THE RELATIONSHIP OF SELF-ESTEEM AND THE DEVELOPMENT OF INTERPERSONAL SPACING IN ELEMENTARY SCHOOL AGE CHILDREN

THESIS

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By

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The purpose of this study was to examine three experimental hypotheses: (1) each grade level in the study will show greater physical distances in interpersonal spacing as the grade level increases in both child-to-child and child-to-adult relationships, (2) interpersonal spacing will be greater in child-to-adult relationships than in child-to-child relationships, and (3) there will be a correlation between a child's self-esteem and his interpersonal spacing in both child-to-child and child-to-adult relationships.

Two basic instruments were used in testing the hypotheses: (1) Interpersonal Spacing Measurement Apparatus and (2) modified Self-Esteem Inventory Short Form B.

The three hypotheses were accepted and significant at better than the .01 level.

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CHAPTER I

INTRODUCTION

In recent years, considerable interest has been aroused in social and behavioral scientists and laymen alike concerning human territorial behavior. Researchers have transferred the available body of knowledge regarding animal behavior to human behavior and have converged from many directions to arrive at studies of territoriality and human behavior.

Recent literature dealing with human territorial behavior has emphasized the idea that an "individual allocates to himself a region of personal space surrounding his body" (3, p. 201), i.e., places a protective distance sometimes called a spatial bubble (20) between himself and others. By maintaining proximity or distance and observing spatial bubbles, animal societies have been able to demonstrate imitation and transfer to mood without an elaborate system of communication (10, p. 351; 2). Man's use and manipulation of this space serves a similar communicative function. Since other humans affect this perception of territory (9), it is commonly referred to as interpersonal spacing or personal distance.

Within the past several years, experimenters have been delving into the relationships between interpersonal spacing

and various personality variables in an attempt to determine whether a correlation exists. The personality variables of self-esteem, how a person views and values himself, are considered to be highly significant in the development of personality (17). Little research, however, has been conducted relating normal children's interpersonal spacing with their self-concept. It seems appropriate, therefore, that a study should be conducted which will correlate self-esteem and the development of interpersonal spacing in normal elementary school age children.

Review of the Literature

Approaches to the study of interpersonal spacing vary with the experimenter and the investigation, but, in measuring interpersonal distance, two major categories appear to exist: (1) human stimuli and (2) simulated human figures. Numerous studies have been conducted utilizing variations of both methods in measurements of children's and adults' interpersonal spacing with variables such as age, sex, groupings, and male/female relationships. Both methods have been used successfully, but the primary drawback to the use of human stimuli is bias or subjectivity on the part of the experimenter in evaluating the subjects' behaviors. At some point in the measurement, either the subjects or the experimenter lean toward subjectivity because of the many variables involved in interpersonal spacing: age, sex, ethnic

background, physical size, and relationships between individuals, situations involved, or transactions.

Edward T. Hall, a leader in the field of proxemics, used a subjective scale of shifts on the perceived loudness of a person's voice (9, pp. 107-108). Harold Garfinkel, in a study of everyday activities, advised persons to invade another's territory by being at close face-to-face proximity without warning and observed the reactions of the subjects (8). Many studies have been conducted requesting subjects to approach inanimate objects (20, p. 30, 14; 18). Other studies, determining the subjects' reactions when being approached by other humans versus subjects approaching other humans, advised when the experimenter who too close for comfortable transactions (13; 5; 7; 1). Most of the measurement procedures utilizing human stimuli, however, depend upon the direct interpretation and evaluation of the data by the experimenter of nonverbal variables demonstrated by the subjects (4).

Striving toward objectivity on the part of subjects and experimenters, researchers have attempted to utilize a more objective method of measuring interpersonal distances in humans. Paper and pencil diagrams (12; 16), felt board figures (23), and movable silhouettes (15) on a board have been used. By using these methods, experimenters can measure more objectively distances between two persons, groups, males/females, and different age groups. Since these methods

are not relying upon the judgment and evaluation of the experimenter or subjects, they have proved relatively reliable because most experimenter-bias is removed.

One of the first studies in interpersonal spacing was conducted by Edward T. Hall. Hall maintained man conducts all transactions at four uniforms distances: (1) intimate (0-18"), (2) personal (19-48"), (3) social (48-144"), and (4) public domain (145" and beyond). Each distance provided for certain types of activities and bodily sensations accompanying each phase (9, pp. 107-122). Robert Sommer, surveying the effects of architecture and overcrowding on personal social distances together with seating arrangements (20), concurred with Hall that each individual has a spatial bubble surrounding him which depends upon the individuals, situations, relationships, and transactions involved.

Interpersonal spacing has been studied extensively in an attempt to determine the exact causes for the phenomena. Variables such as geography, culture, sex, and age, as well as familiarity of adults and children and the effects of mental disturbances, have been investigated. Several generalizations have been reached that personal spacing is influenced by sex, familiarity, geography, and the degree of liking between the persons involved. It is also generally concluded that interpersonal spacing is a part of social learning, but at what point and how it develops has not been determined.

Anna M. Fry and Frank N. Willis, in an investigation of adults' reactions to children of various ages standing behind them in a theatre line, concluded that older children received more negative reactions from an adult than younger children. As a child's age increased, more space was required between the adult and the child (7). This correlated with Sommer's findings of persons in overcrowded situations (20). The older child received similar negative reactions from the adult as would another adult receive when spatial bubbles were not observed. But no conclusive studies have been conducted on the development of interpersonal spacing in children.

In recent years, research has delved into personality variables affecting man's interpersonal spacing. John L. Williams, after classifying students as introverts or extroverts based on scores of a personality test, reported that introverts kept people at a greater conversational distance than extroverts (20, p. 30). This was further supported by William E. Leipold, who noted that introverted and extroverted college students place themselves in relation to an interviewer, in either a stress or nonstress situation, according to whether they had received stress or praise prior to the interview (20, p. 30).

Several conclusions about the relationships between personality variables and interpersonal spacing have been reached. Adults who suffer from personality disorders or

abnormalities need more personal space in transactions than normal persons (6 ; 11; 21; 22). Little research, however, has been conducted on the relationship between normal persons' interpersonal spacing and their self-esteem. A group of researchers, Alan F. Silverman, M. E. Pressman, and H. W. Bartel, successfully predicted that in the adult, the higher the subject's self-esteem, the more intimate the subject would be in communication through touch (19). But determining the relationship between self-esteem and the development of interpersonal spacing in children has not been successfully explored at this time. It seems appropriate that such a study take place.

Purpose of the Study and Hypotheses to be Tested

Although many studies have recently investigated interpersonal spacing and personality variables, the question of whether there is a correlation between self-esteem and interpersonal spacing in normal elementary school age children has not been answered in the literature on interpersonal spacing. Nor has the question of the development of interpersonal spacing of elementary school age children been answered. Such is the concern of this study.

In order to conduct this investigation, three hypotheses will be tested:

Hypothesis I states that each grade level in the study will show greater physical distances in interpersonal spacing as the grade level increases.

Sub-hypothesis A states this will be demonstrated in child-to-child relationships throughout all classes in the study.

Sub-hypothesis B states child-to-adult relationships will also have an increased physical distance in interpersonal spacing as the grade level increases.

Hypothesis II states that interpersonal spacing is greater in child-to-adult relationships than in child-to-child relationships.

Hypothesis III states that there will be a correlation between a child's self-esteem and his interpersonal distances.

Sub-hypothesis A states this will exist in child-to-child relationships.

Sub-hypothesis B states it will also be apparent in child-to-adult relationships.

Limitations and Assumptions of the Study

The study was limited to interpersonal distances and the effects of self-esteem on interpersonal distances by grade level. No attempt was made to interpret certain nonverbal behaviors of the subjects nor such variables as ethnic background, family history, school behavior, or scholastic standing.

It was assumed that the examiner was consistent, the subjects responded honestly to the instruments administered to them, and the instruments used were sufficiently valid and reliable.

Contents of the Study

Chapter I has presented a review of the literature available on interpersonal spacing, the purpose of the thesis together with the hypotheses to be tested, and the limitations and basic assumptions of the study.

Chapter II examines the population of the study, describes the instruments and their foundations, and contains a discussion of the testing procedures and techniques.

Chapter III presents the data and offers interpretation based upon it.

Chapter IV deals with the summary and conclusions of the data and implications for further research.

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CHAPTER II

PROCEDURES

The major purpose of this section of the study is to identify the research procedures which were followed with regard to the implementation of this study.

Three hypotheses were set forth in the first chapter of the study, and in order to test the hypotheses, elementary school age children from grades one through four were individually, orally administered a self-esteem test and measured for interpersonal distances in both child-to-child and child-to-adult relationships.

Subjects

The research for this study was conducted in April, 1975, at an elementary school in Denton, Texas. The population consisted of one hundred thirty-three elementary school age children in grades one through four. Two first-grade classes, two second-grade classes, one third-grade class, and two fourth-grade classes participated in this study. Included within the group were seventy-four male and fifty-nine female subjects of mixed ethnic and cultural backgrounds and differing scholastic standings.

Equipment

Each subject's personal space was measured by using an apparatus, the Interpersonal Spacing Measurement Apparatus (ISMA), composed of movable simulations of human figures.

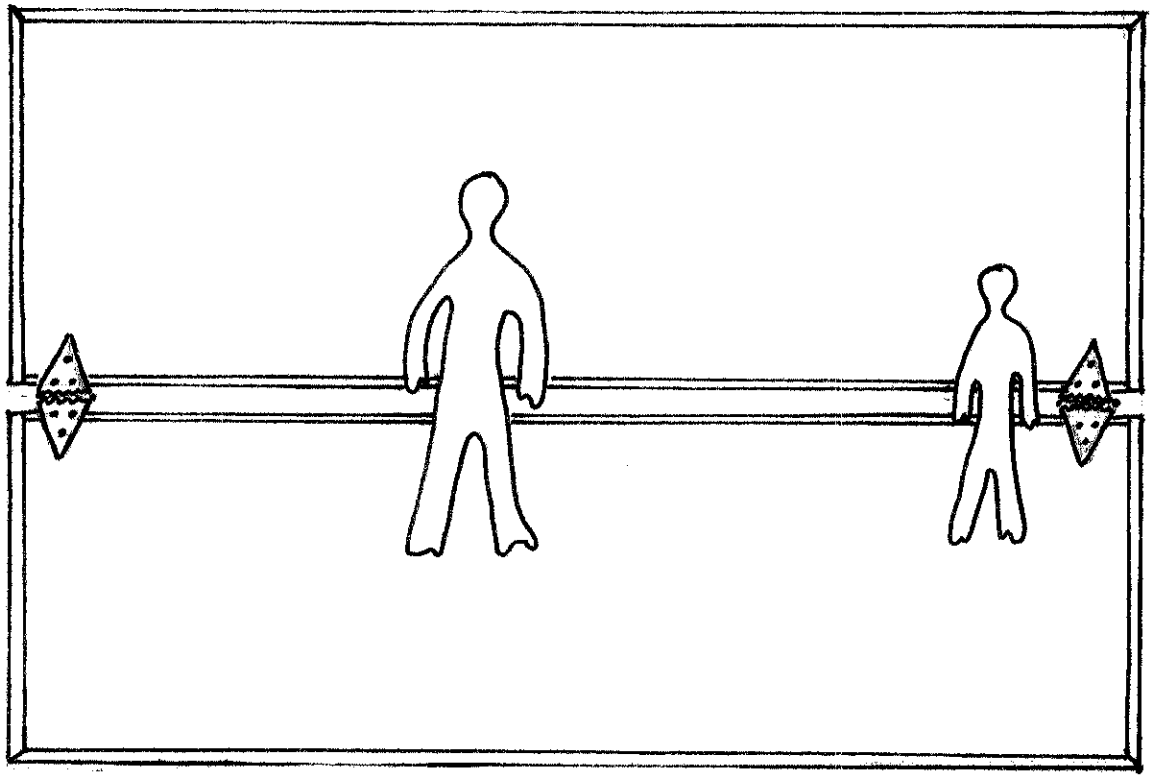

Fig. 1. Diagram of Interpersonal Spacing Measurement Apparatus.

The ISMA was designed to stand at eye-level with an elementary school age child and measure only child-to-child and child-to-adult relationships, not factors such as sex, age, ethnic groupings, or relationships.

The instrument was a thirty-six inch by forty-eight inch collapsible masonite board painted flat black to

reduce background distractions with a one-inch horizontal slot in the center for attaching the human figure stimuli.

The human figure stimuli consisted of two child figures in the shape of gingerbread men, nine inches in height in standing positions, to represent either a male or female elementary school age child. A third human figure, shaped like a gingerbread man, representing either a male or female adult, was thirteen inches in height in standing position. These unpainted plywood figures were readily attached to the front surface of the slot and easily manipulated by the subject from the front of the apparatus.

A tape measure on the back of the board enabled the experimenter to measure the distances between the two stimuli to the nearest one-fourth inch.

Each subject's self-esteem was measured by a Self-Esteem Inventory (SEI) Short Form B designed by Stanley Coopersmith. Several modifications were made for the group under study (see Appendix). The original Self-Esteem Inventory Short Form B consisted of twenty-five statements to be answered "Like Me" or "Unlike Me." Because of the educational and conceptual level of the subjects involved, each statement was changed to a direct question to be answered "Yes" or "No."

The Self-Esteem Inventory measures evaluative attitudes toward the self in several domains. The original pool of items was drawn from psychologists C. Rogers and R. Dymond (4) and research by Coopersmith. Five psychologists classified

the items as indicative of high or low self-esteem (1). Fifty items were selected by Coopersmith and then reduced to twenty-five items from an item analysis of the responses to the longer form. The SEI Short Form B has been found to correlate over .95 with the original fifty-item Self-Esteem Inventory. John Robinson and Phillip R. Shaver reported that "this short scale has considerable flexibility in measuring the family, social, self-acceptance and anxiety-assertiveness areas of the self-concept for various ages" (3, p. 84).

It was recommended that the Self-Esteem Inventory be individually administered with rewording when necessary for clarification for children younger than age nine whose educational experience has not resulted in an average reading or conceptual level.

Administration

Subjects were interviewed individually in a small room at an elementary school in Denton, Texas. After a brief introduction, each subject standing at eye-level with the ISMA was requested to imagine he was the child figure on the right and he was standing and talking to the child figure on the left. The subject was then requested to move the figure on the left along the slot to a distance where he would like to stand to talk to the other person.

After measurement was recorded, the child figure on the left was exchanged for the adult figure, and the same instructions were given and the measurement noted.

Following the interpersonal spacing measurements, the modified SEI Short Form B was individually, orally administered. The experimenter recorded each answer on an individual score sheet and hand scored the tests at the end of the experiment.

In all cases, the subjects received no preparation for the interview by their respective teachers and the instructions given to each subject were relatively standard, including the rewording when necessary for clarification.

Statistical Treatment

In this study, the arithmetic means were computed by individual grade level and overall for the interpersonal spacing measurements in the form of inches in both child-to-child and child-to-adult relationships. The hypotheses were tested by computing a product-moment-correlation coefficient between variable 1 (interpersonal distance) and 2 (SEI scores and grade level) (2, p. 106). The significance of the r from zero was determined by a t-test for correlation coefficients.

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CHAPTER III

RESULTS AND ANALYSIS OF THE DATA

The purpose of the present study was designed to examine the development of interpersonal spacing in elementary school age children and the effects of self-esteem on interpersonal spacing in both child-to-child and child-to-adult relationships.

The impact of the study was to be observed through the analysis of data and scores provided by two basic instruments: (1) Interpersonal Spacing Measurement Apparatus, and (2) modified Self-Esteem Inventory Short Form B, as presented in Chapter II.

Three experimental hypotheses were to be tested by research involving grades one through four at an elementary school in Denton, Texas.

Hypothesis I

In order to establish the development of interpersonal spacing in elementary school age children, data were grouped by grade level, regardless of teacher.

Hypothesis I states that each grade level in the study will show greater physical distances in interpersonal spacing as the grade level increases.

For the purpose of analysis, this hypothesis was subdivided into two parts:

Sub-hypothesis A states this will be demonstrated in child-to-child relationships throughout all classes in the study.

In measuring the child-to-child relationships, the mean distance the child figures were placed on the Interpersonal Spacing Measurement Apparatus was computed. (See Table I.)

TABLE I

DEVELOPMENT OF INTERPERSONAL SPACING IN CHILD-TO-CHILD RELATIONSHIPS BY GRADE LEVEL

Grade Level	Number of Subjects Tested	Mean Distance (In Inches)
First	39	3.6154
Second	36	3.6597
Third	27	4.1111
Fourth	31	4.6750

The thirty-nine first graders measured placed the two child figures a mean distance of 3.6154 inches apart. The thirty-six second graders placed the two child figures at a mean distance of 3.6597 inches, an increase of .0443 inches over the first grade. The twenty-seven subjects in the third grade positioned the figures 4.1111 inches apart, an increase of .4514 inches from the second grade, and the

thirty-one fourth-grade subjects placed the two child figures at a mean distance of 4.6750 inches, an increase of .5639 inches over the third grade.

Relative to Sub-hypothesis A of Hypothesis I, as the grade level increased so did child-to-child relationships ($r = .43$; $p < .01$). Therefore, Hypothesis I, Sub-hypothesis A is accepted: interpersonal distance for child-to-child relationships positively correlated with grade level. As the grade level increased so did the interpersonal distance.

Sub-hypothesis B states child-to-adult relationships will also have an increased physical distance in interpersonal spacing as the grade level increases.

To test this sub-hypothesis, the subjects placed a child and adult figure on the Interpersonal Spacing Measurement Apparatus, and the mean distance between the two figures was computed. (See Table II.)

The mean distance the thirty-nine first graders placed the two figures indicating a child-to-adult relationship was 3.2756 inches. The second grade, consisting of thirty-six subjects, placed the two figures a mean distance of 4.2222 inches apart, an increase of .0466 inches over the first grade. The third grade, with twenty-seven subjects, placed the two figures a mean distance of 4.4722 inches apart, an an increase of .2500 inches over the second grade, and the thirty-one fourth graders placed the two figures a mean

distance of 4.7417 inches, an increase of .2695 inches over the third grade.

TABLE II

DEVELOPMENT OF INTERPERSONAL SPACING IN CHILD-TO-ADULT RELATIONSHIPS BY GRADE LEVEL

Grade Level	Number of Subjects Tested	Mean Distance (In Inches)
First	39	3.2756
Second	36	4.2222
Third	27	4.4722
Fourth	31	4.7417

Concerning Sub-hypothesis B of Hypothesis I, as the grade level increased so did the interpersonal distances of child-to-adult relationships ($\underline{r} = .54$; $p < .01$). Hypothesis I, Sub-hypothesis B is accepted. Interpersonal distance for child-to-adult relationships positively correlated with grade level. The higher the grade level, the greater the interpersonal distance.

Hypothesis II

In order to determine the overall interpersonal spacing measurements in child-to-child and child-to-adult relationships, data from Tables I and II were combined and a product-moment correlation coefficient was computed, and

the significance of the r from zero was determined by a t-test for correlation coefficients. (See Table III.)

TABLE III

INTERPERSONAL SPACING IN CHILD-TO-CHILD AND CHILD-TO-ADULT RELATIONSHIPS

Variable	Means	r	t	p
Child-to-Child	3.9697	.50	-1.698	$<.10$
Child-to-Adult	4.1117			

Hypothesis II states the interpersonal spacing will be greater in child-to-adult relationships than in child-to-child relationships.

Analyzing the overall data in Tables I and II and comparing the total mean distances between child-to-child and child-to-adult relationships for the subjects tested, the mean distance for child-to-child relationships was 3.9697 inches and for child-to-adult relationships 4.1117 inches, an increase of .1420 inches for child-to-adult relationships. The correlation coefficient of r was .50 with the t-test of -1.698. Since direction was indicated in the hypothesis of child-to-adult relationships having greater interpersonal spacing than child-to-child relationships, a one-tail test was used and significant at the $<.01$ level. Thus, Hypothesis II is accepted.

Breaking down Hypothesis II by grade level, there are significant differences at three grade levels. (See Table IV.) The first grade with thirty-nine subjects indicated a greater interpersonal distance in child-to-child (3.6154 inches) relationships than in child-to-adult (3.2756 inches) relationships (r = .48; t = 2.093) which could be more closely scrutinized by further research determining why this occurred.

TABLE IV

INTERPERSONAL SPACING IN CHILD-TO-CHILD AND CHILD-TO-ADULT RELATIONSHIPS BY GRADE LEVEL

Grade Level	Child-to-Child Mean Distances (In Inches)	Child-to-Adult Mean Distances (In Inches)	r	t
First	3.6154	3.2756	.48	2.093
Second	3.6597	4.2222	.32	-3.344
Third	4.1111	4.4722	.54	-2.847
Fourth	4.6750	4.7417	.26	-0.462

The thirty-six second graders tested indicated a greater interpersonal distance in child-to-adult (4.2222 inches) relationships than in child-to-child (3.6597 inches) relationships, an increase of .5625 inches between child-to-child and child-to-adult relationships (r = .32; t = -3.344).

The measurements of the child-to-adult relationships of the twenty-seven third graders was 4.4722 inches. The

third graders measured a mean distance of 4.1111 inches for child-to-child relationships, an increase of .3611 inches ($\underline{r}$ = .54; $\underline{t}$ = -2.847) over the child-to-adult relationships.

The thirty-one fourth graders indicated closer child-to-child (4.675 inches) relationships than child-to-adult (4.7417 inches) relationships; again, an increase of .0667 inches between child-to-child and child-to-adult relationships ($\underline{r}$ = .26; $\underline{t}$ = -.462).

Hypothesis II broken down by grade level indicates interpersonal spacing is greater in child-to-adult relationships than in child-to-child relationships at three grade levels (second, third, and fourth grades) and significant at the $<.01$ level.

Hypothesis III

Hypothesis III states there is a correlation between a child's self-esteem and his interpersonal distance.

Each subject's modified Self-Esteem Inventory Short Form B was hand-scored, with scores ranging from sixteen to ninety-two out of a possible one hundred perfect score indicating high self-esteem. For the purpose of analysis, it was necessary to divide this hypothesis into two parts:

Sub-hypothesis A states this will exist in child-to-child relationships.

In order to determine if a correlation exists between a child's self-esteem and his child-to-child relationships,

a product-moment correlation coefficient between variable 1 (interpersonal distance of child-to-child relationships) and 2 (modified SEI Short Form B scores) was computed. (See Table V.)

TABLE V

EFFECT OF SELF_ESTEEM ON INTERPERSONAL DISTANCES IN CHILD-TO-CHILD AND CHILD-TO-ADULT RELATIONSHIPS

Variable	r	p
Child-to-Child	-.38	$< .01$
Child-to-Adult	-.30	$< .01$

Based on the instruments used in this study, self-esteem was negatively related to child-to-child distances ($r = -.38$; $p < .01$). As self-esteem increased, the interpersonal distance decreased, indicating there is a correlation between a child's self-esteem and his interpersonal distance in child-to-child relationships. Thus, Sub-hypothesis A is accepted.

Sub-hypothesis B states it will also be apparent in child-to-adult relationships.

Determining if a correlation exists between child-to-adult relationships and a child's self-esteem, a product-moment correlation coefficient was computed between variables 1 (interpersonal distance of child-to-adult relationships)

and 2 (modified Self-Esteem Inventory Short Form B scores). Self-esteem was again negatively related to child-to-adult relationships ($r = -.30$; $p < .01$). As the self-esteem increased, interpersonal distance decreased for child-to-adult relationships, indicating there is a correlation between a child's self-esteem and his child-to-adult relationships. Thus, Sub-hypothesis B is accepted. Hypothesis III is correct, significant at better than the .01 level.

Breaking down the findings by grade level indicates that, at each grade level, self-esteem is negatively related to interpersonal distances in both child-to-child and child-to-adult relationships. As the self-esteem increased, the interpersonal distance decreased. (See Table VI.)

TABLE VI

EFFECT OF SELF-ESTEEM ON INTERPERSONAL DISTANCES IN CHILD-TO-CHILD AND CHILD-TO-ADULT RELATIONSHIPS BY GRADE LEVEL

Variable	Child-to-Child r	Child-to-Adult r
First Grade	-.61	-.42
Second Grade	-.54	-.21
Third Grade	-.11	-.27
Fourth Grade	-.04	-.49

The correlation coefficients of the first and second grades child-to-child relationships ($r = -.61$; $r = -.54$) are

significant at better than the .01 probability level. In child-to-adult relationships, the first grade (r = -.42) and the fourth grade (r = -.49) correlation coefficients are significant at better than the .01 probability level.

The correlation coefficients of the third grade in child-to-child relationships (r = -.11) and the fourth grade (r = -.04) in child-to-child relationships and the correlation coefficients in child-to-adult relationships of the second grade (r = -.21) and the third grade (r = -.27), while not significant at better than the .01 probability level, still indicate there is a correlation between a child's self esteem and his interpersonal spacing in both child-to-child and child-to-adult relationships. The higher the self-esteem, the closer the interpersonal distances. Thus, Hypothesis III, in its entirety, is accepted.

From the two basic instruments utilized in this study (1) Interpersonal Spacing Measurement Apparatus and (2) modified Self-Esteem Inventory Short Form B, the three hypotheses set forth in Chapters I and II were analyzed and accepted.

CHAPTER IV

SUMMARY AND CONCLUSIONS

The purpose of the present study was to examine the relationships between self-esteem and the development of interpersonal spacing in elementary school age children. An Interpersonal Spacing Measurement Apparatus was utilized together with a modified Self-Esteem Inventory Short Form B, designed by Stanley Coopersmith, which was individually and orally administered to one hundred thirty-three elementary school age children.

Three hypotheses were tested in conducting this investigation. Hypothesis I states that each grade level in the study will show greater physical distances in interpersonal spacing as the grade level increases, in both child-to-child and child-to-adult relationships. This was upheld, significant at the $<.01$ level. The second hypothesis states the interpersonal spacing is greater in child-to-adult relationships than in child-to-child relationships. The second hypothesis was significant at the $<.10$ level, and when broken down by grades, significant differences were indicated between child-to-adult relationships and child-to-child relationships at the second-, third-, and fourth-grade levels. Hypothesis II states there will be a correlation

between a child's self-esteem and his interpersonal distance in both child-to-child and child-to-adult relationships. The correlation coefficients broken down overall and by grade level indicated that as the self-esteem of a child increased, the interpersonal spacing in both child-to-child and child-to-adult relationships decreased.

The implications of this study raise many questions, such as how and why the phenomena of interpersonal spacing occurs? At what age or grade level will the interpersonal distances reach a plateau to continue through the adult years? Can a child's self-esteem be raised or lowered by encouraging or discouraging closer interpersonal distances? These questions were not answered in this study nor in other studies of the body of literature available regarding interpersonal spacing. This study was concerned only with the development of interpersonal spacing and a possible correlation between self-esteem and interpersonal spacing in elementary school age children.

While no evaluations were made of certain nonverbal behaviors of the subjects and the testing remained objective, it was necessary to reword questions involving the home, school, and social and self-acceptance, depending upon the grade level. Twenty of the thirty-nine first graders indicated either verbally or nonverbally by puzzled expressions or direct questions, difficulty in answering the questions concerning the home and family. Fourteen of the

thirty-six second graders expressed, either verbally or nonverbally, difficulty in answering questions concerning school. The twenty-seven third graders tested had no difficulty answering any of the questions, but needed questions reworded regarding themselves and their relationships with their peers. The fourth grade showed no difficulty, verbally or nonverbally, in answering any of the questions; but, twenty-eight of the thirty-one fourth graders expressed concern as to whether their parents or teacher would see their answers.

Suggestions for Further Research

The findings of this study were limited to interpersonal spacing and the effects of self-esteem on interpersonal spacing in elementary school age children in grades one through four. Future research could follow these ideas: (1) replication, for further substantiation of these findings; (2) studies into the reason first graders showed closer child-to-adult relationships than child-to-child relationships; (3) research into personality variables, such as certain nonverbal behavior, race, sex, family background, scholastic standing, and school behavior; and (4) measurement of a child's self-esteem, coupled with a teacher and/or peer evaluation.

The results of this study add to the body of knowledge available to those persons interested in a child's

development of interpersonal spacing and the relationships of self-esteem and interpersonal spacing in elementary school age children.

APPENDIX

Name:_____ Teacher:_____ Grade:___

Sex:_____ Age:_____ Race:_____SEI Score:____

Measurements: Child-to-Child:_____

Child-to-Adult:_____

SEI Short Form B (Modified)

		YES	NO
1.	Do you often wish you were someone else?	____	*
2.	Do you find it very hard to talk in front of the class?	____	*
3.	Are there lots of things about yourself you'd change if you could?	____	*
4.	Can you make up your mind without too much trouble?	*	____
5.	Are you a lot of fun to be with?	*	____
6.	Do you get upset easily at home?	____	*
7.	Does it take you a long time to get used to anything new?	____	*
8.	Are you popular with kids your own age?	*	____
9.	Do your parents usually consider your feelings?	*	____
10.	Do you give in very easily?	____	*
11.	Do your parents expect too much of you?	____	*
12.	Is it pretty tough to be you?	____	*
13.	Are things all mixed up in your life?	____	*
14.	Do kids usually follow your ideas?	*	____
15.	Do you have a low opinion of yourself?	____	*
16.	Are there many times when you'd like to leave home?	____	*

		YES	NO
17.	Do you often feel upset in school?	____	*
18.	Do you feel you're not as nice looking as most people?	____	*
19.	If you have something to say, do you usually say it?	*	____
20.	Do your parents understand you?	*	____
21.	Are most people better liked than you are?	____	*
22.	Do you usually feel as if your parents are pushing you?	____	*
23.	Do you often get discouraged in school?	____	*
24.	Do things usually not bother you?	*	____
25.	Do you think you can't be depended on?	____	*

*Responses indicating high self-esteem

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