

PREDICTION OF PSYCHIATRIC AIDES'
EFFECTIVENESS BY MEASUREMENT
OF INTERPERSONAL VARIABLES

by

Barbara C. Rynerson, B.S.

A THESIS

Presented to the University of Oregon
School of Nursing and the Graduate Division of the
University of Oregon Medical School
in partial fulfillment of the requirements for the
degree of Master of Science

June 1962

APPROVED:

[Redacted Signature]

ITSSP C. H. GLOBBE, JR. (Chairman, Graduate Council)

[Redacted Signature]

(Chairman, Graduate Council)

ACKNOWLEDGEMENTS

The writer wishes to express her deepest appreciation for the encouragement and guidance in this study given by Miss Lucile Gregerson.

Further thanks is given to Carroll F. Raam, Ph.D., to whom the writer is particularly indebted not only for his expert direction in developing this study but also for his constant assistance; to Mrs. Marion Larson and Mr. George Ouellette for their consistent inspiration and helpfulness.

b.c.r.

TABLE OF CONTENTS

CHAPTER	PAGE
I INTRODUCTION.	1
Statement of the Problem	1
Purpose of the Study	5
Importance of the Problem.	5
Hypothesis	7
Limitations.	8
Assumptions.	9
Justification.	9
Procedure.	11
Overview	12
II REVIEW OF LITERATURE AND RELATED STUDIES REGARDING PERSONNEL SELECTION.	13
Current Trends in Personnel Selection.	13
Testing in Selection of Personnel.	15
Selection of Psychiatric Aide Personnel.	20
III CONDUCT OF THE STUDY.	29
Purpose.	29
Interpersonal Theory of Behavior	29
Hospital Background.	35
Procedure.	36
IV PRESENTATION AND INTERPRETATION OF FINDINGS	40
Criterion Measure.	40
Interpretation of Aide Ratings	42
Aide Self Ratings.	46
V SUMMARY, CONCLUSIONS AND RECOMMENDATIONS.	50
Summary.	50
Conclusions.	52
Recommendations for Further Study.	53

BIBLIOGRAPHY	54
APPENDIX	
A INTERPERSONAL ADJECTIVE CHECK LIST .	57
B AIDE PERFORMANCE EVALUATION.	59

LIST OF TABLES

TABLE	PAGE
I Nurses' Ratings of Psychiatric Aides. . . .	44
II Rank Order of Two Selected Psychiatric Aide Groups Using Total of Adjective Check List Discrepancy Scores and Job Performance Rating Scores.	45
III Mean Octant Per Cent Values of Two Psychiatric Aide Groups' Self Ratings.	46
IV T Test Results of Mean Octant Per Cent Values of Top and Bottom 27% Psychiatric Aide Groups' Self Ratings	47

LIST OF FIGURES

FIGURE	PAGE
1. Classification of Interpersonal Behavior into Sixteen Mechanisms.	32
2. Ideal Aide Profile.	41
3. Aide Profile of Top 27% Group	48
4. Aide Profile of Bottom 27% Group.	49

CHAPTER I
INTRODUCTION

Statement of the Problem

One of the most significant and time consuming functions of the Nursing Service Administrator and Personnel Officer in the Psychiatric Hospital is that of identification and selection of the most appropriate candidates from the available lists of applicants to fill the positions of Psychiatric Aides or Ward Attendants. In public tax-supported hospitals patterns of employment are established by Civil Service regulations and at the present time the important decisions of selection are made largely on the basis of routine application forms, brief personal interviews and a general Civil Service Examination for Psychiatric Aides. Some institutions attempt to improve their predictions of employee performance by utilizing intelligence tests, personality tests, performance tests, questionnaires, ratings of training and experience, voucher forms, and by obtaining letters of reference.⁽¹⁾ There is considerable room for error of judgment, erroneous "first impressions" and the uncertain relationships between test scores and

actual effectiveness in the performance of critical requirements of psychiatric aide functions.

Considerable time, effort and money have gone into research projects which attempt to establish personality measures as adequate predictors of later job performance. The measures used have included objective and projective personality tests, aptitude tests, occupational interest inventories and criterion measures using critical incident techniques. These studies have generally produced low correlations between the variables which were involved and job performance evaluations or ratings. A recent study was one conducted by Dr. Sue Warren at Fairview State Home, which produced only a few negligible correlations out of a vast number of comparisons. (33) These attempts have resulted in little saving of time or energy over the individual evaluation of personal data.

The problem remains to find a suitable predictive index which will be both reliable and valid, related to job classification and practices and which will also result in the saving of time and energy of the employers. The measure should also be one that can be administered and interpreted by the employer without the services of a psychologist or an analyst which would be prohibitive in terms of expense in a tax-supported hospital.

The majority of the previous studies have used as their criterion measure the type of items which are generally

found in job descriptions or in merit ratings such as quality of work, quantity of work, attitude, judgment and public relations. These items are vague and ill-defined and they allow considerable latitude for individual interpretation as to what might be included or considered under each one of these items. There is also some room for doubt that these characteristics are comprehensive, as well as whether they are the most significant variables which could be employed as a measure of an aide's total effectiveness.

One of the areas of evaluation which has not received adequate consideration is that of the direct interpersonal impact that the ward attendant has upon his patients, namely his interpersonal role. It is regarded as important whether a particular aide is generally dominating in his behavior with patients, or whether he is aggressive, passive, empathetic or helpful. Comparing these variables to the generally employed measures, an aide could be extremely productive in terms of quantity of work, but if this productivity is accomplished with a rejecting or aggressive demeanor, the over-all effectiveness of the aide, as far as the patient treatment is concerned may be impaired. "In some situations, such as the psychiatric hospital, the quality of aide performance may well mean continued hospitalization." (8)

If a hospital is to function as a true "therapeutic community," then all personnel play a significant role in

the treatment process. As the patients are in almost continual contact with ward personnel, it can be presumed that the ward attendants will have a marked influence on the behavior and attitude of each one of the patients. It is to a large extent from these ward aides that the patient will derive his conclusions regarding the treatment orientation, the general level of concern for patients and over-all philosophy of nurses, doctors and all other psychiatric hospital personnel.

Some recent research in the area of interpersonal relations indicates that specific patterns of reciprocal interpersonal interaction can be determined and that it is possible to predict with a fair degree of certainty the response which will be elicited as a result of a particular behavior on the part of the initiating person. (20) It has been suggested, for example, that "dominant" people usually train others to behave in a "submissive" fashion; that "passive" individuals are very effective in getting others to take charge and to help them; and that rebellious behavior usually results in direct punishment or rejection of the individual. (20)

If these patterns are generally applicable, then they should also be found in the close associations which occur between ward personnel and their patients. Thus, if a particular aide acts in a rejecting, exploitive or punitive manner, it can be anticipated that his patients will respond

to him with resentment, rebellion and passive resistance.

If "normality" can be defined as flexibility, appropriateness and moderation of expression, then a general goal which will guide all treatment activities is established. Thus, psychiatric aide personnel who consistently evoke the same strong reactions on the part of the patient would not be the desired or ideal aides. Rather, those individuals would be chosen who themselves are flexible, adaptable and who behave in ways appropriate to the situation; and who, in turn, evoke a variety of responses from other people.

Purpose of the Study

The purpose of the study is to utilize the theoretical approach and the associated techniques of the interpersonal system in an attempt to develop appropriate predictive indices or methods which will enable Nursing Service Administrators and Personnel Officers to select the best prospective psychiatric aide personnel in the most efficient manner.

Importance of the Problem

The role of the psychiatric aide is still in the process of transition from that of a custodian to a compassionate and reassuring companion. (25) In most tax-supported psychiatric institutions, the majority of functions performed in the care of the mentally ill are delegated to the ward attendants who have daily, hourly contact with the very real, painful problems of living which ill people must endure.

There is an obvious need for more aide personnel who are aware of the importance of the interpersonal role and who are capable of understanding and assuming the responsibilities of such a position. (25)

The effectiveness of therapeutic procedures will be determined to a great extent by the competency of the aide and by the manner in which he is able to carry out the many, varied ward activities. (4) In a majority of these activities, the aide should be encouraged to strive for more direct and frequent personal contact with a patient or patients. (25) The aide should also be aware of the significance of each contact and the type of response that could be anticipated from the patient; in essence, an awareness of the power and the patterns of interpersonal behavior.

Leary defines the interpersonal meaning of behavior in terms of "What is one person doing to another?" and "What kind of a relationship is he attempting to establish through this particular behavior?" (20) It is reasonable to assume that the psychiatric aide's behavior should be flexible and such that evokes responses in patients that are representative of situations outside the hospital environment. The aide should be able to elicit a wide range of responses and by his own behavior demonstrate examples of acceptable behavior which patients could use and practice.

Much research has been done in the area of pre-screening devices which will predict the effectiveness of psychiatric

aide performance. Even though the majority of this research has produced negligible results, a few studies have provided essential information regarding psychiatric aide personnel and applicants. Definite trends in psychiatric aide personality types and intelligence levels have been brought out in many of the studies done. (4) (32) These studies seem to indicate that the ideal or exceptional aide applicant is rare. Employers of psychiatric aides are still in need of a more reliable pre-screening device or test that will assist in choosing the most effective psychiatric aides from the available persons who apply for these positions. It is possible that the most important aspect of "effectiveness" is in the interpersonal variable and thus feasible that a device which measures interpersonal behavior would be an adequate pre-screening tool.

Hypothesis

By considering the interpersonal aspects of the psychiatric aides' ward activities, it will be possible to develop measures which will allow differentiation between those individuals who will or will not perform according to the standards set down by nursing supervisors. More specifically:

Excellence of performance as a Psychiatric Aide can be predicted from a self rating on a list of items describing interpersonal behavior.

Limitations

This research was restricted to the study of 105 psychiatric aides, including five psychiatric aide supervisors, two traveling aides and one hospital driver, employed in one 460 bed state psychiatric hospital. The aide supervisors, traveling aides and driver were included in the study as they all frequently have direct patient contact and assume similar roles in patient therapy to the actual ward attendants. The terms "psychiatric aide" and "ward attendant" are used synonymously and are defined as the nonprofessional workers in Psychiatric Nursing who are trained on the job to perform clinical skills; may or may not have had previous experience or training; may or may not be licensed or registered as practical nurses; and who are under the direct supervision of the professional nursing staff.

This study was further limited to one procedure for evaluating the interpersonal role - The Interpersonal Adjective Check List, which is also referred to throughout the study as "adjective check list" or "check list." The criterion measure used was defined by 20 professional nurses who were directly responsible for supervision of the psychiatric aides and who were selected by a committee on the basis of administrative ability or potential. The evaluation of psychiatric aides was restricted to two raters who had close contact with the ratees. Each rater was asked to "describe" the aide's interpersonal behavior using the Adjective Check List and to evaluate job performance using a devised rating

scale.

Participants in this project consisted of all professional and nonprofessional nursing service personnel who were employed in the hospital at the time of the study.

One further limitation was in reviewing previous studies with regard to personnel selection and predictive efficiency. Much pertinent information was obtained but specific data were not adequately reported and there were no indications as to where the original documents might be obtained.

Assumptions

For purposes of this study it was assumed that:

1. The attitudes expressed by the nursing supervisors regarding the desired interpersonal behavior of psychiatric aides are representative of other supervisors in similar psychiatric settings.
2. All participants in this study will report their behavior or evaluations accurately.
3. The number of participants in this study is a reasonable sample sufficient to be analyzed statistically and to yield meaningful results.

Justification

"As the active psychiatric treatment of patients gradually supersedes a widespread system of custodial care in the mental hospitals of the United States, there is an increasing demand for the services of prepared psychiatric nursing personnel. Both professional and nonprofessional

nursing personnel are needed to perform various sets of functions for which both need to be prepared to work cooperatively in a group relationship." (2)

The nursing service administrators and professional nurse supervisors are directly responsible for patient care in public mental hospitals. Public hospital staffing patterns are regulated by Civil Service; most of the routine functions and patient contacts are delegated to the non-professional workers, who constitute the majority of nursing service personnel.

Professional nurses cannot help being interested in and concerned about the qualifications of the nonprofessional workers chosen to do modern, therapeutic, psychiatric patient care. They are not all directly involved in selecting the psychiatric aides but they are asked to teach, supervise, guide and counsel the aides who are provided through the selection processes utilized by the personnel officers and the nursing service administrators.

The nursing profession should take equal responsibility and initiative as that of other disciplines for research in the area of selection of nonprofessional personnel. Procedures need to be developed and/or altered continuously to identify the most able applicants available to fill the important psychiatric aide positions for which the nursing profession assumes responsibility.

There has been little carefully controlled research

done on the problem of aide selection.⁽²⁷⁾ Previous measures in this area have not proved too satisfactory in obtaining the desired results. The measures used in this study are objective, simple and eliminate undesirable influences of biased judgment, inadequate information or conscious deception (subtle technique). The particular device has not been tested as a pre-screening measure for psychiatric aides.

For many varied reasons, annual aide turnover in public hospitals has been as high as 50 per cent;⁽²⁷⁾ consequently much time and energy has been consumed in the past by supervising professional nurses in orientation and training of psychiatric aide personnel. Reliable pre-screening measures may result in decreasing this turnover and professional nurses may then be able to utilize their time and energy toward more profitable experiences for the satisfaction and improved morale of the nonprofessional workers.

Procedure

The following design in this study was established after appropriate goals were chosen and approved:

1. Permission to pursue the study in a selected state psychiatric hospital was secured from the personnel officer, the director of Nursing Service, other appropriate administrative personnel, the professional nurse staff and the psychiatric aide group.
2. The Interpersonal Adjective Check List was selected

as the research tool.

3. The criterion measure was established.
4. Data were collected in the following manner:
 - a. The Adjective Check List was given to the psychiatric aides for self evaluation.
 - b. The Adjective Check List was given to the supervising professional nurses for aide evaluation.
 - c. The devised rating scale was given to the supervising nurses for evaluation of psychiatric aide job performance.
5. Data were analyzed, findings were interpreted, conclusions drawn and recommendations made.

Overview

A review of the literature and related studies is presented in Chapter II including current trends in personnel selection procedures, use of psychological testing in selecting personnel and selection procedures specific to psychiatric aide personnel. Chapter III explains the Interpersonal Theory, hospital background and the conduct of the study. Chapter IV consists of the presentation and interpretation of findings. A summary of the study, conclusions and recommendations are presented in Chapter V.

CHAPTER II

REVIEW OF LITERATURE AND RELATED STUDIES REGARDING PERSONNEL SELECTION

Current Trends in Personnel Selection

The process of personnel selection is a tedious and time consuming task in all areas of employment, but is an extremely important process for the stability and achievement of goals in any enterprise. The literature provides much information as to the many and varied techniques utilized and possible steps in the selection process. A major factor or objective consistent in all types of employment programs is the identification of the most qualified applicants to fulfill the positions of employment and most adequately meet the requirements of the job. (1) (30)

In the past, selection of personnel was essentially a negative process because it involved rejecting of applicants who were considered unqualified. (30) Wartime manpower shortages and increasing competition in fields of employment forced a reconsideration of personnel practices and a more positive attitude toward personnel selection. Current practices now emphasize differential placement which involves finding a job most suited to the qualifications of each

applicant. (30) Employers who are conversant with this practice are limited to a degree, however, by the areas in which positions are available to applicants. If the screening process begins in an employment or selective service agency, the employing firm would seemingly be provided with applicants who are qualified for the specific job available. The employer should then strive for a more detailed process to choose the "best" from these applicants.

The literature reveals certain steps in the selection process which are generally used in organized employment programs. These steps are described as follows:

1. The preliminary interview
2. Completion of the application blank
3. Review of the application blank and checking of references and other application blank information
4. Administration of personnel tests
5. Physical examination
6. Employment, hiring and placement interviews. (23) (30)

Both objective and subjective measures are used in this process and effectiveness depends upon the extent to which each step is utilized and relied upon.

One method of determining the value of each step is through the use of successive hurdles in employment screening. This method consists of listing all factors which research has shown are related to job performance and thus arranging the factors in order of their importance of predicting job

success. The first factor or hurdle will be the selection method with the highest validity and continue in rank order of decreasing validity. All applicants are subjected to the measure with the highest validity and are screened further by process of elimination. The significance and key to effectiveness of the successive hurdle technique is that those applicants who are least likely to succeed on the job are eliminated by the first step of the screening process. (30)

In summary, the literature indicates that personnel selection is a positive process involving many techniques and moving toward actual job placement for the satisfaction of both employers and employees. There is an increasing awareness of the importance of a sound personnel selection program for the over-all success in all areas of employment.

Testing in Selection of Personnel

There is increasing emphasis on the use of objective measures in personnel selection in preference to subjective devices which rely upon the judgment and/or intuition of personnel officers and supervisors. (1) (30) (31) Psychometric devices that measure aptitude, achievement, intelligence, performance and personality comprise the more common means of employment testing.

The use of tests is perhaps the most controversial of all personnel selection procedures. It is generally recognized that test results are of value in supplementing other

personnel selection techniques by improving the efficiency with which job performance can be predicted. (30) More specifically, tests can be used to (1) measure the extent to which an applicant's abilities and disabilities fit or unfit him for job demands; (2) check on reported experience; (3) serve as a basis for objective comparisons between applicants; and (4) aid in setting up standards for employment procedures so predictions can be traced, checked and progressively improved. (23)

The largest single problem posed is that testing is expensive with regard to time and money spent in the development and administration of tests which are well suited to the specific employment situation. (23) Other problems arise in recognizing the limitations of such procedures and in gaining acceptance of them as improvements in the hiring process. (30) In order partially to solve these problems, emphasis is placed on scrutinizing and identifying the essential factors or requirements of the job and continuing research which would validate empirically the particular tests to be used. (31) "Significant advances and improvements in the selection process are not made in a company until the personnel manager is able to identify factors critical for job success and to measure the degree to which these factors are possessed by individual applicants." (30)

There is considerable agreement among industrial executives and supervisors that one of the most important

factors in industrial success is personality; the term "personality" being defined in a broad sense to include temperament, interests, attitudes, habits, modes of reaction, disposition, sentiments, and effect on other persons. (17)

However, the use of personality tests in employment of applicants has been accomplished by individual enterprises only by carefully controlled experimental work.

As a result of previous research in industrial employment, personality tests generally have been of little value in hiring of applicants when such tests were submitted to objective checks. The difficulties encountered were that: (1) rationalizations and defense mechanisms of the individual influence responses; (2) such tests expect dichotomous responses; (3) tests are developed to measure various traits or components - the assumption too often made that if a test is a valid measure of whatever trait it is intended, it can safely be used in any situation wherein that trait is thought to be important and (4) tests are validated on student groups or groups that deviate extremely from the population for which they are to be used. (17)

In order better to meet the needs of industry and overcome these problems certain specifications were drawn up and the "Classification Inventory" developed accordingly. The controls used were (1) items constructed so that right answers or those favorable to secure a job could not be predicted; (2) items developed so that there is no forcing

of replies; (3) test scored and validated on specific jobs rather than "traits" and (4) test validated on population similar in all respects to population for which it was subsequently used as a selection device.

It was reported by Clifford E. Jurgenson in the Journal of Applied Psychology that after completion of two studies, the "Classification Inventory" showed satisfactory validity and reliability, but no specific data were given. (17) There was no indication of where and by whom the test was developed and the studies done.

Another personality test (specific test not stated) was administered to a group of life insurance salesmen in an attempt to predict success in selling. A comparison of the personality test scores and success in selling at the end of one year and five years showed a relationship only if the test score was extremely low. Follow-up interviews with these salesmen indicated that either consciously or sub-consciously they were bluffing in the tests and attributed to themselves the traits they believed they should have or thought they were acquiring. (5)

A more recent report in the Journal of Applied Psychology by Peter F. Merenda and Walter V. Clarke, (21) of a validity study on the "Activity Vector Analysis" (AVA) for textile workers, revealed more encouraging results with regard to classification and selection of personnel at all levels of employment. The AVA is a self concept personality assessment

instrument which is widely used in industry.

The subjects of the study were 142 first line workers who performed routine operational tasks in the textile industry. The decision for hiring was made solely on the basis of a personal interview without reference to the AVA. After employment the AVA was given to the workers and the resulting profiles were interpreted by an AVA analyst who had no personal contact with the workers.

The criterion measure of employee success was a locally prepared, five item rating scale for measuring job proficiency. Using this rating scale, the AVA analyst and the interviewer, independently, predicted job proficiency of each worker employed. At the end of 30 days and 90 days three supervising foremen rated these workers.

Product moment correlations were done between predicted and actual rating scores. Substantial correlations were found to exist between the predicted scores of both the analyst and the interviewer and the criterion scores. Correlation coefficients based upon the AVA interpretation were slightly higher at the end of the 90 day period than those based on the personal interview.

Over-all conclusions of this study were that (1) the combined use of the AVA and the personal interview would probably increase the predictive efficiency for the jobs studied and (2) that better long range predictions of on-the-job success can be made through the skilled use of

the AVA as through personal interview procedures. (21)

In reviewing the reports of studies done on testing methods utilized in employing personnel, many important aspects of a testing program are presented which are worthy of consideration. The essential factors seem to be that (1) effectiveness of testing depends to a great extent upon the type of test chosen; (2) that certain tests are best used as an adjunct to other personnel selection procedures; and (3) that the process of validation should be continuous for improved reliability and predictive efficiency.

Selection of Psychiatric Aide Personnel

The employment of psychiatric aide personnel in public hospitals begins with an application to the Civil Service Commission. As stated in the Civil Service Bulletin 3010, applicants must be (1) between the ages of 21 and 64½; (2) residents of the state and full citizens of the United States; (3) in good physical condition; and (4) graduates of the eighth grade or have any equivalent combination of experience and education. These requirements are supplemented by a written examination designed to measure reasoning ability - the Otis Quick-Scoring Mental Ability Test - Beta form. A passing grade is 70. The names of persons who have satisfactorily completed these requirements are certified to the employing institution and applicants are listed in rank order.

This process might be considered the initial step in the

psychiatric aide selection program. Further steps are utilized at the discretion of each hospital. A personal interview by the personnel officer and the nursing service administrator is the extent of the selection process of the particular hospital in which this study was conducted.

It can readily be recognized that these measures are fairly general and leave much of the decision of hiring to speculation. These measures also seem to bear little relationship to the job requirements of the psychiatric aide.

Flanagan⁽¹⁰⁾ expressed the opinion that "intelligence tests have no place in modern civil service testing programs." The reasons supporting this statement were that the environment affects tests, the tests measure only one to two aptitudes important for various types of civil service positions and that the tests are influenced by practice and experience. More appropriately, selection devices should measure the individual's potential and should be related to the job.⁽¹⁰⁾

A study conducted by Barron and Donohue⁽⁴⁾ at Arkansas State Hospital, Little Rock, Arkansas, presents some evidence that, if an intelligence test is utilized in screening psychiatric aide applicants, it should not be considered a conclusive measure for choosing effective employees. The justification for this particular study was the long recognized fact that many individuals who seek employment in mental hospitals are emotionally as well as intellectually unsuited. It was decided that a screening program should be

designed to eliminate applicants of defective mentality and prevent persons suffering from psychoses and other personality deviations from working with the mentally ill.

The purpose of the study was to compare the results of two psychological tests administered to 100 psychiatric aides with the efficiency of job performance. The two tests used were the Otis Quick-Scoring Mental Ability Test, Beta form, and the Minnesota Multiphasic Personality Inventory (MMPI).

Each aide was rated by the ward supervisor, at the end of six months, on a 10 item rating scale covering quality of work, quantity of work, attitude, dependability, emotional stability, and safety and care of equipment.

The results showed that 31 per cent of the aides classified in the high average range by the Otis test received below average efficiency ratings as compared to 6 per cent who received above average efficiency ratings.

Of the 100 aides tested, 38 were classified as having above average intelligence and 11 aides from this group received below average efficiency ratings. Eight of these aides were subsequently discharged due to sleeping or drinking on duty, using drugs and excessive absenteeism.

Despite the small sample, these findings indicated the necessity for a very thorough personality study of all applicants, especially those with intelligence ratings in the high average range.

A comparison of MMPI profiles and efficiency showed a

positive correlation only on the Psychopathic Deviate scale, with fewer "below average" aides at the norm. Forty per cent of those aides with weighted scores above the standard deviation were rated below average in efficiency; none was rated above average. No significant correlations were found to exist on the other scales. These results indicated that the MMPI was effective in eliminating the psychopaths who applied for psychiatric aide positions but was ineffective in predicting the efficiency of aides, in the Arkansas State Hospital, with deviate scores in other categories of personality maladjustment. (4)

Another study, conducted at the Veterans Administration Hospital in Lyons, New Jersey, was concerned with determining those characteristics of psychiatric aides and potential aides which were associated with instability or inferior abilities.

The Personal Inventory Test was administered to 108 new male aides and a bi-social history was obtained from each one. The test contained a total of 85 items and each item that was answered atypically scored one point. Twenty items so answered was cause for close scrutiny of the individual and ten of the items, known as stop items, were such that any one atypical answer was also reason for close investigation of the individual.

On the basis of job performance at the end of a two year period the aide personnel were classified into three major categories including (1) unsatisfactory, (2) satisfactory,

and (3) miscellaneous and unknown (those who did not fit into any other category). There were 29 aides classified as unsatisfactory, all of whom were terminated or left their jobs for various reasons. The average number of atypical answers for this group was 14.7 and 76 per cent of the aides had stop items. If this particular test had been used as a screening device, 83 per cent of the aides in this group would have been scrutinized before employment.

In the satisfactory group there were 67 aides and 27 of these left before the two year period to obtain better jobs. Out of those aides remaining on the job only 13 were rated as high calibre employees. For these 13 aides the average number of atypical answers was 8.9 and 15 per cent of these had stop items. In screening by means of the Personal Inventory Test, 23.1 per cent of the high calibre personnel would have been recognized. The test seemed to be of more value in screening out unsatisfactory psychiatric aides than in identifying the "best."

When the test scores and biosocial histories were analyzed, certain characteristics emerged for both the unsatisfactory group and the high calibre group. (18)

In a published report of validation studies on the Work Assignment Aid, a screening test for psychiatric aides, much information is presented that is in relation to the present study.

The Work Assignment Aid was specifically designed in October, 1947 by George Tarjan and Anna Shotwell in antici-

pation that it would apply more specifically to psychiatric aides than tests constructed for general purposes. It was used for five years at Pacific State Hospital, Spadra, California, with subjective interpretation in the experimental evaluation of nursing personnel. In 1954 the authors reported that the results of the first objective evaluation indicated that the predictive value of the test as a whole was only suggestive. The validation was against a double criterion: nursing supervisory opinion and personnel records. It was found that supervisory ratings showed considerable disagreement. Findings from this research led to construction of a new form with a goal toward development of a test for selection of employees considered successful by supervisory standards.

The new test was administered to 855 psychiatric technicians or similar personnel in seven institutions and test scores were validated against supervisory opinions on 1,459 employees.

The results were that the number of predictive items varied greatly among installations; items with a coefficient of plus or minus 0.15 numbered 43 in one institution and 89 in another, with the remaining institutions interspersed. In general, there was little agreement among the seven facilities on the way employees, rated highly by their supervisors, answered an item. The test had predictive value when an assembly of predictive items specific to each

hospital were scored but was completely unsatisfactory as a universally applicable screening test.

Considerations for further study in pre-screening devices were first, that the psychiatric aide considered successful by supervisory standards is different from the conceptualized ideal of non-nursing professional people and second, that future research should concern itself with the establishment of better criteria of job success. (7)

A recent survey at the Oregon Fairview Home by Dr. Sue A. Warren and E. C. Butterfield indicates negative results in the use of the MMPI in selection of aides. Subsequently a follow-up study has been conducted by the same authors which they state has a generally better design and methodology. The results of this study, which is in the process of being printed, are quoted from a personal communication from Dr. Warren as follows:

The Mann-Whitney U Test showed that discharged attendants had significantly higher scores on the Ma scale (P was .001). They also had significantly higher T scores on Pd (P was .01). They also had significantly higher T scores on the K scale (P was .001). In addition, there was a non-significant trend (P was .08) toward higher T scores on the L scale. These comparisons of the discharged people were made against comparisons of attendants who were "still here." These tests were made without reference to whether or not a person would be employed. In other words, the tests were given to all applicants who showed up and employee selection was made on the basis of an interview and the interviewers were unaware of the results of the test and incapable of interpreting the results of the test if they had known the results.

A Chi-square test indicated (P was .001) that the greater the number of the high individual T

signs which the attendant possessed, the greater the likelihood of his being a member of the discharged group. Positive sign was recorded if the individual had a T score higher than 60 on any of these scales. If an individual's L, K, Pd and Ma sub-scale T score were all less than 60, the chances were better than 2 to 1 that he would be retained as an employee; if 2 of the sub-scale T scores were greater than 60, the chances were better than 2 to 1 that he would be discharged; if either 3 or 4 of the sub-scale T scores exceeded 50, the chances were better than 5 to 1 that the attendant would be discharged.

Our results in this study indicate that it is possible, given an understanding of the hiring and firing procedures of an institution, to predict on a statistical rather than a strictly empirical basis which attendants will be likely to be fired and which ones will probably be retained as employees. It is perhaps noteworthy that this is true even when predictor variables are ones which were originally compiled by a strictly empirical procedure.

We should keep in mind that although the retained-discharged criteria was (sic) used in this study, it is not the only one available and it is probably one of the least desirable criteria from the standpoint of improving the quality of attendants at any given institution. It should be possible to secure objective measures of attendants who are the most highly regarded by their supervisors and to select for employment only similar applicants. (33)

In summarizing a search of the literature concerning the employment and predictive efficiency of psychiatric aide personnel, it has been recognized that many approaches have been utilized toward improving the aide selection process. The most significant features indicated in published reports of studies done are that (1) there seem to be definite characteristics inherent in the group of people who apply for this type of work; (2) that projective techniques which are primarily qualitative, are preferred devices in testing;

(3) that the criterion measures should take into consideration the supervisory standards in each specific instance and (4) that more effective results might be obtained if requirements of the job are more critically evaluated and more clearly stated. It does seem important that only well integrated individuals be accepted into this profession so that there might be no further danger to the health of the patients as well as to avoid any ill effects to the health of the aide personnel themselves.

CHAPTER III
CONDUCT OF THE STUDY

Purpose

The purpose of the study is to utilize the theoretical approach and the associated techniques of the interpersonal system in an attempt to develop appropriate predictive indices or methods which will enable Nursing Service Administrators and Personnel Officers to select the best prospective psychiatric aide personnel in the most efficient manner.

Interpersonal Theory of Behavior

The purpose of the study and hypothesis to be tested arise from the theoretical and research work of Timothy Leary and his associates at the Kaiser Foundation Hospital, which is represented in the book Interpersonal Diagnosis of Personality.⁽²⁰⁾ In order to clarify the interpersonal system and emphasize the aspects relevant to this study, a synopsis of Leary's interpersonal theory is presented.

There were nine working principles that guided the research in personality. These principles were then employed to construct the interpersonal system of personality and

served to determine and limit its use. They are as follows:

1. Personality is the multilevel pattern of interpersonal responses (overt, conscious or private) expressed by the individual. Interpersonal behavior is aimed at reducing anxiety. All the social, emotional, interpersonal activities of an individual can be understood as attempts to avoid anxiety or to establish and maintain self-esteem.
2. The variables of a personality system should be designed to measure - on the same continuum - the normal or "adjustive" aspects of behavior as well as abnormal or pathological extremes.
3. Measurement of interpersonal behavior requires a broad collection of simple, specific variables which are systematically related to each other and which are applicable to the study of adjustive or maladjustive responses.
4. For each variable or variable system which measures the subject's behavior (at all levels of personality) an equivalent set for measuring the behavior of specified "others" with whom the subject interacts must be included.
5. Any statement about personality must indicate the level of personality to which it refers.
6. The levels of personality employed in any theoretical system must be specifically listed and defined. The formal relationships which exist among the levels must be outlined. Once the logical system of levels and relationships among levels is defined, it cannot be changed without revising all previous references to levels.
7. The same variable system would be employed to measure interpersonal behavior at all levels of personality.
8. Measurements of interpersonal behavior must be public and verifiable operations; the variables must be capable of operational definition. Conclusions about human nature cannot be presented as absolute facts but as probability statements.

9. The system of personality should be designed to measure behavior in a functional context. Its language, variables and diagnostic categories should relate directly to the behavior expressed or to the practical decisions to be made in this functional situation.

To elaborate on the interpersonal system, information was taken from an unpublished research abstract written by Walter G. Klopfer, Ph.D. and his associates who conducted a study at the University of Portland using the interpersonal system. (19)

Basic to Leary's system are two concepts: (1) the concept of a circular two dimensional grid which represents all of the various forms of interpersonal behavior, and (2) the concept of levels of interpersonal behavior. The circular grid was derived after extensive analysis of several hundred behavioral descriptions. Leary and his associates found that these mechanisms could be sorted and combined into 16 genetic interpersonal themes, and that they could be ordered into a plot defined by a "dominance-submission" vertical axis and a "hostility-affection" horizontal axis. All 16 themes could then be expressed as combinations of these four nodal points. By combining adjacent sectors, the 16 themes were reduced to 8 general mechanisms. These are referred to in terms of the letter-code for each octant. These octants are briefly characterized as follows:

AP - Managerial-Autocratic
 BC - Competitive-Narcissistic
 DE - Aggressive-Sadistic
 FG - Rebellious-Distrustful
 HI - Self-effacing-Masochistic
 JK - Docile-Dependent
 LM - Cooperative-Overconventional
 NO - Responsible-Hypernormal (figure 1)

The five levels of interpersonal behavior are defined in terms of the operations that produce the pertinent data - the source of the data by definition determines the level of classification. These levels and their respective sources of data are as follows:

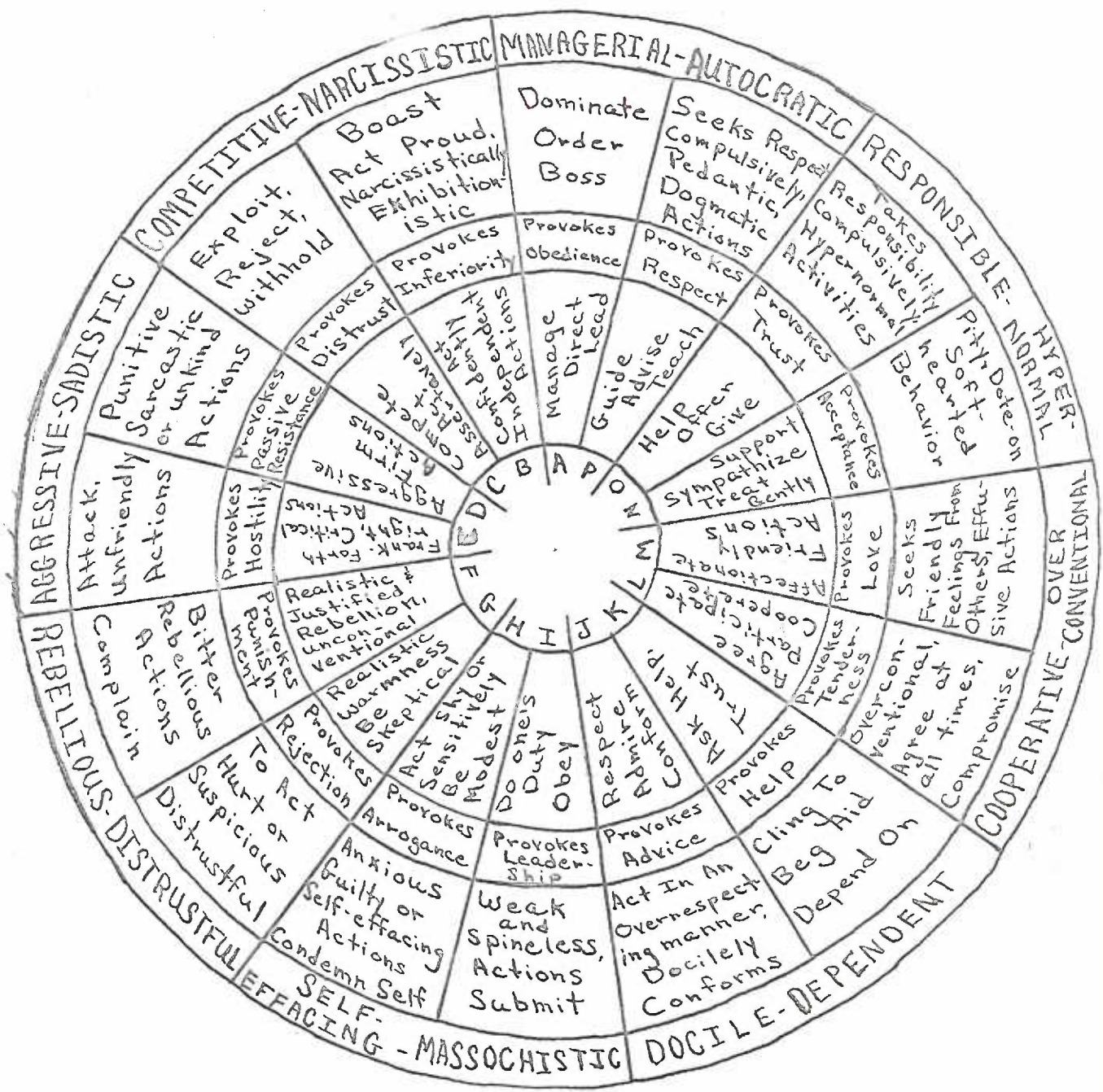


Fig. 1: Classification of Interpersonal Behavior into Sixteen Mechanisms. The inner circle presents illustrations of adaptive reflexes; the center ring indicates the type of behavior that this mechanism tends to "pull" from the other; the outer ring illustrates extreme or rigid reflexes.

- Level I - Public Communication (Ratings of Social behavior)
- Level II - Conscious Description (Adjective Check Lists)
- Level III - Private Symbolization (Projective tests)
- Level IV - Unexpressed Unconscious (Themes consistently avoided elsewhere)
- Level V - Values (Descriptions of "Ideal Self" on tests or interviews)

The same circular grid is utilized to describe Interpersonal behaviors occurring on all levels. Thus, a level-by level comparison is made possible.

One of the basic principles of this system is the "Principle of Reciprocal Interpersonal Relations" which refers to the interpersonal "training" that occurs in all social situations. This is stated by Leary as, "Interpersonal reflexes tend (with a probability significantly greater than chance) to initiate or invite reciprocal interpersonal responses from the 'other' person in the interaction that lead to a repetition of the original reflex." From this principle he has formulated eight specific probability statements indicating the kind(s) of behavior(s) that would be provoked, or "pulled," in response to behavior which is characteristic of each of the eight sectors. These are:

AP pulls IJ
 BC pulls G - HI - J
 DE pulls FG - H
 FG pulls BC - D
 HI pulls BC - DE
 JK pulls AP - NO
 LM pulls MN
 NO pulls KL

The instrument routinely employed to measure interpersonal behavior is the Interpersonal Adjective Check List. (See Appendix A) This test was designed by members of the Kaiser Foundation psychology staff to fit the matrix of the sixteen interpersonal variables. It consists of 128 adjectives - 8 for each point on the circle. An intensity dimension has been built into the check list such that each

of the sixteen variables is represented by a four-point scale. For each variable there is (1) one intensity 1 item which reflects a "mild or necessary amount of the trait;" (2) three intensity 2 items which indicate a "moderate or appropriate amount of the trait;" (3) three intensity 3 items which indicate a "marked or inappropriate amount of the trait;" and (4) one intensity 4 item which reflects an "extreme amount of the trait."

The array of adjectives is balanced according to the expected frequency of usage. The check list is in approximate alphabetical order and the subject checks all adjectives which he believes describe his behavior. Each term is already prescored and automatically produces the Level II self pattern. (20)

For purposes of this study, the interpersonal behavior levels I, II, and V are utilized. Level I, public communication, of each individual aide, by means of the Adjective Check List was determined by the supervising nurses. Level II, conscious description, was determined by the aides themselves, by means of the Adjective Check List. A variant of Level V, values, with regard to the desired or "ideal" psychiatric aide characteristics, was determined as the criterion measure.

Determination of aide effectiveness may then be stated in terms of the aides' interpersonal behaviors and the anticipated reciprocal responses from the patients according

to Leary's probability statements of the types of behavior that tend to initiate or invite other behaviors.

Hospital Background

The hospital selected for this study is one of three state hospitals for the care of patients who are mentally ill. This hospital functions primarily as a "therapeutic community" with open wards and is mostly concerned with intensive treatment of patients rather than long-term custodial care. The plan of treatment is aimed toward assisting the patients in recovering from or adjusting to mental or emotional illnesses in order to function adequately in the environment outside of the psychiatric hospital.

Admissions to the hospital are on a voluntary or court commitment basis and the majority of patients are from two counties within the state. Patients are not restricted by age.

The hospital opened in March, 1961, and at the time of the study, ten of the twelve wards were activated with a bed capacity of approximately 410 beds. Average daily census was 290 to 300 patients. Patients of all ages and with varying types and degrees of mental illnesses comprised the population of each ward; the only segregation was according to sex.

The nursing staff consists of 40 professional and 105 non-professional personnel. Personnel policies were set up by the State Civil Service Commission; employment is on an

eight-hour day, forty-hour week basis; salaries are in line with those of other hospitals under the same civil service system.

Each ward is administered by a registered professional nurse on every 7 A.M. to 3:30 P.M. tour of duty. From 3 P.M. until 11:30 P.M. one professional nurse is in charge of two wards and from 11:15 P.M. to 7:15 A.M. one professional nurse supervises from two to four wards. The aide staffing pattern is regulated on each shift by the bed capacity of the ward except that there is one aide only per ward on the night shift.

The professional nurses are responsible for ward administration and are relieved of these duties by the aides during short intervals; not for an entire shift. The aides' main responsibilities are to participate in industrial assignments, recreational and socializing activities and physical care to meet the needs of the patients.

Procedure

The Interpersonal Adjective Check List was chosen as the research tool. The following steps were taken to collect the data:

1. The criterion measure was established by submitting the adjective check list to 20 professional nurses, currently employed in this hospital, with instructions to check all items which compose the desired or "ideal" characteristics of the psychiatric aide.

The nurses who established the criterion measure were chosen by a committee primarily for their supervisory abilities and potentialities and secondarily for their psychiatric experience.

2. The adjective check lists were administered by the investigator to all (105) psychiatric aides in small groups during on duty time on their respective shifts. The aides were asked to check, independently, as many adjectives as they felt were descriptive of themselves as they perceived their roles as psychiatric aides.
3. The adjective check lists were submitted to the supervising professional nurses for evaluation of the aides with the following instructions:
 - a. Check the adjectives which describe the aide as you have observed him or her in the performance of his or her duties.
 - b. Check as few or as many descriptive terms as are appropriate.
 - c. Please express your own opinion and do not consult with any other nurse or other employee about an aide's performance.

Each aide was rated by two nurses who had supervisory responsibilities for the individual aide.

4. Approximately two weeks after the adjective check list evaluations were completed, aide performance

evaluations were submitted to the professional nurses for the purpose of rating the aides' actual job performances. Each nurse rated the same group of aides on the aide performance evaluation as on the adjective check list; thus two job performance ratings were obtained for each aide.

The aide performance evaluation was taken from an Aide Performance Evaluation Scale, used in recent research by Robert B. Ellsworth et.al.,⁽⁸⁾ and modified somewhat to fit the needs of this particular study. (Appendix B) The evaluation consisted of 24 items with a 4 point rating scale and was designed to evaluate the categories of attitudes toward supervision, high level skills, motivation, empathy, as well as over-all performance.

The length of time the aides needed to complete the adjective check list was approximately 15 minutes. This might be considered one favorable aspect for its use as a pre-employment screening device.

Prior to administering the check lists and evaluations, the purpose of the study was explained to the entire nursing staff. The aides, as well as the nurses, were informed that these evaluations would be kept confidential as far as discussion among hospital personnel and that these ratings would in no way effect their positions or status in the hospital. Throughout the study there was 100 per cent cooperation among all nursing service personnel.

Comments from the aide staff consisted of "I like it because it is shorter (than the Otis test)," "easier to express self rather than being asked a direct personal question," "difficult to be honest and objective" and "feel as though someone else should be doing this instead of myself." These comments, about the adjective check list, pro and con, are pertinent only as indications of possible effectiveness in its use as a pre-employment screening device.

CHAPTER IV
PRESENTATION AND INTERPRETATION OF FINDINGS

Criterion Measure

The Interpersonal Behavior Level V, "ideal" or desired characteristics, was determined by twenty professional supervising nurses by means of the Adjective Check List. Each check list was scored according to the number of items checked in each octant. A mean value for each octant was obtained in the following manner by using the Monroe Calculator:

1. For each "ideal" rating, raw scores for each octant were converted to per cent scores.
2. The sum of all octant per cent scores over all "ideal" ratings was determined and a mean per cent value was obtained.
3. The grand total number of items was obtained for all 20 "ideal" ratings. From this sum, the mean number of items checked per rating was obtained.
4. Mean adjusted octant scores were obtained by multiplying the mean number of items checked by the mean per cent value for each octant.

The mean number of items checked by each rater on each check list was 28.9. The mean adjusted octant scores were as follows:

AP - 3.9	FG - 1.4	LM - 4.6
BC - 4.1	HI - 2.3	NO - 6.2
DE - 4.1	JK - 2.3	

The Ideal Aide Profile, according to Leary's theory, (Chapter III) is presented by a circular profile graph. (Figure 2.)

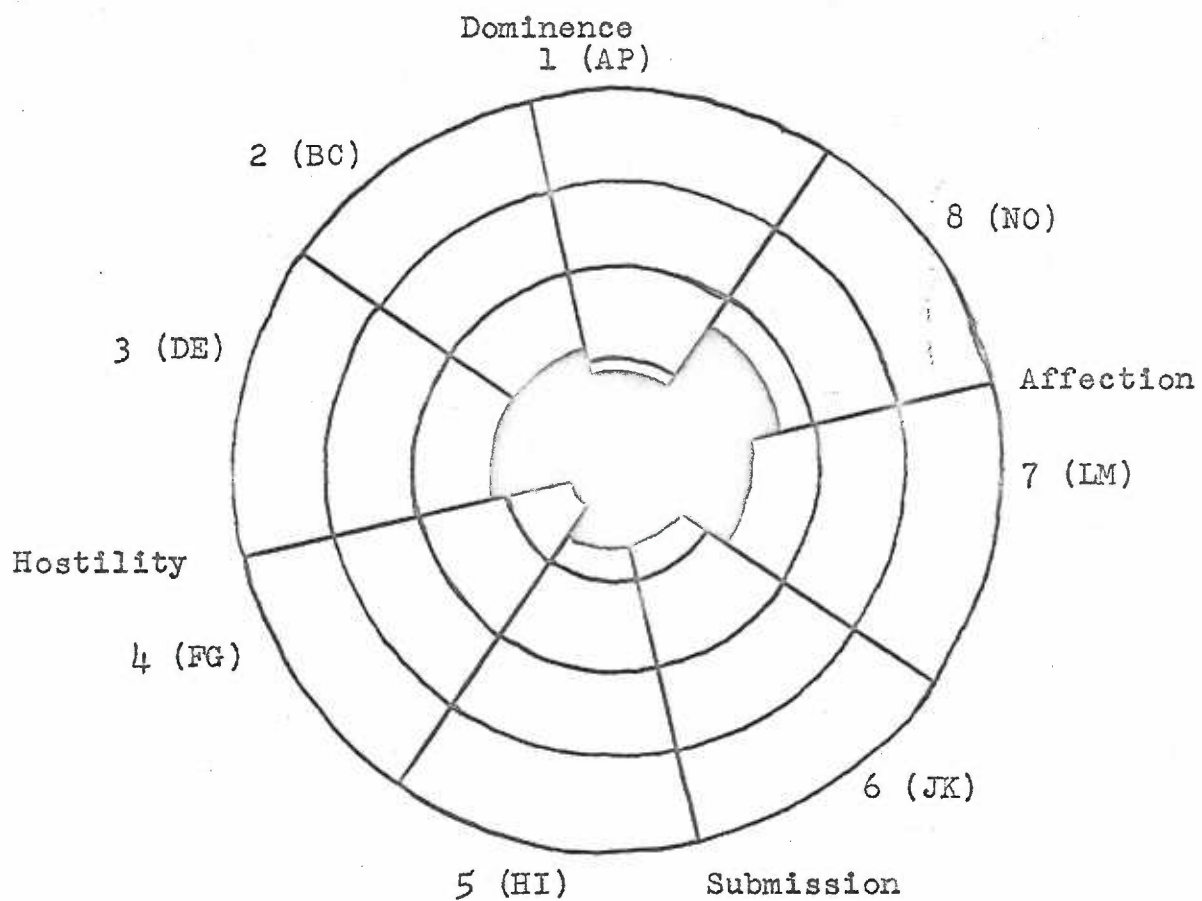


Figure 2. Ideal Aide Profile. The radius of the circle is equal to 16.

Interpretation of Aide Ratings

Each of the 105 psychiatric aides was rated on the Adjective Check List and on a Job Performance Rating by two professional supervising nurses. The check lists were scored according to the number of items checked in each octant. The Interpersonal Behavior Level I, public communications, was obtained for each aide in the following manner by using the Monroe Calculator:

1. The raw scores for each octant were converted to per cent scores for both ratings on the same individual.
2. A mean per cent value for each octant was determined.
3. The mean number of items checked for each individual was obtained from the total number of items checked by both raters.
4. Mean adjusted octant scores were determined by multiplying the mean number of items by the mean per cent for each octant.

From these scores a profile for each individual aide was established.

The job performance ratings were scored by summing the scores of each of the 24 items and obtaining the total score of each rating. A mean score of the two raters for each individual aide was then determined.

In order to obtain a correlation between the check list and job performance ratings a Level I (public communications) - Level V (ideal) profile disparity comparison was established by computing the discrepancy scores. The

discrepancy score for each individual Level I rating was determined by subtracting the mean adjusted score for each octant of the "ideal" profile from the mean adjusted score for each octant of the individual's mean Level I rating. The total discrepancy score was then obtained for each individual aide.

The discrepancy scores and job performance rating mean scores for all 105 aides were correlated by the Pearson - R method using the following formula:

$$r_{XY} = \frac{[N \sum XY - (\sum X)(\sum Y)]^2}{[N \sum X^2 - (\sum X)^2][N \sum Y^2 - (\sum Y)^2]}$$

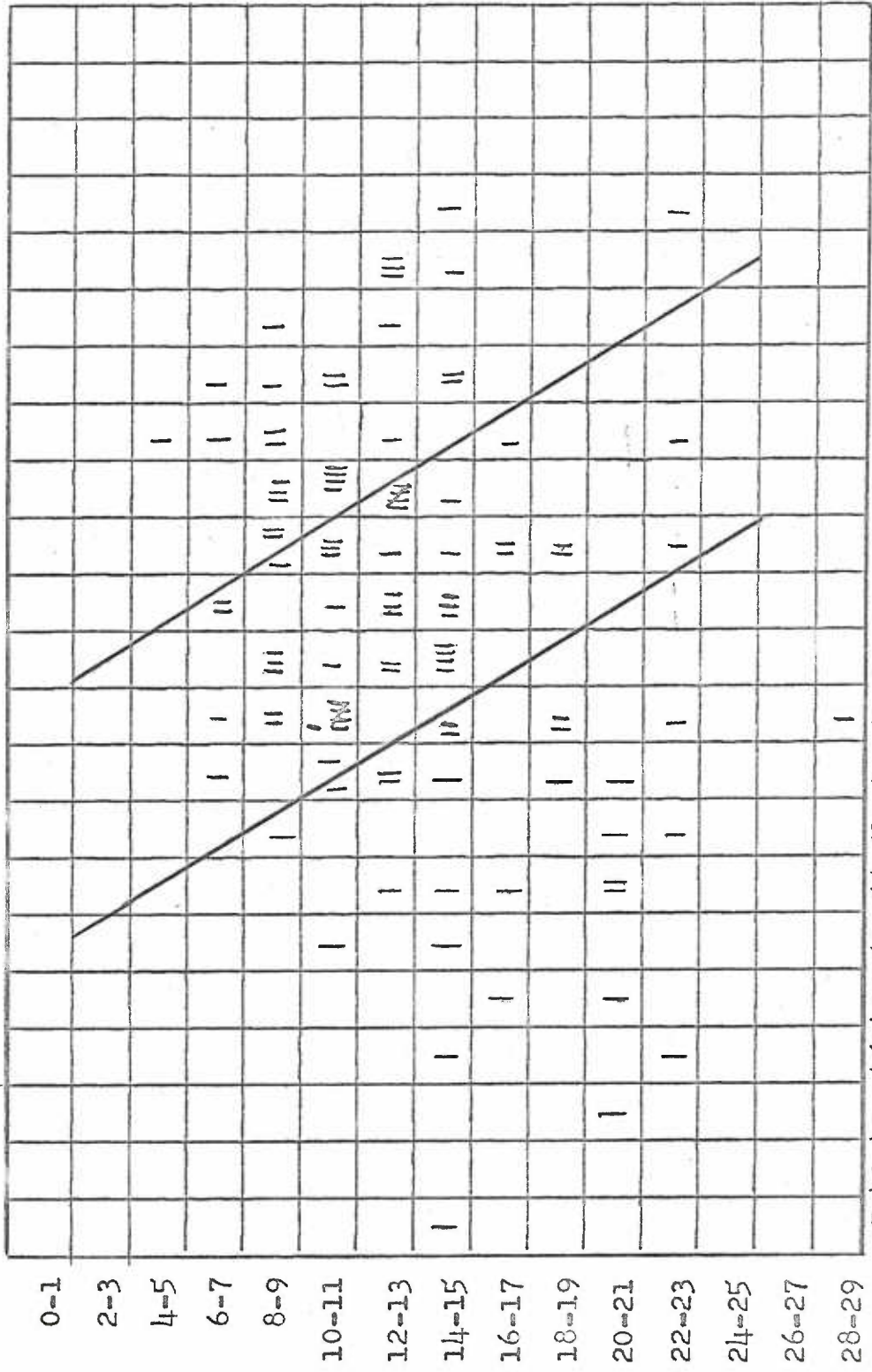
X = Job performance Rating Scores

Y = Discrepancy Scores

A correlation of .411 was obtained which is significant at the .01 level.

The same discrepancy scores and job performance rating mean scores for all 105 aides were also plotted on a Scatter Diagram. (Table I, Page 44). The diagram illustrates the significant correlation and provided a means of selecting the top and bottom 27% of the total aide group with regard to job performance as well as deviation from the "ideal." The validity of the selection of those aides in the two groups was double checked by inverting the discrepancy

TABLE I
NURSES' RATINGS OF PSYCHIATRIC AIDES



Adjective Check List + Discrepancy Scores

Job Performance Rating - Mean Scores

scores and summing the inverse discrepancy scores with the mean job performance rating scores for each individual aide and placing them in rank order. An N of 28 (27% of 105) from the top and bottom was then selected and compared with the group selected from the scatter diagram. The two groups were the same by both methods of selection. Table II illustrates the sum of the inverse discrepancy scores and the job performance rating mean scores of the two groups and the cut off points for each group.

TABLE II
RANK ORDER OF TWO SELECTED PSYCHIATRIC AIDE GROUPS
USING TOTAL OF ADJECTIVE CHECK LIST DISCREPANCY
SCORES AND JOB PERFORMANCE RATING SCORES

Top 27% N = 28		Bottom 27% N = 28	
<u>Score</u>		<u>Score</u>	
106.9	101.0	81.1	70.8
106.4	100.0	80.6	68.2
105.2	99.4	80.4	67.8
105.0	99.0	79.4	67.3
105.0	98.9	79.1	66.1
104.9	98.5	78.9	65.7
104.3	98.3	78.9	64.4
104.3	97.9	78.5	63.5
103.8	97.4	75.7	62.1
103.6	95.9	75.5	61.3
103.5	95.9	74.2	59.5
103.2	95.7	72.4	54.9
102.2	95.7	72.1	53.9
101.2	95.5	71.6	51.6

Aide Self Ratings

The self ratings of the top and bottom 27% (n 28) were analyzed to obtain the Level II (Self-profile) rating for each individual aide in the two groups. The scores were obtained in the following manner by use of the Monroe Calculator:

1. For each self-rating, raw scores for each octant were converted to per cent scores.
2. The sum of all octant per cent scores over all self ratings in the top 27% was determined and a mean per cent value was obtained. (Table III)
3. The sum of all octant per cent scores over all self ratings in the bottom 27% was determined and a mean per cent value was obtained. (Table III)

TABLE III

MEAN OCTANT PER CENT VALUES OF
TWO PSYCHIATRIC AIDE GROUPS' SELF RATINGS

Octants	AP	BC	DE	FG	HI	JK	LM	NO
Top 27% of Aide Group	9.71	10.9	12.7	7.7	11	13.9	16.9	17.5
Bottom 27% of Aide group	8.71	10.25	13.3	7.04	11.3	12.4	19	15.32

Utilizing the per cent scores, t tests were done to determine if each group, as a whole, differed significantly on the self ratings. The following t formula was used:

$$t = \frac{\bar{X}_1 - \bar{X}_2}{S \sqrt{\bar{x}_1 - \bar{x}_2}}$$

The Monroe Calculator was used to compute each step and the results of the t tests are presented in Table IV.

TABLE IV
T TEST RESULTS OF MEAN OCTANT PER CENT
VALUES OF TOP AND BOTTOM 27%
PSYCHIATRIC AIDE GROUPS' SELF RATINGS

<u>Octant</u>	<u>t Score</u>	<u>Significance</u>
AP	.694	$P < .05$ - Not significant
BC	.139	$P < .05$ - Not significant
DE	.331	$P < .05$ - Not significant
FG	.315	$P < .05$ - Not significant
HI	.227	$P < .05$ - Not significant
JK	1.08	$P < .05$ - Not significant
LM	1.22	$P < .05$ - Not significant
NO	1.11	$P < .05$ - Not significant

The t scores did not report a significant difference between the two groups on any one octant.

The mean per cent for the 28 aides in the top 27% was slightly higher for octants AP, BC, FG, JK and NO. A slightly higher mean per cent for the 28 aides in the bottom 27% was obtained for octants DE, HI and LM.

In order to present a profile of each group and illustrate the similarity between the interpersonal Level II profiles of the two groups, mean adjusted octant scores were

obtained for each group by multiplying the mean number of items checked by the mean per cent value for each octant.

The mean number of items checked by each aide in the top 27% was 34.5. The mean adjusted octant scores were as follows:

AP - 3.3	HI - 3.8	
BC - 3.8	JK - 4.8	
DE - 4.3	LM - 5.8	
FG - 2.7	NO - 6.0	(Figure 3)

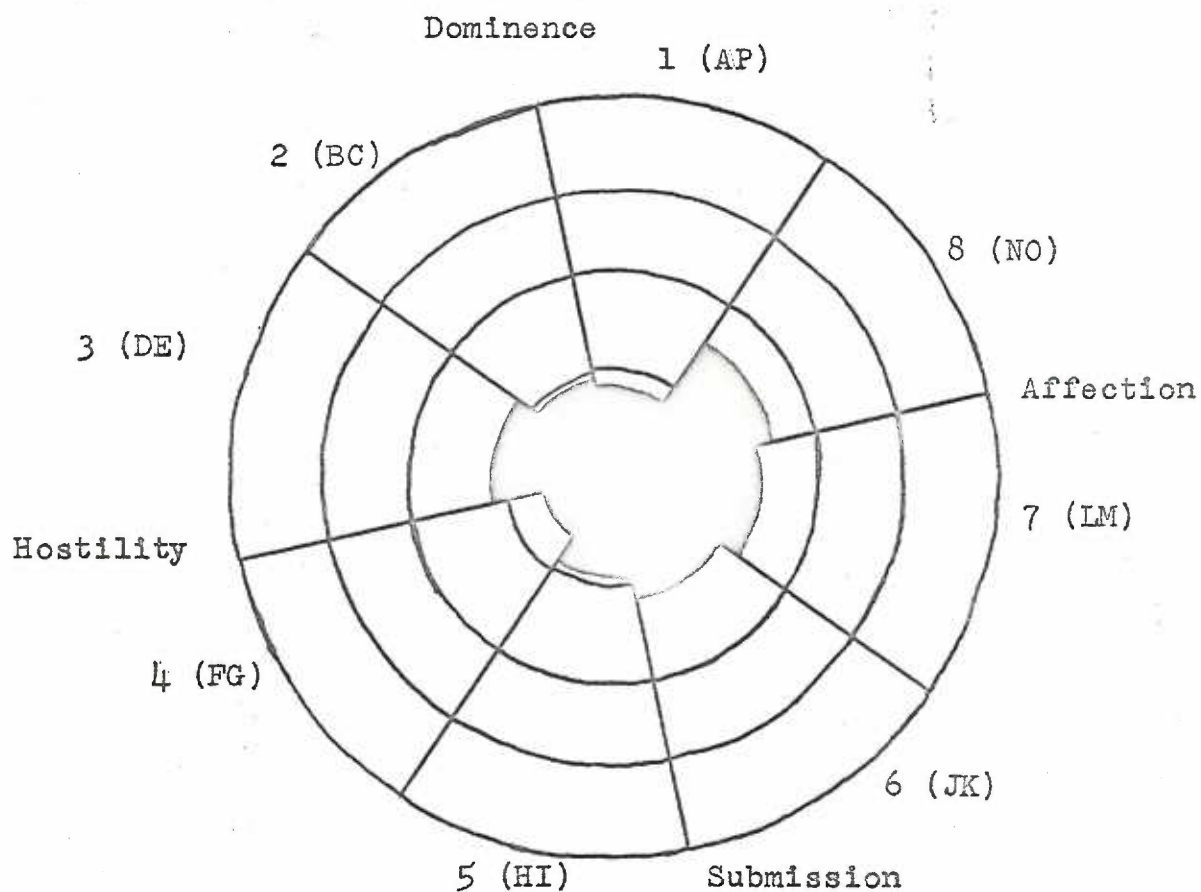


Figure 3. Aide Profile of Top 27% Group. The radius of the circle is equal to 16.

The mean number of items checked by each aide in the bottom 27% was 32. The mean adjusted octant scores were as follows:

AP - 2.9	HI - 3.7	
BC - 3.4	JK - 4.1	
DE - 4.4	LM - 6.2	
FG - 2.4	NO - 4.9	(Figure 4.)

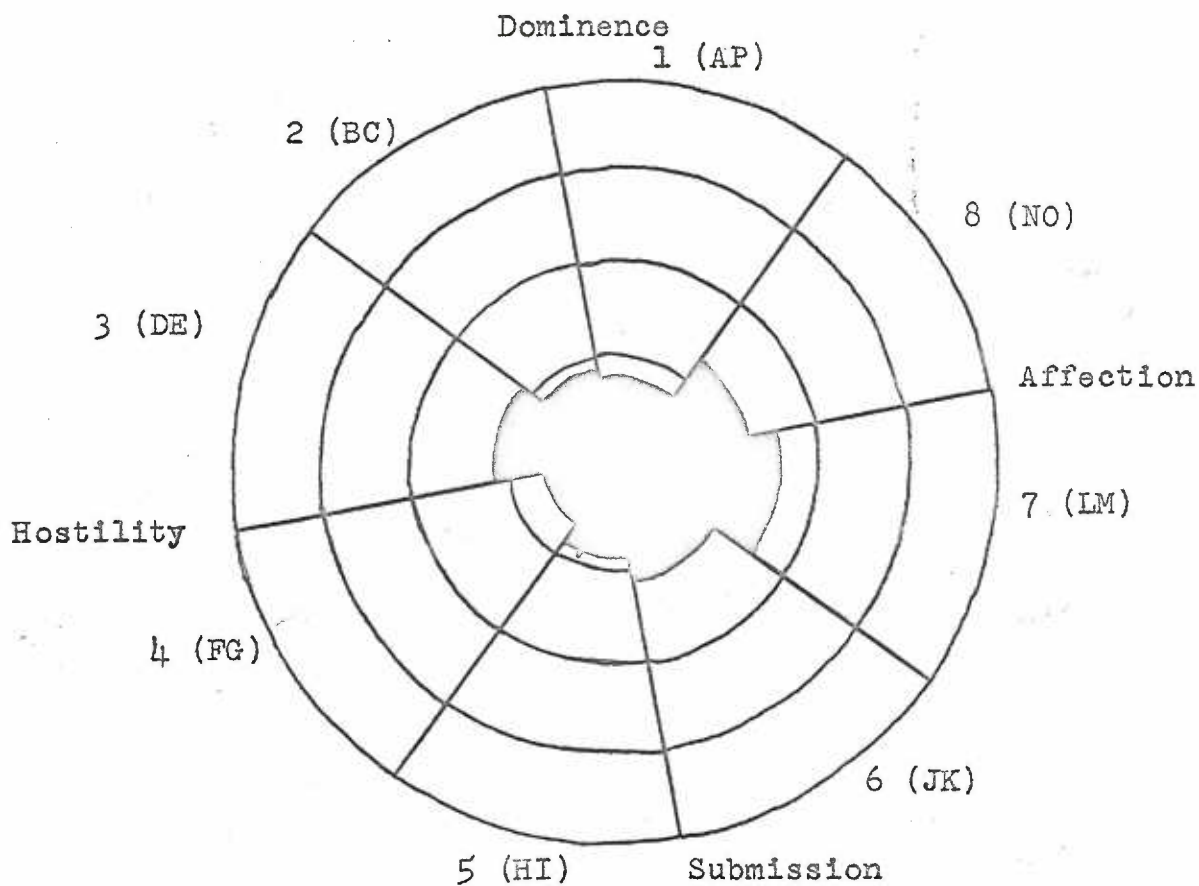


Figure 4. Aide Profile of Bottom 27% Group. The radius of the circle is equal to 16.

CHAPTER V
SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

Summary

This study was concerned with finding a suitable predictive index for the purpose of employing psychiatric aide personnel in a state psychiatric hospital. The process of aide selection is a significant but time and effort consuming function of the Nursing Service Administrator and Personnel Officer and the subjective measures utilized in pre-employment screening are often ineffective and unreliable.

Objective measures of an applicant's qualifications and job performance abilities are a vital part of well organized personnel programs. Research in the area of pre-employment screening devices has indicated that objective measures can be successful toward improving the efficiency of predicting job performance if a specific measure is validated empirically in the situation for which it is to be used. Reliability further depends on the adequacy of the criterion measure and to what extent there is a relationship between the pre-screening device and the critical requirements of the job.

The purpose of this study was to consider the interpersonal aspects of the psychiatric aides' ward activities and to utilize the techniques of the interpersonal system in an attempt to develop appropriate predictive indices or methods of efficiently selecting the most satisfactory psychiatric aide personnel.

The Interpersonal Adjective Check List was the method of data collection. The check list was first submitted to a selected group of supervising professional nurses within the selected hospital to determine an "ideal" aide interpersonal profile and establish a criterion measure. From this criterion measure and two separate ratings of the psychiatric aides by the supervising nurses, two groups of aides were selected with regard to excellence of performance and deviation from the ideal profile. The two groups were identified as (1) those aides who performed exceptionally well in their jobs and differed only slightly from the "ideal" profile and (2) those aides who performed very poorly and deviated considerably from the "ideal" profile.

The adjective check list was submitted to 105 psychiatric aides for self-evaluation of interpersonal behavior characteristics. The self ratings of only the two groups were analyzed to determine if the characteristics or interpersonal profiles the aides attributed to themselves were significantly different among the two groups.

In retrospect, the hypothesis was disproved as the self-rating characteristics were not significantly different among the two groups in any one area of the interpersonal profile.

Conclusions

From the findings of this study the following conclusions have been drawn:

1. It is not possible to predict excellence of performance as a Psychiatric Aide from a self rating on a list of items describing interpersonal behavior. By the use of the scoring system established for the determination of interpersonal behavior profiles, self ratings by the good aides and the poor aides did not differentiate significantly between the two groups.
2. The slight difference obtained between the two groups, by the regular scoring system, could not be utilized to develop a scale for practical use as a predictive index of job performance.
3. The group of aides in the top 27% tended to rate themselves slightly higher in the profile octants of Managerial-Autocratic, Competitive-Narcissistic, Rebellious-Distrustful, Self-effacing-Masochistic, Docile-Dependent and Responsible-Hypernormal; slightly lower in the profile octants of Aggressive-Sadistic and Cooperative-Overconventional. This categorization could indicate

that the aides in this group attribute to themselves slightly greater dependability.

4. The significant correlation between the Adjective Check List discrepancy scores and the Job Performance Ratings possibly indicates that there is a relationship between the tool used and aide performance as seen by the supervising nurses in the hospital in which the study was conducted.

Recommendations for Further Study

1. The data from this study should be analyzed according to item frequency without regard for octant division and scoring. Such an analysis might ascertain if there were certain descriptive items that the top group of aides checked more or less often than the bottom group. From this analysis, a list of items could be compiled for each group and scoring templates devised to rate the items particular to each group. It is possible that there would be some practical value to this device as a predictor of job performance when the check list is given to psychiatric aide applicants.
2. Further studies should be done in the area of pre-screening devices for employment of non-professional workers in nursing service with a goal toward developing a tool that will be an adequate predictor of job performance.

BIBLIOGRAPHY

1. Adkins, Dorothy C. "Objectives of Public Personnel Selection." Public Personnel Review. V 20 April, 1959.
2. American Nurses' Association. "Statement of Functions of the Nonprofessional Worker in Psychiatric Nursing." American Journal of Nursing. V. 55, March, 1955.
3. Barrett, Richard S. "The Process of Predicting Job Performance." Personnel Psychology. V. 11 1958.
4. Barron, Emerson M. and H. H. Donohue. "Psychiatric Aide Selection Through Psychological Examinations" A Preliminary Report of the Screening of Applicants at the Arkansas State Hospital, Little Rock, Arkansas. American Journal of Psychiatry. V. 107 May, 1951.
5. Bills, Marion A. "Tests That Have Failed and Why." American Management Association, Marketing Series. V. 45 1941.
6. Carothers, Sister M. Charlotte. "Pretests for Nursing Aides." Nursing Outlook. V. 10 March, 1962.
7. Dingman, H. P. et al. "A Screening Test for Psychiatric Technicians: Continuation Report on the Work Assignment Aid, Validation Studies at Various Hospitals." American Journal of Mental Deficiency. V. 60 January, 1956.
8. Ellsworth, Robert B. et al. "The A.P.E.V. Scale: A Study of Aide Performance as Perceived by Nurses, Aides and Patients." Nursing Research. V. 11 Winter, 1962.
9. Finer, Herman. Administration And The Nursing Services. New York: The MacMillan Company, 1952.
10. Flanagan, John C. "Use and Abuse of Intelligence Tests." Public Personnel Review. V. 22 January, 1961.
11. Forlan, George and Forrest H. Kirkpatrick. "Intelligence and Adjustment Measurements in the Selection of Radio Tube Mounters." Journal of Applied Psychology. V. 29 August, 1945.

12. Gorton, John V. A Guide for the Evaluation of Psychiatric Nursing Services. New York: National League for Nursing. 1961
13. Gurel, Lee and Moiveline M. Morgan. "A Project in Psychiatric Aide Evaluation: The Process." Nursing Outlook. V. 6 October, 1958.
14. Gurel, Lee and Moiveline M. Morgan. "A Project in Psychiatric Aide Evaluation: The Outcome." Nursing Outlook. V. 6 November, 1958.
15. Hall, Bernard H. et al. Psychiatric Aide Education. New York: Grune and Stratton, 1952.
16. Harmon, Lindsey R. and Daniel N. Wiener. "Use of the Minnesota Multiphasic Personality Inventory in Vocational Advisement." Journal of Applied Psychology. V. 29. 1945.
17. Jurgensen, Clifford E. "Report on the 'Classification Inventory': A Personality Test for Industrial Use." Journal of Applied Psychology. V. 28 1944.
18. Kline, Nathan S. "Characteristics and Screening of Unsatisfactory Psychiatric Attendants and Attendant-Applicants." The American Journal of Psychiatry. V. 106 February, 1950.
19. Klopfer, Walter G. et. al. as quoted in "Application for Research Grant." University of Portland; Portland, Oregon.
20. Leary, Timothy. Interpersonal Diagnosis of Personality. New York: The Ronald Press Company, 1957.
21. Merenda, Peter F. and Walter V. Clarke. "A.V.A. Validity for Textile Workers." Journal of Applied Psychology. V. 43 1959.
22. Ohmann, O. A. "Research on the Selection of Salesmen at the Tremco Manufacturing Company." American Management Association, Marketing Series. V. 45 1941.
23. Pigors, Paul and Charles A. Myers. Personnel Administration. New York: McGraw-Hill Book Company, Inc. 1961.
24. Raaum, Carroll F. Prediction of Interpersonal Behavior in Problem-Solving Situations. Doctor's Dissertation, University of Portland; Portland, Oregon.
25. Robinson, Alice. The Psychiatric Aide. Philadelphia: J. B. Lippincott Company, 1959.

26. Rowe, Frederick B. "The Selection of Psychiatric Aides: Criterion Development and Prediction." Dissertation Abstracts. V. 17 1957 Microfilm.
27. Schmidt, Donald P. and David Cohen. "The Selection of Psychiatric Aides: I Critical Requirements of the Job." American Journal of Psychiatry. V. 12 December, 1955.
28. Spaney, Emma. "Personality Tests and the Selection of Nurses." Nursing Research. February, 1953.
29. Spiller, Elvira S. Comparison of Interpersonal Relationships Between Patients and Authoritarian and Non-Authoritarian Aides in a Psychiatric Hospital. Master's Thesis. Boston University School of Nursing, Boston, Massachusetts. Typed.
30. Stone, C. Harold and William E. Kendall. Effective Personnel Selection Procedures. Englewood Cliffs, New Jersey: Prentice-Hall, Inc. 1956.
31. Thorndike, Robert L. Personnel Selection. New York: John Wiley and Sons, Inc., 1949.
32. Vaccaro, Joseph John. "Judging the Adequacy of Psychiatric Aides." Hospital Management. February, 1952.
33. Warren, Sue. Personal Communication concerning studies on Aide Selection at Oregon Fairview Home. March, 1962.

APPENDIX A

Name _____ Sex _____ Date _____
 Age _____ Educ. _____ Occup. _____ Relig. _____ Type _____
 Marital Status _____ Place of Exam _____ D _____ L _____

Interpersonal Adjective Check List

Instructions: Check every item which is true or generally true. All others leave blank.

- | | |
|---|---|
| <input type="checkbox"/> Acts important | <input type="checkbox"/> Often admired |
| <input type="checkbox"/> Apologetic | <input type="checkbox"/> Often gloomy |
| <input type="checkbox"/> Appreciative | <input type="checkbox"/> Outspoken |
| <input type="checkbox"/> Bitter | |
| <input type="checkbox"/> Boastful | <input type="checkbox"/> Resentful |
| | <input type="checkbox"/> Sarcastic |
| <input type="checkbox"/> Bossy | <input type="checkbox"/> Self-confident |
| <input type="checkbox"/> Businesslike | <input type="checkbox"/> Selfish |
| <input type="checkbox"/> Complaining | <input type="checkbox"/> Self-punishing |
| <input type="checkbox"/> Considerate | |
| <input type="checkbox"/> Cooperative | <input type="checkbox"/> Self-seeking |
| | <input type="checkbox"/> Shy |
| <input type="checkbox"/> Dependent | <input type="checkbox"/> Skeptical |
| <input type="checkbox"/> Dictatorial | <input type="checkbox"/> Spineless |
| <input type="checkbox"/> Dominating | <input type="checkbox"/> Stubborn |
| <input type="checkbox"/> Easily fooled | |
| <input type="checkbox"/> Easily led | <input type="checkbox"/> Tender |
| | <input type="checkbox"/> Timid |
| <input type="checkbox"/> Firm but just | <input type="checkbox"/> Warm |
| <input type="checkbox"/> Forceful | |
| <input type="checkbox"/> Friendly | <input type="checkbox"/> Able to criticize self |
| <input type="checkbox"/> Good leader | <input type="checkbox"/> Able to doubt others |
| <input type="checkbox"/> Grateful | <input type="checkbox"/> Able to give orders |
| | <input type="checkbox"/> Accepts advice readily |
| <input type="checkbox"/> Hard-hearted | <input type="checkbox"/> Agrees with everyone |
| <input type="checkbox"/> Helpful | |
| <input type="checkbox"/> Independent | <input type="checkbox"/> Always ashamed of self |
| <input type="checkbox"/> Irritable | <input type="checkbox"/> Always giving advice |
| <input type="checkbox"/> Jealous | <input type="checkbox"/> Can be obedient |
| | <input type="checkbox"/> Clinging vine |
| <input type="checkbox"/> Meek | <input type="checkbox"/> Cold and unfeeling |
| <input type="checkbox"/> Modest | |

- | | |
|---|--|
| <input type="checkbox"/> Critical of others | <input type="checkbox"/> Can be frank and honest |
| <input type="checkbox"/> Cruel and unkind | <input type="checkbox"/> Can be indifferent to others |
| <input type="checkbox"/> Distrusts everybody | <input type="checkbox"/> Can be strict if necessary |
| <input type="checkbox"/> Easily embarrassed | <input type="checkbox"/> Can complain if necessary |
| <input type="checkbox"/> Encourages others | <input type="checkbox"/> Eager to get along with others |
| <input type="checkbox"/> Fond of everyone | <input type="checkbox"/> Egotistical and conceited |
| <input type="checkbox"/> Forgives anything | <input type="checkbox"/> Enjoys taking care of others |
| <input type="checkbox"/> Frequently angry | <input type="checkbox"/> Expects everyone to admire him |
| <input type="checkbox"/> Friendly all the time | <input type="checkbox"/> Frequently disappointed |
| <input type="checkbox"/> Generous to a fault | <input type="checkbox"/> Hardboiled when necessary |
| <input type="checkbox"/> Gives freely of self | <input type="checkbox"/> Hardly ever talks back |
| <input type="checkbox"/> Hard to impress | <input type="checkbox"/> Impatient with others' mistakes |
| <input type="checkbox"/> Kind and reassuring | <input type="checkbox"/> Lets others make decisions |
| <input type="checkbox"/> Lacks self-confidence | <input type="checkbox"/> Likes to be taken care of |
| <input type="checkbox"/> Likes everybody | <input type="checkbox"/> Makes a good impression |
| <input type="checkbox"/> Likes responsibility | <input type="checkbox"/> Obeys too willingly |
| <input type="checkbox"/> Likes to compete | <input type="checkbox"/> Often helped by others |
| <input type="checkbox"/> Loves everyone | <input type="checkbox"/> Overprotective of others |
| <input type="checkbox"/> Manages others | <input type="checkbox"/> Passive and unaggressive |
| <input type="checkbox"/> Often unfriendly | <input type="checkbox"/> Proud and self-satisfied |
| <input type="checkbox"/> Oversympathetic | <input type="checkbox"/> Rebels against everything |
| <input type="checkbox"/> Resents being bossed | <input type="checkbox"/> Self-reliant and assertive |
| <input type="checkbox"/> Respected by others | <input type="checkbox"/> Shrewd and calculating |
| <input type="checkbox"/> Self-respecting | <input type="checkbox"/> Slow to forgive a wrong |
| <input type="checkbox"/> Somewhat snobbish | <input type="checkbox"/> Sociable and neighborly |
| <input type="checkbox"/> Stern but fair | <input type="checkbox"/> Spoils people with kindness |
| <input type="checkbox"/> Thinks only of himself | <input type="checkbox"/> Straightforward and direct |
| <input type="checkbox"/> Touchy and easily hurt | <input type="checkbox"/> Too easily influenced by others |
| <input type="checkbox"/> Usually gives in | <input type="checkbox"/> Too lenient with others |
| <input type="checkbox"/> Wants everyone's love | <input type="checkbox"/> Too willing to give to others |
| <input type="checkbox"/> Wants to be led | <input type="checkbox"/> Tries to be too successful |
| <input type="checkbox"/> Well thought of | <input type="checkbox"/> Tries to comfort everyone |
| <input type="checkbox"/> Will believe anyone | <input type="checkbox"/> Trusting and eager to please |
| <input type="checkbox"/> Able to take care of self | <input type="checkbox"/> Very anxious to be approved of |
| <input type="checkbox"/> Admires and imitates others | <input type="checkbox"/> Very respectful to authority |
| <input type="checkbox"/> Affectionate and understanding | <input type="checkbox"/> Wants everyone to like him |
| <input type="checkbox"/> Always pleasant and agreeable | <input type="checkbox"/> Will confide in anyone |
| <input type="checkbox"/> Big-hearted and unselfish | |

									<u>Raw Score</u>
A:	B:	D:	F:	H:	J:	L:	N:		D _____
:	:	:	:	:	:	:	:		
P:	C:	E:	G:	I:	K:	M:	O:		L _____

APPENDIX B

AIDE PERFORMANCE EVALUATION

Ratee _____ Total Score _____

1. Does this aide admit his mistakes when you ask him about them?
 4. Always _____
 3. Usually _____
 2. Sometimes _____
 1. Seldom _____

2. Do co-workers, in comparison with other aides, take his or her suggestions, follow examples, etc?
 4. Much more than other aides _____
 3. Somewhat more than most aides _____
 2. Somewhat less than most aides _____
 1. Have little regard for him _____

3. When you talk with this aide, does he or she seem disinterested or indifferent?
 4. Never _____
 3. Seldom _____
 2. Sometimes _____
 1. Usually _____

4. Do patients seem to come to this aide with their requests for comfort items?
 4. Always _____
 3. Usually _____
 2. Sometimes _____
 1. Seldom _____

5. Does this aide complain when changes of assignment are made?
 4. Never _____
 3. Seldom _____
 2. Sometimes _____
 1. Usually _____

6. Does this aide make mistakes?
 4. Almost never _____
 3. Rarely _____
 2. Sometimes _____
 1. Often _____
7. Does this aide read or waste too much time talking to other personnel?
 4. Never _____
 3. Seldom _____
 2. Sometimes _____
 1. Usually _____
8. Has this aide reported to you or recorded slight improvements in very sick patients?
 4. Always _____
 3. Usually _____
 2. Sometimes _____
 1. Seldom _____
9. When you point out an error to this aide, does he or she resent it?
 4. Never _____
 3. Rarely _____
 2. Occasionally _____
 1. Frequently _____
10. Have other aides said to you that they would like to work with this aide?
 4. Frequently _____
 3. Occasionally _____
 2. Have not said _____
 1. Do not want to _____
11. When you enter the ward, is this aide doing something other than being engaged with the patients or performing a job? (such as reading, just sitting, socializing with another aide, etc.)
 4. Almost never _____
 3. Rarely _____
 2. Sometimes _____
 1. Often _____
12. If you were a patient who had disturbing personal problems, would you find it easy, compared with most aides, to talk with this aide?
 4. Always _____
 3. Usually _____
 2. Sometimes _____
 1. Seldom _____

13. When you criticize this aide for something that has gone wrong with his or her assignment, does he or she try to excuse why it is not his fault?
4. Never _____
 3. Seldom _____
 2. Sometimes _____
 1. Usually _____
14. If an emergency arose, would this aide wait to be told what to do?
4. Never _____
 3. Seldom _____
 2. Sometimes _____
 1. Usually _____
15. Have you known this aide to put off doing something until later, when he or she could have done it at the time the task was assigned?
4. Never _____
 3. Seldom _____
 2. Sometimes _____
 1. Usually _____
16. If you were a shy, fearful patient who wanted a tooth brush, fresh water, deck of cards, etc. would you, in comparison with other aides, ask this aide for them?
4. Always _____
 3. Usually _____
 2. Sometimes _____
 1. Seldom _____
17. When you notify this aide that a change in procedure is to be made, does he or she seem critical of it or otherwise resentful?
4. Never _____
 3. Seldom _____
 2. Sometimes _____
 1. Usually _____
18. In the performance of mechanical skills (bed-making, setting-up equipment, etc) this aide, in comparison with most other aides is:
4. Much more skilled _____
 3. Somewhat more skilled _____
 2. About average skill _____
 1. Less skilled than most _____

19. Have you known this aide to misunderstand instructions or directions?
4. Never _____
 3. Seldom _____
 2. Sometimes _____
 1. Usually _____
20. Do aides seem to come to this aide with their problems, either personal or work, in comparison with other aides?
4. More often than most _____
 3. Somewhat more often than most _____
 2. No more often than most _____
 1. Less often than most _____
21. When you point out one of his mistakes to this aide, does he or she admit it only after an argument or prolonged discussion?
4. Never _____
 3. Seldom _____
 2. Sometimes _____
 1. Usually _____
22. Does this aide make suggestions which are useful?
4. Frequently _____
 3. Occasionally _____
 2. Rarely _____
 1. Never _____
23. When you tell this aide once to do something, is that enough to insure that the job will be done?
4. Always _____
 3. Usually _____
 2. Sometimes _____
 1. Seldom _____
24. Do patients talk to this aide more often than they do most other aides?
4. Much more often _____
 3. Somewhat more often _____
 2. About the same _____
 1. Somewhat less often _____

Typed by
Margaret A. Henneberg