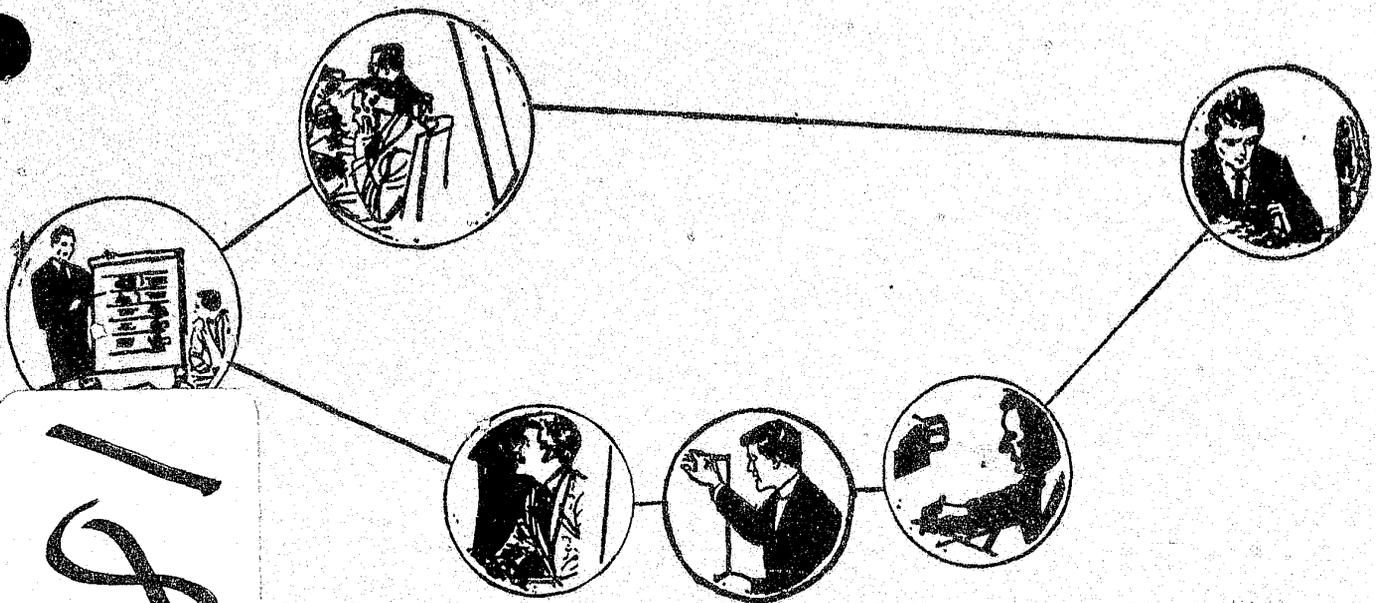


COMMUNICATION FACTORS ASSOCIATED WITH REDUCED RECIDIVISM OF PAROLED JUVENILES IN COLORADO

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COLORADO
YOUTH
WORKERS
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NI-69074

69-NI-074

COMMUNICATION FACTORS ASSOCIATED WITH REDUCED
RECIDIVISM OF PAROLED YOUTHS IN COLORADO

NCJRS

AUG 5 1980

ACQUISITIONS

A FINAL REPORT

PRESENTED TO

THE UNITED STATES JUSTICE DEPARTMENT
LAW ENFORCEMENT ASSISTANCE ADMINISTRATION

PROJECT ACORN

BY

THE STATE OF COLORADO
DEPARTMENT OF INSTITUTIONS
DIVISION OF YOUTH SERVICES
FORT LOGAN, COLORADO

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CALVERT DODGE, RESEARCHER

JULY, 1970

ACKNOWLEDGEMENTS

Appreciation is extended to those persons who contributed time, effort, and financial support to this study. Special thanks go to Dr. Carl Larson of the University of Denver and to Dr. James Lewis of the University of South Dakota for their expert assistance in the design of the study and assistance in the data analysis. To Mr. Mylton Kennedy, Mr. Loren Adlfinger, and Mr. William Masimer of the Colorado Division of Youth Services for various arrangements in connection with data gathering. To Mr. J. Steven Ott and Mr. David R. Matteson of Auto-Tronix Universal Corporation for assistance in computer programming and analysis of data. To Mr. Mark Liebig of the International Society for General Semantics and to Mrs. Barbara Riggs for assistance in the revision of instrument vocabulary and pilot study assistance.

And particular appreciation is expressed to the young men who were the subjects of this investigation.

The study was made possible through a grant from the United States Justice Department, Law Enforcement Assistance Administration.

TABLE OF CONTENTS

CHAPTER	PAGE
I. INTRODUCTION	1
Purpose of the Study	1
Importance of the Study	1
Definitions Used in the Study	2
Interaction	2
Adjudicated delinquent youth	4
Recidivist	4
Factor	4
The Organization of the Study	5
II. PROCEDURES	6
Population Sampled	6
The Instrument Selected for Measuring Interaction	8
Language Revision in the Instrument	11
Additional Materials Included with the Instrument	12
Data Collection and Processing	12
Treatment of Data	13
Factor analysis as an analytical methodology	13
Rationale for using factor analysis	14
Method of factor analysis selected	15
Interpretation of the rotated factor matrix	17
III. RESULTS	18
Criteria in Determining Number of Factors	
Extracted	18

CHAPTER	PAGE
Comparisons of Two Factor Analyses	21
Three Factor Descriptions	26
Factor A	26
Factor B	31
Factor C	31
Statistical Analysis	36
Summary	41
V. SUMMARY	42
Procedures	43
The Results	43
Research Design	46
The Results in Relation to Other Research . . .	47
BIBLIOGRAPHY	49
APPENDIX A	53
APPENDIX B	60
APPENDIX C	67
APPENDIX D	70
APPENDIX E	73
APPENDIX F	75
APPENDIX G	77
APPENDIX H	79
APPENDIX I	83
APPENDIX J	87
APPENDIX K	89
APPENDIX L	91
APPENDIX M	93

LIST OF TABLES

TABLE	PAGE
I. Size of Population and Samples Obtained	9
II. Factor Agreement Between Samples	23
III. Variance Accounted for by Extracted Factors from the Two Camp Samples	24
IV. Variance Accounted for by Extracted Factors from the Lookout Mountain School for Boys Sample . .	25
V. Factor A Loadings	27
VI. Differences Between Samples from Camps and Lookout Mountain School for Boys in Terms of Factor A Loadings on "Human Warmth"	29
VII. Differences Between Samples from Camps and Lookout Mountain School for Boys in Terms of Factor A Loadings on "A Father-Image-Stereotype" .	30
VIII. Factor B Loadings	32
IX. Differences Between Samples from Camps and Lookout Mountain School for Boys in Terms of Factor B Loadings	33
X. Factor C Loadings	34
XI. Differences Between Samples from Camps and Lookout Mountain School for Boys in Terms of Factor C Loadings on Physically Oriented Items	35

TABLE

PAGE

XII.	Differences Between Samples from Camps and Lookout Mountain School for Boys in Terms of Factor C Loadings on Selected Process-Verbal Items	37
XIII.	Items Included in Computing Factor Scores	39
XIV.	Analysis of Variance Between Two Camp Samples and Lookout Mountain School for Boys Sample on Factor A Scores	40

CHAPTER I

INTRODUCTION

Purpose of the Study

This study was undertaken to accomplish the following:

1. To begin to define interaction patterns of delinquent youth and their counselors in the rehabilitative camp environment.
2. To discover if interaction patterns in the camp environment differ from patterns of interaction in larger institutions.
3. To investigate the assumption that these interaction patterns are associated with recidivism rates of youths paroled from Colorado's two youth camps.

Importance of the Study

Some important reasons for investigating these interaction patterns were as follows:

1. Knowledge of the interaction patterns between counselor and delinquent youth may allow more effective treatment programs.
2. The counselor's knowledge of these interaction patterns may assist him in his development of meaningful relationships with the delinquent youth.

- 3. Knowledge of these interaction patterns may be of an assistance in training counselors in correctional institutions.
- 4. Knowledge of these interaction patterns may also assist in discovering the differences between the total correctional environment of the camp compared with larger institutions.

Definitions Used in the Study

The terms included here were considered important in the study and are defined in the following paragraphs. These terms are: Interaction, Adjudicated delinquent youth, Recidivist, and Factor.

Interaction. Interaction has been defined in several ways by different authors. Berlo (1965) suggested that the term "interaction" names the process of reciprocal role-taking.

Goffman (1961) defined interaction, in part, into two separate segments, focused and unfocused interaction:

. . . Unfocused interaction consists of those interpersonal communications that result solely by virtue of persons being in one another's presence, as when two strangers across the room from each other, check up on each other's clothing, posture, and general manner, while each modifies his own demeanor because he himself is under observation.

Focused interaction occurs when people effectively agree to sustain for a time a single focus of cognitive and visual attention, as in a conversation, a board-game, or a joint task sustained by a close face-to-face circle of contributors. (p. 8)

Newcomb (1953) suggested that the phenomena of interaction should be viewed as events within communication systems. Interaction, like other human behaviors, may be viewed as a result of a person's actual or anticipated relationships with other human beings in a particular environment. The knowledge of the dynamics of such a communication system allows prediction of both the likelihood of concurrence of a given act of communication and the nature of changes in those events which will result from the communication act.

Interaction, according to Horace B. and Ava C. English (1958), was defined as "mutual or reciprocal influence between two or more [human] systems" (p. 7) indicating that each member is influencing other members and, in turn, is being influenced by each member. The members involved in interaction are constantly reacting, adapting, and modifying their behavior in response to each other.

Interaction has also been defined with respect to the essential elements necessary for interaction to take place. Among these are the involvement of a sender and a receiver, the signs the sender uses (usually transmitted aurally or visually), the purpose of the message, and how the receiver perceives the message and responds to it (Larson, 1965).

For the purposes of this study, the term interaction pattern was used to define that pattern of communication

which takes place between counselors and delinquent youths in delinquent youth rehabilitation institutions in Colorado. The interaction patterns reported in the study were described by the youths in terms of their perceptions about their relationships with counselors within the correctional environment.

Adjudicated delinquent youth. The study used the term adjudicated delinquent youth to mean a youth, usually ranging in age from fifteen and one-half to eighteen, who had been judged in difference with current laws. This youth was therefore subjected to some correctional force considered helpful in terms of treatment or rehabilitation by the administration of the institutionalized system.

Recidivist. For this study, the term recidivist was any youth who, after being paroled from either Lathrop Park Youth Camp or Golden Gate Youth Camp in Colorado, committed an illegal act and whose parole was revoked or, if already released from parole, was readjudicated a delinquent. In either case, the youth was returned to the Colorado Department of Institutions within a twelve month period after his original release or parole.

Factor. The term factor was used in the study to mean the mathematical definition resulting from the process of factor analysis. The factor was conceptually interpreted by examining those several items of a fifty-item test which were closely related to the factor.

The Organization of the Study

The study consisted of a pilot and a final investigation. The pilot study was concluded in December, 1969; and the final study was concluded in July, 1970.

The following chapter describes the methods developed and used in the study. The third chapter presents the data collected and interprets the findings. The final chapter summarizes the preceding material and discusses some implications of the study. Supportive tables, a review of the literature concerning related research, a bibliography, samples of tests used, and other data make up the balance of the report.

CHAPTER II

PROCEDURES

This chapter outlines the procedure which was utilized to assess the interaction between delinquent youth in Colorado with their counselors. A description of the population from which the sample was selected is discussed. The instrument and its scaling techniques used in this study are described. A discussion of the study is followed by a discussion of factor analysis, the method used to analyze the data.

Population Sampled

Five populations were sampled for the study. The first population sampled was adjudicated delinquent youths incarcerated at Golden Gate Youth Camp near Blackhawk, Colorado. The second population was incarcerated youths at Lathrop Park Youth Camp located near Walsenberg, Colorado. The third population sampled was youths incarcerated at Lookout Mountain School for Boys, Golden, Colorado, with the exception of those youths paroled from the camps but now incarcerated at the Golden-located institute. The fourth population was youths paroled from the two camps but returned to Lookout Mountain School for Boys by some court action such as parole revocation. Ages of the youths in these four groups ranged from fifteen and one-half to eighteen. The

fifth population sampled was youths who had been paroled from either camp whose last known address was in the Denver metropolitan area and whose parole had not been revoked nor, by some other court action, had these youths been returned to Colorado's Department of Institutions. An additional criteria for including this population in the study was that these youths must have maintained this "free" status for a period of one year. The ages of this non-recidivist population ranged from seventeen to twenty-three.

Each of the youth camps had beds for a population of forty-eight youths. The Lookout Mountain School for Boys had beds for a capacity of three hundred fifty youths. Staffs at each youth camp consisted of twenty-one employees which included nine employees at each camp who were classified as counselors. The staff at Lookout Mountain School for Boys averaged one hundred seventy-two. Of this number of staff members, thirty are classified as Resident Supervisors, which is a civil service title for what is known in corrections as a cottage counselor. The ratio of youths to counselors at the time of the study was eight youths to one counselor at the camps and fifteen youths to each cottage counselor at Lookout Mountain School for Boys.

This study attempted to obtain a maximum of the population. Personal visits to the institutions were used to collect data from all of the populations sampled except the

non-recidivist. Non-recidivists data was collected by inviting (through the mails) non-recidivists to meet at a central office in Denver on several different dates. Complete coverage of the populations was not obtained. The percent of each population sampled is given in Table I.

The Instrument Selected for Measuring Interaction

For purposes of this study, the term interaction was used to describe the perceptions reported by the youths about their relationships with counselors within the correctional environment. Specifically, the study dealt with committed, adjudicated delinquent youths and their counselors in the Colorado Correctional Institutions.

The selected instrument used in this study was a revision of a test developed by Reusch, Block, and Bennet (1953) for the assessment of interaction; used subsequently by Block (1952); Block and Bennet (1955); Kalis and Bennet (1957); and, in its revised form, by Larson (1965). As originally developed, the test consisted of one hundred items designed for Q-sorting by subjects into an enforced normal distribution. The revised form used by Larson (1965) (see Appendix A) had as its title, "Interaction Test (He-Me Version)," and consisted of fifty statements, each of which described some dimension of interaction, and a seven-part, modified Likert-type response scale applied to each statement. An example of this scale and its spatial proximity to one of the statements is shown in Figure 1.

TABLE I
 SIZE OF POPULATION AND SAMPLES OBTAINED

Group	Population Size	Sample Size	Per Cent of Population Sampled
Golden Gate Youth Camp	44	40	91
Lathrop Park Youth Camp	42	42	100
Recidivists*	36	36	100
Non-recidivists**	89	40	44
Lookout Mountain School for Boys	280	119	

*The term recidivist refers to any youth who was paroled from either camp but was judged in violation of parole (parole revocation) within one year of his parole date and, consequently, was returned to the Department of Institutions for incarceration at the Lookout Mountain School for Boys.

**The term non-recidivist refers to any youth who was paroled from either youth camp and was not judged in violation of parole for a period of twelve months or more following the date of parole.

22. He is careful not to upset me.

Never: Almost Never: Only Occasionally: Sometimes: Frequently: Almost Always: Always

FIGURE 1

The subject's response to each statement was made by circling the appropriate part of the seven-part scale for each of the fifty statements. The subject's fifty scores on this He-Me Interaction Test formed the basis for analysis.

Estimates of reliability, which were based upon repeated Q-sorts of one hundred similar statements and sorted into nine piles along a "characteristic" continuum, were reported by Block (1952) to be about .82.

Language Revision in the Instrument

A reading specialist for the Colorado Division of Youth Services examined the Interaction Test (He-Me Version) and determined that certain words would have to be replaced so that meanings could be more easily understood by the subjects. Most of the subjects were one, two, or more reading levels behind their counterparts outside of the institutions; and all the subjects had less than three years of high school (Riggs, 1969).

To adapt the language of the test to the population examined, a study was made of one hundred twenty subjects in the correctional environment previously described. Words from statements in the He-Me Interaction Test were defined by subjects in the youth institutions. From definitions given by those tested, a second test was developed to define synonyms which could be substituted in the Interaction He-Me Test. Samples of the youth populations were selected and

tested on these synonyms. The samples included ninety-nine per cent of the populations of the two youth camps and twenty-five per cent of the population of Lookout Mountain School for Boys aged fifteen and one-half to seventeen and one-half. Sample copies of these two tests are shown in Appendix C.

Revision of the Interaction Test (He-Me Version) was then made for better understanding (see Appendix B).

Additional Materials Included with the Instrument

In order to present instructions for marking the Revised Interaction Test (He-Me Version), an instruction sheet was developed which asked the subject to think of one employee at the camp which the subject attended ". . . whom you liked and interacted with, that is, he talked with you and you talked with him often." The subject was then directed to turn the page and read additional directions concerning how to mark each statement scale.

These instructions were followed by the fifty statement test and a personal information sheet which the subject was informed could be completed on an optional basis. Samples of these instructions and the personal information sheet are contained in Appendix D.

Data Collection and Processing

The Interaction Test was administered to groups composed of fifteen to twenty members each who were in the

institutions. The tests were administered to groups of five to ten paroled non-recidivists in an office in downtown Denver. Upon completion, the tests were coded, information from the tests was keypunched on data processing cards, and analysis was made with the assistance of computers from Auto-Tronix Universal Corporation, Denver, and the University of Denver.

Treatment of Data

For each subject tested, there were fifty measures as indices of interaction. To explore the relationships among the several indices, factor analytic procedures were selected. The treatment of the data by means of factor analysis is discussed below.

Factor analysis as an analytical methodology. Factor analysis is a mathematical method to answer the following question, "Given a relatively large number of variables (as in our case, fifty), do their measurement intercorrelations indicate that there may be fewer, more basic factors underlying this large number of variables?" Factor analysis takes the variance, which can be defined through measuring intercorrelations among sets of measures, and attempts to allocate this variance in terms of fewer underlying hypothetical values. These hypothetical values are called factors.

Factor analysis, according to Fruchter (1954),

. . . starts with a set of observations obtained from a given sample by means of such a priori measures. It is a method of analyzing this set of observations from their intercorrelations to determine whether the variations represented can be accounted for adequately by a number of basic categories smaller than that which the investigation started with. Thus, data obtained with a large number of a priori measures may be explained in terms of a smaller number of reference variables. (p. 1)

Rationale for using factor analysis. Measuring and categorizing human traits has been one of the major dilemmas of scientists for a long period. Allport and Odbert, for example, searched the dictionary and found over 3,000 trait words for describing personality.

Catell and Scheier (1967) researched over four hundred papers on the subject of anxiety and found a wide range of "shades of anxiety" and "ways of measuring it."

Catell (1967) suggested that factor analysis could greatly simplify the focus of research. According to Catell (1967),

. . . Factor analysis is based on the belief that there are natural, unitary structures in personality and that it is these traits, rather than endless labels in the dictionary, on which we could concentrate. (p. 84)

Like the examples in the field of psychology, there have been numerous tests for interaction generating many definitions of variables. Examples of different interaction tests originally considered for this study illustrate this

point; these tests were the Griffin-White Trust Differential (Griffin and White, 1967); Griffin-Vance Summated Rating Scales of Interpersonal Trust (Griffin and Vance, 1967); Hemphill Group Dimensions Description Questionnaire (Hemphill, 1956); Moment-Zalesnik Post-Meeting Reactions Questionnaire (Zalesnik, 1963); and Bales Interaction Analysis (Bales, 1950).

Multiple definitions have resulted in confusion, duplication of efforts, and have prevented methodological planning and programming. Factor analysis can provide an objective method of selecting explicitly defined variables upon which professionals might easily agree and act.

Method of factor analysis selected. Criteria must be established before a methodology of factor analysis is adopted. One criterion concerns the factor model employed.

Spearman (1904) preferred one "general factor" plus a "specific factor" for each variable, but Thurstone (1947) and others speak of "group factors" which are involved in several but not all of the variables (see Baggaley, 1964).

Some scientists (Baggaley, 1964) suggest that all factors, general, group, and specific, must be considered in factor analysis. The factors considered result in a variety of methods of analysis including the diagonal method, the multiple group method, the maximum-likelihood method, the principal axis rotation method, the simple structure rotation

method, the oblique method, and others (Baggaley, 1964) which were all considered for use in this study.

For the purpose of this study, however, the orthogonal varimax rotations were employed. This method of analysis is known as simple structure method.

A simple structure criterion for rotation of factor analytic results has been commonly used in the social sciences to improve the "interpretability" of factors (Baggaley, 1964). Harmon (1960) has stated the advantage of such a rotation:

- . . . the graphical plot in the plane of each pair of factors will exhibit the following:
- (1) many points near the two final factor axes;
 - (2) a large number of points near the origin; and
 - (3) only a small number of points removed from the origin and between the two axes. (p. 114)

Thus, the simple structure rotation provides final factors that load heavily on some items and close to zero on others. The items each tend to be heavily loaded by only one factor, thereby reducing the items' complexity.

The simple structure rotation used for the present investigation maintained the orthonality (independence) of the factors. While this restriction may have limited the quality of fit of the final factors to the simple structure criterion, it results in "simplicity of interpretation" (Harmon, 1960, p. 261).

The varimax approximation to simple structure was chosen because, according to Harmon (1960), it "seems to be

the 'best' parsimonious analytical solution in the sense that it correlates best with intuitive concept of that term as exemplified by the graphical solution (p. 306) and because the varimax solution tends to remain invariant (tested by making changes in the composition of the test battery) (Harmon, 1960).

Factor analysis is discussed more thoroughly in several books devoted to the subject. These books include Harmon (1960), Baggaley (1964), Catell (1952), and Kerlinger (1964).

Interpretation of the rotated factor matrix. The interpretation of factors is a subjective process. Nothing in the logic of a factor analytic solution will inform a researcher how to label a particular factor. Interpretation involves examining which variables appear to have relatively large loadings.

Factors were interpreted by examining items with high factor loadings and items with low factor loadings and by hypothesizing a construct which would explain the association of only items highly loaded. The label of this construct was assigned to the mathematically defined factor.

CHAPTER III

RESULTS

This chapter discusses criteria for determining the number of factors extracted and selected for further analysis. Included in the criteria was a rationale to factor analyze two population groups, compare the two factorial results, and select the most meaningful factors. Three factor descriptions are given and used for further statistical analysis.

Criteria in Determining Number of Factors Extracted

Factor analysis is a method by which the relations among a relatively large number of variables are redefined in terms of relations with relatively fewer hypothetical variables called factors. Certain criteria had to be developed which would determine limits to the number of factors selected for the study. These criteria are based on certain fundamental issues. As Baggaley (1964) suggests, "The issues of comprehensiveness, goodness of fit, and parsimony are relevant to the practical problem of how many factors to extract from a given correlation matrix." (p. 95)

If some limit was not placed on the number of factors extracted (when using the principal axis solution), the factor analysis procedure could continue indefinitely so that

eventually the number of factors would be so numerous that the purpose of factor analysis would be defeated (i.e., As pointed out by Harmon (1960), a principal objective of factor analysis is to attain a parsimonious description of observed data).

Only factors which explained enough variance to be statistically significant in this study were extracted in the factor analysis, according to the criteria mentioned by Harmon (1960):

Through very extensive applications of electronic computers, Kaiser has arrived at a practical basis for finding the number of common factors that are necessary, reliable, and meaningful for the explanation of the correlations among the variables. His recommendation--after considering statistical significance, algebraically necessary conditions, psychometric reliability, and psychological meaningfulness--is that the number of common factors should be equal to the number of eigen-values greater than one of the correlation matrix (with unities in the diagonal). He has found this number to run from a sixth to about a third of the total number of variables. (p. 363)

Application of this criteria resulted in the extraction of eleven factors.

Eleven factors were first extracted from the two camp populations and, second, from the sample from the population at Lookout Mountain School for Boys (see Table I, Chapter II).

The rationale supporting the decision to factor analyze these two population samples separately consisted of the following two points. First, the study was originally

predicated on the assumption that the interaction quality in Colorado's youth camps differed from that at the Lookout Mountain School for Boys. Separate factor analyses facilitated the investigation of this assumption.

Second, although each analysis extracted eleven statistically significant factors, it was necessary to find a set of factors that meaningfully expanded an understanding of interaction patterns in both types of correctional institutions. Two factor analyses were utilized to help decide which of the eleven significant factors were meaningful.

Several reasons for believing that the quality of interaction differed between the youth camps and the larger boys institutions (i.e., Lookout Mountain School for Boys) were apparent.

The first reason was that the staff members were different. For example, qualifications for Resident Supervisors (cottage counselors) at Lookout Mountain School for Boys were a high school diploma or equivalent and the absence of a police record. Minimum qualifications for camp counselors were two years of college education (preferably in the social sciences) and/or previous experience in the youth counseling field plus an ability to conduct family as well as individual counseling. Salaries for counselors at the camps were also geared toward attracting and retaining more qualified personnel. The experience of counselors at the camps is

generally greater, not only because of the entry requirement, but also due to low staff turnover at the camps compared with the larger institutions.

The second reason was the differences between the youths in the institutions. Although the total population at Lookout Mountain School for Boys ranged in the same general age groups as the camps, youths from Lookout Mountain School for Boys who attended the camps were carefully chosen on the basis of being first-termers, not having a record of violent actions, and being more susceptible to treatment in an open environment.

The third reason for expecting differences in quality of interaction was the differences in the environments of the institutions. Staff-boy ratios were more favorable at the camps (as mentioned in Chapter II of this report), the camps were away from the urban environment, and the cottages were not locked at any time. The larger institution was located on the outskirts of Denver, and the doors were always locked. Programs at the camps included outdoor work and recreation and many opportunities for individual counselor-boy interaction; whereas, programs at the larger institutions were rather limited.

Comparisons of Two Factor Analyses

To determine if the factors obtained during the first factor analysis were equivalent to any of the factors

obtained during the second factor analysis, coefficients of congruence between factors were computed. Harmon (1960) has shown that this coefficient is a good measure of "degree of factorial similarity" (p. 257) when different samples are tested with the same variables. He further pointed out that this index is similar to a correlation coefficient with values ranging from +1 for perfect agreement through zero for no agreement to -1 for perfect inverse agreement.

Coefficients of congruence indicated that the first three factors (henceforth labeled factors A, B, and C) found in the analysis of the Lookout Mountain School for Boys sample were also found in the analysis of the two camp samples (see Table II) even though these factors were not the first three to emerge from the two camp samples. The order of emergence of these three factors is also shown in Table II. These factors from the two camp samples, though not emerging as the first three factors, accounted for more of the total variance than any of the other factors (see Table III). Each of these three factors also accounted for more of the variance in the sample from Lookout Mountain School for Boys (see Table IV).

These three factors were selected for analysis and interpretation. The reasons for selecting only these three were based upon the comparisons of the two factor analyses. These three factors were considered most meaningful because

TABLE II
FACTOR AGREEMENT BETWEEN SAMPLES

Factor Label	Factor Number From Two Camp Samples	Factor Number From LMBS Sample	Coefficient of Congruence
A	1	1	.90
B	8	2	.83
C	5	3	.77

TABLE III
VARIANCE ACCOUNTED FOR BY EXTRACTED FACTORS
FROM THE TWO CAMP SAMPLES

Factor Labels	A				C			B			
Factor Number	1	2	3	4	5	6	7	8	9	10	11
Per Cent of Total Variance Accounted For	17	5	3	3	6	4	4	9	4	4	4

TABLE IV
VARIANCE ACCOUNTED FOR BY EXTRACTED FACTORS
FROM THE LOOKOUT MOUNTAIN SCHOOL FOR BOYS SAMPLE

Factor Labels	A	B	C								
Factor Number	1	2	3	4	5	6	7	8	9	10	11
Per Cent of Total Variance Accounted For	14	10	9	3	4	5	4	3	3	5	6

of the following reasons. (1) They were the only three factors which were common to both factor analyses. Invariance of factors is one of the properties of the orthogonal varimax method of factor analysis so that common meaningful factors should be found in both of the rotations. (2) In both samples, each of the three factors accounted for more of the total variance than any of the other extracted factors (see Tables II, III, and IV). Often, factor interpretations are made only for factors contributing to more than five per cent of the total variance (Harmon, 1960). The three factors selected met this condition; while all but one (which accounted for six per cent of the variance) of the others did not.

Three Factor Descriptions

The three factors, A, B, and C, which have been referred to previously, are described below. The high loadings for the factor associated with the camp sample are listed. The factors are interpreted, and the differences of factor definition resulting from the two factor analyses are discussed.

Factor A. Factor A had the loadings shown in Table V. This factor was interpreted as a "teacher-role interaction." Item 31, "He teaches me," loaded .65 for the camp sample and .85 (highest loading found) for the Lookout Mountain School for Boys sample (hereafter also referred to as the LMSB

TABLE V
FACTOR A LOADINGS

Item No.	Item Name	Loadings
26	He helps me	.78
2	He gets along well with me	.72
4	He understands me	.72
13	He is kind to me	.72
48	He is important to me	.71
3	He likes to be with me	.70
15	He trusts me	.70
18	He respects me	.67
30	He is interested in me	.65
5	He likes me	.64
20	He is honest with me	.58

sample). Other defining characteristics supporting this interpretation were kindness, trust, interest, honesty, and understanding. Perhaps more important in delimiting the interpretation made above were those characteristics not correlated with this factor. Such characteristics were desire for control, attempts to change behavior, and interpersonal sensitivity (such items as 11, "He tries to outdo me"; 12, "He tries to support me"; 22, "He is careful not to upset me"; 27, "He has different feelings at different times about me"; and 32, "He embarrasses me," all had factor loadings close to zero). The absence of high loadings on these items prevented interpretation of the factor as simply "liking."

Differences existed between the factor definition of the camps and that of the LMSB sample. The two camp samples associated an element of "human warmth" with the "teacher-role interaction" much more strongly than did the LMSB sample. Some of the characteristics of this human warmth were ability to get along well with, concern for, and respect for the individual. These differences are illustrated in Table VI.

A second definitional difference was the association by the LMSB sample of something similar to "a father-image-stereotype" with the "teacher-role interaction." A much greater loading was given to the items "He thinks about me," "He depends on me," "He protects me," and "He worries about me" by this group (as shown in Table VII).

TABLE VI
 DIFFERENCES BETWEEN SAMPLES
 FROM CAMPS AND LOOKOUT MOUNTAIN SCHOOL FOR BOYS
 IN TERMS OF FACTOR A LOADINGS ON "HUMAN WARMTH"

Item No.	Name	Loadings From Two Camp Samples	Loadings From Lookout Mountain School for Boys Sample
2	He gets along well with me	.72	.20
4	He understands me	.72	.51
13	He is kind to me	.72	.40
3	He likes to be with me	.70	.31
15	He trusts me	.70	.50
18	He respects me	.67	.31
5	He likes me	.64	.36

TABLE VII
DIFFERENCES BETWEEN SAMPLES
FROM CAMPS AND LOOKOUT MOUNTAIN SCHOOL FOR BOYS
IN TERMS OF FACTOR A LOADINGS ON
"A FATHER-IMAGE-STEREOTYPE"

Item No.	Name	Loadings From Two Camp Samples	Loadings From Lookout Mountain School for Boys Sample
46	He worries about me	.38	.70
21	He depends upon me	.36	.70
28	He protects me	.32	.73
16	He thinks about me	.28	.63

Factor B. Factor B loadings are shown in Table VIII. This factor was interpreted as "contrariety"; that is, the factor indicates the degree of perceived opposition to the happiness and best interests of the delinquent youths. The characteristics supporting this interpretation included depressing, unhappy, disappointing, and dishonest interactions.

The major difference in this factor definition between the samples appeared to be the overtness of the contrariety. The LMSB sample associated active opposition much more with this factor than did the two camp samples. The two camp samples associated this factor with interpersonal relationship problems. Item 47, "He is lonely when with me," indicated this association. This difference is shown in Table IX.

Factor C. Factor C loadings are shown in Table X. This factor was interpreted as "non-competitive" because the items appear to deal with competitiveness, and the loadings are all negative.

The difference between the two camp samples and the LMSB sample appeared as if the two camp samples perceived the "non-competitives" as in a physical realm and in a task-oriented environment. Item 11, "He tries to outdo me," and item 45, "He wears me out," exemplify this point as shown in Table XI. The perceptions of the LMSB sample were

TABLE VIII
FACTOR B LOADINGS

Item No.	Item Name	Loadings
40	He makes me unhappy	.78
47	He is lonely when with me	.70
49	He acts against my interest	.69
37	He disappoints me	.60
43	He gets impatient with me	.57
34	He deceives me	.51
41	He gets annoyed at me	.51

TABLE IX
 DIFFERENCES BETWEEN SAMPLES
 FROM CAMPS AND LOOKOUT MOUNTAIN SCHOOL FOR BOYS
 IN TERMS OF FACTOR B LOADINGS

Item No.	Name	Loadings From Two Camp Samples	Loadings From Lookout Mountain School for Boys Sample
47	He is lonely when with me	.70	.24
50	He is ill at ease when with me	.49	.70
45	He wears me out	.33	.67
38	He overestimates me	.18	.68
11	He tries to outdo me	.04	.56

TABLE X
FACTOR C LOADINGS

Item No.	Item Name	Loadings
32	He embarrasses me	-.71
11	He tries to outdo me	-.64
45	He wears me out	-.62
35	He argues with me	-.50
7	He runs me down	-.48

TABLE XI
DIFFERENCES BETWEEN SAMPLES
FROM CAMPS AND LOOKOUT MOUNTAIN SCHOOL FOR BOYS
IN TERMS OF FACTOR C LOADINGS ON PHYSICALLY ORIENTED ITEMS

Item No.	Name	Loadings From Two Camp Samples	Loadings From Lookout Mountain School for Boys Sample
11	He tries to outdo me	-.64	-.23
45	He wears me out	-.62	-.33

interpreted in terms of a process or verbal level of competition--non-competition. This was noted in loadings for items as shown in Table XII.

Statistical Analysis

This study was originally developed because the rates of recidivism of juvenile delinquents paroled from Colorado's two youth camps over a three-year period were substantially lower than recidivism rates of paroled youths from the state's larger institutions (Walton, 1969). Analysis of variance was conducted to determine if recidivism rates were related to the interaction factors of "teacher-role interaction," "contrariety," and "non-competitiveness."

To accomplish this, it was first necessary to compute factor scores for each subject in the recidivist and non-recidivist samples. To compute factor scores, factor definitions were necessary. There were two definitions for each factor, one extracted from the two camp samples and one from the LMSB sample. The two camp samples' factor definition was selected to compute factor scores because the recidivists and non-recidivsts sampled came exclusively from the camps.

The factor scores were determined by adding the scores for each subject on all items heavily loaded for each factor. Thus, three factor scores were computed for each of the

TABLE XI
DIFFERENCES BETWEEN SAMPLES
FROM CAMPS AND LOOKOUT MOUNTAIN SCHOOL FOR BOYS
IN TERMS OF FACTOR C LOADINGS ON PHYSICALLY ORIENTED ITEMS

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TABLE XII
 DIFFERENCES BETWEEN SAMPLES
 FROM CAMPS AND LOOKOUT MOUNTAIN SCHOOL FOR BOYS
 IN TERMS OF FACTOR C LOADINGS ON SELECTED
 PROCESS-VERBAL ITEMS

Item No.	Name	Loadings From Two Camp Samples	Loadings From Lookout Mountain School for Boys Sample
22	He is careful not to upset me	.25	.50
1	He finds fault with me	-.05	-.49
41	He gets annoyed with me	-.16	-.40
37	He disappoints me	-.18	-.54
43	He gets impatient with me	-.20	-.53
8	He has disagreements with me	-.25	-.68

recidivists and for each of the non-recidivists. Table XIII shows the items which were included for each factor score.

With these computations, a one-way analysis of variance for unequal groups was conducted for recidivists and non-recidivists for factor scores on Factors A, B, and C. Three F scores were computed to test for differences between the recidivists and non-recidivists on each factor.

Results of this analysis showed no differences between recidivists and non-recidivists on any of the factors.

An analysis of variance was also conducted to compare the interaction factors between the two camp samples and the LMSB sample to determine if there were actual differences between the institutions. The factor scores for each of these sample members which were used for the analysis were computed by taking the same items used previously (see Table XIII).

Results of this analysis indicated that the institutions differed significantly on Factor A; i.e., the "teacher-role relationship" factor. Table XIV shows the results of the analysis of the variances of Factor A.

The LMSB sample scored significantly higher than the camps' sample on Factor A. No differences were found on the other two factors.

TABLE XIII
ITEMS INCLUDED IN COMPUTING FACTOR SCORES

Item No.*	Factor A
+ 2	He gets along well with me
+ 3	He likes to be with me
+ 4	He understands me
+ 5	He likes me
-17	He bores me
+18	He respects me
-19	He under-values me
+20	He is honest with me
+26	He helps me
+30	He is interested in me
+31	He teaches me
+48	He is important to me
	Factor B
+25	He is afraid of me
+32	He embarrasses me
+37	He disappoints me
+40	He makes me unhappy
+41	He gets annoyed at me
+43	He gets impatient with me
+47	He is lonely when with me
+49	He acts against my interest
	Factor C
- 7	He runs me down
-11	He tries to outdo me
-32	He embarrasses me
-34	He deceives me
-35	He argues with me
-45	He wears me out

*The signs before each item number indicate whether the item was added or subtracted in computing the factor score.

TABLE XIV
ANALYSIS OF VARIANCE BETWEEN TWO CAMP SAMPLES
AND LOOKOUT MOUNTAIN SCHOOL FOR BOYS
SAMPLE ON FACTOR A SCORES

Source	SS	DF	MS	F	P
Between Groups	1021.87	1	1021.87	6.893	.01
Subjects Within Groups	40854.08	274	149.10		
Total	41875.95	275			

SS = Sum of Squares
DF = Degrees of Freedom
MS = Mean Square
F = F Factor
P = Probability (percentage)

Summary

In this chapter, an analysis of data for the study was discussed. The analysis which included an extraction of factors from the samples of two youth camps' populations and one larger institution for youth was detailed.

Results of the analysis indicated that there were three meaningful factors extracted from the two samples. These factors were interpreted as follows:

1. Factor A, "Teacher-role interaction"
2. Factor B, "Contrariety"
3. Factor C, "Non-competitive"

Conclusions drawn from an analysis of the variance of samples of recidivists and non-recidivists resulted in a conclusion that there was no significant difference between those two groups concerning the three meaningful factors.

Another analysis of variance between the camps' sample and the larger institution's sample indicated a significant difference for one of the three factors, Factor A; i.e., the "teacher-role interaction" factor.

CHAPTER IV

SUMMARY

This study was undertaken to investigate interaction patterns between juvenile delinquents and their counselors in Colorado's youth institutions. The primary reason for the study was to investigate an assumption that the communication or interaction patterns between delinquent youths and their counselors was associated with reduced recidivism rates. This assumption developed from the fact that the number of youths paroled (from Colorado's two youth camps) who are not returned was less than fifty per cent or more when compared with recidivist rates of parolees from other correctional institutions.

Empirical studies concerned with this "interaction" process have not been conducted previously in Colorado. Research of literature related to this study had been reviewed to help find background data for the study. There are few studies reported that are directly concerned with the problem. William Arnold (1965) studied forty-five paroled youths and concluded that recidivism was associated with the interaction of delinquent youths and others. Arnold suggested that a parolee who has experienced ineffectual teaching or communications about social behavior tends to recidivate.

Studies such as Arnold's reinforced the reasoning underlying the development of this particular study.

Other research which had been studied and used as background to this investigation included the work of Havel (1965), Glaser (1964), Cowdon (1966), Molof (1967), Spicer (1965), Larson (1965), and others.

Procedures

The selected instrument used in this study was a revised version of a test developed by Reusch, Block, and Bennet (1953) for the assessment of interaction. It was entitled, "Interaction Test (He-Me)," and consisted of fifty statements, each of which described some dimension of interaction plus a seven-part, modified Likert-type response scale for each statement. The test was administered to samples consisting of five juvenile delinquent and former juvenile delinquent populations. The data was factor-analyzed and analyses of variances procedures were also used in the analyses. An orthogonal varimax rotation procedure was used to mathematically identify those items associated with each other for interpretation.

The Results

Three factors which were common to the samples tested were labeled as follows:

1. Factor A, "Teacher-role interaction"

2. Factor B, "Contrariety"

3. Factor C, "Non-competitive"

Differences existed between the factor definition of the camps and that of the boys school. The two camp samplings associated an element of "human warmth" with the "teacher-role interaction" much more strongly than did the Lookout Mountain School for Boys sampling. A second difference in defining Factor A was the association by the Lookout Mountain School for Boys sample of something similar to "a father-image-stereotype" with "teacher-role interaction."

The major difference in the Factor B definition between the samples appeared to be the overtness of the contrariety. The Lookout Mountain School for Boys sample associated active opposition much more with this factor than did the two camp samples. The two camp samples associated this factor with interpersonal relationship problems.

The difference between the two camp samples and that of Lookout Mountain School for Boys appeared as if the camp samples perceived the "non-competitives" in a physical realm and in a task-oriented environment. The perceptions of the Lookout Mountain School for Boys sample was interpreted in terms of a process or a verbal level of competition--non-competition.

The results of this investigation may serve to assist counselors of similar populations (as described in the study)

to understand what may occur during interactions between delinquent youths and the counselors. The study indicates that the youths may see their counselors differently than the counselors desired. Perhaps changes in counselor selection, orientation, and training would assist in changing counselors' patterns of interaction for some other desired goal.

Analysis of the data also revealed that there are insignificant differences between recidivist and non-recidivist in terms of interaction patterns, although the differences may not have been revealed. The samples of the non-recidivist population was limited to the population of non-recidivists in the five-county Denver metropolitan area where sixty per cent of the adjudicated delinquent youths in Colorado are located.

Among the reasons for the insignificant difference between recidivists and non-recidivists may also be selection criteria of youths for incarceration at the camps. Youth selected for incarceration at the two camps must not have had a record of violence, must have appeared more positive to school and work programs, and must not have ever been incarcerated before their present adjudication.

It may have been important to study the youths who have been incarcerated at Lookout Mountain School for Boys only, paroled and returned to Lookout Mountain School for Boys again. It is possible that interaction patterns of

these youths are not significantly different between the two camp samples and the Lookout Mountain School for Boys.

Research Design

This study was developed utilizing a fifty-statement interaction test. It may be important to reexamine the test itself from the standpoint of what it does measure. This particular instrument may not measure to the highest degree of sophistication those interaction patterns vital to the objectives of the study. In addition, it appears that the test may only measure what is in the boy's head at the time he takes the test. A study of interaction patterns, in terms of visual as well as aural observations, may serve as a better method of research.

The method of factor analysis used in this study was considered appropriate. Other methods, however, should also be considered in order to pursue a systematic and meaningful method of analysis.

It would appear from this investigation that a design for additional study of the problem should include actual observation of the counselor-youth interaction process and should include additional tools. It would also appear that a future study should be concerned with interaction patterns at Lookout Mountain School for Boys.

The Results in Relation to Other Research

Arnold's (1965) studies appear to have some relationship to the results of this study. Both Arnold's conclusions and conclusions of this study suggest that counselors and other adults in institutions are viewed in terms of the "teacher-role interaction" by youths. Arnold suggests that if the role is ineffectual, recidivism results.

Glaser (1964) found that seventy-five per cent of his sample of paroled men from federal prisons claimed that they made major changes in their conduct because of the influence of correctional officers. The role of correctional personnel as "teachers" apparently was supported in the context of both the Glaser study and this study.

Molof (1967) studied delinquent youths who had been incarcerated in California Forestry Camps as well as another sample of delinquent youths from larger state institutions. His conclusions were that there was no statistical evidence of a differential effect on recidivism rates as a result of going through a camp program versus going through an institution program where the selection of youths was controlled.

Molof's conclusions suggest, as has been done in the conclusions of this study, that selectivity per se may be more significant than, for example, interaction patterns in reduced recidivism rates of youths paroled from the camps.

The youth correctional counselor in the United States has been given the most difficult task of changing the behavior of incarcerated delinquent youths assigned to him. The youth enters this interaction environment after many years of a different, and often severe, cultural environment. After a few short months, the youth is returned to the context of this severe environment where influences tend to re-establish "old" attitudes and beliefs in the youth through social pressure. Research has not yet found a magical answer to the correctional counselor's dilemma, which is to effectively change this pattern.

This study focused on one particular part of the whole process where change could possibly occur in the behavior of young delinquents in Colorado. Conclusions of this study suggest that there appears to be a need to study interaction patterns to a much greater extent with improved instruments in larger, more populated institutions as well as the so-called "successful" smaller institutions.

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APPENDIX A

INTERACTION TEST (HE-ME): FORM B

8. He has conflicts with me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
9. He gives in to me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
10. He encourages me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
11. He tries to outdo me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
12. He tries to reassure me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
13. He is kind to me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
14. He disciplines me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
15. He trusts me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
16. He thinks about me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|

17. He bores me.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

18. He respects me.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

19. He underestimates me.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

20. He is honest with me.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

21. He relies upon me.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

22. He is careful not to upset me.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

23. He knows his limitations.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

24. He is tolerant of contradictions in me.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

25. He is afraid of me.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

26. He helps me.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

27. He has mixed feelings about me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
28. He protects me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
29. He has difficulties making decisions when with me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
30. He is interested in me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
31. He teaches me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
32. He embarrasses me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
33. He controls me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
34. He deceives me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
35. He argues with me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
36. He is emotional when with me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|

37. He disappoints me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
38. He overestimates me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
39. His feelings toward me change from day to day.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
40. He makes me unhappy.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
41. He gets annoyed at me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
42. He expects a lot of me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
43. He gets impatient with me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
44. He tries to change me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
45. He wears me out.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
tionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
46. He worries about me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|

47. He is lonely when with me.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

48. He is important to me.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

49. He acts against my interests.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

50. He is ill at ease with me.

Never: Almost Only Occa- Sometimes: Frequently: Almost
Never: Never: sionally: Sometimes: Frequently: Always: Always

APPENDIX B

INTERACTION TEST (HE-ME): REVISED

8. He has disagreements with me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
9. He gives in to me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
10. He urges me on.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
11. He tries to outdo me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
12. He tries to support me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
13. He is kind to me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
14. He corrects me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
15. He trusts me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
16. He thinks about me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
17. He bores me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|

18. He respects me.

Never: Almost Only Occa- Sometimes: Frequently: Almost Always
Never: Never: sionally:

19. He under-values me.

Never: Almost Only Occa- Sometimes: Frequently: Almost Always
Never: Never: sionally:

20. He is honest with me.

Never: Almost Only Occa- Sometimes: Frequently: Almost Always
Never: Never: sionally:

21. He depends upon me.

Never: Almost Only Occa- Sometimes: Frequently: Almost Always
Never: Never: sionally:

22. He is careful not to upset me.

Never: Almost Only Occa- Sometimes: Frequently: Almost Always
Never: Never: sionally:

23. He knows his limitation.

Never: Almost Only Occa- Sometimes: Frequently: Almost Always
Never: Never: sionally:

24. He lives with my actions and words.

Never: Almost Only Occa- Sometimes: Frequently: Almost Always
Never: Never: sionally:

25. He is afraid of me.

Never: Almost Only Occa- Sometimes: Frequently: Almost Always
Never: Never: sionally:

26. He helps me.

Never: Almost Only Occa- Sometimes: Frequently: Almost Always
Never: Never: sionally:

27. He has different feelings at different times about me.

Never: Almost Only Occa- Sometimes: Frequently: Almost Always
Never: Never: sionally:

28. He protects me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|--------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|--------------------------|---------------|
29. He has difficulties making decisions when with me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
30. He is interested in me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
31. He teaches me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
32. He embarrasses me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
33. He controls me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
34. He deceives me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
35. He argues with me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
36. He has a sense of feeling when he is with me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
37. He disappoints me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|

38. He overestimates me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
39. His feelings toward me change from day to day.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
40. He makes me unhappy.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
41. He gets annoyed at me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
42. He expects a lot of me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
43. He gets impatient with me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
44. He tries to change me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
45. He wears me out.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
46. He worries about me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
47. He is lonely when with me.
- | | | | | | | |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|
| <u>Never:</u> | <u>Almost
Never:</u> | <u>Only Occa-
sionally:</u> | <u>Sometimes:</u> | <u>Frequently:</u> | <u>Almost
Always:</u> | <u>Always</u> |
|---------------|--------------------------|---------------------------------|-------------------|--------------------|---------------------------|---------------|

48. He is important to me.

Never: Almost Only Occa-
Never: sionally: Sometimes: Frequently: Almost
Always: Always

49. He acts against my interests.

Never: Almost Only Occa-
Never: sionally: Sometimes: Frequently: Almost
Always: Always

50. He is ill at ease with me.

Never: Almost Only Occa-
Never: sionally: Sometimes: Frequently: Almost
Always: Always

APPENDIX C

FIRST WORD MEANING TEST

SELECTED WORDS FROM INTERACTION TEST (HE-ME)

WORD MEANING LIST

A student at the University of Denver who is also one of our employees is preparing some research concerning students at Golden Gate Youth Camp, Lathrop Park Youth Camp, and Lookout Mountain School for Boys.

There are certain words in his survey that we felt may need changing or clearing up. We need your help to give us some idea of your definitions of the words. Will you help by writing in the spaces below each word, your idea of what the word means.

Thanks.

1. CRITICAL (As in "He is critical of me")

2. INHIBIT (As in "He inhibits me")

3. BELITTLES (As in "He belittles me")

4. CONFLICTS (As in "He has conflicts with me")

5. REASSURE (As in "He tries to reassure me")

6. DISCIPLINE (As in "He disciplines me")

7. UNDERESTIMATES (As in "He underestimates me")

8. TOLERANT OF CONTRADICTIONS (As in "He is tolerant of contradictions in me")
9. MIXED FEELINGS (As in "He has mixed feelings about me")
10. CONTROLS (As in "He controls me")
11. EMOTIONAL (As in "He is emotional when with me")
12. IMPATIENT (As in "He gets impatient with me")
13. INTERESTS (As in "He acts against my interests")

APPENDIX D

SECOND WORD MEANING TEST

SELECTED WORDS FROM INTERACTION TEST (HE-ME)

Please check the meaning that best describes the word to you.

1. CRITICAL
 _____ A. Finds fault
 _____ B. Runs me down
 _____ C. _____
2. INHIBITS
 _____ A. Stops me
 _____ B. Holds me back
 _____ C. Holds me in check
 _____ D. _____
3. BELITTLES
 _____ A. Runs me down
 _____ B. Makes me seem little or less than I feel I am
 _____ C. _____
4. CONFLICTS
 _____ A. Battles with me
 _____ B. Clashes with me
 _____ C. Struggles with me
 _____ D. Opposes me
 _____ E. Doesn't cooperate with me
 _____ F. Doesn't agree with me
 _____ G. Disagrees with me
 _____ H. _____
5. ENCOURAGES
 _____ A. Cheers me on
 _____ B. Urges me on
 _____ C. Helps me
 _____ D. Promotes my effort
 _____ E. Helps advance me to do better things
 _____ F. _____
6. REASSURE
 _____ A. Reinforces me
 _____ B. Supports me
7. DISCIPLINES
 _____ A. Punishes me for sake of controlling me
 _____ B. Pushes his ideas on me by punishing me
 _____ C. Tries to correct me through punishment
 _____ D. _____
8. UNDERESTIMATES
 _____ A. Places a lower value on me and my ways
 _____ B. Under-values me
 _____ C. _____
9. TOLERANT OF CONTRADICTIONS
 _____ A. Lenient
 _____ B. Allows me to do or say most things
 _____ C. Lives with my actions and words
 _____ D. _____

10. MIXED FEELINGS

- A. Neither good nor bad or both feelings about me
 B. Confused
 C. Different feelings at different times
 D. _____

11. CONTROLS ME

- A. Holds me back
 B. Puts me in check
 C. Regulates me
 D. Restrains me
 E. Guides me in a strict manner

12. EMOTIONAL WITH ME

- A. Shows his feelings when with me
 B. Has a strong inner feeling about me
 C. Seems to show a sense of feeling with me
 D. Seems to show excitement, depression, etc.,
 at different times with me

13. IMPATIENT

- E. _____
 A. Restless
 B. Short of temper
 C. Anxious
 D. Irritated
 E. _____

APPENDIX E
DIRECTION SHEETS
USED WITH
INTERACTION TEST (HE-ME): REVISED

DIRECTIONS

1. Think of one employee here whom you like, talk with often, and know fairly well. In other words, the employee you "interact" with.
2. With this person in your mind, turn to the next page and complete the statements after reading the directions.

APPENDIX F
REVISED DIRECTION SHEET
USED WITH
INTERACTION TEST (HE-ME): REVISED

DIRECTIONS

Think of One of your counselors at the camp you attended. (Golden Gate Youth Camp or Lathrop Park Youth Camp).

Then read each of the statements on the following pages and circle the word or words that best describes the counselor in relation to that statement.

If you do not understand a statement or any word, please place a question mark by that statement or word and continue on until you complete the survey. Then bring your survey to the person who gave it to you so that he can explain the meanings of those statements or words you marked with a question mark.

Now turn to the next page and follow the same directions above.

NOTE: the word "interact" means to talk with, to have conversations with.

APPENDIX G
PERSONAL INFORMATION FORM
USED WITH
INTERACTION TEST (HE-ME): REVISED

APPENDIX H

VERIMAX FACTOR LOADINGS FOR CAMP SAMPLE

ITEM	FACTOR NUMBER										
	1	2	3	4	5	6	7	8	9	10	11
1. He finds fault with me.	-.01	.03	-.21	-.12	-.05	-.03	-.05	.23	.06	-.68	.18
2. He gets along well with me.	.72	.05	-.16	.15	.04	-.03	.01	-.15	-.06	.35	.09
3. He likes to be with me.	.70	-.09	-.16	-.15	-.08	-.06	-.04	-.16	.12	.21	-.07
4. He understands me.	.72	-.04	.03	-.21	.03	.10	.01	-.09	.06	.17	-.11
5. He likes me.	.64	-.06	.13	.06	.08	.05	-.01	-.15	.33	.29	.01
6. He holds me in check.	.02	.16	-.18	-.11	-.08	.00	.12	.11	.15	-.09	-.05
7. He runs me down	-.26	-.08	.02	.07	-.48	-.14	.01	.22	-.16	-.17	.20
8. He has disagreements with me.	-.16	.23	.20	.17	-.25	.19	-.05	.22	.05	-.50	-.11
9. He gives in to me.	.19	.25	.63	-.02	-.10	-.14	.10	.00	.02	.11	-.01
10. He urges me on.	.38	-.01	-.05	.23	-.06	-.09	-.12	-.02	.57	-.13	-.06
11. He tries to outdo me.	-.15	.34	.01	.02	-.64	-.04	-.07	-.04	-.12	-.15	-.13
12. He tries to support me.	.20	-.05	.03	-.04	.11	-.09	-.02	-.08	.72	.01	-.06
13. He is kind to me.	.72	-.10	-.01	.06	.14	-.31	.12	-.17	.08	.05	-.07
14. He corrects me.	.01	.14	.11	-.57	.00	-.00	-.19	-.01	-.22	-.21	-.10
15. He trusts me.	.70	.05	.24	-.08	.15	-.04	.02	-.03	.24	.24	-.15
16. He thinks about me.	.28	-.07	.19	-.36	-.10	-.46	-.07	-.08	.27	-.01	-.21
17. He bores me.	-.65	.11	-.06	.08	-.18	-.05	-.15	.43	.02	.00	.04

ITEM	FACTOR NUMBER										
	1	2	3	4	5	6	7	8	9	10	11
18. He respects me.	.67	-.18	.13	-.04	.13	-.22	-.03	-.13	.05	.02	-.15
19. He under-values me.	-.43	.17	.12	-.05	-.21	-.10	.09	.33	.05	.10	.49
20. He is honest with me.	.58	-.21	.11	.14	.35	-.10	-.08	-.30	.11	-.17	-.06
21. He depends upon me.	.36	.11	.17	-.10	.22	-.39	-.07	-.07	-.19	.09	-.42
22. He is careful not to upset me.	.16	.06	-.04	.13	.25	-.61	-.01	-.07	.05	.42	-.09
23. He knows his limitation.	.48	-.11	.29	.03	.17	-.03	.09	.05	.18	-.02	-.39
24. He lives with my actions and words.	.35	.03	.01	.04	-.11	-.14	-.04	-.03	.19	.18	-.71
25. He is afraid of me.	-.14	.43	-.36	.01	-.20	-.19	.12	.49	.10	.17	-.01
26. He helps me.	.78	-.10	.04	-.05	.23	-.21	-.00	-.14	.00	-.15	-.22
27. He has different feelings at different times about me.	.02	.63	.18	-.04	-.02	.11	-.14	.20	-.20	.05	.16
28. He protects me.	.32	-.04	.06	-.05	-.03	-.74	-.04	-.14	.08	-.04	.02
29. He has difficulties making decisions when with me.	-.11	.71	.02	-.22	-.18	-.03	.03	.09	.13	-.22	-.01
30. He is interested in me.	.65	-.07	.04	-.08	-.05	-.25	-.12	-.25	.27	-.16	-.16
31. He teaches me.	.65	-.11	-.02	-.07	-.17	-.15	-.10	-.18	-.04	-.19	-.36
32. He embarrasses me.	-.08	.18	-.02	-.07	-.71	.07	.01	.38	-.07	-.01	.00
33. He controls me.	.17	-.03	-.06	-.78	-.04	.05	-.04	.09	.00	.02	.07

CONTINUED

1 OF 2

ITEM	FACTOR NUMBER										
	1	2	3	4	5	6	7	8	9	10	11
34. He deceives me.	-.23	.15	.18	-.23	-.35	-.01	.22	.51	-.28	-.05	-.17
35. He argues with me.	-.23	.17	.18	-.09	-.50	.09	-.13	.38	.17	-.12	.05
36. He has a sense of feeling when he is with me.	.49	.07	.06	.05	.12	-.27	-.01	-.12	.26	-.15	-.09
37. He disappoints me.	-.45	.21	.10	-.12	-.18	.15	-.13	.60	.11	-.14	.07
38. He overestimates me.	-.16	.60	-.02	.25	-.25	-.03	-.06	.18	.03	-.05	-.05
39. His feelings toward me change from day to day.	-.17	.53	.15	-.02	-.01	.01	-.14	.35	-.15	.13	.02
40. He makes me unhappy.	-.28	.10	-.00	.02	-.21	.13	-.03	.78	-.14	-.12	.00
41. He gets annoyed at me.	-.33	.15	.26	.13	-.16	.08	-.16	.51	-.04	-.12	.40
42. He expects a lot of me.	.07	.02	.10	-.07	-.10	-.07	-.73	.08	.09	.02	-.19
43. He gets impatient with me.	-.32	.22	.15	.10	-.20	.11	-.22	.57	-.05	-.16	.18
44. He tries to change me.	.00	.13	-.17	-.07	-.09	-.04	-.79	.13	.01	-.08	.13
45. He wears me out.	-.16	.01	.00	.00	-.62	.17	-.31	.33	.04	.03	.15
46. He worries about me.	.38	.09	-.29	-.18	.09	-.41	-.24	-.09	.29	-.23	-.14
47. He is lonely when with me.	-.09	-.01	-.04	-.11	-.06	.11	.04	.70	.05	-.01	.03
48. He is important to me.	.71	.07	-.05	-.12	.17	-.15	-.06	-.14	.05	-.11	.07
49. He acts against my interests.	-.30	.18	-.12	-.01	-.04	-.00	-.17	.69	-.10	-.14	.01
50. He is ill at ease with me.	-.02	.36	-.02	.17	-.16	-.00	-.07	.49	-.21	-.14	.11

APPENDIX I

VERIMAX FACTOR LOADINGS

FOR LOOKOUT MOUNTAIN SCHOOL FOR BOYS SAMPLE

ITEM	FACTOR NUMBER										
	1	2	3	4	5	6	7	8	9	10	11
1. He finds fault with me.	.03	.07	-.49	-.02	.44	-.19	-.37	.10	.11	.13	-.03
2. He gets along well with me.	.20	-.07	.35	.02	-.09	.57	.11	.20	.07	-.10	.41
3. He likes to be with me.	.31	-.12	-.01	.02	-.15	-.01	.07	-.01	.03	-.14	.77
4. He understands me.	.51	-.30	.17	-.12	.00	.07	-.03	.13	-.08	-.10	.47
5. He likes me.	.36	-.22	.26	.03	-.09	.25	.03	.04	-.19	-.10	.66
6. He holds me in check.	.07	.06	-.14	.79	.04	.02	.05	-.07	.07	.04	.01
7. He runs me down.	-.17	.23	-.68	.20	.05	-.15	-.04	.06	.16	.21	.19
8. He has disagreements with me.	-.32	.22	-.68	.14	-.01	-.04	-.08	.04	-.26	-.01	-.04
9. He gives in to me.	.10	.02	-.18	.23	.06	-.07	.68	.01	.08	-.22	.17
10. He urges me on.	.23	.13	-.08	-.07	-.02	.01	.16	.00	.00	-.76	.01
11. He tries to outdo me.	.03	.56	-.23	-.14	.29	-.45	-.21	.00	.05	-.07	.10
12. He tries to support me.	.48	-.18	.02	.13	.04	.16	.15	.12	.03	-.52	.07
13. He is kind to me.	.40	-.16	.39	.15	.01	.37	.12	.12	-.05	-.05	.45
14. He corrects me.	.17	-.06	-.19	.21	.13	.44	-.22	.03	-.10	-.11	.24
15. He trusts me.	.50	-.19	.34	.10	-.17	.07	-.02	.17	-.23	.06	.29
16. He thinks about me.	.63	-.12	.10	.02	-.13	.08	-.10	.34	.11	-.18	.24
17. He bores me.	-.43	.46	-.32	.05	.18	-.35	.14	-.09	-.06	-.08	-.18

ITEM	FACTOR NUMBER										
	1	2	3	4	5	6	7	8	9	10	11
18. He respects me.	.31	-.20	.22	.09	-.07	.20	.02	.61	-.01	-.14	.29
19. He under-values me.	-.10	.38	-.13	-.15	.33	.08	.25	.02	-.49	-.01	-.31
20. He is honest with me.	.50	-.34	.09	.07	-.20	.31	-.12	.08	-.14	-.09	.33
21. He depends upon me.	.70	.00	.16	.12	.11	-.02	.13	-.03	-.34	.05	.08
22. He is careful not to upset me.	.09	-.05	.50	.25	-.02	.13	-.36	.21	-.35	-.24	.04
23. He knows his limitation.	.18	-.16	.15	.39	-.05	.00	-.38	.13	-.31	-.38	.06
24. He lives with my actions and words.	.27	-.07	.13	-.03	-.04	-.10	-.05	.24	-.08	-.66	.20
25. He is afraid of me.	-.20	.29	-.09	.07	.09	-.71	.01	-.10	.00	-.14	-.02
26. He helps me.	.69	-.25	.20	.07	-.06	.20	-.07	.14	-.07	-.23	.27
27. He has different feelings at at different times about me.	.12	-.39	-.24	.05	.40	-.06	-.10	-.11	-.46	.22	-.03
28. He protects me.	.73	-.11	.09	.28	-.08	.11	.04	-.13	-.05	-.14	-.06
29. He has difficulties making decisions when with me.	-.25	.18	-.18	-.08	.67	-.13	.02	-.07	.06	.04	-.13
30. He is interested in me.	.70	-.21	.11	.01	-.21	.04	-.05	.22	-.07	-.09	.17
31. He teaches me.	.85	-.18	.07	-.01	.01	.01	-.03	.08	.01	-.11	.12
32. He embarrasses me.	.03	.15	-.56	-.01	-.04	.18	.20	-.18	-.13	.10	-.06
33. He controls me.	.32	-.08	-.08	-.04	.01	.52	-.40	-.19	.14	-.28	-.01

ITEM	FACTOR NUMBER										
	1	2	3	4	5	6	7	8	9	10	11
34. He deceives me.	-.16	.66	-.16	-.25	.06	.02	-.08	.14	-.17	.12	-.23
35. He argues with me.	-.27	.36	-.64	.03	.08	-.16	-.04	-.24	-.07	.08	-.03
36. He has a sense of feeling when he is with me.	.35	-.18	.23	.29	-.16	.21	.01	.21	.01	-.41	.34
37. He disappoints me.	-.33	.40	-.54	-.05	.03	-.06	.12	-.45	-.09	.02	.08
38. He overestimates me.	.01	.68	-.03	.12	-.10	-.08	.13	-.24	.09	-.02	.00
39. His feelings toward me change from day to day.	.01	-.02	-.09	.11	.12	-.01	-.02	-.07	-.13	.13	.01
40. He makes me unhappy.	-.39	.53	-.23	.19	.21	-.09	-.07	.06	-.12	.06	-.21
41. He gets annoyed at me.	-.14	.51	-.40	.11	.15	-.17	-.05	-.18	-.01	-.01	.33
42. He expects a lot of me.	.11	.17	.00	-.12	-.18	-.05	-.05	-.26	-.64	-.10	.18
43. He gets impatient with me.	-.26	.43	-.53	.08	.10	.01	.11	-.30	.01	.08	-.09
44. He tries to change me.	.28	.10	-.15	.42	.04	.05	-.58	-.02	.09	.08	.05
45. He wears me out.	-.22	.67	-.33	.02	.02	-.10	.05	-.06	-.15	-.05	-.06
46. He worries about me.	.70	-.01	-.02	-.04	-.05	.15	-.20	.01	.12	-.29	.17
47. He is lonely when with me.	-.15	.24	.17	.15	.74	.05	.06	-.19	-.02	-.03	-.11
48. He is important to me.	.66	-.17	.12	-.04	-.15	.25	-.14	-.21	.18	-.26	.12
49. He acts against my interests.	-.26	.76	-.18	.06	.16	-.13	.00	-.01	.02	.13	.00
50. He is ill at ease with me.	-.13	.70	-.08	-.04	.24	-.08	-.06	-.03	.03	-.02	-.25

APPENDIX J

INTERPRETATION "LABELS" FOR 11 FACTORS
EXTRACTED FROM DATA RETRIEVED
FROM TWO CAMP POPULATIONS

<u>Factor Number</u>	<u>Label</u>
1.	Teacher-role interaction
2.	Contrariety
3.	Non-competitive
4.	Non-control
5.	Non-competitive
6.	Non-protective
7.	Treats delinquents as hopeless
8.	Negative relationship to point of dishonesty
9.	Supportive-willing to give positive feedback
10.	Non-upsetting
11.	Non-acceptance

APPENDIX K

AERIAL PHOTO

LOOKOUT MOUNTAIN SCHOOL FOR BOYS

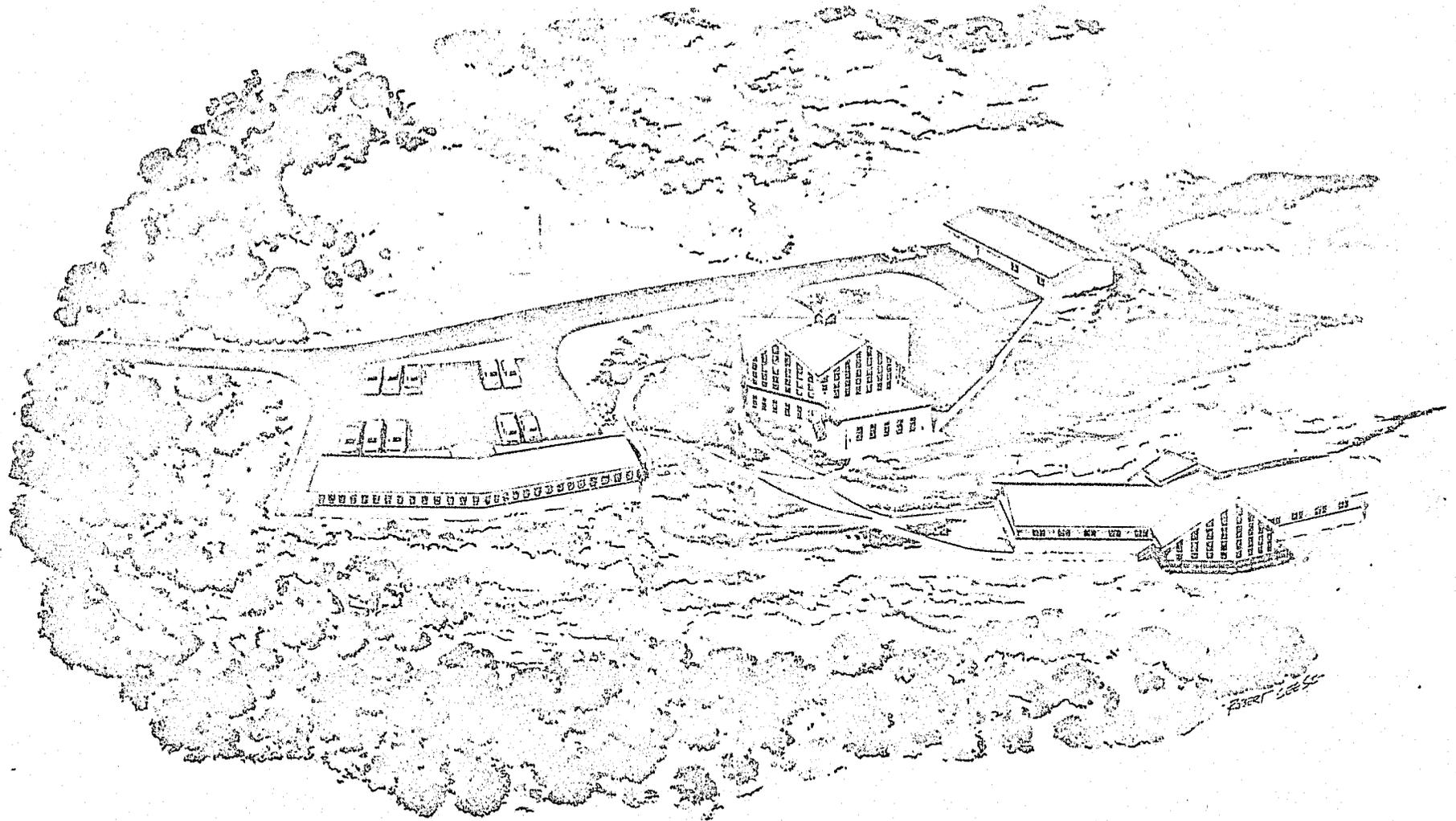
NEAR DENVER, COLORADO



APPENDIX L

PHOTO/COPY OF ARCHITECT'S SKETCH

GOLDEN GATE YOUTH CAMP



ROBERT COOPER

LATHROP PARK YOUTH CAMP

walsenburg colorado

STATE DEPARTMENT OF INSTITUTIONS State of Colorado

BERRY & MORE architects

601 no main pueblo colo

APPENDIX M

PHOTO/COPY OF ARCHITECT'S SKETCH

LATHROP PARK YOUTH CAMP



YOUTH CAMP · GOLDEN GATE CANYON · GOLDBERG & NIELSEN, ARCHITECT-DESIGNER

END