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Corrections
Training Project

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VOLUNTEERS AND THE ONE-TO-ONE SUPERVISION OF ADULT PROBATIONERS:
An Experimental Comparison with Professionals and a
Field-Description of Process and Outcome

D.A. Andrews
Carleton University
Ottawa, Canada

Jerry J. Kiessling
Probation and Parole Services (Ontario)
Ottawa, Canada

with

R.J. Rusell
Research Associate
Ottawa Volunteer Program

and

B.A. Grant
Research Assistant
Ottawa Volunteer Program

67070

Ontario

MINISTRY OF
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Deputy Minister

MINISTRY OF CORRECTIONAL SERVICES

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PLANNING AND RESEARCH BRANCH

James J. Hug, Ph.D.
Director

A.C. Birkenmayer
Manager, Research Services

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VOLUNTEERS AND ONE-TO-ONE SUPERVISION OF ADULT PROBATIONERS:

Summary of Findings and Recommendations

D.A. Andrews
Carleton University
Ottawa, Canada

Jerry J. Kiessling
Probation and Parole Services (Ontario)
Ottawa, Canada

with

R.J. Russell
Research Associate
Ottawa Volunteer Program

and

B.A. Grant
Research Assistant
Ottawa Volunteer Program

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Volunteers and One-To-One Supervision of Adult
Probationers: Summary of Findings
and Recommendations

The study was a field-experimental comparison of volunteer and professional supervision in adult probation services. The volunteer and professional probation officers were compared on both process and outcome. The study was also a field-descriptive exploration of the relationships between process and outcome. The measures of process adapted and developed for the study were based on a personal, interpersonal and community-reinforcement perspective on criminal conduct. Basic dimensions of correctional counselling were hypothesized to be use of the authority inherent in the officer position, a prosocial and anticriminal orientation made explicit through modelling and differential reinforcement, and problem-solving with a concrete community focus. The directive aspects of supervision were hypothesized to be most effective within the context of a high quality relationship with the probationer. Process was measured by a variety of techniques including pretested officer traits, officer preferences for role descriptions, supervisors' ratings of volunteers, participant evaluations, frequency and nature of contacts and behavioural monitoring of audio-taped supervisory sessions. The basic outcome measures were in-program attitude change and recidivism.

A number of predictions were derived from the correctional literature and on the basis of the theoretical perspective.

The major findings concerning the differences between volunteer and professional supervision were what was expected on the basis of the structural differences between the volunteer and professional roles. On a variety of process measures, volunteer supervision emphasized quality of relationship factors while professional supervision emphasized the authority inherent in the probation order. In addition, the volunteers engaged their clients in more overall problem-solving than did the professionals. However, professional problem-solving was at higher levels on average when it did occur and focused more on concrete community-based problems and less on recreational concerns.

The differential treatment hypothesis which suggested that it is the interpersonally skilled clients who are most positively responsive to relationship-oriented counselling received outstanding support. Volunteer supervision was significantly more effective than professional supervision with the higher risk clients (the younger and less socialized), and considerably so when those clients also presented pretest evidence of interpersonal skills. In addition, high levels of empathic listening by the officer during the audio-taped sessions was positively and

significantly correlated with recidivism among the less interpersonally skilled probationers but negatively and significantly so among the more skilled probationers.

As predicted, the most effective officers with reference to client impact were those officers who presented evidence on pretested trait measures of an interpersonally sensitive and tolerant style in combination with a prosocial and anticriminal orientation. Such officers were particularly effective if they also shared a number of bio-social characteristics with their probationers. The least effective officers were those who were highly prosocial yet lacked a sensitive and tolerant interpersonal style. The clients of those officers who showed a need to control others at pretest also failed at relatively high rates. There was also some minimal evidence that the matching of officer and client on bio-social characteristics was associated with negative impact if the officer did not present the sensitive and prosocial pattern of personality traits.

The validity of the role preferences of officers and of the participant evaluations and supervisor's ratings was not impressive. The latter two sets of measures appeared to be largely a function of officer or client personality and biography.

Even considering the appropriate caution required with descriptive data, the reliability and validity of the tape-based process measures was impressive and encouraging for both the theoretical perspective and the future development of volunteer-counsellor training programs. On the basis of a discriminant analysis of the tape-based process measures, effective supervision was characterized by a) high level attention to the probation order, b) modelling and differential reinforcement of prosocial expressions, c) high level problem-solving with a community-focus, d) frequent friendly expressions and e) low rates of empathic listening. On the other hand, several of the tape-based process measures were either unrelated to recidivism or the observed relationships were unconvincing: problem-solving with a recreational focus, problem-solving with a personal-emotional focus, advocate-broker activity, self-disclosure on the part of officers, and length of interviews.

In the course of exploring the major questions of interest, the study has yielded a considerable amount of reliability and validity data on the various process and attitude measures employed.

On the basis of the findings and our perspective on the correctional literature, several recommendations were made con-

cerning voluntary action programs in corrections:

Recommendation One: Voluntary action programs be recognized and structured as counselling programs rather than as companion or recreational programs.

Recommendation Two: Volunteers assigned assistant counsellor roles should be interpersonally sensitive and flexible yet clearly prosocial and antiriminal in orientation; we deem this recommendation so important, that, even in the absence of locally validated methods, program staff should implement a screening system which is capable of empirical evaluation if only later and indirectly in the program's history.

Recommendation Three: Voluntary action programs should begin with, or rapidly work toward, two or more roles for volunteers, at least one of which need not involve counselling duties.

Recommendation Four: In one-to-one programs, the matching of client and volunteer on bio-social characteristics is recommended.

Recommendation Five: Formal preservice or in-service training in empathic skills should not be offered to volunteers.

Recommendation Six: Formal preservice and in-service training sessions should stress that advocate-broker activity is only one component of a general problem-solving orientation and not necessarily a major component.

Recommendation Seven: Formal preservice and in-service training should advise volunteers to avoid attempts to practice counselling with an intra-psychic focus.

Recommendation Eight: Training programs should incorporate open and nontechnical discussions of existing knowledge in the area of correctional counselling and voluntary action.

Recommendation Nine: Until systematic and controlled empirical examinations of training methods are completed, the major methods of training in the directive aspects of counselling should involve exposure to, and discussion of, concrete examples of operational definitions of directive counselling.

Recommendation Ten: In order to maximize success rates with high risk clients, it is recommended that they be assigned to volunteer probation officers, particularly if the clients also present evidence of relatively high interpersonal and communication skills.

Recommendation Eleven: Staff responsible for volunteer programs should accept with extreme caution participant reports on the quality of probation supervision being offered or received.

Recommendation Twelve: Program managers should begin to experiment with the design and evaluation of monitoring and record-keeping systems which tap the major elements of correctional counselling; available evidence supports the development of ratings by supervisors of volunteers but particularly analyses of audio-taped samples of volunteer-client sessions, whenever resources permit.

Recommendation Thirteen: Program managers should consider introducing systematic collection of data on the achievement of intermediate targets, whenever resources permit.

The statements of research recommendations included pleas not only for more rigorous evaluation of correctional programs, but for greater attention to theory and to the levels of analysis appropriate to correctional counselling. An assumption of the research program was that the advancement of both corrections

and criminology is dependent upon greater attention to the triad of theory, research and service.

The discussion of the findings identified a number of issues for future investigation including more controlled evaluations of the dimensions of correctional counselling and further development of the differential treatment hypotheses. The major recommendation was that an integrated research program be undertaken to examine process and outcome within the framework of much-needed controlled evaluations of counsellor training programs.

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APPENDICES

(Appendices A through M can be found under separate cover.)

- A. Some Operational Aspects of Research in Probation and Parole.
- B. A Research Orientation Manual for Assistant Probation Officers.
- C. Volunteer Application Form.
- D. The Attitude and Personality Battery: A Comparison of Probationer and Probation Officers and the Prediction of Recidivism.
- E. The Self-Report or Supervisory Process Scale (SRS): Officer Role Preferences.
- F. Supervisors' Ratings on Supervisory Process.
- G. Social Network Questionnaire.
- H. The Relationship Questionnaire.
- I. The Monthly Report Form.
- J. The Anticriminal Measures: Tape-Based.

K. The Problem-Solving Measures: Tape-Based.

L. Environmental Facilitation: Tape-Based.

M. The Relationship Measures: Tape-Based.

CHAPTER ONE: INTRODUCTION

General Introduction

The primary objective of the research was to provide a broadly-based comparison of volunteer and professional supervision in adult probation services. Comparisons were made with reference to a) effects on the range and variety of workers available within an office, b) the amount and the quality of supervision offered clients and c) effects on client attitudes and recidivism. The first set of comparisons concern volunteer programming as a means of enhancing citizen representation in corrections (CCCA, 1977) and as a means of increasing the opportunity for optimal matching of client and worker (Scheier, Fautsko & Callaghan, 1973). The second set of comparisons relate to accountability: does the introduction of a volunteer program result in improved service and at what cost? The one-to-one supervisory role reviewed in this report represents only one component of the Ottawa Criminal Court Volunteer Program (OCCVP). The cost issues are reviewed with reference to the total program in a separate report (Kiessling, 1976).

The second objective of the research was to contribute to

the construct validity of correctional programming (Andrews, 1977a) and, therefore, the development of criminology. The volunteer-professional distinction may well have important political and economic implications (CCCA, 1977) but it is not one of obvious theoretical significance, ie. it is not likely to expand our understanding of criminal conduct. However, when the activities of volunteers and professionals are measured on theoretically relevant dimensions, program evaluation has the potential to move beyond local needs, to contribute to broader issues and therefore, to feed back in profitable ways to programming in other settings.

The second objective was pursued through a) the selection and development of theoretically relevant measures of supervisory process, b) examination of the relationships between process and outcome and c) examination of the relationships between changes on intermediate outcome indices (such as attitude scales) and recidivism. A related goal was to develop measures with reliability and validity sufficient to select and train future volunteers.

A third objective was to explore the matching and differential treatment hypotheses of Warren (1970), Quay (Ingram, 1970), and Ku,

Moore and Griffiths (undated). Some of the matching variables are tied to theories of criminal conduct and/or to theories of behavioural influence; but to some extent, the area has been characterized by an atheoretical empirical approach (Scheier, et al., 1973).

A fourth objective of the research was to produce additional validity data on an attitude and personality battery which has been employed in many previous investigations (Andrews, Daigle-Zinn & Wormith, 1974). The present report provides, for the first time, information on both male and female adjudicated offenders. In addition, socio-historical measures of several theoretical constructs were developed and examined in relation to the self-report battery, and to process and outcome.

The introduction provides a brief outline of the underlying theoretical perspective (Andrews, 1977a) and develops the specific hypothesis to be explored. No attempt is made to review the volunteer literature in particular, since such reviews are available (Cook and Scioli, 1976; Peters, 1973; Shelley, 1971), including several in the CaVIC series (Andrews, 1977 a, b, c, d). The introduction represents a revision of the initial statement of the design (Andrews, Farmer, Russell, Grant & Kiessling, 1977).

Changes reflect developments in the theory as well as the disrespect that the real world showed for some of our more idealized plans. The general introduction closes with a brief and rhetorical review of correctional programming. Hopefully the rhetoric indicates the authors' position on "nothing works", "radical nonintervention" and "stop evaluation", the non-issues of the day in corrections.

Corrections has been characterized by a disturbing and self-defeating lack of continuity between theory and practice. The selection of intervention strategies appears to have been made from the hit-parade of treatment methods current at any given time. Such selections have borne little, if any, relationship to theories of criminal conduct. Intra-psycho principles, developed with reference to the neurotic problems of the privileged, have been employed with mentally defective delinquents and adult career offenders. The group dynamics' principles, validated as a means of enhancing communication around a conference table, have been applied with delinquents who are "solid" in their procriminal orientation. The principles of client-centered counselling, and now the methods of the encounter group movement, — methods devoted to reducing the inhibitions of a repressed middle class —

have been employed with under-controlled and severe acting-out clients. The self-help, volunteer and paraprofessional movements are now at the top of the hit-parade or at least "number two with a bullet".

There are strong pressures to ensure that the potential of the movements is not attained. In the first place, the movements are strongly associated with the client-centered and group dynamic traditions, and the earlier failures of those traditions are about to be repeated — only this time with nonprofessional workers. Secondly, and perhaps more importantly, criminology today appears to be under the influence of what Adams (1975) has called the "rhetoricians" and what Glaser (1974) called the "ignoramuses". Practitioners, no matter how dedicated to "keeping up to date", must rely to some extent upon the writings and conference presentations of the academics. If they have so relied recently, they have been subjected to examples of scholarship so devoid of substance that despair is a reasonable reaction. Rigorous criteria for understanding and knowledge have been replaced by appeals to be content with the "ring of truth" (Matza, 1964). Massive and otherwise impressive surveys of the correctional literature have been reduced to empty rhetorical cries that "nothing works" (Martinson, 1974) or hand-wringing over the

"tyranny of treatment" (Outerbridge, 1968). Policy directives are now platitudinous: "leave the kids alone wherever possible" (Schur, 1973). Research recommendations no longer bear any relationship to construct or convergent validity. Rather, the recommendations seek to enhance the immediate and short-term goals of the bureaucrat: "cost effectiveness" certainly but "standardization" above-all (Cook & Scioli, 1976). Once distinguished researchers now explain why we should not evaluate correctional programs (Hackler, 1974).

The sad state of applied criminology is readily apparent to anyone who has attended recent "criminal justice policy" conferences. Panelists and speakers appear to be in a contest to see who can come up with the most "sloganistic" rationale for why we should concentrate on "processing" rather than "intervention", on "appreciation" rather than "correction", and on and on.... The conflicting demands placed on practitioners by the swivel-chair scientists and soap-box revolutionaries are about to smother any possible development. We assume that certain goals can be set for corrections and without too much hesitation. We also assume that the systematic use of theory will facilitate the attainment of these goals.

Theoretical Rationale: A Personal, Interpersonal and
Community-Reinforcement Perspective

A major goal of corrections is to achieve reductions in the probability of illegal activity on the part of the individuals who enter the system. Corrections has other goals and the criminal justice system certainly has a much wider set of goals. However, within the context and limits of community standards and economics, one goal is reduced criminal activity on the part of adjudicated offenders.

The major body of knowledge concerning human choice and action is that of the behaviourists (Ullmann and Krasner, 1969) and the social-learning theorists (Bandura, 1969). We may assume that the behaviour of adjudicated offenders — criminal as well as noncriminal acts — is governed by the same processes that govern the behaviour of the nonoffender, including any of their undetected criminal acts as well as their noncriminal acts. Offenders would be a unique group indeed if such were not the case. Societal responses to crime may well influence future conduct but they do not, we assume, change the basic processes governing behaviour.

Criminal behaviour, like noncriminal behaviour, is main-

tained by its consequences (Burgess & Akers, 1966; Adams, 1973). In situations where criminal acts are more highly reinforced than noncriminal alternatives, criminal acts have a high probability of recurrence. Thus, an overall correctional strategy is to produce shifts in the balance of reinforcement for criminal and noncriminal behaviour patterns such that the noncriminal are favoured. Shifts may be produced by substituting punishing consequences for the reinforcing consequences in the case of criminal acts and by enhancing the reinforcing value of the consequences of the noncriminal alternatives.

Punishment, in the behavioural sense, is not to be confused with the simple delivery of aversive and unpleasant events or the withdrawal of attractive and pleasant conditions. Punishment is a process whereby the future probability of an act or choice is reduced by the presentation of an event, or the removal of a condition contingent upon that act. Similarly, reinforcement refers to an increase in the future probability of an act as a function of the contingent presentation or removal of an event or condition. Clearly, not all unpleasant events function as punishers, and not all pleasant events function as reinforcers, and few events function in the same way for all persons, at all times, and in all situations. Thus, at the basic level of functional de-

definitions, behavioural perspectives recognize the rich variety of human action.

The reinforcing or punishing value of consequences, and the performance of an act, depend upon many factors. A major set of factors concern "state" or motivational variables. Additional factors relate to one's previous history with reference to the act, the consequences, the contingencies involved, and the settings. Other factors involve the immediacy and reliability with which certain events are consequences relative to other consequences in specific situations.

Legal sanctions represent relatively standard consequences, aversive by almost anyone's definition. On this basis, the law may reflect the seriousness with which the law-makers, and those they represent, view certain rule infractions. However, such a statement may not establish effectively the conditions necessary for punishment. In fact, legal sanctions appear to represent particularly weak punishers: the immediate consequences of criminal acts are frequently highly reinforcing, and the legal sanctions, if applied at all, are delayed and contingent, not upon the original act, but upon "getting caught", "having a poor lawyer" or some other event which

has occurred between the offence and the sentence. Often times, even if one is relatively certain that the legal sanctions will be applied (for example, a fine for illegal parking), the rewards for rule-breaking exceed the costs (for example, seeing the new stage production and avoiding having wasted fifteen dollars on the theatre ticket).

Probation and parole supervision, with the attendant increase in surveillance, may function to enhance the punishing value of the legal sanctions. However, punishment via legal sanctions may remain a particularly weak control method unless nonpunished alternative routes to reinforcement are concurrently provided and self-management mechanisms exist to compensate for the delays and ambiguities represented in the criminal justice system.

A review of the specific sources and types of reinforcing and punishing consequences which are contingent upon criminal acts will lead to several intervention strategies — strategies which compensate for the unreliability and delayed nature of the legal sanctions and emphasize self-management and the natural community deterrents to criminal activity. The review is also helpful if one wishes to locate offenders on dimensions which have implications for the relative effectiveness of differential correction

programs.

We assume that the reinforcing and punishing consequences which control criminal acts are evident at several levels. The levels correspond to the special interests of the disciplines of biology and psychology, social psychology and sociology: the personal, the interpersonal and the community or broader social structure. A political-economy of crime (Taylor, Walton, Young, 1973) is also required to account for the development and maintenance of the contingencies within specific settings or groups, but that is not our focus here.

The Personal Level

Intrinsic to many acts are consequences such as the enhancement of excitement and stimulation (Quay, 1965) and the acquisition of money and property (Merton, 1957). The reinforcing value of such consequences may depend upon prior learning experiences in social situations, but their controlling value does not depend in any necessary way upon the presence of other people at the time an act is emitted or inhibited. It is in this sense, that consequences intrinsic to vandalism, joyriding, theft and some sexual and drug offences are examples at the personal level of

control. While surveillance (for example, regular police patrols) and security (for example, locked doors) may reduce the probability of certain actions, they do not change the necessary connections between the acts and certain intrinsic consequences. Particularly weak intervention methods, such as legal sanctions, are ones which ignore the fact that much crime is in fact immediately rewarding.

A second type of personal control is that associated with the classical conditioning model. Briefly, among the consequences of operants are conditioned anticipatory responses elicited by stimuli previously present when the reinforcing (or punishing) events were presented. These conditioned responses frequently involve autonomic activity. Eysenck's (1964) theory of crime represents the purest example of a perspective emphasizing conditioned "hope" and "fear". According to this perspective, the initiation of criminal activity elicits the expectation of punishment. The intrinsic reinforcers are rendered neutral since they do not occur, ie. completion of the act has been inhibited. However, because of problems of generalization and because of the importance of the cognitive aspects in human action, classical conditioning approaches have not been highly successful in modifying deviant behaviour (Sobell & Sobell, 1972).

Perhaps, the most important type of personal control is that known as self-control or self-management (Mahoney, 1972). The personally-mediated consequences include the self-delivery of positive or negative evaluations (Reiss, 1961; Matza, 1964), the cognitive and emotional anticipation of the approval or disapproval of significant others (Glaser, 1956; Linden & Hackler, 1973) and recall of the other positive or negative consequences of an act (ie. "expectancies", "rule learning", "normative definition" or "internalization of norms"). Again, we need not assume a social situation at the time an act is emitted or inhibited. However, the self-evaluation and other self-management processes depend upon values, beliefs, attitudes and rules learned in previous situations.

Wormith (1977) has presented the thesis that one factor determining whether a prosocial attitudinal orientation is evident in behaviour is the extent to which one has previously learned self-management strategies. For example, a person may have acquired prosocial standards of conduct, but unless he also has learned to self-monitor and self-evaluate with reference to those standards, there may be little correspondence between standards and conduct. Reiss (1961) and Matza (1964), on the other hand, assume that offenders do exert self-control even while sharing conventional standards and values; self-control is exerted by

making use of justifications for rule-breaking which avoid negative self-labelling. The perspectives are compatible and reflect the variety of factors determining the degree of correspondence found between attitudes, values, beliefs, and behaviour.

Overall, we may expect that offenders, in situations where self-control is exerted, will respond with reference to procriminal standards. A series of psychometric and behavioural comparisons of adjudicated and nonadjudicated offenders with nonoffenders has confirmed that the offender samples are more antisocial and procriminal in orientation than are the nonoffenders (Andrews, 1977a, p. 18; Wilkins, 1974). Typically, the offender samples are likely to devalue others, to have less respect for the law and criminal justice, to accept rationalization for law violations, to present arguments more favourable to law violations, to identify and associate with other offenders, and to have less positive attitudes and expectancies regarding conventional avenues to success.

The Interpersonal Level

The importance of the immediate presence of others at the time an act may occur is widely recognized. Clearly, the immediate presence of a policeman, a parent, a delinquent friend or a nondelinquent friend may signal different outcomes for an act.

It is not unusual then that criminal justice programs aimed at reducing crime frequently emphasize increased police patrols or other means of surveillance, changing the orientation of whole groups and/or changing the association patterns of individuals.

In view of the importance of self-management and the attitudes which determine the direction self-management takes, it is also not surprising that the interpersonal level has been particularly important in theories which purport to account for the acquisition of criminal attitudes, values, beliefs and definitions as opposed to conduct itself. Sutherland and Cressey (1966) argued that the major part of "criminal learning" occurs within the context of actual interaction with others. Cressey (1955) and Empey and Erickson (1972) went so far as to state that criminal attitudes are the properties of groups, not of individuals, and hence reformation programming must be directed at groups. If one assumes, as we do, that control via attitudes is at the personal level, then their statement is patently false and highly misleading. Further, their assumption that group programs are more effective than one-to-one programs is empirically testable and the existing data do not support their position (Andrews & Daigle-Zinn, 1976).

There appears to be little question that peers, and others,

may represent models, discriminative stimuli and reinforcing agents for delinquent values, attitudes and beliefs as well as behaviour. (For a particularly fine example, see Beuhler, Patterson & Furniss, 1966). Within this context, most theorists would argue that the learning of criminal or noncriminal attitudes will be facilitated when the interpersonal relationships are open, warm and characterized by mutual understanding (Andrews, 1976b).

One aspect of the interpersonal factors which has received continuing attention over the last thirty years has been that of empathy, ie. sensitivity to the needs, wishes and feelings of others (Mead, 1934; Gough, 1948; Grief & Hogan, 1973). Symbolic interactionists assume empathy when, for example, they state that criminal behaviour is emitted in so far as one identifies with persons who would find such behaviour acceptable or commendable (Glaser, 1956). More generally, the non-empathic person is unable to anticipate the negative consequences of his actions for the victim or the disapproving reactions of those he values and who value him. Again, in so far as the control rests on anticipatory reactions as opposed to the immediate presence of others, the controlling process is at the personal level. However, the learning of empathic skills may take place within social situations.

The Community Level

Control of illegal acts at the community level is of particular interest for community-based programs such as probation and parole. Our approach is analogous to the Hunt and Azrin (1973) analysis of alcoholism. We assume that a major way in which the community may exert control over illegal behaviour is by withdrawing or postponing rewards when procriminal behaviour occurs. However, this process, the process of negative punishment, requires background situations in which noncriminal behaviour is reinforced. If an individual regularly receives a variety of high-quality reinforcers within anticriminal social settings, such as family, peer groups, school and work, criminal acts occur at the risk of a reduction, loss or postponement of reinforcement. At the same time, many of the rewards associated with criminal activity (stimulation, money, approval) are being achieved by noncriminal activity and hence a motivational base for crime (ie. deprivation and/or frustration) is removed. In sociology, the perspectives are labelled "control theories" when the emphasis is on negative punishment. When the emphasis is on deprivation or frustration, the approach is termed "anomie".

The literature provides examples of the disadvantaged social

positions of many adjudicated offenders. The examples indeed suggest that the social environment of offenders is characterized by reinforcers of poor quality, little variety and that reinforcement is sporadic. The individual differences approach of Quay (1965) and associates is particularly succinct. Their personality dimensions of delinquency included family dissension and scholastic maladjustment. The dimensions suggested a background of low levels of reinforcement in the home and school. The personality factors of neuroticism and inadequacy-immaturity suggested the existence of personal habits, behavioural deficits and excesses which would interfere with full and rewarding functioning in the community. The factors of subcultural delinquency and psychopathy suggested an independence from anticriminal settings, based on membership in procriminal groups or inadequate socialization.

Implications for Correctional Programs

The reinforcing consequences of criminal behaviour are varied and are likely to be more immediate and more reliably evident than are the formal legal sanctions, no matter how severe the sanctions. We have seen that reinforcers for criminal activity are

distributed across the personal, interpersonal and community levels. The reinforcers are sometimes positive, the immediate presentation of pleasant and attractive consequences, and sometimes negative, the removal of aversive or unpleasant conditions. The probability of criminal acts may only be reduced if the reinforcing events are recognized and the intervention strategies are designed to shift the balance of reinforcers for the criminal and noncriminal choices.

A traditional strategy has been revised of late (Adams 1975), that is, reducing the opportunity for crime, ie. incapacitation, through increased use of incarceration. Probation is a more reasonable response in that it does not simultaneously reduce the opportunity for noncriminal pursuits. Probation and parole have the potential associated with a probation order which specifies appropriate and inappropriate behaviour and the sanctions. Thus, the first strategy to be derived from the model is to make explicit use of the authority inherent in the probation order. The authority implies that the officer has the right to monitor the probationer's performance in areas specified by the probation order and to initiate the formal sanctions specified by that order.

Assuming a morally responsible person, one capable of self-management, then a second strategy is to enhance the prosocial and

anticriminal orientation of the offender. This involves exposure of the negative consequences of crime for other persons and exposure to alternative attitudes, values, beliefs and behaviours.

A third strategy is to increase the density of rewards for noncriminal pursuits in the community. This may well involve the resolution of any personal, interpersonal or social problems which limit the individual's participation in the broader community.

Finally, since each of the strategies require a change agent (an authority figure and/or an appropriate role-model and/or a problem-solver), the fourth strategy is to arrange conditions such that the client and the agent may enter into a relatively high quality interpersonal relationship.

The Major Dimensions of Supervisory Process

Three sets of supervisory strategies were derived from the model and a fourth was included because of its demonstrated importance in interpersonal influence situations. In the following

discussion, the problem-solving strategy is divided into sub-strategies, one reflecting the more traditional model of office-based counselling and then a field-work orientation.

The Authority Dimension: direct attempts to place controls on criminal or related activities by the introduction of clear and specific rules for what constitutes appropriate and inappropriate behaviour and the provision of explicitly differential consequences when rules are adhered to or ignored. This dimension represents the more formal aspects of the probation and parole contract. Clearly, the individual probation officer, volunteer or professional, has considerable discretionary power concerning this dimension. A formal social learning analysis of the authority role suggests that authority will be most effective when the rules and consequences are detailed in a concrete manner and when the formal sanctions are translated into events meaningful for the individual client (Andrews, 1977c). Such exposure to the rules of a prison has been shown to influence the behaviour of prison residents (Andrews & Young, 1973), but surprisingly, the authors have found no such examples for community-based programs. Martinson (1974) has suggested that California's experiment in intensive parole supervision was successful only in those settings where the authority

inherent in the parole contract was practiced. Note, however, that unlike Martinson (1974), our emphasis is not on the "severity" of formal sanctions but on their "vividness" or "clarity". As the phenomenologists have suggested, the court and associated proceedings may readily breed confusion and a sense of injustice (Schur, 1973). An open and explicit review and interpretation of the probation contract should reduce such confusion, if not also decrease recidivism.

A second approach to enhancing the controlling value of formal rules and sanctions is to increase the offender's awareness and respect for the general principles of criminal justice if not the specifics of the system's operation. Such has been the approach within a series of prison-based projects (Andrews, Brown and Wormith, 1974) where the law and principles of criminal justice are exposed as protectors of the rights, property and persons of individuals and as factors important in the maintenance of social order. However, as an intervention strategy the approach fits best with the anticriminal dimension described below.

The Anticriminal Dimension: this approach entails direct attempts to produce changes in the expected consequences or value of criminal activity relative to noncriminal activity. Specific procedures include the opportunity to interact with noncriminal others who express and reinforce anticriminal and prosocial attitudes, values and behaviour, who exhibit and reinforce noncriminal alternatives, and who are themselves the recipients of reinforcement for their noncriminal activity, ie. the process of modelling and direct reinforcement.

The anticriminal dimension of supervisory process has obvious and close links with the treatment guidelines of Cressey (1955) and Empey and Erickson (1972). We differ from the earlier guidelines in our overall behavioural emphasis, in our emphasis upon the specification of differential reinforcement and in the emphasis we place upon interaction with explicitly noncriminal others. While Cressey and Empey underscore the need for forming anticriminal groups, they do not specify how to actually establish the anticriminal focus. Rather, they focus on the group dynamics. As developed elsewhere (Andrews, Brown and Wormith, 1974), one specific step towards establishing the anticriminal condition is to introduce noncriminal others, such as volunteers, into the offender's social environment. A second step is to establish

programs in which the exposure of anticriminal values is likely (Andrews, Wormith, Kennedy & Daigle-Zinn, 1977). Ku, Moore and Griffiths (undated) outline this dimension with reference to volunteers as "suitable adult models".

Problem-Solving Orientation: direct attempts to deal with those personal, interpersonal, academic, vocational, familial or other problems which may be interfering with the individual's ability to obtain a variety of high quality rewards in conventional community settings. Here we refer to the therapeutic and training aspects of supervising probationers. Specific techniques employed may vary with the preferences, strengths or needs of individual officers and clients. Across methods, active helping would involve the officer and client engaging in an analysis of the problem situation, considering alternative courses of action and taking steps appropriate to the implementation of a solution (Carkhuff, 1969). Berger, Crowley, Gold, Gray and Arnold (1975) were unable to demonstrate the value of a family oriented group counselling program or of a tutoring program but, against the background of failure with many therapeutic approaches, there is some evidence in the literature of effective therapy and training programs (Andrews, 1977a p. 29-31). In the present study, the dimension was monitored over a range of adjustment areas, including

a community focus (school, employment, family, marriage and peers), a recreational focus and a personal-emotional focus. The latter two foci have never been associated with positive outcome.

Environmental Facilitation: direct attempts to modify the client's behaviour within community settings or to modify the setting such that the density of reinforcement for noncriminal behaviour may be increased. Environmental facilitation is an important subset of problem-solving, a subset which involves the probation officer intervening directly within the offender's milieu. The dimension includes the advocate-broker roles in which the officer is assumed to have the information and status necessary for the client to gain access to community resources. Scheier (1974) has recently discussed this dimension, and Kiessling (1975) has analyzed it from an ecological perspective.

The Relationship Dimension: the friendship model of voluntary action and its early counterpart in professional counselling (Rogers, 1957) place considerable emphasis upon the quality of the relationship established between the officer and the client. We are interested in several elements of the relationship including the rate, duration and type of contacts, mutual liking and understanding, openness and warmth. We expect that the importance of the relationship depends upon the levels reached on the other

dimensions of supervisory process. A number of studies suggest that indices of a good relationship may signal positive or negative changes depending upon whether, for example, the anticriminal expectations are simultaneously present (Andrews, 1977b). A high quality relationship appears to set the stage for change to occur, but the nature and direction of change depends upon the more active and directive aspects of supervision. It is predicted that the first four dimensions of supervisory process will be most strongly related to the outcome of probation when the relationship factors are at high levels. In fact, the role of the officer could be described as that of an anticriminal friend, a controlling friend, a skilled and knowledgeable friend and/or a socially influential or socially powerful friend.

The dimensions and the intermediate goals of intervention. Presumably, the relationship between supervisory process and recidivism is mediated by the attainment of associated intermediate goals. The use of the anticriminal dimension should be associated with changes on indices of an anticriminal and prosocial orientation. Problem-solving and environmental facilitation seek improvements in personal and interpersonal functioning and enhanced integration with the community. High quality relationships may be associated with increased acceptance of self and others. However, by itself, the formation of high quality relationships with offenders may signal

negative outcome on indices other than a sense of personal adequacy (Andrews, 1977b). The explicit use of authority is predicted to relate directly to recidivism.

The Classification of Offenders and Differential
Treatment Hypotheses

In the original design of OCCVP we planned to employ Quay's (1965) multi-dimensional system for classifying offenders since reliable and easily administered measures were available (Peterson, Quay & Cameron, 1959) and the system overlapped with that of Warren (1966), the other major system in the literature. We have opted, however, for a system which relates more directly to our perspective on criminal conduct. Further, the reviews of both Palmer (1975) and Glaser (1974) suggested that a reduced number of categories may be more profitable.

A major distinction in the differential reinforcement system, and in the original statement of differential association theory, is that between "ties to criminality" and "ties to convention". At the behavioural level, the distinction is between reinforcement for criminal acts and reinforcement for noncriminal acts. At the socio-psychological level, the distinction is with reference to procriminal versus conventional attitudes, values and beliefs

and/or association patterns with, and affectional ties to, pro-criminal and anticriminal others. At the trait level, the distinction is between a commitment to crime and/or commitment to convention. Recent investigations are beginning to show the increased power of prediction resulting from the joint consideration of criminal and conventional ties (Linden & Hackler, 1973).

The attitude and personality battery employed in the present study includes two measures which related to the personal, interpersonal and community reinforcement system. Identification With Criminal Others (ICO) is a self-report attitudinal measure reflecting a willingness and readiness to associate with offenders and, by implication, an acceptance of their behaviour. Previous studies have shown that ICO correlates positively with measures of acceptance of rationalizations for law violations. Thus, ICO was employed as an indicator of the degree of reinforcement associated with procriminal behaviour patterns. Gough's Socialization scale (SOC) appears to be a particularly good measure of ties to convention. Psychometrically, it loads on factors defined by Achievement via Conformance, Responsibility and Self-Control (Grief & Hogan, 1973). SOC then provides our "trait" indicator of rewards associated with behaviour in conventional community settings. Complementary socio-historical measures are required

to establish convergent validity and two such indices were developed in the present study.

Empathy is a third client characteristic of presumed importance in differential treatment. By empathy we refer, at least in part, to the client's ability to communicate and/or willingness to enter into an interpersonal relationship. In the present study, the Hogan Empathy scale (HEMP) was employed as a measure of the interpersonal and communication skills of the client.

Differential Treatment Hypotheses

The differential treatment hypotheses have been derived from a variety of theoretical systems and from empirical investigations employing a variety of operational definitions of client types. Needless to say there is much confusion in the literature (and in the minds of the present authors) regarding the specification of both type of treatment and type of client in the examination of Type of Treatment/Worker X Type of Client interactions on various outcome indices.

One hypothesis is relatively clear. Most writers agree that

relationship-oriented strategies are most effective with interpersonally skilled clients and least effective, if not counterproductive, with the less interpersonally skilled clients (Ingram, 1970; Warren, 1966; Palmer, 1975; Glaser, 1974; and possibly Ku et al. (undated) depending upon how they define "primary counseling").

A second hypothesis, derived from the differential reinforcement perspective, is that the "committed" delinquents, those high on ICO in our operational system, require exposure to high levels of both the authority and anticriminal dimensions. Recall from the California experience, that it was the "subcultural delinquents" who responded best to incarceration (Palmer, 1975).

A third hypothesis is that offenders with few ties to convention (ie. low SOC clients), will require high levels of problem-solving.

A final set of suggestions has to do with the classification of offenders on both SOC and ICO. High ICO - low SOC clients require high levels on all four of the directive aspects of supervision. High quality relationships, in the absence of detection, are likely to be particularly dangerous since such a combination

would imply acceptance by the officer of a committed delinquent style.

High SOC - high ICO offenders are, in Glaser's (1974) terms "conflicted" and in Matza's (1964) terms in "drift". Authority is indicated to heighten awareness of the formal legal sanctions as is a re-affirmation of conventional standards through the provision of conventional role-models and differential reinforcement of conventional attitudes, values and beliefs, ie. the anti-criminal dimension.

Low ICO and low SOC offenders are socially isolated, either because of personal or interpersonal inadequacies or because of behaviours so unpredictable (novel) and offensive (exciting) that most interpersonal and institutional associations are short-lived. Within the Quay and Warren systems, such cases require patient workers, people who are willing to establish strict rules, and to engage in extensive problem-solving.

The low ICO - high SOC offender would appear to represent the "normal" or "accidental" offender. The fact of a conviction is some evidence that the balance of reinforcement for criminal and noncriminal activities has favoured the criminal, hence the

anticriminal dimension is indicated. Alternatively, this category, predicted to include low risk probationers, may represent the one condition or "wherever" under which the "radical noninterventionist" directive is appropriate, ie. "leave the kid alone".

The indigenous worker: Several perspectives, including that of Ku et al. (undated), suggest that treatment efforts will be particularly effective when the worker and client share similar background experiences. In the present study, the concept of indigenous worker was operationalized in terms of the extent to which the officer and client were comparable on age (within 10 years), socio-economic status of parental families, occupational status, educational achievement and marital status. Ku et al. (undated) suggest that the matching of worker and client is particularly important when supervision emphasizes the role-model (anticriminal) and the friend-companion (relationship) dimensions.

Comparisons of Volunteer and Professional Supervision

The preceding sections provided a brief outline of the theoretical perspective guiding the evaluation of OCCVP. The intermediate goals of intervention were outlined and related to five

dimensions of supervisory process. The means of classifying offenders were noted and the differential treatment hypotheses were developed. The primary objective of the research, a broad comparison of volunteer and professional supervision, may now be outlined with reference to the theoretically derived process measures and the categorization of offenders.

Several research strategies exist for the assessment of supervisory styles and practices: a) the structural or role approach, b) the biographic and trait approach, c) the use of officer-reported role preferences, d) the use of reports or ratings by persons with particularly privileged positions from which to observe officer-client interaction, including e) officer and client self-reports on supervision and f) direct observations by independent observers of actual supervisory practices.

The Role Distinctions

The professional officers in the present study were responsible for the one-to-one supervision of two-to-ten probationers. In the research sample, a case-load of from 70 to 100 additional cases, the preparation of pre-sentence reports, the routine bureaucratic demands of an office and, for some officers, the super-

vision of volunteers. The volunteers were responsible for the supervision of only one or two cases at any given time, and a few also participated in one or more of the variety of roles for volunteers available in OCCVP. It should be clear that the comparisons were not comparisons of the relative styles or effectiveness of volunteers and professionals working under the same conditions. The roles and structural pressures and constraints were quite different.

The professionals, by way of their formal duties and responsibilities, represented authority figures: they were the representatives of the criminal justice system. In fact, within OCCVP, it was the professionals who supervised the volunteers and had ultimate responsibility for the discharge of the probation order, including the initiation of early termination and breach proceedings. The volunteers, were advised in preservice training that they represented the probation office, but were also advised to enter into a "directed friendship" with the client, ie. to offer assistance, and to contact community agencies on behalf of the client within the context of a high quality relationship which included frequent contacts with the client.

Clearly, the role demands were that the professionals emphasize the authority dimension while the volunteer emphasizes quality of relationship. The relative positions of volunteers and professionals on the problem-solving and anticriminal dimensions were less obviously deducible from the role descriptions. While the volunteers had the time to act as role models and problem-solvers, they less obviously did in fact, present an appropriate prosocial orientation and they did not necessarily have the skills or knowledge required for effective problem-solving.

On the assumptions that the volunteers a) did model and reinforce conventional behaviour, b) did communicate their expectation that the probation contract be honoured and c) did engage in problem-solving, then their role-derived potential to interact with the client at high rates and in a high quality manner promised positive impact on the client.

More specifically, the role analysis, in combination with the differential treatment hypotheses, suggests that the friendship orientation of volunteers will be particularly effective with high HEMP clients generally and with the low ICO - low SOC clients in particular, ie. those who require both time and problem-solving

within the context of a high quality relationship. The high ICO - low SOC clients would presumably be responsive to the authority associated with professional supervision. However, Tully (1977) has suggested that high ICO offenders are more responsive to prosocial messages from the volunteers than to prosocial messages from professional workers.

The Trait Approach

Comparisons of volunteer and professional workers on biographic, personality and attitudinal data relates to two objectives of the research. One is the question of the extent to which the volunteer program succeeds in creating an office more representative of the broader community. Secondly, several biographic and attitudinal measures have implications for supervisory process.

Several measures in the battery relate to the quality of relationship dimension. The Hogan Empathy (HEMP) scale appears to be the best of the set on the basis of available psychometric data. There is no reason to expect that volunteers and professionals will differ on trait measures of interpersonal sensi-

tivity. We predict that the interpersonally sensitive officers (volunteer or professional) will be more successful with their clients than the less sensitive officers, but the degree of impact will depend upon officer scores on scales relevant to the more directive aspects of supervision.

Complementing the analysis of offender personality, the anticriminal dimension is represented at the trait level by officer scores on SOC and ICO. Neither socialization nor identification with offenders dictates appropriate differentials in reinforcement of the client's prosocial and antisocial statements but they certainly imply the direction of the officer's sentiments. ICO is a particularly interesting measure because of the matter of worker identification (or over-identification) with clients. In traditional therapy and case-work, practitioners are warned about the distinction between expressed concern and expressed sympathy. The latter, of course, may more readily be interpreted as approval of deviant behaviour patterns. On the other hand, the indigenous worker movement in practice and the phenomenological movement in social psychology emphasize understanding the client/person on his own terms.

The expected interaction of HEMP, SOC and ICO is of particular importance. We know that HEMP and ICO are positively correlated and there is at least one example in the literature of such a relationship being associated with a negative impact (Andrews, Farmer & Hughes, 1976). The prediction is that the most successful officers (volunteer or professional) will present high scores on HEMP and SOC and low scores on ICO. There is no reason to expect differences between volunteers and professionals on SOC but, professionals, by way of their exposure to offenders, may score higher on ICO. That has been our experience with volunteers in prisons (Andrews, Young, Wormith, Searle & Kouri, 1973; Wormith, 1977).

Trait measures relevant to problem-solving and environmental facilitation would be best represented by skill and knowledge measures. With the exception of officer self-reports on the range of their contacts with potential resources in the community, no such measures were included in OCCVP. However, we may assume that effective helpers are themselves effective persons, i.e. relatively free from excessive tension, anxiety and feelings of alienation. No predictions are made with reference to differences between volunteers and professionals on such indices.

One trait measure potentially relates to use of authority.

CONE, of the FIRO-B, contains items reflecting a wish to control others. Too little is known about the scales to make specific predictions with reference to volunteer-professional differences or client impact. It is known that "dominating" volunteers are less successful than volunteers who score relatively low on dominance (Scheier, et al., 1973). Note, however, that the authority dimension as outlined earlier, does not involve interpersonal domination, but a high level review of the rules of the game.

Officer Preferences for Role Descriptions

Officer preferences for various descriptions of the probation officer role may represent a more direct, and hence a more effective method of assessing officer positions on the dimensions of supervisory process. The trait measures noted above were constructed to be highly general with reference to situations. Preferences for various officer roles are clearly more specific to the supervision situation. Role preference measures were developed for the present study and the predictions are clear from our earlier review of the role-based constraints. Professionals will opt for the authority role while volunteers will opt for a friendship role. Predictions are less clear on the problem-solving or counsellor-trainer roles.

The Reports of the Trainers and Supervisors of Volunteers

The trainers and supervisors of the volunteers in OCCVP were asked to evaluate their volunteers with reference to each of the five dimensions of supervisory process. No such measures were available on professionals but an examination of trainer and supervision ratings in relation to the impact of the volunteer on the client will provide important data on the convergent validity of our assumptions.

Probationer and Officer Reports on Quality of Supervision

The client represents a particularly important source of information on the supervision being offered and received. In fact client reports may also represent one type of outcome measure, ie. consumer satisfaction with the service. In the present study, both officers and clients reported on the quality of their relationship, the amount of "real help" being offered/received and the perceived direction of the client by the officer.

Our discussion to this point permits relatively clear predictions with reference to differences between the volunteer and professional samples on the client and officer reports. The vol-

unteer sample will present higher scores on quality of relationship while the professional sample will present higher scores on direction. Howell (1972) found that relative to the clients of professionals, the clients of volunteers liked their officers more, were more liked by their officers and saw their officers as less authoritarian. Scores on the helping scales will less obviously discriminate between volunteer and professional supervision since the differences on problem-solving indices themselves are unpredictable at this point.

The matter of the relationship between participant reports and objective outcome indices is of some immediate practical import since, in the day-to-day matter of supervision, the officer has little else to rely on as an indicator of ultimate impact. However, available research suggests that participant evaluations are largely a function of participant personality (Wormith, 1977) and that evaluations relate to outcome differentially depending upon other aspects of treatment (Andrews, Farmer & Hughes, 1975; Andrews, Wormith, Kennedy, Daigle-Zinn and Nelson, 1976). We predict that participant evaluations will relate to participant personality and that the predictive value of the ratings will vary with officer personality (HEMP, SOC, ICO) and the specifics of treatment.

Behavioural Observations of Supervisory Process

The direct observation of officer-client exchanges represents a particularly powerful method of assessing supervisory process. It is also the method which is most expensive (in terms of money and effort) and one very susceptible to reactive biases and sampling problems. It was clearly not feasible to video-tape or audio-tape all officer-client exchanges. Thus, obtaining a sample of such exchanges was set as a limited but more attainable goal. The design called for audio-taping two sessions for each officer-client match, one session within the first two-to-three weeks of case assignment and the second within three-to-four months. While there was no assumption that the taped sessions were representative of all sessions, it was assumed that the artificiality created by the presence of a tape-recorder would be relatively constant for all matches. Further, while the presence of a tape-recorder might have the effect of raising or lowering scores on supervisory process measures, such an effect would be a constant and hence, comparisons could be made across matches. Again a major objective of the study was the development and testing of a set of reliable behavioural measures which would be useful in training programs.

Summary

The research component of the Ottawa Criminal Court Volunteer Program (OCCVP) was designed to produce a broadly based comparison of volunteer and professional supervision in a one-to-one adult probation program. Comparisons were made over a range of process and outcome measures. The process-relevant measures included attitude and personality scales, participant reports, ratings by privileged others and behavioural monitoring of audio-taped supervisory sessions. The outcome indices included attitude change measures and in-program recidivism.

The dimensions of supervisory process were derived from a personal, interpersonal and community-reinforcement perspective on the acquisition and maintenance of criminal attitudes and behaviour. Conceptually, the major task was to produce shifts in the balance of reinforcement for criminal and noncriminal alternatives such that the noncriminal were favoured. Operationally, the dimensions of supervisory process represent measures of the practices designed to produce such a shift:

- a) Authority. The probation order specifies the connection between criminal or criminal-related

behaviour and certain formal legal sanctions; the contingencies specified are designed to favour noncriminal alternatives. The authority aspect of supervision involves rendering the contract effective through concrete and explicit reviews with the client of the prescribed or proscribed behaviour, the sanctions and the relationship between the specified behaviours and the sanctions.

- b) The Anticriminal. The officer acts as a model of anticriminal attitudes, values and behaviour and differentially approves of the client's prosocial-antisocial expressions.

- c) Problem-solving. The officer explores major sources of satisfaction and dissatisfaction in the client's life, and engages the client in attempts to resolve the problems when they do exist. The aim is to increase the density of reinforcement in conventional settings.

- d) Environmental Facilitation. This subset of problem-solving involves direct intervention within community resource settings and explicit directions on the use of community resources.

A number of predictions were made in the introduction. One prediction followed directly from the community-oriented aspect of the volunteer program.

- 1) With the introduction of volunteers, there will be a greater variability in officer backgrounds and attitudes. (Pages 1 & 36)

A second prediction followed a review of the structural differences between the volunteer and professional roles.

- 2) Relative to professional supervision, volunteer supervision will be characterized by high rates of client-officer contact, by a greater emphasis on the quality of the interpersonal relationship and by less of an emphasis on authority. (Pages 33-35)

A third series of predictions concern the relationship between specific process measures and outcome indices.

- 3) Authority scores will relate directly to recidivism but not necessarily to attitude change scores. (Pages 26-27)
- 4) Anticriminal scores will relate to changes on attitudinal measures of a prosocial orientation as well as to recidivism. (Pages 26-27)
- 5) Problem-solving scores will relate to improvements on attitudinal indices of personal, interpersonal and community functioning as well as recidivism. (Pages 26-27)
- 6) Relationship scores will relate to changes on self-esteem and attitudes toward others. (Pages 26-27)
- 7) Gains on attitudinal indices of an anticriminal orientation and personal, interpersonal and community functioning will predict recidivism. (Pages 26-27)

Two related predictions concerning the interaction of supervisory practices were derived from a social learning perspective on the relationship indices:

- 8) The directive aspects of supervision will most strongly and positively relate to outcome when the quality of the relationship indices are at high levels. (Pages 25-26)

- 9) The quality of the relationship indices will most strongly and positively relate to outcome when the directive aspects of supervision are at high levels. (Pages 25-26)

A series of predictions concerned differential treatment hypotheses.

- 10) High quality relationships are particularly effective with interpersonally sensitive clients (high HEMP) — and possibly will signal negative impact with less sensitive clients (low HEMP). (Pages 29-30)

- 11) Relative to professionals, volunteers will be particularly effective with interpersonally sensitive probationers. (Pages 35-36)
- 12) Authority is particularly effective with probationers presenting strong ties to crime (high ICO offenders). (Page 30)
- 13) The anticriminal dimension is important with all types of clients. (Pages 29-32)
- 14) Problem-solving is particularly effective with offenders presenting weak ties to convention (low SOC). (Page 30)
- 15) The matching of officer and client on biographic factors is most important in conjunction with the anticriminal and relationship dimensions of process. (Page 32)

Only two clear predictions were possible from a review of officer trait measures relevant to supervisory process and the second is a reinstatement of prediction number 15) above.

16) The most effective officers as indicated by impact on their clients are those who present high scores on Empathy (HEMP), high scores on Socialization (SOC) and low scores on Identification With Criminal Others (ICO).

(Pages 36-38)

17) The matching of officer and client on biographic factors is most important when officers present the preferred pattern of personality traits. (Page 37)

One prediction concerning the validity of participant reports on supervision was based on previous research:

18) Participant evaluations of probation are a function of participant personality. (Page 41)

The research report reviews a number of other questions including the validity of the attitude and personality battery. Issues on which specific predictions were not made include miscellaneous matching hypotheses and the importance of officer characteristics such as anxiety, alienation and previous employment history. Finally, additional validity data on the measures of supervisory process are presented.

CHAPTER TWO: METHOD

Setting

The participating probationers and the officers, professional and volunteer, were drawn from the Ottawa office of the Adult Probation and Parole Services of the Ontario Ministry of Correctional Services. The office consists of a manager, three senior probation officers who share administrative duties and a staff of 14 professional probation officers. One of the seniors (J.J.K.) was formally designated co-ordinator of volunteers. The number of active professional probation officers varied slightly over the 36 month study period because of one resignation, one transfer and three new appointments. Over the course of the study 60 volunteers participated in probation supervision.¹ The office was also responsible for the preparation of presentence reports for the adult courts in Ottawa as well as for provincial parole and adult after-care services. However, the present study was not concerned with the latter roles and duties.

The first participating probationers were assigned in February of 1974 and new probation cases were added to the research

¹ One case was assigned two volunteer officers. The older volunteer was designated the officer for the purposes of the research.

sample through July, 1976. Between February 1, 1974 and December 31, 1974, the office had an intake of 783 probation cases. During the calendar year of 1975, the intake of probation cases was 1,447. The office was in the upper third of Canadian offices in terms of the number of professional officers and the number of clients. (Farmer, Andrews and Kiessling, 1976). In terms of the number of volunteers, the office was in the upper 10 percent of all adult offices in Canada. The office is more fully described by Kiessling (1976).

In addition to the relatively objective indicators above, it appeared clear to the research personnel that the office was well-respected within the Ministry for its competence and professional character, that the research would be supported by regional headquarters and the provincial head office and that the local staff were accepting of a project. It was on this basis that a large scale study was designed.

Summary of the Design

The research was designed to explore the several questions developed in the Introduction. The number of process factors of interest was great and our ability to measure them is as yet untested. Thus, there were no direct attempts to manipulate

process factors in the present study. However, if the volunteer-professional comparisons were to be of value, then as a minimum requirement, probationers had to be assigned to the two pools of officers on a random basis. This was accomplished by assigning eligible probationers to the volunteer or professional pool on the basis of a "flip-of-a-coin". The assignment of probationers to officers within the two major categories followed routine office practice. Thus, the research dictated random assignment and then the measurement procedures were introduced at various points in the course of the probation experience.

The Assignment and Briefing of Probationers

As noted, probationers who met the eligibility criteria were assigned randomly to either volunteer supervision (ie. Volunteer Clients, VC's) or professional supervision (Professional Clients, PC's). The N's were 94 and 96 for the VC's and PC's respectively. The designation of probationer as a PC or VC was the final step in a series of events.

The major factor limiting participation in the research program was the availability of volunteers. Volunteer intake was a continuing process and the designation of probationers as

research participants was tied to the availability of volunteers. Whenever, over the research intake period, two or more volunteers were available to accept new cases, the intake probationers for that given week were screened with reference to specified criteria and, if eligible, invited to a briefing interview with the program co-ordinator (J.J.K.). The pre-briefing criteria were a) a probation period of over six months, b) no evidence of excessive violence which might represent a threat to the volunteer and c) the absence of court recommendations that the probationer be offered professional therapy. Those with probation periods of six months or less were ruled out in an attempt to exclude one obvious group of low risk clients and hence help to avoid one of the traditional problems of evaluation research in probation, ie. the base-rate of in-program failures tends to be so low that between-group or between-treatment differences rarely reach reliable levels. Only two probationers were excluded on the basis of the second criterion and six were excluded on the basis of the third. An otherwise eligible probationer was excluded because available records indicated that he was illiterate and hence could not complete the research scales.

The briefing interview was completed on a one-to-one basis. Probationers were advised that a research program was underway

and that they, along with many others, were being invited to participate. If they agreed to participate, they were advised, they would be asked to complete a set of attitude and personality scales, to complete two taped interviews with their officers and to report by questionnaires on how they viewed their officer and on how they evaluated their probation experience. Confidentiality was stressed: they were advised that their reports would not be made available to the probation office and that even the program co-ordinator (the interviewer) was not going to see individual records. The role of the university based research team was explained. Finally, probationers were advised that in agreeing to participate, they were also agreeing to have their probation officer, a volunteer or a professional, chosen by the results of a "flip-of-a-coin". The results of the research, it was suggested, would help us learn more about how volunteers, professionals and probationers view probation and are influenced by probation. Something might be learned which would make probation better for everyone.

Some care was taken during the briefing interview to make it clear that participation in the research did not change the probation order. The probationer was still responsible to the conditions of probation. However, if assigned to a volunteer,

and if it did not "work-out", then the probationer or the volunteer could ask for a re-assignment. Throughout, the volunteer officers would be responsible to professional officers.

The final step in the briefing interview was to ask the probationer if he wished to participate in the research program. In order to make the probationer's decision as informed as possible, the probationer was advised of the results of the "coin toss" prior to his final decision to participate. This procedure did open-up the possibility of some selection bias, however, client rejections of the program were so few, that such bias did not enter. One hundred and one potential VC's went through the briefing and only four (3.9%) declined to participate while 102 potential PC's were briefed and only five (4.9%) declined. Three of the VC's proved not to be probation cases but rather parole cases and hence the final VC sample was reduced to 94. One potential PC was acquitted on appeal and hence the final PC sample was reduced to 96.

The assignment of PC's to specific officers followed routine office practices. This essentially involved each professional officer receiving consecutive intake probationers in sequence. The assignment of VC's to specific volunteers was a function of

the volunteers available at the time of the probationer's intake. The co-ordinator attempted to avoid matches which involved more than a 10 mile distance between the residences of officer and client. In addition any strong stated preferences of the volunteers were respected. Seventy-five percent of the volunteers had no strong preferences for the kind of case they received. However, among the women volunteers, 28.6% requested clients of the same sex and/or of similar age. One woman volunteer asked that she not be assigned an alcoholic offender. Only two of the male volunteers had strong stated preferences: one explicitly asked for a male client and one explicitly asked that their client not be drug-dependent. Their wishes were respected.

The Recruitment, Screening and Training of Volunteers

The recruitment of volunteers for the one-to-one supervisory role involved three main methods. First, the volunteers in an ongoing juvenile program, as well as the professional staff of the adult office and members of the Advisory Committee, were asked to refer friends and/or acquaintances whom they thought might function well in the adult setting. Secondly, notices were placed in the two local English-language newspapers. Thirdly, the program co-ordinator made specific contacts with churches and organizations working with people at or near retirement age.

Screening. The screening interview was similar in many ways to the client briefing interview in that volunteers were made aware of the research program and of the requests that would be made of them as a result of their participation. The Ottawa Volunteer Program includes a variety of roles for volunteers and hence not all volunteers opted for the role under examination in this report. The co-ordinator described the interview as follows:

.... the candidate is questioned about his own motives for coming into the program. He is judged both on the content of his replies (his creativity) as well as the manner in which he replies (he has an interesting personality). Our first requirement for a volunteer is that he be "creative". By this we mean that he sees merit in a variety of approaches to the problems of offenders, and generally shows an openness and flexibility toward new ideas. The program director deliberately tests the candidate here by asking his opinion of some controversial issues in the correctional field. The candidate will need to have this basic intellectual and emotional flexibility in order to be able to cooperate with others in the program who have ideas and styles of working different than his own. Secondly, he must have an "interesting personality", by which is meant that the program director finds the interview enjoyable and stimulating. Obviously, both of the preceding judgements are subjective, which makes the selection of the screener crucial to the program's success. (Kiessling, Andrews & Farmer, 1976, p. 41).

Preservice Training. The training procedures are documented elsewhere in detail, (Kiessling, Andrews & Farmer, 1976, p. 42 - 44 and Appendix II) including the training manual developed for trainers (Kiessling, Charron, O'Neal, Patten & Lillico, 1975). Briefly, the following principles underlie the content of pre-service training sessions: a) at any one time, the volunteer should work with the probationer on only a few goals; b) there should be a small number of means to these goals; c) the goals and means should be stated in possible versus ideal levels; d) the criteria for the achievement of these goals should be external and objective versus internal and subjective; e) the maximum number of decisions must be left with the offender and f) the good volunteer has a set of values which are clearly and consistently stated and lived. In the second year of the program, the training format was revised in that applicants were assigned immediately to one of the ongoing inservice training and supervisory groups. (See below.)

Inservice training and supervision of volunteers. Each volunteer was assigned to a group led by an experienced volunteer who in turn was monitored and assisted by a professional probation officer. The groups met monthly to discuss the cases being worked with. Volunteers were also expected to contact

their group leader or the associated professional if crises occurred between the regular meetings. Over the course of the project volunteers also participated in, and helped organize, various workshops and social gatherings.

Data Collection Procedures And The Measures

The research operations have been described in detail in a separate CaVIC module (Russell, Andrews & Kiessling, 1977) which, for the reader's convenience is reproduced as Appendix A of this report. A copy of the research orientation manual which was supplied to all volunteers and professionals, is also appended (Appendix B). A brief review of the procedures follows as well as an introduction to the measures.

Biographic Information

The basic bio-social information on all officers and clients included age, sex, marital status, education, occupation, and father's occupation. The Presentence Report or other file material was the source of information on the clients. The source for volunteers was a standard application form (Appendix C) which the professionals also agreed to complete. Information

on the occupations of officers' fathers' was collected late in the program and, it will be noted, was incomplete for a large proportion of the participants.

The Screening Rating of Volunteers (SCTOT)

Immediately following the screening interview, the interviewer rated each volunteer on four items of his own design: sense of humour, emotional flexibility, intellectual flexibility and recognition of own self-interest motives for volunteering. There were three levels for each item: excellent (3), good (2), average (1). An over-all screening rating was computed (SCTOT) by simply summing the scores across the five items for each volunteer. The alpha reliability of the SCTOT index was .95 with a mean of 9.05 (SD = 2.55; n=60).

The Training Rating of Volunteers (TRTOT)

At the end of the four weeks of preservice training, the volunteers were evaluated by their trainers on seven items: works well with groups, focuses on the issues, imaginative/creative, leadership, interesting personality, sense of humour, and maturity. Again each item had three levels: excellent (3),

good (2), and average (1). The alpha reliability of TRTOT (the simple sum of the seven items) was .87, with a mean of 14.23 (SD = 3.98; n=60).

The Indigenous Index for Officer-Client Matches (OINDIG)

The indigenous worker principle is a multi-dimensional one. In some applications it refers to the extent to which the "helper" has experienced the same presenting "problems" as the client, (see Tully, 1977, for a systematic empirical example of such a definition and, of course, the Synanon approach as described by Yablonsky, 1962). We employed attitude scales to tape the "indigenous" dimension in that sense. However, OINDIG reflects the extent to which the officer and client share similar bio-social characteristics. OINDIG was the simple sum of six component scores reflecting officer-client similarity on age, sex, education, marital status, occupational status, and socio-economic status based on father's occupation. Matches in which the age difference was less than 11 years received a score of one and other matches a score of zero; socio-economic status ratings were split at the median and matches which shared the same levels (low or high) were given a score of one; same sex matches were given a score of one; marital status was divided

into two categories (attached - unattached) as were occupational status (blue-collar / white collar) and educational status (high school complete / incomplete) and the matches received a score of one for each element on which they shared the same category.

The over-all mean OINDIG score was 3.05 with a standard deviation of 1.00. The scores could have varied between zero and six, and in fact varied between one and six, with 40.0% of the scores taking a value of three and 5.8% a value of one and 6.3% a value of at least five. There was no reason to expect internal consistency and in fact the alpha reliability estimate was negligible. However the interpretation of the OINDIG scores was obvious, ie. the number of bio-social characteristics on which an officer and client were similar.

Attitude and Personality Measures

The attitude and personality battery was administered to the professionals at the beginning of the volunteer program and again six months later. The battery was administered to the volunteers at the end of their preservice training period and again six months later. The battery was administered to the clients immediately following the briefing interview or as soon after as

possible, and again six months later. Testing instructions stressed confidentiality for all participants.

The battery included 18 paper-and-pencil self-report scales which have been employed in many correctional research projects (Andrews, Daigle-Zinn & Wormith, 1974) as well as the six FIRO-B (Schutz, 1958) indices. The measures share links with several models of counselling and theories of criminal behaviour and may be grouped in various ways depending upon the use being made of them. In the present study, the measures constitute, at different times, predictor variables, control variables, and outcome indices.

Attitudes Toward the Law and Judicial Process (TLCP)
Tolerance for Law Violations (TLV)
Identification With Criminal Others (ICO)

Awareness of Limited Opportunity (ALO)
Alienation (TINP)

Value of Education (EDUC)
Value of Employment (EMPL)

Self-Esteem (SE)
Anxiety (ANX)
Acceptance of Others (ACO)

Hogan Empathy (HEMP)
Gough Socialization (SOC)

FIRO-B Inclusion, expressed (INCLe)
Inclusion, wanted (INCLw)

FIRO-B Control, expressed (CONe)
Control, wanted (CONw)

FIRO-B Affection, expressed (AFFe)
Affection, wanted (AFFw)

Psychopathy (PSYCH)
Neuroticism (NEUR)
Inadequacy-Immaturity (INAD)
Scholastic Maladjustment (SM)
Family Dissension (FD)

Positive Malingering (FAKE)

Appendix D presents the intercorrelations among the attitude and personality battery and compares the officer and probationer samples at pretest. Appendix D is particularly relevant to one of the objectives of the research program, ie. to provide additional validity data on the battery. The battery is also described in more detail in a separate CaVIC module (Andrews & Wormith, 1977).

Miscellaneous Matching Indices

One approach to matching is to consider the simple difference between officer and client scores on various measures. This was done with the basic biographic factors of age, sex, education, occupational status, marital status and SES ratings of father's occupation and with the prescores on the attitude and personality

battery. Education, occupation and marital status were recoded in the same manner as that described for OINDIG.

Schutz (1967) has developed several indices which have been employed in volunteer projects (Mehaffey, 1973, p. 19-22). Reciprocal compatibility reflects the extent to which "an individual's needs may be frustrated if the other person does not satisfy them or if the individual is not able to express his preferred behaviour toward this person". Operationally, reciprocal compatibility with reference to INCL was defined as;

$$r \quad K(\text{INCL}) = | e_o - w_p | + | e_p - w_o |$$

where the subscript o refers to the officer score and p refers to the probationer score. Separate reciprocal compatibility indices were computed for each of INCL, AFF and CON and these were summed to form an overall index. The interchange compatibility index reflects the extent to which there is a great deal of contact (INCL), exchange of affection (AFF) and mutual influence or control (CON). Operationally, it was defined, for the INCL component as;

$$x \quad K(\text{INCL}) = | e_o + w_o | - | e_p - w_p |$$

Again, the overall index was the sum of the component scores

for each set of subscales. The smaller the value, the greater the interchange compatibility.

Officer Role Preferences

The Self-Report on Supervisory Process Scale (SRS), a questionnaire incorporating a variety of item formats, was distributed to the professional and volunteer officers who were active during the 24th month of the project. The questionnaire was completed by 12 professionals and 38 volunteers. The items were constructed to sample content relevant to a Relationship Orientation (SRS-R), an Authority Orientation (SRS-A) and a directive counselling or Active Helping Orientation (SRS-AH).

Some of the items reflected a single orientation, for example, "how important do you think a good relationship is to your client's success?" Other items involved a forced ranking of factors relevant to the different orientation; for example, "which of the following do you consider to be most important to you as a PO? — the friendship of your probationer, your responsibility to the court, being successful as a counsellor..." Additional items requested a ranking of different role descriptions — "friend - friend", "boss - subordinate", "teacher -

student".

A series of item analyses were completed to empirically verify the rational grouping of items. Items were deleted if they did not correlate significantly and positively with the total scores of the set to which they were originally assigned. The item-total correlations for each scale were re-computed until every item remaining in the set related positively and significantly to total scores. The questionnaire and scoring instructions are appended (Appendix E).

Table 1 provides a summary of the psychometric properties of the scales which emerged. SRS-R scores were negatively related to both SRS-A (-.47, $p < .001$) and SRS-AH (-.65, $p < .001$). SRS-A and SRS-AH were positively correlated, .40, $p < .001$. The scales showed at least moderate internal consistency.

Ratings on Process by Trainers and Supervisors of Volunteers

During the 24th month of the program, the trainers and supervisors (the group leaders) were asked by the research staff to rate the volunteers on a three point scale for each of the five dimensions of process. The interview format employed is

Table 1

A PSYCHOMETRIC SUMMARY OF THE SELF-REPORT SUPERVISORY PROCESS SCALES (n=50)

Self-report Supervisory Process Scales	No. of Items	Range of Item-Total Correlations	Mean Item-Total Correlation	Alpha Reliability	Mean	SD	Representative Role best des- cribed as-	Item Content Importance of-
Relationship	5	.44 - .85	.64	.66	6.76	2.68	Friend/Friend	Trust & confidence/ friendship of pro- bationer
Authority	10	.32 - .64	.44	.46	13.98	2.61	Boss/Subordinate	Responsibility to court and community/ discipline imposed on client's life.
Active Helping	5	.36 - .72	.58	.60	7.00	2.88	Teacher/Student Counsellor/Client	Advice on survival skills/intervention on client's behalf/ suggesting alter- natives.

appended (Appendix F). The raters were presented with the names of volunteers and asked to sort them into the three levels for each dimension. The intercorrelations evident in Table 2 suggest at least a moderate degree of inter-observer agreement. Since the supervisors were most privileged with reference to what was happening between volunteers and clients, the supervisors' ratings were employed in the later analyses.

Officer-Reported Social Network

The Social Network Questionnaire (Appendix G) was another of the measures collected during the 24th month. The indices derived from the questionnaire included number of close friends, number of different occupational areas represented by friends, number of different occupational areas represented by acquaintances and number of persons the officer was willing to refer a client to. No reliability estimates were generated for these indices.

Participant Evaluation of Supervision

Mehaffey's (1973) Relationship Questionnaire has several advantages as a measure of participant evaluations. It has been employed in volunteer research, it is short (12 items) and the

complementary forms ask similar questions of both probationers and officers (Appendix H). The scales were to be administered during the second or third week after case assignment and again three months later. Officers and clients completed their forms independently and placed them in separate envelopes upon completion. Again, confidentiality was stressed.

In the present study, responses to the RQ items were grouped into three sets. One set of seven items, the Quality of Relationship scale (QR-RQ) reflected openness, understanding and mutual liking and respect within the relationship. A second set of three items was labelled the Helping scale (H-RQ) and the content directly referred to assistance and help. The third set of two items, Direction (D-RQ), reflected the extent to which the officer took the lead in the relationship and offered the client advice on the "do's and don'ts".

Table 3 presents a summary of the estimates of the reliability of the subscales. With the exception of the officer reports on Direction, the internal consistency estimates were moderate in magnitude and satisfactory. Similarly, there was some temporal stability evident. There was also inter-observer agreement in that the client and officer reports were positively correlated,

Table 2

THE INTERCORRELATIONS AMONG THE INSERVICE SUPERVISORS' RATINGS OF
VOLUNTEERS ON SUPERVISORY PROCESS AND INTERRATER RELIABILITY^a

(n=48)

	Auth.	Anticrim.	PSO	Env. Fac.	Rel.
Authority	.44	.62	.68	.37	.19 (p<.09)
Anticriminal		.52	.59	.33	.33
Problem-Solving			.64	.59	.16 (p<.13)
Environmental Facilitation				.50	.22 (p<.06)
Relationship					.29 (p<.02)

a) The correlation between the trainer and supervisor ratings are presented in the diagonal.

Note: all p's <.01 unless otherwise indicated by a bracketed p value.

Table 3

SUMMARY OF THE RELIABILITY ESTIMATES FOR THE QUALITY OF THE
RELATIONSHIP, HELPING AND DIRECTION SUBSCALES OF THE
RELATIONSHIP QUESTIONNAIRE

<u>THE SCALES</u>	Alpha Reliability (n=112 at Time 1) (n=64 at Time 2)	Case-to-Case Stability ^a (n=25)	Inter-Observer Estimate ^b (n=112 at Time 1) (n=64 at Time 2)	Test- Retest ^c (n=64)	Mean	SD
<u>QUAL. OF REL.</u>						
<u>Client Form</u>						
Time 1	.71	-.12 (ns)	.31	.32	33.76	5.33
Time 2	.68	.65	.41	—	35.28	4.74
<u>Officer Form</u>						
Time 1	.68	.14 (ns)	—	.70	31.77	5.05
Time 2	.74	.65	—	—	33.77	4.79
<u>HELPING</u>						
<u>Client Form</u>						
Time 1	.61	.09 (ns)	.29	.19 (p<.06)	14.32	2.65
Time 2	.60	.66	.29	—	15.02	2.49
<u>Officer Form</u>						
Time 1	.69	-.12 (ns)	—	.56	12.94	2.93
Time 2	.76	.63	—	—	13.98	2.64
<u>DIRECTION</u>						
<u>Client Form</u>						
Time 1	.40	-.01 (ns)	.15	.57	3.90	2.15
Time 2	.68	.30 (p<.07)	.03 (ns)	—	3.71	2.01
<u>Officer Form</u>						
Time 1	-.22 (ns)	.82	—	.49	6.43	1.69
Time 2	.04 (ns)	.63	—	—	6.41	1.73

a) Officer-Based scores for officers with more than one case. (See Text.)

b) Correlations between officer and client forms.

c) Time 1 - Time 2 correlations.

Note: All p's < .05 unless otherwise indicated.

Table 4

INTERCORRELATIONS AMONG SUBSCALES OF THE RELATIONSHIP
QUESTIONNAIRE AT FIRST AND SECOND TESTING FOR
THE OFFICERS AND PROBATIONERS

<u>First Testing</u>			
	Quality of Rel.	H	D
<hr/>			
Officers (n=112)			
QR		.70	.06
H	.61		.04
D	-.06	.08	
<hr/>			
Probationers (n=116)			
<hr/>			
<u>Second Testing</u>			
	Quality of Rel.	H	D
<hr/>			
Officers (n=64)			
QR		.69	-.12
H	.62		.06
D	-.17	.03	
<hr/>			
Probationers (n=64)			
<hr/>			

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1 OF 4

significantly so with all subscales except Direction, but a large proportion of the variances were non-overlapping. Twenty-five officers supervised more than one case and thus it was possible to examine the case-to-case stability. The cases of the 25 officers were randomly assigned to two sets and mean RQ scores were computed for each set. Clearly, by the second testing there was a high degree of stability in how officers rated different clients and how different clients rated given officers. Again, exceptions were evident on the Direction subscales.

Table 4 presents the intercorrelations among the subscales. As might be expected the Relationship and Helping scales were positively correlated. Again, Direction scores behaved differently and were independent of both R and H. Considering Tables 3 and 4, the psychometric summaries suggested a moderate degree of systematic variance in RQ scores. The Direction subscale was an exception and should be interpreted carefully.

The Monthly Report Forms

The MRF (Appendix I) was developed to serve research aims and as well as one way for the supervisors of volunteers to monitor their volunteers' progress. The form was the major source of

data on numbers and types of officer-client contacts. The form was also intended to serve as a source of information on client improvement in the areas of school, employment, family, finances and accommodation. However, the form proved to be too time-consuming for the professional officers and the research staff failed to adequately monitor the actual use of the form by volunteers over the data collection period. We are satisfied with its reliability only in terms of very concrete factors such as number of contacts and then only over the first three months.

Process During the Audio-Taped Sessions

The plan was to audio-tape two sessions. The first occurred within two or three weeks of assignment and the second three months later. Thirty-minute tapes were used but the officers and clients were not instructed on the length of the session. In fact, some officers and clients reversed the tape and continued the taping session for more than 30 minutes. The taped sessions were minimally structured by the research staff: participants were asked to discuss, a) how the client was doing at work or school, b) what the client did for recreation, c) the client's living arrangements, and d) any special problem areas the client would like to discuss. Taping sessions were organized by research staff but staff were not present during the actual taping. Typically, taped sessions involving pro-

professionals were completed at the probation office, while volunteer sessions were completed at the university. Again, confidentiality and responsible handling of the material by the research staff was stressed. (See Appendix A for the procedures employed to ensure anonymity and confidentiality in the handling of data.)

The audio-tapes were the source of our most direct measures of supervisory process. The goal was to develop measures which were theoretically relevant, yet sufficiently concrete and reliable so that they might be employed in the future to train officers in high quality supervisory practices. The next section of the report outlines the measures developed. Note that frequent reference is made to independent raters. By independent raters, we mean raters who were exposed to the same set of instructions and the same tapes but who completed their ratings without consultation. The raters were senior undergraduates for the most part but also included psychologists and sociologists at the MA and PhD levels. All raters were reminded of the sensitivity of the material and of the ethics guiding researchers who have access to privileged material. Raters were blind to the professional status of the officers and unaware of which tapes were also being coded by other raters. Note, however, that it was the experience of the authors (D.A.A. & R.J.R.) that the professional status of officers was obvious within a few minutes of exposure to a tape. Similarly, there was no problem differentiating between the

clients and the officers. The measures developed are outlined in the following section of the report.

Anticriminal. The anticriminal measures were based on a revision of Wormith's (1977) method for scoring patterns of approval and disapproval for prosocial and antisocial statements. Raters were instructed to score client statements as either very positive, positive, negative or very negative with reference to both conventional and legal standards. The definitions of the conventional and legal areas are presented in Appendix J. Raters were instructed to ignore statements which were neutral with reference to conventional and legal standards. If a client's statement was codable in the conventional or legal areas, the officer's response was coded as either highly supportive/praised, supportive/praised, critical/negative, highly critical/negative or neutral. Priority was given to officer statements as feedback. However, if the officer made a statement on the conventional or legal areas which was not judged to be feedback, then such statements were coded as very positive through very negative.

Officer approval of clients' prosocial statements. (with the conventional-legal distinctions collapsed) and disapproval of anti-criminal statements were scored as Appropriate Feedback. Officer approval of antisocial statements and disapproval of prosocial statements were scored Inappropriate Feedback. The Differential Reinforcement Index (DRI) was the ration of Appro-

priate Feedback to Appropriate plus Inappropriate Feedback.

The ratio of officer Positive statements to Positive plus Negative statements was called the Modelling Index (MODI).

Interrater reliability was assessed for 12 randomly selected tapes. Independent raters showed good agreement on DRI (.83) but relatively poor agreement on MODI (.55). An additional problem occurred with MODI; in the case of several tapes, the officers emitted no codable statements. Thus, in view of both questionable reliability and missing values on MODI, DRI was chosen as the primary measure of the anticriminal dimension. Note, however, that DRI and MODI were highly correlated (.66, $n=38$, $p<.005$) suggesting that the estimated reliability of MODI was an underestimate.

Authority. The authority measure was a sub-set of the general Problem Solving Orientation measure described below. High level use of authority (ie. use of the probation contract) reflected explicit and concrete descriptions of the prescribed and proscribed behaviours and explicit and concrete references to the contingent sanctions. The interrater reliability of Authority ratings across a randomly selected sample of 21 tapes was adequate at .78, $p<.005$.

Problem-Solving Orientation. Recall from the introduction that subjective discomfort or dissatisfaction may provide a motivational base for criminal activity but also prevent the natural deterrents to criminal conduct from operating. Thus, a reasonable intermediate goal of correctional programs is the resolution of problems in conventional community settings. An almost infinite number of therapeutic, training and coaching methods are available which purport to represent problem-solving approaches. On the basis of a behavioural perspective adapted from Carkhuff's (1969) stages for implementing a course of action, we assumed that effective methods will share certain characteristics: a) exploration of major areas of adjustment in order to establish the nature and sources of current satisfactions and dissatisfactions, b) approval of current behaviour when there is no evidence of a problem and c) higher levels of problem-solving when there is a problem. Problem-solving activity was monitored over 13 areas of adjustment, including probation (ie. the Authority Dimension noted above). A PSO score was assigned to each of the 13 areas every two minutes. The scale is presented in Appendix K. Low levels of PSO included no mention of a specific area (0), a mere labelling of an area (1) or the initiation of PSO through an exploration of the nature and sources of satisfaction (2). At the higher levels (3 and 4), the officer and

client engaged in a consideration of goals, reviewed concrete descriptions of alternative behaviours, considered the differential utility and consequences of different courses of action, and, at the highest level, reached consensus on goals, alternatives and began implementation planning. When there was no problem evident, the highest level of PSO was evident when officers strongly approved of the clients' activity.

Kennedy (1976) investigated the reliability of the PSO measure by having 21 randomly selected tapes coded by two independent raters. Across adjustment areas the Pearson r was .93. That is, raters showed excellent agreement on which cases were receiving relatively high versus low problem-solving activity overall. The reliability of PSO ratings was also apparent within adjustment areas, with a median value of .87 and a mean of .74. The variability in reliability estimates was attributed primarily to those areas in which only a few PSO responses were made. Thus, with the exception of a few areas, raters showed good agreement on the relative levels of attention given specific areas across tapes. Interrater agreement was also examined across adjustment areas within tapes, on a sample of 10 tapes. The estimates ranged from .61 to .97 with a median and mean of .73. That is, within given tapes, raters showed good agreement on

which areas were being emphasized.

For the purposes of the present study three sets of PSO measures were computed: one set represented the PSO activity in the area of community-social functioning with the areas of Employment, Education, Marital, Family, Accommodation, Financial and Associates collapsed (PSO-COMMUNITY); the second was PSO-RECREATIONAL; and the third was PSO-PERSONAL/EMOTIONAL (with the Personal and Health categories collapsed).

Environmental Facilitation. This measure was concerned with client-system exchange (Russell, 1977). The advocate role involves the officer interceding with significant others on behalf of the client while the broker role involves the officer directing the client to resources in the community. Community resource referrals included referrals to formally organized social service agencies, as well as referrals to, and instructions on how to use, newspapers, income tax services, finance companies, etc. Appendix L presents the Referral to Community Resources scale (RCR). Note that referrals were ordered from zero through to higher level referrals which incorporate specific information, directions and encouragement in the use of the resource. The RCR scores were summed in the cases of 22 tapes

which were independently coded by two raters: the interrater reliability was excellent at .93.

The relationship dimension. While specific labels may vary from theorist-to-theorist, important aspects of interpersonal functioning in counselling situations are thought to be understanding, openness and warmth. Traux and Mitchell, (1971) have reviewed several studies which purport to demonstrate the critical nature of such interpersonal skills in behaviour change settings. Following Carkuff (1969), the Samuels (1975), Bales (1950), and Whalen (1967), Conley (1977) operationalized understanding in terms of the occurrence, or nonoccurrence, within two minute segments of i) oral orienting responses, ii) paraphrasing of substance, iii) reflection/labelling of feelings and iv) asking for, or offering concrete information relevant to the topic being discussed. Openness was operationalized in terms of the occurrence or nonoccurrence of i) personal self-disclosure and ii) impersonal self-disclosure. Warmth was assessed on the basis of the occurrence of i) friendly and ii) unfriendly acts. Interrater reliability across 20 randomly selected tapes varied between .96 (Orienting Response) and .79 (Paraphrasing) with a median of .90 and a mean of 0.8800 (SD = .0595). Interrater reliability with reference to the

Table 5

THE INTERCORRELATIONS AMONG THE MEASURES OF SUPERVISORY PROCESS BASED ON
OFFICER BEHAVIOUR IN THE AUDIO-TAPED SESSIONS (n=48)

	1	2	3	4	5	6	7	8	9	10	11	12
1) Authority		28*	29*	07	-40**	-04	23	-00	-44**	25*	18	-53**
Anticriminal												
2) DR Index			66**	27*	-21	19	06	06	-17	-13	15	-10
3) MOD Index				42**	-39**	19	22	-02	-29*	-10	03	-20
Problem-Solving												
4) Community Focus					13	15	06	-14	05	-04	52**	25*
5) Recreational Focus						-08	-24*	25*	22	18	29*	10
6) Personal/Emotional							08	21	10	13	13	15
7) Environmental Facilitation								-19	-25*	19	04	-27*
Relationship												
8) Active Listening									-10	50**	02	-08
9) Self Disclosure										-02	11	61**
10) Friendly											15	-27*
11) Info												04
12) No. of Segments												

* $p < .05$

** $p < .01$

Note: With the exception of DRI and MODI, the process scores were the sums of scores over two sessions divided by the number of two-minute segments.

assignment of scores to categories within tapes was assessed with a random sample of 10 tapes. The reliability estimates varied from a low of .66 to a high of 1.00 with a median of .89 and a mean of .8950 (SD = .1002).

For analytic purposes, the following Relationship measures were derived: Active Listening (the sum of Paraphrasing and Reflection of Feelings), Self-Disclosure (the sum of Personal and Impersonal Self-Disclosure), Information, and Friendly. The categories of Orienting Response and Unfriendly were deleted because they represented virtual constants — an orienting response was made in nearly every two-minute segment sampled and an unfriendly response was only rarely coded. Raters reported difficulty distinguishing between paraphrasing and Reflection of Feelings and hence Active Listening was treated as a unitary measure. Note as well that there were few instances of personal self-disclosure and that the Self-Disclosure scores reflect impersonal disclosures for the most part. The coding manual, with the problem categories collapsed, is presented in Appendix M.

The combination of the two tapes. Preliminary analyses (Conley, 1977; Kennedy, 1976; Russell, 1977) confirmed that the

temporal stability of the indices was at least minimal and that there was little evidence of systematic change in scores from the first to the second testing. While the reliability data were generally impressive, on a tape-by-tape basis, the decision was made to combine the data from the two taping sessions. Thus, with the indices based on two rather than single sessions, the reliability may be assumed to be even higher than that found during the development of the scales and may be considered more representative of the total supervisory experience.

Intercorrelations among the taped-based measures. Table 5 presents the intercorrelations among the tape-based process measures. The 48 cases represented are the ones to be described in the comparison of volunteer and professional supervision. Authority scores related positively to both DRI, MODI and Friendly but negatively to PSO-Recreation, Self-Disclosure, and length of interview. The anticriminal scores showed a similar pattern of relations but were independent of Friendly and length of interview. Clearly, the division of PSO into three components (four counting Authority) was supported. The three PSO indices did not intercorrelate. Note too that Info related to both PSO-Community and PSO-Recreation. With the exception of length of interview, the five relationship indices were generally independent although Active Listening and Friendly did relate positively.

The Measurement and Analysis of Recidivism

In the present report, recidivism refers to convictions for one or more new offences committed during the probation period. A separate report on a two-year, post probation follow-up is planned. The basic sources of data on in-program recidivism were the files of the probation office, where routine reports from the courts, police, clients, officers and collaborative sources are stored.

Several indices were employed. The basic measure reported in the text was a dichotomy: no evidence of a reconviction and/or not "at large" and formally charged with "failure to report" (zero) versus a reconviction and/or "at large" (one). Three additional indices were the basic dichotomy, excluding technical probation violations, and number of new offences, including and excluding technical probation violations. Separate examination of those predictions which involved the recidivism measures were completed for each of the four indices. There were no substantial differences in the conclusions which would be reached employing any one of the four indices. On this basis, the most meaningful and simple index was reported in the text, ie. no reconvictions versus one or more reconvictions. The

dichotomy has a clear and obvious referent even when parametric tests are employed, ie. the mean score may be directly translated into "the proportion of clients who recidivated".

The recidivism data were also examined with Gendreau and Leipziger's (1969) Canadian revision of the Moberg and Ericson (1972) recidivism outcome index. The index is based on dispositions and hence reflects the seriousness with which the new offence was viewed by the court. Grant's (1975) adaptation of Hooke's (1970) index of the seriousness with which private individuals view specific crimes was also employed.

A crucial question when recidivism rates are compared is the between-group comparability of the time period over which recidivism is monitored. We will see that the PC's and VC's were statistically indistinguishable on length of their probation sentences. They were also similar on the actual length of their probation periods, that is, the PC's and VC's did not differ on the proportion of cases granted early termination of probation. The possibility of VPO's and PPO's making differential use of the early termination option was explored mid-way through the project and equal numbers of VC's (13) and PC's (15) had been granted early termination.

Summary of the Data Collection Procedures and Subject Attrition

Figure 1 presents a summary of the data collection process. Table 6 outlines the number of probationers successfully measured at the various stages of the data collection process. Note first that recidivism data were available on 100% of the probationers; thus, there was no attrition with reference to the major outcome indices. Data on the other measures were less complete: attitude change scores were available on 83% of the probationers, MRF reports on 70%, but RQ scores and complete audio-tapes on less than 60%. Attrition was greatest among the clients of the professionals, particularly on the tape-based and RQ measures. Note in 69% of the cases with incomplete tape data, the reason was coded as "unknown". We expect this reflects a certain proportion of indirect refusals and the difficulties involved in scheduling the efforts of professionals, clients and research staff.

The sample for analyses of tape-based measures. In view of the importance of the tape-based measures, the volunteer and professional tape samples were examined in more detail. We will see that sex of client related to a number of other measures including recidivism. Considering this and the reduced n, atten-

Figure 1

A SUMMARY OF THE DATA COLLECTION PROCESS WITH VOLUNTEERS, PROFESSIONALS AND
PERCENT OF PARTICIPANTS ON WHOM MEASURES WERE SUCCESSFULLY COLLECTED

Data Collection: Procedure/Measure	PARTICIPANTS			% COMPLETE		Comments
	VPO	PPO	Probationers	Off.	Prob.	
Volunteer Application Form	✓	✓	—	100.0	—	
PSR	—	—	✓	—	70.0	
Rating at Screening Interview (SCTOT)	✓	—	—	100.0	—	By co-ordinator of program.
Rating at end of Training (TRTOT)	✓	—	—	100.0	—	By the trainer.
Pretest: Attitudes	In 4th week of training	Prior to assign- ment of 1st con- trol case	Prior to assign- ment to officers	100.0	95.8	Individually or in very small groups (2 - 3).
First Taping Session and RQ Scales	In the 2nd or 3rd week after case assignment			58.9	61.0	Actual period varied from 2 to 5 weeks.
Monthly Report Forms	Due at end of each month			—	70.0	Employed in 1st 3 months only.
Second Taping Session and RQ Scales	Three months after the first taping session			33.7	33.4	Actual period varied from 3 to 5 months.
Posttest: Attitudes	Six months after pretest			97.6	83.2	Actual period varied from 6 to 9 months.
End of Probation Period	—	—	Recidivism Outcome index, No. of new convictions, any re- convictions (Yes, No)	—	100.0	
SRS (Role Preferences)	At 24 months of program			67.6	—	
Social Network Questionnaire	At 24 months of program			63.3 ^a	—	
Trainers Ratings on Process Measures	At 24 months	—	—	86.0 ^a	—	
Supervisors Ratings on Process Measures	At 24 months	—	—	80.0 ^a	—	

a) Voluntary Probation Officers (VPO's) only.

Table 6

THE NUMBER OF PROBATIONERS PARTICIPATING AT VARIOUS STAGES OF THE DATA COLLECTION PROCESS
BY THE PROFESSIONAL STATUS OF THEIR OFFICERS

	Professional Sample		Volunteer Sample		Total Sample	
	f	% of Max. N	f	% of Max. N	f	% of Max. N
Maximum N	96	100.0	94	100.0	190	100.0
Officers MRF for 1st 3 Months	65	67.7	68	72.3	133	70.0
Attitude and Personality Battery						
At pretest	90	93.7	92	97.9	182	95.8
Both pre and posttest	73	76.0	85	90.4	158	83.2
Two Taped Sessions	32	33.3	64	68.1	96	50.5
Reason For Incomplete Tapes						
Client refusals	7	10.9 ^a	2	6.7 ^a	9	9.6
Client transfered out of area	2	3.1	1	3.3	3	3.2
Breach/Jail	6	9.4	5	16.7	11	11.7
Mechanical Failure	3	4.7	3	10.0	6	6.4
Change of Officer	2	3.1	13	43.3	15	16.0
Unknown	44	68.7	6	20.0	50	53.2
At Least One RQ Score Completed ^b	32	33.3	78	83.0	110	57.9
Recidivism Measures	96	100.0	94	100.0	190	100.0

a) % of total incomplete tapes (n=64 for PC's; n=30 for VC's)

b) Only 7 RQ's were completed by professionals at the second testing versus 32 within the volunteer sample.

tion was focused on male clients exclusively. The analyses were based on the complete set (n=24) of male clients who completed two taping sessions with their professional officer and a random sample of 24 male clients of volunteers. The VC and PC samples were comparable on age, previous criminal history and the major personality factors of SOC, HEMP and ICO. Note that the attitude and personality factors, as presented in Table 7, were split at the median for purposes of later examination of Type of Treatment X Type of Client interactions. Comparisons of the values with those reported in Appendix D suggest that the sub-samples were also representative of their respective total samples. Similarly the eight PPO's and 21 VPO's represented in the tape samples were comparable on age, sex, HEMP and SOC. The difference between the PPO's and VPO's on ICO reflects that which was apparent at pretest with the total samples (Chapter III). The VPO tape sample does include a smaller proportion of female officers than was represented in the total VPO sample; recall that some female volunteers did request female probationers and hence the exclusively male client sub-sample includes a greater proportion of male officers. Finally, the greater variability in VPO age relative to PPO age reflects the greater representation of VPO's at both extremes of the age distribution to be reported in Chapter III. We feel

Table 7

PROBATIONERS AND OFFICERS IN THE AUDIO-TAPE SAMPLE BY
PROFESSIONAL STATUS OF OFFICER

	PC's (n=24)	VC's (n=24)
Mean Age	21.33 (SD = 6.10)	20.71 (SD = 7.27)
% With Previous Offences	29.2	25.0
% Above Client Median on		
SOC	59.1 (n=22)	50.0
HEMP	27.3 (n=22)	50.0
ICO	50.0 (n=24)	62.5

	PPO's (n=8)	VPO's (n=21)
Mean Age	34.62 (SD = 8.79)	34.48 (SD = 13.07)
% Male	50.0	58.3
% Above Officer Median on		
SOC	50.0	61.9
HEMP	62.5	57.1
ICO	75.0	47.6

confident that the clients and officers included in the tape-based samples were representative of the respective total samples.

The Comparability Of The VC And PC Groups

The VC's and PC's were compared by analyses of variance on 14 metric indices derived from the presentence report, and on the 24 attitude and personality scales (pretest scores). They were compared on an additional 55 socio-historical variables in a series of cross-tabulations. The latter variables were, for the most part, those developed by Grant (1975).

Statistically significant differences ($p < .05$) were rare. Relative to the VC's, a greater proportion of the PC's were married and/or cohabiting ($\chi^2 (1) = 10.15, p < .02$) and fewer had committed previous offences of the same type for which they were presently on probation ($\chi^2 (1) = 3.69, p < .05$). The meaning of the latter difference is obscure but the former difference signals a lower probability of recidivism among the PC's. However, the PC's scored lower on Blishen's (1968) SES ratings of father's occupation than did the VC's, 40.96 (12.61) versus 45.98 (14.87), $F (1/126) = 4.28, p < .04$. This finding suggests that the PC's,

as a group, have a higher probability of recidivism. With controls introduced for sex (a factor) and age (a covariate), there was little evidence that the PC's and VC's differed on pretested attitudes and personality. The PC's had a slightly higher mean Self-Esteem score ($p < .04$) and also showed a slightly greater tendency to fake "good" ($p < .05$) on FAKE. Correctional lore would suggest that the PC's as a group have a lower probability of recidivism on the basis of the trend of self-esteem. Overall there was simply no consistent evidence to suggest that the groups were anything but comparable at pretest.

The special problem of random assignment versus receipt of assigned treatment. A traditional problem in field experimental research is that randomized group designs lose their integrity when participants assigned to a specific treatment do not in fact receive treatment. See Berger et al. (1975) for an example of an ambitious and well-designed study rendered uninterpretable because of this problem. The OCCVP evaluation also had to face the problem. Twenty-four of the 94 VC's were transferred to a professional probation officer before the end of the regular probation period. There were various reasons for such transfers: a few volunteers were "fired" for failure to report to their supervisors, several were hired by correctional agencies and/or

withdrew upon entering graduate school in criminology, and, others were shifted because of "incompatible" matches. Our decision was to maintain the integrity of random assignment and not to exclude the 24 cases from the study nor to separate them from the other VC's for purposes of the analyses. Note from Table 6 (the "Change of Officer" row) that 13 of the re-assignments had occurred prior to the second taping session. Seven of the 24 (29.2%) were reconvicted for a new offence during the probation period; this rate is slightly, but nonsignificantly greater than the overall figure to be reported in the results sections of this report.

A Preliminary Look at the Probationers

The probationers are fully described in Appendix D through comparisons with the officers. Similarly, the volunteer and professional officers are compared in Chapter III. Here, we present a basic description of the 190 probationers in the study, the 149 men (78.4%) and 41 women (21.6%) with an overall mean age of 21.17 years (SD = 6.34). The mean length of probation was 14.55 months (SD = 5.00) with 140 (73.7%) having received a sentence between six to twelve months and 30 (15.8%) a sentence of 24 or more months. Just over 70% were convicted for a

property offence, typically Break and Enter, Theft and some variation of theft of auto. Less than 10.0% were convicted for offences against persons (assault/robbery) and just over 12% for offences involving drugs. One-hundred and fifteen (61.8%) of the probationers were first offenders and, among the previous offenders, 27 (44.3%) had been previously convicted for more than one offence.

CHAPTER III: A COMPARISON OF VOLUNTEERS AND PROFESSIONAL
OFFICERS ON BIOGRAPHY AND ATTITUDES

As suggested in the introduction, an exciting variety exists in the rationales governing voluntary action and voluntary action research. The major interest of OCCVP was to compare volunteer and professional probation supervision in terms of process and outcome. However, in so doing a number of other aspects of voluntary action emerge. For example, the opportunity was taken to compare officers and probationers on a number of variables relevant to criminal conduct (Appendix D). In this chapter, and with the same set of variables, we compare the volunteer and professional probation officers.

A comparison of the volunteers and professionals directly speaks to a set of broad political rationales for citizen participation in mental health and corrections. In the wider context, voluntary action is seen as an affirmation of democratic ideals (Kiessling, 1975) and as a response to the isolation of public agencies from the communities they were established to serve (CCCA, 1977).

The aspect of this rationale investigated in this chapter is whether the involvement of citizen volunteers creates a more

heterogeneous agency, one reflecting a wider variety of backgrounds, experiences and interests among its workers.

Comparisons of volunteer and professional workers also relate to another rationale for volunteer programming — the notion that with a more heterogeneous worker pool, opportunities for therapeutic matching of worker and client increase. Scheier et al. (1973) have stated this idea most explicitly when they suggested that, for the first time, the possibility exists to match every client with the most appropriate worker.

Before reviewing the results of the comparisons, it should be noted that the findings are not necessarily generalizable to other programs. Clearly, many of the characteristics of the workers are directly subject to an agency's specific policy and practice regarding the recruitment and screening of both volunteer and professional officers. The comparisons do serve to establish the extent to which the intermediate goal of increased heterogeneity among officers was achieved in OCCVP.

Comparisons on Basic Biographic Factors

Over the period of the study there was a four-fold increase

in the number of workers involved in one-to-one probation supervision: sixty volunteers were added to a professional staff of 14 officers. The data indicate that the introduction of volunteers not only represented a simple increase in numbers but was also associated with reliable, and in some cases large, changes in the biographic picture of the office. Table 8 presents the distributions for age, sex, education, marital status and social class as indexed by Blishen's (1968) ratings on father's occupation. Table 8 also includes a summary of the current occupational status of the volunteers.

Table 9 presents a summary of the correlations between the biographic factors and the professional status of the officers. The volunteers were younger, had less formal education, were less likely to be married and included a greater proportion of women. The age effect was only evident among the male officers while the sex effect was found only among the older officers. The differences in education and marital status between the volunteers and professionals were evident with both male and female officers and with both the younger and older samples.

The volunteers and professionals did not differ on the socioeconomic status ratings on father's occupation. However, when

Table 8

BIOGRAPHIC CHARACTERISTICS OF THE VOLUNTEER
AND PROFESSIONAL PROBATION OFFICERS

	Professionals (n=14)		Volunteers (n=60)	
	f	%	f	%
<u>Age (yrs)</u>				
16-19	0	0.0	3	5.0
20-29	3	21.4	29	48.3
30-39	4	28.6	13	21.7
40-49	7	50.0	9	15.0
50 plus	0	0.0	6	10.0
<u>Sex</u>				
Male	9	64.3	25	41.7
Female	5	35.7	35	58.3
<u>Education</u>				
Grade 10 or less	0	0.0	3	5.0
Grades 11-13	0	0.0	11	18.3
Any Post Secondary	13	100.0	46	76.7
<u>Marital Status</u>				
Single	1	7.1	21	35.0
Separated/Divorced	0	0.0	7	11.7
Widowed	1	7.1	1	1.7
(Unattached)	(2)	(14.2)	(29)	(48.4)
Married	12	85.8	29	48.3
Common Law	0	0.0	2	3.3
(Attached)	(12)	(85.8)	(31)	(51.6)
<u>Socio-Economic Background</u>				
39 or less	1	14.3	5	18.5
40-49	3	42.9	9	33.3
50-59	2	28.5	6	22.2
60 or more	1	14.3	7	26.0
<u>Occupation</u>				
Student	—	—	7	11.9
Labourer	—	—	4	6.8
Housewife	—	—	8	13.5
White Collar	—	—	14	23.7
Supervisor, Manager, Prof.	14	100.0	26	44.1

Table 9

1
THE CORRELATIONS BETWEEN PROFESSIONAL STATUS OF
PROBATION OFFICERS AND THE BIOGRAPHIC FACTORS

	Age	Sex	Marital	EDUC	SES ²	OCCUP ³
Total Sample (n=74)	25***	-18*	27***	23**	04	38***
Male officers (n=34)	41***	—	27*	29**	-29	34**
Female Officers (n=40)	00	—	23*	17	20	39**
Officers under 30 yrs of age (n=35)	—	21	15	14	-25	37**
Officers 30 yrs plus (n=39)	—	-29**	27**	31**	04	31**

1) Kendall's Tau B: APO-PPO X Age (Under 30 years - 30 years plus), X Sex (Male-Female), X SES (Under Blishen 50 - Blishen 50 plus), Occupation (Labourer and White Collar - Supervisors, Managers, Professionals), Marital (Unattached - Attached), Education (Grade 13 or less - Some Post Secondary).

2) SES based on Blishen (1968) ratings of father's occupation. The overall n for this test is only 34.

3. The student and housewife categories were deleted for the purpose of this analysis.

* $p < .10$; ** $p < .05$; *** $p < .01$

current occupations were ranked on the basis of Supervisory, Management and Professional versus Labourer and White Collar, it became obvious that the socio-economic distribution of the office changed with the introduction of the volunteers. Many of the volunteers were coming from lower status occupational groups — an important finding if an intermediate goal of volunteer programs is to incorporate a greater range of workers. As noted, such was also the case with each of age, sex, education and marital status. With the exception of sex and father's socio-economic status, it was clear that the volunteers were more like the client group in social background than were the professionals — an important finding if an intermediate goal is the establishment of a set of workers more indigenous to the client sample. (See Appendix D for the comparison of officers and probationers.)

The Social Network of Volunteers and Professionals

The indices of social network were officer reports on number of close friends, the number of different occupational areas represented by one's friends, the number of different occupational areas represented by one's acquaintances, the number of persons one would feel free to approach for help or assistance and the

number of persons one would be willing to refer a client to. Overall, the professionals had a wider social network than the volunteers (Table 10). The professionals reported a greater number of close friends, their acquaintances were drawn from a greater number of occupational areas and, just approaching conventional levels of statistical significance, they knew more persons to whom they would be willing to refer a client ($p < .06$). Interestingly, the professionals did not report that their close friends encompassed a wider range of occupational areas. In fact, among the male officers, the close friends of the volunteers were tending to be drawn from a wider range of occupations ($p < .06$).

Supplementary analyses were completed to examine which specific occupational areas were differentially represented by the volunteer and professional officers. More of the volunteers had acquaintances involved with the construction industry than did the professionals ($p < .05$). That was the only statistically significant difference across occupational areas.

The Attitudes and Personality of Volunteers and Professionals

As was the case in the officer-client comparisons in Appendix

Table 10

SOCIAL NETWORK AND THE PROFESSIONAL STATUS OF OFFICERS BY
OFFICER SEX AND OFFICER AGE: KENDALL TAUS

	No. of Friends	No. of Diff. Occu. Rep. By Friends ¹	No. of Friends In Same Line Of Work ²	No. of Diff Occup. Rep. By Acq. ³	No. of Persons Able To Go To For Help ⁴	No. of Persons Willing To Make A Referral To ⁵
Total Sample	.30**	.03	.06	.26**	.08	.20*
Male Officers	.21	-.36*	.11	.23	.06	.13
Female Officers	.37**	.20	.04	.21	.11	.25*
Younger Officers (29 yrs or less)	.25*	.18	.07	.01	-.23*	.14
Older Officers (30 yrs or more)	.37**	-.14	.16	.42**	.02	.24*

- 1) Number of different occupational areas represented by friends.
- 2) Number of friends in the same line of work.
- 3) Number of different occupational areas represented by acquaintances.
- 4) Number of persons able to go to for help.
- 5) Number of persons willing to make a referral to.

* $p < .10$; ** $p < .05$

D, age and sex were introduced as control variables in the analyses of variance in the attitude and personality scores of the volunteer and professional officers. Sex was introduced as a factor and age as a covariate. (See Appendix D, p. 17-19, for a discussion of the interpretation of multiple classification analyses.) Table 11 presents the Multiple Classification Analyses for those tests which yielded statistically significant ($p < .05$) effects. No volunteer-professional comparisons other than those presented in Table 11 were statistically significant. Note that, as footnoted, certain differences were evident only with male officers and others only among the female officers.

Criminal orientation. There was evidence that the VPO's and PPO's differed in their attitudes toward the criminal justice system (TLCP) and toward offenders (ICO) but not in their acceptance of arguments for law violations (TLV). For not obvious reasons, the differences depended upon the sex of the officers. Male PPO's presented significantly more negative scores on TLCP than did the male VPO's. The same trend was evident among the women officers but the effect did not reach statistical significance. However, the female PPO's presented significantly higher scores on ICO than did the female VPO's. The effect did not reach statistically significant levels among

Table 11

A COMPARISON OF VOLUNTEER AND PROFESSIONAL PROBATION OFFICERS ON PRETESTED
ATTITUDES AND PERSONALITY: MULTIPLE CLASSIFICATION ANALYSIS

Scale	Grand Mean	Unadjusted Deviations			Adjusted Deviations For Age And Sex		Beta	Mse	F	p
		PPO	VPO	Eta	PPO	VPO				
TLCP ^a	93.65	-4.22	1.59	.263	-5.41	1.95	.322	75.68	4.68	.04
ICO ^b	17.12	4.67	-.67	.455	4.70	-.67	.457	12.23	10.33	.003
ALO	17.63	2.01	-.47	.342	1.97	-.46	.336	7.53	8.58	.005
ANX ^b	5.10	-3.70	.53	.385	-3.66	.52	.381	10.70	7.16	.01
CONe	2.04	1.03	-.22	.269	.84	-.18	.217	3.06	3.44	.07
CONw	3.25	1.29	-.28	.302	1.03	-.23	.241	3.40	4.70	.04
NEUR ^b	5.77	-2.57	.37	.344	-2.55	.36	.340	7.07	5.26	.03

a) Men only. Significant ($p < .05$) Officer X Sex interaction. PPO-VPO differences not significant among the women.

b) Women only. Significant ($p < .05$) Officer X Sex interaction. PPO-VPO differences not significant among the men.

the men. The findings, with the exception of the sex effect, are striking in their resemblance to the findings from the community mental health area in terms of the effects of volunteers' participation in a psychiatric hospital, ie. more positive attitudes toward clients and more negative attitudes toward the settings (Rappaport, Chinsky & Cowen, 1971). The results also recall the differential association hypothesis adopted by Andrews, Brown and Wormith (1974) for their analysis of volunteer participation in prison-based group counselling programs. That is, the VPO-PPO differences are what would be expected in terms of their differential exposure to criminal others. It appears that the volunteers do enter the probation office with a perspective on criminals and criminal justice which is more anticriminal and more prosocial, or more prosystem, than that of the professionals. In group counselling programs, such a perspective on the part of volunteers has signaled positive impact on clients (Andrews, Brown & Wormith, 1974; Berger, et al., 1975). However, in the case of one-to-one supervision, the signs are mixed. Berger et al. (1975) report that volunteers with relatively less respect for the law were more successful over six months while those high on respect for the court tended to have been more successful with their clients at a 12 month follow-up.

Conventional success orientation. The VPO's and PPO's did not differ reliably in their pretested Attitudes Toward Education or Employment.

Alienation. Two measures of alienation were included in the battery. One measure incorporates items largely to do with a personal sense of isolation, powerlessness and normlessness (TINP). The VPO's and PPO's did not differ on that measure. On the second measure, Awareness of Limited Opportunity, the PPO's presented significantly higher scores than did the VPO's. The ALO items are less personalized than the TINP items in that they refer to "a person" rather than "I". We expect the difference reflected the PPO's greater exposure to persons (ie. the clients) who present objective evidence of the limitations in the opportunity structure. It appeared that the volunteers did enter the program with more positive expectancies for their clients than those the professionals held.

Personal adequacy. Of some assumed importance in one's ability to help is one's own sense of personal worth and freedom from discomfort. The VPO's and PPO's did not differ reliably on mean pretested Self-Esteem but the VPO sample did present significantly greater variation in their scores, 8.93 (PPO)

versus 16.55 (VPO), Bartlett Box $F = 6.70$, $p < .009$. Note that this was the only scale on which the variability of scores varied between the VPO and PPO groups. Among the women, the PPO's scored significantly lower than VPO's on Anxiety. No such effect was evident among the men.

Interpersonal orientation. The two samples of PO's did not differ reliably on Acceptance of Others. Similarly, they did not differ on the FIRO-B indices of affection (expressed or wanted) or inclusion (expressed or wanted). Differences were evident on the FIRO-B control indices. The PPO's of both sexes reported a greater wish to be controlled than did the VPO's. A complementary effect on expression of control approached conventional levels of significance ($p < .07$).

Empathy and socialization. There was no evidence that the VPO's and PPO's differed on their sensitivity to the needs, wishes and feelings of others (HEMP) or sensitivity to social rules and conventions (SOC).

Personality dimensions of delinquency. Generally, the VPO's and PPO's could not be distinguished on the basis of the Quay dimensions of PSYCH, INAD, SM, and FD. An exception occurred

among the women on the Neuroticism scale and this finding replicates the Anxiety differences noted above. The women VPO's presented significantly more evidence of neurotic symptoms than did the female PPO's.

Summary

The introduction of volunteers resulted in a four-fold increase in the number of one-to-one officers and changed the biographic picture of the office through an increase in the number of officers under 30 years of age and the number of women officers. As a group, the volunteers had less formal education and fewer were married relative to the professionals. The volunteers and professionals did not differ overall in terms of the socio-economic status of their parental families but, as is deliberately planned in many programs, many were from current occupational ranks below that of professional probation officers. The complexity of the recruitment problem was underscored by the finding that, although the volunteers were more heterogeneous in terms of bio-social characteristics, their social networks were more limited than those of the professionals. The professionals reported a significantly greater number of close friends and a significantly greater

number of contacts with potential resources in terms of the range of occupations in which their acquaintances were involved. The implications of these findings for styles of supervision and ultimate impact on the clients will be examined in later sections. In terms of biography, it appears that the volunteers are more similar to the clients than are the professionals. This may well indicate that facilitative interpersonal relationships may be more readily established between volunteers and their clients than among the professionals and their clients. However, the professionals may be in a position to make more effective use of community resources.

In terms of attitudes, the volunteers were more anticriminal than the professionals and showed less of an awareness of limitations in the opportunity structure. Such differences are consistent with the common assumption that volunteers bring a fresh and optimistic perspective to their work. Comparisons also revealed that expected role differences between volunteers and professionals in terms of an authority orientation were also apparent, and unexpectedly, at the personality level. The professionals were more oriented toward interpersonal control. Among the women officers, there was also evidence that the professionals were more personally secure than the volunteers.

There was no evidence that the volunteer and professional samples differed at the trait level in their general acceptance or concern for others.

CHAPTER FOUR: A COMPARISON OF VOLUNTEER AND PROFESSIONAL
SUPERVISION ON PROCESS AND OUTCOME

Chapter Three revealed differences between volunteers and professionals at the biographic and trait levels. In this section, the differences on more direct measures of process are reviewed. Chapter Five presents summaries of the intercorrelations evident among the various process measures for those readers who may be interested in additional validity data.

Process

Role Preferences

Table 12 presents a summary of the volunteer-professional comparisons on the Relationship Authority and Active Intervention subscales of the SRS. Clearly, and as predicted on the basis of the structural analyses, the volunteers scored higher on the Relationship measure and lower on the Authority measure than did the professionals. The volunteers also scored lower on the Active Helping scale, suggesting that they were less likely to see themselves as instructors or counsellors. In a discriminant analysis, 92.0% of the officers were correctly assigned to their categories simply on the basis of SRS scores.

Table 12

OFFICER ROLE PREFERENCES ON THE SELF-REPORT OF SUPERVISORY PROCESS SCALES: A UNIVARIATE AND STEPWISE DISCRIMINANT ANALYSIS OF VOLUNTEER AND PROFESSIONAL PREFERENCES

SRS Scale	Professional Sample (n=12)		Volunteer Sample (n=38)		F	p	Standardized Discriminant Func- tion Coefficient
	Mean	SD	Mean	SD			
Authority	16.08	2.75	13.32	2.22	12.65	.0000	-.31014
Action Inter- vention	9.75	2.26	7.63	2.49	19.99	.0000	-.38182
Relationship	4.00	2.33	7.63	2.15	25.01	.0000	.50993

Canonical Correlation = .6471; Wilks' Lambda = .58120; $\chi^2(3) = 25.23, p < .000$

Percent of PPO's correctly classified = 75.0%

Percent of ~~PO~~'s correctly classified = 97.4%

Percent of cases correctly classified = 92.0%

Probationer and Officer Evaluations of Process

Table 13 presents a summary of the client and officer reports on the three subscales of the Relationship Questionnaire. The tabled values are the means and standard deviations of the means of first and second testings for each available case. The reader will note that we are reporting on the complete sample of RQ scores available but that it, in fact, represents only half of the original 190 cases. The volunteer and professional samples differed in expected ways on both officer and client reports of Quality of Relationship, i.e. the volunteers and their clients reported more open and warm relationships than did the professionals and their clients. The clients of the volunteers also reported receiving more assistance and help. Surprisingly, although the psychometric worth of the Direction subscale was suspect, the volunteer and professional samples did not differ on perceived Direction. While the predictions on the relationship indices were supported, the differences were not large. The discriminant analysis correctly assigned only 70.0% of the cases — 70.9% could be correctly assigned simply by assuming that all cases were supervised by volunteers.

Frequency of Contact

The Monthly Report Forms on 127 cases (66.8%) were suf-

Table 13

PROBATIONER AND OFFICER REPORTS ON THE RELATIONSHIP QUESTIONNAIRE:
A UNIVARIATE AND STEP-WISE DISCRIMINANT ANALYSIS OF
VOLUNTEER AND PROFESSIONAL SUPERVISION

Subscales of the Relationship Questionnaire	Professional Sample (n=32)		Volunteer Sample (n=78)		F	p	Standardized Discriminant Function Coef- ficient
	Mean	SD	Mean	SD			
<u>Client Reports</u>							
Qual. of Rel.	32.52	6.05	34.51	4.19	3.90	.05	_____
Help	13.53	3.43	14.76	1.99	5.49	.005	-.62555
Direction	3.87	1.68	3.76	1.96	<1.0	ns	_____
<u>Officer Reports</u>							
Qual. of Rel.	30.50	3.84	32.67	4.94	4.92	.001	-.55923
Help	12.59	2.80	13.33	2.53	1.82	.11	_____
Direction	6.66	1.39	6.34	1.51	1.05	.40	.41244

Canonical Correlation = .2948; Wilds' Lambda = .91311; $\chi^2(3) = 9.68, p < .02$
 Percent of PC's correctly classified = 9.4%
 Percent of VC's correctly classified = 94.9%
 Percent of cases correctly classified = 70.0%

ficiently complete to permit an examination of frequency, duration and types of contacts over the first three months of supervision. The comparisons are summarized in Table 14. Note first that professional supervision was much more standard than volunteer supervision; there was little variability from case-to-case in frequency and duration of contacts within the professional sample. Secondly note the magnitude of the differences between the means of the two samples. Relative to the clients of the professionals, the clients of the volunteers were seen in person twice as often, contacted by telephone some four times as often and their contacts were six times longer. While the professionals contacted their clients at the probation office, the volunteers saw their clients in their homes, in the homes of their clients and in other places which, according to the verbal reports of volunteers, included restaurants, theatres, bowling-alleys etc. The differences were so large that 92% of the cases could be correctly assigned to the professional or volunteer samples simply on the basis of the measures.

A major aspect of volunteer supervision is presumed to be the relative freedom of the volunteer to engage in contacts with significant others. This was clearly the situation in all

Table 14

FREQUENCY, DURATION AND TYPE OF CONTACTS OVER THE FIRST THREE MONTHS:

A UNIVARIATE AND STEP-WISE DISCRIMINANT ANALYSIS OF

VOLUNTEER AND PROFESSIONAL SUPERVISION

Control Measure	Professional Sample (n=65)		Volunteer Sample (n=62)		F	p	Standardized Dis- criminant Function Coefficient
	Mean	SD	Mean	SD			
<u>Contacts With Clients</u>							
In Person, No.	4.49	2.09	10.28	5.42	64.92	.0000	.35103
Telephone, No.	2.41	2.63	10.68	10.67	36.79	.0000	_____
Other ways, No.	.00	.00	.31	1.55	2.59	.06	_____
PO Initiated, No.	5.29	3.17	11.82	6.95	47.92	.0000	_____
Client Initiated No.	1.51	1.90	6.32	7.90	22.89	.0000	_____
PO's Home or Office No.	4.25	1.90	3.60	4.78	1.62	ns	-.16664
Client's Home, No.	.25	.85	4.00	3.82	60.02	.0000	.38702
Other Place, No.	.11	.56	2.94	3.16	50.80	.0000	.27620
Hours	3.06	2.33	19.85	15.69	72.92	.0000	.24396
<u>Contacts With Sig- nificant Others</u>							
Family, No.	.72	1.91	2.41	2.11	23.36	.0000	.26716
Employer, No.	.18	.52	.18	.52	<1.00	ns	-.09184
School Officials, No.	.03	.17	.16	.68	2.25	.01	.09615
Police, No.	.06	.24	.01	.12	2.01	.03	-.17572
Others, No.	.71	1.35	1.59	3.36	3.86	.0000	-.39111
Hours	.75	.81	3.71	4.36	28.76	.0000	_____

Canonical Correlation = .7981; Wilks Lambda = .36297; $\chi^2(10) = 127.694$ $p < .000$

Percent of PC's correctly classified = 98.5%

Percent of VC's correctly classified = 85.3%

Percent of Cases correctly classified = 91.73%

categories but contacts with employers and the police.

Process During the Audio-Taped Sessions

Tables 15 and 16 present the comparisons over the five dimensions of supervisory process. Note that the two audio-taped interviews involving the volunteers' cases lasted a total of more than fifty minutes on average (Table 15). The two audio-taped sessions involving the cases of the professionals lasted a total of just under thirty-five minutes on average. The differences in duration of contact were evident even during the audio-taped sessions and those differences were given most weight in the discriminant analysis. Table 15 presents the Authority, Problem-Solving, Environmental Facilitation and Relationship indices corrected for length of interview, ie. the respective sums divided by total number of two-minute tape segments. Table 16 presents the same scores uncorrected for length of interview.

As predicted, use of Authority was greatest in the professional sample while two of the relationship indices, total Self-Disclosure and Friendly, were greatest in the volunteer sample (Table 16). Neither Info nor Active Listening reliably discriminated between

Table 15

OFFICER BEHAVIOUR DURING THE AUDIO-TAPED SUPERVISORY SESSIONS: A UNIVARIATE AND STEPWISE
DISCRIMINANT ANALYSIS OF VOLUNTEER AND PROFESSIONAL SUPERVISION
(ADJUSTED FOR LENGTH OF SESSIONS)^a

Supervisory Process Measures	Professional Sample (n=24)		Volunteer Sample (n=24)		F	p	Standardized Discriminant Func- tion Coefficient
	Mean	SD	Mean	SD			
Authority	.75	.45	.21	.20	29.13	.0000	.51611
Anticriminal							
Diff. Reinf.	.95	.11	.86	.21	3.47	.02	_____
Modelling (n=33)	.97	.12	.79	.34	4.19	.0001	_____
Problem-Solving							
Community Focus	1.05	1.40	2.48	.79	3.07	.02	.34195
Recreational Focus	.25	.38	.54	.46	5.62	.0004	-.28725
Personal/Emotional Focus	.42	.51	.21	.48	2.14	.07	.25298
Environmental Facilitation	.26	.42	.14	.26	1.39	.23	_____
Relationship							
Active Listening	.30	.25	.30	.24	<1.00	ns	.22197
Self-Disclosure	.25	.24	.40	.31	3.38	.003	.28633
Friendly	.25	.20	.23	.19	<1.00	ns	-.34694
Info	.84	.23	.71	.20	4.19	.0003	.18928
No. of Segments	17.08	10.08	25.33	7.83	10.02	.003	-.61903

Canonical Correlation = .7827; Wilks' Lambda = .38744; $\chi^2(9) = 39.35$, $p < .000$
 Percent of PC's correctly classified = 83.3%
 Percent of VC's correctly classified = 87.5%
 Percent of cases correctly classified = 85.42%

a) With the exception of DRI and MODI, the process scores were the sum of scores over two minute segments divided by number of two-minute segments.

Table 16

OFFICER BEHAVIOUR DURING THE AUDIO-TAPED SUPERVISORY SESSIONS: A UNIVARIATE AND STEPWISE
DISCRIMINANT ANALYSIS OF VOLUNTEER AND PROFESSIONAL SUPERVISION
(UNCORRECTED FOR LENGTH OF SESSIONS)

Supervisory Process Measures	Professional Sample (n=24)		Volunteer Sample (n=24)		F	p	Standardized Discriminant Func- tional Coefficient
	Mean	SD	Mean	SD			
Authority	10.87	8.17	5.04	4.65	9.24	.0004	.75437
Problem-Solving							
Community Focus	60.62	83.25	62.33	27.33	<1.00	ns	_____
Recreational Focus	5.75	16.11	11.79	8.70	2.61	.04	_____
Personal/Emotional Focus	8.71	14.11	6.29	15.79	<1.00	ns	.52602
Environmental Facilitation	3.58	4.65	3.21	5.00	<1.00	ns	_____
Relationship							
Active Listening	5.12	4.81	7.17	5.55	1.86	.09	-.36757
Self-Disclosure	5.67	10.20	11.37	11.02	3.47	.002	_____
Friendly	3.58	2.64	5.67	4.17	4.28	.003	-.49526
Info	12.25	15.05	17.75	6.89	<1.00	ns	_____

Canonical Correlation = .5686; Wilks' Lambda = .67664; $\chi^2(4) = 17.19, p < .002$

Percent of PC's correctly classified = 70.8%

Percent of VC's correctly classified = 66.7%

Percent of cases correctly classified = 68.75%

the volunteer and professional samples. The volunteers had higher Problem-Solving scores in the Recreational area than did the professionals. This too appears reasonable from a role analysis although such was not predicted. There were no significant differences on the Community Focus or Personal/Emotional measures. Somewhat surprisingly, there was greater variability in the professional performance on several of the indices — possibly reflecting the professional's ability to concentrate on the more crucial areas for a given case and to ignore other areas. On average, professionals more consistently modelled and differentially reinforced in the prosocial direction than did the volunteers.

With adjustments for length of interview (Table 15), it was clear that professionals remained relatively high on the Authority measure, low on a Recreational focus and low on Self-Disclosure. However, on the average, per two-minute segment, the professionals were also offering higher levels of problem-solving with a community focus. There was still no significant difference on active listening but it became obvious that the professionals were spending a greater proportion of interview time asking for, or offering, concrete information. Overall, 85.4% of the cases could be correctly assigned to their respective type of supervision on the basis of the tape-based process measures.

Summary of Process Differences

The relatively small differences between volunteers and professionals on trait measures clearly under-represented the range and degree of differences evident on the more direct measures of process. Volunteer and professional supervision varied on the relationship dimension in terms of the role preferences of the officers, the officer and client evaluations, the frequency and duration of contacts and on the ratings assigned by independent observers. Differences on the Authority dimension were evident with the role preference measures, on the nature of contacts with significant others (police) and on the behavioural process measures but not on officer and client evaluations. The only direct measures of the anticriminal dimension were the differential reinforcement and modelling indices from the analysis of the audio-tapes and the professionals were clearly more anticriminal. The differential levels of problem-solving varied with the focus of concern: the clients of the volunteers were exposed to more and, on the average, higher level problem-solving with a focus on recreational activities while the clients of the professionals were exposed to higher level problem-solving with a community focus. At the role preference level, professionals opted for active intervention but, on the basis of client reports, it was the clients of

the volunteers who reported receiving more actual help. There were no reliable differences on the tape-based Environmental Facilitation measure but the volunteers clearly had more contacts within the client's milieu and more contacts with the client's family, school and other acquaintances.

Recidivism

Recidivism was defined as a reconviction or being "at large" during the probation period. Forty-five or 23.7% of the total sample were in-program recidivists. The recidivists included 41 men (or 27.3% of the male clients) and four women (or 10.0% of the female sample), $\chi^2 (1) = 5.25, p < .05$. In the comparisons of the volunteer and professional samples, we will see that client age also related to recidivism. However, an overview of the type and number of new offences and the dispositions precedes an analysis of the differential effects of volunteers and professionals with different types of clients.

Table 17 compares the volunteer and professional samples on the recidivism outcome index based upon disposition. None of the probationers received a penitentiary sentence of two years or more but approximately 8% were incarcerated for some period of time before their probation period would normally

Table 17

THE RECIDIVISM RATES OF THE PROBATIONERS SUPERVISED
BY VOLUNTEER AND PROFESSIONAL OFFICERS

Recidivism Outcome Index	Professional Sample (n=96)		Volunteer Sample (n=94)		Total Sample (n=190)	
	f	%	f	%	f	%
Imprisoned (2 years +)	0	0.0	0	0.0	0	0.0
Imprisoned (2 years less a day or less but more than 90 days)	4	4.17	6	6.38	10	5.26
Imprisoned (90 days or less)	4	4.17	2	2.13	6	3.16
Absconded "Wanted"	3	3.13	1	1.06	4	2.10
Additional Probation and/or Susp. Sent. with/without a fine of over \$100.00	11	11.46	10	10.64	21	11.05
Fine of \$25.00 - \$100.00	2	2.08	2	2.13	4	2.11
No record of further convictions	72	75.0	73	77.7	145	76.32

Table 18

THE TYPE OF NEW OFFENCES COMMITTED BY RECIDIVISTS
IN THE VOLUNTEER AND PROFESSIONAL SAMPLES

Type of New Offence	Professional Sample (n=24)		Volunteer Sample (n=21)	
	f	%	f	%
<u>Property Offences</u>				
Auto Theft/Joyriding	4	16.7	3	14.3
Break & Enter	2	8.3	2	9.5
Theft Over \$200.00	0	0.0	1	4.8
Theft Under \$200.00	2	8.3	4	19.1
Poss. of Stolen Property	1	4.2	1	4.8
Fraud	1	4.2	1	4.8
Total Property	<u>10</u>	<u>41.7</u>	<u>12</u>	<u>57.1</u>
<u>Crimes Against Persons</u>				
Armed Robbery	1	4.2	0	0.0
Assault: Common & CBH	2	8.3	2	9.5
Poss. of Dangerous Weapon	1	4.2	0	0.0
Total Person	<u>4</u>	<u>16.7</u>	<u>2</u>	<u>9.5</u>
<u>Drug</u>				
Poss: Mescaline/Cannabis	1	4.2	3	14.3
<u>Traffic and/or Liquor</u>				
Drunk Driving/Driving without a License	1	4.2	1	4.8
<u>Technical Probation Viol^s.</u>				
Abscond	6	25.0	1	4.8
Other	1	4.2	0	0.0
Total	<u>7</u>	<u>29.2</u>	<u>1</u>	<u>4.8</u>
<u>Other</u>	0	0.0	2	9.5

have ended. The vast majority, nearly 90%, completed their sentences under supervision in the community. There were no differences in disposition as a function of the professional status of the supervising officers.

Table 18 compares the clients of the volunteers and professionals on type of new offence (the most serious was tabled if there was more than one new offence). Overall, property offences were the most frequently occurring type. Technical probation violations were most evident within the professional sample (Binomial, $p < .07$) and, failure to report was the specific violation. This was an unexpected trend and if not a reflection of differential decision making on the part of volunteers and professionals, it represents a bonus associated with the high frequency of contact approach used by volunteers.

As might be expected on the basis of the distributions over the recidivism index and type of offence, there was no relationship between volunteer and professional supervision and the measure of severity of new offences, Kendall's Tau = .03, ns. However, the recidivists within the professional sample were more likely to be convicted for more than one new offence (45.8%) than were the recidivists within the volunteer sample

(19.1%), Kendall's Tau = .28, $p < .03$. In part, this reflected the tendency for professionally-supervised cases to be charged with technical violations. When technical violations were excluded, only 35.0% of the recidivists within the professional sample were convicted on more than one new offence versus 20.0% of the volunteer sample, Kendall's Tau = .17, $p < .15$.

The Professional Status of Officer X Type of Client
Interactions on Recidivism

The major analysis was a 2 (PO: Volunteer-Professional) X 2 (Age) X 2 (HEMP) X 2 (SOC) X 2 (ICO) analysis of the variance in recidivism scores with sex of client as a covariate. Recidivism was entered as a dichotomous variable: no new offences (0) versus at least one new offence (1). Client age was divided at 19 years (younger) versus 20 years (older). HEMP, SOC and ICO scores were split at the median of their respective distributions (ie. low-high). The fourth-order interactions were collapsed since, in a preliminary run, all fourth-order p 's were greater than .30. The summary is presented in Table 19.

PO X Client HEMP. On the assumption that volunteer supervision was characterized by a relationship orientation, it was predicted that volunteers would be more effective with interpersonally

Table 19

A SUMMARY OF THE ANALYSIS OF VARIANCE IN RECIDIVISM:
THE PROFESSIONAL STATUS OF OFFICER
X TYPE OF CLIENT

Source	df	ms	F	p
Sex (Covariate) ^a	1	1.1781	8.56	.004
PO	1	.1063	<1.00	<u>ns</u>
Age	1	.3981	2.89	.09
ICO	1	.0926	<1.00	<u>ns</u>
SOC	1	1.0799	7.85	.006
HEMP	1	.1831	1.33	.25
PO X Age	1	.3858	2.80	.10
PO X ICO	1	.4508	3.28	.07
PO X SOC	1	.2565	1.86	.17
PO X HEMP	1	.3873	2.81	.09
Age X ICO	1	.2833	2.06	.15
Age X SOC	1	1.0644	7.73	.006
Age X HEMP	1	.1426	1.04	.31
ICO X SOC	1	.0476	<1.00	<u>ns</u>
ICO X HEMP	1	.1959	1.42	.23
SOC X HEMP	1	.0774	<1.00	<u>ns</u>
PO X Age X ICO	1	.0003	<1.00	<u>ns</u>
PO X Age X SOC	1	.9757	7.09	.009
PO X Age X HEMP	1	.0627	<1.00	<u>ns</u>
PO X ICO X SOC	1	.4250	3.09	.08
PO X ICO X HEMP	1	.6125	4.45	.04
PO X SOC X HEMP	1	.6994	5.08	.03
Age X ICO X SOC	1	.0137	<1.00	<u>ns</u>
Age X ICO X HEMP	1	.0129	<1.00	<u>ns</u>
Age X SOC X HEMP	1	.0893	<1.00	<u>ns</u>
ICO X SOC X HEMP	1	.5907	4.29	.04
Error	150	.1376		

Note: Prescores on ICO and/or one of the other client measures not available for 13 cases, N = 177.

a) Beta = $-.1951$ (Female clients had lower recidivism rates than male clients).

sensitive clients than would the professionals. As reported in the last chapter, the assumption regarding the volunteers' strength on the relationship dimension was strongly supported. However, the PO X Client HEMP interaction on recidivism was more complex than predicted. The simple interactions only approached conventional levels of significance ($p < .09$). Rather, the PO X HEMP interaction depended upon the SOC level of the clients ($p < .03$) and, in an analysis with ICO collapsed, upon the age of the clients ($p < .05$).

Inspection of Table 20 reveals that volunteers were more effective than professionals with high HEMP clients but significantly so ($p < .03$) only when the clients were also low on SOC. In fact, the low SOC - high HEMP clients of the professionals were recidivating at four times the rate found among those supervised by volunteers. Note too that there was a PO X Age X SOC interaction ($p < .009$). The volunteers were significantly more effective with younger low SOC clients than were the professionals. When the clients were jointly classified on Age, SOC and HEMP, the source of both interactions became obvious (see lower portion of Table 20). The differential effects of volunteer and professional supervision were only evident with low SOC - high HEMP clients, the highly significant and very large difference favour-

Table 20

RECIDIVISM BY PROFESSIONAL STATUS OF OFFICER AND TYPE OF
CLIENT WITH CLIENT SEX AS A COVARIATE

Type of Client	Professional Sample % Rec.	Professional Sample n	Volunteer Sample % Rec	Volunteer Sample n	F	p	Multiple R
PO X Age X SOC, $F(1/150) = 7.09, p < .009$							
Low SOC							
Younger	58.52	23	31.00	34	4.92	.03	.439
Older	5.46	16	20.43	15	1.35	.25	.215
High SOC							
Younger	15.61	19	12.64	24	<1.0	ns	.152
Older	10.84	27	16.17	19	<1.0	ns	.114
PO X HEMP X SOC, $F(1/150) = 5.08, p < .03$							
Low SOC							
Low HEMP	30.94	21	36.77	34	<1.0	ns	.326
High HEMP	42.71	18	8.75	15	5.33	.03	.471
High SOC							
Low HEMP	17.24	24	14.31	20	<1.0	ns	.177
High HEMP	8.88	22	13.25	23	<1.0	ns	.078
PO X ICO X HEMP, $F(1/150) = 4.45, p < .04$							
Low ICO							
Low HEMP	5.55	16	26.17	31	2.93	.09	.285
High HEMP	20.00	20	6.67	15	1.08	.30	.189
High ICO							
Low HEMP	33.73	29	31.38	23	<1.0	ns	.286
High HEMP	29.13	20	13.80	23	1.55	.22	.309
PO X ICO X SOC, $F(1/150) = 3.09, p < .08$							
Low SOC							
Low ICO	15.66	14	37.82	18	1.78	.19	.357
High ICO	46.96	25	23.42	31	3.81	.06	.392
High SOC							
Low ICO	9.08	22	10.71	28	<1.0	ns	.027
High ICO	16.38	24	20.45	15	<1.0	ns	.225
PO X Age X SOC X HEMP, $F(1/160) = 3.89, p < .05$							
Low SOC-Low HEMP							
Younger	48.31	13	42.25	23	<1.0	ns	.322
Older	10.35	8	19.74	11	<1.0	ns	.106
Low SOC-High HEMP							
Younger	80.00	10	00.00	11	29.65	.00004	.823
Older	0.00	8	25.00	4	1.80	.21	.426
High SOC-Low HEMP							
Younger	20.11	11	7.88	10	<1.0	ns	.212
Older	14.95	13	20.56	10	<1.0	ns	.223
High SOC-High HEMP							
Younger	10.02	8	15.70	14	<1.0	ns	.175
Older	7.47	14	10.60	9	<1.0	ns	.112

ing volunteer supervision of the younger clients ($p < .0004$) and a nonsignificant and small difference favouring professional supervision of older clients ($p < .21$). Thus, the predicted efficacy of volunteer supervision of interpersonally sensitive clients was strongly supported, but only with young, low SOC clients.

Note that the young, low SOC - low HEMP clients recidivated at high rates, regardless of the professional status of their officers while the high SOC clients recidivated at relatively low rates, regardless of their age, their HEMP levels or the professional status of their officers.

PO X Client ICO X Client SOC. It was tentatively suggested in the introduction that volunteers might be more effective than professionals with low SOC - low ICO clients, since isolated probationers required intensive supervision and high frequency contacts. In fact, the nonsignificant tendency was opposite to that suggested: the low SOC - low ICO clients of the professionals recidivated at half the rate found among those supervised by volunteers ($p < .19$). It was also tentatively predicted that professional supervision might be more effective with "committed" offenders (ie. low SOC - high ICO) because such clients would

require high levels of authority; again, the findings were exactly opposite that suggested. The low SOC - high ICO probationers of the volunteers recidivated at half the rate found for similar clients supervised by professionals ($p < .06$). It appears that a confounding variable may be HEMP. The volunteer officers were particularly ineffective with those ICO clients who were interpersonally insensitive ($p < .09$) but tended to be more effective with the high HEMP probationers regardless of ICO levels ($p < .19$, low ICO; $p < .31$, high ICO).

Supplementary analyses. Several additional comparisons of volunteer and professional supervision were made with clients classified on the basis of age and previous criminal history, on the basis of median splits with the Quay scales of PSYCH, NEUR, INAD, SM and FD and on the socio-historical indices of criminal ties and community ties (Appendix D). There was no evidence of PO X Type of Client interactions with the exception of the PO X Age effect previously described.

Summary. As predicted, it was the high empathy clients who responded best to the relationship orientation of volunteers. However, this was apparent only among the young, unsocialized probationers. It appears that volunteers are most effective, relative to professionals, with clients in the middle risk

categories while the highest risk clients (young, low HEMP, low SOC) and low risk clients (older and/or high SOC) are insensitive to volunteer versus professional supervision. The literature review tentatively suggested PO X ICO X SOC interactions but the effects were not strong and were opposite in direction to that expected. In the absence of information on client SOC, HEMP or ICO, the strategy of assigning the younger probationers to volunteers would enhance success rates.

Attitude Change

In a preliminary examination of the attitude change scores, officers were compared with probationers in a series of 2 (Officer-Client) X 2 (Sex) analyses of variance with age as a covariate. The dependent variable was post-minus-prescores. There was only one statistically reliable difference ($p < .05$) associated with the officer-client factor and that occurred on ANX: the probationers presented a significant ($p < .05$) mean decrease (-.68, SD = 3.14) while the officers presented a nonsignificant mean increase (.22, SD = 3.11).

The results of such comparisons, and the direction of change, is of some interest in view of some evidence that in prison-based

programs, the overall trend is for incarcerated offenders to show deterioration relative to nonincarcerated nonoffenders (Wormith, 1977). The labelling theorists, if they would ever dare to actually make a prediction rather than simply account for differences after-the-fact, would suggest that such should be apparent in probation as well, ie. simple contact with the criminal justice system is presumably enough to initiate the process of stigmatization and self-labelling and hence, greater commitment to crime. Overall, the participants infact showed improved attitudes toward the law, police and courts (TLCP, 2.31, SD = 9.30, $p < .000$), decreased tolerance for law violations (TLV, -.80, SD = 5.85, $p < .04$), more positive attitudes toward employment (EMPL, .50, SD = 3.04, $p < .01$), decreased alienation (TINP, 1.59, SD = 9.38, $p < .01$) and as noted, decreased anxiety (ANX). No other changes were statistically reliable. Clearly, if there was any deterioration, it had occurred before our measures were taken.

The Professional Status of Officer and Client Attitude Change

There were no overall differences in attitude change between the volunteer and professionally supervised cases. However, there were a number of interactions involving type of PO in a

series of analyses of covariance with client age, HEMP, SOC and ICO entered as factors (two levels each) and prescores and changes on FAKE entered as covariates. However, the specific interactions which were reliable were not consistent from scale-to-scale within the conceptually-related sets noted in the Method section. For an orderly presentation of the results, we decided that the most systematic way of explaining attitude change as a function of the professional status of officer was to simply compare the PC's and VC's at each level of the client variables which proved important in the analysis of recidivism, ie. PO in interaction with SOC X Age, SOC X HEMP and SOC X ICO. Table 21 presents a summary of the differences which reached conventional levels of statistical significance ($p < .05$). Note that such differences represented only 12 out of a total of 288 separate comparisons. Thus, the evidence for systematic variation of attitude change scores with the professional status of officer was very weak and unworthy of further comment.

Summary of Recidivism Differences

In spite of the very large differences evident in the process measures, there were no overall differences in the relative effectiveness of volunteer and professional supervision in terms of recidivism and attitude change. However, as predicted, volun-

Table 21

THE PROFESSIONAL STATUS OF OFFICER AND CLIENT ATTITUDE

CHANGE BY TYPE OF CLIENT (p's < /05)^a

Type of Client	Scale	Grand Mean	Professional Adj. Dev.	Sample n	Volunteer Adj. Dev.	Sample n	F	p
Low SOC								
Younger	SE	-.139	5.68	14	-2.74	29	6.53	.01
	INCLe	-1.07	-1.29	14	.67	27	4.00	.05
High SOC								
Younger	TLV	-1.703	2.01	16	-1.67	21	7.32	.01
	EMPL	.026	-.78	16	.56	22	4.42	.04
High SOC								
Low HEMP	AFFe	-.457	.59	19	-.71	16	5.52	.05
High HEMP	HEMP	-.951	1.75	19	-1.51	22	5.00	.03
Low SOC								
Low ICO	INCLw	-.621	-2.00	12	1.41	17	11.84	.002
	SOC	-.103	2.33	12	-1.64	17	4.74	.04
	INAD	.000	.57	12	-.415	17	4.29	.05
High ICO	FD	-.186	-.58	17	.38	26	7.99	.007
High SOC								
High ICO	EMPL	.781	-1.28	18	1.65	14	7.24	.01
	HEMP	.484	2.64	17	-3.20	14	8.52	.007

a) The reader is cautioned to note that the 12 differences tabled were the only ones with $p < .05$ out of a total of 288 separate comparisons.

teer supervision was significantly more effective than professional supervision with interpersonally sensitive clients. The PO X Client HEMP interaction was more complex than that predicted in that it was only evident among the younger, and less socialized probationers. The question of the source of variability in attitude changes was not resolved through comparisons of volunteer and professional supervision. Our predictions concerning the interaction of professional status of officer and client ICO were not supported and observed tendencies were in the opposite direction.

CHAPTER FIVE: OFFICER CHARACTERISTICS AND
PROCESS AND OUTCOME

Perhaps more important ultimately than the volunteer-professional comparisons are the pretested differences among officers on biography, attitudes and personality. With controls introduced for the professional status of officers, the findings have obvious implications for the selection of officers. When the measures are also theoretically relevant, the findings have implications for theory and training.

Officer Characteristics and Process

Role Preferences (SRS)

Officer age, sex and the other basic biographic factors were unrelated to scores on the three subscales of the SRS. The correlations evident between the SRS scales and officer personality were exactly those found in the comparisons between volunteer and professional officers. Officer ICO related negatively to the SRS-Relationship score ($-.24, p < .05$) and to NEUR positively ($.28, p < .05$). CONw related to the Active Intervention subscale ($.33, p < .01$). None of the scales related to SRS-Authority. We may conclude that the officer's trait measures share little, if

any, variance with role preferences other than that co-shared with professional status.

Participant Evaluations on the RQ Scales

The case-to-case stability at second testing of participant ratings on the RQ scores was noted in the Method section. Hence, officer characteristics were examined in relation to those RQ scores obtained at the second testing. The scores of officers with more than one case were averaged to obtain only one score for each officer on each of the client and officer forms.

Tabel 22 presents the correlations between officer biography and RQ ratings and between officer attitudes/personality and RQ ratings. The professional status of officers, officer sex and preFAKE scores were partialled out in order to increase the generalizability of the conclusions and to ensure that the correlations between officer personality and officer ratings were not simply a function of response set. Client ratings were independent of the biographic and demographic characteristics of their officers.

Officers scoring relatively high on Acceptance of Others

Table 22

OFFICER PERSONALITY AND PARTICIPANT REPORTS (AT SECOND TESTING)
ON THE RELATIONSHIP QUESTIONNAIRE: PARTIAL CORRELATIONS,
CONTROLLING FOR PROFESSIONAL STATUS,
SEX AND OFFICER PREFAKE

	Client Reports (2nd) (n=46)			Officer Reports (2nd) (n=49)		
	Qual	Help	DIR	Qual	Help	DIR
VPO - PPO	17	21	-03	22	17	04
Sex	15	01	-08	12	06	-23*
PREFAKE	16	14	-03	23	36	06
Age	10	10	-01	13	27*	-02
ED	-07	-01	-17	-37**	-36**	22
OCCUP	07	13	04	-12	07	-06
SES (n=20)	-23	-30	-15	-19	03	-20
Marital Status	-21	09	-01	-09	18	-04
TLCF	06	22	19	27*	37**	-04
TLV	-15	00	-15	-22	-13	17
ICO	-15	12	00	03	01	01
TINP	-18	00	-16	-42**	-30	04
ALO	-03	17	-10	-02	08	02
EDUC	-17	-30*	-05	06	20*	01
EMPL	04	-02	19	09	17	04
ACO	30*	-03	16	16	05	09
SE	09	11	35**	31**	29*	-02
ANX	21	-16	-04	-19	-29*	09
Affe	-00	-17	18	11	11	10
Affw	05	-10	-00	29*	41**	-18
INCLe	06	01	16	05	08	12
INCLw	02	-01	15	-01	07	14
CONe	08	17	26*	09	07	18
CONw	-15	11	11	-10	16	27*
HEMP	29*	14	01	27*	19	-25*
SOC	13	32**	-00	14	33**	06
PSYCH	04	-02	-03	-14	-52**	08
NEUR	11	-16	-06	-11	-38**	13
INAD	-01	-29*	16	-00	-15	-16
SM	-08	-24*	-03	-04	-29*	-08
FD	01	-01	-17	-11	-21	-13

* p<.05; ** p<.01

and Empathy received relatively high ratings from their clients on Quality of Relationship. However, client reports on Helping related not to the interpersonal orientation scales but to officer Socialization (positively) and negatively to Inadequacy and Scholastic Maladjustment. Client reports on Direction were positively related to officer scores on CONe. The results provide rather impressive evidence for the validity of the personality scores. However, some expected and uninterpretable correlations were also evident. Officer Self-Esteem correlated positively with client Direction while officer scores on Value of Education related negatively to client Helping evaluations.

The differential predictive value of officer HEMP and SOC to the Quality and Help ratings was also evident with the officer evaluations of process. Again, as in the case of client ratings, officer evaluations were negatively related to officer scores on the Quay scales. To a considerable extent, officer evaluations were a function of their sense of personal and social adequacy. High Self-Esteem officers reported positively while alienated (TINP) and anxious officers (ANX) reported negatively.

Because of the theoretical significance of officers' combined positions on HEMP, SOC and ICO, the participant reports were

examined with officer personality factors arranged factorially, each having been divided into two levels by median splits. The covariates were client age, sex, group and change scores on FAKE. There were no indications of reliable interactions (all p 's > .19).

Miscellaneous matching hypotheses and participant evaluations.

New variables were formed representing the difference between officer and client scores on the complete range of biographic and attitudinal scores. These difference scores were then correlated with the RQ scores. An attempt was made to simultaneously control for both officer and client scores but, of course, the officer and client scores correlated so highly with the difference scores that such control was statistically impossible. The question then became simply whether the difference scores related more strongly to RQ scores than did the officer and/or probationer scores by themselves. Across the whole range of correlations, there was no evidence that difference scores were more predictive than the simple officer and/or client levels and, in the majority of cases, they were less predictive.

The FIRO-B matching indices: Reciprocal compatibility was negatively related to client reports on the Help subscale of

RQ (-.30, $p < .004$) and positively related to client reports on the Direction subscale (.23, $p < .02$). Reciprocal compatibility was unrelated to officer evaluations of supervision. It appeared that the greater the degree of reciprocal satisfaction of behavioural preferences as stated on the FIRO-B, the more helpful the relationship and the less directive the officer, according to client reports. Interchange compatibility was unrelated to the RQ reports of officers and clients.

Officer Behaviour During The Audio-Taped Sessions

In the following analyses, scores were averaged for those officers who had more than one case in the tape sample.

Authority. Officer INAD was the only personality scale which related reliably to use of Authority during the taped sessions, -.33, $p < .05$. Note that the CONe and CONw indices were independent of actual performance, .08 (ns) and -.17 (ns).

Anticriminal. Several scales related to the differential reinforcement and modelling indices and the pattern of correlations was the same for both indices. DRI related to officer TLV (-.48, $p < .01$), SOC (.45, $p < .01$), PSYCH (-.34, $p < .05$), NEUR (-.35, $p < .05$)

INAD (-.32, $p < .05$) and SM (-.34, $p < .05$). The findings speak well for the validity of the scales involved. Somewhat surprisingly, officer ICO did not relate reliably to DRI, -.01, ns.

Problem-Solving; community focus. Problem-solving with a community focus was negatively related to officer ACO (-.50, $p < .01$), AFFe (-.34, $p < .08$) and PSYCH (-.41, $p < .01$). We might have expected a relationship between a community focus and officer alienation but there was little evidence of it (TINP, -.05, ns; ALO, .26, $p < .10$). Similarly, attitudes toward education (EDUC) and employment (EMPL) were not strongly related to community-focused problem-solving (.24, $p < .10$ and -.03, ns).

Problem-Solving; recreational focus. High levels of Problem-Solving with a recreational focus were offered by the younger officers (-.31, $p < .05$) and those who wanted to be included by others in activities (INCLw, .39, $p < .01$) and wanted to be controlled by others (CONw, .36, $p < .05$).

Problem-Solving; personal/emotional focus. The traditional intra-psychic focus in counselling was unpredictable on the basis of the officer characteristics sampled in this study.

Environmental Facilitation. The predictors of advocate-broker activity were interesting. For example, it was the low Self-Esteem ($-.33, p < .05$) and high ICO ($.36, p < .05$) officers who were more likely to direct their clients to resources in the community. There is a suggestion here that the less confident volunteers were more likely to transfer responsibility for the client to outsiders. Additional officer characteristics relating to the advocate-broker index were AFFw ($.39, p < .01$), INCLw ($.31, p < .05$) and FD ($.41, p < .01$).

Quality of relationship: active listening. Active listening was independent of officer ACO and HEMP but did relate reliably to the FIRO-B indices of interpersonal orientation: AFFe ($.48, p < .01$), AFFw ($-.51, p < .01$), CONe ($.31, p < .05$) and CONw ($.39, p < .01$). Active listening was also negatively related to TLCP, $-.36, p < .05$. The results suggest an important distinction between interpersonal sensitivity at the trait level and empathy or understanding as a counselling technique.

Quality of relationship: friendly acts. Friendly acts during the audio-taped session appear to have been a function of officers' sense of personal adequacy, interpersonal orientation and prosocial orientation. The more alienated (TINP, $.36, p < .01$) and more

anxious (ANX, .31, $p < .05$) officers emitted relatively more friendly acts as did those who were generally expressive of affection (AFFe, .48, $p < .01$) and who wanted to be included by others (INCLw, .36, $p < .05$). A prosocial orientation signaled relatively low rates of friendly acts; TLV, .35, $p < .05$ and SOC, -.40, $p < .01$. Again we noted that HEMP scores were unrelated to an index of quality of relationship.

Quality of relationship: Self-Disclosures. The self-disclosing officers reported at pretest that they did not like including others in their activities (INCLe, -.35, $p < .05$) and presented evidence of some history of disturbance: NEUR, .31, $p < .05$ and FD, .30, $p < .05$. Women officers were also more likely to self-disclose (.30, $p < .05$).

Quality of relationship: Information. The offering of concrete, factual information and requests for concrete information were unrelated to officer personality.

Summary. Several findings were worthy of note. The personality measures of interpersonal control were not related to actual use of authority in the taped interviews. Our basic trait measures of interpersonal sensitivity (HEMP) was unrelated to officer

behaviour during the taped sessions. The validity of TLV, SOC and Quay's personality dimension of delinquency was strongly supported through correlations with the anticriminal indices. ICO did not relate to the anticriminal dimension. Several other findings also supported the validity of specific scales.

Officer HEMP, SOC and ICO. Officer scores on the three personality scales of primary interest were split at their respective medians and a new factor formed: officers scoring high on SOC and HEMP and low on ICO versus officers presenting other combinations of SOC, HEMP and ICO. The predicted most effective set of officers were compared with the other officers through a series of analyses of variance in the tape-based measures. Only one difference reached conventional levels of statistical significance and the other differences did not even approach significance. The high SOC - high HEMP - low ICO officers emitted fewer friendly acts on average per two-minute segment than did the other officers, .11 versus .26, $mse=.0363$, $F(1/44) = 3.92$, $p<.05$.

The Ratings of Volunteers at Screening and Training

Recall that SCTOT and TRTOT, the ratings by the screening

interviewer and the trainers' respectively, were short indices of high internal consistency. They were also positively related, $.61, p < .01$. Of some practical interest is whether program staff are able to identify effective workers without the aid of more time-consuming and intrusive psychometric devices. In OCCVP, the results were at least encouraging should the tape-based Authority scores and PSO-Community scores prove valid. Ratings completed at screening related positively to Authority ($.49, p < .01$) and PSO-Community ($.42, p < .01$). This was also true for the ratings completed at the end of training: Authority, $.51, p < .01$ and PSO-Community, $.38, p < .05$. The trainers' ratings also correlated with SRS-Authority ($-.32, p < .05$) and officer ratings on the Help subscale of RQ ($.35, p < .01$).

A review of SCTOT and TRTOT in relation to the volunteers' prescores on the attitude and personality scales suggested that the program co-ordinator was responding to applicants' Self-Esteem ($.24, p < .05$) and interpersonal sensitivity (HEMP, $.37, p < .01$). The same personality factors related to TRTOT. In addition, the screening ratings were negatively related to volunteer PSYCH ($-.37, p < .01$) but positively related to the volunteer's tendency to try and make a good impression at pretesting (FAKE, $.21, p < .05$). Again, these relationships were also evident with the trainers'

ratings. The trainers' were additionally sensitive to ANX (-.35, $p < .01$), AFFW (.28, $p < .05$), INCLe (.25, $p < .02$) and NEUR (-.32, $p < .01$). Maritally attached volunteers and the higher socio-economic status (father's occupation) volunteers were positively evaluated following the screening interview (.30, $p < .01$ and .36, $p < .05$) and by the trainers (.29, $p < .01$ and .51, $p < .01$).

In summary, the intermediate validity, ie. the ability to predict to process rather than outcome, of the co-ordinator's and trainers' ratings was impressive. They were giving high ratings to interpersonally sensitive volunteers, low ratings to the more emotionally and behaviourally disturbed volunteers and high ratings to volunteers who, once assigned, made high level use of the probation contract and engaged in high level problem-solving. These findings are, of course, tied to the specific staff of OCCVP but additional work on the development of brief focused rating scales is strongly indicated.

Ratings by the Inservice Supervisors of Volunteers

Across all four directive aspects of supervision, the women volunteers received significantly ($p < .01$) lower ratings

by their supervisors than did the male volunteers: -.35 (Authority), -.30 (Anticriminal), -.32 (PSO), -.38 (Environmental Facilitation). Age of volunteer related positively to rates on Authority (-.31, $p < .05$), Anticriminal (.33, $p < .01$), and Relationship (.23, $p < .05$). Occupational status was positively and reliably ($p < .05$) related to Authority (.32), Anticriminal (.26), PSO (.40) and Environmental Facilitation (.31). SES, marital status and education were generally independent of supervisor's ratings.

Overall, few of the pretested attitude and personality scores related to the ratings but several that did were interesting. Authority ratings related ($p < .05$) to CONw (.45) as well as AFFe (.30) and FD (-.31). Anticriminal ratings were related, quite appropriately, to volunteer TLCP (.35) and ICO (-.27). PSO was again unrelated to TINP (-.04) and ALO (.17) but did relate ($p < .05$) to CONw (.25), SOC (.29) and each of NEUR (-.30), INAD (-.35), SM (-.41), and FD (-.23). Ratings on Environmental Facilitation were independent of all prescores. Relationship ratings were associated only with ICO (-.27, $p < .05$).

Client Personality and Participant Evaluations on RQ

We predicted that participant evaluations of supervision would be a function of participant personality. This was confirmed with reference to officer personality and in this section we examine client personality in relation to the RQ reports. It is also possible that client characteristics would influence officer supervisory process as measured during the audio-taped sessions. In fact, we expect that officers would practice differential treatment, ie. offer different types of clients different types of supervision. If they did however, it presents serious control problems when we come to interpret the relationship between process and outcome.

In order to complement the report on officer characteristics and RQ scores, the reports obtained at second testing were employed. In order to maximize generalizability of our report, we note only those correlational findings which were statistically significant ($p < .05$) in the total sample and which showed the same direction of influence for both male and female officers and both male and female probationers.

Officer reports on RQ-Relationship. Officers reported relatively

high quality relationships with the better educated probationers (.29), the more anxious clients (ANX, .24) and those who wanted to be controlled (CONw, .25). Officers reported relatively poor relationships with clients who tried to present a favourable image at pretest (FAKE, -.40).

Officer reports on RQ-Help. Again, officers thought they were offering real help to the high ANX (.30), high CONw (.24) and low FAKE (-.37) probationers. In addition, client ICO (-.20) and client EDUC (.23) related to officers' RQ-Help ratings.

Officer reports on RQ-Direction. Direction, according to the officers was offered those probationers who were decidedly procriminal at pretest: TLCP, -.20, TLV, .27, PSYCH, .28, AFFe and AFFw also related to RQ-Direction scores, .38 and .27 respectively.

Client reports on RQ-Relationship. The clients who reported positively were those who presented relatively low ICO scores, high AFFe and low FAKE, -.24, .22 and -.27.

Client reports on RQ-Help. Again, it was client ICO (-.22) and AFFe (.23) which related to client reports. AFFw (.26) and

CONe (.22) also related to client reports on RQ-Help. The ICO effect was replicated with our socio-historical index of Delinquent Ties (Appendix D), -.29.

Client reports on RQ-Direction. Only one attitude scale related to Direction scores, TLCP (-.22). However, two biographic factors were predictive of client reports; occupational status (-.36) and community ties (Appendix D; -.48).

Summary of client traits and RQ evaluations. The pattern of officer reports reflects almost perfectly the traditional criteria for identifying clients amenable to treatment, ie. persons with some resources (eg. an education), who are experiencing some personal discomfort (anxiety), are amenable to control (CONw) and open about their difficulties (FAKE). The most committed (ICO) and disturbed (PSYCH) offenders were, in the opinion of both officers and clients, least in receipt of help but most likely to receive direction.

Client Personality and the Tape-Based Process Measures

Client scores on the biographic and attitudinal indices were correlated with officer behaviour during the audio-taped sessions.

CONTINUED

2 OF 4

We report only those correlations which reached conventional levels of significance ($p < .05$). Note that a total of 31 (predictors) X 11 (process measures) correlations were computed and only 32 reached that level of significance. A number of the findings likely represent chance effects.

Authority. Relatively high levels of authority were offered the clients who least wanted to include others in their activities (INCLe, $-.35$), who presented least evidence of strong ties to delinquent peers (DELTIES, $-.33$), and who themselves were least expressive of interpersonal control (CONE, $-.30$). The tape-based authority scores also related to client socio-economic status ($-.28$) and to problems in school (SM, $-.26$).

The Anticriminal dimension. The differential reinforcement index was related only to client INCLW ($-.25$). The modelling index was negatively related to client HEMP ($-.38$).

Problem-Solving: Community Focus. High levels were offered clients who were accepting of others (ACO, $.27$) and presented little evidence of inadequacy or immaturity (INAD, $-.26$).

Problem-Solving: Recreational Focus. High levels were

offered clients presenting evidence of ties to delinquent others (DELTIES, .33).

Problem-Solving: Personal/Emotional. The Personal/Emotional focus correlated with client TLCP (.31), INCLe (.40) and age (.36).

Quality of Relationship. Active listening responses were withheld from those who wanted affection (AFFw, -.30) and offered to the more psychopathic probationers (PSYCH, .25), to the more inadequate clients (INAD, .30) and those with delinquent ties (DELTIES, .33). Friendly statements were made to previous offenders (.38) and to clients with the lower status backgrounds (SES, -.28). Asking for, or offering, concrete factual information was predicted by the client's tendency at pretest to present an overly favourable image (FAKE, .25). Length of audio-taped interview was predictable on the basis of the client's interpersonal sensitivity (HEMP, .26) and acceptance of others, (ACO, .24).

A closer look at client HEMP and officer behaviour. We have seen that officer HEMP was unrelated to officer behaviour during the taped sessions. However, there was consistent evidence that

clients who scored high on HEMP were able to establish the necessary conditions for officer-centered counselling. The more interpersonally sensitive the client, the longer the interviews (.26, $p < .04$), the greater the officer Self-Disclosure (.23, $p < .06$) and the more the officers' expressed socially unacceptable sentiments (MODI, $-.38$, $p < .01$).

Summary of client personality and the tape-based process measures. With the exception of the almost amazing reverse validity of client HEMP as a predictor of the clients ability to establish traditional nondirective counselling conditions for the officers, there was no clear pattern to the client personality and officer behaviour correlations. However, controls for client characteristics must be introduced when the tape-based process measures are examined in relation to outcome indices.

Officer Characteristics And Outcome

A series of analyses of covariance examined officer pretest characteristics in relation to client impact. The interpersonal sensitivity of the officers in combination with their degree of socialization and identification with offenders were the factors of major theoretical interest and hence, we expected, applied

significance. However, officer sex and age were examined first and a set of analyses on other trait measures were also completed.

Officer Sex and Age

Neither officer sex nor officer age were major sources of variation in a series of analyses of covariance on recidivism and attitude change scores. There was a nonsignificant trend for fewer of the clients of the younger officers (under 30 years) to recidivate than did the clients of the older officers, 17.2% versus 26.7%, $F(1/177) = 1.79, p < .18$. The clients of the female officers presented greater reductions on ICO and TLV than did the clients of the male officers [-.267 versus .097, $F(1/141) = 3.74, p < .05$, for ICO; -2.123 versus -.117, $F(1/141) = 4.09, p < .05$ for TLV]. Thus, officer sex was introduced as a covariate in later analyses of changes on TLV and ICO.

Officer HEMP, SOC and ICO

Table 23 presents a summary of the analysis of covariance on recidivism with officer scores on HEMP, SOC and ICO split at the respective medians and client age, sex and group as covariates. As predicted, there was a reliable HEMP X SOC interaction ($p < .004$)

Table 23

A SUMMARY OF THE ANALYSIS OF VARIANCE IN RECIDIVISM
BY OFFICER HEMP, SOC AND ICO

<u>Source</u>	<u>df</u>	<u>ms</u>	<u>F</u>	<u>p</u>
Age ^a	1	.1957	1.15	.28
Sex ^a	1	.6574	3.87	.05
Group ^a	1	.0189	<1.0	<u>ns</u>
HEMP	1	.3183	1.87	.17
SOC	1	.0018	<1.0	<u>ns</u>
ICO	1	.3796	2.23	.14
HEMP X SOC	1	1.4113	8.30	.004
HEMP X ICO	1	.0953	<1.0	<u>ns</u>
SOC X ICO	1	.1874	<1.0	<u>ns</u>
HEMP X SOC X ICO	1	.0324	<1.0	<u>ns</u>
Error	177	.1700		

a) Covariates

but the effect of ICO was only approaching conventional levels of significance ($p < .14$). Table 24 presents the recidivism rates associated with officers at the various levels and combinations of HEMP, SOC and ICO.

The success rates of officers varying on SOC were statistically reliable whether they were relatively high or low on HEMP. However, the direction of the SOC effect varied with HEMP levels. As expected, the clients of the high HEMP - high SOC officers recidivated at a significantly lower rate than did the clients of the high HEMP - low SOC officers, 14.8% versus 29.8%, $F(1/115) = 3.85$, $p < .05$ (adjusted for age, sex and professional status of officer). Among the less interpersonally sensitive officers, high SOC levels signaled negative impact: 16.3% (low SOC) versus 41.8% (high SOC), $F(1/63) = 5.59$, $p < .02$. Clearly, the least effective officers were the more austere moralistic types. The high SOC - high HEMP officers were the most effective but not significantly more effective than the low SOC - low HEMP officers.

In view of the a priori theoretical and practical implications of the officer ICO levels, high HEMP - high SOC - low ICO officers were compared with officers presenting other combinations of HEMP, SOC and ICO. Clearly, the predicted effect was evident.

Table 24

RECIDIVISM BY OFFICER HEMP, SOC AND ICO

Recidivism	<u>Low HEMP</u>				<u>High HEMP</u>			
	<u>Low SOC</u>		<u>High SOC</u>		<u>Low SOC</u>		<u>High SOC</u>	
	Low ICO	High ICO	Low ICO	High ICO	Low ICO	High ICO	Low ICO	High ICO
f	5	2	11	1	6	8	2	9
%	18.52	20.0	37.93	50.00	23.08	36.36	6.90	20.93
n	27	10	29	2	26	22	29	43

Officers presenting the predicted most effective combination had a failure rate of only 5.37% (n=27) while the other officers presented a failure rate of 25.2% (n=149), $F(1/170) = 5.19$, $p < .02$ (adjusted for client age, sex and group). Note from Table 24 that the inclusion of ICO did not reduce the recidivism rates associated with low HEMP - low SOC officers, the second most successful HEMP - SOC combination when ICO was ignored.

Overall, the comparisons provided impressive confirmation of the notion that the effective workers are interpersonally sensitive and clear representatives of anticriminal and pro-social positions. The results also underscored the importance of not selecting on one dimension at the expense of the other since the failure rate of high SOC - low HEMP officers was very high.

Additional confirmatory evidence was evident in a series of analyses of attitude change (Table 25). Again, clients of the high HEMP - high SOC officers were compared with the clients of officers who presented other combinations of HEMP and SOC at pretest. The clients of the high HEMP - high SOC officers showed gains on attitudes towards the law, courts and police (TLCP, $p < .03$), reduced acceptance of common justifications for law vio-

Table 25

PROBATIONER ATTITUDE CHANGE BY OFFICER EMPATHY (HEMP)
AND SOCIALIZATION (SOC): MULTIPLE
CLASSIFICATION ANALYSIS^a

Outcome Variable	Grand Mean	Adjusted Deviations ^b		Beta	F	p
		High Hempt High SOC Officers (n=70)	Other Combinations of HEMP and SOC (n=106)			
TLCP	2.526	1.880	-1.301	.155	4.98	.03
TLV	-1.176	-1.175	.822	.160	5.81	.02
ICO	-.542	-.651	.456	.121	3.51	.06
TINP	-2.616	-1.412	1.011	.125	3.07	.08
EMPL	.625	.527	-.353	.128	3.51	.06
INAD	-.020	-.213	.151	.124	3.35	.07
CONw	-.346	-.329	.239	.106	2.15	.14

a) Differences presented only for those outcome variables with $p < .20$.

b) The covariates for attitude change analyses always included the prescore and a selection from age, sex, group, change FAKE (depending upon which variables related significantly to change).

lations (TLV, $p < .02$) and reduced identification with offenders (ICO, $p < .06$). The trends ($p < .15$) on Alienation, Value of Employment, INAD and CONw also supported the high HEMP - high SOC combination. Officers were again reclassified as high HEMP, high SOC, low ICO and client attitude change was compared with officers presenting the other combinations. The same trends were evident but the p values were greater; varying from a very unimpressive $p < .54$ for TLCP to $p < .08$ for TINP and CONw.

The Indigenous Index and Outcome

Overall, the Indigenous Worker Index (OINDIG) was unrelated to recidivism, $-.08$, p ns. The predictive validity of the index was greater when only high HEMP - high SOC officers were considered ($-.15$) relative to the other officers ($-.03$) but again, not significantly so. Officers again were reclassified on the basis of HEMP, SOC and ICO, but OINDIG remained relatively independent of recidivism. The values reported are partial correlations, controlling for the professional status of officers.

OINDIG did relate to attitude change, and as predicted, the correlations varied with the interpersonal sensitivity and pro-social orientation of the officers (Table 26). OINDIG was more

Table 26

THE INDIGENOUS INDEX AND ATTITUDE CHANGE BY OFFICER HEMP
AND SOC: PARTIAL CORRELATIONS, CONTROLS FOR CLIENT
SEX, GROUP, CHANGE FAKE AND PREScores

	High HEMP High SOC Officers (n=60)	Officers With Other Combinations of HEMP (n=106)	Z Scores (p<.20)
TLCP	31**	-10	2.48*
TLV	-08	-05	
ICO	-16	21*	2.20*
TINP	-17	-09	---
ALO	04	06	---
EDUC	27*	03	1.43
EMPL	08	-08	---
ACO	04	-13	---
SE	07	-05	---
ANX	-05	01	---
AFFe	19	-10	1.62
AFFw	-01	-18	---
INCLe	-01	-15	---
INCLw	-02	-01	---
CONe	-03	27**	1.70
CONw	01	-14	---
HEMP	-22*	19*	2.42*
SOC	28**	-11	2.31*
PSYCH	-34**	00	2.06*
NEUR	-21*	-06	---
INAD	04	03	---
SM	-35**	09	2.66**
FD	-21*	-14	---

* p < .05; ** p < .01

positively related to prosocial gains on the attitude measures with high HEMP - high SOC officers than with officers presenting other combinations of SOC and HEMP scores. The differences were statistically reliable ($p < .05$) with TLCP, ICO, SOC, PSYCH, and SM. One interesting and reliable reversal of the pattern was evident and that was on the HEMP scale. The Indigenous Index was negatively related to HEMP changes with the "predicted" most effective officers and positively related with the other officers. Note that partial correlations were presented in Table 26, controlling for client sex, professional status of the officer, client prescores and changes on FAKE.

The OINDIG - attitude change partials were rerun separately, this time for officers classified into two groups on the basis of their HEMP, SOC and ICO scores. The pattern of results was similar to that reported above and hence need not be reported separately. We note, however, that the earlier failure to find strong differences on TLCP changes as a function of the combined HEMP/SOC/ICO classification of officers was largely due to our inattention to OINDIG. Among the high HEMP - high SOC - low ICO officers, the correlation between OINDIG and TLCP changes was .50, $n=23$, $p < .01$.

Supplementary Analyses

Officer HEMP and CONe. Officer scores were split at the median on CONe and examined along with officer HEMP in relation to recidivism with client age, sex, group and PRESOC as covariates. There was a main effect of CONe [$F(1/153) = 4.06, p < .05$], but the interaction of HEMP and CONe was not statistically significant ($p < .21$). Clients assigned to high CONe officers recidivated at nearly twice the rate of those assigned to low CONe officers, 27.9% versus 14.4%. It appears that the self-report measure of CONe is not a measure of officer use of authority but of interpersonal domination and we have a cross-validation of Scheier et al's (1973) finding.

Officer ANX and TINP. Most assume that the effective officer is relatively free of tension and anxiety. Officer ANX scores were split at the median and two levels formed for an analysis of variance in recidivism scores. Officer HEMP was again a second factor. There was simply no evidence that officer ANX related to recidivism ($p < .92$). Similarly, officer TINP was not a source of significant variation in recidivism ($p < .83$). In view of the possibility that the relationship between officer ANX and client recidivism was curvilinear, the officer ANX scores

were divided at the 33rd and 67th percentiles and the analysis rerun. Again there was no evidence that officer ANX related to recidivism.

Officer history of familial and school maladjustment problems (SM and FD). Officer SM and FD scores were summed to form a combined index of a history of disturbed community relations, and that score was split at the median and two levels formed. There was no evidence of an effect on recidivism ($p < .59$).

Miscellaneous matching hypotheses and recidivism. The matching variables formed by subtracting officer and client scores on the complete range of biographic and attitudinal scores were examined in relation to recidivism. As was the case with the RQ scores, there was simply no evidence that the difference scores were any more predictive of recidivism than were the clients scores and/or the officer scores by themselves. The reciprocal compatibility and interchange compatibility indices of the FIRO-B scales were also unrelated to recidivism.

The Screening and Training Ratings of Volunteers and Recidivism

SCTOT and TRTOT were split at their respective medians and two factors formed for separate analyses of variance in recidivism with client age, group and preSOC as covariates. Recall that the internal consistency and interrater agreements on SCTOT and TRTOT were impressive as was their ability to predict to process measures. However, there was simply no evidence that the screening ratings ($p < .63$) or the trainer's ratings ($p < .65$) were related to recidivism.

Officer Characteristics: A Summary

Officer Characteristics and Process

Participant evaluations of supervision were a function of participant personality. The pattern of results was coherent and provided some impressive evidence on the predictive validity of several of the attitude and personality scales.

a) Officer scores on the Hogan Empathy scale related positively to both probationer and officer evaluations of their relationships at the third or fourth month of supervision.

b) Officer scores on Socialization related positively to participant reports on the officers and on receipt of real help and assistance.

c) Officer's evaluations reflected the officer's sense of personal and social adequacy.

d) Officers reported positively on the supervision of clients who presented pretest evidence of personal discomfort, amenability to interpersonal control and low distortion of test responses in the favourable direction. Officers stated that they offered direction to the more procriminal probationers.

e) Positive reports were received from those clients who showed a pretested tendency to express affectional behaviour and who scored low on identification with other offenders.

f) With the exception of FIRO-B indices, there was no evidence that matching of officer and client on biography and attitudes increased the predictability of officer and client evaluations of supervision.

Scores on the attitude and personality battery also related

to officer behaviour during the audio-taped sessions but the pattern of results was less coherent and, it was suggested, may include a number of chance effects.

a) The FIRO-B indices of interpersonal control orientation did not predict to officers' use of the probation contract during supervision.

b) The attitudinal indices of community integration did not predict officer engagement in community-focused problem-solving or advocate-broker activity.

c) The basic measures of interpersonal orientation (Empathy and Acceptance of Others) were independent of actual officer behaviour on the relationship indices.

d) Several of the criminal orientation measures, including the Quay measures of the major personality dimensions of delinquency, were associated with officers' differential reinforcement of the clients' prosocial and antisocial expressions.

e) Several of the FIRO-B measures did relate to the behavioural indices of an officer's relationship orientation during supervision

as did measures of officers' sense of personal adequacy.

f) The only readily apparent pattern among the correlations between client personality and the tape-based process measures was the ability of interpersonally sensitive clients (high HEMP) to engage their officers in officer-centered counselling: longer interviews, more self-disclosure by the officer, and more open expressions of socially negative sentiments by the officer.

The intermediate validity of the ratings completed at the end of the screening interview and at the end of preservice training was impressive. The raters were giving high ratings to the interpersonally sensitive volunteers and to ones who, once assigned a client, engaged in high level use of Authority and Problem-Solving. However, the ratings did not predict to recidivism.

Officer Characteristics and Outcome

The major finding was a confirmation of the prediction that the most effective officers are interpersonally sensitive as well as representatives of a prosocial and anticriminal position (high SOC, low ICO, high HEMP officers).

Interpersonally dominating styles, as evidenced by officer scores on CONe, or austere moralistic styles, as evidenced by a low HEMP - high SOC combination of traits, are associated with increased recidivism.

The indigenous worker principle was validated only when the more indigenous workers also presented the preferred pattern of scores on HEMP, SOC and ICO.

CHAPTER SIX: PROCESS AND OUTCOME

In this chapter, the most theoretically-relevant comparisons are presented. Crucial to the personal, interpersonal and community-reinforcement perspective are demonstrations that the correctional strategies derived from the model in fact have impact. With the range of process measures available, we are also looking for convergent validity. If different measures of the same processes produce the same pattern of results then confidence in the strategies and the underlying perspective is enhanced.

We have previously seen that the trait measures of interpersonal sensitivity and prosocial orientation related to both recidivism and attitude change in expected ways. We have also seen however, that the empirical connections between the trait measures and the more direct measures of process were not always impressive.

Role Preferences (SRS) and Outcome

The Relationship, Authority and Active Helping subscales of the SRS were highly intercorrelated, too highly in fact, to reasonably examine Relationship X Authority X Active Helping

interactions on recidivism and attitude change. Alternatively, two factors were formed: SRS-Relationship split at the median and high Active Intervention (above the median on at least one of Authority or Active Helping) versus low Active Intervention (below the median on both Authority and Active Helping). An analysis of covariance on recidivism was completed, with the interaction suppressed, and with client age, sex, preSOC and professional status of officers as covariates. There was no evidence of effects on recidivism, $p < .51$ (Relationship), $p < .99$ (Active Intervention).

Attitude change scores were analyzed with the appropriate pre-scores as a covariate and a sample of additional covariates (age, sex, group, change FAKE, officer sex) depending upon which factors related to change on specific attitude scales. There were only two reliable effects. The probationers of officers who scored high on active intervention presented less of a reduction on ALO ($F(1/126) = 11.27, p < .001$) and less of an increase on INCLW ($F(1/113) = 5.53, p < .02$). We conclude that there was little evidence that the SRS measure of officer role preferences related to outcome.

Participant Evaluations of Supervision and Recidivism

Client and officer reports on the three subscales of the Relationship Questionnaire were examined in relation to recidivism. The reports of the probationers at first testing were not significantly related to recidivism. However probationers' reports at the second testing, during the third or fourth month, were associated with recidivism.

Client reports on the Help subscale related significantly but positively to recidivism, $.26$, ($n=59$), $p < .02$ (group and sex partialled out). Client reports on the Quality of Relationship scale also related positively to recidivism but nonsignificantly so, $.17$, $p < .10$. Client reports on Direction were independent of recidivism.

The officers' first reports on Quality of Relationship related significantly and negatively to recidivism, $-.17$, ($n=104$), $p < .04$. In this case, first impressions were a better predictor than the scores at second testing, $-.07$, ns. Recall, that officer ratings at posttest were largely a function of officer personality. Neither the Help nor the Direction ratings related to recidivism.

As suggested in the introduction, extreme caution is indicated in the employment of participant evaluations as indicators of objective outcome. Under the conditions of OCCVP, it appears that positive reports by clients were signals of negative impact. On the other hand, positive reports by officers at first testing and first testing only, were signals of positive impact.

The Inservice Supervisors' Ratings of Volunteers and Recidivism

Supervisors' ratings were collapsed to form two levels (low and moderate versus high) on each of the five dimensions, (Relationship, Authority, Anticriminal, Problem-Solving and Environmental Facilitation). The five two-level factors were entered into an analysis of variance in recidivism with client age, sex and preSOC as covariates. There were no main effects of process (all p 's $> .20$) and the Relationship factor did not interact with any of the more directive factors. Again, participant reports were not predictive of recidivism.

Process During the Taped-Sessions and Recidivism

The relationships between process and recidivism were examined through point-biserial correlations. Problem-Solving, with either a Recreational focus (.08) or a Personal/Emotional focus (.02), was unrelated to recidivism. Similarly, Environmental Facilitation (-.15), Self-Disclosure (.12), Friendly (-.15), Info (-.21) and length of interview (.12) were not reliably related to recidivism. However, Authority (-.40, $p < .01$), Differential Reinforcement (-.35, $p < .01$), Modelling (-.42, $p < .01$) and Problem-Solving with a Community focus (-.32, $p < .01$) all related reliably and in the predicted direction with recidivism. Active Listening also correlated with recidivism (.26, $p < .05$), but the positive direction was noncrucial to our predictions since we predicted that the magnitude and direction depended upon other aspects of supervision as well as type of client.

A stepwise multiple regression revealed that the process measures were making some independent contributions to the predictability of recidivism; Multiple $R = .60$, $F(5/42) = 6.31$, $p < .01$. The beta weights were .4412 (Active Listening), -.3675 (Friendly), -.2053 (Authority) and -.1796 (PSO-Community). MODI was not allowed to enter the multiple regression because

of the missing values noted in the Method section.

Stepwise discriminant analyses provided a way of summarizing the overall relationship between the tape-process measures and recidivism. With the method, 85.4% of the probationers (n=48) could be correctly assigned to the recidivist and nonrecidivist categories (Table 27). Inspection of the discriminant function coefficients, suggests the relative importance of each process measure in relation to recidivism. Note that the quality of relationship indices do not form a unitary set. While Friendly acts were weighted to reflect reduced probability of recidivism, Active Listening was weighted to reflect increased probability of recidivism.

In summary, positive outcome was associated with high level attention to the probation contract, differential reinforcement of the client's prosocial and anticriminal expressions, high level attention to sources of satisfaction and discomfort in the community and with expressions of friendship but low levels of both paraphrasing and reflecting of feelings.

Relationship indices and recidivism by authority. To maintain continuity with Howell's (1972) analysis, the Authority

Table 27

THE TAPE-BASED PROCESS MEASURES AND RECIDIVISM: A
STEPWISE DISCRIMINANT ANALYSIS

Step Number	Variable Entered	Wilks' Lambda ^a	Change In Raos' V	Sign. of Change	Standardized Discriminant Function Coefficient
1	Authority	.83606	9.0199	.003	.28205
2	PSO - COMM.	.74691	6.5675	.01	.29453
3	Act. Listening	.69679	4.4293	.035	-.63215
4	Friendly	.65203	4.5325	.033	.57481
5	DRINDEX	.57088	10.0259	.002	.52684
6	PSO - Pers/Emot.	.55616	2.1327	.144	-.19326

a) All p's < .004

Canon Corr. = .6662; Wilks' Lambda = .55617; $\chi^2 (6) = 25.23, p < .000$

% of recidivists correctly classified, 58.3% (n=36)

% of nonrecidivists correctly classified, 94.4% (n=12)

% of total cases correctly classified, 85.4% (n=48)

scores were divided at the median to form low and high level Authority subgroups. Active Listening was positively related to recidivism under low Authority conditions ($p < .01$) but negatively (ns) so when high levels of Authority had been offered (Table 28). Thus, as predicted, the signalling value of the index of a high quality relationship varied with the more directive aspects of supervision. However, Self-Disclosure, Friendly and Info did not show such a pattern and, in fact, were unrelated ($p > .20$) to recidivism regardless of Authority levels.

Directive aspects of supervision and recidivism by Active Listening. Active Listening was divided at the median and scores on the directive process measures were examined in relation to recidivism, separately for the low and high Active Listening subgroups, (Table 29). The prediction was that directive supervision would be most strongly associated with reduced recidivism when high quality relationships were in effect. Inspection of Table 29, reveals that the prediction was not confirmed. In the case of two of the directive process measures (PSO-Personal/Emotional and Environmental Facilitation), the trend was in the opposite direction.

Table 28

QUALITY OF THE RELATIONSHIP DURING THE AUDIO-TAPED
SESSIONS AND RECIDIVISM BY AUTHORITY

	Low Authority (n=23)	High Authority (n=25)	Z Score (<u>p</u> <.20)
Active Listening	45**	-17	2.27**
Self-Disclosure	-12	18	—
Friendly	-10	-17	—
Infor	-15	-21	—

* p<.05

** p<.01

Table 29

DIRECTIVE SUPERVISION DURING THE AUDIO-TAPED
SESSIONS AND RECIDIVISM BY ACTIVE LISTENING

	Low Active Listening (n=24)	High Active Listening (n=24)	Z Score (p<.20)
Authority	-36*	-47**	—
Anticriminal (DRI)	-50**	-31	—
Problem Solving			
Community	-24	-49**	—
Recreational	-04	15	—
Personal/Emotional	-27	20	1.66
Environmental Facilitation	-24	15	1.37

* p<.05

** p<.01

Length of Interviews X Active Listening X Authority. On the assumption that the supervisory strategies require some minimum degree of exposure to the officer, length of interview (number of two-minute segments) was divided at the median and Authority and Active Listening re-examined in relation to recidivism. In order to give the reader a look at the actual recidivism rates, within the tape sample, the analysis was completed as a 2 X 2 X 2 factorial. Inspection of Table 30 shows that there was a statistically reliable triple interaction ($p < .03$). That interaction is analyzed in Table 31. In view of the small ns, nonparametric tests were employed for the analysis of simple effects. Note that Authority related to recidivism under almost all combinations of Active Listening and Length of Interview, albeit not always to a statistically significant degree. Active Listening reliably related to recidivism under only one condition: in brief interviews characterized by low Authority, high levels of Active Listening signalled negative impact. We assume that the interest and concern implied by paraphrases of substance and reflection of feelings represents, in the absence of Authority, a condoning of any ongoing activity, including criminal.

Table 30

A SUMMARY OF THE ANALYSIS OF VARIANCE IN RECIDIVISM BY LENGTH
OF INTERVIEWS, AUTHORITY AND ACTIVE LISTENING

Source	df	ms	F	P
Authority (A)	1	1.622	12.16	.001
Active Listening (AL)	1	.309	2.32	.14
Length of Interview (LI)	1	.172	1.29	.26
A X AL	1	.538	4.03	.05
A X LI	1	.001	.01	.94
AL X LI	1	.738	5.53	.02
A X AL X LI	1	.709	5.32	.03
Residual	40	.133		

Table 31

RECIDIVISM BY AUTHORITY, ACTIVE LISTENING
AND LENGTH OF INTERVIEW

	Low Authority		High Authority		<u>p</u>
	Proportion	Recidivist n	Proportion	Recidivist n	
<u>Short Interviews</u>					
Low Active Listening	.000	4	.11	9	<u>ns</u>
High Active Listening	1.000	4	.14	7	.025
	<u>p < .025</u>		<u>p < ns</u>		
<u>Long Interview</u>					
Low Active Listening	.43	7	.00	4	.10
High Active Listening	.37	8	.00	5	<u>ns</u>
	<u>p < ns</u>		<u>p < ns</u>		

Note: p based on Fisher exact tests.

Differential Treatment and the Tape-Based Process Measures

Client HEMP. The differential treatment hypothesis which received most support from the literature review was that suggesting that quality of relationship indices would be differentially related to recidivism dependent upon the interpersonal sensitivity or communication skills of the client. Inspection of Table 32 shows that the prediction was strongly confirmed in the present study. Active Listening was positively and reliably ($p < .01$) related to recidivism among the low HEMP probationers but negatively and reliably ($p < .05$) related to recidivism among high (HEMP clients, $Z = 3.95$, $p < .0001$). The same effect was evident with the Friendly index, although the positive correlation between Friendly score and recidivism did not reach reliable levels with the low HEMP clients. The between group difference was significant, $Z = 2.65$, $p < .004$. There were no other reliable differences between the r 's of the low HEMP and high HEMP clients, all p 's $> .20$.

Employing the beta weights in Table 32 as a guide to the relative importance of the supervisory strategies, the differential supervisory prescriptions for low and high HEMP clients became obvious. The less interpersonally sensitive probationers

Table 32

SUPERVISORY PROCESS DURING THE AUDIO-TAPED SESSIONS AND RECIDIVISM

BY THE EMPATHY (HEMP) LEVEL OF CLIENTS:

THE SIMPLE AND MULTIPLE R's

	Low HEMP (n=28)		High HEMP (n=18)	
	<u>r</u>	Beta	<u>r</u>	Beta
Authority	-.44**	-.1734	-.37	
Anti-Criminal (DRI)	-.24		-.59**	-.4339
PSO				
Community	-.46**	-.1772	-.23	
Recreational	.23		-.17	-.1948
Personal/Emotional	.14		-.23	
Environmental Facilitation	-.14		.22	
Relationship				
Active Listening	.66**	.4970	-.46*	
Self-Disclosure	.29		.08	
Friendly	.17		-.60**	-.5199
Info	-.08		-.43	
		Multiple R = .698	Multiple R = .776	
		F(3/24) = 7.59**	F(3/14) = 7.07**	

* p<.05; ** p<.01

respond to high levels of authority and community-oriented problem-solving within the context of low levels of relationship-based counselling. On the other hand, the more interpersonally skilled clients respond to a warm and understanding relationship with an appropriate role-model and may also respond positively to some problem-solving activity.

Client ICO. On the assumption that high ICO probationers were only too well aware of the immediate rewards associated with criminal activity, a heightening of their awareness of the legal sanctions was hypothesized to be a particularly important aspect of supervision for these offenders. Inspection of Table 33 reveals that there was simply no evidence that Authority differentially related to recidivism as a function of the probationers identification with other offenders. Nor did the correlations between the process measures and recidivism vary reliably with ICO. The only trend approaching conventional levels of significance was a tendency for high ICO offenders to respond negatively to high levels of Problem-Solving with a Personal/Emotional focus, $Z = 1.56$, $p < .12$ (two-tailed).

Client SOC. Client scores on SOC were employed as an index of the rewards associated with conventional settings and pursuits.

Table 33

SUPERVISORY PROCESS DURING THE AUDIO-TAPED SESSIONS AND RECIDIVISM
BY CLIENT'S LEVEL OF IDENTIFICATION WITH CRIMINAL
OTHERS (ICO): THE SIMPLE AND MULTIPLE R'S

	Low ICO (n=22)		High ICO (n=26)	
	r	Beta	r	Beta
Authority	-.39*	-.4299	-.40*	-.3078
Anti-Criminal (DRI)	-.14		-.38*	-.3471
PSO				
Community	-.27	-.3194	-.36*	
Recreational	.01		.09	
Personal/Emotional	-.15		.32	.4322
Environmental Facilitation	-.10		-.19	
Relationship				
Active Listening	.22	.2591	.27	
Self-Disclosure	.19		.03	
Friendly	-.16		-.10	
Info	-.28		-.17	

Multiple R = .559
F(3/18) = 2.74

Multiple R = .631
F(3/22) = 4.84**

* p<.05; ** p<.01

Low SOC scores suggested low levels of rewards and hence PSO-Community was hypothesized to be particularly important with that sub-group of probationers (Table 34). As predicted, Problem-Solving with a Community focus was negatively and reliably ($p < .05$) related to recidivism among low SOC clients. However, the difference between the r 's for the low SOC and high SOC probationers was not statistically reliable, $Z = 1.03$, ns. Again, however there was a reliable difference between the r 's with Active Listening, $Z = 3.01$, $p < .002$. The difference between the r 's with the Differential Reinforcement Index was also approaching statistical significance, $Z = 1.79$, $p < .07$ (two-tailed).

The complexities of the interactions of process with client SOC may be clarified through joint classification on the personality factors.

Client ICO and SOC. Table 35 presents the correlations between process and recidivism for groups defined by both ICO and SOC. Note that, consistent with our theoretical perspective, there was no recidivism among high SOC - low ICO probationers. Note, as well, however, that an inspection of the process scores for that sample revealed that they were generally in receipt of

Table 34

SUPERVISORY PROCESS DURING THE AUDIO-TAPED SESSIONS AND RECIDIVISM

BY THE SOCIALIZATION (SOC) LEVEL OF CLIENTS:

THE SIMPLE AND MULTIPLE R's

	Low SOC (n=21)		High SOC (n=25)	
	<u>r</u>	Beta	<u>r</u>	Beta
Authority	-.53**	-.4373	-.25	
Anti-Criminal (DRI)	-.16		-.59**	-.5647
PSO				
Community	-.42*	-.3386	-.12	
Recreational	.15		-.08	
Personal/Emotional	.10		-.01	.1941
Environment Facilitation	-.28		-.08	
Relationship				
Active Listening	.59**	.3303	-.27	
Self-Disclosure	.06		.23	
Friendly	.02		-.36*	-.2401
Info	-.30		-.29	

Multiple R = .755
F(3/17) = 7.54**

Multiple R = .645
F(3/21) = 4.99**

* $p < .05$; ** $p < .01$

Table 35

SUPERVISORY PROCESS DURING THE AUDIO-TAPED SESSIONS AND
RECIDIVISM BY CLIENT SOC AND ICO

	SOC - LOW ICO - LOW (n=9) <u>r</u>	SOC - LOW ICO - HIGH (n=12) <u>r</u>	SOC - HIGH ICO - HIGH (n=13) <u>r</u>
Authority	-.63*	-.44	-.38
Anti-Criminal	.02	-.23	-.57*
PSO			
Community	-.42	-.53*	-.06
Recreational	.01	.25	-.14
Personal/Emotional	-.39	.39	.19
Environmental Facilitation	-.31	-.26	-.16
Relationship			
Active Listening	.45	.74**	-.32
Self-Disclosure	.22	-.09	.16
Friendly	-.03	.02	-.47*
Info	-.54	-.02	-.39

Note: The recidivism rate within the High Soc - Low ICO group was 0.00%.

high levels of supervision. We cannot conclude then that they would not have recidivated in the absence of supervision.

Inspection of the first row of Table 35 reveals that Authority most strongly related to recidivism among the low SOC - low ICO offenders but the r was not reliably different from the correlations evident within the other client group. It was suggested in the introduction that those delinquents most strongly tied to crime and least strongly tied to convention would require the highest levels of authority. It now appears that high level use of authority may be equally appropriate with all probationers.

The differences between the three tabled r 's involving DRI were well within chance levels, $\chi^2 (2) = 1.83$, ns (based on the χ^2 test for the homogeneity of three values of r). For replication in future studies we simply note that the differences between the r 's for DRI and recidivism were greatest in comparisons with highly tied probationers (high SOC - high ICO) versus loosely tied probationers (low SOC - low ICO).

Joint classification on ICO and SOC did not clarify the correlations between PSO-Community and recidivism. Again, the correlations were strongest with low SOC clients but there were

no significant differences on an overall χ^2 test of the three r 's ($p < .20$). With joint classification on ICO and SOC, the previously noted reliable difference between the r 's of low SOC and high SOC clients was maintained on Active Listening.

Client HEMP and SOC. Table 36 provides a further exploration of the differential treatment hypotheses. The pattern of of results found accounts for the previously apparent interactions of Active Listening with SOC and HEMP. It is readily apparent by inspection, that the interaction of Active Listening (and Friendly) with HEMP was strongest and statistically reliable only among the low SOC clients. An overall test of differences between the four r 's was statistically significant, $\chi^2 (3) = 15.15$, $p < .01$.

Authority most strongly related to recidivism with the low SOC - low HEMP probationers and least so with the high SOC - low HEMP clients. However, an overall test of the differences suggested that such differences are best considered chance fluctuations, $\chi^2 (3) = 3.22$, $p > .30$.

The joint classification of probationers on SOC and HEMP did clarify the question of the relationship between differential

Table 36

TAPE-BASED SUPERVISORY PROCESS AND RECIDIVISM BY CLIENT HEMP AND SOC

	Low SOC				High SOC			
	Low HEMP		High HEMP		Low HEMP		High HEMP	
	<u>r</u>	<u>Beta</u>	<u>r</u>	<u>Beta</u>	<u>r</u>	<u>Beta</u>	<u>r</u>	<u>Beta</u>
Authority	-64**	-.3704	-38		01		-39	
Anticriminal	-23		41		10		-82**	-.8891
Problem-Solving								
Community	-56*		-33		12	.3554	-18	
Recreational	31		-33		-26		-09	
Personal/Emotional	16		-21		28		-24	
Environmental Facilitation	-26		-30		08		-16	
Relationship								
Active Listening	71**	.5112	-83*		04		-42	
Self-Disclosure	30		03		37	.5236	09	-.2030
Friendly	27		-77*		-12		-54*	
Info	-38		-24		27		-63*	
		(n=15)	(n=6)		(n=13)		(n=12)	
	MR=.775				MR=.486		MR=.844	
	<u>F</u> (2/12)=9.01**				<u>F</u> (2/10)=1.54		<u>F</u> (2/9)=11.12**	

* p<.05

** p<.01

reinforcement and recidivism. There were reliable differences between the four r 's presented in the second row of Table 36, $\chi^2 (3) = 9.87, p < .02$. It is clear that the role-model strategy of supervision related reliably and most negatively to recidivism with clients who scored high on both SOC and HEMP. The correlations were nonsignificant for three other sets of probationers.

The HEMP - SOC table was re-examined in a final attempt to clarify the differential importance of PSO-Community. PSO-Community related reliably and negatively to recidivism with low SOC - low HEMP clients. However, again, there was no overall difference between the four r 's, $\chi^2 (3) = 3.20, p > .30$.

A summary of the findings on differential treatment effects.

Authority and Problem-Solving with a Community focus were negatively and reliably related to recidivism in the analysis of the total tape sample and there was no statistically reliable evidence that their predictive value varied with type of client. However, we would, and will, recommend that future studies re-examine the question paying particular attention to the SOC variable. Active Listening and Friendly interacted, as predicted, with client HEMP — relationship oriented supervision was associated with success among the interpersonally sensitive clients but with

failure among the less sensitive clients. As found in the volunteer-professional comparisons, the differences were particularly evident with low SOC probationers. We predicted that the anti-criminal dimension would be uniformly important but the strongest positive correlations with successful outcome were found among the high SOC clients, particularly if they were also above the median on HEMP. While we are fully confident about the reliability of the Active Listening X HEMP interaction, the DRI X SOC X HEMP interaction should be treated as suggestive until replicated. It was not predicted and only emerged following considerable multiple cross-classification and large reductions in n.

Tape-Based Process and the Indigenous Worker Index

Officers in the tape-based sample were classified as either above the median or below the median on OINDIG and the correlations between process and recidivism were examined for both the low and high indigenous officers. Contrary to predictions, there were no reliable differences between the r's on any of the basic process measures, including the anticriminal (role-model) or relationship indices (all p's $>.20$). However, one large and unexpected difference was found with length of interview measures.

Length of interview was positively related to recidivism within the low OINDIG set of officers (.67, $p < .01$) but unrelated with high OINDIG officers (-.06, ns), $Z = 2.74$, $p < .006$. In so far as duration of contacts is one aspect of Ku et al's (undated) "friend-companion" category, one of their principles of matching received strong support from our data. The finding was a surprise because there was no indication in any of the previously reported analyses that length of interview was related in any way to recidivism. In fact, up to this point, the correlations had been so small that they were not routinely reported.¹

Taped-Based Process and Professional Status of Officers

Chapter Four revealed that there were some large differences between the volunteer and professional officers on the taped-based process measures. However, our theoretical perspective suggests that the same strategies will be effective for both volunteer and professional officers, ie. if supervision is having effects we do not need a separate set of behavioural principles to account for the effects.

There was one set of reliable differences between the volunteer and professional samples in terms of how process related to

1. An analysis of the total number of contacts had also failed to reveal reliable relationships with recidivism.

recidivism. The anticriminal measures were independent of recidivism within the professional sample but strongly and reliably related to recidivism within the volunteer sample: DRI, .20 (PPO's) versus -.55 (VPO's), $Z = 2.67$, $p .007$; MODI, .10 versus -.55, $Z = 2.33$, $p .02$. All other between-officer p 's were greater than .15. Recall from Chapter Four, that there was virtually no variability in the DRI and MODI score of the professionals and this may account for the differential relationship with recidivism. In addition, the anticriminal dimension may require relatively high rates of contact between officers and probationers to be effective.

All of the correlations initially reported between process and recidivism were recomputed as partial correlations with controls introduced for the professional status of officer. The r 's previously reported as statistically reliable remained so and none of the nonsignificant r 's reached reliable levels.

Tape-Based Process and Client Age

Probationer age proved to be very important in the comparisons of volunteer and professional supervision and hence the correlations between process and outcome were re-analyzed, separately

for the younger (under 20 years) and older clients. Table 37 presents the correlations found with low SOC and high SOC clients separately by age. Note the n's were too small to routinely include age as a factor in the previously reported analyses, however, Table 37 shows that the same general conclusions are reached when only the younger clients are included. Recidivism rates were lower among the older clients and no reliable correlations were evident between process and recidivism. The suggestion is clear that the previously reported findings should be considered most relevant to younger clients.

Tape-Based Process and Recidivism Controlling for Client Traits

The levels of supervisory process in effect during the taped-interviews were not under experimental control and hence the relationships discovered could logically reflect, not so much officer behaviour, but client behaviour. We have already introduced controls for client sex (males only), age, SOC, ICO and HEMP and the effects were maintained as reported.

Partials were also completed controlling for those client biographic and attitudinal factors which were shown in Chapter Five to relate to the tape-based process measures. Briefly,

Table 37

SUPERVISORY PROCESS DURING THE AUDIO-TAPED SESSIONS AND RECIDIVISM

BY AGE AND SOCIALIZATION OF CLIENTS:

THE SIMPLE AND MULTIPLE R'S

	Low SOC		High SOC	
	Young (n=15) Σ	Beta	Older (n=6) Σ	Beta
Authority	-.54*		-.49	
Anti-Criminal (DRI)	-.25		.42	
PSO				
Community	-.64**	-.3089	-.29	
Recreational	.28		-.27	
Personal Emotional	.16		-.22	
Environmental Facilitation	-.16		-.44	
Relationship				
Active Listening	.71**	.5099	-.47	
Self-Disclosure	.24		.04	
Friendly	.27		-.64	
Info	-.26		-.33	

Multiple R = .748
F(2/12) = 7.63**

Multiple R = .362
F(2/12) = 17.34**

* p<.05; ** p<.01

the relationship between Authority and recidivism was maintained ($-.44, p < .002$) as were the relationships with recidivism involving PSO-Community ($-.26, p < .05$) and DRI ($-.34, p < .01$). The overall relationship between Active Listening and recidivism was reduced ($.21, p < .13$) but it is unlikely that client pretest scores could account for the interactions in which Active Listening was involved. Note as well, that the original overall correlation was only .26. The reduction in the reliability of the relationship primarily reflects the reduced degrees of freedom.

In spite of our inability to make the process-recidivism relationships disappear, the reader is again cautioned that we have been reporting field-descriptive findings. However, the degree of consistency of the results (ie. with those of previous studies, with our own findings regarding volunteer-professional supervision and with our predictions) enhances confidence in the validity of the findings.

Attitude Change

Two specific sets of predictions were made regarding attitude change. One set predicted certain relationships between the

tape-based process measures and attitude change. The second concerned the relationship between attitude change and recidivism.

Tape-Based Process Measures and Attitude Change

Table 38 presents the reliable correlations found between the process measures and attitude change controlling for client prescores and professional status of officers.

The Authority and Anticriminal dimensions. Both Authority and DRI related to recidivism as predicted but the pattern of results on attitude change was unexpected. DRI did not relate to changes on the criminal orientation indices, and, in fact, was independent of all change scores. Authority, on the other hand, related reliably and in the favourable direction to changes on TLCP, ICO, TINP, ANX and HEMP. Authority was also associated with reduced faking on the attitudinal indices. It appears that concrete and high level review of the probation contract, and/or whatever unmeasured activities may have varied along with Authority, had positive effects on the personal, interpersonal and legal orientation of the probationers.

Problem-Solving. A community focus was not associated with the gains which were predicted on personal, interpersonal or community functioning. A personal/emotional focus was associated with a decreased sense of inadequacy and increased interpersonal sensitivity but more negative attitudes towards the law and education. We expect that the increased NEUR scores associated with a recreational focus was a chance effect.

Environmental Facilitation. Advocate-broker activity was unrelated to recidivism and it also failed to relate in expected ways to clients' community orientation. In fact, high levels of advocate-broker activity were associated with deterioration in attitudes toward employment. There was also an uninterpretable decrease on the Psychopathy measures.

The Relationship indices. Consistent with the findings on recidivism, high levels of Active Listening were associated with deterioration on attitudes towards the law and increased acceptance of rationalizations for law violations. Contrary to predictions, high levels of Active Listening were associated with decreased acceptance of others and increased anxiety. Length of interview was also generally associated with negative changes on the attitudinal measures.

Attitude Change and Recidivism

Our predictions concerning the relationship between process and attitude change did not fare well. The theoretical perspective suggested certain appropriate intermediate targets for change if the ultimate goal was reduced recidivism. The dimensions of supervisory process were formulated with reference to those targets, and while process related to recidivism, the process measures did not relate consistently to the intermediate targets. Here we examine the direct relationship between changes on the intermediate targets and recidivism.

Table 39, shows that the change scores predicting to recidivism were the measures of criminal orientation primarily (TLCP, TLV, ICO) as well as CONe, Psychopathy and SOC. The CONe effect was particularly evident among the women on probation. Note that both age and the appropriate prescores were entered as control variables. There was no evidence that changes on the personal and social adequacy, or interpersonal sensitivity measures were associated with reduced recidivism.

While the findings speak well for reformation programs which focus on the core issues in criminal conduct (ie. the

Table 39

THE CORRELATIONS BETWEEN ATTITUDE CHANGE AND RECIDIVISM BY
SEX OF CLIENT: PARTIAL CORRELATIONS CONTROLLING FOR GROUP,
AGE, PRESCORES AND SEX AND A STEPWISE MULTIPLE REGRESSION

Change on	Male Clients (n=117)	Female Clients (n=33)	Total Sample (n=150)	Total Sample Beta
TLCP	-26**	-20	-20**	-.19687
TLV	16*	10	15*	.13683
ICO	15*	13	15*	_____
ALO	-04	16	-04	-.1188
TINP	14	-03	12	.10907
EDUC	12	-16	06	.22058
EMPL	05	-26	-05	_____
ACO	-07	-15	-07	_____
SE	-04	-03	-04	_____
ANX	11	-26	03	-.16618
HEMP	05	23	09	_____
SOC	-17*	-29*	-17*	_____
FAKE	01	-05	-02	-.11907
AFFe	08	12	03	_____
AFFw	15	-15	13	.13998
INCLe	-03	05	-03	-.11779
INCLw	-02	-21	-03	-.15656
CONe	10	35*	14*	.11876
CONw	11	01	07	_____
PSYCH	17*	36*	18**	.17651
NEUR	07	20	09	_____
INAD	02	-20	-01	-.00994
SM	06	21	05	-.12602
FD	13	-03	-01	-.00792

Multiple R = .48748; Age = .19333; Sex = -.00802; F(18/113) = 1.96, $p < .05$

* $p < .05$

** $p < .01$

criminality of the client) as opposed to personal or social status, the complete and utter failure of changes on the personal and social indices to predict recidivism is surprising. We have seen (Appendix D) that the personal and social indices were among the most discriminating variables in officer-probationer comparisons and, the validity of the personal, interpersonal and community-reinforcement perspective depends upon such correlations.

Appendix D outlined the correlations between pretested attitudes and recidivism separately for male and female probationers. The expected pattern was evident with prescores, particularly among the male clients. Recidivism was predicted by SOC but also by a sense of alienation (ALO), poor self-image (SE), feelings of tension and anxiety (ANX, NEUR), histories of inadequate-immature behaviour (INAD) and problems at home and school (FD, SM).

It may well be that it takes time, more than the duration of the probation period, for sufficient changes to occur in personal and social status and hence to have a direct effect on criminal conduct. It may also be that the efforts at problem-solving were simply not good enough to produce such changes. Recall that reliable PSO-change correlations were virtually nonexistent

A post-probation follow-up is required to examine the ultimate impact of problem-solving activities and changes in personal and social functioning. We can conclude that the Authority dimension was effective with reference to in-program recidivism and inprogram gains on attitudinal indices.

Participant Evaluations and Taped-Based Process

The presentation of the results closes with a look at how the participants' satisfaction with supervision related to process. We have seen that participant evaluations on the Relationship Questionnaire (RQ) were largely a function of participant personality and that client satisfaction tended to be associated with increased recidivism.

High levels of authority were associated with negative reports on actual help received ($p < .01$ for both the officer and client reports on RQ-Help). Table 40 reveals few other reliable correlations. Clients who received high level attention to their personal and emotional states were more likely to report positively on the quality of relationship ($p < .05$). High levels of Environmental Facilitation were associated with negative reports by both officers and clients. Self-disclosing officers thought they were delivering high quality supervision but the clients did

Table 40

SUPERVISORY PROCESS DURING THE AUDIO-TAPED SESSION AND CLIENT AND OFFICER EVALUATIONS ON THE SUB-SCALES ON THE RELATIONSHIP QUESTIONNAIRE

	Client Reports (n = 39)			Officer Reports (n = 39)		
	Qual.	Help	DIR	Qual	Help	DIR
Authority	-08	-43**	-13	-32*	-37**	-00
Anti-Criminal						
DRI	13	-07	-16	07	08	-22
MODI (n=26)	14	09		04	07	-21
PSO						
Community	23	09	-22	-06	05	08
Recreational	-14	-13	08	-29	-20	02
Personal/Emotional	26*	18	09	10	17	-03
Environmental Facilitation	-27*	-17	11	-26	-27*	30*
Relationship						
Active Listening	05	05	29*	-25	-02	-18
Self-Disclosure	11	08	-15	27*	37**	06
Friendly	-13	-16	13	-24	-26	-01
Info	16	-05	-37**	-25	-09	-07
No. of Segments	43**	38**	-06	57**	59**	06

not so report. Positive reports by both officers and clients were most strongly associated with long interviews.

Again, participant reports do not appear to be valid indicators of the quality of supervision actually received nor of ultimate impact.

Summary: Process and Outcome

Neither officer role preferences nor participant or supervisors' reports on quality of supervision were valid predictors of outcome. Officer role preferences appeared to primarily reflect the volunteer-professional distinction and the high intercorrelations among the subscales prevented an adequate investigations of role preference interaction. In the absence of highly specific information on actual treatment being received, participant evaluations, including those of the inservice supervisors of officers, are best considered reflections of participant rather than program characteristics. This confirms some of our predictions and cross-validates Wormith's (1977) observations. It also shows that we were unable to establish the validity of our assumptions across the whole range of process measures.

As did the trait measures of process, the overall analysis of the taped-based process measures in relation to recidivism strongly supported the predictions derived from the literature and the theoretical

perspective. In fact, the standardized coefficients from the stepwise discriminant analysis, as an objective guide to the elements of effective correctional counselling, provided prescriptions virtually identical to those of the theoretical perspective: within the context of a warm relationship, avoid noncontingent interest in the client's expression but, do differentially approve of expressions on the prosocial-antisocial dimension and do offer high levels of problem-solving with reference to the specifics of the probation contract and the client's adjustment within the community; personal and/or emotional problems, problems without concrete community referents, are best ignored or given only passing attention.

There was some evidence that quality of the relationship and the more directive aspects of supervision interacted. High rates of paraphrasing and reflection of feelings were predictive of recidivism when low levels of Authority were being offered, particularly so during short interviews. High level discussion of the probation contract was particularly important during brief interviews when the officer was also engaging in Active Listening. There was no additional evidence of the predicted interactions. The sample size was too small to examine whether interaction of supervisory strategies depended upon client characteristics.

The predicted interaction of relationship indices (Active Listening and Friendly) and the interpersonal sensitivity of probationers was strongly supported. Considering the complementary finding from the volunteer-professional comparisons in this study as well as the earlier literature, this version of the differential treatment hypothesis may now be considered a general law of correctional counselling.

The predictions that Authority would be most effective with offenders "committed" to crime and that PSO-Community would be most effective with clients presenting weak ties to the community were not supported to a sufficiently convincing degree. Unexpectedly, Differential Reinforcement related most strongly to recidivism within the high SOC - high HEMP client groups. The differential treatment hypothesis seems unresolved with reference to the Authority, Anticriminal and Problem-Solving dimensions.

The indigenous worker principle received only minor support from an analysis of interactions with the tape-based process measures. However, high levels of contact with a nonindigenous worker did reliably signal negative impact.

The correlations between the tape-based process measures and

attitude change did not reflect the predicted pattern of relationships. Authority scores most reliably related to prosocial and anticriminal gains and Active Listening most consistently related to deterioration.

Positive changes on the attitudinal measures of criminal orientation most reliably related to recidivism. However, pre-test scores on the personal and social functioning scales also related to recidivism. It was suggested that gains on the personal and social indices may not become apparent, nor relate to recidivism, until follow-up. During the period of probation supervision, Authority was the key strategy in relation to prosocial gains on attitudinal indices.

CHAPTER SEVEN: SUMMARY AND DISCUSSION

The evaluation of the one-to-one supervisory role for volunteers in adult probation services was designed with reference to several objectives: a) to produce a broadly-based comparison of volunteer and professional supervision on theoretically-relevant dimensions of process and outcome, b) to establish the construct validity of a set of measures of correctional practices, c) to explore the differential treatment hypotheses and d) to produce additional validity data on an attitude and personality battery.

Toward these ends, 190 adult probationers were randomly assigned to either volunteer or professional supervision. Sixty volunteers and fourteen professional probation officers participated. All participants were pretested on the attitude and personality battery prior to the assignment of cases and again six months later. The attitude change scores over the six month period formed one set of outcome variables. The second set of outcome variables included recidivism indices based on reconvictions during the formal probation period. Prescores on selected scales from the attitude and personality battery were also used to classify officers and clients on theoretically and process-related dimensions.

Process measures were sampled at various periods over the course of the study and in various forms. Within the second or third week of case assignment, officers and probationers were asked to audio-tape a supervisory interview and this request was repeated three months later. At the time of the tapings, officers and clients were asked additionally to complete a brief confidential report on the quality of supervision being offered and received. The audio-tapes provided the most direct access to information on actual supervisory practices and were the data source for a set of behavioural measures of process. Additional measures included officer preferences for various descriptions of the probation officer role and monthly reports by officers on the frequency and nature of client contacts.

By way of a summary of the design, the study was field-experimental for purposes of the volunteer-professional comparisons and field-descriptive for purposes of examining the relationship between process and outcome. An underlying assumption was that progress in criminology depends upon an integration of theory and evaluation in corrections.

The results are discussed with reference to the major objectives of the study. The discussion closes with a set of prescriptive

statements for correctional counselling and a recommendation for the directions of future research.

Comparisons of Volunteer and Professional Supervision

Community Representation and Impact on the Volunteers

At the political-economic level, there has been an assumption that citizen participation in corrections represents a way of enhancing community representation in the system and is one viable approach to public education. The program described in this report was able to increase not only the number of officers involved in one-to-one probation supervision but also the heterogeneity of the officer characteristics. The recruitment and screening procedures produced a set of volunteers with personal and social characteristics significantly different from those of the professionals: there were more younger people and women in the volunteer pool and their distribution over the marital, educational, and occupational categories was more like that of the clients than was the professional distribution over the same categories. On the whole, the volunteer workers were more indigenous to the client sample than were the professionals on bio-social factors. The volunteers also had somewhat more

optimistic attitudinal patterns than did the professionals, less of an awareness of the limits within the opportunity structure and more positive attitudes towards the law, courts and police.

There was evidence that the volunteer program had impact on the volunteers. Over the first six months of their participation, volunteers showed increased respect for the law and the judicial system and decreased tolerance for law violations. Participation also appeared to have beneficial personal effects in terms of a reduced sense of isolation, normlessness and powerlessness. The positive effects of participation in the probation program replicates the findings associated with volunteer participation in a structured group counselling program in prison settings (Andrews, Wormith, Kennedy & Daigle-Zinn, 1977). We expect that the effect is a function of program structure since, like several studies in the mental health area, companion, recreational and other relatively unstructured programs are sometimes associated with no change or negative change in attitudes towards the respective institutions and organizations. A separate study is presently investigating the effects of volunteer participation on their attitudes towards various issues in, and knowledge of, the correctional system, as well as the possibility of spread-of-effect to the associates of volunteers (Pirs & Andrews, 1977).

Kiessling (1976) has noted that several volunteers went on to accept employment in corrections and some others entered graduate schools in criminology. This, too, replicates our experience in institution-based programs (Andrews & Gendreau, 1975). While there are no obvious cause-effect implications, it is clear that participation in volunteer programs is often consistent with the post-participation career choices of volunteers. The career-ladder progression concept has important implications for the recruitment of volunteers and for the subsequent recruitment of professional staff.

Volunteer and Professional Supervision: Process

The study has documented the large and wide-ranging differences between volunteer and professional supervision. The large differences on frequency of contact were certainly expected, and had they not occurred, it would have constituted evidence that the formal prescriptions for volunteer supervision in OCCVP had not been followed by the volunteers. It is important to note that in OCCVP, the volunteer was the client's probation officer and formally designated "assistant probation officer". In some other programs in the literature (for example, that described by Berger et al., 1975), the volunteers are not probation officers

but "companions" and the volunteer contacts are simply an adjunct to regular professional supervision; in Berger et al. (1975) the experimental and control clients were seen an equal number of times by the professionals. By contrast, the present results on frequency of contact replicated Kiessling (1972) and Howell (1972).

Like Howell (1972), we also found that the clients and officers in the volunteer sample reported more positively on supervision than did the professional sample. Unlike Howell, we were unable to document any differences in the participant-reported amounts of direction imposed by volunteer and professional officers. However, our participant-report measure of perceived direction was psychometrically questionable. Overall, the differences on participant evaluations were not large.

Moving beyond frequency of contacts and participant evaluations, large differences were found on the nature and type of contacts, on officer preferences for various probation-officer role descriptions, and in actual officer behaviour during audio-taped sessions. There was substantial subject attrition with the latter measures, but comparisons of the tape samples with the total samples suggested that they were comparable. A succinct

summary statement of the findings reflects exactly what would be expected on the basis of the actual roles of volunteers and professionals: volunteer supervision emphasized the quality of relationship dimension while professional supervision emphasized authority. Appropriate differences were found on officer-reported role preferences, (authority versus friendship), the actual location of interviews and meetings (office-based versus community-based), the choice of significant others with whom officers made contacts (police versus family and friends), and on the tape-based measures (references to the probation contract versus accounts of personal experiences; short interviews versus long interviews).

The direction of differences on the anticriminal and problem-solving aspects of supervision were not predicted in advance. However, the professionals engaged in higher level problem-solving with a community focus while the volunteers paid higher level attention to the recreational activities of their clients. The latter is consistent with the greater friendship orientation of volunteers. Note that overall, in the taped-interviews, the volunteers engaged their clients in more problem-solving than did the professionals, but, when controls were introduced for length of interview, it was clear that professional problem-solving

was at a higher level on average than that of the volunteers. As we might have expected, time limited intervention encouraged more efficient intervention.

Typically, a major assumption in volunteer programming is that the volunteer is an appropriate role-model. On both of our anticriminal indices, modelling and differential reinforcement, the professionals more consistently represented a prosocial and anticriminal orientation. This might be expected given the volunteer's relative freedom from the formal role constraints of a professional officer.

Volunteer and Professional Supervision: Outcome

In spite of the massive differences between volunteer and professional styles of supervision, there were no overall differences on client attitude change or recidivism. This overall finding is consistent with the majority of reports on community-based voluntary action programs (Cook & Scioli, 1975). In fact, to the authors' knowledge, only one well controlled community-based study has shown differences on outcome indices (Ku et al., undated). In that case, volunteers and probationers were carefully matched on the basis of the probationer's needs and the volunteer's

skills. As well, at least middle risk clients were assigned to volunteers. Our own data indicate that such matching is crucial if overall differences in outcome are to emerge. In the absence of a priori matching, one might expect Type of Supervisor X Type of Client interactions and such were predicted and found in this study.

The predicted interaction of professional status of officer and type of client was strongly supported, although the interaction was more complex than expected. Volunteer supervision was significantly more effective than professional supervision with interpersonally skilled probationers, considerably so with the younger and less socialized clients. We expect the limits placed on the interaction reflect the fact that the older clients and high socialization clients simply had too low a probability of recidivating for effects to be evident. The interaction may be accounted for by a now basic principle of correctional counselling: clients who present some evidence of interpersonal and communication skills respond most positively to relationship-oriented counselling. This explanation for the volunteer and professional differences and the principle of correctional counselling, received even stronger support from the analyses of tape-based process measures and recidivism reviewed below.

Hopefully, the present results, in conjunction with the findings from other experimental investigations of intervention in corrections (as reviewed by Andrews, 1977a) will contribute to a proper reworking of the now-fashionable rhetoric surrounding the "nothing works", "stop evaluating", "nonintervention" and "scientific management" orientations.

The Findings and the Theoretical Perspective

The Assumptions

It was the position of this report that progress in correctional counselling, and hence criminology, has been impeded by a lack of systematic attention to theory and by facile movement from one level of analysis to another. Decisions on the appropriate level of analysis have been confused by the variety of goals set for the criminal justice system as a whole, by the rich variety of interests within criminology, and by undisciplined shifts of attention from one level of analysis to another. One classic example of inappropriate shifts from one level to another was noted in the introduction: Cressey's (1955) confusion of the social group versus the individual as the proper focus for reformation programs. A more recent example is that of Berger et

al. (1975), who found that three volunteer programs (a companion program, a group program and tutorial program) were not related in a reliable and consistent manner to several outcome indices and then recommended that courts divest themselves of rehabilitative functions. Criminology must be multi-disciplinary (Taylor, Walton & Young, 1973) but it must also retain some commitment to disciplined modes of thought and inquiry.

Whatever the other objectives set for the criminal justice system, and whatever the political economic and ethical restraints and encouragements, one widely-agreed upon goal for corrections is the achievement of reductions in the probability of criminal acts on the part of convicted offenders who enter the system. On various criteria, including humanistic, economic and functional, there are arguments that simple incapacitation for some specified period is a societal response of limited worth. Thus attention has focused recently on community-based programs.

The appropriate level of analysis for the practice of correctional counselling is that of individual conduct, hence we turned to a major body of scientific knowledge concerning human choice and action. Within behaviour theory, the processes which encourage and discourage criminal and noncriminal acts are reinforce-

ment and punishment. The reinforcing and punishing consequences of acts are rich in variety, distributed across and within the personal, the interpersonal and the community sources of consequent events. On the basis of a review of a personal, interpersonal and community-reinforcement perspective, the primary intermediate objectives of correctional counselling were identified as i) heightened awareness of the function of the law and the legal sanctions, ii) the acquisition of a prosocial and anti-criminal attitudinal, value and belief system, and iii) enhanced functioning and increased rewards within noncriminal community settings. The theoretical system assumes that offenders, like nonoffenders, are morally responsible ie. capable of self-managing with reference to their knowledge, attitudes, values and beliefs. If the intermediate objectives of counselling are met, then the balance of reinforcers for criminal and noncriminal activity will favour the noncriminal. That is, the attainment of the intermediate objectives will be associated with reduced criminal activity.

The dimensions of supervisory process represented correctional strategies, or sets of practices, designed to correspond to the primary intermediate objectives of counselling: i) Authority: high level use of the surveillance and the control features of the

probation contract were identified as means of meeting the first objective of counselling or supervision; ii) Anticriminal: exposure to a successful person who modelled and reinforced prosocial and anticriminal values, attitudes, beliefs and behaviour should be associated with the attainment of the second objective; iii) Problem-Solving: problem-solving activities are aimed at increasing the variety and density of rewards in the community; problem-solving with a focus on community adjustment and advocate-broker activity in the community were separated for analytic purposes from problem-solving with a recreational and intra-psychic focus, the latter foci, and associated methods, have never been shown to relate to the objectives of interest in correctional counselling.

The quality of the relationship between worker and client was identified as an additional dimension of importance in correctional counselling. Most social learning theories recognize that interpersonal influence is greatest when interaction occurs within the context of a warm, open and understanding relationship.

The intermediate objectives and the strategies derived from the theoretical perspective are not novel to criminology and corrections. What we hope is useful is that the range of objectives and strategies are recognized to be important within a single

system and a system which focuses on individual conduct. Further, the intermediate targets and strategies may be operationalized readily. Note that our interest was not in demonstrating that the behaviour of offenders is under antecedent and outcome control. We assume that. The problem is to establish the validity of the sets of practices designed to produce changes in the probability of criminal acts.

Process and Outcome: Trait Measures

By combining the relationship and anticriminal dimensions, it was predicted that the most effective officers would be interpersonally sensitive as well as appropriate role models. The prediction received strong support when the trait measures of empathy (Hogan Empathy scale, HEMP), socialization (Gough's Socialization scale, SOC) and identification with offenders (ICO) were employed to classify officers at pretest with recidivism as the outcome index. The theoretical perspective received additional support in that the preferred pattern of officer personality traits was also associated with gains on the anticriminal attitudinal indices. The results provide impressive confirmation of similar results found in prison-based programs (Andrews, Brown & Wormith, 1974) where the interpersonal and anticriminal dimen-

sions have been experimentally manipulated. It appears that the dual classification of workers on trait indicators of the relationship and anticriminal dimensions is beginning to achieve predictive validity, convergent validity and construct validity.

Additional support for the importance of the relationship dimension was apparent from an analysis of the matching of officer and client on bio-social characteristics. An indigenous worker index correlated positively with prosocial change when the officers were sensitive and prosocial, but not with other officers. The results provided strong support for Ku et al's (undated) suggestion that matching on bio-social factors signals positive impact when probationers need, and are provided with, a prosocial and anti-criminal role-model.

The importance of the relationship dimension must be noted again. The officers who presented strong prosocial orientations (SOC) but were low in interpersonal sensitivity (HEMP) had failure rates approaching 50% when recidivism was employed as the outcome index. This substantiates a basic element of correctional lore: avoid workers who are likely to adopt inflexible and moralistic positions in dealing with clients. A related finding was that the clients of officers who tended to exert control in interper-

sonal situations (CONE) also failed at high rates compared to officers who were less dominating. This represents a replication of Scheier et al's (1973) finding with domination measured as an officer trait. There are important distinctions between "pro-social role-models" and "rigid moralists" and between "using the authority of probation" and "interpersonal domination". We expect these distinctions have to do with the officer interpersonal style and the extent to which the officer delivers and receives social rewards.

The Tape-Based Behavioural Measures of Process and Outcome

The development of the behavioural measures of process was extensive and we made use of many earlier systems (Bales, 1950; Carkhuff, 1969; Whalen, 1967; Wormith, 1977). In the end we had a set of measures, at least one index for each of the major dimensions of correctional counselling, which yielded good to excellent interrater reliability when actually employed in the analysis of the audio-taped supervisory sessions.

The overall correlations between process and outcome were impressive and a discriminant analysis showed that several measures were making independent contributions to the discrimination

between recidivists and nonrecidivists. In fact, as noted in the presentation of the results, the findings provided outstanding confirmation of the strategies and hence, the underlying rationale: the successful cases had received higher levels of community-focused problem-solving; their officers had engaged them in relatively high level reviews of the probation contract; their officers had more consistently approved of their prosocial expressions and disapproved of their antisocial expressions; the officers had avoided noncontingent interest and concern by not practicing frequent paraphrasing and reflection of feelings, and yet, expressed warm and friendly feelings for the probationer. Overall, the discriminant analysis was able to correctly identify over 85% of the cases as either recidivists or nonrecidivists simply on the basis of the tape-based process measures. Again, the reader should recall that these findings are based on correlations and were not derived from controlled manipulations of correctional practices.

Complementing the interaction of the trait measures of relationship and prosocial orientation, we expected that the effect would also be evident within the tape-based measures. Such was found with the active listening and authority indices, particularly when officers held relatively brief interviews with

their clients. In the absence of relatively high level refer-
ences to the conditions of probation, frequent paraphrasing and
checking on the feelings of the client was associated with high
recidivism rates but unrelated to recidivism when higher levels
of authority were in effect. The relationship between authority
and recidivism was very strong when active listening was being
practiced. The existence of the interaction cross-validates
and extends Howell's (1972) suggestion that there was an inter-
action between authority and relationship indices. Howell's
measures were of the self-report type while ours were based on
behavioural observations of actual supervisory sessions. The
findings once more suggest that procriminal learning, like anti-
criminal learning, depends upon the quality of the relationship
in effect as well as the messages exposed and the contingencies
within the interpersonal situation. We expect that empathic
behaviour on the part of the officer, in the absence of a clear
representation of the rules, represents acceptance — if not
approval — of ongoing behaviour and hence acceptance of any
ongoing criminal activity.

Attitude Change: Tape-Based Process, Recidivism

Consistent with the theoretical perspective, improvement on

the three attitudinal indices of an anticriminal orientation were associated with reduced recidivism. However, gains on the personal, the interpersonal and the community indices were not so related. The very tentative suggestion was that the six-month test-retest period may have been too short to tap the changes which might ultimately have occurred. As well, our failure to derive adequate measures of community functioning from the monthly report forms limits the conclusions we can derive on intermediate changes. However, the pretest scores on a number of the latter indices were predictive of recidivism.

The appropriate process measures related to recidivism and so did changes on the criminal orientation scales. However the predicted correspondence between specific process measures and specific attitude change measures was not supported. Somewhat surprisingly, the differential reinforcement index did not relate to changes on criminal or social attitudinal indices. It was the authority index which was associated with gains on both the criminal and personal/interpersonal indices. Again, the change scores may have been sampled too early in the program for gains to be associated with problem-solving.

More work is obviously required to delineate the processes

by which the correctional strategies relate to intermediate targets and the processes by which the intermediate gains relate to reduced recidivism. Studies of prison-based group programs involving volunteers have amassed a considerable amount of information on process and on attitude change but there as well, the relationship between process and outcome remains to be fully understood (Wormith, 1977).

The special case of attitudes toward self and others requires some mention. Enhanced self-esteem and interpersonal sensitivity are frequently the targets for change within preventive and correctional programs (for example, the Samuels', 1975). This, in spite of the fact that there are few coherent statements on how such factors related to the goal of reduced rule-breaking behaviour. (This is not to argue that the targets are unreasonable when the client and worker have agreed that the major problem is that of coming to terms with, and acceptance of, "deviance"). With the personal, interpersonal and community-reinforcement perspective, we expect that self-esteem is an index of rewards received from others as well as the likelihood that one will self-deliver rewards. Thus, the relationship between self-esteem and criminal conduct depends upon the social and criminal orientation of the self and the others. It is noted that pretested

self-esteem did relate to recidivism although changes on self-esteem did not. We also note, for future investigation that enhanced self-esteem was not a function of the quality of relationship indices in our study, contrary to the implications of client-centered approaches (Leckerma 1967; Spinks, 1969).

Perhaps more so than in the case of self-esteem, rationales for including interpersonal sensitivity as a target are more readily established ie. the nonempathic individual is likely to be less sensitive to the effects of his actions on victims and is less sensitive to interpersonal expectations. However, as several of the evaluations of the prison-based group programs have suggested, positive changes on interpersonal indices may be associated with negative changes on criminal orientation (Andrews, Farmer & Hughes, 1975; Andrews, Daigle-Zinn, Wormith, Kennedy & Nelson, 1976). In the present study, when the indigenous status of worker was controlled, the clients of the most appropriate role models (ie. high SOC - high HEMP officers) showed deterioration on the interpersonal sensitivity measure relative to the clients of the officers who were less appropriate role-models. Such changes on client HEMP contrasted sharply with the changes found on the criminal indices. Again, for the record and future resolution, we note the special case of interpersonal orientation as a target of change.

Differential Treatment Hypotheses

A third objective of the project was to explore differential treatment hypotheses. The differential treatment hypothesis explored through volunteer-professional comparisons and previously discussed was also examined with the tape-based process measures. The results were again strongly supportive of the caution required when relationship-oriented counselling or supervisory procedures are practiced by correctional workers. Active listening on the part of the officer (and expressions of warmth toward the client) were differentially related to recidivism depending upon the interpersonal skill level of the client. Frequent attempts to understand the substance and feeling-tone of client statements and frequently friendly responses were associated with decreased recidivism when they were made toward high empathy clients. However, active listening scores (and to a lesser and unreliable extent, friendly acts) were associated with increased recidivism among the low empathy probationers.

As suggested when the results were first presented in the text, this version of the differential treatment hypothesis now appears to be deserving of the status of an empirical law of correctional counselling (Glaser, 1974). However, an empirical

law does not constitute understanding and its predictive value is limited to those situations and settings in which it has been demonstrated — the establishment of at least one prescription with predictive validity is a considerable advance for corrections, but the advancement of criminology will depend upon the establishment of construct validity.

Our theoretical system is unable to account for the relationship-empathy interaction unless reference is also made to the more directive aspects of supervision and/or unless one can become specific about the content of the learning which has occurred within the context of the interpersonal relationship. Again, high quality relationships establish the conditions for interpersonal influence but the direction of influence and the content of learning depends upon the contingencies in effect and the messages exposed. On the basis of our perspective, we expect that the role-model value of the worker and/or the officer's use of the probation contract are crucial factors.

It is suggested for future investigation that clients, interpersonally sensitive or not, are equally responsive to high levels of interpersonal attention and rewards. Recall that the active listening measure related significantly to recidivism

with both low and high empathy probationers; the difference was in the direction of influence. In this sense, the two sets of probationers did not differ in their sensitivity to social-emotional factors. We suggest that the difference between low and high empathic clients, is in their sensitivity to the more subtle cues in social situations, ie. to the role-model value of the worker and to the worker's behavioural preferences and expectations.

Within the context of a high quality relationship, high empathy clients will be responsive to the social and criminal orientation of the correctional worker in so far as such an orientation is exposed through officer expressions (modelling) and officer responses to the client's expressions (differential reinforcement). If the orientation of the officer is prosocial and anticriminal, the high empathy client will respond in that direction. If the officer's orientation is antisocial and pro-criminal, the high empathy client will respond in that direction. The latter suggestion is not without considerable support in the correction literature. Programs which have opened-up communication within offender groups and not explicitly introduced anti-criminal content, have fairly consistently been associated with increased criminality. (See Andrews, 1977a, for a review of the procriminal friend strategy of correctional programming.)

Within the context of a high quality relationship, low empathy clients will be insensitive to the more subtle cues associated with modelling and differential reinforcement. They will however, respond to the behavioural preferences and expectancies of the worker when such are made explicit and are backed-up by concrete sanctions and/or the promise of concrete and relevant rewards (ie. the use of authority and problem-solving). In the absence of a high level use of authority or training techniques, a high quality relationship suggests acceptance of the client, including acceptance of any on-going antisocial activity. The suggestion above, and the findings of the present study, are not without support in the literature. Companion programs have been associated with either no significant effects (for example, Berger et al., 1975) or increased conduct problems (Goodman, 1972) and, in the latter study, particularly so when the clients presented acting-out problems to begin with. Goodman's data also suggested that the clients of volunteers who were trained in noncontingent empathy showed increased conduct problems on some indices relative to the clients of volunteers who did not receive such special training. The relative ineffectiveness (or worse) of the acriminal friend strategy is reviewed elsewhere (Andrews, 1977b).

A complete understanding of differential treatment effects requires simultaneous attention to the relationship factors, the directive aspects of counselling (the subtle and not so subtle) and the personality of the client. Such an empirical analysis requires a greater number of participants than we had within our sample and hence was untestable in this study. However, the reader's attention is redirected to Tables 32 and 36 in Chapter Six. We were unable to establish statistically reliable differences but authority and problem-solving most strongly related to recidivism among the low empathy clients while differential reinforcement was most strongly related to recidivism among the high empathy probationers.

We made predictions regarding the interaction of authority with client ICO and the interaction of community-oriented problem-solving with client SOC. Specifically, we expected that the probationers who most highly identified with other offenders would be most in need of strict rule settings. In fact, as noted, authority was associated with reduced recidivism among all types of clients. Specifically, we predicted that high levels of community-focused problem-solving would be most important with clients who presented weak ties to conventional society. Again, we were unable to demonstrate the differential

value of problem-solving to a convincing degree. As suggested in the above few paragraphs, the differential treatment hypotheses require further study and we note here that the roles of ties to crime and convention are yet to be understood.

Our social-historical indices of ties to crime and convention did not fare as well as the corresponding self-report trait measures in comparisons of volunteer and professional supervision. We were unable to demonstrate the convergent validity of such measures in relation to the differential-treatment hypotheses. Such validity was certainly expected by the patterns of intercorrelations found among the measures (Appendix D).

On a final note, there was no evidence in the present study that the matching of officer and client on personality factors increased the predictability of recidivism beyond that which exists when individual officer or client scores are employed as predictors by themselves. One of the FIRO-B indices predicted to client evaluations of supervision but not to recidivism. Recall, however, that the number of bio-social characteristics shared by both officer and client did relate to prosocial gains on attitudinal indices when the officer was an empathic representative of prosocial and antirriminal positions.

The Validity of the Attitude and Personality Battery

A methodological problem limiting the progress of correctional counselling and criminology has been the lack of measures of demonstrated reliability and validity. The attitude and personality battery employed in the present study has now been used in a series of correctional studies (Andrews, Daigle-Zinn & Wormith, 1974). Many of the scales were adapted from a set originally compiled by the Research Branch of the Ontario Ministry of Correctional Services and the original versions of the scales have been subjected to considerable work by that group (Gendreau and Gibson, 1976). Appendix D and the results sections of the present report provide a wide range of additional validity data. We will not bore the reader with a review of the psychometric characteristics of the battery (that is done elsewhere, Andrews & Wormith, 1977). We simply note that the validities of many of the measures have been established through comparisons between adjudicated offenders and nonoffenders, examinations of the self-reported delinquency of nonadjudicated offenders and non-offenders, and through the prediction of recidivism. Patterns of intercorrelations within and among the variety of process measures were also examined.

Implications for Voluntary Action Programs

We hope that the present study has at least suggested the potential associated with a close integration of theory, practice and research. The evaluation of the one-to-one program in probation was based on a general theoretical perspective grounded in behaviour theory (Chapter One) and on reviews of the correctional literature organized by that theoretical perspective (Andrews, 1977a). It is on this basis that we do not hesitate to formulate our service recommendations with reference to voluntary action programs in corrections generally. However, and again, the point is underscored that we are talking about correctional counselling programs, ie. programs involving worker-client interaction which set as one objective reductions in the probability of criminal conduct among participating clients. Note that the term "counsellor" is used in a general sense and, depending upon the setting and circumstances, other terms might be "officer", "trainer", "supervisor", "therapist", "coach".... Historically and currently, there is a wide variety of roles for citizens in criminal justice: from those of vigilantes through administrative assistants and social and institutional reformers. Such roles are intriguing and often-times exciting but they were not the focus of the research nor are they the

focus of the recommendations.

Companion and social-recreational programs have not been associated with successful outcome. The findings of the present study strongly indicated that factors associated with successful outcome were generally the same for both professionals and volunteers. These factors were not friendship by itself nor high level attention to recreational activities. Crucial factors were explicit use of the probation order, problem-solving with a concrete community focus, and, at least for the volunteers, the explicit modelling and reinforcement of prosocial and anticriminal attitudinal and behaviour patterns. Similar findings have been reported with prison-based volunteer programs. Thus, we recommend that volunteers be assigned the status of an officer (or assistant officer) rather than that of a companion in one-to-one probation programs. We also extend this recommendation to prison programs on the basis of the earlier literature and the complementary nature of the findings, ie. volunteers be recognized and involved as explicit role-models and/or trainers rather than companions.

CONTINUED

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Recommendation One: Voluntary action programs be recognized and structured as counselling programs rather than as companion or recreational programs.

When the first recommendation is implemented, certain ethical questions involved in voluntary action programs are clarified for all concerned. The major participants, the clients and the volunteers, are able to make an informed choice regarding their participation. Not all correctional clients wish to participate in counselling and not all volunteers wish to accept the responsibilities associated with counselling. For the agency, the recommendation underscores the position that volunteer programs must be viewed as serious service efforts rather than simply interesting adjuncts to service. If voluntary action programs are part of the counselling program then they must be integrated with the professional efforts. Within most agencies, the professional staff have the responsibility for counselling and hence they would be responsible for volunteer programs.

The first recommendation has obvious implications for program structure and for the screening and training of volunteers.

With reference to program structure, it is not enough to simply confer the recommended status upon the volunteer program and then put the volunteers into what are, in fact, companion or recreational programs. For probation, the recommendation suggests that both the volunteer and client must recognize the volunteer's responsibility to the court. Such is structured by clearly indicating that the volunteer is responsible for initiating early termination and breach proceedings through an approach to the appropriate professionals. The problem-solving role is structurally underscored through the preservice training of volunteers and by the degree of emphasis placed upon problem-solving during the inservice supervision and training of volunteers. In prison or community settings, alternatives to companion programs may be structured by arranging conditions such that the volunteer's pro-social orientation has a high probability of exposure (Andrews, Brown & Wormith, 1974) or, for example, by explicitly employing volunteers as models in counselling (Sarason & Gañser, 1973). Finally, the programs should be part of the total counselling program, underscored, perhaps by calling volunteers "assistant officers" or "assistant counsellors".

All available evidence suggests that the effective correctional counsellor or probation supervision is interpersonally

sensitive and tolerant yet prosocial and antirriminal in orientation. To select workers on only one of the dimensions is to invite negative impact on correctional clients. In the present study, the clients assigned to highly socialized but interpersonally insensitive officers recidivated at high rates. In one prison-based program, the selection of volunteers on the basis of empathy alone tended to be associated with negative impact, apparently because empathic volunteers tended to identify more highly with offenders (Andrews, Farmer & Hughes, 1976). Again, the Lincoln, Nebraska program has provided additional confirmation of the importance of the selection of volunteers (Moore, 1970).

Recommendation Two: Volunteers assigned assistant counsellor roles should be interpersonally sensitive and flexible yet clearly prosocial and antirriminal in orientation; we deem this recommendation so important, that, even in the absence of locally validated methods, program staff should implement a screening system which is capable of empirical evaluation if only later and indirectly in the program's history.

There was only minimal evidence in the present study that the program staff were able to identify effective volunteers. In the

absence of the development of reliable and valid rating systems for program managers, we recommend the use of validated psychometric instruments such as those employed in the present study and the behavioural measures developed by Goodman (1972). Specific agencies will want to establish their own norms and selection criteria. In the present study, for purposes of analyses of the data, the cut-off points were simply the medians. On general principle we note that many instruments should not be used without consultation with the psychological staff of an agency or a local university's Department of Psychology. Realistically, cut-off scores will depend upon the size of the potential volunteer pool.

Screening for specific roles obviously brings up the problem of rejecting interested and interesting members of the public. Any volunteer program should incorporate alternative roles for volunteers.

Recommendation Three: Voluntary action programs should begin with, or rapidly work toward, two or more roles for volunteers, at least one of which need not involve counselling duties.

The present results, and again, the recommendations of the Nebraska group, suggest that outcome will be enhanced when the worker and client share a number of bio-social characteristics.

This suggests continued attempts to increase the numbers of certain sets of volunteers, specifically young, unmarried men with less than a college education and who are employed in blue-collar jobs.

Recommendation Four: In one-to-one programs, the matching of client and volunteer on bio-social characteristics is recommended.

An objective of the study was to develop measures of supervisory process which might be useful in the training of correctional workers. The measures were adequately reliable and the validity information has been reviewed. Thus, recommendations regarding training are formulated with reference to the operational specifics of the behavioural measures of supervisory process (Appendices J through M).

We recommend that volunteers not be offered formal training in empathic skills. In the present study active listening was unrelated to the personality measure of empathy but was associated with increased recidivism within subsamples of the probationers. In Goodman's (1972) study, the training of volunteers in empathy was systematically manipulated and was found to be associated with increased conduct problems relative to a no special training

condition. Complementing our findings with the personality measure of empathy, Goodman (1972) did find that volunteers who presented evidence of high interpersonal skills at pretest were more successful than the less skilled volunteers. It appears that the natural skills the volunteer brings to the program are important but empathy, as typically operationalized in training programs, is potentially destructive.

Self-disclosure was independent of outcome in the present study and hence special training is not indicated. Friendly acts, unlike active listening, were never reliably related to negative impact but did, under some conditions, relate to positive impact. Our measure of friendly acts was a common sense one and we expect they readily occur naturally. Training programs should simply advise volunteers of the importance of a friendly relationship with their client and, hence sensitize them to expressions of positive feelings towards their client as a necessary factor in establishing conditions for interpersonal influence.

Recommendation Five: Formal preservice or in-
service training in empathic skills should
not be offered to volunteers.

The advocate-broker dimension, while currently very popular, was not associated with positive outcome in the present study. Its value with individual clients will likely depend upon the quality of services within local communities. We recommend that environmental facilitation be seen as only one component of problem-solving.

Recommendation Six: Formal preservice and inservice training sessions should stress that advocate-broker activity is only one component of a general problem-solving orientation and not necessarily a major component.

The available literature on intra-psychic approaches suggests the nonproductive value of a focus on personal/emotional issues when the issues are not tied to more concrete areas of adjustment. In the present study as well, a personal/emotional focus was unrelated to recidivism.

Recommendation Seven: Formal preservice and inservice training should advise volunteers to avoid attempts to practice counselling with an intra-psychic focus.

Training programs should incorporate and systematically explore

means of sensitizing assistant counsellors to the importance of the probation contract (or rules of an institution), their value as a role-model, the importance of differential reinforcement and the potential contributions associated with engaging in problem-solving when there are concrete community referents to the client's problems. At a minimum this means exposing volunteers to available literature in the field through open and nontechnical discussions of findings, limitations of findings and unresolved questions. They have a right to the knowledge and the "radical noninterventionists" among them are free to withdraw from the program when they recognize that their involvement with the client is likely to have an effect. This is not a joke but a restatement of the ethical issue discussed with reference to the first recommendation. We have found some volunteers who do prefer to withdraw when they recognize the responsibility one is taking for another's choices once an interpersonal relationship is established.

Recommendation Eight: Training programs should incorporate open and nontechnical discussions of existing knowledge in the area of correctional counselling and voluntary action.

We are hesitant to make more specific recommendations because

of the virtually total lack of experimental data on the matter of training volunteers in the more directive aspects of counselling or probation supervision. Wormith (1977) has shown that sensitizing volunteers to their modelling and differential reinforcement function by way of discussions and assigned readings was associated with at least minimal effects on volunteer performance but little in the way of client impact. We hesitate to recommend the use of role-playing and rehearsal techniques in training, methods of demonstrated value in other areas, because of the possibility that they might have the effect of introducing inflexible and "phoney" styles. It is not impossible that this is what happened in the case of Goodman's (1972) training program for empathic skills.

Recommendation Nine: Until systematic and controlled empirical examinations of training methods are completed, the major methods of training in the directive aspects of counselling should involve exposure to, and discussion of, concrete examples of operational definitions of directive counselling.

We hope that the modelling and differential reinforcement indices described in Chapter Two and Appendix J may provide a

focus for discussions about the role-model of anticriminal aspects of counselling. The Problem-Solving indices, relevant to authority and community-focused counselling were described in Chapter Two and Appendix K. The advocate-broker or environmental facilitation index was presented in Appendix L although again, we recommend that it be identified and used as only one element of problem-solving and not made the major element of a program.

Program managers and trainers are going to have their own personal preferences with reference to approaches to problem-solving. Our approach assumed that successful problem-solving methods, whatever the theoretical orientation, share the element of exposing the differential consequences of alternative behaviours in explicit detail. The dimensions of supervisory process and associated references for additional operational definitions are outlined in more detail in the CaVIC modules (Andrews, 1977a, b, c, d).

The reader has probably noted that in spite of the attention given differential treatment hypotheses in the text, program recommendations regarding differential treatment have not been made as yet. This is because, by ruling out special training in, and an undue emphasis upon, quality of relationship factors, such recommendations do not yet appear necessary given

the specific practices emphasized. There was no evidence that the anticriminal, authority and problem-solving dimensions were associated with negative impact with any set of clients. Thus, the overall effect of the recommendations is to encourage the development of programs in which volunteers actively practice the three major elements of correctional counselling, regardless of the personality of their clients. Recall, that by our definition of problem-solving, if the client is functioning well in the community and is meeting the requirements of the probation order, then approval and reinforcement of such on-going activity represents high level problem-solving. Similarly, if the client does have a positive prosocial orientation, officer approval of client expressions of that orientation is not likely to result in deterioration. Finally and with reference to probation programs, all clients have the right to high level reviews of the conditions of probation, if only to sort out confusions which may exist following sentence.

The next recommendation does have to do with the differential assignment of cases to volunteer and professional officers in probation. Our data suggested that the high rates of client-worker interaction possible with volunteers is wasted on low risk clients (the older and the more highly socialized clients);

they recidivated at low rates regardless of the professional status of the officer. However, among the higher risk offenders (the younger and the less socialized), the success rates of volunteers were significantly greater than those of professional officers, particularly if the higher risk clients scored relatively high on interpersonal sensitivity.

- Recommendation Ten: In order to maximize success rates with high risk clients, it is recommended that they be assigned to volunteer probation officers, particularly if the clients also present evidence of relatively high interpersonal and communication skills.

The final recommendations have to do with inprogram indicators of success. Participant evaluations appear to represent particularly poor sources of information on what is actually happening during supervision and on ultimate program impact. While the participant reports employed in the present study appeared somewhat reliable and internally consistent, they appeared to be largely a function of the personalities of those reporting or being reported upon. In fact, in the present study, positive reports by probationers were predictive of recidivism.

Recommendation Eleven: Staff responsible for volunteer programs should accept with extreme caution participant reports on the quality of probation supervision being offered or received.

We tentatively recommend for later evaluation that program managers begin to develop monitoring and record-keeping systems which relate directly to the major components of correctional counselling. In the present study, the most impressive validity data were associated with the tape-based measures. We expect that ratings by the inservice supervisors of volunteers may also ultimately prove valid. We must move beyond frequency of contact data and subjective evaluations.

Recommendation Twelve: Program managers should begin to experiment with the design and evaluation of monitoring and record-keeping systems which tap the major elements of correctional counselling; available evidence supports the development of ratings by supervisors of volunteers but particularly analyses of audio-taped samples of volunteer-client sessions.

Another approach to monitoring progress and predicting

ultimate impact is to look for changes on the intermediate targets of counselling. The present study was supportive of the validity of changes on anticriminal attitudinal indices evident at the sixth month. Other obvious indices include progress on the job or at school but, unfortunately, we failed in our attempt to tap such indices. We expect that with only minor changes to the monthly report forms employed in this study (Appendix I) and with more systematic attention to the forms than we paid during the operation of our program, such measures would be readily obtained.

Recommendation Thirteen: Program managers should consider introducing systematic collection of data on the achievement of intermediate targets, whenever resources permit.

With the implementation of recommendations one through four, the program manager can feel fairly confident that his or her program is the best possible with reference to current knowledge of crime and correction.¹ With the implementation of recommendations five through nine, the program manager has opted for a very conservative approach to training, one which is not too daring and one which, quite frankly, eschews the more "cute,

1. The reader is by now aware that your authors have taken a position on the knowledge of crime and correction which is not necessarily consistent with that of many other authors.

folksy and exciting" methods until they have been validated. At a minimum, we hope the training recommendations indicate our respect for the intelligence of volunteers. Upon implementation of the tenth recommendation, we feel reasonably confident that the program manager will significantly reduce recidivism among at least that special set of probationers assigned to volunteers. With the implementation of recommendations eleven through thirteen, the program manager has embarked upon his or her own field-descriptive study, and may come to empirically establish that the recommendations were quite appropriate, somewhat appropriate or pure and utter nonsense.

The preceding recommendations have focused on the matter of correctional counselling. Another set of reports in the CaVIC series focuses on program administration issues (Kiessling, Andrews & Farmer, 1977).

Implications for Future Research

This report has consistently stressed the interaction of theory and practice: the development of theory and service are interdependent and developments are based upon those rare flashes of insight which permit the giant steps forward and, for the most part, upon the mundane and slow accumulation of empirically-based

but theoretically-relevant knowledge. The vision of criminology has yet to be improved by a flash of insight and hence has been dependent upon the mundane. In the face of elegant statements that the advancement of knowledge through research depends upon linkages with theory (Glaser, 1974), the area of correctional intervention has been advised alternatively to cease operations (Schur, 1973; Berger et al. 1973), to continue operations but stop evaluation (Hackler, 1974), and to continue operations and evaluations but better serve the interests of those who fund the operations through standardization and cost-efficiency (Cook & Scioli, 1975). No one is likely to argue against cost-efficiency but efficient and effective programs depend upon our knowledge of the phenomena we are concerned with.

The increasing distances among service, research and theory in corrections represents a serious, and ethically inexcusable, loss for criminology. It is within the context of correctional programs, that criminology has the opportunity to examine the consequences of systematic variation of theoretically-relevant variables under controlled conditions. In criminology, an area of study virtually devoid of experimentally-established findings, such an opportunity cannot be allowed to fade away or be turned over to the management sciences. An area which purports to know

something about the determinants of criminal conduct cannot ethically bequeath the design and evaluation of programs to persons trained in other areas and working toward goals not necessarily tied to the interests of the offenders and victims. Perhaps criminologists could divert some small portion of their attention away from consulting with governments or from creating the new society and pay some minimal attention to individual criminal conduct and its determinants. The knowledge should prove useful regardless of what acts are ultimately subject to the criminal law and regardless of what groups ultimately have the power to criminalize.

The polemic of the above few paragraphs, in addition to the available research evidence, leads to the most general research recommendation: systematic and theoretically-based evaluations of correctional programs, volunteer or professional, should be recognized as a major way of advancing corrections and criminology.

The second research recommendation is also a general one and related to the first: when evaluating, select theories which direct attention to measurable and manipulable aspects of the environment. Theories in criminology tend to neither grow nor

die. For example, forty years of work with symbolic interactionist perspectives has yet to yield any evidence of an increased ability to predict or control the phenomenon of interest. In contrast, the empirically grounded version of differential association theory has undergone considerable development in recent years.

The third recommendation is that field-experimental and field-descriptive methods should be combined in evaluation research. Descriptive or correlational studies may be helpful in formulating problems for experimental investigation but will not lead to definitive conclusions. Note, for example, the paucity of firm conclusions possible after some twenty years of non-experimental research on guided-group interaction (Stephenson & Scarpitti, 1974). However, the same series of studies show that the failure to systematically measure on-going group process also leads to an inability to isolate the important elements of the complex group counselling program. We hope that the present study provides an adequate model of the integration of the experimental and descriptive methods.

The fourth and final general recommendation is that the theoretical perspectives and the corresponding process and outcome measures should be appropriate to the level of analysis

and the level of interest of the researcher and/or theorist. If Berger et al. (1975) really wished to reach a conclusion on the role of courts in rehabilitation, then they should have compared the relative impact of courts with and without rehabilitative functions. This, of course, was impossible, but the fact that a volunteer program was ineffective is irrelevant to the conclusions at the level of the judicial system. The appropriate focus for correctional counselling programs is the conduct of the individuals who participate in that or comparison programs and the appropriate theories are those concerned with the conduct of individuals.

The present study and the associated reviews of the literature have established a number of key substantive areas for future research. With reference to the present study, the most obvious is a post-probation follow-up of recidivism. The duration of program effects is an important and as yet under-examined question in corrections. It is also quite possible that effects associated with the authority factor are relatively short-term while the full effects of problem-solving activities would not be evident until follow-up.

We have seen that the differential treatment hypotheses remain unresolved and a number of specific predictions for future

investigation were derived in the discussion of the findings.

A major requirement in probation is a demonstration that experimentally controlled variations of the major dimensions of correctional counselling are associated with variations on the intermediate and outcome indices. The process-recidivism correlations evident in the present study were just that, correlations. While we were unable to make the correlations disappear by introducing controls for client characteristics, the fact remains that other undetected, and more crucial factors, may have been determining the results.

A second major deficiency in voluntary action research is the lack of experimental evidence concerning relationships between volunteer training and process, between training and the attainment of intermediate and ultimate objectives, and between process and outcome.

A third major problem with voluntary action research, and correctional research generally, has been an inattention to the possibility of Setting X Treatment interactions. With the exception of a few studies on volunteers in prison-based group programs, there have been no systematic demonstrations that the

same program is equally effective in different geographic or socio-political settings. If effects are maintained across settings, for example, across various management conditions, then the confidence with which the principles of correctional counselling are held is enhanced considerably. If effects are not maintained, then there is an experimental base upon which to begin to build models of System X Counselling Program interactions, ie. again, we return to the problem of shifts in levels of analyses but now in a disciplined and empirically-grounded manner.

Our major substantive recommendation for future research is that an integrated series of studies be designed and implemented to examine different approaches to the training of volunteers in the more directive aspects of correctional counselling and probation or parole supervision. Experimental variations of training methods constitutes a means of experimentally manipulating the major dimensions of correctional practice. The process measures developed for this study provide the means of monitoring actual practices. Similarly, the attitudinal indices of the present study and socio-historical indices to be developed or adapted, provide the means of monitoring intermediate changes. Existing training programs in various settings or training program recommended in the preceding section could provide the

necessary comparison conditions. Such a research program would provide a healthy stimulus to both volunteer and professional counselling while expanding our knowledge of crime and corrections tremendously.

References

- Adams, R. Differential association and learning principles revisited. Social Problems, 1973, 20, 458-70.
- Adams, S. Evaluation: A way out of rhetoric. Paper presented at the Evaluation Research Conference of the Office of Community Development and the University of Washington, Seattle, Washington, December, 1975.
- Andrews, D. A. Outcome evaluations of group counselling in corrections. Paper presented at the symposium on Corrections, Ontario Psychological Association meetings, Ottawa, February, 1974.
- Andrews, D. A. The friendship model of voluntary action and controlled evaluations of correctional practices: Notes on relationships with behaviour theory and criminology. A CaVIC module, May, 1977. (a)
- Andrews, D. A. The dimensions of correctional counselling and of supervisory process in probation and parole: I. Quality of relationship. A CaVIC module, May, 1977. (b)
- Andrews, D. A. The dimensions of correctional counselling and supervisory process in probation and parole: II. Authority. A CaVIC module, May, 1977. (c)
- Andrews, D. A. The dimensions of correctional counselling and of supervisory process in probation and parole: III. The Anti-criminal Dimension. A CaVIC module, May, 1977. (d)

- Andrews, D. A., Brown G. & Wormith, J. S. The community group: A role for volunteers in group counselling within correctional institutions. In Proceedings of the Canadian Congress of Criminology and Corrections, 1973. Ottawa: Canadian-Criminology and Corrections Association, 1974, 34-43.
- Andrews, D. A. & Daigle-Zinn, W. J. A structured one-to-one versus group format for volunteers in corrections. Unpublished manuscript, Carleton University, 1976.
- Andrews, D. A., Daigle-Zinn, W. J. & Wormith, J. S. The St. Patrick's College - Rideau Correctional Centre Research Scales. Unpublished test manual, Carleton University, 1974.
- Andrews, D. A., Farmer, C. & Hughes, J. The effects on process and outcome of citizen participation in structured group counselling with incarcerated adult recidivists. Final Report (Part I) to the Canadian Penitentiary Service of the Department of the Solicitor General of Canada, October, 1975.
- Andrews, D. A., Farmer, C. & Hughes, J. High and low empathy volunteers in structured group counselling with incarcerated adult recidivists. Final Report (Part II) to the Canadian Penitentiary Service of the Department of the Solicitor General of Canada, 1976.
- Andrews, D. A., Farmer, C., Russell, R. J., Grant, B., Kiessling, J. J. The research component of the Ottawa Criminal Court Volunteer Program: Theoretical rationale, operationalization and evaluation strategy. Canadian Journal of Criminology and Corrections, 1977, 19, 118-133.

- Andrews, D. A. & Gendreau, P. Undergraduate training and correctional service. Professional Psychology, 1976, 7, 21-30.
- Andrews, D. A. & Wormith, J. S. The Carleton - Rideau research scales. A manual in preparation, 1977.
- Andrews, D. A., Wormith, J. S., Daigle-Zinn, W. J., Kennedy, D. J. & Nelson, S. High and low functioning volunteers in group counselling with anxious and nonanxious incarcerated offenders. Unpublished manuscript, Carleton University, 1976.
- Andrews, D. A., Wormith, J. S., Kennedy, D. J. & Daigle-Zinn, W. J. The attitudinal effects of structured discussions and recreational association between young criminal offenders and undergraduate volunteers. Journal of Community Psychology, 1977, 5, 63-71.
- Andrews, D. A. & Young, J. G. Short-term structured group counselling and prison adjustment. Canadian Journal of Criminology and Corrections, 1974, 16, 5-13.
- Andrews, D. A., Young, J. G., Wormith, J. S., Searle, C. S. & Kouri, M. The attitudinal effects of group discussions between young criminal offenders and community volunteers. Journal of Community Psychology, 1973, 1, 417-422.
- Bales, R. F. Interaction process analysis: A method for the study of small groups. Cambridge, Mass.: Addison-Wesley, 1950.
- Bandura, A. Principles of behavior modification. New York: Holt, Rinehart and Winston, 1969.

- Berger, R. J., Crowley, J. E., Gold, M., Gray, J. & Arnold, M.S.
Experiment in a juvenile court: A study of a program of volunteers working with juvenile probationers. Ann Arbor, Michigan: Institute for Social Research, 1975.
- Blishen, B. R. A socio-economic index for occupations in Canada, In B. R. Blishen et al. (Eds.) Canadian Society: Sociological perspectives, (3rd ed.) Toronto: MacMillan, 1968.
- Buehler, R. E., Patterson, G. R. & Furniss, J. M. The reinforcement of behaviour in institutional settings. Behaviour Research and Therapy, 1966, 4, 157-167.
- Burgess, R. L. & Akers, R. L. A differential association-reinforcement theory of criminal behaviour. Social Problems, 1966, 14, 128-147.
- Canadian Criminology and Corrections Association. Crime: A community responsibility. Canadian Journal of Criminology and Corrections, 1977, 19, 1-31.
- Carkhuff, R. R. Helping and human relations: A primer for lay and professional helpers, Volumes 1 and 2. New York: Holt, Rinehart and Winston, 1969.
- Conley, K. The measurement of relationship factors in probation supervision. An unpublished Honours thesis, Carleton University, 1977.

- Cook, T. J. & Scioli, F. P. The effectiveness of volunteer programs in courts and corrections: An evaluation of policy-related research. Washington: National Science Foundation, 1975.
- Cressey, D. R. Changing criminals: The application of the theory of differential association. American Journal of Sociology, 1955, 61, 116-120.
- Empey, L. T. & Erickson, M. L. The Provo experiment: Evaluating community control of delinquency. Lexington, Mass.: Lexington Books, 1972.
- Eysenck, H. J. Crime and personality. New York: Houghton Mifflin, 1964.
- Farmer, C., Andrews, D. A. & Kiessling, J. J. Canadian volunteers in corrections: A national survey of probation and parole officers, preliminary report. A CaVIC module, Feb., 1976.
- Gendreau, P. & Leipziger, M. Recidivism and its measurement in Ontario. Toronto: Ontario Ministry of Correctional Services, 1976.
- Glaser, D. Criminality theories and behavioural images. American Journal of Sociology, 1956, 61, 433-444.
- Glaser, D. Remedies for the key deficiency in criminal justice evaluation research. Journal of Research in Crime and Delinquency 1974, 10, 144-154.

- Grant, B. A. A study of incarcerated and probated offenders in Ottawa-Carleton; Considerations for diversion. An unpublished Honours thesis, Carleton University, 1975.
- Grief, E. B. & Hogan, R. The theory and measurement of empathy. Journal of Counseling Psychology, 1973, 20, 280-284.
- Goodman, G. Companionship therapy: Studies in structured intimacy. San Francisco: Jossey-Bass, 1972.
- Gough, H. E. A sociological theory of psychopathy. American Journal of Sociology, 1948, 53, 359-366.
- Hackler, J. C. Why delinquency prevention programs in Canada should not be evaluated. Edmonton: University of Alberta, 1974.
- Hooke, J. E. Rating delinquent behaviour. Psychological Reports, 1970, 27, 155-158.
- Howell, J. A comparison of probation officers and volunteers. (Doctoral dissertation, University of Colorado, 1972). University Microfilms, No. 72-23, 179.
- Hunt, G. M. & Azrin, N. H. A community-reinforcement approach to alcoholism. Behaviour Research and Therapy, 1973, 11, 91-104.
- Ingram, G. L. Matching volunteers and juvenile offenders. Paper presented at a workshop of the Institute on Research with Volunteers in Juvenile Delinquency, University of Arkansas, May, 1970.
- Kennedy, M. C. Development of the Problem-Solving Orientation measure of professional and volunteer probation officers. Unpublished Honours thesis, Carleton University, 1976.

- Kiessling, J. J. The Ottawa Juvenile Court Volunteer Program.
Ottawa: Information Canada, 1972.
- Kiessling, J. J. Volunteers in corrections: An ecological model.
Canadian Journal of Criminology and Corrections, 1975, 20-34.
- Kiessling, J. J. A cost-effectiveness analysis of the Ottawa Volunteer Program. A CaVIC module, Sept., 1976.
- Kiessling, J. J., Andrews, D. A. & Farmer, C. The Ottawa Criminal Court Volunteer Program: Program design. A CaVIC module, February, 1976.
- Kiessling, J. J., Andrews, D. A. & Farmer, C. An introduction to the reports in the CaVIC series. A CaVIC module, May, 1977.
- Kiessling, J. J., Charron, O'Neal, Patten, M. C., Vallée, A. Training and development sessions manual for resource personnel: A program for the development of candidates as Assistant Probation Officers.
A CaVIC module, 1975.
- Ku, R., Moore, R. & Griffiths, K. The volunteer probation counselor program, Lincoln, Nebraska. Washington, D.C.: National Institute of Law Enforcement and Criminal Justice, undated.
- Leckerman, L. A. The effects of counseling preparation on the outcome of group counseling with institutionalized juvenile delinquents.
Unpublished doctoral dissertation, Florida State University, 1967.
- Linden, F. & Hackler, J. C. Affective ties and delinquency. Pacific Sociological Review, 1973, 16, 27-46.

- Mahoney, M. J. Research issues in self-management. Behavioral Therapy, 1972, 3, 45.
- Martinson, R. What works? - questions and answers about prison reform. The Public Interest. 1974, 35, 22-54.
- Matza, D. Delinquency and drift. New York: John Wiley, 1964.
- Mead, G. H. Mind, self and society. Chicago, 1934.
- Mehaffey, T. D. An exploratory study to determine criteria for more effective matching of volunteer probation counsellors with probationers. An unpublished manuscript, Volunteer Probation Counseling Program of Evansville, Indiana, January, 1973.
- Merton, R. K. Social theory and social structure. Glencoe, III.: Free Press, 1957.
- Moberg, D. D. & Ericson, R. C. A new recidivism outcome index. Federal Probation, 1972, 36, 50-57.
- Moore, R. Selection and matching of volunteer probation counsellors: Some theoretical and empirical considerations. Paper presented at a workshop of the Institute on Research with Volunteers in Juvenile Delinquency, University of Arkansas, May, 1970.
- Outerbridge, W. R. The tyranny of treatment...? Canadian Journal of Corrections, 1968, 10, 378-387.
- Palmer, T. Martinson revisited. Journal of Research in Crime and Delinquency, 1975, 12, 135-152.

- Peters, C. Research in the field of volunteers in courts and corrections: what exists and what is needed. Journal of Voluntary Action Research, 1973, 1, 121-134.
- Peterson, D. R., Quay, H. C., & Cameron, G. R. Personality and background factors on juvenile delinquency as inferred from questionnaire responses. Journal of Consulting Psychology, 1959, 23, 395-399.
- Pirs, S. & Andrews, D. A. The community impact hypothesis in voluntary action programming. A study in progress, Carleton University, 1977.
- Quay, H. C. Personality and delinquency. In H. C. Quay (Ed.) Juvenile delinquency: Research and theory. New York: Van Nostrand, 1965a, 139-169.
- Quay, H. C. Psychopathic personality as pathological stimulation seeking. American Journal of Psychiatry, 1965b, 122, 180-183.
- Rappaport, J., Chinsky, J. M. & Cowen, E. L. College students and mental patients: An experiment in community mental health. New York: Academic Press, 1971.
- Reiss, Jr., A. J. The social integration of queers and peers. Social Problems, 1961, 9, 102-120.
- Rogers, C. R. The necessary and sufficient conditions of therapeutic personality change. Journal of Consulting Psychology, 1957, 22, 95-103.

- Russell, R. J. Social network correlates of volunteer performance on the advocate-broker dimension of probation supervision. An unpublished Honours thesis, Carleton University, 1976.
- Samuels, M. & Samuels, D. The complete handbook of peer counselling. Miami: Fiesta Publishing Corp., 1975.
- Scheier, I. H. Volunteers as environmental facilitators. Volunteers for Social Justice, 1974, 7 (1), 2-3.
- Scheier, I. H., Fautsko, T. F. & Callaghan, D. Matching volunteers to clients: A how-to-do-it aid in matching. Boulder, Colorado: National Information Center on Volunteerism, 1973.
- Schur, E. M. Radical nonintervention: Rethinking the delinquency problem. Englewood Cliffs, N. J.: Prentice-Hall, 1973.
- Schutz, W. C. FIRO: A three dimensional theory of interpersonal behavior. New York: Holt, Rinehart & Winston, 1958.
- Schutz, W. C. The FIRO scales: Manual. Palo Alto, Calif.: Consulting Psychologists Press, 1967.
- Shelley, E. L. V. An overview of evaluation research and surveys. Boulder, Colorado: National Information Center on Volunteerism, 1971.
- Sobell, M. B. & Sobell, L. C. Individualized behavior therapy for alcoholics: Rationale, procedures, preliminary results and appendix. California Dept. of Mental Hygiene, 1972.

- Spinks, N. J. The effects of male and female models in vicarious therapy pretraining on the change in self-concept of institutionalized female juvenile delinquents in group counselling. Unpublished doctoral dissertation, Florida State University, 1969.
- Sutherland, E. H. & Cressey, D. R. Principles of criminology (7th Ed.) New York: Lippincott, 1966.
- Taylor, I., Walton, P. & Young, J. The new criminology: For a social theory of deviance. London: Routledge & Kegan Paul, 1973.
- Truax, C. B. & Mitchell, K. M. Research on certain therapist interpersonal skills in relation to process and outcome. In A. E. Bergin & S. L. Garfield (Eds.) Handbook of Psychotherapy and Behavior Change: An Empirical Analysis. New York: John Wiley, 1971, 299-344.
- Tully, H. The effects of mediated exposure to correctional workers varying on the volunteer and indigenous dimensions. Unpublished Honours thesis, Carleton University, 1977.
- Ullmann, L. P. & Krasner, L. A psychological approach to abnormal behavior. New York: Prentice-Hall, 1969.
- Warren, M. Q. The case for differential treatment of delinquents. Canadian Journal of Corrections, 1970, 12, 4.
- Warren, M. Q. Correctional treatment in community settings. A report of current research. (DHEW Publication No. (HSM) 72-9129). Washington, D. C.: U. S. Government Printing Office, 1972.

Whalen, C. Effects of a model and instructions on group verbal behaviors. Journal of Consulting and Clinical Psychology, 1969, 33, 448-457.

Wilkins, B. The study of differential association, personality characteristics and attitudes as correlates of self-reported delinquency. Unpublished Honours thesis, Carleton University, 1975.

Wormith, J. S. Converting prosocial attitude change to behaviour change through self-management training. Unpublished doctoral dissertation, University of Ottawa, 1977.

Yablonsky, L. The anticriminal society: Synanon. Federal Probation, 1962, 26, 50-57.

END