

FACILITATIVE CONDITIONS AND PSYCHOLOGICAL TYPE
IN INTAKE INTERVIEWS BY PROFESSIONALS AND PARAPROFESSIONALS

By

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A sample of 21 professionals and 21 paraprofessionals was compared on two sets of variables. The first was the Rogerian facilitative conditions of empathic understanding, warmth, and genuineness; the second was the Jungian bipolar dimensions of psychological type: extraversion (E)-introversion (I), sensing (S)-intuition (N), thinking (T)-feeling (F), and judgment (J)-perception (P). In addition, subjects on opposite ends of each of the four dimensions were compared on the facilitative conditions. The conditions were measured by ratings of tape recordings of the initial five minutes of therapeutic intake interviews, and typological variables were measured by the Myers-Briggs Type Indicator. The professionals, from a metropolitan community mental health center, saw clients face-to-face, while the paraprofessionals, from a crisis intervention center in a smaller university city,

worked over the phone. Results of comparisons of the two groups on the facilitative conditions were similar to those from the majority of studies in the area--paraprofessionals generally outperformed professionals. Paraprofessional scores on warmth, genuineness, and total (a mean of the three conditions) were significantly higher. Scores of both groups on empathic understanding were considerably lower than those for the other scales, with paraprofessional scores nonsignificantly higher. Although many explanations for the lower levels of empathic understanding scores were discussed, none was found satisfactory. It was proposed, however, that had the scores been elevated, the difference between groups would have been significant. Because of low reliabilities in ratings of genuineness, caution was advised in interpreting results from that scale. No significant difference was found in typological composition between the two groups. Subjects of the E, N, F, and P preferences outnumbered those of the I, S, T, and J preferences, in both groups and in the total sample, and in fact 43% of subjects were of the ENFP psychological type. Of the sample, 76% were of both the N and F preferences, and 95% were intuitives. Finally, it was found that subjects from both sides of each of the four typological dimensions performed similarly on the facilitative conditions. Levels of facilitative conditions and preferences in psychological type in the sample were compared to those found in other investigations, and implications of the findings for treatment were discussed.

CHAPTER I

INTRODUCTION

Although the shortage of trained personnel in "mental health" has long been recognized, and although the use of paraprofessionals (nonprofessionals, lay therapists, volunteers) has been advocated both as a solution to that problem (Joint Commission, 1961) and to the problem of a psychological gap between clinicians and clients, it is only in the last few years that such personnel have been employed in any numbers (Collins, 1971; Ewalt, 1967; Grosser, Henry, & Kelly, 1969; Guerney, 1969; Sobey, 1970). With this recent increase in the use of paraprofessionals—especially in the area of suicide intervention (Heilig, Farberow, & Shneidman, 1968; McGee, 1974; McGee & Jennings, 1973)—research has followed apace.

In one of the original studies with paraprofessionals, Rioch, Elkes, Flint, Usdansky, Newman, and Silber (1963), in a two year program, trained housewives specifically as "Mental Health Counselors." Their training focused on practical psychotherapeutic experience rather than theory, statistics, and the like. The Counselors went on to employment in the field. Follow-up studies (Golann, Breiter, & Magoon, 1966; Magoon & Golann, 1966) show great satisfaction with these practitioners in their job settings. Follow-up data are not available for the second group, trained

as counselors of parents of young children, but the physicians with whom they worked were favorably impressed with the service they rendered and expressed a desire for them to continue in the child care clinics where they were placed (Rioch, 1967).

In another project typical of those involving training of paraprofessionals, Holzberg (1963, 1967; Holzberg & Gewirtz, 1963) placed college students, with little training but with weekly supervisory groups, in a mental hospital with the assignment of visiting a selected group of patients. These "Companions" were seen by supervisors, the hospital staff, and themselves as valuable additions to the institution's therapeutic program. They seemed, also, to gain in personal growth themselves from the experience. Recent reports (Boylin, 1973) indicate that this program has had continuing success into the present.

Paraprofessionals are also being used in many "higher" capacities formerly thought to be the exclusive domain of the extensively trained professional. McCaulley (1969) and her associates selected, trained, and evaluated their "Psychological Assistants" for activities to aid practicing clinical psychologists, such as research, evaluation, and, at times, treatment. Their program consisted of two years of didactic work combined with on-the-job training in various hospital services. Impressions of staff, participants themselves, and a team of outside evaluators were that the Assistants competently performed many psychological activities, thereby freeing staff for more specialized duties.

The therapeutic quality of these various types of nonprofessionals has been demonstrated in a number of projects. A review by Carkhuff (1968), investigating the Rogerian therapist-offered conditions of empathy, warmth, and genuineness, yielded the following conclusions about volunteer training programs:

There is extensive evidence to indicate that lay persons can be trained to function at minimally facilitative levels of conditions related to constructive client change over relatively short periods of time....

There is little evidence to indicate that professional trainee products are being trained to function effectively on any dimensions related to constructive client change over long periods of training....

Comparative statistics indicate the greater effectiveness of lay and lower level guidance training programs in eliciting constructive trainee change on those conditions related to constructive client change... on both identical and converted indexes, lay trainees function at levels essentially as high or higher (never lower), and engage clients in counseling process movement at levels as high or higher, than professional trainees (p. 118).

The same author also reviewed studies of paraprofessional therapeutic effectiveness using a wide variety of measures and concluded:

It appears that lay persons can effect significant constructive changes in the clients whom they see. Extensive evidence indicates that hospitalized neuropsychiatric patients..., outpatient neuropsychiatric patients..., normals situationally distressed or otherwise..., and children..., demonstrate significant constructive changes as a consequence of their contacts with lay persons (p. 119). (Literature references omitted.)

Other reviews of studies using the variables of empathy, warmth, and genuineness (Berenson & Carkhuff, 1967; Knickerbocker, 1972; and Truax & Carkhuff, 1967) yield similar conclusions.

The growing impression that nonprofessionals might be functioning therapeutically as well as or better than their professional counterparts was substantiated by Durlak (1973) who writes:

There are 14 studies that have used various experimental procedures to compare directly the therapeutic effectiveness of nonprofessional and professional personnel. In seven of the 14 studies, lay therapists had achieved significantly better therapeutic results than professionals; in the other seven studies, results for the two groups were similar. In no study have lay personnel been found to be significantly inferior to professional workers (pp. 301-302). (Author's italics.)

In addition, in a recent study, Biggerstaff, Bigelow, and Lin (undated) indicate that, although roles do differ between professional and paraprofessional therapists, the role differences between them are in areas other than psychotherapy. So while it seems both groups are, indeed, "doing therapy," the assumption that professionals are superior to nonprofessionals in that function is no longer tenable, and, indeed, the contrary is indicated in many cases (Knickerbocker, 1972; Knickerbocker & McGee, 1973).

This study set as one of its goals, therefore, to further investigate the question of the relative clinical effectiveness of professional and paraprofessional psychotherapists under well-defined, but naturally occurring conditions, using as dependent

variables the well established therapist-offered conditions or facilitative conditions. These are the three relationship variables: empathy, warmth, and genuineness. Stemming from Rogers' (1957) system of therapy, these "process" variables are among the most researched in psychotherapy.

The evidence in a growing number of studies (Carkhuff, 1968; Luborsky, Auerback, Chandler, Cohen, & Bachrach, 1971; Truax & Carkhuff, 1967) strongly indicates that therapists who exhibit more of the facilitative conditions are significantly more helpful in terms of client growth while those who provide low levels of those conditions are actually harmful. While there is some objection to so optimistic an interpretation of the evidence (Meltzoff & Kornreich, 1970), the strong relationship between the facilitative conditions and a great number of outcome criteria (e.g., therapist and client rating scales, therapist and client subjective reports, psychological test data) suggests that the conditions are indeed valid indices of therapist functioning, and they were therefore selected for use in the present study.

In an overview of the program and personnel of a telephone crisis service, McGee, Knickerbocker, Fowler, Jennings, Ansel, Zelenka and Marcus (1972) present a methodology for evaluation of the effectiveness of paraprofessionals in that program which is easily adaptable to other similar services. Two of the instruments which have been developed are the Technical Effectiveness

(TE) and Clinical Effectiveness (CE) Scales. The former is applicable specifically to telephone suicide prevention and crisis intervention. Showing interrater reliabilities of .90 to .99, it is a measure of the extent to which a volunteer performs certain tasks judged essential to the opening of a new case. These include nine items such as "Can the caller be immediately recontacted?", "Was it determined whether or not this is a suicide case?", and "Did the volunteer develop a structured plan of action or help the caller develop one?" (Fowler & McGee, 1973).

The CE Scale is composed of the scales developed from Rogers' work by Truax and Carkhuff (1967) and refined by Lister (1970) and measures the facilitative conditions. While TE is believed to be one of the necessary conditions of good crisis therapy, CE has been proposed as necessary and sufficient for good psychotherapy in general (Rogers, 1957). This assertion would be disputed by practitioners of other persuasions, but the studies by Truax and Carkhuff (1967) and Carkhuff (1968) cited above support the claim.

The Lister scales show interrater reliabilities of .82, .83, and .82 on empathy, warmth, and genuineness, respectively. They have been used in a variety of studies, and since they are more differentiated than the Truax and Carkhuff scales and therefore more readily teachable, they were selected for measuring facilitative conditions in the present study.

Empathic understanding corresponds to what Rogers (1957) calls empathy and what Truax and Carkhuff (1967) call accurate empathy; facilitative warmth to what Rogers (1957) calls unconditional positive regard, Truax and Carkhuff (1967) call nonpossessive warmth, and Carkhuff (1968) calls respect; and facilitative genuineness to Rogers' (1957) congruence or genuineness and Truax and Carkhuff's (1967) genuineness.

According to Lister, in empathic understanding (Em),

The counselor accurately communicates his perceptions of the client's own unique view of the world. The counselor takes an internal frame of reference and through perceptual inference assists the client to conceptualize more sharply the feelings or personal meanings which are unclearly defined (1970a, p. 1).

In facilitative warmth (Wm),

The counselor communicates that he prizes the client as a likable, worthwhile human being. The counselor's "warmth" is expressed without reservation or condition, i.e., it is free or "unearned" by the client, and is expressed independent of the client's progress, growth, good behavior or attitudes. In short, the counselor communicates implicitly or explicitly: "I like you—period!" (1970b, p. 1).

In facilitative genuineness (Gn),

The counselor is genuine, authentic, and personally non-defensive in his relationship with the client. He speaks openly rather than defensively, spontaneously rather than cautiously or deliberately. The counselor relates as himself rather than as the embodiment of a professional role stereotype (1970c, p.1).

Since research cited above indicates that paraprofessionals often surpass professionals in therapeutic effectiveness as measured by the facilitative conditions,¹ the following hypotheses are proposed:

H_{1a} : Paraprofessionals will receive significantly higher ratings than professionals in Em.

H_{1b} : Paraprofessionals will receive significantly higher ratings than professionals in Wm.

H_{1c} : Paraprofessionals will receive significantly higher ratings than professionals in Gn.

H_{1d} : Paraprofessionals will receive significantly higher ratings than professionals in Total conditions (Ttl).

In addition to the investigation of facilitative conditions in the two groups, this study also concerned itself with discovering the relationships (if any) between the facilitative conditions and therapist personality characteristics, and between experimental group membership and therapist personality characteristics.

The search for personality characteristics of the effective psychotherapist has met with few successes. In a review of over a dozen studies of therapist personality and outcome, in which they covered many variables such as self-confidence, passivity, expressiveness, and hostility, Meltzoff and Kornreich (1970)

¹Facilitative conditions are defined for this study as Em, Wm, Gn, and Ttl. Ttl is equal to $\frac{Em+Wm+Gn}{3}$.

concluded, "We know little about the personality of successful therapists" (p. 309). Similar findings are reported in the equally comprehensive review by Luborsky et al. (1971) who found few therapist attributes related to outcome, and of these only three could be considered personality characteristics: empathy (which was potentiated when combined with warmth and genuineness), attitude and interest patterns ("A-B" therapist differences), and similarity to client. Higher similarity according to such measures as the Rorschach, Kelly's Role Construct Repertory Test, and the Strong Vocational Interest Blank were reported to be related to better outcome.

One personality framework of long standing which has been little researched in the area of psychotherapy, but which has face validity for application to that phenomenon, is the theory of Psychological Types developed by Jung (1923). Two instruments have been developed to make possible tests of Jung's theory, the Gray-Wheelwright Psychological Type Questionnaire (Gray & Wheelwright, 1945, 1946) and the Myers-Briggs Type Indicator (MBTI) (Myers, 1962). The latter was chosen for this study because of its greater psychometric sophistication and research.

The MBTI indicates preferences for modes of perception and judgment which, although often mentioned informally as characteristics of effective therapists, have been little investigated. These will be discussed and hypotheses generated about them after a description of Jungian typological theory.

The MBTI was created to implement Jung's theory that many differences in human behavior which appear random are "actually quite orderly and consistent, being due to certain basic differences people prefer to use perception and judgment" (Myers, 1962, p. 1). "Perception" is defined as the way of "becoming aware of things, people, occurrences, or ideas." The two kinds of perception are sensing and intuition. "Judgment" refers to the process of coming to conclusions about that which is perceived. Thinking and feeling are the two kinds of judgment.

In addition, the MBTI indicates a preference for the extraverted or the introverted attitude--in the Jungian sense of orientation toward outer or inner worlds. A fourth scale, judging-perception, indicates whether the subject prefers the judging (thinking or feeling) or perceptive (sensing or intuition) attitude in dealing with the outer world.

Although everyone exercises both of the complementary functions in each dimension to some degree, the theory states that there is a preference--probably inborn--for one or the other process on each dimension.

A preference for extraversion (E) reflects an orientation primarily to the outer world of people and things, resulting in action-mindedness and sociability, while introversion (I) reflects an orientation primarily to the inner world of concepts and ideas, resulting in a faculty for concentrating, an attitude of introspective reserve, and a reliance on subjective values.

The sensing (S) mode of perception involves becoming aware of the world directly through the "five senses," while its opposite, intuition (N), relies on the indirect mode of perception by way of unconscious interpretations and associations to outside stimuli. The sensing person will tend to be realistic, observant, practical, fun-loving, and good at remembering and working with facts, while the intuitive person tends to be imaginative, creative, and good at seeing implicit meanings and relationships.

The thinking (T) mode of judgment involves decision by means of an impersonal analysis whose goal is objective truth, while feeling (F) depends on a personal subjective attractiveness of alternatives. People with a preference for thinking are more logical and business-like, while those with preference for feeling tend to have greater interest in and expertise with people, ideals, and emotional relationships.

Finally, the preference on the judging (J) versus perceiving (P) dimension reflects whether a person relies primarily on judging (T or F) or perceiving (S or N) process in his dealings with the outer world, i.e., in the extraverted part of his life. The judging person tends to be more decisive, orderly and systematic, while the perceptive one is spontaneous, curious, and open-minded.

Some of the above variables, indicated by the MBTI, have face validity for application to the field of psychotherapy, and there is

a small body of research to suggest they might be attributes of successful therapists.

Intuition is cited as a valuable characteristic of psychotherapists in many discussions (Berne, 1966; Bugental, 1965; Collins, 1971; Jung, 1972; Reich, 1949). It can be seen that such a facility in unconsciously perceiving and processing minimal cues (somatic communications, language nuances, etc.) and continually formulating and testing hypotheses about them would be of value to the therapist. The following hypotheses are therefore proposed:

H_{2a}: Intuitives will score significantly higher than sensing subjects on Em.

H_{2b}: Intuitives will score significantly higher than sensing subjects on Ttl.

It would be expected that persons comfortable with the intuitive process would be attracted to therapy and "helping" activities. The following is therefore hypothesized in spite of the fact that sensing persons outnumber intuitives in the general population:

H_{3a}: Intuitives will outnumber sensing subjects in the professional group.

H_{3b}: Intuitives will outnumber sensing subjects in the paraprofessional group.

Since feeling with its concern for values typically leads to an "interest in people," it would seem more germane to

therapy than "impersonal" thinking. Indeed, type tables² show the tendency of psychotherapists to fall in the NF category. The following hypotheses are therefore proposed:

H_{4a}: Feeling subjects will score significantly higher than sensing subjects on Em.

H_{4b}: Feeling subjects will score significantly higher than sensing subjects on Wm.

H_{4c}: Feeling subjects will score significantly higher than sensing subjects on Ttl.

It would also be expected that the more "personal" feeling person would be attracted to such work with people as psychotherapy, and it is therefore hypothesized as follows:

H_{5a}: Feeling subjects will outnumber thinking subjects in the professional group.

H_{5b}: Feeling subjects will outnumber thinking subjects in the paraprofessional group.

Of course, the attributes of sensing and thinking (the complements of intuiting and feeling) also have their places at times in therapy where, for example, the client needs an improved orientation to practical reality (S) or to learn how to consider the logical outcome of the course he is following (T). These therapist behaviors are especially relevant in crisis intervention where the therapeutic goal is for the client to gain cognitive mastery over the reality of his problem.

²Unpublished studies of psychotherapists, clinical psychology graduate students, and a community mental health clinic performed by Mary H. McCaulley and the author at the University of Florida Typology Laboratory.

The situation with judging-perceiving and extraversion-introversion is less clear. As there is almost no literature in the area, hypotheses are generated solely from the following "armchair" reasoning dealing with the definitions of the variables.

Although there are instances where the therapist must, as an expert in human relations, become "judging" or decisive and guide the client in a rather directive manner, the accepting perceptive attitude seems important in all therapies. It would seem that the perceptive orientation, which facilitates an openness to experiencing the other's phenomenological world, a non-critical acceptance of the other, and a willingness to experience one's own being honestly, is more basic to the facilitative conditions than the evaluative and decision-making judging orientation. The following hypotheses are therefore proposed:

H_{6a}: Perceptive subjects will score significantly higher than judging subjects on Em.

H_{6b}: Perceptive subjects will score significantly higher than judging subjects on Wm.

H_{6c}: Perceptive subjects will score significantly higher than judging subjects on Ttl.

Again, since the perceptive orientation is hypothesized to increase facility in therapy, it would seem that more perceptive types would be attracted to therapeutic endeavors than

would those with a preference for judging. The following is therefore hypothesized:

H_{7a} : Perceptive subjects will outnumber judging subjects in the professional group.

H_{7b} : Perceptive subjects will outnumber judging subjects in the paraprofessional group.

Theoretically, it would seem that the introverted therapist could be more in touch with the psychological world, while his extraverted counterpart would more effectively communicate his understandings of the client. In theory, the introvert possesses more facility in understanding the inner world, and the extravert is more likely to be attuned to people and events outside himself (presumably including a client). Extraverts also possess more of a tendency to be open, disclosing thoughts and feeling as they go along. The following hypotheses are therefore proposed:

H_{8a} : Introverts will score significantly higher than extraverts on Em.

H_{8b} : Extraverts will score significantly higher than introverts on Gn.

Since extraverts outnumber introverts in the general population, the following is hypothesized:

H_{9a} : Extraverts will outnumber introverts in the professional group.

H_{9b}: Extraverts will outnumber introverts in the paraprofessional group.

The hypotheses concerning typological makeup of the professional and paraprofessional groups are based on both theory and data from other samples and are proposed with highest confidence. The hypotheses relating type preferences to empathy, warmth, and genuineness are based on theory only and are thus proposed less confidently. Confidence levels become progressively lower on the hypotheses that N and F subjects will score higher than S and T ones on certain of the facilitative conditions; that paraprofessionals will score higher than professionals on all the facilitative conditions; and that P subjects will score higher than J ones on certain of the facilitative conditions.

The following is accordingly proposed to test whether experimental group membership or type contributes more to higher functioning on the facilitative conditions. It is hypothesized that type and group variables will rank as follows in contribution to the facilitative conditions:

H_{10a}: Em will correlate in decreasing order with N, F, Paraprofessional, P, and I.

H_{10b}: Wm will correlate in decreasing order with F, Paraprofessional, and P.

H_{10c}: Gn will correlate in decreasing order with Paraprofessional and E.

H_{10d}: Tt1 will correlate in decreasing order with N, F, Paraprofessional, and P.

CHAPTER II

METHOD

Subjects

An objection to many studies of psychotherapist functioning is that they use students, residents, or neophyte practitioners as subjects, thereby limiting generalizability of results and perhaps giving a biased view of the process of therapy as it occurs in practice. The subjects in this project were, however, persons involved in the day-to-day delivery of services on the two levels examined.

The professional group (Group I) was composed of psychiatric social workers (N=8), psychiatric nurses (N=5), psychologists (N=6), and psychiatrists (N=2) working in the decentralized out-patient clinics of the Comprehensive Community Mental Health Center of Denver General Hospital. This group of twenty-one is comprised of established clinicians, functioning daily as psychotherapists. They do intakes, and run individual, couples, family, and group therapy. They consult to various agencies and groups and are involved in educational efforts with both the general public and their own staff. In addition, some members of all disciplines are involved in part-time private practice.

Paraprofessional subjects (Group II) chosen were twenty-one of the Clinical Associates of the Suicide and Crisis Intervention

Service (SCIS) of Gainesville, Florida (McGee, 1974). This group provides a sample typical of centers in operation in university communities. Specifically, there were four undergraduates, three housewives, three graduate students in psychology, two graduate students in counselor education, a professor of pathology, a professor of marketing, a clerk, a teacher, a mortgage broker, a social worker, a sales clerk, a minister, the personnel director of SCIS, an occupational therapist, a laboratory technician, and a tavern owner. This totals more than twenty-one as persons in some occupations were also undergraduates. It can be seen that some of the subjects in this group are professionals in training or professionals in occupations somewhat similar to psychotherapy.

These volunteer telephone therapists receive, after a screening procedure, approximately twenty hours of theoretical and practical training before being placed on a weekly (or more frequent) three-hour duty shift. They also participate in an on-going in-service training program. The telephone calls handled by these paraprofessionals are from persons in all manner of crises. The volunteers establish communication with the caller, obtain necessary identifying information, identify problem areas, formulate action plans, and generally offer understanding, hope, and support. As a large number of mental health paraprofessionals are involved in telephone therapy, this group provides good representation for paraprofessionals currently functioning in the delivery of mental health services.

The two agencies investigated in this study provide excellent examples of settings in which the two classes of therapists currently function. The Denver General Center provides the five services required of a comprehensive center (in- and out-patient therapy, partial hospitalization, twenty-four-hour emergency service, and consultation and education). These efforts are supported by specialty teams in such areas as school-age children's services and court consultation. The Gainesville Florida SCIS, which began operation in 1969, is directed by professionals in the field of community psychology and suicidology. It is well integrated into the community human services network, and includes as an adjunct to the twenty-four-hour telephone service, a twenty-four-hour outreach team which travels to persons in extreme crisis to provide on-the-spot help (McGee, 1974; Richard & McGee, 1973). Volunteers are eligible to serve on the outreach team after a period of experience and demonstrated competence. Subjects were matched as closely as possible on the variable of age, sex, marital status, and race. Data for these parameters are shown in Tables 1 through 4.

Table 1
Subjects' Age by Group

Group	Mean Age	SD	t	p
I	35.14	8.99	1.20	n.s.
II	32.14	7.01		

Note. Two-tailed tests are used in this section as groups were hypothesized to be similar in these variables.

Table 2
Subjects' Sex by Group

Group	M	F	ϕ	χ^2	p
I	9	12	0.00	0.0	n.s.
II	9	12			

No chi square was computed for the race comparison as too few Blacks were included in the sample. This is representative of the situation in practice where Blacks are found in neither professional nor volunteer work in the same proportions as in the general population. Lower educational opportunities and less leisure time probably account for this difference.

Table 3
Subjects' Marital Status by Group

Group	Single	Married	ϕ	χ^2	p
I	8	13	.15	.94	n.s.
II	5	16			

Table 4
Subjects' Race by Group

Group	White	Black
I	20	1
II	21	0

It was not expected that it would be possible to match groups in experience level and this was indeed the case as can be seen on Table 5.

This, however, might be expected in a study of this type, for, whereas professionals have been trained and begun practice in

Table 5
Subjects' Experience by Group

Group	Mean Months	SD	t	p
I	58.57	38.14	3.58	< .001
II	7.14	3.60		

ever-increasing numbers for many decades, programs for recruitment, training, and utilization of paraprofessionals are relatively recent. In addition, paraprofessionals remain active in the field for shorter periods of time than do professionals.

Procedure and Instruments

To measure levels of the facilitative conditions, tape recordings, edited to insure anonymity, were made of subjects in both groups. For the professional group, recordings of adult intake interviews were collected. These were defined as the client's first contact with the neighborhood clinic where the interview was conducted. The definition excluded "reintakes" which were classified by the Center as intakes, but were actually reopenings of previous cases. After being notified that recordings were being made as part of a research program, clients were asked to sign a release of information (Appendix A) which was filed in the case folder.

For the paraprofessional group, recordings were collected of initial telephone calls to the crisis center by adult clients--again, the first contact by the caller with the service. All incoming calls to the crisis lines at the SCIS are recorded by automatic equipment and all initial client calls are collected on master tapes. These tapes comprise the raw data for this and other studies conducted by the Center for Crisis Intervention Research (CCIR) of the University of Florida.

In order to standardize data collection, it was decided to select for rating a uniform phase of therapy in both groups. The first through the fifth minute of the interview at the Denver General Center and of the call to the SCIS were chosen for two reasons. First, this is the phase studied in similar investigations (Knickerbocker, 1972). Second, this is the time when the tone for the relationship is set, when therapist and client form attitudes about each other, and when much overt information exchange often occurs.

Tapes were rated on the Lister component system (1970, a, b, c) by research assistants trained at the CCIR. The three therapist-offered conditions, as conceptualized by Rogers and operationized by Lister, are composed of "essential elements" which are rated on eleven-, six-, four-, or three-point scales. For Empathic

Understanding (Appendix B) there are eight elements such as "accurate perceptual inferences" and "counselor's voice appropriate to the feelings expressed by the client." The two elements of Facilitative Warmth (Appendix C) are "positive regard" and "unconditionality of regard." And the five elements of counselor response in Facilitative Genuineness (Appendix D) include "undefensive openness" and "idiosyncratic style." Points on rating scales of each element are defined so that the rater can recognize the extent to which they are offered by the therapist.

The CCIR trained three-rater teams to rate each of the Lister scales by rating sample criterion training tapes, and then by rating tapes from similar studies until criterion reliabilities of .96 for Em, .83 for Wn, .50 for Gn, and .87 for Ttl were reached. Reliabilities were estimated by Ebel's (1951) formula for intraclass correlations. Once reliable rating had thus been established, one rater was selected from each rating team to rate the tapes generated for this study. The correlations for the individual rater with each of the other two raters of the team were calculated. The mean of these two reliabilities was computed, giving the reliability for each individual rater. The individual reliabilities were .89 for Em, .61 for Wn, .25 for Gn, and .69 for Ttl. The low reliabilities for genuineness are common across studies of this type (Truax, undated). Moreover, while the raters for Em and Wn were graduate students, the rater for Gn

was an undergraduate research assistant. This may mean that professional training enhances ability to make judgments of the Lister Scales. The reliability for G_n in this study is, however, lower than those reported in similar studies (Knickerbocker, 1972, Truax, undated).

Subjects in the professional group were administered the MBTI (Myers, 1962) on completion of the intake interview; paraprofessional subjects were administered the test as part of the SCIS training program.

The MBTI is a self-administering, 166-item, forced-choice, paper-and-pencil inventory. An individual's type is determined by his preference score on each of the four dimensions (extraversion-introversion; sensing-intuition; thinking-feeling; judgment-perception). He will be called "extraverted," for example, if the sum of extraverted choices is greater than the sum of introverted choices, and will be called "introverted" if the sum of introverted choices exceeds the sum of extraverted choices.¹ A person, therefore, is assigned a preference score on each of the four dimensions (e.g., E 11, N 27, F 25, J 5): his scores may then be summarized by a four-letter code as, for example, ENFJ. Thus, sixteen types are formed and each, depending of the interaction of its particular combination of four preferences, shares

¹Actual preference scores are computed by tie-breaking formulas which double the difference between the two scores on a dimension, then either subtract or add one point (Myers, 1962).

some attributes with other types and shows other attributes uniquely its own. In addition to considering a complete type, the qualities which result from combinations of any two (e.g., NF) or three (e.g., EFP) preferences can be analyzed.

Research in the past has presented MBTI data in two ways— first, looking at each type (e.g., ENFJ) separately, and second, looking at each preference separately.

CHAPTER III

RESULTS

As in the majority of studies of this kind, the level for statistical significance was set at $p < .05$. One-tailed tests were used with directional hypotheses.

As the scales selected for measuring the facilitative conditions were of different sizes, their ranges are displayed in Table 6 for comparisons.

Table 6
Ranges of Facilitative Conditions Scales

	Em	Wm	Gn	Ttl
Range	0 - 33	0 - 15	0 - 28	0 - 26.3

Hypothesis One predicted that Group II (paraprofessionals) would provide higher levels of the facilitative conditions than Group I (professionals). In three of the four cases, the Hypothesis was supported.

Specifically, H_{1a} predicted higher ratings for Group II on Em. As shown on Table 7, Group II did surpass Group I in Em, but to a

Table 7
Comparison of Groups on Level of Em

Group	Mean	SD	t	p
I	5.81	6.70	0.2396	n.s.
II	6.38	8.63		

nonsignificant degree. H_{1a} was, therefore, not confirmed.

H_{1b} predicted that Group II would be rated higher than Group I on Wm. Table 8 shows that H_{1b} was supported.

Table 8
Comparison of Groups on Level of Wm

Group	Mean	SD	t	p
I	6.57	2.62	2.9473	<.005
II	8.95	2.62		

H_{1c} predicted that Group II would receive higher ratings on Gn than Group I. Table 9 shows that H_{1c} was confirmed.

Table 9

Comparison of Groups on Level of Gn

Group	Mean	SD	t	p
I	20.14	2.54	3.1698	<.005
II	23.10	3.43		

The final hypothesis to test differences between Groups I and II on the facilitative conditions was H_{1d} , which predicted Group II would receive higher ratings on Tt1 than Group I. Table 10 shows

Table 10

Comparison of Groups on Level of Tt1

Group	Mean	SD	t	p
I	10.84	3.06	1.8930	<.05
II	12.81	3.65		

that this hypothesis also was supported.

Group II was found, in all four ratings, to be showing higher levels of the facilitative conditions than Group I, with three of the four (Wm, Gn, and Tt1) significant beyond the $p < .05$ level.

The remainder of the hypotheses involve MBTI type variables, and the typological make-up of the subjects is therefore presented here. The conventional means for displaying distribution of psychological types in a sample is the "type table." This table is a four-by-four matrix, with introverts in the first two rows, and extroverts on the bottom two, and judging types in the top and bottom rows with perceptives in the inside two rows. The first two columns show sensing types with the intuitives in the last two, and thinking types appear in the outside two columns with feeling types in the two inside columns.

Tables 11, 12, and 13 show the number and percent of subjects in each type in the professional (Group I) and paraprofessional (Group II) samples, and in the total subject sample.

It can be seen, for example, that the great majority of the subjects fall in the N side of the table, and moreover, the NF column alone includes 71.4% of Group I subjects, 81.0% of Group II subjects--76.2% of all subjects. In this way, subjects in the present study followed the trend discovered earlier at the Typology Laboratory and mentioned above. These distributions are discussed more fully below.

Hypotheses Two through Nine pertain to differences between type preferences on the facilitative conditions and to distributions of the type preferences in the two experimental groups and the total sample. In general, no differences were found

Table 11

GROUP I: PROFESSIONAL

N = 21

SENSING TYPES INTUITIVE TYPES
with THINKING with FEELING with FEELING with THINKING

ISTJ N = 0 % = 0.0	ISFJ N = 1 % = 4.8 IIIIII	INFJ N = 3 % = 14.3 IIIIIIIIII IIII	INTJ N = 0 % = 0.0
ISTP N = 0 % = 0.0	ISFP N = 0 % = 0.0	INFP N = 0 % = 0.0	INTP N = 2 % = 9.5 IIIIIIIIII
ESTP N = 0 % = 0.0	ESFP N = 0 % = 0.0	ENFP N = 9 % = 42.9 IIIIIIIIII IIIIIIIIII IIIIIIIIII IIIIIIIIII IIII	ENTP N = 0 % = 0.0
ESTJ N = 1 % = 4.8 IIIIII	ESFJ N = 0 % = 0.0	ENFJ N = 3 % = 14.3 IIIIIIIIII IIII	ENTJ N = 2 % = 9.5 IIIIIIIIII

JUDGING
INTROVERTS
PERCEPTIVE
PERCEPTIVE
EXTRAVERTS
JUDGING

	N	PERCENT
E	15	71.4
I	6	28.6
S	2	9.5
N	19	90.5
T	5	23.8
F	16	76.2
J	10	47.6
P	11	52.4
IJ	4	19.0
IP	2	9.5
EP	9	42.9
EJ	6	28.6
ST	1	4.8
SF	1	4.8
NF	15	71.4
NT	4	19.0
SJ	2	9.5
SP	0	0.0
NP	11	52.4
NJ	8	38.1
TJ	3	14.3
TP	2	9.5
FP	9	42.9
FJ	7	33.3
IN	5	23.8
EN	14	66.7
IS	1	4.8
ES	1	4.8

NOTES: I = 1% of sample

Myers-Briggs Type Indicator

Table 12

Type Table

GROUP II: PARAPROFESSIONAL

N = 21

SENSING TYPES INTUITIVE TYPES
with THINKING with FEELING with FEELING with THINKING

<p>ISTJ</p> <p>N = 1 % = 4.8</p> <p>IIII</p>	<p>ISFJ</p> <p>N = 0 % = 0.0</p>	<p>INFJ</p> <p>N = 1 % = 4.8</p> <p>IIII</p>	<p>INTJ</p> <p>N = 0 % = 0.0</p>
<p>ISTP</p> <p>N = 0 % = 0.0</p>	<p>ISFP</p> <p>N = 0 % = 0.0</p>	<p>INFP</p> <p>N = 5 % = 23.8</p> <p>IIIIIIIIII IIIIIIIIII IIII</p>	<p>INTP</p> <p>N = 1 % = 4.8</p> <p>IIII</p>
<p>ESTP</p> <p>N = 0 % = 0.0</p>	<p>ESFP</p> <p>N = 0 % = 0.0</p>	<p>ENFP</p> <p>N = 9 % = 42.9</p> <p>IIIIIIIIII IIIIIIIIII IIIIIIIIII IIIIIIIIII IIII</p>	<p>ENTP</p> <p>N = 1 % = 4.8</p> <p>IIII</p>
<p>ESTJ</p> <p>N = 0 % = 0.0</p>	<p>ESFJ</p> <p>N = 0 % = 0.0</p>	<p>ENFJ</p> <p>N = 2 % = 9.5</p> <p>IIIIIIIIII</p>	<p>ENTJ</p> <p>N = 1 % = 4.8</p> <p>IIII</p>

JUDGING
INTROVERTS
PERCEPTIVE
PERCEPTIVE
EXTRAVERTS
JUDGING

	N	PERCENT
E	13	61.9
I	8	38.1
S	1	4.8
N	20	95.2
T	4	19.0
F	17	81.0
J	5	23.8
P	16	76.2
IJ	2	9.5
IP	6	28.6
EP	10	47.6
EJ	3	14.3
ST	1	4.8
SF	0	0.0
NF	17	81.0
NT	3	14.3
SJ	1	4.8
SP	0	0.0
NP	16	76.2
NJ	4	19.0
TJ	2	9.5
TP	2	9.5
FP	14	66.7
FJ	3	14.3
IN	7	33.3
EN	13	61.9
IS	1	4.8
ES	0	0.0

NOTES: I = 1% of sample

between preferences on the facilitative conditions, but hypotheses as to the distributions of the preferences through the sample were confirmed.

Hypotheses 2a and 2b predicted that intuitive types would score higher than sensing types on Em and Tt1. As can be seen on Tables 14 and 15, neither hypothesis was supported.

Table 14

Comparison of S & N on Em

Preference	N	Mean	SD	t	p
S	3	6.67	8.33	.1329	n.s.
N	39	6.05	7.70		

Table 15

Comparison of S & N on Tt1

Preference	N	Mean	SD	t	p
S	3	12.00	1.45	.0907	n.s.
N	39	11.81	3.59		

As to distribution of these preferences in the sample, Hypotheses 3a and 3b predicted that intuitives would outnumber sensing subjects in the professional and paraprofessional groups.

Table 16 displays the number and percentage of subjects

Table 16
Distribution of the S & N Preferences

	Group I		Group II		Total	
	S	N	S	N	S	N
N	2	19	1	20	3	39
Percent	9.5%	90.5%	4.8%	95.2%	7.1%	92.9%
Mean Preference Score	51.00	28.78	27.80	27.10	34.66	27.93

showing each preference in both groups and in the total sample, as well as mean preference scores of subjects in each preference. In addition, mean preference scores are presented to show what proportion of the preferences are of subjects on each side of the typological dimension. It can be seen that subjects are overwhelmingly of the intuitive preference, and both hypotheses were therefore upheld.

It had been planned to compute a phi coefficient and chi square to compare and describe the compositions of Groups I and II,

but the fact that there are so few subjects of the S preference would make the test less than strictly valid. In any case, it is evident that the two groups are essentially similar. The two S subjects in Group I scored higher on S than did the lone S subject in Group II. Subjects of the S preference in this study had generally higher S scores than the N scores of the N subjects.

Hypotheses 4a through 4c predicted that feeling subjects would score significantly higher than sensing ones on Em, Wm, and Ttl. Tables 17, 18, and 19 show that these hypotheses were

Table 17
Comparison of T and F on Em

Preference	N	Mean	SD	t	p
T	9	3.89	5.93	.9772	n.s.
F	33	6.70	8.01		

not confirmed. This is in spite of the fact that the mean Em score in the F group was almost twice that of the Em score in the T group.

It was the prediction of Hypotheses 5a and 5b that feeling subjects would outnumber thinking ones in the two groups. Table 20

Table 18
Comparison of T and F on Wm

Preference	N	Mean	SD	t	p
T	9	8.00	3.24	.2793	n.s.
F	33	7.70	2.80		

Table 19
Comparison of T and F on Ttl

Preference	N	Mean	SD	t	p
T	9	11.52	2.28	.2957	n.s.
F	33	11.91	3.76		

shows that Hypotheses 5a and 5b were confirmed.

Once again, subject preferences were found to be as predicted and the hypotheses were therefore confirmed.

Here, the number of T subjects was not quite high enough to compute chi square, but the preferences do seem similarly

Table 20
Distribution of the T and F Preferences

	Group I		Group II		Total	
	S	N	S	N	S	N
N	5	16	4	17	9	33
Percent	23.8%	76.2%	19.0%	81.0%	21.4%	78.6%
Mean Preference Score	24.60	22.12	17.00	23.94	21.22	23.06

distributed between the two groups. The only notable difference in preference score is a tendency for T subjects in Group II to have lower scores than the F subjects in that group.

Perceptives were predicted by Hypotheses 6a through 6c to score higher than judging subjects on Em, Wm and Ttl. Tables 21, 22 and 23 display the comparisons of these two preferences. These hypotheses failed to find support; the perceptive types were not rated higher in facilitative conditions than the judging types.

Hypotheses 7a and 7b predicted that perceptive types would outnumber judging types in both groups. Results are shown in Table 24. Although perceptives barely do outnumber judging subjects in Group I, the hypotheses were confirmed.

Table 21

Comparison of J & P on Em

Preference	N	Mean	SD	t	p
J	15	7.27	9.64	.7367	n.s.
P	27	5.44	6.38		

Table 22

Comparison of J & P on Wm

Preference	N	Mean	SD	t	p
J	15	7.27	2.79	.8355	n.s.
P	27	8.04	2.90		

Table 23

Comparison of J & P on Ttl

Preference	N	Mean	SD	t	p
J	15	11.93	4.18	.1487	n.s.
P	27	11.77	3.10		

Table 24
Distribution of the J & P Preferences

	Group I		Group II		Total	
	J	P	J	P	J	P
N	10	11	5	16	15	27
Percent	47.6%	52.4%	23.8%	76.2%	35.7%	64.3%
Mean Preference Score	23.00	29.90	25.00	24.50	23.66	26.70

There is no significant difference in distribution between the two groups as the phi coefficient is .24 and the chi square is 2.41. Examination of the mean preference scores shows that the preferences for J were about as high as those for P.

The final set of hypotheses to examine individual typological dimensions concerned the introversion-extraversion dimension, and predicted that while introverts would receive higher scores on Em (H_{8a}), extraverts would score higher on Gn (H_{8b}). Tables 25 and 26 show that neither of these hypotheses were upheld. It is therefore found that none of the hypotheses relating typological dimensions to therapeutic functioning were confirmed.

Table 25
Comparison of E & I on Em

Preference	Mean	SD	t	p
E	6.43	7.19	.3959	n.s.
I	5.43	9.71		

Table 26
Comparison of E & I on Gn

Preference	Mean	SD	t	p
E	21.64	3.26	.0717	n.s.
I	21.57	3.61		

Hypotheses 9a and 9b predicted that extraverts would outnumber introverts in both groups. Table 27 demonstrates that these hypotheses were supported. It is therefore found that all hypotheses concerning typological make-up of the sample were confirmed.

The phi coefficient of .10 and the chi square of .42 demonstrate that the distribution of preferences between the two

Table 27
Distribution of the E & I Preferences

	Group I		Group II		Total	
	E	I	E	I	E	I
N	15	6	13	8	28	14
Percent	71.4%	28.6%	61.9%	38.1%	66.7%	33.3%
Mean Preference Score	23.80	10.67	18.84	13.75	21.50	12.42

groups is similar. It can be noted that in both groups and in the total sample the preference for E is more marked than the preference for I.

Hypothesis Ten predicted the order in which type variables and professional-paraprofessional group membership would contribute to the four facilitative conditions. The most consistent finding was a high contribution from paraprofessional group membership.

Hypothesis Ten was tested in two ways. First, Pearson product-moment correlations and their significance levels were calculated for each of the conditions and the variables in question and were rank ordered. Second, stepwise multiple regression analyses were run for each of the four conditions.

It was the prediction of H_{10a} that Em would correlate in decreasing order with N, F, Paraprofessional, P, and I. Table 28

Table 28
Pearson Correlations with Em

	TF	EI	JP	SN	Group
r	.253	-.144	-.065	.047	.038
p	.053	.182	.342	.384	.406

Note. Correlations for type are with continuous scores; therefore positive correlations mean correlations with I, N, F, and P, while negative ones mean correlations with E, S, T, and J. Positive correlations with Group mean correlations with Paraprofessional, and negative with Professional.

shows that the order in which the variables ranked was F, E, J, N, and Paraprofessional. Although none of the correlations reached significance, the relationship between TF and EI was at $p=.053$. Table 29 shows that when contributions of other variables are considered, TF remains as the most related to Em, and is now significant. Also, the relationships for other variables are slightly altered. Most noteworthy is the reversals in position between EI and JP, and between SN and Group. Only one of the F levels was significant in the multiple regression, and the value for SN was too low for that variable to be included in the computation. The hypothesis is rejected; relationships found were far from those predicted.

Table 29
Multiple Regression on Em

Step	Variable Entered	R	R ²	Beta	SE	F
1	TF	.252	.064	.323	7.482	3.458*
2 ^a	JP	.318	.101	-.224	7.424	1.691
3	EI	.336	.113	-.124	7.471	.592
4	Group	.341	.116	.056	7.559	.123

^aStep at which SE decreases to lowest value
*p < .025

Tables 30 and 31 present the results of the tests of H_{10} , which

Table 30
Pearson Correlations with Wm

	Group	EI	JP	SN	TF
r	.422	.217	.159	.104	-.032
p	.003	.084	.158	.256	.422

predicted the order of variables would be F, Paraprofessional, and P. It can be seen that Group was the only variable significantly

Table 31
Multiple Regression on Wm

Step	Variable	R	R ²	Beta	SE	F
1	Group	.422	.178	.387	2.618	6.518*
2 ^a	EI	.444	.197	.146	2.586	.911
3	JP	.460	.211	.122	2.631	.418
4	TF	.474	.224	-.158	2.644	.832
5	SN	.480	.231	.106	2.670	.290

^aStep at which SE decreases to lowest value

*p < .001

related to Wm in both the simple and multiple correlations. In neither analysis was the order found as predicted and the hypothesis is therefore rejected.

The prediction of H_{10c} was that paraprofessional status and E would be related to Gn in that order. It can be seen on Tables 32 and 33 that, whereas Group was, as predicted, first in

Table 32
Pearson Correlations with Gn

	Group	SN	JP	TF	EI
r	.448	-.197	-.044	.032	.028
p	.001	.105	.392	.421	.421

Table 33
Multiple Regression on Gn

Step	Variable	R	R ²	Beta	SE	F
1	Group	.448	.201	.475	3.018	10.435**
2 ^a	SN	.504	.254	-.325	2.953	2.887*
3	EI	.516	.266	-.105	2.968	.497
4	TF	.525	.009	.107	2.988	.410
5	JP	.525	.276	.034	3.028	.034

^aStep at which SD decreases to lowest value

* p < .05

** p < .001

order in both tables, there was a very small contribution from I (a positive correlation with EI) rather than from E and the hypothesis is therefore rejected. The relationship between N at Gn became significant in the multiple correlation. Again, in combination with the other variables, the contribution from Group continued to be significant.

Finally, H_{10d} predicted that N, F, Paraprofessional, and P would be related in that order to Ttl. Tables 34 and 35 display the fact that Group was again most highly correlated with the condition, but in this instance the relationship reached significance only in the multiple regression. However, the variables were ranked quite differently from the prediction and this hypothesis is also not confirmed.

Table 34

Pearson Correlations with Ttl

	Group	TF	EI	JP	SN
r	.287	.187	-.037	-.018	-.000
p	.033	.118	.407	.455	.500

Table 35

Multiple Regression on Ttl

Step	Variable Entered	R	R ²	Beta	SE	F
1	Group	.287	.082	.299	3.369	3.456*
2 ^a	TF	.326	.106	.229	3.367	1.560
3	JP	.353	.125	-.118	3.375	.347
4	EI	.361	.130	-.084	3.410	.270
5	SN	.366	.134	-.079	3.450	.141

^aStep at which SE decreases to lowest value

* $p < .025$

It is therefore found that the relationship between the type variables and the facilitative conditions was generally random. Paraprofessional status, however, was the variable most highly correlated with all facilitative conditions except Em, and was often the only variable to reach significance.

Chapter IV

DISCUSSION

Experimentally, this study was concerned with four issues:

The first was the question of whether professionals or paraprofessionals were more therapeutically effective in an intake situation and was tested by Hypothesis One.

The second issue was whether persons with a preference on one side of the typological dimension were more therapeutically effective than those on the other side and was tested by Hypotheses Two, Four, Six, and Eight.

Third was whether subjects were of the types predicted by theory to be attracted to counseling and was tested by Hypotheses Three, Five, Seven, and Nine.

The final issue was whether the personality variables or professional/paraprofessional group membership contributed more to therapeutic effectiveness, and was tested by Hypothesis Ten.

Our first, and most confidently proposed hypothesis, H_1 , predicted that paraprofessionals would demonstrate significantly higher levels of the facilitative conditions than would professionals. Paraprofessionals in crisis telephone intakes showed higher levels than professionals in face-to-face intakes in facilitative warmth, genuineness, and total conditions, but the

superiority of paraprofessionals on empathic understanding failed to reach significance.

As was noted earlier, some of the paraprofessional group in this study consisted of professionals-in-training and professionals in fields related to psychotherapy or mental health. Some of these subjects were older and males, and were included due to the need to match older, male subjects in the professional sample. It is not uncommon, however, to find such personnel on the staff of a volunteer program, especially in communities with institutions of higher learning. Some may volunteer as a way of broadening their existing skills, some as a way of exploring the field to decide whether or not to enter professional training themselves.

In any case, in their roles as members of a volunteer staff they would be likely to acquire a cognitive and affective set--an orientation toward their clients and their work--which makes their behavior similar to that of their co-volunteers and different from that of the professional in the mental health center. They would therefore function more according to the training and philosophy absorbed at the center than in line with their training or functioning in other capacities. It is considered that it is this difference in set which is tested in this study, rather than a difference between practitioners with full professional training and those with none at all.

Since the professional group conducted face-to-face interviews while the paraprofessionals worked on the telephone, it is a possibility that the present findings are an artifact of this difference. However, as previously mentioned, the preponderance of evidence shows paraprofessionals equal or superior to professionals in therapeutic functioning.

Moreover, while the relative anonymity of a relationship by telephone is in some ways an advantage of telephone work (Williams & Douds, 1973), it would seem that it would be more difficult to offer the facilitative conditions in such a context than in one where client and therapist are together in the room. In the latter situation the therapist would be able to respond not only to the client's voice, but also would be in touch with visual cues and thereby be able to more accurately assess the client's emotional state on a moment-to-moment basis. If there were any effect, therefore, from the different ways in which the two groups engaged their client, it would seem that the paraprofessional group's superiority on three of the four measures was in spite of this effect, rather than attributable to it.

A small sample of a wide variety of people who function as volunteer paraprofessionals in a telephone crisis center has been therefore shown to be superior on most of the facilitative conditions to a sample of professionals from varying disciplines in a mental health center.

The current study therefore follows a well developed trend in the literature (Durlak, 1973) demonstrating in an increasingly convincing fashion the therapeutic effectiveness of paraprofessional personnel. It would now seem that the time is at hand for progressing to a delineation of areas in which these practitioners can best be used, rather than continuing to concentrate on the evaluation of their competence. None of the advocates of the use of paraprofessionals propose that they replace professionals in every aspect of functioning. There will always be such areas as program planning, direction, and evaluation where the need is for professional staff. Rather, the question now is, "in what capacities will we use these persons who have proven their effectiveness in providing therapeutic services to a wide variety of clients?"

Evidence suggests that, to be offering minimally facilitative levels of a condition, a therapist must be functioning at the midpoint of the scale measuring that condition (Truax & Carkhuff, 1967). Given that Em is a 34-point scale (including zero), Wm a 16-point scale, Gn a 29-point scale, and Ttl a 26.3-point scale, inspection of Tables 7 through 10 reveal that Group I was above the midpoint on Gn and slightly below it on Wm and Ttl, while Group II was above the midpoint on Wm and Gn, and at the midpoint on Ttl. Both groups fell far below the midpoint on Em. It seems, therefore, that, except for the dimension of Em, a client could expect to be encountered in at least a minimally facilitative

manner by the paraprofessionals in this study. The effect of the professionals would not be conducive to client growth and might even be considered harmful.

Although the literature generally finds levels of empathy to be slightly lower than levels of the other two conditions (Carkhuff & Berenson, 1967; Truax, undated), the discrepancy between levels of Em and of the other two conditions was far greater in this study than has been previously found.

How then to account for the fact that therapists functioning near the midpoints of most scales are rated as showing such low levels of Em?

The point might be made that it was the nature of the session as intakes which accounts for the difference, since the focus during the first few minutes of the interview might be on understanding of a data-gathering type rather than of an empathic type. That is, the therapist would be more concerned, at the very first, with getting an accurate objective picture of the situation in which the client finds himself, more than with the client's own unique perceptions of and reactions to the situation.

However, other studies have investigated this phase of therapy and found empathy being offered at about the same levels as the other conditions (Knickerbocker, 1972). The fact that the interviews under consideration were intakes does not seem to explain the low levels of empathy demonstrated by subjects in this study.

It would be an easy matter to account for the low levels of Em were the rater reliabilities for this scale low. However, the reliability on Em was not only acceptable, it was the highest of the four reliabilities found in this study. In addition, the rater was trained on standardized tapes, so the probability is not that there was an artificially low level agreed upon among the raters, but rather that the ratings were valid as well as reliable. In this issue, therefore, is not to be found an explanation.

It might also be argued that it was contribution from the professionals-in-training and the professionals in fields related to counseling in the paraprofessional group which brought down the mean score for that group.

Two considerations weigh against this explanation. First and most telling is that an examination of raw scores for these subjects versus the true lay volunteers' shows them to be essentially the same. It therefore seems that, at least in levels of Em offered, the fact of operating in the paraprofessional set and setting mentioned earlier is powerful enough to induce all persons functioning within it to function similarly. The second consideration is the logical one that if the professional-in-training and in related occupations had lowered the mean for Em, it might be expected that the same effect would have been observed for the other facilitative conditions--as it was not.

Another possible explanation to be explored is the fact that, as can be noted in Appendices B through D, should a therapist be given a score of zero on the first element in each of the three rating scales for the facilitative conditions, the rater is to disregard all remaining elements and give zero as the total rating for the sample.

An examination of the raw data shows that, whereas no ratings of zero were made for any subject on either Wm or Gn, there were nine subjects in the professional group and ten of the paraprofessionals to be rated zero on Em. It would seem, therefore, that subjects encounter more difficulty in providing facilitative levels of the first element of Em, "an internal frame of reference," than with the first elements of Wm, "positive regard," or of Gn, "undefensive openness." This finding seems to be particular to the present study, however, for others using these scales have found the levels of Em, although again slightly lower than those of the other scales, to be essentially similar to those found for the other conditions.

Nor did the fact that the professionals were in a face-to-face situation while the paraprofessionals operated over the telephone seem to contribute to the levels of Em found. First, their levels were statistically similarly low; and

second, other studies (Carkhuff & Berenson, 1967; Knickerbocker, 1972) show that Em scores are similar whether rated from phone or in-person contact.

All plausible explanations of the low levels of empathy found in both groups in this study have been found inadequate to satisfactorily account for the phenomenon. At present, therefore, the only remaining recourse is to conclude that, for unknown reasons, the subject population is composed of persons who on the one hand provide levels of warmth, genuineness, and total conditions near the midpoints of the scale, while providing very low levels of empathy. This finding has the advantage of explaining two other inconsistent phenomena in the study.

First of all, it was found that whereas the paraprofessional group was significantly higher than the professional one on Wm, Gn, and Ttl, the difference on Em failed to reach significance. Secondly, whereas paraprofessional group membership was both significantly correlated with higher levels of Wm, Gn, and Ttl and was also the variable entered on the first step of the multiple regression analyses for Em, Gn, and Ttl, the simple correlation between Group (a positive correlation with Group meaning a correlation with paraprofessional states) and Em was among the lowest of the correlations with Em and

Group was entered on the next to the last step of the multiple regression on Em.

Now it seems that both these findings could be accounted for by the fact that the Em scores for both groups were so low. For had the scores been higher for both groups, it is suspected that the difference in scores between the two groups would become significant, thereby bringing the finding for Em in line with that for the three other conditions. Similarly, had the level of Em been higher, there would be a higher simple correlation between Group and Em and Group would weigh more heavily in the multiple regression. It is not believed that the low levels of Em had any bearing on the finding that there was no significant difference between subjects of the different preferences in levels of Em offered. This is because neither was there a difference between any two preferences on any other of the conditions.

In any case, the present finding was of low levels of empathic understanding for both groups with the paraprofessional group scoring nonsignificantly higher. Since no tenable explanation for the finding is evident, it is suggested that a simple replication of this design would be the most fruitful initial direction for further research. The expectation is that such an investigation would indeed discover higher and significantly different levels of Em in the two groups.

As concerns the issue of the relationship between the Jungian }
psychological variables and the Rogerian "process" variables of
therapy, hypothetical inferences were made to the effect that
intuition, feeling, perceiving, and, in varying manners, extra-
version and introversion, would be valuable attributes of the
psychotherapist. It was found, however, that there were no
significant relationships between any of the preferences and
the facilitative conditions.

Not only were no significant relationships found for the
type dimensions, in fact both of the relationships hypothesized
for SN (though with only three S subjects), one of the three
for TF, two of the three for JP, and one of the two for EI pre-
sented nonsignificant trends in the direction opposite to that
predicted.

A low level of confidence was held in the predictions for
EI as there is little suggestion in the literature as to whether
either of these two attitudes might be of more value in the
therapy process. The rejection of these hypotheses is therefore
met with little surprise.

Some confidence was, however, invested in those hypotheses
predicting a relationship between the intuiting, feeling, and
perceiving processes and the facilitative conditions.

Perhaps partially accountable for the failure to find these
variables significantly related to the facilitative conditions.

is the possibility that intuition, feeling, and a perceiving attitude are indeed helpful in therapy, but not in that central part of the process of therapy measured by the facilitative conditions. For, although Rogers (1957) maintains that the facilitative conditions are the necessary and sufficient conditions for positive therapeutic change, later theorists (Carkhuff & Berenson, 1967) state that empathy, warmth, and genuineness are merely among the "core conditions" or "primary factors."

Sometimes included are such factors as concreteness, confrontation, and self-disclosure, accounting for from 20% to 50% of the variance in outcome. Other conditions are said to be required for effective work with difference types of clients, problems, and settings. Some of these "secondary factors" are such phenomena as psychodynamic approaches, behavioristic conditioning procedures, nondirective counseling procedures, and educational and vocational counseling. It may be that intuition, feeling and perception play a more significant role in these secondary factors than in the primary ones measured in this study.

Another possible explanation for the failure of this study to find a relationship between the intuitive, feeling, and perceptive types and the facilitative conditions is that the N, F, and P scales of the MBTI may be measuring something other than exactly the "intuition," "personal warmth," and "accepting non-critical attitude" of the intuiting, feeling, and perceiving

persons mentioned in the literature as attributes of effective psychotherapists. This explanation is not proposed with great assurance, however, for an examination of items of the N, F, and P scales from an "armchair" point of view indicates that the MBTI is measuring those qualities which this study intended to investigate.

Finally, it can be considered that the attributes of sensing, thinking, and judging (opposite to intuition, feeling, and perception respectively are, when appropriately employed, important enough in therapy to outweigh the value of their complements. That is, the realistic, observing qualities of the sensing therapist, the logical analysis of the thinking one, and the judging therapist's organized decisiveness would seem to be of value at various points in the therapeutic process. At this point, it seems that this is the most likely reason that no difference in therapeutic effectiveness was found between the opposite preferences.

It is also possible that the intake process is one point where these more objective qualities are helpful. Whether or not this is the reason for the failure to find differences between preferences on the facilitative conditions could be ascertained by comparing the preferences on the conditions in late phases of therapy. Because the effects in present results are so small and equivocal, however, it is expected that even

in later phases of therapy there would be no significant superiority of the N, F, and P preferences over S, T, and J.

When such an investigation is carried out, it is suggested that equal numbers of subjects of each preference be tested on the facilitative conditions. This is because there may be some effect of strength of preference which interacts with preference itself. With unequal numbers of subjects of each preference it is difficult to separate out this effect.

Some evidence for this is offered by the present study: First, although it was hypothesized that intuitives would surpass sensing subjects, such was not found to be the case. However, sensing scores of the few sensing subjects in the study were much higher than the intuition scores of the intuitives. Second, whereas no significant difference on empathy was found when thinking and feeling subjects were divided into two groups for the t test, when the Pearson correlation was run, strength of preference was taken into account and the significance level was .053. These findings might indicate that sensing, thinking, and judging indeed can be as valuable to the therapist as their complements, but only when present in greater or lesser strength. As some of the hypotheses of the present investigation dealt with the distribution of types among the two groups, a random sample of subjects was obtained. In order to properly investigate the contribution of strength of preference to clinical

functioning, however, it is proposed that future research choose equal numbers of all preferences under investigation. In this way, the quality of therapists not of the predominant N and F preferences, especially, can be examined, perhaps with the result of determining how they employ the property of sensing and thinking to best advantage in the process of therapy.

In any case, it is suggested that further research be undertaken before these variables (especially intuition, the preference of 93% of subjects) be rejected as valuable attributes of the effective therapist.

Lacking contradictory evidence, however, it must be the conclusion of the present investigation that therapists of all eight preferences can function equally well in the intake phase of psychotherapy.

A third set of hypotheses concerned the typological make-up of the two experimental groups.

The first prediction was that intuitives would outnumber sensing subjects and it was very strongly supported. In fact, over 90% of subjects were of the intuitive preference. This is especially remarkable since about 75% of the population is of the sensing preference. Strong support was also found for the prediction that feeling subjects would outnumber thinking ones. Here 79% of subjects were of the predicted preference.

In the general population there are about equal numbers of persons of the T and F preferences. This preference dimension, unlike the other three, varies with sex: males are predominantly of the T preference and females of the F. Subjects here were equally distributed between the sexes, however, and the present finding is not due to a larger number of female subjects.

Although there was no statistical difference in the typological make-ups of the two groups, in the cases of both the SN and TF dimensions, there was a tendency for the paraprofessional group to contain more subjects of the predicted preference than the professional group.

This study therefore replicates surveys mentioned above which also found therapists to be predominantly of the NF preferences. Examination of the type tables shows that 71% of the professionals and 81% of the paraprofessionals are of the NF preferences--76% of the total sample. This is a far higher proportion than would be found in the general population.

The prediction that perceptives would outnumber judging subjects was also confirmed. Here again it was found that, although there was no statistical difference in the distribution of preferences between the two groups, the tendency for subjects in the paraprofessional group to be of the predicted preference was more marked than in the professional group.

Finally, it was predicted since neither extraverts nor introverts would be predicted by theory to be more inclined to choose to work as therapists and counselors, and since extraverts outnumber introverts in the general population by about three to one, that extraverts would also outnumber introverts in the present study. The prediction was confirmed, and here again there was no statistical difference in distribution of the two preferences between experimental groups.

Not only were E, N, F, and P the most popular preferences, but also it can be seen from the type tables that in both the professional and paraprofessional groups the most frequent type was ENFP, with 43% of subjects in each group showing that type. It was found that strength of preference was about equal for the TF and JP dimensions; that is, preference scores for T were about as high as those for F and similarly for J and P. The scores themselves were within the range of the norms presented by Myers (1962), except for those of the perceptives in the paraprofessional group who had a higher mean P score than any of the groups presented by Myers.

The extraverted group was within the range of norms but the introverts had a lower mean I score than any of the Myers groups. The introverts attracted to counseling activities therefore report a much smaller preference for introversion than the extraverts report for extraversion. Further research with

larger numbers of subjects is indicated here, but it is possible that those who are "too much" into the internal world are either not interested enough or adept enough to enter and stay in the counseling situation.

The mean preference scores for N are within the range presented by Myers, while the mean score for S is much above any of the norms. This is especially true of the professional group where one of the subjects showed the highest preference score in the study. Although again more investigation of higher numbers is needed (there were only three S subjects). In this case it might be that, whereas intuition is usually the "preference of choice" on the SN dimension, if the preference for S is more extreme, a person may function equally as well.

It is therefore found that, although subjects were, in line with predictions, predominantly of the N, F, and P preferences, those relatively few S, T, and J subjects seem to have learned to use the positive qualities of their preferences in a way which enables them to be as effective therapeutically as their more numerous N, F, and P colleagues.

Part of the process of psychological growth, according to Jung and Myers, is to learn first to utilize effectively the advantages and to control possible drawback of one's own type. Later, the fully functioning person will recognize and cultivate the assets of the complementary preferences. Since it has been

shown here that (at least certain) persons of all type preferences function similarly in the intake phase of therapy, it follows that attributes of all the type preferences may be valuable to the therapist. Psychotherapists should therefore be no less involved than others in this project of learning about and effectively utilizing all aspects of psychological type.

It seems then that whether or not intuition, feeling, and perception are desirable attributes of the therapist, they are indeed found in the majority of therapists. Since they differ in type from the general population—whose members tend to be of the ESF type for women and EST type for men—therapists might well be alerted and sensitive to possible differences in type between them and their clients and the possible effects of these differences.

The preceding statement is made because different clients may respond differently to therapists of different psychological types: many types of therapists may be needed, rather than a few types being optimally effective with all those seeking help. In this matter, there is some research with Jungian variables which is relevant.

Investigations by Mendelsohn (1966) and Mendelsohn and Geller (1963, 1965, 1967) show that counseling is short when therapist-client similarity on MBTI dimensions is low, but of variable length when similarity is high. Moreover, those

clients who are similar to their therapists are more likely to fail an appointment early in therapy, but, should they then return, duration is highly likely to be longer. It might be of some benefit, therefore, to match therapists and clients on type and/or alert one or both of the possibility and implications of an appointment failure early in treatment.

In general, however, studies relating therapist-client similarity and length of treatment to outcome have been inconclusive (Meltzoff & Kornreich, 1970) and consequently any manipulation of typological variables in therapy itself or in selection or training of therapists should be considered experimental.

The final issue was whether experimental group membership or psychological type was more related to high functioning on the facilitative conditions. The most consistent finding here was that the largest contribution was from Group (paraprofessional group membership)--this was the case with three of the four conditions in both single and multiple correlations. The relationships between type variables and the conditions were never significant in the Pearson correlation, although F narrowly failed to be significantly related to Em. In the multiple regression analysis, a significant relationship was found between N and Gn. In general, relationships between the various preferences were inconsistent, and never according to prediction. These results corroborate the findings from t

tests reported above where paraprofessional group membership was significantly related to higher functioning on Wm, Gn, and Ttl, whereas type variables failed to reach significance in any of the ten cases tested.

It seems, therefore, that generally speaking, paraprofessional status is significantly more related to high functioning in the intake phase of psychotherapy than is psychological type. The higher functioning of the paraprofessional group seems to constitute a sufficiently powerful effect to override contributions from type to higher functioning. It is obvious, again, that the high functioning of persons operating in a paraprofessional setting is a factor demanding close attention in planning and implementing programs of therapeutic intervention.

As noted earlier, a significant difference was found between groups on experience levels, though they were equally matched on a variety of other variables. It was also mentioned, however, that this is a reflection of the situation as it exists in actual practice since professionals in general have, at this point in time, been in the field longer than paraprofessionals. More exacting research may be conducted in the future when a sufficient number of experienced paraprofessionals are available, but such comparisons are currently impossible to carry out, considering the relatively short time most paraprofessional programs have been in operation.

Recent comprehensive reviews (Luborsky et al., 1971; Meltzoff & Kornreich, 1970) did find that experience was related to outcome of therapy. But, contrary to the present results, these reviewers found experience positively correlated with therapist functioning. The studies reviewed by these authors, however, used as subjects professional practitioners and professional trainees. And, as discussed in the Introduction and reconfirmed in this study, the preponderance of evidence shows paraprofessionals superior in therapeutic functioning to professionals. It seems, therefore, that higher levels of experience are related to higher levels of functioning in professional therapists, but that there is something in the nature of paraprofessional-professional group membership to nullify and/or reverse the usual tendency of experience to increase effectiveness. This is not to say that the newest paraprofessionals are the most therapeutically effective nor that the professionals in the field longest are the least. Rather, the significant difference in experience levels is seen as merely a function of the comparatively recent emergence of the role of the paraprofessional and the shorter time paraprofessionals remain active in the field.

A final consideration is the fact that a low rater reliability was obtained for the Gn scale. Most findings for the

scale in this study are consistent with those for the Wm and Ttl scales and in those from similar studies and this would seem to lend some support to the scale's reliability. However, conclusions currently drawn relating to the scale should be regarded as tentative pending confirmation from further investigation in the area.

REFERENCES

- Berenson, B. B. & Carkhuff, R. R. (Eds.) Sources of gain in counseling and psychotherapy. New York: Holt, Rinehart & Winston, 1967.
- Berne, E. Principles of group treatment. New York: Grove, 1966.
- Biggerstaff, M. A., Bigelow, D. A., & Lin, S. An empirical study of the role of the paraprofessional in a community mental health center. Unpublished manuscript, Mental Health Systems Evaluation Project, Denver General Hospital Mental Health Center, undated.
- Boylin, E. R. The companion program: Students as helpers. Psychotherapy: Theory, Research and Practice, 1973, 10, 242-244.
- Bugental, J. F. T. The search for authenticity. New York: Holt, Rinehart & Winston, 1965.
- Carkhuff, R. R. Differential functioning of lay and professional helpers. Journal of Counseling Psychology, 1968, 15, 115-126.
- Carkhuff, R. R. & Berenson, B. G. Beyond counseling and therapy. New York: Holt, Rinehart & Winston, 1967.
- Collins, J. A. The paraprofessional: I. Manpower issues in the mental health field. Hospital and Community Psychiatry, 1971, 22, 362-367.
- Durlak, J. A. Myths concerning the nonprofessional therapist. Professional Psychology, 1973, 4, 300-304.
- Ebel, R. L. Estimation of the reliability of raters. Psychometrika, 1951, 17, 407-424.
- Ewalt, P. C. (ed.) Mental health volunteers. Springfield: Charles C Thomas, 1967.
- Fowler, D. E. & McGee, R. K. Assessing the performance of telephone crisis workers: The development of a technical effectiveness scale. In: D. Lester & G. Brockopp (Eds.), Crisis intervention and counseling by telephone. Springfield, Ill.: Charles C Thomas, 1973.

- Golann, S., Breiter, D., & Magoon, T. M. A filmed interview applied to the evaluation of mental health counselors. Psychotherapy, 1966, 3, 21-24.
- Gray, H. & Wheelwright, J. B. Jung's psychological types, including the four functions. Journal of General Psychology, 1945, 33, 265-284.
- Gray H. & Wheelwright, J. B. Jung's psychological types, their frequency and occurrence. Journal of General Psychology, 1946, 34, 3-17.
- Grosser, C., Henry, W. E., & Kelly, J. B. (Eds.) Nonprofessionals in the human services. San Francisco: Jossey-Bass, 1969.
- Guernsey, B. B. (Ed.) Psychotherapeutic agents: New roles for nonprofessionals, parents and teachers. New York: Holt, Rinehart & Winston, 1969.
- Heilig, S. M., Farberow, N. L., Litman, R. E., & Shneidman, E. S. The role of nonprofessional volunteers in a suicide prevention center. Community Mental Health Journal, 1968, 4, 287-295.
- Holzberg, J. D. The companion program: Implementing the manpower recommendation of the Joint Commission on Mental Illness and Health. American Psychologist, 1963, 18, 224-226.
- Holzberg, J. D. College students as companions to the mentally ill. In: E. L. Cowen, E. A. Gardner, & M. Zax (Eds.), Emergent approaches to mental health problems. New York: Appleton-Century-Crofts, 1967.
- Holzberg, J. D., & Gewirtz, H. A method of altering attitudes toward mental illness. Psychiatric Quarterly Supplement, 1963, 37, 56-61.
- Joint Commission on Mental Illness and Health. Action for mental health: Final report of the joint commission on mental illness and health. New York: Wiley, 1961.
- Jung, C. G. Psychological types. London: Rutledge & Kegan Paul, 1923.
- Jung, C. G. On the nature of dreams, Collected works. Vol. 8. The structure and dynamics of the psyche. Princeton: Princeton University Press, 1972.
- Knickerbocker, D. A. Lay volunteer and professional trainee therapeutic functioning and outcomes in suicide and crisis intervention service. Doctoral dissertation, University of Florida, 1972.

- Knickerbocker, D. A., & McGee, R. K. Clinical effectiveness of non-professional and professional telephone workers in a crisis intervention center. In: D. Lester and G. Brockopp (Eds.), Crisis intervention and counseling by telephone. Springfield, Ill.: Charles C Thomas, 1973.
- Lister, J. L. A scale for the measurement of empathic understanding. Unpublished manuscript, University of Florida, 1970. (a)
- Lister, J. L. A scale for the measurement of facilitative genuineness. Unpublished manuscript, University of Florida, 1970. (b)
- Lister, J. L. A scale for the measurement of facilitative warmth. Unpublished manuscript, University of Florida, 1970. (c)
- Luborsky, L., Auerback, A. H., Chandler, M., Cohen, H., & Bachrach, J. M. Factors influencing the outcome of psychotherapy: A review of quantitative research. Psychological Bulletin. 1971, 75, 145-185.
- Magoon, T. M., & Golann, S. C. Nontraditionally trained women as mental health counselors/psychotherapists. Personnel and Guidance Journal, 1966, 44, 788-793.
- McCaulley, M. H. A study and demonstration of the training and utilization of psychological assistants in different clinical settings. Final report of Contract No. PH 108-66-209. Gainesville, Florida: University of Florida, 1969.
- McGee, R. K. Crisis intervention in the community. Baltimore: University Park Press, 1974.
- McGee, R. K., & Jennings, B. Ascending to "lower levels": The case for nonprofessional crisis workers. In: D. Lester & G. Brockopp (Eds.), Crisis intervention and counseling by telephone. Springfield, Ill.: Charles C Thomas, 1973.
- McGee, R. K., Knickerbocker, D. A., Fowler, D. E., Jennings, B., Ansel, E. L., Zelenka, M. H. & Marcus, S. Evaluation of crisis intervention programs and personnel: A summary and critique. Life-Threatening Behavior, 1972, 2, 168-182.
- Meltzoff, J., & Kornreich, M. Research in psychotherapy. New York: Atherton, 1970.
- Mendelsohn, G. A. Effects of client personality and client-counselor similarity on the duration of counseling: A replication and extension. Journal of Counseling Psychology, 1966, 13, 228-234.

- Mendelsohn, G. A., & Geller, M. H. Effects of counselor-client similarity on the outcome of counseling. Journal of Counseling Psychology, 1963, 10, 71-77.
- Mendelsohn, G. A., & Geller, M. H. Structure of client attitudes toward counseling and their relation to client-counselor similarity. Journal of Consulting Psychology, 1965, 29, 63-72.
- Mendelsohn, G. A., & Geller, M. H. Similarity, missed sessions, and early termination. Journal of Counseling Psychology, 1967, 14, 210-215.
- Myers, I. B. The Myers-Briggs Type Indicator. Princeton: Educational Testing Service, 1962.
- Reich, W. Character-analysis. New York: Farrar, Straus & Giroux, 1949.
- Richard, W. G., & McGee, R. K. Care team: An answer to need for suicide prevention center outreach program. In: D. Lester & G. Brockopp (Eds.), Crisis intervention and counseling by telephone. Springfield, Ill.: Charles C Thomas, 1973.
- Rioch, M. L. Changing concepts in the training of therapists. Journal of Consulting Psychology, 1967, 30, 290-292.
- Rioch, M. L., Elkes, C., Flint, A. A., Usdansky, B. S., Newman, R. G., & Silber, E. National Institute of Mental Health pilot study in training mental health counselors. American Journal of Orthopsychiatry, 1963, 33, 678-689.
- Rogers, C. R. The necessary and sufficient conditions of therapeutic personality change. Journal of Consulting Psychology, 1957, 21, 95-103.
- Sobey, R. The nonprofessional revolution in mental health. New York: Columbia University Press, 1970.
- Truax, C. B. Toward a tentative measure of the central therapeutic ingredients. ARR&TC #190, Arkansas Rehabilitation Research and Training Center and University of Arkansas, undated.
- Truax, C. B., & Carkhuff, R. R. Toward effective counseling and psychotherapy: Training and practice. Chicago: Aldine, 1967.
- Williams, T. & Douds, J. The unique contribution of telephone therapy. In: D. Lester & G. Brockopp (Eds.), Crisis intervention and counseling by telephone. Springfield, Ill.: Charles C Thomas, 1973.

APPENDIX A

Release of Information

I hereby grant permission for release to the Center of Crisis Intervention Research of the University of Florida at Gainesville, Florida, of the recording of my intake interview on _____.

I understand the recording will be studied and returned by the Center with no permanent record of it being made and without release of any information contained in it to any persons outside the Center.

Signature

Date

APPENDIX B

A Scale for the Measurement of Empathic Understanding

James L. Lister

Definition

The counselor accurately communicates his perceptions of the client's own unique view of the world. The counselor takes an internal frame of reference and through perceptual inference assists the client to conceptualize more sharply the feelings or personal meanings which are unclearly defined.

Essential Elements of Counselor Response

1. An internal frame of reference. The counselor attempts to understand the world as it is perceived or experienced by the client. His responses clearly communicate "This is what I am able to understand about how things seem to you."
2. Perceptual inference. The counselor senses the feelings or meanings which are unclearly communicated by the client or of which the client himself is only dimly aware. The counselor engages in a process of trial-and-error approximation, through his own words, of the understandings, feelings, or meanings which are implicit in the client's statements or in the manner in which he speaks. The counselor definitely goes beyond the literal, surface statements of the client in his efforts to articulate the more personal meanings which the client is implying are present.
3. Accurate perceptual inferences. The counselor's inferences of the client's feelings and personal meanings are highly accurate as evidenced by their effectiveness in aiding the client to state his feelings more clearly and to engage more deeply in the exploration of personal meanings.
4. Immediacy. The counselor responds to the client's feelings in such a way that it is clear that they are the feelings that are immediately present. While the client may be talking about his past or future, the only perceptions accessible to the counselor are those which the client expresses in the moment.

5. Emphasis on personal perceptions. The counselor responds selectively to those implied feelings which are most intimately related to the "self" of the client. Thus, the counselor chooses to respond to those elements of the client's communication which are most idiosyncratic, most essential to this psychological integrity, and which are most difficult for the client to admit to clear awareness.

6. Counselor's use of "fresh words" in stating his inference about the client's inner world. The counselor responds in words which are different from those used at the moment by the client, but they are not inappropriate for the client. Thus, the words and phrases voiced by the counselor are in essentially the same vein as those of the client and are the words he himself might use if he were at the moment able to state what is unclear, implicit, or "next."

7. Counselor's voice appropriate to the feelings expressed by the client. The counselor's manner, in particular his voice, is consistent with the client's feelings and perceptions. In this manner the counselor conveys that he grasps deeply the meanings of the client and that he appreciates and respects the other person who is attempting to share a portion of this world with him.

8. The counselor's "pointing" toward continued and more personal exploration of feelings and perceptions. The counselor conveys to the client his conviction that the essence of the counseling or psychotherapy process is the further expression and conceptualization of vaguely felt, personal meanings. In pointing toward more personal, idiosyncratic perceptions, the counselor communicates as well his willingness to be with the client in this process and to assist him in grasping and experiencing elusive perceptions and feelings.

Using the Scale

This preliminary version of the scale for measuring empathic understanding is designed primarily for use with recorded samples of counselor-client interaction, either individual or group. While this scale, like its predecessors developed by Truax and Carkhuff, can probably be used reliably with written protocols of counseling interaction or with written counselor responses to simulated client statements, many of the subtle nuances present in audio and/or video recordings may well be lost, most notably the components which are evidenced through counselor voice qualities.

The foregoing elements of empathic understanding are to be scored separately based on the system below. The weighting system is designed to reflect the relative importance of each of the components in comprising the more-or-less unitary construct, empathic

understanding. Thus, it is essential that the counselor take the internal frame of reference in order to provide the additional components. The scoring weights follow:

<u>Elements of Empathic Understanding</u>	<u>Maximum Score Value</u>
1. Internal frame of reference	5 points
2. Use of perceptual inference	5 points
3. Accurate perceptual inferences	5 points
4. Immediacy	5 points
5. Emphasis on personal perceptions	5 points
6. Use of "fresh words"	3 points
7. Appropriate voice	3 points
8. Pointing	<u>2 points</u>
	33 points

By answering each of the following questions about a sample of counselor-client interaction, a score is obtained for each of the eight components and a total score representing the sum of the component scores.

1. Internal frame of reference. To what extent does the counselor try to perceive the world as it appears to a client?

- a. To a great extent. The counselor actively tries to grasp the client's perception of persons, things, and events. Exclusive use of internal frame of reference (more than two-thirds of all counselor responses). 5 points
- b. Frequent use of internal frame of reference (one-third to two-thirds of counselor responses). 3-4 points
- c. Occasional use of internal frame of reference (less than one-third of counselor responses). 1-2 points
- d. The counselor avoids reference to the client's perceptions or feelings. The counselor's response to the client's expressions are in terms of how things are, what the counselor thinks or feels, or about how others think and feel. 0 points

SCORING NOTES:

1. This element is to be scored only on the frequency of the counselor's efforts to assume an internal frame of reference in responding to the client. His effectiveness in achieving an internal frame of reference should be reflected in scores assigned to the remaining seven elements.

2. If this element is scored 0, disregard all remaining elements and give 0 as the total rating for the sample.

2. Use of perceptual inference. To what extent does the counselor engage in a process of inferences to arrive at meanings and perceptions which are not sharply differentiated in the awareness of the client.

- a. There is ample evidence of the counselor's efforts to infer the deeper, more personal significance of the client's statements. 3-5 points
- b. There is slight to moderate evidence of the counselor's use of inference. 1-2 points
- c. The counselor does not attempt to infer client feelings or meanings beyond those explicitly stated by the client. 0 points

SCORING NOTE:

If this element is scored 0, score the following element, "accurate perceptual inferences," 0 also.

3. Accurate perceptual inference. The counselor's efforts to infer and state the feelings and meanings implicit in the client's statements are accurate to a high degree.

- a. Yes. The counselor's high level of accuracy is evidenced by the client's "picking-up-and-going-farther" responses to the counselor's inferential statements. 3-5 points
- b. The accuracy of the counselor's inferences are negligible, but do not disrupt the client's self-exploration. 1-2 points
- c. There are serious inaccuracies in the counselor's inferential statements, as

evidenced by their disruption of the client's exploration of feelings and meanings.

0 points

4. Immediacy. Does the counselor respond to the client's feelings in such a way that he highlights their immediacy?

a. Yes. There is ample evidence that the counselor's focus is on the immediate now of feelings or perceptions, even when the client is speaking about events in the past or future. The counselor makes explicit references to immediacy, such as, "as you remember now what he said to you, you're starting to feel..."

3-5 points

b. There is slight to moderate evidence of the counselor's emphasis on immediacy of feelings.

1-2 points

c. The counselor makes no effort to put feelings on an immediate basis when he has an opportunity. He may tend instead to respond to feelings, but use a verb tense other than present.

0 points

5. Emphasis on personal perceptions. Does the counselor select for explorations those implied feelings which are most central to the "self" of the client or those which appear to be most imbued with personal significance for the client?

a. Yes. There is evidence of the counselor's selection of perceptions which are highly relevant to the self of the client, and the counselor responds to them in terms which affirm that they are the unique feelings of that individual at that point in time, that no other person feels or has felt just quite the same.

3-5 points

b. There is slight to moderate evidence that the counselor selects the more personal feelings or perceptions.

1-2 points

c. The counselor responds indiscriminately to client verbalization or selects those least personal.

0 points

6. Use of "fresh words." Does the counselor choose fresh words in stating those client feelings and meanings which he is attempting to help the client to conceptualize?

a. There is clear evidence of counselor's effort to use new words which are very possibly the words the client himself would choose if he were able to express the feelings which the counselor assists him in putting into words.

2-3 points

b. There is slight evidence of the counselor's effort to use fresh words in formulating his statements.

1 point

c. The counselor uses the client's own words, restating without adding meaning, mirroring, echoing, or "parroting" the client's statements in a mechanical fashion.

0 points

7. Appropriate voice. Is the counselor's voice appropriate to the feelings being expressed by the client?

a. Yes. There is a discernible quality in the counselor's voice which conveys a recognition of the personal nature of the client's perceptions, and, while the counselor remains a separate person, his voice communicates a close attentiveness with marked appreciation of those aspects of the client's world he is privileged to share.

2-3 points

b. There is no marked inconsistency between counselor's voice and the feelings expressed by the client.

1 point

c. There is marked discrepancy between counselor's voice and the expression of the client.

0 points

8. Pointing. The counselor communicates that he and the client are moving toward a deeper and fuller exploration of feelings, meanings, and perceptions.

a. To a significant degree. There is clear evidence that the counselor communicates to the client that the clarification and exploration of

meaning is the stock in trade of counseling and that more of this is to come.

1-2 points

- b. No. The counselor allows the impression to be formed by the client that exploration of feelings may be occasional, may occur only at certain stages of counseling, or even that they are accidental.

0 points

APPENDIX C

A Scale for the Measurement of Facilitative Warmth

James L. Lister

Definition

The counselor communicates that he prizes the client as a likeable, worthwhile human being. The counselor's "warmth" is expressed without reservation or condition, i.e., it is free or "unearned" by the client, and is expressed independent of the client's progress, growth, good behavior or attitudes. In short, the counselor communicates implicitly or explicitly "I like you--period!"

Essential Elements of Counselor Response

1. Positive regard. The counselor experiences and communicates a deep, personal liking for the client. He lets him know that he, the counselor, finds the client to be a worthwhile, likeable person. The counselor's positive regard is expressed in such a manner that it is understood that the counselor finds this other person likeable and worthwhile, in contrast to the communication of a more abstract, impersonal respect for all clients or for all of mankind.

2. Unconditionality of regard. The counselor's expressions of regard for the client are in no way abridged by the client's feelings toward the counselor. In short, there is nothing whatsoever that the client must do or be in order to merit the counselor's positive regard.

Using the Scale

This preliminary version of the scale for measuring facilitative warmth is designed primarily for use with recorded samples of counselor-client interaction, either individual or group. While this scale, like its predecessors developed by Truax and Carkhuff, can possibly be used reliably with written protocols of counseling interaction or with written counselor responses to simulated client statements, many of the subtle nuances present in audio and/or video recordings may well be lost, most notably the components which are evidenced through counselor voice qualities.

The foregoing elements of facilitative warmth are to be scored separately according to the following guidelines. The weighting system is constructed so that the element of positive regard is given the highest value. Unless there is some evidence, however slight, of the counselor's positive regard for the client, the entire scale is scored zero without further consideration. The scoring weights follow:

<u>Elements of Facilitative Warmth</u>	<u>Maximum Score Value</u>
1. Positive regard	10 points
2. Unconditionality of regard	<u>5 points</u> 15 points

By answering each of the following questions about a sample of counselor-client interaction, a score is obtained for each of the eight components and a total score representing the sum of the component scores.

1. Positive regard. To what extent does the counselor communicate that he really likes, enjoys, appreciates, or values this person who he is attempting to aid?

- a. To a very great extent. The counselor makes it clear that he likes this client a great deal. The counselor's warmth is expressed in such a way that it is unmistakably expressed toward the client to construe the counselor as a warm person, generally; rather the client experiences the counselor's warmth elicited by him.

9-10 points

- b. The counselor communicates a high degree of positive regard for the client; however, the counselor's warmth is expressed more as his personal characteristic than as his response to the client. In short, the client could feel, "He's like this with everyone he talks with."

6-8 points

- c. There is moderate positive regard expressed by the counselor. While there is implicit or explicit evidence that the counselor does regard the client in a positive manner,

this level is distinguished from the previous one in terms of (1) level of regard and (2) impersonality of regard. Thus, the level of regard expressed is approximately equivalent to that expressed in business or polite social interactions, and the regard is clearly more toward "clients" than toward the individual with whom the counselor is talking.

3-5 points

- d. The counselor is indifferent to the client in terms of positive regard. There is no evidence of liking or disliking the client, either as a person or as a class of persons. In summary, the counselor either does not experience or successfully masks all positive or negative feelings toward the client.
- e. There is clear evidence of the counselor's negative regard or dislike for the client.

1-2 points

0 points

Scoring Note: If this element is scored 0, disregard the second element, unconditionality of regard.

2. Unconditionality of regard. To what extent is the counselor's warmth toward the client unqualified or unconditioned?

- a. To a very great extent. It is clearly evident that the counselor's warmth toward the client is unreserved, with "no strings attached." There is no implicit or explicit evidence of the counselor's effort to control or influence the client's behavior or attitudes; suggestions or alternatives, when presented, are genuine options for the client.
- b. There is evidence of possessiveness or conditionality of the counselor's warmth in that the counselor subtly indicates that the client should think, feel, or act in some particular way in order to be valued by the counselor. This level

4-5 points

is distinguished from the previous one by the counselor's failure to communicate clearly that he is in no way evaluative toward the client.

2-3 points

- c. There is much evidence of conditionality of the counselor's warmth. The counselor indicates that insofar as major aspects of the client's feelings and behavior are concerned, the counselor's warmth toward the client is dependent upon the client's thinking, feeling, or acting in "correct" ways.

1 point

- d. Any counselor warmth expressed toward the client is conditional. There is no evidence that there are any areas of the client's thoughts, feelings, or actions which are not subject to evaluative scrutiny by the counselor.

0 points

APPENDIX D

A Scale for the Measurement of Facilitative Genuineness

James L. Lister

Definition

The counselor is genuine, authentic, and personally non-defensive in his relationship with the client. He speaks openly rather than defensively, spontaneously rather than cautiously or deliberately. The counselor relates as himself rather than as the embodiment of a professional role stereotype.

Essential Elements of Counselor Response

1. Undefensive openness. The counselor is fully receptive to the communication of the client and exhibits no evidence of threat or discomfort in his relationship with the client.

2. Spontaneity. The counselor unhesitatingly responds to the client without censoring or editing his communication. The counselor's responses grow out of the immediacy of the relationship.

3. Honesty. The counselor's statements to the client are true. That is, the counselor communicates his honest, personal perceptions. The client is not "put on," and the counselor makes no effort to be obscure about the nature of his efforts to help the client; rather, he makes an open effort to "let the client in on" his hypotheses and procedures.

4. Relaxed voice. The counselor's voice is not strained or "false." There is high congruence between the counselor's voice and the content of his communication.

5. Idiosyncratic style. The counselor's "style" of interaction, while perhaps identifiable as belonging to a particular "school" or orientation, is indelibly stamped with the counselor's own personality. Thus, the counselor speaks in a way that is his rather than as if the responses came from a textbook.

Using the Scale

This preliminary version of the scale for measuring facilitative genuineness is designed primarily for use with recorded samples of counselor-client interaction, either individual or group. While

this scale, like its predecessors developed by Truax and Carkhuff, can possibly be used reliably with written protocols of counseling interaction or with written counselor responses to simulated client statements, many of the subtle nuances present in audio and/or video recordings may well be lost, most notably the components which are evidenced through counselor voice qualities.

The foregoing elements of facilitative genuineness are to be scored separately based on the system outlined below. The weighting system is designed to reflect the relative importance of each of the components in comprising the more-or-less unitary construct, facilitative genuineness. The scoring weights follow:

<u>Elements of Facilitative Genuineness</u>	<u>Maximum Score Value</u>
1. Undefensive Openness	10 points
2. Spontaneity	5 points
3. Honesty	5 points
4. Relaxed Voice	5 points
5. Idiosyncratic Style	<u>3 points</u>
	28 points

By answering each of the following questions about a sample of counselor-client interaction, a score is obtained for each of the five components and a total score representing the sum of the component scores.

1. Undefensive openness. To what extent is the counselor open and undefensive in his relationship with the client?

- a. To a great extent. The counselor's psychological security and comfort in the relationship are independent of the client's communications. The counselor has no need to be "on guard," careful, or protective of himself or of his professional role or status. 10 points
- b. There is some evidence that the counselor, while generally open and receptive to the client, is insecure and defensive in certain respects. 7-9 points
- c. The counselor's openness or undefensive receptivity is narrowly restricted to certain aspects of the client's communication. 4-6 points

- d. The counselor is defensive and insecure in the relationship but makes no explicit effort to deny his discomfort. 1-3 points
- e. The counselor gives explicit evidence of insecurity in the relationship but attempts to hide his discomfort from the client. He "protests" too much. 0 points

Scoring Note: If this element is scored 0, disregard all remaining elements and give 0 as the total rating for the sample.

2. Spontaneity. To what extent does the counselor respond spontaneously in the relationship?

- a. There is ample evidence that the counselor's responses are immediate and uncensored. While the counselor may at times hesitate in responding to the client, he does so because he knows what he wants to say but is groping for the best way to phrase it. 4-5 points
- b. The counselor's spontaneity is limited to certain aspects of the relationship, usually tangential, superficial areas. Also, the counselor may exhibit no spontaneity and make no effort to do so. 1-3 points
- c. The counselor not only lacks spontaneity, but attempts to fake it. 0 points

3. Honesty. To what extent does the counselor honestly communicate his personal, subjective perceptions?

- a. There is ample evidence that the counselor's responses are an expression of his deep personal conviction. In short, the counselor believes everything he says to the client. 4-5 points
- b. There is some evidence that, while generally honest, the counselor "hedges" a bit, particularly in those areas where he feels his honest perceptions would hurt the client or impair the relationship. 1-3 points

- c. There is explicit evidence that the counselor makes numerous statements which contradict his perceptions. The counselor may be telling the client what he thinks the client expects of him; he may attempt to camouflage the real purpose of his questions; or he may assume a role which he feels necessary to elicit certain feelings from the client.

0 points

4. Relaxed voice. To what extent does the counselor's voice indicate freedom from discomfort in the relationship and a consistency between what the counselor perceives and what he says?

- a. To a great extent. The counselor's voice appears uniformly consistent with his feelings and perceptions.
- b. There is evidence of some inconsistency between the counselor's voice and feelings, but the counselor appears generally congruent in most of his verbalization.
- c. The counselor's voice is unmistakably incongruent with his inner experience. Tension or discomfort is present to a marked degree.

4-5 points

1-3 points

0 points

5. Idiosyncratic style. To what extent is the counselor's verbal response style of interaction free from stereotyped, formal, or "textbook" phrases?

- a. Completely. The counselor's style is unmistakably personal. The counselor's theory or techniques, which may be identifiable, are essentially independent of the counselor's verbal style. The counselor's words and phrases are uniquely his own.
- b. While the counselor's style is to some extent formal or stereotyped, the counselor's personal style is present to a significant degree.

3 points

1-2 points

- c. There is no evidence of the person of the counselor. His style is a studied replica of the "expert." His style, while generally appropriate, clearly does not fit him.

0 points

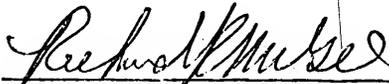
BIOGRAPHICAL SKETCH

Michael David Galvin was born October 21, 1941, in Columbia, Missouri. In 1959, he graduated from El Camino High School in Sacramento, California. He spent the following year in France, and the next in attendance at the University of Toulouse campus at Madrid and at the University of Madrid where he received the Diploma in Spanish studies in May, 1961. He enrolled in the University of California at Davis in September, 1961, and transferred the following year to the Berkeley campus where he received the Bachelor of Arts degree in Linguistics in January, 1965.

Following graduation, he was a social worker in Humboldt County, California, until February, 1966. He was then drafted and served in Alaska until January, 1968. From September, 1967, until June, 1968, he studied at the University of Alaska. In September, 1968, he enrolled in the Graduate School of the University of Florida. He was awarded a United States Public Health traineeship in clinical psychology for the year 1968-1969, and from then until June, 1971, was research assistant for the Center for Crisis Intervention Research of the University of Florida and also participant in the clinical program of the Suicide and Crisis Intervention Service of Gainesville, Florida. In January, 1970,

he received the Master of Arts degree in Psychology, and in June, 1971, began his internship with the Comprehensive Community Mental Health Center of Denver General Hospital. From July, 1972, until the present, he has been clinical psychologist with the Pikes Peak Family Counseling and Mental Health Center in Colorado Springs, where his duties include teaching the training course for volunteers and coordinating their activities in service delivery. He is Director of the Pikes Peak Area Transactional Analysis Seminar and is an Associate Member of the American Psychological Association.

I certify that I have read this study and that in my opinion it conforms to acceptable standards of scholarly presentation and is fully adequate, in scope and quality, as a dissertation for the degree of Doctor of Philosophy.



Richard K. McGee
Professor of Clinical Psychology

I certify that I have read this study and that in my opinion it conforms to acceptable standards of scholarly presentation and is fully adequate, in scope and quality, as a dissertation for the degree of Doctor of Philosophy.



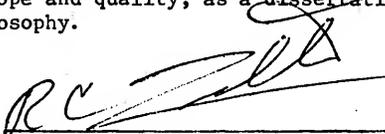
Mary H. McCaulley
Assistant Professor of Clinical Psychology

I certify that I have read this study and that in my opinion it conforms to acceptable standards of scholarly presentation and is fully adequate, in scope and quality, as a dissertation for the degree of Doctor of Philosophy.



Harry A. Grater
Professor of Behavioral Studies

I certify that I have read this study and that in my opinion it conforms to acceptable standards of scholarly presentation and is fully adequate, in scope and quality, as a dissertation for the degree of Doctor of Philosophy.



Robert C. Ziller
Professor of Psychology

I certify that I have read this study and that in my opinion it conforms to acceptable standards of scholarly presentation and is fully adequate, in scope and quality, as a dissertation for the degree of Doctor of Philosophy.

Marilyn B. Zweig

Marilyn B. Zweig
Assistant Professor of Philosophy

This dissertation was submitted to the Graduate Faculty of the Department of Psychology in the College of Arts and Sciences and to the Graduate Council, and was accepted as partial fulfillment of the requirements for the degree of Doctor of Philosophy.

August, 1975

Dean, Graduate School