integrated with the Sixth Grade Curriculum of Los Angeles County Schools" (unpublished Master's thesis, Occidental College, 1949).

[5]Ralph H. Sleight, "An Analysis of the Program for Camping by the Long Beach City Schools" (unpublished Master's thesis, University of Southern California, 1949).

analysis of the Long Beach City Schools camps was made. In another section of the United States, Martin[1] outlined the broad development of school camping. Morrison[2] and Fowler[3] detailed procedures for instituting outdoor education and camping into the curriculum. Kranzer[4] reported on the relationship of the program of Clear Lake Camp to the elementary curriculum, while Hall[5] was more specific in outlining the importance of conservation education in a school camp program.

Documenting the development of fourteen pioneer projects in outdoor education in California is a bulletin from which emerged principles, opportunities, and policies.[6]

---

[1]Patricia Martin, "School Camping" (unpublished Master's thesis, Texas Christian University, 1949).

[2]Eleanor R. Morrison, "A Suggested Approach for Incorporating Camping and Outdoor Education in the Curriculum of University High School" (unpublished Master's thesis, Illinois State Normal University, 1950).

[3]Anita E. Fowler, "Justification, Initiation, and Organization of School Camping as a Part of Curriculum" (unpublished Master's thesis, University of Southern California, 1951).

[4]Herman Kranzer, "A Study of Clear Lake Camp's Contribution to the Elementary Curriculum" (unpublished Master's thesis, University of Michigan, 1952).

[5]William Bradford Hall, "A Use Plan for Conservation Education on Two Land Areas Reserved to the Mill Lake and Cedar Lake School Camping Group" (unpublished Master's thesis, University of Michigan, 1953).

[6]"Camping and Outdoor Education in California," Bulletin of the California State Department of Education, No. 21 (March, 1952).

By 1954, the educational implications of school camping were becoming established as substantiated in investigations such as that of Williams.[1] During the next two years, research studies began to appear in higher proportion. Analyses of programs and leadership were current topics.

The Association for Supervision and Curriculum Development, in 1954, published the results of Gilliland's comprehensive findings in the area of school camping. This important research entitled School Camping: A Frontier of Curriculum Improvement joined a helpful series of frontier developments under the sponsorship of A.S.C.D.[2] During 1949-50, Gilliland travelled 12,000 miles visiting school camps to gather information for research from which the pamphlet on school camping was developed. In the closing chapter, Gilliland states:

> Teachers as well as children benefit greatly through school camping experience. In the freedom of an outdoor setting, many teachers see their pupils in a new light. The relationship is less formal and they have many opportunities to watch children as they react to one another in living together.[3]

---

[1]John D. Williams, "A Study of Curriculum Enrichment through School Camping" (unpublished Doctor's dissertation, University of Tennessee, 1954).

[2]John W. Gilliland, School Camping: A Frontier of Curriculum Improvement (Washington, D. C.: Association for Supervision and Curriculum Development, 1954).

[3]Ibid., p. 53.

One of the important documents in the area is the publication, "Outdoor Education for American Youth."[1] The material represented the cooperative efforts and contributions of many, with Dr. Julian W. Smith serving as chairman of the Planning and Editorial Committees. In discussing and setting the need for outdoor education, these comments were made:

> We have observed personality changes for the better when city youth encounter and commune with the earth. There is no substitute for this in the city situation. Many thousands of our city youth never get the opportunity to know what communing with nature means. Sometimes research may be able to tell us more about what happens when one gets an opportunity to relate himself to his earth, but that changes do occur seem indisputable.[2]

The Association of Outdoor Education, organized in the spring of 1954 at Long Beach, California, designated a committee to prepare materials which the members believed might be helpful to California school districts in which the organization of an outdoor program was being contemplated. More than 100 school people deeply interested in realizing the purposes of the Association reviewed the contents and made valuable suggestions and contributions to the November, 1957, issue of the California Journal of Elementary Education devoted to Outdoor Education.[3]

---

[1] "Outdoor Education for American Youth," Bulletin of the National Association for Secondary-School Principals (May, 1957).

[2] Ibid., p. 15.

[3] California Journal of Elementary Education (Sacramento: California State Department of Education, November, 1957).

Walton states that objective, semiobjective and non-objective types of evaluation were used in the school camp programs studied with non-objective techniques being the type most frequently used.[1]

In research centered on developing objectives for outdoor education, Rogers listed the enrichment and integration of the curriculum; the development of improved human relations, better teacher-pupil rapport, self-reliance, and social responsibility, as being worthy goals.[2]

Craddock reports in his investigation that the following are among common reasons given for camping programs:

1. To provide meaningful first-hand experiences.
2. To permit children to live together democratically.
3. To provide a children's community with community problems, privileges, and responsibilities.
4. To broaden interests and develop new interests.
5. To help children establish status and gain a sense of belonging.
6. To provide for better pupil-teacher relationships.

Two recent educational studies underscore the importance of the social objectives in school camping. Howenstine observed several camp programs, interviewed

---

[1]Thomas W. Walton, "A Study of the Administrative Practices Used in the Operation of 30 Selected Part-Time School Camp Programs in Michigan" (unpublished Doctor's dissertation, Michigan State University, 1956).

[2]Martin Humann Rogers, "Principles and Functions of Outdoor Education" (unpublished Doctor's dissertation, Syracuse University, 1956).

[3]Arnold Clyde Craddock, "A Suggested School Camping Program for Kanawha County Sixth Grade" (unpublished Doctor's dissertation, George Peabody College for Teachers, 1955).

staff members, and used other measurement techniques in his research in which, among other conclusions, this statement is made: "The results of the objective selection showed a significantly high rating given to two of the four groups of objectives--the social objective and those objectives dealing with natural science and conservation."[1]

Hollenbeck, in her investigation dealing with a school camp whose program emphasized outdoor science experiences, listed in the findings: "The school camp was of value to the teacher in helping him identify new areas in which specific children could succeed and in which certain individuals needed help in meeting the problem of living."[2]

Limitations of the Study

All personnel associated in the development of the investigation agreed upon a qualitative study of estimation, omitting a highly structured approach, in order to be able to explore latent attitudes more exclusively. Therefore, the approach followed was one of descriptive research.

The study included the following delimitations:

1. Only one school camp group was studied.

---

[1]William L. Howenstine, "An Evaluation of Conservation Education in Relation to the Total Program of 8 School Camps" (unpublished Doctor's dissertation, University of Michigan, 1959).

[2]E. Irene Hollenbeck, "A Report on an Oregon School Camp with Program Emphasis upon Outdoor Science Experiences" (unpublished Doctor's dissertation, University of Colorado, 1956).

2. Two sixth-grade classes and two fifth-grade classes who attended camp during a given period were used to provide data for the study.

3. Three homeroom teachers and one non-homeroom teacher who accompanied class groups were subjects in the investigation.

4. The class groups engaged in a five-day period of camping.

5. The same program usually offered all camp groups was available during the week.

6. No special preparations were made with regard to any phase of the camp program before or during camp.

7. The students were not advised that an investigation was being made.

8. All tests were brief in nature, as unstructured as possible, requiring little writing.

Sources of Data

Data for the study were comprehensive and included:

1. Primary sources of data: the answers provided by the fifth- and sixth-grade students in response to test items and interviews, and information from teachers, principals, and student teachers.

2. Secondary sources of data included various types of published and unpublished research on school camps.

Definition of Terms

In order for the reader to understand the terms used in the investigation, a frame of reference for each concept has been described.

1. Evaluation. The process of determining the worth of a given individual's personality, performance, or merit, which usually depends upon data from many sources and of many varieties.[1]

2. Attitudinal outcomes. The issues, results, or consequences of changes in values, aversions, or attitudes. The widely accepted definition of an attitude as a predisposition to react favorably or unfavorably toward something, under certain conditions is used here.[2]

3. A homeroom teacher. The teacher who regularly conducts most of the classes for a specified group of students, in whose homeroom the students remain most of the school day.

4. Classmates. The members of an identified homeroom class.

5. School camping period. The five-day period of time spent from Monday morning until Friday afternoon of a

---

[1]Dennis Baron and Harold W. Bernard, Evaluation Techniques for Classroom Teacher (New York: McGraw-Hill Book Co., Inc., 1958), p. 280.

[2]Arthur W. Foshay, Kenneth D. Wann, and Associates, Children's Social Values (New York: Bureau of Publications, Teachers College, Columbia University, 1954), p. 25

given week.

6. Sociometric test. A method of evaluating the feelings of the group members toward each other with respect to a criterion.[1]

7. Star. Any individual who received more choices on a sociometric test than could be expected by chance alone.[2]

8. Isolate. This person receives no choices on a sociometric test; he is apparently isolated, if not physically, at least psychologically from other members of his group.

9. Neglectee. Any individual who receives fewer sociometric choices than could be expected by chance. Where five choices are used with respect to one sociometric criterion, any individual receiving one choice would be classed as a neglectee.

10. Mutual choice. Two persons choose each other using the same sociometric criterion.

11. Sociometric clique. A number of individuals choose each other on the same sociometric criterion, usually to the exclusion of others in the group. These cliques are sometimes referred to as subgroups.

---

[1]Norman E. Gronlund, Sociometry in the Classroom (New York: Harper and Brothers, 1959), p. 3.

[2]Urie Bronfenbrenner, "The Measurement of Sociometric Status, Structure and Development," Sociometric Monographs, No. 6 (New York: Beacon House, 1945).

12. Sociometric cleavage. A lack of sociometric choices between two or more subgroups.

Assumptions

The following assumptions pertain to this study:

1. The students of the fifth and sixth grades selected for this study have the attitudes investigated under normal distribution.

2. Students in other fifth- and sixth-grade classes will experience similar results following educational camping.

3. The selected school camp will exert an influence on campers similar to that found at other school camps.

CHAPTER II

DESIGN OF STUDY

Clear Lake Camp, Dowling, Michigan, sponsored by the Battle Creek Public Schools, has served as a base for studies in the field of school camping.[1] After observation of the administration, organization, and function of the camp program, this site was selected for the investigation.

Regularly, four class groups, usually two fifth-grade classes and two sixth-grade classes, attend camp, arriving on Monday morning and departing on Friday afternoon of a given week. The classes are customarily accompanied by their homeroom teachers. Also in attendance are student teachers, usually twelve or fourteen in number, from nearby colleges and universities for purposes of observation and laboratory experience.

A public school, whose administration was cooperative, and whose student body reflected lower-middle class socioeconomic levels, was chosen for the student sampling. At a given week, this school was scheduled to send four class groups, two fifth-grade and two sixth-grade classes,

---

[1]Kranzer, op. cit.

to Clear Lake Camp.

All classes were administered an Inventory of Key Concepts and a sociometric test making use of the Bonney-Fessenden Sociograph, before and after camping. Observation of all class groups during camp was an important factor. Case studies, records of achievement, activities, interests, and family background on about one-half the students were provided. One sixth-grade class (D) was given more intensive testing in an attempt to validate findings of the study. This class provided responses to an Incomplete Sentence Test, in a pretest and posttest, and each student was interviewed during camp. The investigator accompanied Class D on most of its pursuits. Student teachers assisted in observation, and conferences with the school principal and all four teachers were included.

Procedures

Having selected the camp site and a five-day camping period during which two fifth- and two sixth-grade classes, accompanied by four classroom teachers, could be present, as well as the investigator, an outline of procedures was carried out at three time intervals: pre-camp, during camp, and post-camp.

Pre-Camp Data Gathering

Before the four classes instituted their program of camping, certain procedures for measurement were effected.

1. The four classes were administered the Inventory of Key Concepts, including attitudes toward classmates, school, teacher, school camping, self, and friends.

2. All four classes made five sociometric choices of a work companion.

3. Twenty-four students were given the Incomplete Sentence Test, designed to reveal feelings toward or away from certain attitudes.

4. Observation of school and home environment of students, together with utilization of certain school records of ability, achievement, and socioeconomic data, was made.

5. Conferences were held with classroom teachers and student teachers for information for anecdotal records on behavior.

Data Gathering during Camp

During camp, the assistance of fourteen student teachers in attendance for observation and laboratory experience, was enlisted to observe all students and to report data. An outline of procedures included:

1. A sociograph of all four classes was prepared with a determination of stars, neglectees, and isolates. A student teacher was assigned to observe carefully each neglectee and isolate.

2. A daily conference was held with each teacher to report anecdotal or behavioral information.

3. A conference with the school principal was held to gain further information concerning home backgrounds and school records of students.

4. Interviews with twenty-four students were conducted, at which time camp evaluation questions were asked and a Word Association Test was administered.

Post-Camp Data Gathering

Upon the first day of return of the four classes to the regular school setting, certain procedures again took place:

1. All four classes were administered the Inventory of Key Concepts.

2. All four classes made five sociometric choices of a work companion.

3. Twenty-four students were given the Incomplete Sentence Test.

Table 1 presents graphically the procedures carried out in collecting the data.

Development of Instruments

Inventory of Key Concepts

Seeking an instrument which would examine attitudes to selected concepts, the investigator began a systematic study of phrases, words, and terms used by fifth- and sixth-grade students, in anticipation of the preparation of an inventory of descriptive words, from which the student could

TABLE 1

PROCEDURES FOLLOWED IN DESIGN OF STUDY

Measurement	Time Interval			Group
	Pre-Camp	During Camp	Post-Camp	
I Inventory of Key Concepts	x		x	(1) Class A-6th Grade (2) Class B-5th Grade (3) Class C-5th Grade (4) Class D-6th Grade
II Sociometric Test	x		x	(1) Class A-6th Grade (2) Class B-5th Grade (3) Class C-5th Grade (4) Class D-6th Grade
III Incomplete Sentences	x		x	(1) Class D-6th Grade
IV Interviews		x		(1) Class D-6th Grade
V Observation	x	x		(1) Class D-6th Grade
VI Selected Case Studies	x	x		(1) Class A-6th Grade (2) Class B-5th Grade (3) Class C-5th Grade (4) Class D-6th Grade
VII Ability, Achievement, Socio-Economic Data	x	x		(1) Class D-6th Grade

select those best expressing his feeling. The areas to be explored included:

1. Self
2. Teacher
3. School
4. Camp
5. Classmates
6. Friends

A study of children's literature and observation of children in conversation provided the first basis of study for the inventory. Word association tests were also examined. The results of such a test, previously administered to large groups of fifth- and sixth-grade students in a metropolitan area, were examined.[1] Consultation with a reading specialist followed,[2] at which time the list was adjudged a suitable stimulus to elicit vocabulary responses from children in the above-mentioned grades. A limited pilot study was conducted, using the word association list[3] on a group of 248 students, beginning their seventh grade of study, and who represented a range of students on whom scores of intellectual abilities were available.

---

[1]Personal conference, Dr. Virgil T. Hill, Director, Pupil Personnel, Oklahoma City Public Schools, Oklahoma City, Oklahoma, August, 1959.

[2]Personal conference, Dr. Arthur Heilman, University of Oklahoma, Norman, Oklahoma, September, 1959.

[3]See Appendix A.

An item analysis of the hundreds of words submitted by the students was then made, with the selection of those terms most commonly used being the main criterion. It was found that students more commonly react with a phrase or a group of words, rather than a word; therefore, the research design for the inventory was changed to include expressions, rather than words. The list was validated by the principal of the school and another instructor knowing the student well as being true responses of the testee.

The first inventory devised contained 12 responses for each key concept with space to record an additional response not already inserted.[1] Two hundred thirty-three students responded to this inventory which was given under test conditions. The student was requested to "underline the expression best describing your feelings or provide a more appropriate answer by writing in the blank spaces under each list; do not sign your name." Although the teacher supplied the instructions for administering the test and remained in the room for the test, it was discovered that this procedure apparently did not affect the choices of the student, who chose as frequentl, from the more negative portions of the test as from the positive portions.

In an item analysis for clustering of the responses, quite satisfactory results accrued from the initial testing. In four of the six inventories, very little or no revision

---

[1]See Appendix B.

was necessitated. Students supplied additional responses in the blanks provided, which were of value and some of which were incorporated in revision.

The revised form of the inventory contained six key concepts with ten choices of expressions provided for each, numbered from one to ten. In order to expedite the administration of the test, students were requested to "encircle the number of the expression which best describes your feelings." As quickly as the student could read and render a judgment, he was urged to do so.

These tests were given prior to and immediately after the school camping period by the student teacher.

It was expected that individual and group analyses would be made, with a frequency distribution of the types of responses being made.

Sociometric Test

Criteria for the sociometric tests selected required ease of administration and facility in tabulation, as well as in interpretation. It was found that the Bonney-Fessenden Sociograph, while incorporating the desirable requisite features of sociometric testing, was also designed to simplify the recording and interpreting of the data.[1] The Sociograph contains on the page of a specially-printed manila folder

[1]Merl E. Bonney and Seth A. Fessenden, Manual, Bonney-Fessenden Sociograph (Los Angeles, Calif.: Test Bureau, 1955).

all of the space and instructions necessary to record, summarize, interpret, and utilize sociometric information for groups up to forty in number. In addition, answer slips are provided to save time and labor in collecting and recording sociometric responses.[1] Another distinguishing feature of the Sociograph is making readily discernible mutual choices of the group.[2]

Formulation of sociometric criteria had to be carefully considered. Since group work was engaged in by the experimental group and since both the pretest and posttests were given in the actual school situation, it was decided to use an open-ended question, one on which a follow-up in the regular classroom could be made: "Which other students would you like to work with on an oral report to the class or on a unit in social studies?"

In sociometry, this question, commonly used, could be referred to as a "work companion" choice.[3] General criteria based on the more permanent aspects of the group structure tend to provide the most stable and generally useful result.[4] Such criteria as work companion, play companion, and seating companion have provided measures of

---

[1] Ibid., p. 2.

[2] Norman E. Gronlund, Sociometry in the Classroom (New York: Harper and Brothers, 1959), p. 81.

[3] Ibid., p. 137.

[4] Ibid., p. 45.

group structures that changed very little over a period of several months.[1]

Since students in this school have frequently taken tests, no special attention needs were required in the administration of the sociometric tests.[2] Because spontaneity was essential, the students were given answer slips from the Sociograph, and a class roll on which each student was given a number, with instructions to mark the numbers of five choices of work mates. The tests were administered by a student teacher prior to the school camping experience, as the students arrived.

The question of how many choices to allot had to be considered. Experience has shown that from the third grade on, five choices can be made without difficulty.[3] Since studies have also reported that five choices provide the most stable sociometric results,[4] this number was selected.

---

[1]U. Bronfenbrenner, "A Constant Frame of Reference for Sociometric Research," Part II, "Experiment and Inference," Sociometry, VII (1944), 40-45.

[2]Gronlund, op. cit., p. 51.

[3]Ibid., p. 48.

[4]Norman E. Gronlund, "Generality of Sociometric Status over Criteria in the Measurement of Social Acceptability," Elementary School Journal, LVI (1955), 173-76; Norman E. Gronlund, "The Relative Stability of Classroom Social Status, with Weighted and Unweighted Sociometric Status Scores," Journal of Educational Psychology, XLVI (1955), 345-54; Norman E. Gronlund and F. P. Barnes, "The Reliability of Social-Acceptability Scores Using Various Sociometric-Choice Limits," Elementary School Journal, LVII (1956), 153-57.

Following the camping period, on Monday, the first day of return to the regular classroom, students again made choices, using the same sociometric criteria, and a second sociograph was prepared for each group. The student teacher again administered the tests.

Individual and group analyses to determine number of choices given, number of choices received, and number of new choices made in the posttest formed the basis of this portion of the study.

Sentence Completion

In searching through the literature for relatively unstructured methods of exploring attitudes, one came frequently across references to the incomplete sentence test, or as more usually called, a Sentence Completion Test. Its advantages lie in the greater specificity of elicited associations made possible by the directionality of the introductory phrase.[1] The advantage of specificity in probing is present by the introduction of key stimuli.[2]

In 1930, Tendler produced the Emotional Insight Test, which in essence served as a revolt against conceived tests which have heretofore presented rigidity through "yes" and "no" answers, or possessed non-directionality as evidenced by the word-association test. Critics of Tendler's

---

[1]Robert M. Allen, Personality Assessment Procedures (New York: Harper and Brothers, 1958), p. 298.

[2]Ibid., p. 299.

study found themselves agreeing with his general conclusion: "Clinically the instrument has been found to be of value as a device for eliciting attitudes, trends, and significant clues to be followed up by further questioning."[1]

Numerous sentence completion tests arrive at somewhat the same conclusions, notably: The V-A Sentence Completion Test,[2] The Rohde Sentence Completion Test,[3] the Forer Structured Sentence-Completion Test,[4] the Rotter Incomplete Sentence Blanks,[5] and the Holsapple-Meale Sentence-Completion Test.[6]

As Allen concludes in his chapter entitled "The Association Method," "No matter where the association techniques may be placed in the ladder of 'projectiveness,' they do make known to the clinician some aspects of the personality

---

[1]A. D. Tendler, "A Preliminary Report on a Test for Emotional Insight," Journal of Applied Psychology, XIV (1945), 123-236.

[2]Morris I. Stein, "The Use of a Sentence Completion Test, for the Diagnosis of Personality," Journal of Clinical Psychology, III (1947), 47-57.

[3]Amanda R. Rohde, The Sentence Completion Method (New York: Ronald Press, 1957).

[4]B. R. Forer, "A Structured Sentence Completion Test," Journal of Projective Techniques, XIV (1950), 15-29.

[5]Julian B. Rotter and J. E. Rafferty, The Rotter Incomplete Sentence Test (New York: The Psychological Corp., 1950).

[6]James Q. Holsapple and Florence R. Meale, Sentence Completion (Springfield, Ill.: Charles C. Thomas, 1954).

and its dynamics not readily elicited by other devices."[1]

The Andersons state that on an a priori basis, the incomplete sentence method seems well suited to the study of social attitudes.[2] It seems a feasible method for the study of group attitudes and opinions. The fact that it can be administered to a group and still retain many of the individualistic advantages of the projective tests suggests that it can be profitably employed in many areas as yet untapped.[3]

A modified form of the group of incomplete sentences developed by Strang[4] and used on several hundred fifth-grade students in a large city was examined.[5] A pretest of these items was given to a select group of students in the sixth grade, who correspondingly gave freely answers of significance. The Strang list was accepted for use along with necessary modifications for testing purposes for this particular study.

In order to adapt the instrument for use with the school camp group, items such as the following were added:

---

[1]Allen, op. cit., p. 318.

[2]Harold H. Anderson and Gladys L. Anderson, An Introduction to Projective Techniques (Englewood Cliffs, N. J.: Prentice-Hall, Inc., 1951), p. 308.

[3]Ibid., p. 310.

[4]Ruth M. Strang, The Adolescent Views Himself (New York: McGraw-Hill Book Co., Inc., 1957), p. 86.

[5]Oklahoma City Public Schools, Oklahoma City, Oklahoma.

My teacher . . .

My new friends . . .

School camping . . .

The pupils in this school . . .

My family . . .

My best friend . . .

This school . . .

Our principal . . .

Group work . . .

In its final form, the incomplete sentence test[1] used the following directions: "Complete these sentences to express your real feeling. Try to do every one. Be sure to make a complete sentence." The pretest was administered by one student teacher to Class D in its regular classroom on Thursday preceding school camping, and the posttest on the Monday following school camping.

It was expected that a content analysis of the responses would yield data which would serve to validate answers on the sociometric tests and the inventory. In this way, the total tests would serve as an integrating force, with factors incorporated in each of the three instruments which would serve to establish reliability as well as validity for the data revealed in all three tests.

---

[1]See Appendix C.

CHAPTER III

ANALYSIS AND PRESENTATION OF DATA

Educators are seeking to include in the curriculum meaningful experiences for all youth which will result in attitude development which promotes depth of character and wholesome human relationships. The out of doors, considered the most wholesome and natural of environments, is being utilized increasingly by school personnel for developing proper attitudes. A climate for learning, enriched with direct laboratory experiences, such as outdoor education can provide, is conducive to attainment of attitudes and insights concerning relationships for work and play. A favorable school camping environment has pointed the way to acquisition of certain learnings and attitude development.

This investigation is concerned with the development of attitudes, following a school camping experience, toward the selected concepts of:

1. Classmates
2. School
3. Teacher
4. School camping

5. Self

6. Friends

Attitudes toward Classmates

Educational camping leaders have observed that students appear to accept other classmates more readily following a period of camping. In order to test this hypothesis, a series of measurement procedures was instituted:

1. The Inventory of Key Concepts was administered, pretest and posttest, to all four class groups.

2. The Bonney-Fessenden Sociograph was used in each of the four class groups, before and after camp.

3. Incomplete Sentence Tests were administered Class D (Grade 6) in a precamp and postcamp session, to validate the findings of the other measurements.

4. Interviews of Class D were held to discover supporting evidence.

5. Case studies on thirty-six students were employed.

6. Observation of all campers served as supporting data.

Inventory of Key Concepts

The Inventory of Key Concepts contained ten selections for the concept: My classmates, which included these items:

My classmates

1. are hateful
2. are rude
3. are unfriendly
4. are proud
5. are okay
6. are friendly
7. are very friendly
8. are a bunch of friends
9. mean happiness
10. are all good kids

All four class groups were administered the Inventory before and after camping. In each class group, a tabulation was made of the number of students who encircled each item, which had a weight corresponding to the numerical value of the item. Then, a mean score was devised for the respective classes. As the mean approached 10, the more positive attitude was indicated. The distribution of answers is presented in Table 2.

The three most common expressions of all four class groups were:

1. Item 5: My classmates are okay.
2. Item 7: My classmates are very friendly.
3. Item 10: My classmates are all good kids.

On both pretest and posttest, 29 students, or 38 per cent,

TABLE 2

PRETEST AND POSTTEST RESPONSES OF 77 FIFTH- AND SIXTH-GRADE STUDENTS TO CONCEPT: MY CLASSMATES . . .

Item My Classmates	Class A-6				Class B-5				Class C-5				Class D-6				Total Responses	
	Pretest		Posttest		Pretest		Posttest		Pretest		Posttest		Pretest		Posttest			
	B	G	B	G	B	G	B	G	B	G	B	G	B	G	B	G*	Pre.	Post.
1. are hateful	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0
2. are rude	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	1	0	2
3. are un-friendly	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
4. are proud	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	1	0
5. are okay	2	2	3	3	3	1	4	3	2	1	3	1	2	3	1	3	16	21
6. are friendly	0	1	0	4	1	2	0	1	0	0	1	0	1	5	2	0	10	8
7. are very friendly	4	2	0	1	3	3	2	0	1	0	0	1	1	0	0	3	14	7
8. are a bunch of friends	1	0	2	0	0	1	2	0	0	1	1	1	1	2	2	1	6	9
9. mean happiness	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	1
10. are all good kids	2	5	4	3	6	2	5	4	5	2	4	0	4	3	4	5	29	29
Total Answers	9	11	9	11	13	9	13	9	9	4	9	4	9	13	9	13	77	77
Mean	7.33	7.36	7.89	6.91	7.85	7.33	7.61	6.78	7.89	8.25	7.67	7.25	7.89	7.77	8.11	7.38		
Class Mean	7.35		7.35		7.64		7.41		8.07		7.54		7.36		7.68			
Group Mean																	7.55	7.49

*B = Boys; G = Girls.

scored Item 10. However, the group mean is Item 7.

A decrease is noted in the group mean from 7.55 to 7.49 for all classes, showing a change of direction of attitude away from the concept.

For purposes of analyses of the differences in responses by members of the opposite sex, the data are presented in Table 3.

TABLE 3

PRETEST AND POSTTEST MEAN RESPONSES OF 77 FIFTH- AND SIXTH-GRADE BOYS AND GIRLS TO CONCEPT: MY CLASSMATES . . .

Class	Grade	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A	6				
Boys		7.33	7.89	x	
Girls		7.36	6.91		x
B	5				
Boys		7.85	7.61		x
Girls		7.33	6.78		x
C	5				
Boys		7.89	7.67		x
Girls		8.25	7.25		x
D	6				
Boys		7.89	8.11	x	
Girls		7.77	7.38		x

It may be noted that all four girls' groups showed a change of attitude in a more negative manner toward the concept; however, both sixth-grade boys' groups showed a

fairly substantial gain in attitude toward the concept.

The mean responses of the four grades are tabulated for comparison in Table 4.

TABLE 4

PRETEST AND POSTTEST MEAN RESPONSES OF 77 FIFTH- AND SIXTH-GRADE STUDENTS TO TO CONCEPT: MY CLASSMATES . . .

Class	Grade	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A	6	7.35	7.35	--	--
B	5	7.64	7.41		x
C	5	8.00	7.54		x
D	6	7.36	7.60	x	
Group Mean		7.55	7.49		X

Summary

The four classes as a group failed to show a more positive change of attitude toward classmates following camping. One sixth-grade class showed an increase while both fifth-grade classes showed losses. Sixth-grade class groups scored higher than fifth-grade groups in a more positive attitude toward classmates, following school camping.

Sociometric Test

Although a sociometric test may have numerous variations, it is basically a method of evaluating the feelings of the group members toward each other with respect to a common criterion.[1] The sociometric test chosen was the Bonney-Fessenden Sociograph, for which answer slips were provided all 88 students, on which they were to encircle the numbers given to five classmates as a choice of work-companion in a precamp selection. After the choices were recorded on the Sociograph, a matrix table was made for each class. Scores of 5 indicated first choice; 4, second choice; three, third choice; two, fourth choice; and one, fifth choice.

Matrix tables were prepared for the pretest and post-test choices of a work-companion and are found in the Appendix.[2]

The method of classifying pupils into sociometric categories followed one proposed by Bronfenbrenner:[3]

Category	Number of Choices Received
Star	9 - up
Above Average	5 - 8
Below Average	2 - 4
Neglectee	1
Isolate	0

[1]Norman E. Gronlund, Sociometry in the Classroom (New York: Harper and Brothers, 1959), p. 81.

[2]See Appendix E.

[3]Gronlund, op. cit., p. 65.

TABLE 5

PRETEST AND POSTTEST DISTRIBUTION OF SOCIOMETRIC CHOICES OF 79 FIFTH- AND SIXTH-GRADE STUDENTS

Class	Star		Above Average		Below Average		Neglectee		Isolate	
	Pre-test	Post-test	Pre-test	Post-test	Pre-test	Post-test	Pre-test	Post-test	Pre-test	Post-test
A (6)										
Boys	1	1	4	4	3	4	0	0	0	0
Girls	0	0	3	4	7	4	1	2	1	2
Total	1	1	7	8	10	8	1	2	1	2
B (5)										
Boys	3	1	5	9	4	2	1	2	1	1
Girls	0	2	4	2	5	2	1	2	0	1
Total	3	3	9	11	9	4	2	4	1	2
C (5)										
Boys	1	2	5	1	4	3	0	2	2	3
Girls	0	1	3	2	1	1	0	0	0	0
Total	1	3	8	3	5	4	0	2	2	3
D (6)										
Boys	0	0	4	4	5	3	0	1	0	1
Girls	3	3	3	3	5	5	2	3	2	0
Total	3	3	7	7	10	8	2	4	2	1
Total	8	10	31	29	34	24	5	12	6	8
Per Cent	9	12	37	35	40	30	6	14	8	9

Pretest and posttest responses are revealed in the data shown in Table 5. It can be seen from the posttest that there is the same number of students in the combined Star and Above Average groups as in the pretest; there is a decrease in the Below Average group, with an increase in the Neglectee and Isolate groups, showing that students tended to drop from a Below Average rating to an even lower sociometric rating.

Choices of Sex

In analyzing the columns of choice, Opposite Sex and Same Sex in the matrix tables on distribution of sociometric choices in pretests and posttests of all four classes, Table 6 was developed.

TABLE 6

PRETEST AND POSTTEST DISTRIBUTION OF SOCIOMETRIC CHOICES BY SEX

Class	Grade	Pretest				Posttest			
		Opposite Sex		Same Sex		Opposite Sex		Same Sex	
		No.	%	No.	%	No.	%	No.	%
A	6	6	6	94	94	11	11	89	89
B	5	8	7	109	92	7	6	107	94
C	5	15	19	65	81	16	11	57	89
D	6	8	6	116	94	15	13	105	87
Total		37		384		49		358	
Per Cent			9		91		14		86

The total number of choices of Opposite Sex rose from 37 to 49, with a percentage change of from 9 to 14. Following camp, the number of Opposite Sex choices of the two sixth grades rose from 14 per cent to 26 per cent, while the per cent of Opposite Sex choices for the two fifth grades remained at 23 for both pretests and posttests. Apparently, sixth-grade boys and girls chose members of the opposite sex more frequently following a period of school camping than do fifth-grade students.

New Choices

There appeared to be freedom of new choices by all four class groups, when postcamp choices were presented in Table 7.

TABLE 7

DISTRIBUTION OF POSTTEST NEW SOCIOMETRIC CHOICES OF 79 FIFTH- AND SIXTH-GRADE STUDENTS

Class	Grade	Number of New Choices											
		0		1		2		3		4		5	
		No.	%	No.	%	No.	%	No.	%	No.	%	No.	%
A	6	1	5	9	45	6	30	2	10	2	10	0	0
B	5	3	13	7	30	6	27	5	20	2	10	0	0
C	5	4	27	3	20	6	40	2	13	0	0	0	0
D	6	1	4	5	21	10	42	4	17	0	0	1	4
Total		9	13	24	29	28	35	13	15	4	5	1	4

Judging from the data presented, there was an apparent redistribution of choices following the camping program. The range of new choices was from one to five choices. Only one person indicated five new choices, however. A median of 1.61 new choices was scored by all four groups.

In the matter of the total number of students making new choices, the following classifications occurred as seen in Table 8.

TABLE 8

DISTRIBUTION OF POSTTEST SOCIOMETRIC CHOICES OF 79 FIFTH- AND SIXTH-GRADE BOYS AND GIRLS

Class	New Choices		No New Choices	
	Boys	Girls	Boys	Girls
A (6)	9	10	0	1
B (5)	11	9	2	0
C (5)	9	2	2	2
D (6)	8	13	1	0
Total	37 (71)	34	5 (8)	3
Per Cent	88	92	12	8
Mean	90		10	

A high proportion of both boys and girls made new choices of a Work Companion, with the girls making 4 per cent more choices than boys. Sixth-grade students made more

new sociometric choices than fifth-grade students, with only one new student in each of the sixth grades failing to do so.

It appears that in spite of the fact that the sociometric status of Work Companion for boys and girls does not vary considerably following a period of school camping, a high percentage (90) of all class groups do make new sociometric choices.

Students in the sixth grades chose members of the opposite sex more frequently following a period of school camping, as well as making 10 more new sociometric choices than fifth-grade students. Boys in all four class groups made more new sociometric choices than girls, by about 22 per cent. Boys in the sixth-grade class had greater freedom of choice than fifth-grade boys, while sixth-grade girls also made more new sociometric choices than fifth-grade girls.

Incomplete Sentences

The Incomplete Sentence Test was given to 24 sixth-grade students (Class D) for interpretative data to support the other instruments used in the study.

In a content analysis of the answers provided on pretest and posttest to the following incomplete sentence, Item 7, "The pupils in this school . . ." the percentage of answers varied in the following manner, as presented in Table 9.

TABLE 9

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D TO INCOMPLETE SENTENCE: THE PUPILS IN THIS SCHOOL . . .

Pretest	Per Cent	Posttest	Per Cent
Pleasant associations	83	Pleasant associations	71
Uncertain	8	Uncertain	8
Other	9	Negative	4
		No response	17

A direction of change away from the concept is apparent, there being a loss in pleasant association of 12 per cent, while 4 per cent were more negative and 17 per cent did not respond. The item used, "The pupils in this school," was Number 17 in the list of 25 Incomplete Sentences and because of its numerical placement, students may have tended to omit responses on the posttest.

Interview

At the close of camp during an interview of 24 sixth-grade students asked to name the most important feature of camp, the higher percentage rating (29 per cent) was entitled "Getting better acquainted." The next highest percentage for an answer was 13 for "Nature study," while 21 per cent declared they had made new friends and 8 per cent stated they had learned to get along better with people.

Students were asked during the interview to respond to the word, "Classmates," as a part of the Word Association Test. Answers determined in a content analysis are given in Table 10.

TABLE 10

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D ON WORD ASSOCIATION TEST TO CONCEPT: MY CLASSMATES . . .

Item	No. of Responses	Per Cent
Acceptance Friends (6) Like (3) Fun (2) O.K. (2) Group (1) Nice (1)	15	63
Possession My class (2) Mine (1)	3	13
Identification Boys-Girls (1) Girls (1) Boys (1) Named Identification (1)	4	17
Negative Grouchy (1)	1	4
No Response	1	4

Observations

Four girls whose family backgrounds represented a somewhat higher level of socioeconomic background appeared to dominate the acceptability rating for Class D. These

students received from 8 to 12 choices each, from both boys and girls in their class. The stage of maturity, as exhibited by this clique of girls, in the star group, was more pronounced than for any other children in the class.

Seven out of the 13 students, or 54 per cent of the neglectee-isolate group, were new to the school, having attended less than eight weeks. Six students, or 45 per cent of the group, were of different racial background; five of the students were Negroes and one was of Swedish-Irish extraction. Although all of their case histories represented a complication of factors, six of the students showed marked symptoms of basic insecurity stemming from broken homes. One student, whom counselors observed to be failing to adjust to camp life, actually acquired one sociometric choice in the posttest, raising his rating from an isolate to a neglectee. Although the sociometric tests themselves reveal little or no change in status, observations of the students under consideration bear out a feeling of growing acceptance, even though it is somewhat limited.

Summary

Students in the four classes observed rated the concept of My classmates high on both pretests and posttests; however, according to the inventory and sociometric measurement, students do not change to a more positive feeling toward classmates in general following camping. Both sixth-

grade boys' groups showed a slight positive change of attitude.

Of all four classes, 90 per cent made new postcamp sociometric choices. Students in the sixth grade made more sociometric choices in general, and more sociometric choices of the opposite sex.

Information disclosed in the interview and through observation revealed a growing acceptance by classmates of students in the lower sociometric groupings.

Attitude toward School

A subject of inquiry in the minds of educational interrogators concerns the attitudes of students of the fifth- and sixth-grade level about school. Leaders in school camping have proposed camping as a frontier in curriculum development which appeals to the interests of the student as a laboratory experience for direct learning. An integration between the school and camp curriculum is being sought.

To explore the attitudes of the students toward school, the following measurements were instituted:

1. Inventory of Key Concepts, administered to all four classes in pretests and posttests.

2. Incomplete Sentence Test, given before and after camp to 24 sixth-grade students, for validation of responses to the Inventory.

3. Interview of Class D, for supporting evidence.

4. Observation of all students.

Inventory of Key Concepts

In pretests and posttests all four classes were asked to circle one number opposite the group of words which best described their feelings about the topic. Regarding the concept School, the students had these choices:

School

1. is terrible
2. means trouble
3. usually means work
4. is okay, sometimes
5. is usually okay
6. is a good place
7. is a very nice place
8. is more fun now
9. is a cheerful spot
10. is the place I like best

Responses to the concept were tabulated and a mean score devised for each class. Pretest and posttest results are given in Table 11.

In the pretest, items number 5 and 6 were most frequently encircled; item 5 states, "School is usually okay," while item 6 states, "School is a good place." The scores remained relatively stable on the posttest with item 5 again encircled most frequently.

TABLE 11

PRETEST AND POSTTEST RESPONSES OF 77 FIFTH- AND SIXTH-GRADE STUDENTS TO CONCEPT: SCHOOL . . .

Item School	Class A-6				Class B-5				Class C-5				Class D-6				Total Responses	
	Pretest		Posttest		Pretest		Posttest		Pretest		Posttest		Pretest		Posttest			
	B	G	B	G	B	G	B	G	B	G	B	G	B	G	B	G*	Pre.	Post.
1. terrible	0	1	2	0	3	0	2	0	0	0	0	0	0	0	1	0	4	5
2. trouble	0	0	0	1	0	0	0	0	0	0	0	0	0	1	0	0	1	1
3. work	0	0	0	0	1	2	1	2	1	0	1	0	0	0	1	0	4	5
4. okay sometimes	2	3	0	1	2	2	2	1	2	0	1	0	4	1	4	3	16	12
5. usually okay	3	4	2	4	1	4	1	4	1	1	3	0	1	2	1	3	17	18
6. a good place	1	2	2	2	1	1	1	1	2	2	0	1	1	3	0	1	13	8
7. very nice place	1	0	2	0	0	0	2	0	0	0	1	1	2	1	1	0	4	7
8. more fun now	0	0	0	1	2	0	2	1	0	0	0	0	0	3	1	1	5	6
9. cheerful spot	1	0	1	0	1	0	1	0	1	1	1	1	1	1	0	2	6	6
10. place I like best	1	1	0	2	2	0	1	0	2	0	2	1	0	1	0	3	7	9
Total Answers	9	11	9	11	13	9	13	9	9	4	9	4	9	13	9	13	77	77
Mean	5.90	5.10	5.20	6.00	7.40	4.50	7.40	4.75	6.50	6.50	6.44	8.00	5.56	6.43	4.44	6.86		
Class Mean	5.50		5.78		5.00		4.68		6.38		6.92		6.04		5.86			
Group Mean																	5.73	5.78

*B = Boys; G = Girls.

Two class groups scored higher and two class groups scored lower, with the lowest class score on both pretest and posttest being made by Class C, a fifth grade, with a class average of 4.68. In the regular school setting, this fifth-grade class of 16 members shared a homeroom with 16 members of a fourth-grade class. This may have been a contributing factor to the generally low regard for school shared by this class.

In pursuing the hypothesis that boys dislike school at this age more than girls, the following analysis was prepared by figuring a cumulative score for each sex, then deriving a class mean. Results are presented in Table 12.

TABLE 12

PRETEST AND POSTTEST MEAN RESPONSES OF 77 FIFTH- AND SIXTH-GRADE BOYS AND GIRLS TO CONCEPT: SCHOOL . . .

Class	Grade	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A	6				
Boys		5.90	5.20		x
Girls		5.10	6.00	x	
B	5				
Boys		7.40	7.40	-	-
Girls		4.50	4.75	x	
C	5				
Boys		6.50	6.44		x
Girls		6.50	8.00	x	
D	6				
Boys		5.56	4.44		x
Girls		6.43	6.86	x	

From this chart, it can be deduced that girls in all four classes showed a gain in attitude toward school. The average gain, per class, for fifth- and sixth-grade girls was .52, which could be considered of importance. One of the fifth-grade classes, Class B, had exactly the same tally on each test, precamp and postcamp, for boys, while the other class groups showed a direction of change away from the concept.

It is of importance that of 43 boys reporting on the posttest, four of the boys marked Item 1, School is terrible. One boy changed from a previous high score of 10 on the pretest to a score of 1 on the posttest. This affected the total scores for boys, adversely. A tabulation was made of boys' and girls' scores to see how many individuals marked the same item, or a lower or higher item. The results are shown in Table 13.

TABLE 13

NUMBER OF FIFTH- AND SIXTH-GRADE BOYS AND GIRLS MARKING HIGHER, LOWER, OR SAME ITEM ON POST-TEST INVENTORY OF CONCEPT: SCHOOL . . .

No. Marking	Boys		Girls	
	No.	Per Cent	No.	Per Cent
A lower item	11	26	3	8
The same item	19	44	22	61
A higher item	13	30	11	31

The scores indicated a perceptible gain for boys with 30 per cent marking a higher item in contrast to 26 per cent marking a lower item, the difference being 4 per cent reflecting more positive attitude. Only three girls, or 8 per cent, marked a lower-scaled item on the posttest than previously, with 31 per cent marking a higher-scaled item. General stability is noted in the 61 per cent score achieved for girls marking the same item.

An analysis of responses by classes on pretests and posttests can be seen in Table 14.

TABLE 14

PRETEST AND POSTTEST MEAN RESPONSES OF 77 FIFTH- AND SIXTH-GRADE STUDENTS TO CONCEPT: SCHOOL . . .

Class	Grade	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A	6	5.50	5.65	x	
B	5	5.00	4.68		x
C	5	6.38	6.92	x	
D	6	6.04	5.86		x
	Average	5.73	5.78	X	

One fifth-grade class and one sixth-grade class showed a change of direction toward the concept, while the

other fifth grade and the other sixth-grade class showed a change of direction away from the concept. There was a total difference of .08, in change of direction toward the concept, which appears to be so slight as to be of doubtful importance.

Boys, as a group, have a lower regard for school, postcamp, than girls in both fifth and sixth grades. Girls tend to change to a more positive attitude toward school following a camping period. Although the average for the boys' group shows a change of attitude away from school, the evidence from boys' scores tallied individually does not support this loss.

The inventory reveals the generally low regard for school shared by fifth- and sixth-grade students, both before and after camp.

Incomplete Sentences

In order to gain supporting data for the Inventory, 24 sixth-grade students were asked to write answers to 25 stimuli on the Incomplete Sentence Test, pretest and posttest. In response to the stimulus, This school, the answers of 24 students were tallied and are revealed in Table 15.

These students failed to register a difference in change of attitude toward or away from school. One boy, scoring the highest on the California Mental Maturity Test, a score of 141, wrote on the posttest, "School is hateful."

TABLE 15

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D TO INCOMPLETE SENTENCE: THIS SCHOOL . . .

Pretest	Per Cent	Posttest	Per Cent
Pleasant Association	71	Pleasant Association	71
Uncertain	4	Uncertain	4
Description	4	Negative	4
Needs	4	No Response	21
No Response	21		

He showed evidence of being required to do a considerable amount of work at school, judging from other comments.

The high percentage (21) of "No response" listed in both pretest and posttest may be attributed to the fact that this item was placed in Position 22 on the list of 25 incomplete sentences. Slow learners were not able, or did not choose, to finish all answers, on both pretests and posttests.

Interviews

In order to gain insight into the attitudes of students toward school, 24 sixth-grade students were interviewed, during which they were asked to respond to a Word Association Test. One of the items on the test was School.

In telling orally of their feelings toward school, the students gave more clues as to their identification with the concept during the taped interviews. Table 16 is a

summary of interview responses.

TABLE 16

CONTENT ANALYSIS OF RESPONSES OF WORD ASSOCIATION TEST OF 24 STUDENTS IN CLASS D TO CONCEPT: SCHOOL

Concept: School	No. of Responses	Per Cent
Positive Association Like (6) Fun (3) O.K. (3) Pretty good (1) All right (1) Enjoyment (1)	15	63
Concept Learn (1) Work (5)	6	25
Identification My school (1) Named (1) Home (1)	3	13

On the whole students accepted school positively with almost half of the students expressing a range of feeling of contentment to enjoyment.

Summary

As an attitude, students do not regard school in a highly favorable manner, either before or after camping. The average feeling shared by all campers, as indicated by the Inventory of Key Concepts, is "School is usually okay." Girls tend to consider school more positively than boys, following a period of school camping, although boys as

individuals tend to change positively in attitude toward school to a small degree. The general average for the boys reflected a slight change of attitude away from school, possibly due to the fact that 9 per cent of the boys changed widely from a previously high positive score on the pretest to a much lower negative score on the posttest. This caused the general average for the boys' groups to be lower.

Attitude toward Teacher

One of the broadest claims of protagonists of school camping programs is the increased rapport that apparently exists between student and teacher during and after camp. It is conceivable that since students can be associated with their teachers in a 24-hour classroom in camp, with many of the pressures of home and school removed, a more favorable interaction might occur. Teachers would have the opportunity to see students in a different atmosphere and could discover certain differences more readily, also.

Evidence to test this claim was collected by means of:

1. The Inventory of Key Concepts, administered to all four class groups, pretest and posttest.

2. Written answers of Class D to the Incomplete Sentence Test, pretest and posttest, to provide supporting evidence.

3. Observation of all classes during camp.

4. Interview of Class D, for validation of responses on previous measurement devices.

Inventory of Key Concepts

All four class groups, 88 students, were administered pretests and posttests of the Inventory of Key Concepts, of which the third topic was My teacher. Students encircled one number opposite the group of words best describing their feelings about that topic. Choices allowed were:

My teacher

1. is grouchy
2. is okay
3. is usually nice
4. is always nice
5. is my friend
6. is helpful
7. is very helpful
8. is a good guy
9. is wonderful
10. understands me

Table 17 presents the responses given on the pretests and posttests of the concept: My teacher.

Here again, it may be observed that in the pretest Class B, a fifth-grade class, scored lowest in regard to feelings about My teacher; this group also scored lowest in regard to feelings about School. The most common expressions

TABLE 17

PRETEST AND POSTTEST RESPONSES OF 78 FIFTH- AND SIXTH-GRADE STUDENTS TO CONCEPT: MY TEACHER . . .

Item My Teacher	Class A-6				Class B-5				Class C-5				Class D-6				Total Responses	
	Pretest		Posttest		Pretest		Posttest		Pretest		Posttest		Pretest		Posttest			
	B	G	B	G	B	G	B	G	B	G	B	G	B	G	B	G*	Pre.	Post.
1. grouchy	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	2
2. okay	1	1	2	1	5	0	2	0	0	0	1	0	2	2	3	2	11	11
3. usually nice	1	1	0	0	1	1	1	1	2	1	1	0	1	0	0	0	8	3
4. always nice	1	1	1	3	2	2	1	2	0	0	2	0	2	1	0	0	9	9
5. my friend	1	2	1	0	0	0	0	0	2	0	0	0	0	1	0	0	6	1
6. helpful	0	1	1	1	0	1	0	1	1	0	1	0	0	0	0	0	3	4
7. very helpful	2	1	1	1	2	2	2	2	0	0	1	0	2	0	0	0	9	7
8. good guy	2	0	1	0	1	0	0	0	0	0	0	0	1	5	4	7	9	12
9. wonderful	0	0	1	2	2	2	2	0	2	2	2	3	1	3	1	4	12	15
10. understanding	1	4	1	3	0	1	3	3	2	1	1	1	0	2	1	1	11	14
Total Answers	9	11	9	11	13	9	13	9	9	4	9	4	9	14	9	14	78	78
Mean	5.78	6.82	5.89	6.73	4.70	6.56	5.78	6.78	6.10	7.75	6.60	9.25	5.11	7.14	6.33	7.43		
Class Mean	6.30		6.40		5.45		6.18		6.77		7.00		6.26		7.09			
Group Mean																	6.26	6.67

*B = Boys; G = Girls.

encircled by students on the pretest were:

1. Item 2, "My teacher is okay."
2. Item 9, "My teacher is wonderful."
3. Item 10, "My teacher understands me."

The mean response, however, was Item 6, "My teacher is helpful," with the same item being the mean on the posttest, although a gain of .41 is in evidence in a more positive attitude toward My teacher.

A steady gain is shown in all four class groups in the attitude toward the teacher.

A consistent gain is noted in comparing pretests and posttests scores on this concept, particularly as it related to Class B. The item most frequently checked was Item 7, "My teacher is very helpful." Eleven students in Class D, or almost 50 per cent of the students, checked Item 8, "My teacher is a good guy."

In comparing the feelings of boys as contrasted to those of girls toward the concept, My teacher, on a postcamp basis, the following figures are presented in Table 18 (see following page.)

All four groups of boys registered a change of direction of attitude in favor of the teacher; three of the four girls' groups registered a more favorable impression of the teacher after camp.

It is apparent that the boys reacted more favorably toward the teacher after engaging in a camping experience

TABLE 18

PRETEST AND POSTTEST MEAN RESPONSES OF 78 FIFTH- AND SIXTH-GRADE BOYS AND GIRLS TO CONCEPT: MY TEACHER . . .

Class	Grade	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A	6				
Boys		5.78	5.89	x	
Girls		6.82	6.73		x
B	5				
Boys		4.70	5.78	x	
Girls		6.56	6.78	x	
C	5				
Boys		6.10	6.60	x	
Girls		7.75	9.25	x	
D	6				
Boys		5.11	6.33	x	
Girls		7.14	7.43	x	

than did girls, although both groups record high positive scores in gain in attitude. The highest gain in a boys' group in attitude toward teacher is in Class D, whose home-room teacher was a male. Although the girls in this class also registered a more positive score following camp, the gain was much slighter, being a score of .29 in contrast to the boys' gain in score, 1.22.

This score tends to give credence to the concept that boys, when given opportunities for close association with men, identify more readily and relate more positively to the adult members of their own sex.

To present class differences, an analysis is shown in Table 19.

TABLE 19

PRETEST AND POSTTEST MEAN RESPONSES OF 78 FIFTH- AND SIXTH-GRADE STUDENTS TO CONCEPT: MY TEACHER . . .

Class	Grade	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A	6	6.30	6.40	x	
B	5	5.45	6.18	x	
C	5	6.77	7.00	x	
D	6	6.26	7.09	x	
Group Mean		6.26	6.67	X	

A consistent positive change of attitude is apparent in all class groups. Both fifth and sixth grades showed approximately the same amount of change to a more favorable attitude toward the concept.

One of the initial plans of the study was to gain a measure of control over attitudes of a group attending camp under the guidance of a teacher other than the regular homeroom teacher. Since the schools required the homeroom teachers to accompany the classes to camp, this appeared to be impossible. However, as it turned out, one of the classes

(Class A) did attend with another classroom teacher, a member of the faculty of the same school, rather than their regular homeroom teacher. In responding to the inventory, the students in Class A were advised to answer Topic C: My Teacher, keeping their own homeroom teacher in mind, in both pretests and posttests. The fairly stable percentages attest to the validity of the scoring. This gain of .10 is considerably smaller than the gains of the other three classes in a more favorable attitude toward their teacher, who accompanied their groups to camp.

Incomplete Sentences

In order to gain a measure of validity, the members of one sixth-grade class with 24 students in attendance were asked to complete 25 Incomplete Sentences, before and after camp. The responses are tabulated in Table 20.

TABLE 20

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D TO INCOMPLETE SENTENCE: MY TEACHER . . .

Pretest	Per Cent	Posttest	Per Cent
Positive Relationship	89	Positive Relationship	91
Uncertain	11	Uncertain	4
		No response	4

While there is no large difference in gain noted, the change of direction of attitude is toward the concept. This supports the evidence discovered in the Inventory of Concepts.

Observation

As students and teachers mingled in an out of doors setting exploring nature, riding in a bus together to a neighboring town to visit a museum of historical relics, hiking together, cooking outdoors, singing with each other, and numerous other acts of participation, one could observe improved personal relationships.

In one of the classrooms, one of the youthful teachers entered all activities with enthusiasm and zest; previously, the responses of the students to this teacher were considerably lower. Classroom atmosphere might be expected to improve considerably in the school situation, following the completion of camp, as students began to associate with the teacher more readily during the camping experience.

Interview

During the course of the interview with 24 sixth-grade students, at the close of the camping period, only one student registered a negative response to the word association test, when asked to respond to the word Teacher. The results of the word association test were compiled into a content analysis, with the following interpretation, as

shown in Table 21.

TABLE 21

CONTENT ANALYSIS OF RESPONSES OF WORD ASSOCIATION TEST OF 24 STUDENTS IN CLASS D TO CONCEPT: MY TEACHER

Concept: My Teacher	No. of Responses	Per Cent
Pleasant Association Nice (5) Like (2) O.K. (1)	9	38
Role Counselor (1) Friend (1) Principal (1) Women (1)	4	17
Identification Named (4) My Teacher (3) School (1)	8	33
Negative Association	1	4
No response	2	8

The total picture presented shows one of a range of acceptance to pleasant association, with only twelve per cent giving a negative response or no response.

Summary

There appears to be a consistent direction of attitude change toward the concept: My Teacher. All four class groups exhibited a more favorable association as shown by a variety of measurement instruments: (1) Inventory of Key

Concepts, (2) Incomplete Sentence Test, (3) Word Association Test, and (4) Observation.

While students registered a small positive gain in the attitude change toward their regular homeroom teacher who did not accompany them, the gain was slight in comparison to the gains shown by the other three class groups, whose homeroom teachers were in attendance.

Boys tended to change in attitudes toward their teachers more favorably than did girls following camping.

It may be stated that positive gains in attitudes toward the teacher for both boys and girls did accrue following the sharing of a camping experience.

Attitudes toward School Camping

In anticipating a school camping experience, students usually have a favorable connotation with regard to the experience to be shared. Former campers and teachers who have previously attended camp orient the students to the adventure. Nevertheless, for many students it will be a first experience away from the family group for this length of time and some mixed feelings are commonly experienced.

Data were to be provided to support any conclusions found concerning attitudes toward school camping from the following sources:

1. Inventory of Key Concepts, pretest and posttests,

administered to all four class groups.

2. Incomplete Sentence Test, for validating purposes, given to 24 sixth-grade students, precamp and postcamp.

3. Interview of Class D at the close of camp, for supporting evidence.

4. Observation of all students during camp.

Inventory of Key Concepts

To attempt to measure precamp and postcamp feelings, an inventory was constructed to contain 10 items which would adequately represent the feelings of the group. Students in all four classes encircled choices as given in the inventory below:

School Camping

1. is no fun
2. is a cold place
3. is okay
4. is all right
5. is fun
6. is a lot of fun
7. is a good place to learn
8. is the best place to learn some things
9. helps you make friends
10. brings you close to nature

Table 22 indicates gains and losses toward each

TABLE 22

PRETEST AND POSTTEST RESPONSES OF 78 FIFTH- AND SIXTH-GRADE STUDENTS TO CONCEPT: SCHOOL CAMPING . . .

Item School Camping	Class A-6				Class B-5				Class C-5				Class D-6				Total Responses	
	Pretest		Posttest		Pretest		Posttest		Pretest		Posttest		Pretest		Posttest		Pre.	Post.
	B	G	B	G	B	G	B	G	B	G	B	G	B	G	B	G*		
1. no fun	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
2. cold place	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0
3. okay	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1
4. all right	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0
5. fun	0	0	0	0	0	0	1	1	1	0	2	0	0	2	1	2	3	7
6. lot of fun	2	6	3	9	8	4	7	2	5	2	1	1	4	9	3	7	40	33
7. good place to learn	0	2	0	1	3	0	2	1	0	0	1	0	0	1	2	0	6	7
8. best place to learn	2	1	3	0	1	1	1	2	2	0	3	1	1	0	1	2	8	13
9. helps you make friends	2	0	1	1	0	1	0	2	1	0	1	1	2	1	0	2	7	8
10. brings you close to nature	1	2	2	0	1	3	2	1	0	2	1	1	2	1	2	0	12	9
Total Answers	9	11	9	11	13	9	13	9	9	4	9	4	9	14	9	14	78	78
Mean	8.11	6.64	9.00	6.36	6.69	7.88	6.07	7.56	6.50	8.00	7.70	8.25	6.67	6.67	7.22	6.36		
Class Mean	7.00		7.05		7.18		7.14		7.08		7.62		6.96		6.70			
Group Mean																	7.03	7.13

*B = Boys; G = Girls.

concept of the Inventory, as evidenced by students' pretest and posttest scores.

On the pretest, great consistency of responses by all four classes is noted. Although the mean response for students was Item 7, "School camping is a good place to learn," 51 per cent of the campers scored Item 6, "School camping is a lot of fun." On the posttest, a very slight over-all gain is noted in the total average of the four groups, with Class C, a fifth-grade class, scoring the highest gain.

Do boys react more favorably toward school camping than girls in a postcamp reflection? Data for the answer to this question are supplied in Table 23.

TABLE 23

PRETEST AND POSTTEST MEAN RESPONSES OF 78 FIFTH- AND SIXTH-GRADE BOYS AND GIRLS TO CONCEPT: SCHOOL CAMPING . . .

Class	Grade	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A	6				
Boys		8.11	9.00	x	
Girls		6.64	6.36		x
B	5				
Boys		6.69	6.07		x
Girls		7.88	7.56		x
C	5				
Boys		6.50	7.70	x	
Girls		8.00	8.25	x	
D	6				
Boys		6.67	7.22	x	
Girls		6.67	6.36		x

The scores reveal that boys as a group react considerably more positively toward the attitude of school camping in a postcamp situation than do the girls, who show an almost imperceptible loss in an attitude toward the concept. Both of the two sixth-grade camp groups scored positively as a total, while Class B, a fifth-grade group, scored negatively in both boys' and girls' groups. Nevertheless, the other fifth-grade class, Class C, showed the highest over-all gain of any of the class groups attending.

A comparison of class scores yields the following analysis, as shown in Table 24.

TABLE 24

PRETEST AND POSTTEST MEAN RESPONSES OF 78 FIFTH- AND SIXTH-GRADE STUDENTS TO CONCEPT: SCHOOL CAMPING . . .

Class	Grade	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A	6	7.00	7.05	x	
B	5	7.18	7.14		x
C	5	7.08	7.62	x	
D	6	6.96	6.70		x
Group Mean		7.03	7.13	X	

It appears that one sixth-grade class and one fifth-grade class showed a direction of change of attitude toward the concept, while the other two classes showed a change of direction away from the concept. Apparently, grade level had no effect on the attitude toward school camping after engaging in the experience. There is an over-all change of attitude in a favorable regard to the concept. Scores on both pretest and posttest were high, it may be noted.

Incomplete Sentences

Seeking validation of the items scored on the Inventory of Concepts, twenty-four sixth-grade students were asked to answer to Incomplete Sentences before and after camp. Item 12 in this list was School Camping. Answers were structured into a content analysis and the data were revealed in Table 25.

TABLE 25

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D TO INCOMPLETE SENTENCE: SCHOOL CAMPING . . .

Pretest	Per Cent	Posttest	Per Cent
Pleasant Association	83	Pleasant Association	91
Uncertain	13	Uncertain	4
No Response	4	No Response	4

This evidence does support the general conclusions of the findings of the Inventory concerning an attitude change toward school camping. On both pretests and posttests students are positively oriented toward the attitude of school camping with a noticeable increase shown on the posttest.

Interview

To further validate the conclusions of the Inventory, the same 24 students were interviewed, to provide more elaboration on their feelings toward school camping. The questions asked of all students included:

1. What do you think about the school camping program you are now having?
2. Is it as you thought it would be?
3. Have you been school camping before?
4. What is the most important thing you have gotten out of this camping program?
5. Have you made any new friends?
6. Can you name one or two?
7. What did you like best of all?

A content analysis of the answers to the questions revealed information concerning school camping which is shown in Table 26. Judging from these responses a more positive attitude toward school camping prevailed at the end of the experience.

TABLE 26

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D TO INTERVIEW QUESTION: REACTION TO SCHOOL CAMPING . . .

	Reaction	No. of Responses	Per Cent
A.	Lots of fun	8	33
B.	Like it	5	21
C.	Fun	3	13
D.	O.K.	3	13
E.	Pretty good	3	13
F.	Nice	1	4
G.	Could be better	1	4

Twelve of the twenty-four students, or 50 per cent, had attended camp the previous year; however, they had camped during the winter months in February, in contrast to this experience in the late fall, at which time activities were largely different from winter experiences.

When questioned about the most important feature of camp, a content analysis revealed the information disclosed in Table 27.

It might be noted that two or three students showed some degree of self-consciousness in the interview situation and did not respond freely, although there was a greater degree of oral response in the interview situation than in the written responses to the Incomplete Sentences.

TABLE 27

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D TO INTERVIEW QUESTION: MOST IMPORTANT FEATURE OF CAMP . . .

Feature	No. of Responses	Per Cent
A. Getting better acquainted 1. More new friends (5) 2. How to get along with people (2)	7	29
B. Nature study	3	13
C. Activities 1. Setting table correctly (2) 2. Eating (1) 3. Row a boat (1) 4. Buy a souvenir (1)	5	21
D. Nature study	3	13
E. Learned a lot of things	2	8
F. Science	1	4
G. Don't know	2	8
H. No response	3	13

Incomplete Sentences

When asked the specific question of what was the best liked activity, the responses ranged as recorded in Table 28.

Apparently, the students liked activities which were somewhat unfamiliar to them. The drop-off hike, rated highest, was an innovation to the students. After being blindfolded, students were transported, via the bus, in a circling,

TABLE 28

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D TO INTERVIEW QUESTION: BEST LIKED CAMP ACTIVITY . . .

Activity	No. of Responses	Per Cent
A. Drop-off hike	8	33
B. Boating	7	29
C. Cookout	6	25
D. Hiking	2	8
E. Swamps Abandoned farm Pioneers and Indian (game)	1	4

random route to a vicinity a few miles from camp. Here their blindfolds were lifted, a map and compass provided, and students were allowed to find their ways back to camp. Both boys and girls expressed keen approval of this challenge to reliability. Boating was popular, because very few of these students had engaged in the activity; some of the boys were observed to be taking a keen interest in this activity. The cookout, as conducted in the camping program, was a novel experience in that students planned the menu, figured proportions of ingredients, ordered and secured supplies, fabricated cooking utensils, built fires and cooked the meal. No doubt, some of the students had cooked out in the family setting before, but, very probably, they had never been allowed the range of freedom as experienced here. The

challenge of responsibility was met in a positive manner.

Summary

Apparently, grade level had no effect on the attitude toward school camping after engaging in the experience, although there was an over-all change of attitude in a more favorable regard to the attitude toward school camping.

Boys as a group reacted considerably more positively toward the attitude of camping than did girls who showed a slight loss in attitude toward the concept.

Students considered "getting better acquainted" as one of the most important features of camp, while the most favorable activities were hiking, boating, and the cookout.

It is of interest to compare the total concept toward school with an over-all average of 5.78 ("School is usually O.K.") with the over-all average of school camping, 7.13 ("School camping is a good place to learn"). There is a difference of 1.35 in the total averages of both concepts.

Attitude toward Self

Can a five-day camping program exert a profound difference on the feelings of a fifth- or sixth-grade student might be entertaining in regard to self? How does a student at this level feel about himself generally? Does he have a high self-esteem? In order to probe further into the egocentered self, certain measurement techniques were employed:

1. Inventory of Key Concepts for all class groups, before and after camp.

2. Incomplete Sentence Test given to Class D, for validation of responses to the Inventory.

3. Interview of Class D at camp.

4. Case studies of 36 campers.

5. Observation of all four class groups at camp.

Inventory of Key Concepts

Before camp, when a pretest of the inventory of concepts was administered, it was learned that the two concepts scoring the highest over-all averages by all four classes were those of attitudes toward classmates and attitudes toward self (or I). As is usual, when scores are already highest in a pretest, it is somewhat more difficult to show a gain in posttest periods. This appeared to be the case with the Inventory, regarding the self-concept.

The items in the Self-Concept inventory included:

I

1. am often unhappy
2. get mad easily
3. am sad sometimes
4. am naughty sometimes
5. am an ordinary person
6. have several friends
7. have several good friends

8. have many good friends

9. like everybody in my room

10. like everybody.

The importance of the self-concept was felt to be a desirable characteristic to be tested; hence, the students were asked to respond to "I" as a concept. Pretest and posttest answers are shown in Table 29.

In analyzing the responses on the pretest in Class B (Grade 5), it may be observed that 28 per cent of the students answered somewhat negatively, causing the score on self-esteem to be lowest for that group. The two most frequently encircled items for all classes were Item 8, "I have many good friends" (20 per cent) and Item 10, "I like everybody" (27 per cent) on the pretest; however, on the posttest, Item 8 was marked by 20 per cent and Item 10 was supplanted by Item 9, "I like everybody in my room" (28 per cent) as the two most frequently scored items. The mean response of the group on both pretest and posttest was Item 7, "I have several good friends."

To ascertain if boys or girls suffer greater loss of esteem, an analysis was charted in Table 30.

Three of the four boys' class groups showed a loss in self-esteem, while only one girls' group showed a loss, with 2 girls' groups showing gain. The average loss in the four boys' groups is greater than the gains shown in the girls' group.

TABLE 29

PRETEST AND POSTTEST RESPONSES OF 78 FIFTH- AND SIXTH-GRADE STUDENTS TO CONCEPT: SELF . . .

Item Self	Class A-6				Class B-5				Class C-5				Class D-6				Total Responses	
	Pretest		Posttest		Pretest		Posttest		Pretest		Posttest		Pretest		Posttest		Pre.	Post.
	B	G	B	G	B	G	B	G	B	G	B	G	B	G	B	G*		
1. am often unhappy	0	1	0	1	0	0	0	0	0	0	0	0	0	0	1	0	1	2
2. get mad easily	0	0	1	0	3	0	1	0	0	0	0	0	0	1	0	1	4	3
3. am sad sometimes	1	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	2	0
4. am naughty sometimes	0	0	0	0	0	0	1	0	0	0	0	0	2	0	0	0	2	1
5. am an ordinary person	1	0	0	0	1	1	2	0	1	0	2	0	1	3	3	2	8	9
6. have several friends	0	0	0	4	1	2	1	2	1	0	0	0	0	0	1	1	4	9
7. have several good friends	1	3	0	0	2	0	3	3	2	3	1	2	0	0	1	0	11	10
8. have many good friends	4	1	3	1	3	0	2	0	2	0	4	1	1	4	1	4	15	16
9. like everybody in my room	0	2	3	3	1	1	2	1	0	0	2	1	4	2	0	2	10	14
10. like everybody	2	4	1	2	2	4	1	3	3	1	0	0	1	4	2	4	21	13
Total Answers	9	11	8	11	13	9	13	9	9	4	9	4	9	14	9	14	78	77
Mean	7.44	7.36	7.22	7.00	6.46	7.66	6.69	8.00	8.00	7.75	7.50	7.75	7.44	7.64	6.33	7.71		
Class Mean	7.75		7.53		6.95		7.23		7.84		7.53		7.56		7.00			
Group Mean																	7.52	7.32

* B = Boys; G = Girls.

TABLE 30

PRETEST AND POSTTEST MEAN RESPONSES OF 77 FIFTH- AND SIXTH-GRADE STUDENTS TO CONCEPT: SELF . . .

Class	Grade	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A	6				
Boys		7.44	7.22		x
Girls		7.36	7.00		x
B	5				
Boys		6.46	6.69	x	
Girls		7.66	8.00	x	
C	5				
Boys		8.00	7.50		x
Girls		7.75	7.75	-	-
D	6				
Boys		7.44	6.33		x
Girls		7.64	7.71	x	

In a comparison of pretest and posttest mean responses for all classes, statistics are outlined in Table 31. Here, a difference is noted in the reaction of fifth and sixth grades. Sixth-grade students appear to be more vulnerable to loss of self-status than fifth-grade students.

Incomplete Sentences

Again, Class D wrote answers, precamp and postcamp, to 25 stimuli: Incomplete Sentences.

Several items inserted in the incomplete sentences explored the self-concept. Such items are:

TABLE 31

PRETEST AND POSTTEST MEAN RESPONSES OF 77 FIFTH- AND SIXTH-GRADE STUDENTS TO CONCEPT: SELF . . .

Class	Grade	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A	6	7.75	7.53		x
B	5	6.95	7.23	x	
C	5	7.84	7.53		x
D	6	7.56	7.00		x
Group Mean		7.52	7.32		X

I feel hurt . . .

I brag about . . .

I want to get even with . . .

I make believe that . . .

I get disgusted with . . .

I am happy about . . .

I worry about . . .

I feel ashamed when . . .

I feel proud when . . .

These responses served to validate the Inventory of Key Concepts. A content analysis of these responses on pretests and posttests follow in Table 32.

TABLE 32

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D TO FIVE NEGATIVE INCOMPLETE SENTENCES ABOUT CONCEPT: SELF . . .

Pretest	Per Cent	Posttest	Per Cent
	I feel hurt:		
Relationships	42	Relationships	79
Talked about (derog.)	34	Loss of privileges	4
Interests (Negative	11	No response	17
No response	13		
	I want to get even with:		
Individuals named	50	Nobody	33
Nobody	30	No response	36
No response	20		
	I get disgusted with:		
Relationships	41	Relationships	88
Loss	41	Poor achievements	8
Lack of achievements	8	No response	4
Indefinite	8		
No response	2		
	I worry about:		
Relationships	38	Relationships	46
Events	21	School	17
Nothing	17	Nothing	13
Others	24	No response	24
	I feel ashamed when:		
Obligations	50	Obligations	50
Relationships	33	Relationships	25
Other	17	Incidents	8
		No response	17

These 5 negative items in the inventory were analyzed to search out evidence for loss of self-esteem on the attitudes of fifth- and sixth-grade students. By making a cumulative score for each item appearing in the posttest the following analysis was made of the items causing a lack of self-status: Relationships (Negative) (238%), Obligations (50%), School (17%), Poor Achievement (8%), Incidents (8%), and Loss of Privileges (4%).

The items in the Incomplete Sentence Test which gave clues as to what built self-esteem were as follow in Table 33 (page 83).

In comparing the difference in values embraced on a postcamp basis by students responding to the incomplete sentences, a cumulative score of percentages on pretests and posttests is contrasted in Table 34.

These scores substantiate the conclusion that following camp, status is not desired to a greater extent but possibly shifted to a more favorable attitude toward other concepts. A higher status-feeling is no longer necessary.

Other values receiving less esteem are possessions and activities. The values adjudged to be of greater importance in postcamp situations are relationships, achievements, and events.

TABLE 33

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D TO FIVE POSITIVE INCOMPLETE SENTENCES ABOUT CONCEPT: SELF . . .

Pretest	Per Cent	Posttest	Per Cent
		I brag about:	
Relationships	30	Achievements	29
Possessions	25	Lack of Achievements	29
Little	21	Relationships	17
Concepts	11	Possessions	8
No response	13	No response	17
		I make believe that:	
Status	41	Status	38
Concepts	25	Relationships	29
Relationships	13	Possessions	4
Possessions	13	No response	33
No response	8		
		I am happy about:	
Events	41	Events	50
Relationships	29	Relationships	25
Status	17	Status	8
Nothing	4	No response	17
No response	9		
		I love:	
People	67	People	75
Activities	17	Pets	4
Animals	8	Activities	4
Other	8	Nobody	4
		No response	13
		I feel proud:	
Accomplishments	54	Accomplishments	46
Praise or Acceptance	21	Acceptance	21
Possessions	8	Possessions	8
No response	13	No response	25

TABLE 34

CUMULATIVE PERCENTAGES ON CONTENT ANALYSIS ITEMS OF INCOMPLETE SENTENCES OF CLASS D ABOUT CONCEPT: SELF . . .

Value	Pretest Cumulative Percentages	Posttest	Direction of Change	
			Toward	Away
Relationships	139	146	x	
Achievements	54	104	x	
Possessions	46	22		x
Status	58	46		x
Events	41	50	x	
Activities	17	4		x
Praise	21	21	--	
Animals	8	4		x

Summary

In three out of four classes the self-concept depreciated; both sixth-grade classes had a lowered ego-concept. Until analyzing the statements found in the Incomplete Sentence Test, one might adjudge this to be a negative factor; however, students appeared to move toward a more mature ego-concept by placing more emphasis on relationships, less on possessions, for example.

It is significant to note that both precamp and postcamp scores are relatively high, being 7.52 and 7.32,

respectively. Translating from the Inventory item which represented the average feeling for campers' status would be: "I have several good friends," and moving toward the next item, "I have many good friends."

These class groups apparently had a healthy regard for self, both before and after camp. Little difference in feeling is noted subsequent to the camping program.

Attitudes toward Friends

Development of new friendships and formation of deeper friendships has been claimed to be an outcome of school camping by leaders and others associated with the program. The concept of attitudes toward Friends has been integrated into all the measuring devices employed:

1. Inventory of Key Concepts (given Classes A, B, C, D, pretest and posttests).
2. Sociometric tests (Classes A, B, C, D, pretest and posttests).
3. Incomplete Sentence Test, Class D, pretest and posttest, for supporting evidence.
4. Interviews of Class D, for validation of results.
5. Observation of all groups.

Inventory of Key Concepts

Items composing the syndrome of concept about My friends were these:

My friends

1. get mad in a hurry
2. get angry at me sometimes
3. usually treat me O.K.
4. are okay
5. are good kids
6. are enjoyable
7. are very enjoyable
8. are very important to me
9. all like me, I think
10. make a good gang

This inventory was administered all class groups before and after camping. Herewith all results of the pretests and posttests are revealed in Table 35.

On the pretest, it may be noted that the two sixth-grade classes scored the highest. The most commonly encircled item was Item 10, "My friends make a good gang" (28 per cent) although the mean response was Item 7, "My friends are very enjoyable."

In appraising the differences in postcamp attitudes of boys and girls toward the concept, My friends, the data posted in Table 36 demonstrate the results.

Boys apparently form more friendships which are valued highly following camp than do girls, who tend to show a smaller negative relationships for friends following camp. The group showing the most positive change in attitude toward

TABLE 35

PRETEST AND POSTTEST RESPONSES OF 76 FIFTH- AND SIXTH-GRADE STUDENTS TO CONCEPT: MY FRIENDS . . .

Item My Friends	Class A-6				Class B-5				Class C-5				Class D-6				Total Responses	
	Pretest		Posttest		Pretest		Posttest		Pretest		Posttest		Pretest		Posttest			
	B	G	B	G	B	G	B	G	B	G	B	G	B	G	B	G*	Pre.	Post.
1. get mad in a hurry	0	0	0	1	0	0	0	0	0	0	0	0	0	1	0	1	1	2
2. get angry sometimes	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	0
3. usually treat me O.K.	0	0	0	0	1	0	1	0	2	0	0	0	0	0	0	0	3	1
4. are okay	0	1	0	0	2	0	3	1	3	0	1	0	3	1	1	0	10	6
5. are good kids	0	3	0	4	4	2	1	1	1	0	1	0	0	1	0	3	11	10
6. are enjoyable	0	3	0	1	0	1	1	1	2	0	2	0	0	2	1	2	8	8
7. are very enjoyable	0	1	0	0	0	2	2	0	0	1	1	1	0	0	0	2	4	6
8. are very important to me	3	0	2	0	2	1	2	2	0	2	0	1	1	2	2	2	11	11
9. all like me, I think	0	3	0	4	1	1	0	1	0	0	3	0	2	2	0	3	9	11
10. make a good gang	4	0	5	1	3	2	3	3	1	1	1	2	3	5	5	1	19	21
Total Answers	7	11	7	11	13	9	13	9	9	4	9	4	9	15	9	14	76	76
Mean	8.62	6.45	8.62	6.63	6.93	7.00	7.08	7.00	5.10	8.25	7.50	8.15	7.56	7.29	8.00	6.65		
Class Mean	7.50		7.72		6.91		7.09		6.00		7.70		7.57		7.52			
Group Mean																	7.13	7.51

*B = Boys; G = Girls.

TABLE 36

PRETEST AND POSTTEST MEAN RESPONSES OF 76 FIFTH- AND SIXTH-GRADE BOYS AND GIRLS TO CONCEPT: MY FRIENDS . . .

Class	Grade	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A	6				
Boys		8.62	8.62	--	--
Girls		6.45	6.63	x	
B	5				
Boys		6.93	7.08	x	
Girls		7.00	7.00	--	--
C	5				
Boys		5.10	7.50	x	
Girls		8.25	8.15		x
D	6				
Boys		7.56	7.29		x
Girls		8.00	6.65		x

the concept was the boys' group in Class C with a pretest mean of 5.10 and a posttest mean of 7.50. Item 5 states, "My friends are good kids," while Item 7 states, "My friends are very enjoyable."

The comparison between classes is noted in Table 37. Classes A and D, sixth-grade classes, and Class B, a fifth-grade class, showed a gain in direction of change of attitude toward My friends. An over-all gain is reflected for the group.

TABLE 37

PRETEST AND POSTTEST MEAN RESPONSES OF 76 FIFTH- AND SIXTH-GRADE STUDENTS TO CONCEPT: MY FRIENDS . . .

Class	Grade	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A	6	7.50	7.72	x	
B	5	6.91	7.09	x	
C	5	6.00	7.70	x	
D	6	7.57	7.52		x
Group Mean		7.13	7.51	X	

Sociometric Data

When students were again given five sociometric choices of a Work Companion upon return to school, there was an apparent redistribution of new choices among the various members of the class, as well as among members of the opposite sex.

An analysis of new choices by class groups and for boys and girls is revealed in Table 38. Among the boys, there appeared to be more making two new sociometric choices, although one boy made five new choices. Forty-four per cent of the girls made three new sociometric choices following camp, which showed more freedom of choice. All groups showed greater freedom, however, with a median score of 1.61 new

TABLE 38

DISTRIBUTION OF POSTTEST NEW SOCIOMETRIC CHOICES OF FIFTH- AND SIXTH-GRADE STUDENTS

Class	Grade	Number of New Choices											
		0		1		2		3		4		5	
		B	G	B	G	B	G	B	G	B	G	B	G*
A	6	0	1	6	3	1	5	0	2	2	0	0	0
B	5	2	1	6	1	2	4	2	3	1	1	0	0
C	5	2	2	2	0	4	3	2	0	1	0	0	0
D	6	1	0	2	4	4	6	1	5	0	0	1	0
Total		5	4	16	8	11	18	5	10	4	1	1	0
Per Cent		12	10	40	20	29	44	12	21	10	3	3	0

*B = Boys; G = Girls.

choices being scored by all four classes.

To discriminate between choices of the opposite sex, Table 39 has been formed. Following the school camping period, the total number of choices of the opposite sex rose from 40 to 53, or an increase of 13 per cent from the previous 9 per cent of choices of the opposite sex. It may be noted that Classes B and C, fifth-grade classes, recorded almost the same number of opposite sex choices in the pretest and posttests. In classes A and D, sixth-grade classes, the highest number of choices of opposite sex are recorded.

TABLE 39

DISTRIBUTION OF PRETEST AND POSTTEST SOCIOMETRIC CHOICES OF 79 FIFTH- AND SIXTH-GRADE STUDENTS OF SAME AND OPPOSITE SEX

Class	Grade	Pretest		Posttest	
		Opposite Sex	Same Sex	Opposite Sex	Same Sex
A	6	6	94	13	87
B	5	7	105	7	107
C	5	19	55	20	52
D	6	8	111	13	107
Total No.		40	365	53	353
Per Cent		9	91	13	87

Students chose each other more frequently following camping, with 90 per cent of all students making new choices. Members of the opposite sex, in the sixth grade particularly, tended to make more choices between the sexes.

Incomplete Sentences

Class D responded to the Incomplete Sentences, before and after camping, at which times students were asked to respond to the two stimuli: My new friends (Item 8) and My best friend (Item 21). A content analysis of the pretest and posttest answers on these statements provided this information in Table 40.

TABLE 40

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D TO INCOMPLETE SENTENCES RELATING TO FRIENDS . . .

Pretest	Per Cent	Posttest	Per Cent
	My new friends:		
Pleasant association	71	Pleasant association	91
Negative association	13	No response	8
No association	4		
Identified by name	13		
	My best friend:		
Identified by name	63	Pleasant association	83
Pleasant association	17	Description	4
Description	13	No response	17
Unpleasant	4		
No response	3		

There appears to be a positive change of attitude toward friends, judging from these two items. In the item, "My new friends," an increase of 21 per cent toward a more positive association is noted. A slight gain is noted in response to "My best friend."

Interviews

At the close of the camp session during the taped interviews, students in Class D were asked, "Have you made new friends?" Twenty-two, or 92 per cent, answered "Yes," while 2, or 8 per cent, answered "No."

Also, of information is the identification of certain persons with whom the campers became better acquainted.

Students were urged to give the names of their new friends. It seemed important that there appeared at this time a freedom of choice from those of the above-sociometric rating (star and above-average) to those of below-sociometric rating (isolate, neglectees, and below average). Thirty-eight students within the class were named as new friends--eleven students, or 41 per cent, who had previously been classed as a Below Average sociometric rating; 4 students, or 15 per cent, previously classed as Neglectees; and 1 student, formerly an Isolate, were mentioned as new acquaintances, usually by those of highest sociometric rating.

Students in the lower sociometric group named ten students in the Star or Above Average group as students with whom they had become better friends.

Five students, or 21 per cent, mentioned friends they had made in some of the other classrooms, as well; one of the students mentioned counselors, in general, as being new friends. However, it is of significance that students were beginning to accept other students previously in the lower quartile of social acceptability.

In Class D, a girl, high on the social acceptability rating, mentioned the Negro girl, a neglectee, as a new friend. In the interview, this Negro girl gaily stated that she had made lots of new friends, and named three girls of the upper quartile in sociometric rating, who were observed to be associating in play with her on the last day

of camp.

Students in all four class groups showed an over-all gain in favorable attitudes toward My friends with boys apparently showing a greater gain than do girls, subsequent to a camping experience. Sixth-grade boys showed a greater gain in formation of friendships than did fifth-grade boys.

There was a relatively higher proportion of freedom of choice following camping, with 90 per cent of all students making new choices, with an average of 1.61 new choices being made following five days of camp. Sixth-grade students after camping chose members of the opposite sex more frequently.

Students in high sociometric status were beginning to mention as new friends or acquaintances students of lowest sociometric rating.

Summarization of Data

In order to consolidate the findings of the various measurement instruments, a summarization of the data is presented.

The instrument, Inventory of Key Concepts, served as a framework for the study. All classes were administered the measurement, before and after camp. All results of pretests and posttests were assembled in Table 41.

It is observed that there is a change of attitude direction in a more positive manner in four of the six

TABLE 41

PRETEST AND POSTTEST MEAN RESPONSES OF 78 FIFTH- AND SIXTH-GRADE STUDENTS TO INVENTORY OF KEY CONCEPTS

Concept	Class	Pretest Mean	Posttest Mean	Direction of Change	
				Toward	Away
A. Classmates	A	7.35	7.35	--	--
	B	7.64	7.41		x
	C	8.00	7.54		x
	D	7.36	7.68	x	
	Average	7.55	7.49		X
B. School	A	5.50	5.65	x	
	B	5.00	4.68		x
	C	6.38	6.92	x	
	D	6.04	5.86		x
	Average	5.73	5.78	X	
C. Teacher	A	6.30	6.40	x	
	B	5.45	6.18	x	
	C	6.77	7.00	x	
	D	6.22	7.09	x	
	Average	6.26	6.67	X	
D. School Camping	A	7.00	7.05	x	
	B	7.18	7.14		x
	C	7.08	7.62	x	
	D	6.96	6.70		x
	Average	7.03	7.13	X	
E. I	A	7.75	7.53		x
	B	6.95	7.23	x	
	C	7.84	7.53		x
	D	7.56	7.00		x
	Average	7.52	7.32		X
F. Friends	A	7.50	7.72	x	
	B	6.91	7.09	x	
	C	6.00	7.70	x	
	D	7.57	7.52		x
	Average	6.99	7.51	X	
				Total 13	11
				Average 4	2

concepts compared.

In order to show variances in direction of changes toward or away from the six concepts listed for all students, a positive point was awarded for each answer circled carrying a higher number on the posttest. Likewise, when a student encircled a lower number on the posttest, a minus quality was derived. Each case was summarized on all six concepts. A range of from -23 to +17 was discovered. Data are presented in Table 42.

Six boys, or a total of 15 per cent, and five girls, a total of 13 per cent, failed to show an over-all change of attitude in response to all six concepts combined. However, boys as a group represented a total gain of 7 per cent of positive change in all attitudes combined while girls showed a total gain of 5 per cent in a favorable direction of attitude change.

The instrument, the Bonney-Fessenden Sociograph, showed the number of students making new choices to represent a percentage of 90 per cent of the campers, who made 1.61 choices each.

Although the sociometric tests themselves reveal little or no change in status, observations of the students under consideration bear out a growing acceptance, even though it is somewhat limited.

Incomplete Sentences were analyzed by means of a content analysis, from which percentages were derived from

TABLE 42

TOTAL CHANGES IN PRETEST AND POSTTEST RESPONSES OF 78 FIFTH- AND SIXTH-GRADE STUDENTS TO SIX KEY CONCEPTS

Favorable Changes				Unfavorable Changes			
Number of Steps	Number of Students			Number of Steps	Number of Students		
	Boys	Girls	Total		Boys	Girls	Total
+17		1	1	- 1	2	2	4
+16		1	1	- 2	2	1	3
+14	3		3	- 3	1	2	3
+11	1	1	2	- 4	1	3	4
+ 9	1		1	- 5	2	3	5
+ 8	2	1	3	- 6		2	2
+ 7		2	2	- 7	1	1	2
+ 6	1	1	2	- 8	1		1
+ 5	3	2	5	-10	1	1	1
+ 4	3	2	5	-11	1	1	2
+ 3	1	2	3	-14	1		1
+ 2	2	1	3	- 23	1		1
+ 1	3	3	6				
Total +	20	17	37	Total -	12	25	28
Per Cent	40	46	48	Per Cent	38	41	36
No Change	6	5	11	Per Cent	15	13	14

each type of answer in the 25 items incorporated in the instrument.

By compiling all percentages for each type of answer, it was possible to combine all types of answers for all 25 statements into a rank order, judging from the highest aggregate percentage. As a result of this procedure, Table 43 emerged.

TABLE 43

PRETEST AGGREGATE PERCENTAGES OF VALUES, DETERMINED BY RESPONSES OF 24 STUDENTS IN CLASS D TO INCOMPLETE SENTENCES

Order of Importance	Values	Number of Listings	Aggregate Percentages
1	Relationships	13	535
2	Association	7	504
3	Objects and Events	3	158
4	People	2	146
5	Possessions	4	111
6	Achievements	3	79
7	Sports	2	75
8	Status	2	58
9	Activities	2	54
10	Obligations	1	50
11	Excursions	2	21
12	Other Interests	2	11

A gain in the area of human relationships was shown in the posttest (Table 44) where the three highest percentages, those for relationships, associations, and people, had a total aggregate percentage of 138. Previously, these three values, in first, second, and fourth places, amassed 1185 points, with the difference on pretest and posttest being 198. This information correlated with the results of the Inventory of Key Concepts, in regard to School Camping, Teacher, and Friends.

TABLE 44

POSTTEST AGGREGATE PERCENTAGES OF VALUES, DETERMINED BY RESPONSES OF 24 STUDENTS IN CLASS D TO INCOMPLETE SENTENCES

Order of Importance	Values	Number of Listings	Aggregate Percentages
1	Relationships	14	693
2	Associations	6	499
3	People	3	191
4	Achievements	6	152
5	Possessions	6	123
6	Objects and Events	2	108
7	Sports	1	67
8	Status	3	56
9	Activities	4	44
10	Obligations	1	50

In the content analysis, the regard for Teacher rose from 89 to 91 per cent, while the "uncertain" relationship changed from 11 to 4 per cent.

In response to No. 8, "My new friends . . .," on the posttest, the value changed from 71 to 91 per cent.

Concerning Item 12, "School camping . . .," the value of pleasant association gained 8 points, from 83 to 91 per cent, with the "uncertain" changing from 13 to 4 per cent.

Regarding Item 17, "The pupils in this school . . .," there was a decrease of from 12 points, in regard to "pleasant association" with the inclusion of four negative points. This validates the responses to key concept of "My classmates" on the posttest of the Inventory.

During the interviews with 24 students in the sixth-grade class, for which supportive evidence was the goal, Table 45 was devised in response to questions asked.

In response to answers provided on the Word Association Test given in connection with the interview of 24 sixth-grade students, on the last day of camp, a summarization of the answers is revealed in Table 46 (page 102).

The following statements present a summary of all data:

1. Students scored the concept "My Classmates" on a high basis, both before and after camp; there was a slight shift in attitude away from the concept, as measured by the Inventory; however, when other measurements were considered,

TABLE 45

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D TO INTERVIEW QUESTIONS

Item	Number of Responses	Per Cent
1. Reaction to camp		
A. Lots of fun	8	33
B. Like it	5	21
C. Fun	3	13
D. O.K.	3	13
E. Pretty good	2	8
F. Nice	1	4
G. Pretty good	1	4
H. Could be better	1	4
2. Similarity to Imagined Experiences		
A. Lots of new things	2	8
B. Better	1	4
C. "Little bit funner"	1	4
D. Similar	3	13
E. Counselors changed	1	4
F. Weather different	1	4
G. Not similar	1	4
H. No response	14	58
3. Those who camped last year	12	50
4. Most important feature of camp		
A. Nature study	3	13
B. Science	1	4
C. Outdoors	1	4
D. Getting better acquainted	7	29
1. More new friends (5 or 21%)		
2. How to get along with people (2 or 8%)		
E. Activities	5	21
1. Setting table correctly (2, 8%)		
2. Eating (1, 4%)		
3. Row a boat (1, 4%)		
4. Buy a souvenir (1, 4%)		
F. Learned a lot of things	2	8
G. Don't know	2	8
H. No response	3	13
5. New friends		
A. Yes	22	92
B. No	2	8

TABLE 46

CONTENT ANALYSIS OF RESPONSES OF 24 STUDENTS IN CLASS D ON WORD ASSOCIATION TEST

Item	Number of Responses	Per Cent
Concept: Classmates		
Acceptance	15	63
Friends (6)		
Like (3)		
Fun (2)		
O.K. (2)		
Group (1)		
Nice (1)		
Possession	3	13
My class (2)		
Mine (1)		
Identification	4	17
Boys-girls (1)		
Girls (1)		
Boys (1)		
Named Identification (1)		
Negative	1	4
Grouchy		
No response	1	4
Concept: Teacher		
Pleasant Association	9	38
Nice (5)		
Like (2)		
O.K. (1)		
Negative Association	1	4
Role	4	17
Counselor (1)		
Friend (1)		
Principal (1)		
Woman (1)		
Identification	8	33
Named (4)		
My teacher (3)		
School (1)		
No response	2	8
Concept: School		
Association	14	63
Like (6)		
Fun (3)		
O.K. (3)		
Pretty good (1)		
All right (1)		
Enjoyment (1)		
Concept	6	25
Learn (1)		
Work (5)		
Identification	3	13
My school (1)		
Named (1)		
Home (1)		
Concept: School Camping		
Association	18	75
Fun (7)		
Like (3)		
Nice (2)		
O.K. (2)		
Fine (1)		
Like very well (1)		
Enjoyment (1)		
Friends (1)		
Identification	5	21
This camp (3)		
School (1)		
Camping (1)		
No response	1	4

the change seemed to be so slight as to be of relative unimportance.

2. The attitude School rated the lowest both before and after camp. Although there is a slight change of direction of attitude toward the concept, the evidence appears to show a generally low esteem for the attitude, when compared with other concepts measured. Girls tended to show a somewhat higher regard for school than did boys.

3. The direction of change of attitude toward My Teacher was positive for all four classes, as measured by the four appraisals used. There was a greater favorable change of attitude toward the homeroom teacher in attendance than the homeroom teacher who failed to attend. Boys tended to change more positively in this attitude than girls.

4. There is an over-all favorable change of attitude toward School Camping. Boys react considerably more positively toward the attitude than do girls.

5. The attitude of Self slightly depreciated following camp; however, students appeared to move toward a more mature ego-concept by placing more emphasis on relationships, less on possessions. Students had a strong positive attitude for this concept in both pretests and posttests.

5. Students in all four classes showed an over-all gain in favorable attitudes toward My Friends with boys showing more gain than girls, and sixth-grade boys showing a greater gain than fifth-grade boys. There is a higher

proportion of freedom of choice, between the above and below sociometric groups and between the sexes.

CHAPTER IV

SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

The study constituted an attempt to explore the attitudes which fifth- and sixth-grade students possessed prior and subsequent to a program of school camping. The investigation was concerned with: What kinds of attitudes toward the selected concepts of classmates, school, teacher, school camping, self, and friends do students have following a period of school camping?

Data were secured from 88 campers, 44 boys and 44 girls, members of two fifth- and two sixth-grade classes, from a lower-middle socio-economic background, who spent one week at Clear Lake Camp, Dowling, Michigan, accompanied by three homeroom teachers and one classroom teacher.

The investigation concerned itself with answers to the following questions:

Following a period of school camping:

1. Will there be a greater freedom of choice of companions?

2. Will there be a gain in social status for students of lowest sociometric acceptability?

3. Will there be a more positive attitude reflected toward school?

4. Will there be a more favorable attitude toward the homeroom teacher?

5. Will there be a more positive attitude toward school camping?

6. Will there be a more favorable attitude in relation to the self-concept of the camper?

7. Will there be an increase in the number of friendships formed?

Instruments of appraisal used to measure attitudes toward selected concepts included:

1. An Inventory of Key Concepts, containing ten items, for each of the six selected concepts;

2. The Bonney-Fessenden Sociograph, for which five choices of a work companion were made;

3. An Incomplete Sentence Test, for which twenty-five items served as stimuli;

4. Interview responses to camp evaluation questions and the Word Association Test;

5. Case studies of a number of students representative of all four classes;

6. Observation of all students during the camping program.

The design of the study included: Testing of all

students, before and after camping, by means of the Inventory of Key Concepts and a sociometric test; further testing of a sixth-grade class, in precamp and postcamp periods, by means of responses to the Incomplete Sentence Test and during camp, through an interview; perusal of case studies of a number of students and observation of all students.

Summary of Findings

This investigation revealed evidence to support the following findings:

1. Students had a high regard for classmates, prior and subsequent to camping.

2. Ninety per cent of the campers made new postcamp sociometric choices, with a group mean of 1.61 new choices being made.

3. Students in the sixth grade made more new sociometric choices following camp than did fifth-grade students.

4. Sixth-grade students made more sociometric choices of the opposite sex, following the camping period than did those from the fifth grade.

5. A beginning acceptance of classmates of lower sociometric acceptability was registered by both fifth- and sixth-grade students.

6. Students did not regard school in a highly favorable manner, either before or after camp.

7. Girls tended to regard school more positively

than boys, both before and after camp.

8. Boys changed positively to a small degree in regard to attitude toward school, following camp.

9. There was a consistent change of attitude of both grades in a positive manner toward the homeroom teacher, subsequent to camp.

10. Boys changed more favorably in regard to the homeroom teacher than did girls, after camp.

11. There was an over-all change in students to a more positive attitude toward school camping, subsequent to the experience.

12. Boys reacted considerably more positively to school camping than did girls, who showed a slight loss in esteem for camp on the basis of postcamp reaction.

13. Students considered getting better acquainted as one of the most important features of camp.

14. Outdoor activities, such as hiking, boating, and cookouts, were activities most enjoyed.

15. Both in precamp and postcamp periods, students rated the concept of self in a highly positive manner, although attitudes toward the self-concept depreciated slightly following camp with sixth-grade students showing a greater loss of self-esteem than did fifth-grade students.

16. There was an over-all positive gain in relation to attitudes toward friends, with boys forming more friendships valued more highly following camp than did girls.

17. Before camping, the attitudes rated most favorably were those concerned with classmates, self, and school camping, in respective rank order; after camping, the three most favorable attitudes in order of rank were those regarding friends, self, and classmates.

18. The social values held in greatest esteem by the students included those of relationships and associations.

Conclusions

Judging from the results of this investigation, the following conclusions seemed justified:

1. Greater freedom of choice of companions and an increase in the number of friendships formed characterized the school-camping program, despite its limited duration.

2. The experience of school camping provided unique opportunities for affecting social change, particularly where the problem of racial cleavage was a factor.

3. Although classmates of lowest sociometric rating received more recognition from classmates following camping, no appreciable improvement in the sociometric work companion ratings of neglectees and isolates was effected.

4. Both boys and girls regarded school more positively after camp, with widened friendship patterns exerting an influence for an improved emotional tone in the classroom.

5. The curriculum innovation of school camping through its democratic atmosphere proved to be an important

factor in strengthening rapport between teachers and students.

6. Fifth- and sixth-grade students keenly anticipated the school-camping program, with boys reacting more favorably than girls subsequent to the experience.

7. The educational camp, by its structure, increased the values of relationships and associations over those of the ego-concept.

8. For boys, particularly, school camping served as a new stimulus to rekindle interests in the important relationships regarding school, teacher, camping, self, and friends.

Recommendations

Considering the evidence revealed in this study, it is recommended that:

1. Further study should be made of a variety of provisions for more common experiences for students, such as those afforded by organized school camps.

2. Research should be developed to identify new interests and interest patterns, particularly those pertaining to the out of doors, as related to fifth- and sixth-grade students.

3. Additional investigation should be carried out to determine the value of sociometric information in identifying desirable and productive student relationships.

4. School-camping programs should be further explored to determine the unique contributions for the middle elementary grades and for the junior high school.

5. Ways and means of integrating camp and classroom experiences should be explored.

BIBLIOGRAPHY

BIBLIOGRAPHY

Books

Allen, Robert M. Personality Assessment Procedures. New York: Harper and Brothers, 1958.

American Association for Health, Physical Education, and Recreation. Children in Focus. Washington, D. C.: National Education Association, 1954.

Anderson, Harold H., and Anderson, Gladys L. An Introduction to Projective Techniques. Englewood Cliffs, N. J.: Prentice-Hall, Inc., 1951.

Baron, Dennis, and Bernard, Harold W. Evaluation Techniques for Classroom Teacher. New York: McGraw-Hill Book Company, Inc., 1958.

Benson, Reuel A., and Goldberg, Jacob A. The Camp Counselor. New York: McGraw-Hill Book Company, 1951.

Berelson, Bernard, and Janowitz, Morris. Public Opinion and Communication. Glencoe, Ill.: The Free Press, 1953.

Bucher, Charles A., and Reade, Evelyn M. Physical Education in the Modern Elementary School. New York: The Macmillan Company, 1958.

Burns, Gerald P. Program of the Modern Camp. New York: Prentice-Hall, Inc., 1954.

Clarke, James Mitchell. Public School Camping. Stanford, Calif.: Stanford University Press, 1951.

Donaldson, George W. School Camping. New York: Association Press, 1952.

Foshay, Arthur W., Wann, Kenneth D., et al. Children's Social Values. New York: Bureau of Publications, Teachers College, Columbia University, 1954.

Gronlund, Norman E. Sociometry in the Classroom. New York: Harper and Brothers, 1959.

Holsapple, James Q., and Meale, Florence R. Sentence Completion. Springfield, Ill.: Charles C. Thomas, Publisher, 1954.

Jansen, William. Extending Education through Camping. New York: Outdoor Education Association, 1948.

MacMillan, Dorothy Lou. School Camping and Outdoor Education. Dubuque, Iowa: Wm. C. Brown Company, 1956.

Manley, Helen, and Drury, M. F. Education through School Camping. St. Louis: C. V. Mosby Company, 1952.

Remmers, H. H. Introduction to Opinion and Attitude Measurement. New York: Harper and Brothers, 1954.

Rohde, Amanda R. The Sentence Completion Method. New York: The Ronald Press, 1957.

Rotter, Julian B., and Rafferty, J. E. The Rotter Incomplete Sentence Test. New York: The Psychological Corporation, 1950.

Rummel, J. Francis. An Introduction to Research Procedures in Education. New York: Harper and Brothers, 1958.

Strang, Ruth. The Adolescent Views Himself. New York: McGraw-Hill Book Company, Inc., 1957.

Articles and Periodicals

Bronfenbrenner, Urie. "A Constant Frame of Reference for Sociometric Research," Sociometry, VII (1944), 40-75.

_____. "The Measurement of Sociometric Status, Structure, and Development," Sociometry Monographs, No. 6 (1945), 5-27.

Blatte, Julia. "Incomplete Sentence Test as a Method of Studying Personality," American Psychology (July, 1946), 286.

Botner, Taft A. "Sociometric Approach to Group Study," The National Elementary Principal, XXXIV (February, 1955), 32-3.

California Journal of Elementary Education (November, 1957), 65-124.

Clawson, Marion. "The Crisis in Outdoor Recreation," American Forests (March and April, 1959), Reprint 13.

Criswell, Joan H. "Sociometric Measurement: Some Practical Advantages and New Developments," Sociometry, XVIII (1955), 383-91.

Davis, O. L., Jr. "The Effect of a School Camp Experience on Friendship Choices," Journal of Educational Sociology, XXXIII, No. 7 (March, 1960), 305-13.

Forer, B. R. "A Structured Sentence Completion Test," Journal of Projective Techniques, 14.

Gores, Harold B. "A Superintendent Looks at School Camping," Winter Sports and Outing Activities Guide (July, 1957-59), 94.

Gronlund, Norman E. "The Accuracy of Teachers' Judgments concerning the Sociometric Status of Sixth-Grade Pupils," Sociometry, XIII (1950), 329-31.

_____. "The Reliability of Social-Acceptability Scores Using Various Sociometric-Choice Limits," Elementary School Journal, XLVII (1956), 153-57.

_____. "The Relative Stability of Classroom Social Status, with Weighted and Unweighted Sociometric Status Scores," Journal of Educational Psychology, XLVI (1955), 345-54.

_____. "Generality of Sociometric Status over Criteria in the Measurement of Social Acceptability," Elementary School Journal, LVI (1955), 173-76.

Grossman, Beverly, and Wrighter, Joyce. "The Relationship between Selection-Rejection and Intelligence, Social Status, and Personality amongst Sixth-Grade Children," Sociometry, XI (1948), 346-47.

Handler, Lou. "Camping Is Fun--Plus," Camping Magazine, XXVII (April, 1955), 49-50.

Holiber, Joel C. "The Greater Goal of Outdoor Education," Camping Magazine, XXVI (February, 1954), 17.

Howenstine, William H. "The Camp Supplements the Classroom," Ohio Schools, XXXVI (April, 1958), 10-11.

Isserman, Ruth. "The Role of a Guidance Counselor in Camp," Camping Magazine, XXVI (May, 1954), 13-14.

Joy, Barbara Ellen. "Camping's Challenge Today," Camping Magazine, XXVI (March, 1954), 13-14.

Moldt, Claus. "Out-of-School Experiences," Childhood Education, XXIII (March, 1957), 401-4.

Northway, Mary L. "A Method for Depicting Social Relationships Obtained by Sociometric Testing," Sociometry, III (1940), 144-50.

Powers, Harold. "School Camping," The Tennessee Teacher (April, 1958), 8-10.

Reiley, Catharine C. "Our Common Heritage," Camping Magazine, XXVI (January, 1954), 219.

Rohde, Amanda R. "Exploration in Personality by the Sentence Completion Method," Journal of Applied Psychology, XXX (April, 1946), 169-81.

Roossinch, Esther A. "Use the Outdoors as a Resource in Education," Illinois Education (April, 1957), 315.

Rotter, Julian B. "The Incomplete Sentence Test as a Method of Studying Personality," American Psychology (July, 1946), 286.

Smith, Julian W. "Guidance Values in School Camping," National Elementary Principal, XXXIV (September, 1954), 198-204.

_____. "Outdoor Education; An Essential in Modern Living," American Academy of Physical Education, Papers and Reports (1956), 45-53.

Stein, Morris I. "The Use of a Sentence Completion Test for the Diagnosis of Personality," Journal of Clinical Psychology, 3.

Tendler, A. D. "A Preliminary Report on a Test for Emotional Insight," Journal of Applied Psychology, XIV, 123-236.

"The Sixth Grade Takes to the Woods," Saturday Evening Post (April 19, 1958), 38-9, 63-8.

Bulletins and Pamphlets

Alumni Development Fund and University School, College of Education, The University of Oklahoma. The School Out-of-Doors. Norman, 1958.

American Association for Health, Physical Education and Recreation. Interpretation of Outdoor Education through School Camping. Washington, D. C.: The Outdoor Education Project, 1956.

Bonney, Merl E., and Fessenden, Seth A. Manual, Bonney-Fessenden Sociograph. Los Angeles, Calif: Test Bureau, 1955.

Bulletin of the National Association of Secondary School Principals, XLI (May, 1957), 229.

Camping and Outdoor Education in California. Bulletin of the California State Department of Education, XXI (March, 1952).

Cleveland Heights Public Schools. Laying the Trail. Cleveland Heights, Ohio: September, 1957.

Department of Natural Resources, State of California. Conservation Activities for Elementary Schools, May, 1953.

Department of Public Instruction. Community School Camps, a Guide for Development. Lansing, Michigan, 1951.

Department of Public Instruction. Guide to School Camping for Wisconsin. Madison, Wisc.: 1956.

Division of Health and Physical Education. Outdoor Education a Handbook for School Districts. Los Angeles County, Calif.: June, 1954.

Division of Instruction. Guide for the Camp Hi-Hill Program. Long Beach, Calif: Long Beach Public Schools, June, 1952.

Donaldson, George W., and Louise E. Outdoor Education: A Bibliography. Washington, D. C.: American Association for Health, Physical Education, and Recreation, May 1958.

Educational Bulletin Service, DeKalb, Illinois.

Gilliland, John W. School Camping: A Frontier of Curriculum Improvement. Washington, D. C.: Association for Supervision and Curriculum Development, 1954.

Lyle, Betty. Camping: What Is It? Martinsville, Indiana: The American Camping Association, 1957.

McBride, Robert E. Camping at the Mid-Century. Chicago American Camping Association, 1953.

New Jersey Education Association. Teacher-Education Campshop on Outdoor Education-School Camping. Branchville, N. J.: 1957.

Office of Assistant Superintendent, Elementary Schools. Suggested Post-Camp Experiences. Long Beach, Calif.: 1956.

Outdoor Classroom, Will Rogers School, Pontiac, Michigan.

Report of the Committee of New York Section Camp Directors. The Place of the Organized Camp in the Field of Education. Chicago: American Camping Association, January, 1945.

Smith, Lenore C. Bibliography of Studies and Research in Camping. Martinsville, Indiana: American Camping Association, August, 1958.

Unpublished Material

Craddock, Arnold Clyde. "A Suggested School Camping Program for Kanawha County Sixth Grade." Unpublished Doctor's dissertation, George Peabody College for Teachers, 1955.

Elder, Joseph Marcus. "A Recommended Plan of Administration and Organization of a School Camp for the Lexington Junior High School, Lexington, Kentucky." Unpublished Doctor's dissertation, University of Kentucky, 1941.

Fowler, Anita E. "Justification, Initiation, and Organization of School Camping as a Part of Curriculum." Unpublished Master's thesis, University of Southern California, 1951.

Hall, William Bradford. "A Use Plan for Conservation Education on Two Land Areas Reserved to the Mill Lake and Cedar Lake School Camping Group." Unpublished Master's thesis, University of Michigan, 1953.

Hollenbeck, E. Irene. "A Report on an Oregon School Camp with Program Emphasis upon Outdoor Science Experiences." Unpublished Doctor's dissertation, University of Colorado, 1956.

Howenstine, William L. "An Evaluation of Conservation Education in Relation to the Total Program of 8 School Camps." Unpublished Doctor's dissertation, University of Michigan, 1959.

Kranzer, Herman. "A Study of Clear Lake Camp's Contribution to the Elementary Curriculum." Unpublished Master's thesis, University of Michigan, 1952.

Martin, Patricia. "School Camping." Unpublished Master's thesis, Texas Christian University, 1949.

Moore, Harriett Brown. "A Plan for the Organization of Camps as an Integral Part of the Public School System of the City of New York." Unpublished Doctor's dissertation, Teachers College, Columbia University, 1943.

Morrison, Eleanor R. "A Suggested Approach for Incorporating Camping and Outdoor Education in the Curriculum of University High School." Unpublished Master's thesis, Illinois State Normal University, 1950.

Rogers, Martin Humann. "Principles and Functions of Outdoor Education." Unpublished Doctor's dissertation, Syracuse University, 1956.

Scoles, Robert. "A Proposed Plan of Outdoor Education Integrated with the Sixth Grade Curriculum of Los Angeles County Schools." Unpublished Master's thesis, Occidental College, 1949.

Sleight, Ralph H. "An Analysis of the Program for Camping by the Long Beach City Schools." Unpublished Master's thesis, University of Southern California, 1949.

Walton, Thomas W. "A Study of the Administrative Practices Used in the Operation of 30 Selected Part-Time School Camp Programs in Michigan." Unpublished Doctor's dissertation, Michigan State University, 1956.

Williams, John D. "A Study of Curriculum Enrichment through School Camping." Unpublished Doctor's dissertation, University of Tennessee, 1954.

APPENDICES

APPENDIX A

WORD ASSOCIATION LIST FOR PILOT STUDY

NAME_____ DATE_____

STOP_____	BOY_____
PUNISH_____	FEAR_____
LOVE_____	TEACHER_____
BROTHER_____	SAD_____
READ_____	WANT_____
FATHER_____	MAN_____
HAPPY_____	DOCTOR_____
MAD_____	MOTHER_____
CLASSMATES_____	CLASS_____
DARK_____	DAY_____
BOOK_____	FIRE_____
WOMAN_____	HOME_____
MYSELF_____	SPANK_____
PLAY_____	CAMP_____
SCHOOL_____	LAUGH_____
GIRL_____	GOOD_____
DREAM_____	CRY_____
THUMB_____	BAD_____
NIGHT_____	SICK_____
HOUSE_____	YELL_____
TABLE_____	STEAL_____

APPENDIX B

INVENTORY USED IN PILOT STUDY

In each column, underline the words that describe your feelings about each topic. If these words are not satisfactory, you may add words in the blanks.

A. My classmates

1. are hateful
2. are unkind
3. are rude
4. are unfriendly
5. are proud
6. are unhappy
7. are okay
8. are friendly
9. are very unfriendly
10. are a bunch of friends
11. mean happiness
12. are all good kids

D. Camping

1. is like a jail
2. is a cold place
3. is no fun
4. means no fun
5. is best if outdoors
6. is all right
7. is okay
8. is fun
9. is a good place to learn
10. is the best place to learn some things
11. helps you make friends
12. brings you close to nature

B. School

1. is terrible
2. means trouble
3. usually means work
4. means homework
5. is a dull place
6. is okay, sometimes
7. is usually o.k.
8. is a good place
9. is a very nice place
10. is more fun now
11. is a cheerful spot
12. is the place I like best

E. I

1. am often unhappy
2. get mad easily
3. am sad sometimes
4. am sullen now and then
5. am naughty sometimes
6. am an ordinary person
7. like just one or two people
8. have several friends
9. have several good friends
10. have many good friends
11. like everybody in my room
12. like everybody

C. My teacher

1. scares me
2. is mean
3. is grouchy
4. is often rude
5. is impolite
6. is careless
7. is nice
8. is usually nice
9. is always nice
10. is my friend
11. is helpful
12. is very helpful

F. My friends

1. are unhappy often
2. get mad in a hurry
3. are sullen sometimes
4. get angry at me sometimes
5. usually treat me okay
6. are okay
7. are good kids
8. are enjoyable
9. are very enjoyable
10. are very important to me
11. all like me I think
12. make a good gang

APPENDIX C

INVENTORY OF KEY CONCEPTS

Under each topic, circle one number opposite the group of words which best describes your feelings about that topic.

A. My classmates

1. are hateful
2. are rude
3. are unfriendly
4. are proud
5. are okay
6. are friendly
7. are very friendly
8. are a bunch of friends
9. mean happiness
10. are all good kids

B. School

1. is terrible
2. means trouble
3. usually means work
4. is okay, sometimes
5. is usually o.k.
6. is a good place
7. is a very nice place
8. is more fun now
9. is a cheerful spot
10. is the place I like best

C. My teacher

1. is grouchy
2. is okay
3. is usually nice
4. is always nice
5. is my friend
6. is helpful
7. is very helpful
8. is a good guy
9. is wonderful
10. understands me

D. School camping

1. is no fun
2. is a cold place
3. is okay
4. is all right
5. is fun
6. is a lot of fun
7. is a good place to learn
8. is the best place to learn some things
9. helps you make friends
10. brings you close to nature

E. I

1. am often unhappy
2. get mad easily
3. am sad sometimes
4. am naughty sometimes
5. am an ordinary person
6. have several friends
7. have several good friends
8. have many good friends
9. like everybody in my room
10. like everybody

F. My friends

1. get mad in a hurry
2. get angry at me sometimes
3. usually treat me okay
4. are okay
5. are good kids
6. are enjoyable
7. are very enjoyable
8. are very important to me
9. all like me, I think
10. make a good gang

APPENDIX D

INCOMPLETE SENTENCE TEST

Complete these sentences to express your real feeling. Try to do every one. Be sure to make a complete sentence.

1. I like to_____
2. I brag about_____
3. I feel hurt when_____
4. My teacher_____
5. I want to get even with_____
6. I make believe that_____
7. I get disgusted when_____
8. My new friends_____
9. I want_____
10. I am afraid_____
11. I hate_____
12. School camping_____
13. I am happy about_____
14. I worry about_____
15. I pity_____
16. I love_____
17. The pupils in this school_____
18. I feel ashamed when_____
19. I feel proud when_____
20. My family_____
21. My best friend_____

22. This school_____

23. Our principal_____

24. Group work_____

25. My most important three wishes are _____

_____

APPENDIX E

PRETEST MATRIX TABLE OF 5 SOCIOMETRIC CHOICES OF CLASS A (GRADE 6)

Subject	Same Sex	Opposite Sex	1	3	4	5	6	8	9	10	11	12	13	14	15	16	18	19	20	21	22	23	No. Choices Received
1	5	0		5	4	1	1		3		1		1			2		2	4				10
3	5	0	2				4									1			1				4
4	4	1	1	4			5	2															4
5	4	1								3	4	3					1	3		1	1		7
6	5	0			5			3															2
8	5	0		3			3		4						4		4	3					6
9	5	0	4		2			5									1	2					5
10	5	0											3	2	5								3
11	4	1																		4			1
12	5	0							1				4	5									3
13	4	1																			3		1
14	5	0										5				4							2
15	5	0																					0
16	5	0		2	1			4	2									5					5
18	4	1													4					2			2
19	4	1	5	1				1	5						5				5				6
20	5	0	3				2		1						3	2							5
21	5	0													1		5						2
22	5	0				4				4	3												3
23	5	0				3					2	1	2	1	2		3				4		8
	94	6																					

PRETEST MATRIX TABLE OF 5 SOCIOMETRIC CHOICES
OF CLASS B (GRADE 5)

Subject	Same Sex	Opposite Sex	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	22	23	No. Choices Received
1	5	0			2							1						2					3	5	5
2	5	0				5			5					5		1								4	5
3	4	1	2					3				2					5								4
4	4	0													5									3	2
5	5	0			1				4	2	1	5		4		4			4	4		2	2	4	12
6	3	0	1									3	5				4	3			3				6
7	5	0					5			1															2
8	5	0					3				5			3	1				2						5
9	5	0		2		3	2			5					3										5
10	4	1	3		3								4				3						4	3	6
11	5	0															2	5			5				3
12	5	0																			5				1
13	5	0			2				3	3															3
14	5	0									3							5	1						3
15													3												1
16	4	1											2								1				2
17	5	0		1	1		4		2	4	4				4	5				2		4		1	11
18	5	0		3	3		1		1		2			2		3		4	3			3	1	2	12
19	4	1											1				1								2
20	5	0		4										1	2	2			1	3				2	6
22	3	2	5		4			5																1	4
23	3	2	4		5			4				4						1					5		6
24	5	0		5		4														5		1			4
25	5	0																			4				1
	104	8																							

PRETEST MATRIX TABLE OF 5 SOCIOMETRIC CHOICES
OF CLASS C (GRADE 5)

Subject	Same Sex	Opposite Sex	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	No. Choices Received
1	4	1		3		4		5						4			4		5
2	4	1					3				5		2		5	5		5	6
3	5	0		2					5			2		3		2	1	4	7
4	3	2	5	1				4			4			5			3		6
5	3	2			1												2		2
6	3	1	3			2						5		1					4
7	4	1		4	5					3	3				4				5
8	4	1			3		1		2			4	4		3	1		3	8
9	4	1	1	5	4				4	1			3			3		1	8
10	4	1			2	3	5	3	1	5	2		5	2	2	4		2	12
11	5	0																	0
12	3	2	4			5	4	2		2		3					5		7
13	5	0																	0
14	5	0								4		1	1						3
15	3	2	2				2		3		1								4
16	5	0				1									1				2
	64	15																	

PRETEST MATRIX TABLE OF 5 SOCIOMETRIC CHOICES
OF CLASS D (GRADE 6)

Subject	Same Sex	Opposite Sex	1	2	4	5	6	7	8	9	10	11	13	14	15	16	18	19	21	22	24	25	27	28	29	30	Total Choices
1	5	0		4															4	4							3
2	5	0	5									5						2									3
4	5	0				4				3					5	5	3				3	5	4	2	4	5	11
5	5	0					4	5		1				5	3		4		1			4	1		1		10
6	5	0																						5			1
7	5	0																									0
8	4	1								4	4	4						1		3							5
9	5	0			3		3						4				5				4				2		6
10	4	1	4					5				1	3			4		4	5	5		2					9
11	5	0	2					1		2														4			4
13	5	0		2														3		1							3
14	5	0						4											2					3			4
15	5	0			5	2				2				3							1				3	1	7
16	3	1																	3								1
18	5	0			4	5				5				2	4	3					2					4	8
19	5	0	3	3					3		3	2	2							2							7
21	3	2	1	1									1														3
22	5	0		5							5	3	5									1					5
24	5	0			1	1												5					3		5	3	6
25	3	2						2							2		2										3
27	5	0					2	1						1										1			4
28	4	1					5		4														2			2	4
29	5	0			2	3	1		2	4	1				1	2	1				5		5				11
30	5	0																									0
	116	8																									

POSTTEST MATRIX TABLE OF 5 SOCIOMETRIC CHOICES
OF CLASS A (GRADE 6)

Subject	Same Sex	Opposite Sex	1	3	4	5	6	8	9	10	11	12	13	14	15	16	18	19	20	21	22	23	No. Choices Received
1	3	2		5		2	2		3		1		1			2			4	1		4	10
3	5	0						3	1							4							3
4	4	1					5	1					1										3
5	5	0	4							4	3						4	1			3	3	7
6	5	0			5		4																2
8	5	0		4			3		5							1		5	3				6
9	5	0	3	1				5							1	3		2	1				7
10	5	0									3	3	3	4		3							5
11	4	1			4															4			2
12	4	1												5									1
13	3	2																					0
14	5	0				1				2		4					5						4
15	5	0																					0
16	5	0		3			1	2	2								1	4	1				7
18	4	1													3								1
19	4	1	5	2	3			4	4				4			5			5				8
20	5	0			2													3					2
21	4	1									2			1									2
22	5	0	2		4																	5	3
23	4	1		1	3					3			5								2	4	7
	89	11																					

POSTTEST MATRIX TABLE OF 5 SOCIOMETRIC CHOICES
OF CLASS B (GRADE 5)

Subject	Same Sex	Opposite Sex	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	Total Choices
1	5	0										2	4				1							3			4
2	5	0				5	2		5					5												4	5
3	3	2	2					2									5	2						2			5
4	5	0		4			4		4						5											3	5
5	5	0		3							3					3			3			2		2	2		7
6	5	0	1									3									4		1				4
7	5	0					5																				1
8	5	0		2							5			3	1				2								5
9	5	0						3		3	5			1	3	1				1							7
10	5	0	3		2			5									2	4						4	4		7
11	5	0						1			1							5			5						4
12	5	0							2													3					2
13	5	0																									0
14	5	0					3	1											5	2					1		5
15	5	0																			1						1
16	4	1																									0
17	5	0			1	1				4					4	5				3		5					7
18	4	1			3	2		2	3	2			4			4		3	4			4		5	5		12
19	5	0										5															1
20	5	0	1	1					4	1			2		2		1	5									7
22	5	0	5		4			4			5	3				3									3		7
23	2	3	4		5			3			4	1				4	1			2			5				9
24	4	0		5		4			1				2						4		1						6
25	0	0								1																	1
	107	7																									

POSTTEST MATRIX TABLE OF 5 SOCIOMETRIC CHOICES
OF CLASS C (GRADE 5)

Subject	Same Sex	Opposite Sex	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	No. Choices Received
1	4	1				4		3			2			4			3		5
2	4	1									5						1	5	3
3	5	0		5	2		5		5	1		1		2		4		4	9
4	5	0	5	4				2		2	4	4		5		5	4		9
5	4	1			1														1
6	4	1	3			2					3	5		1		3	2		7
7	3	2			5					5			1					3	4
8	5	0					4						4						2
9	2	3	1	1	4	1	2		3	3		2	3			2		2	11
10					3	3	3	4	1	4	1		5	3		1		1	11
11	5	0																	0
12	5	2	4			5	1	5	2			3					5		7
13																			0
14	5	0	2											2					2
15	4	1	2	3				1	4										4
16	5	0																	0
	57	16																	

POSTTEST MATRIX TABLE OF 5 SOCIOMETRIC CHOICES
OF CLASS D (GRADE 6)

Subject	Same Sex	Opposite Sex	1	2	4	5	6	7	8	9	10	11	13	14	15	16	18	19	21	22	24	25	27	28	29	30	Total Choices
1	5	0		4																							1
2	5	0	1		4				2			2							4	4							6
4	4	1				4				2			5	5	5	2	5				3	5	1	3	4		12
5	5	0			2		4			4				1	2						1	4					7
6	5	0						4																5			2
7	5	0					1																				1
8	5	0		2								3															2
9	5	0			3		3							4								3	2		1		6
10	3	2		3					1			1				4		5	1	5						2	8
11	5	0	5						4		1									1							4
13	0	5	3														2	4	2								4
14	5	0				1				1												2					3
15	5	0			5	3				3				3		3	4				2	1		2	2		10
16	3	2					2																				1
18	3	2				5							1		3												3
19	5	0	4							2	4							3	3							1	6
21	5	0																									0
22	5	0	2	5				5		5	5					1		3									7
24	5	0					3			4		3	2										5	4	5	4	8
25	5	0										1				3											1
27	5	0																					4		3		2
28	5	0					5	2																			2
29	5	0			1	2				5	3		4	1	5							5				5	9
30	2	3																					4				1
	105	15																									