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FAMILY RELATIONSHIP VARIABLES,
AND PROGRAMS INFLUENCING
JUVENILE DELINQUENCY

NO. 1985-06

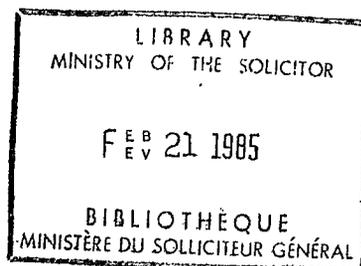
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FAMILY RELATIONSHIP VARIABLES,
AND PROGRAMS INFLUENCING
JUVENILE DELINQUENCY

NO. 1985-06

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CONTENTS

I

FAMILY RELATIONSHIP VARIABLES & DELINQUENCY

Abstract

Preface

Introduction.....	7
A Parental Discipline.....	16
B Parental Supervision.....	27
C Family Cohesiveness.....	30
D Parental Conflict.....	39
E Broken Homes.....	42
F Family Income.....	52
G Criminality in the Family.....	66
H Family Size.....	71
I Working Mothers.....	76
J Family Recreations.....	78
K Allowance.....	81
L Freedom & Responsibility.....	83
M Summary & Conclusions.....	86

II

PROGRAMS INFLUENCING FAMILY VARIABLES IN THE CONTROL
AND PREVENTION OF JUVENILE DELINQUENCY

I Past Reviews

Introduction.....	92
A Bohnstedt 1978.....	93
B Gibbons & Blake 1976.....	97
C Fishman 1977.....	102
D Rovner-Piecznik 1974.....	106
E Conclusions.....	108

II Present Reviews

Introduction.....	110
A Adolescent Diversion 1977.....	111
B Intercept 1975.....	113
C New Pride 1977.....	115
D Louisville 1974-76.....	117
E Sacramento 1976.....	119
F Achievement Place 1976.....	120
G Providence Education Center 1974.....	122
H Florida 1977.....	123
I The University of Utah Study 1973.....	125
J Conclusions.....	127

III The McCord 30-Year Follow-up.....	130
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III

RESEARCH AND POLICY IMPLICATIONS

I General Implications

A	Strengthening Family Life.....	139
B	Alleviating Delinquency Associated Conditions.....	145
C	Role of the Schools.....	147
D	Improving recreational facilities.....	150
E	Reducing the Negative Effect of Contact with the Social Justice System.....	151
F	Employment Exploitation.....	153
G	Intervention After the Third Offense.....	153
H	Summary & Conclusions.....	154

II Program Implications

A	Short-Term Family-Crisis Counselling for Low Risk Youth....	156
B	Long-Term Intervention for Moderate & High Risk Youth.....	157
C	Duration of Family Intervention Programs.....	158
D	Peer-Group Intervention.....	159
E	Learning Disabilities.....	161
F	Use of Volunteers.....	161
G	Experimental Design in the Evaluation of Delinquency Prevention Programs.....	162
H	Financial Savings.....	164
I	Recidivism Reduction.....	164
J	Employment and Delinquency Reduction.....	166

K	Home-Based Programs.....	168
L	Summary & Conclusions.....	168

IV

SUMMARY

A	Objectives and Methodology.....	170
B	Principal Conclusions.....	170
C	Implications for Policies, Operations and Research.....	176

APPENDIX A

A	The Adolescent Diversion Project.....	182
B	Project Intercept.....	193
C	Project New Pride.....	207
D	Louisville Youth Diversion Project.....	225
E	Sacramento Diversion Project.....	232
F	Achievement Place.....	243
G	Providence Educational Center.....	253
H	Florida Juvenile Diversion Program.....	276
I	The University of Utah Study.....	280
J	Summary and Conclusions.....	285
	References.....	289

Abstract

A review of the research literature in the area of family relationship variables and delinquency, and programs attempting to influence family variables in the control and prevention of delinquency is presented. A number of tentative conclusions may be drawn: (1) lax, restrictive, inconsistent or harsh physical discipline is associated with high delinquency, while love oriented discipline with reasoning is associated with low delinquency; (2) high parental supervision, high family cohesiveness and low parental conflict are associated with low delinquency; (3) broken homes is indirectly associated with high delinquency, probably through its association with family disruption; (4) high family criminality is associated with high delinquency; (5) large family size is indirectly associated with high delinquency, through its association with overcrowding, competition for parental attention, emotional strain and inadequate parental supervision, all of which are associated with high delinquency; (6) maternal employment is not necessarily associated with high delinquency, especially when proper supervision of the child is provided; (7) low social class is indirectly related to high delinquency through its association with other factors such as low family stability and high parental criminality; (8) of family variables describing social status (e.g., neighbourhood, father's occupation), parental characteristics (e.g., parent aggressiveness, mother's self confidence, father's deviance), and child rearing practices (e.g., mother's affection, parental supervision, parental

conflict), parental supervision, followed by mother's affection during childhood appear to be the two most important variables accounting for adult criminality; (9) diverting youths from the traditional juvenile justice system to a program involving counselling, or a combination of counselling, educational upgrading and job placement, does appear to be a viable alternative to the usual court procedure; it reduces recidivism and is cheaper to operate; (10) short-term, family-crisis counselling appears to be effective with low risk clients, but not with high risk clients; (11) more intensive, longer term, treatment appears to be necessary for moderate and moderately high risk clients; (12) remedial programs directed at correcting learning disabilities (and neurological deficits) may need to be a component of educational upgrading programs for delinquents; (13) the use of volunteers as tutors and counsellors in delinquency prevention programs has proven successful and should be continued; (14) home-based, community oriented delinquency prevention programs appear to be the direction of the future; and (15) evaluational studies of delinquency prevention programs, in general, have been poorly designed.

A number of research and policy implications for delinquency prevention emerge. There needs to be: (1) strengthening of family life through education, counselling and therapy; (2) financial assistance as an adjunct to counselling provided to low income areas to help alleviate delinquency related conditions; (3) human resource assistance to schools so that they may take a more active role in identifying and treating potential delinquents; (4) programs to encourage delinquent and pre-delinquent families to make greater use of community recreational facilities; (5) diversion programs developed

which will minimize the negative consequences of interaction with the juvenile justice system; (6) programs which will provide short-term, family-crisis counselling for low risk youths; (7) programs which will provide longer term family intervention for moderate and high risk youths; (8) further research into all areas, but most specifically into, (a) the optimal duration of intervention programs, (b) the efficacy of peer group intervention, (c) the use of volunteers as a part of delinquency prevention programs, (d) the efficacy of providing employment for delinquents and pre-delinquents, (e) the effectiveness of programs designed to counteract learning disabilities in delinquent populations, and (f) the relative effectiveness of alternate delinquency prevention programs to determine which are most effective with what kinds of clients, with particular emphasis on home-based programs; (9) greater care exercised in the design of evaluational studies of delinquency prevention programs; and (10) funding to delinquency prevention programs for a sufficient period of time for the program to be developed, stabilized and evaluated, with particular emphasis on post-treatment follow-up.

PREFACE

This report was written under contract to the Solicitor-General of Canada. Computer searches were made of Sociological Abstracts (completed May, 1978), Psychological Abstracts (completed March 30, 1978), Social Sciences Citation Index (completed May 16, 1978), National Counsel on Crime and Delinquency (completed Sept. 7, 1977) and US National Institute of Law Enforcement and Criminal Justice Reference Services (completed Oct., 1977). In addition, manual search of the most recent journal issues was carried out.

The major purpose of this paper is to provide a review of the research literature in the area of family relationship variables and delinquency, including programs attempting to influence family variables in the control of juvenile delinquency. Such programs are often referred to as diversion programs since a major goal is to divert adjudicated delinquents from the juvenile justice system to a program designed to assist them to adjust to and cope with the norms and values of society. Such programs almost always involve counselling, and often a combination of counselling and educational upgrading, and employment placement. The selection criteria for clients vary from program to program, but often involve non-adjudicated youths, i.e., those unmanageables in trouble at school or at home, as well as adjudicated youth. To the extent that they do this, such programs would most appropriately be classified as preventative since the clients have not yet been charged with an offense. In the broader sense, however, all such programs may be

considered preventative since their goal is to prevent future troublesome and/or criminal behaviour. Whether the clients be adjudicated or not the treatment tends to be the same, i.e., counselling, educational upgrading, job placement, although less intensive for the non-adjudicated youth. The distinction made by some people, therefore, between preventative programs and diversion programs would seem to be artificial.

Major works in the area of family variables and delinquency are reviewed. These include Glueck and Glueck (1950, 1960, 1968, 1970), Hirschi (1969), Jonsson (1967), McCord, McCord and Zola (1959), Nye (1958), West (1969), West and Farrington (1973, 1977), and Wolfgang, Figlio and Sellin (1972). Nine diversion programs out of over 40 reviewed were selected on the basis of their relative methodological sophistication and the extent to which conclusions had supporting data. These are presented in detail in the Appendix, and in summary form in the main context. In Sept. 1979 an attempt was made to update the information on these projects. A letter requesting the most recent data available was sent to the director of each program. A reply was received from two project directors reporting no change in the status of their projects.

One long-term (30 years) follow-up study is presented.

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FAMILY VARIABLES AND DELINQUENCY

Introduction

The purpose of this section is to provide a review of the research literature in the area of family variables and delinquency. This approach starts with the assumption that criminal behaviour is learned just like any other behaviour pattern, and that early childhood experiences form the basis from which these behaviour patterns emerge. Since most early childhood experiences occur in the context of the family, family variables, (e.g., mother's affection, parental supervision, parental conflict, parental aggression, mother's self-confidence, father's deviance, father's absence) would be expected to have an influence on the development of criminal behaviour patterns. A number of studies attempting to discover the roots of delinquency have focussed on family variables. These include Glueck and Glueck (1950, 1956, 1962, 1968, 1970), Hirschi (1969), Jonsson (1967), McCord, McCord & Zola (1959), McCord (1979), Nye (1958), West (1969), West & Farrington (1973, 1977), and Wolfgang, Figlio & Sellin (1972). As with most research in a new area, however, these studies suffer from a number of methodological difficulties.

In evaluating the results of studies of juvenile delinquency a number of methodological and conceptual issues need to be kept in mind, (1) the definition of delinquency, i.e., self-reported delinquent acts or officially reported delinquency, (2) retrospective bias, i.e., selective remembering of past events, (3) the ecological

fallacy, i.e., drawing conclusions about one unit of analysis from the examination of another, and (4) inappropriate causal inferences, i.e., drawing causal conclusions from correlation data. Some studies (e.g., Glueck & Glueck, 1950), Jonsson, 1967) gathered data "retrospectively" after the boys have become delinquent. These studies suffer from distortion of memory, known as retrospective bias, which may lead to erroneous conclusions, i.e., interviewees tend to selectively remember past information, and do not present an accurate picture of past events. Gathering data prior to the families becoming identified as delinquent, although not eliminating entirely, does reduce retrospective bias. Three of the studies reported here, those by West and Farrington (1973), Wolfgang, et al. (1972), and McCord et al. (1959), gathered data on a population of normal boys prior to their becoming identified as delinquent, and followed them over time.

The identification of delinquent youth is a problem. Should official court records be the means for identifying delinquents, or should youth be asked to report their own delinquent behaviour, or both? Some studies, e.g., Nye (1958) use self-reported delinquent acts, others use officially recorded delinquency (e.g., Glueck & Glueck, 1950; McCord, et al., 1959; Wolfgang, et al., 1972; West & Farrington, 1973), and still others use both (e.g. Hirschi, 1969; West & Farrington, 1973). The problem with relying on official records is that they represent "... only the visible illegal conduct ... and that an unknown number of illegal acts which ... may have (been) committed have escaped official notice" (Wolfgang, et al., 1972, p. 17). A recent study, reported in the next section, in a comparison of self-reported and officially recorded delinquency found a ratio of six

self-reported offenses to one recorded offense (Knott, 1975). Confirming the view that a large number of offenses will remain undetected of officially recorded delinquency is the sole measure of delinquent behaviour. One difficulty with self-report data is that respondents may lie (Hirschi, 1969). They may lie to make themselves look good, i.e., say that they have not committed criminal offenses when in fact they have. Or, they may lie to make themselves look bad, i.e., say they have committed criminal acts when in fact they haven't. The former is more prevalent, but both types of biases distort the true picture. Most recent studies have opted for either a combination of self-report and official records, or official records of court appearances or convictions alone (e.g., Wolfgang, et al., 1972; West & Farrington, 1973).

Ecological methods were often used in early sociological studies of delinquency. The prevalence of erroneous interpretation of the results gave rise to what is known as the ecological fallacy. The ecological fallacy refers to the danger of drawing conclusions at one level of analysis based on measurement at another (Babbie, 1975). As an example, suppose that it is discovered that crime rates are higher in cities with large black populations than in those with few blacks. Suppose also the conclusion is that large black populations lead to higher crime rates. The problem is that we do not have information about whether it is the blacks, whites, or some other racial group who are committing the crimes, and therefore cannot conclude that a large population of blacks leads to higher crime rates. The level of analysis is between cities, when what we need is an analysis between racial groups to be able to draw such a conclusion. The ecological

fallacy is not a problem with most of the sociological studies cited in the present report.

A similar problem in delinquency research is the tendency for researchers to draw causal conclusions from correlational data. Two variables may be highly correlated with one another, yet both be caused by a third, as for example in the relationship between delinquency among broken homes. It seems likely that it is the nature of the relationships among the family members (positive or negative) that is the crucial variable in the causal chain between delinquency and broken homes, not broken homes, per se. This information is not available from correlational data. Use of the correlational method is typical of the early stages of scientific inquiry, that of description and discovery of relationships, and is true of early studies of delinquency prevention and the family (e.g. Glueck & Glueck, 1950; Hirschi, 1969; Jonsson, 1967; McCord, et al., 1959; Nye, 1958).

In the later stages of scientific inquiry the emphasis is on explaining, predicting and controlling events. This requires the establishment of causal links among variables. Causal relationships can best be determined from data generated by properly designed, manipulative studies. Such studies, although relatively easy to conduct in an experimental laboratory, are extremely difficult and often impractical to carry out in the applied setting. As an alternative, researchers use a variety of complex statistical techniques (e.g., cross-lagged, correlational analysis, path analysis, regression analysis, discriminate analysis) to control for the effect of extraneous variables and to permit the determination of causal relationships. All such procedures, however, are imperfect and the

results require replication to guard against erroneous conclusions, - not only for non-manipulative studies but also for manipulative studies. None of the aforementioned major works is a manipulative study. Wolfgang, et al. (1972) used regression analysis to determine the effects of one variable while holding the others constant. McCord (1979) used both regression and discriminant analyses on longitudinal data to investigate causal relationships among variables related to criminal behaviour.

As an aid to the reader a brief introduction is given to the works of Glueck and Glueck (1950), Hirschi (1969), Jonsson (1967), McCord et al. (1959), Nye, West & Farrington (1973), and Wolfgang, et al. (1972). These are referred to constantly throughout the foregoing review.

Glueck and Glueck (1950, 1956, 1962, 1968, 1970). A major work in the area of delinquency has been done by the Gluecks. The first major publication, Glueck & Glueck (1950) involved five hundred delinquents and five hundred matched non-delinquents, aged 11 1/2 - 16 1/2 years, with a mean age of about 14.5 years, from the Boston area. Boys, delinquents and non-delinquents, from underprivileged areas, were matched on the basis of age, ethnic origin and total intelligence. The delinquent group were boys " ... committed to correctional schools, most of whom had court records reflecting persistent delinquency, a fact which eliminated any questions that the boys might be accidental or minor offenders." (p. 27) Of the delinquents, 49% " ... had been charged with burglary (including attempted burglary and intent to commit burglary); 58.4% with larceny (excluding larceny of automobiles, but including attempted larceny,

larceny from the person, conspiracy to commit larceny, conspiracy to steal, accessory before the fact of larceny from the person); 19.8% with larceny of auto; 32.4% with crimes against the public order; 16% with stubbornness; 17% with run-away; 12.8% with truancy; 5.4% with assault and battery; 3.6% with sex offenses; 2.4% with robbery; 2.2% with arson; 2% with drunkenness." (p.28).

Subsequent studies by the Gluecks were refinements and follow-up (Glueck & Glueck, 1956, 1962, 1968, 1970, 1972) of this original work. The Glueck & Glueck (1968) follow-up study, 463 delinquents and 466 non-delinquents were studied during the first period (to age 25 years) and 438 delinquents and 442 non-delinquents during the second period (to age 31).

Nye (1958). Data were gathered on a 25% sample of all boys and girls in grades 9, 10, 11 and 12 in three medium-sized Washington towns (10,000 to 30,000 people). A fifteen item delinquency scale asking questions such as how often have you driven a car without a driver's license or permit? How often have you taken little things (worth less than \$2.00) that did not belong to you? How often have you bought or drank beer, wine or liquor? How often have you had sex relations with a person of the opposite sex? Negligible numbers of non-white and children of foreign-born parents were involved. For boys 15 and younger, scales types involving violations of none, one, two, three, or four laws or regulations were combined to form the least delinquent group; while scale types involving five or more laws or regulations violated once or twice, or frequently, were combined to form the most delinquent group. For boys 16 and over, the scale types were combined in almost the same way to determine the least delinquent

and most delinquent categories on the basis of number and frequency of rules violated.

McCord, McCord & Zola (1959), McCord (1978); McCord (1979). This was a re-analysis of the original Somerville youth study begun by Richard Cabot in the 1930's. In the original sample in 1937 there were 650 children, 325 experimental and 325 controls matched for physical health, intelligence, emotional adjustment, home background, neighbourhood, and "delinquency prognosis." As children, many of them lived in the most depressed areas of these two northeastern U.S. towns. About half of them were considered by their teachers and other officials "... as maladjusted, disordered, pre-delinquent children ..." (p. viii) while the other half were considered "... as average, well-adjusted boys" (p. viii). About 40% of all of the boys were convicted of crimes.

In 1955, almost 20 years after the original data had been gathered, McCord et al., (1959) gathered follow-up data on 253 of the 325 experimental boys, and 253 of the original 325 control boys. Again, between 1975 and 1978, 201 of the experimental subjects were re-traced (McCord, 1978, 1979). Of these, 76% were alive and lived in Massachusetts until at least their 40th birthday, 8% had died prior to their 40th birthday, and 14% had left Massachusetts. The Somerville Study, then, was a longitudinal study spanning more than 40 years.

McCord, et al., (1959) used convictions and sentences to penal institutions as their measure of criminality. McCord (1979) also used convictions as her measure of criminality. Convictions were divided into categories, (1) serious property crimes (e.g., larceny, theft, breaking and entering, arson), and (2) serious personal offenses

(e.g., assault, attempted rape, rape, attempted murder, kidnapping, and murder).

Jonsson (1967). Comparison was made of 305 delinquent boys, age 7-15 years, who were inmates at a treatment home, and 222 matched control subjects, a random sample of Stockholm, Sweden boys. Data were gathered mainly through interviews with the boys' parents, and teachers, and from official sources (e.g. central registry to obtain criminality information) and from hospital casebooks. All of the delinquent boys in this study were recidivists, involving such crimes as larceny, extreme aggressiveness, truancy and fire-raising.

Hirschi (1969). This sample was drawn from junior and senior high schools in the Richmond, California area. The 17,500 student population was stratified by race, sex, school and grade, producing a sample of 5,545 students. There were 1,475 Negro boys, 2,126 non-Negro boys, 1076 Negro girls and 864 non-Negro girls, with complete data obtained on 4,077 students. Data came from school records, a questionnaire completed by students, and police records.

Police contacts and total number of offenses were used to corroborate self-reported delinquency. Six delinquency items ranging from 'Have you ever taken little things (worth less than \$2.00) that did not belong to you?' to 'Not counting fights you may have had with a brother or sister, have you ever beaten up on anyone or hurt anyone on purpose?' were included in the questionnaire as an index of delinquency. Hirschi (1969) found significant positive correlations between self-report measures of delinquency and outside measures (e.g. total number of delinquent acts committed during the previous year, total number of delinquent acts ever committed) and argues that "...

policy records are less valid as a measure of delinquency ..." (p. 63) than self-report measures and presents the bulk of his findings in relation to self-reported delinquency.

West (1969), West & Farrington (1973, 1977). This was a planned longitudinal study of all school boys of a working-class population in England known as the Cambridge study. The first stage of the study (West, 1969) describes the development of delinquency and behaviour problems. The boys in this study included all of those in the age group 8-9 years who were attending six junior primary schools in a crowded, working class area of London. Ninety percent of the boys were white, while the other 10% were mostly European, or white Commonwealth, with some Cypriots and West Indian Negroes.

Information was obtained through psychological tests, teachers' reports, personal histories, through interviews and questionnaires. Court appearances and criminal records were used as a measure of delinquency.

West & Farrington (1973) report on the second stage of the study, during which the boys have been followed for 10 years. Data were gathered through interviews with the boys and families, tests administered at school and inquiries to social agencies. For purposes of discussion, four groups were identified, (1) recidivist juvenile delinquents (9%); (2) one-time juvenile delinquents (11.4%); (3) non-delinquents with police contacts (13.6%); and (4) non-delinquents with no police contacts (65.9%).

The final stage in the study reports details of the lifestyles of the boys at age 18-19 years (West & Farrington, 1977). Data are based on interviews with 389 youths, "... 101 of whom had an official

conviction for one or more offenses committed before the date of the interview" (p. 1).

Wolfgang, Figlio & Sellin (1972). This is a report of the first phase of a longitudinal study (the cohort study) of 10,000 boys born in 1945 in the city of Philadelphia, who resided there at least from age 10 to 18 years. Officially recorded delinquent acts were taken as a measure of delinquency. Data were obtained from psychological tests, school records and police records.

The present review of studies investigating aspects of family relationship variables and delinquency is discussed under the following sub-headings: (1) parental discipline, (2) parental supervision, (3) family cohesiveness, (4) parental conflict (5) broken homes, (6) family income (7) criminality in the family, (8) family size, (9) working mothers (10) family recreation (11) allowance, (12) freedom and responsibility, and (13) implications for delinquency prevention.

A Parental Discipline

There is little disagreement that the disciplinary practices of non-delinquent families are different from those of delinquent families. The real question is how they differ. In general, parents of delinquents tend to be more often inconsistent, lax, or strict (Glueck & Glueck, 1950, 1968; Nye, 1958; McCord, McCord & Zola, 1959; Bennett, 1960; Singer, 1964; Stanfield, 1966; West, 1969; West & Farrington, 1973, 1977) and to use punitive, physical punishment rather than love-oriented punishment with reason (Glueck & Glueck,

1950; McCord et al., 1959; Welsh, 1976). McCord et al. (1959) delineated six types of disciplinary practices:

"(1) Love-oriented discipline. Both parents consistently used methods based on withholding love, rewards, or privileges in combination with reasoning.

(2) Punitive discipline. Both parents consistently used beatings, physical isolation, violent anger or aggressive threats.

(3) Lax discipline. Neither parent exerted control.

(4) Erratic discipline A (love-oriented and lax). One parent used love-oriented methods and the other was lax, or they varied inconsistently between the two types.

(5) Erratic discipline B (love-oriented, lax and punitive). One or both parents wavered inconsistently in using these methods, so that all three were combined.

(6) Erratic discipline C (punitive and lax). One parent used punitive methods and the other was lax, or they varied inconsistently between the two methods." (p. 77)

Inconsistent, or erratic discipline is associated with high delinquency (Bennett, 1960; Glueck & Glueck, 1950; McCord et al., 1959; Nye, 1958; Stanfield, 1966). Bennett (1960), studying the

disciplinary attitudes among parents of delinquent and neurotic children, found that nine times as many delinquent families used inconsistent discipline as compared with normal discipline. Glueck & Glueck (1950) found a significantly greater proportion of fathers and mothers of delinquents were erratic in their discipline, "...swinging from overstrictness to laxity, without any consistency" (p. 132). McCord et al. (1959) found that consistent discipline (whether by punitive or love-oriented techniques) was associated with less criminality. They concluded that "...the consistency of parental behaviour is more important than the methods parents use for enforcing their demands" (p. 78). Nye (1958) found a significant positive relationship between delinquent behaviour in girls and inconsistency of punishment by mothers. West & Farrington (1973) reported that boys who had had erratic discipline were significantly more likely to become delinquent than those who had experienced other disciplinary methods.

There is some suggestion that inconsistent discipline interacts with socio-economic status (Stanfield, 1966), although other studies found no such relationship (West, 1969). Stanfield (1966) found that fathers' inconsistent discipline was associated with approximately twice as many convictions for delinquency among low status families than among high status families. It was suggested that there is greater opportunity for low status boys than high status boys to encounter a delinquency-supporting culture. Still, Stanfield (1966) found that consistent discipline was associated with less delinquency even for boys actively involved in their peer groups; the difference in proportion of juvenile offenders between those active with peers

and those not active with peers was less among those with consistent paternal discipline than those with lax discipline. Consistent paternal discipline, therefore, appears to be particularly important for low status boys. West (1969), on the other hand, found that erratic maternal discipline was positively correlated with poor conduct, irrespective of the level of income. But West (1969) did not test whether the relationship between consistent discipline and delinquency was stronger at the lower income levels than at higher income levels, only that there was a significant relationship at all levels.

Although consistent discipline is generally associated with a low degree of delinquency, the effects of inconsistent discipline are not always negative (McCord et al., 1959). McCord et al. (1959) found that inconsistent discipline varying between laxity and love-oriented was associated with a relatively low crime rate. This is in contrast with inconsistent discipline, which varied between love-oriented and punitive techniques, or which varied between laxity and punitiveness, which were associated with a high degree of delinquency. The latter combination, inconsistent discipline varying between laxity and punitiveness, was the most harmful of the disciplinary techniques, accounting for the highest percentage of delinquents. McCord et al. (1959) concluded that "...the absence of either consistency or love-oriented discipline...leads strongly to criminality, while the presence of consistency leads strongly...to conformity" (p. 79).

Both extremes of disciplinary practices, laxity and restrictiveness, tend to be associated with high delinquency (Glueck &

Glueck, 1950; Nye, 1958; Singer, 1974; West & Farrington, 1973), although not all studies agree that strict discipline is associated with delinquency (McCord et al., 1959; West, 1969; Wilson, 1974). Glueck & Glueck (1950) found that five times as many parents of delinquents as non-delinquents were lax in their disciplinary practices, and about three times as many fathers of delinquents as non-delinquents were overstrict. Nye (1958) found a significant positive relationship between delinquent behaviour in girls and strictness of discipline. West & Farrington (1973) reported that boys who had had very strict discipline were significantly more likely to become delinquent than those who had experienced other disciplinary methods. Singer (1974) found that restrictive policy-making, loose policing and lenient punishing were associated with antisocial behaviour. The severe restrictiveness leads to "...a build-up of frustration and bitterness that the only sufficient relief could be the antisocial outbreak" (p. 797). The lax policing and lenient punishment allows the expression of this frustration in the form of antisocial behaviour.

Strict discipline, however, has been associated with low delinquency in low income populations (McCord et al., 1959; West, 1969; Wilson, 1974). West (1969), in his Cambridge study of working class boys in England, found that strict rules was associated with good behaviour in the low income group, but bad behaviour in the middle income group; while average, or moderately strict rules, was associated with good behaviour at all income levels. Wilson (1974), in her study on lower class families in Britain, found a significant

relationship between strict rules and low delinquency. She concluded that "...strict rules strictly enforced" (p. 253) is what is needed in poverty conditions. McCord et al. (1959) also found that the use of consistent punitive discipline was associated with the lowest degree of criminality in their sample of low income boys. It appears, that harsh, strict discipline does work, under certain circumstances, e.g. those associated with low income.

Other studies suggest that harsh, physical punishment is associated with high delinquency (Glueck & Glueck, 1950; Welsh, 1976). Glueck & Glueck (1950) found that delinquent parents were about twice as likely to use physical punishment as non-delinquent parents. Welsh (1976) found a significant positive relationship between aggressive level and severity of corporal punishment in male delinquents; aggressive delinquency, involving crimes against the person (e.g. assaults, purse-snatchings, constant fighting in school, etc.) was associated with very severe corporal punishment, involving "...continuing use of the belt, or anything more severe than the belt to the rear, including frequent beatings, the use of extension cords, boards, fists or the equivalent" (p. 19). Welsh (1976) outlines three stages in the development of delinquent behaviour resulting from severe parental punishment:

- (1) "From 0 to 3 most youngsters develop normally, since the belt is not utilized until the parent feels the child is 'old enough' to be hit." (p. 19);

- (2) "As soon as a child begins to communicate with his parents (approximately 3 to 5 years),

the parent begins to feel the child is old enough to be hit, with the parent assuming the punishment will inhibit further misbehaviour."

(p. 19) At this point the child is placed under severe stress, becomes angry towards his parents, and "may be destructive in the home or aggressive in the community when he gains further independence." (p. 19);

(3) During the early part of this stage (5 to approximately 13 years) "...the child may continue to exhibit hyperactivity and behaviour problems in the classroom and in the home, but he is rarely involved in behaviour the community considers criminal activity..." (p. 19). It is during the latter part of this stage, as he becomes increasingly independent and alienated from his parents and seeks support outside the home, that criminality appears. As he becomes habituated to the physical punishment hostility builds up and he "...becomes more and more uncontrollable" (p. 20).

The use of love-withdrawal and reason as disciplinary practices is associated with low delinquency (Glueck & Glueck, 1950; Hoffman & Saltzstein, 1967; McCord et al., 1959; Nye, 1958). Glueck & Glueck (1950) reported that a major difference between the two disciplinary practices of parents of delinquents and those of non-delinquents was

that parents of delinquents more often used physical punishment and less often used reasoning when boys misbehaved. McCord et al. (1959) found that boys who had been disciplined by love-oriented techniques (including reasoning) generally had lower crime rates than those who had been disciplined by other methods (e.g. lax or punitive). Nye (1958) found less delinquent behaviour in families in which parental punishment was explained, and also where adolescents were given the opportunity to explain their behaviour, than in families where this was not the case. He suggested that "punishment which fails to take intent, or special circumstances into account becomes...indiscriminant punishment and as such, becomes less effective in social control" (p. 84).

Frequent use of love-withdrawal (e.g. withdrawal of love, rewards or privileges) without reasoning has been found to be related to high delinquency for rejecting parents, but low delinquency for accepting parents (Nye, 1958). Thus, although the effectiveness of the love-oriented disciplinary technique in combination with reasoning is independent of parental acceptance, without reasoning it is dependent upon affectionate parents. It may be that affectionate parents tend to use reasoning along with love-withdrawal more so than rejecting parents. Whatever the mechanism, a recent 30-year follow-up on the original McCord et al (1959) study showed that maternal affection during childhood was one of six family atmosphere variables that significantly predicted adult criminal behaviour (McCord, 1979), suggesting that maternal affection is an important variable in the etiology of adult criminality.

The rationale for the effectiveness of love-oriented discipline is provided by Becker (1964). It includes:

- "(1) warmth which makes the parent important to the child and obviates the need for more severe forms of discipline to gain compliance,
- (2) the presence of a model of controlled behaviour,
- (3) the provision of verbal cues (reasons) which facilitate understanding of what is expected and aid the child's anticipation of consequences, and
- (4) the fact that punishment is likely to continue until the child shows a restitutive reaction, thus directly reinforcing such reactions by the termination of punishment."

(in Quay, 1965, p. 87)

Further evidence for the importance of reasoning as part of the disciplinary process is provided by Hoffman & Saltzstein (1967) in a study of moral development in middle and lower class families. It can reasonably be assumed that advanced moral development is negatively related to delinquent behaviour. Hoffman & Saltzstein found that frequent use of reasoning (induction) relative to power assertion (physical punishment) or love-withdrawal (ignoring the child) by middle class parents was significantly related to advanced moral development. Use of power assertion was weakly associated with moral development, while use of love-withdrawal was unrelated to moral development. Unfortunately, the relationship between reasoning and

advanced moral development did not hold for lower class families; none of the disciplinary techniques was associated with moral development for lower class families. More research is needed to determine what type of discipline is associated with advanced moral development in lower class families.

It seems clear that reasoning is an important ingredient in the disciplinary process, at least for children who can read and understand logical processes. But what about pre-school children who have not yet reached the "age of reason", who cannot yet empathize or assume the role of others? What is the best disciplinary technique for parents to use at this stage? Lytton & Zwirner (1975), investigating disciplinary techniques and compliance in two-and-a-half-year old children, found that maximum compliance to parental demands occurred with use of power assertive techniques, not reasoning or mild suggestions. Moreover, this behaviour generalized to other situations in which parental prohibitions were absent, suggesting that power assertive techniques are an effective way to teach the child to behave appropriately in a wide variety of similar circumstances. Power assertion, then, appears to be the most effective disciplinary technique for use in the early pre-school years.

Although power assertion is effective in the early years, Baumrind (1978) suggests that by early adolescence it should be replaced by more equally distributed power, "authoritative power". She notes that "parental power based on coercion is not enforceable and cannot be legitimated" (p. 260). Authoritative parents attempt to direct the child's activities in a rational, issue-oriented manner.

They encourage discussion and reason with the child; they encourage independence but insist on some conformity; they exert firm control when the child disobeys, but do not become over-restricting; they set standards for future conduct and use reasoning as well as power to shape the child and to achieve parental objectives.

In conclusion, lax, restrictive or inconsistent discipline is associated with high delinquency, as is the use of harsh, physical punishment. Inconsistent discipline obscures the distinction between approved and disapproved behaviour; lax discipline provides little guidance in the distinction between approved and disapproved behaviour; while extreme restrictiveness leads to the accumulation of frustration and bitterness. Extreme strictness is associated with low delinquency for low income groups, while moderate strictness is associated with low delinquency for all income groups. Severe physical punishment is associated with highly aggressive crimes against persons. Love-oriented discipline involving reasoning is associated with low delinquency. Reasoning and parental affection appear to be important ingredients of the love oriented technique for children who can understand the reasoning process. Power assertion, rather than reasoning, appears to be the most effective disciplinary technique to use with pre-school children (who are not yet capable of reasoning), although this must be replaced by authoritative power (involving reasoning) by adolescence. Love and affection make the rules explicit and non-arbitrary, which also increases acceptance and reduces hostility. In families adhering to the norms of society this translates into greater conformity to socially desirable behaviour and

less indulgence in undesirable (delinquent) behaviour on the part of the children.

B Parental Supervision

Most researchers have reported a significant relationship between poor parental supervision and high delinquency (Glueck & Glueck, 1950, 1970; Hirschi, 1969; Jensen, 1972; Singer, 1974; Stanfield, 1966; West & Farrington, 1973; Wilson, 1975). Glueck & Glueck (1950, 1970) found that maternal supervision was one of the basic factors distinguishing delinquents from non-delinquents; a significantly higher percentage of mothers of delinquents left their children to shift for themselves, or in the care of an irresponsible child or adult, than mothers of non-delinquents. Maternal supervision was one of five factors in Glueck & Glueck's (1950) original social prediction table and one of three factors in the final version (Glueck & Glueck, 1970), for identifying future delinquents. Stanfield (1966) found that weak paternal supervision was associated with high delinquency when peer group activity was high. Strong, consistent supervision and discipline by the father, however, was associated with low delinquency regardless of whether or not the boy was actively involved in a peer group. Wilson (1975), studying delinquent boys and girls in Britain, found that parental supervision significantly discriminated between delinquents and non-delinquents, and concluded that "in a delinquent milieu, in which authoritarian and repressive methods of child-rearing are common, the only effective protection against delinquency appears to be a strict parental regime that limits the children's freedom of movement" (p. 249).

Singer (1974) found that loose policing (supervision) along with lenient punishing (e.g. lax, inconsistent) and very restrictive policy-making was the disciplinary configuration associated with a high degree of antisocial behaviour. The lax supervision was particularly deleterious in combination with the "...intense frustration and bitter defiance..." (p. 798) arising from the restrictive policy-making, as it not only provided the opportunity, but seemed to invite the expression of antisocial behaviour.

Self-report delinquency studies also support the view that poor parental supervision is associated with high delinquency (Hirschi, 1969; Jensen, 1972). Hirschi (1969), investigating self-reported delinquency in public junior and senior high schools in California, found that children who perceived their parents as aware of their activities (indirect supervision) were less likely to have committed delinquent acts than those who perceived their parents as unaware of their activities. Corroborating these findings, Jensen (1972) found a significant negative relationship between paternal supervision and self-reported delinquency in a different population of junior and senior high school, non-black males in California.

Poor parental supervision, however, appears to be related to other background variables, such as low income and criminality (West & Farrington, 1973). Although West & Farrington (1973) found that poorly supervised boys were much more likely to become delinquent than "good" or "average" supervised boys, this relationship disappeared when family income and parental criminality were taken into account. Poor parental supervision was associated with low income and criminal parents. West & Farrington (1973) concluded that it was of "...little

significance after allowing for other factors..." (p. 55), although they acknowledged that there are many problems associated with delineating the causal factors in the constellation of family life-environmental variables. More recent evidence provided by 30-year follow-up data on the original McCord et al (1959) data suggests that parental supervision is, indeed, an important variable in determining adult criminality, independently of other variables such as, social status (e.g. father's occupation), juvenile criminality and father deviance (e.g. conviction for drunkenness, conviction for a serious crime such as theft, burglary, assault, rape, attempted murder, or murder) (McCord, 1979). McCord (1979) found that, of nine variables describing social status (e.g. neighborhood, father's occupation), parental characteristics (e.g. parent aggressiveness, mother's self-confidence, father's deviance) and child rearing practices (e.g. mother's affection, parental supervision, parental conflict), parental supervision during childhood was the most important variable predicting adult criminality. Neither measures of family social status during childhood, father's occupation nor desirability of the neighborhood, was predictive of either adult property crimes or personal crimes.

In conclusion, despite its relationship with low income and parental criminality, parental supervision appears to be an essential variable in the control of delinquency; high supervision is associated with low delinquency. Indeed, it may be the only effective means of protection against delinquency under extremely adverse conditions, such as poverty and parental criminality.

C Family Cohesiveness

Cohesiveness of the family was identified as one of the five major factors in the prediction of delinquency by Glueck & Glueck (1950). They defined cohesiveness as "...strong emotional ties among the members, joint interests, pride in their home, and a 'we' feeling in general" (p. 115). McCord et al. (1959) define cohesiveness as strong parental affection for each other and their children, pride in the family unit, family participation in recreation, lack of bitter argumentation and conflict.

In general, high family cohesiveness is associated with low delinquency (Glueck & Glueck, 1950; McCord et al., 1959). Glueck & Glueck (1950) found that about one-quarter as many delinquent families as non-delinquent families could be classified as cohesive. McCord et al. (1959) found that a significantly lower proportion of boys convicted of crimes came from cohesive homes than from any other type (e.g. quarrelsome-affectionate, broken, quarrelsome-neglecting). They concluded that "...conflict and neglect within the home predispose a child to crime (even more so than do broken homes), while cohesiveness and affection lead toward conformity" (p. 83). More recent evidence provided by McCord (1979) confirms this view. McCord (1979) reports 30-year follow-up data on the original McCord, et al. (1959) data showing that six of seven home atmosphere variables (e.g., mother's affection, parental supervision, parental conflict, parental aggression, mother's self-confidence, father's deviance) were each individually significantly related to adult criminal behaviour, while father absence was not. This is strong evidence for the importance of

a favourable home atmosphere (high family cohesiveness) in understanding adult criminality.

Lack of parental affection is typical of delinquent families (Andry, 1960; Glueck & Glueck, 1950; McCord et al., 1959; Nye, 1958; West & Farrington, 1973). Andry (1960), in a comparison of 80 court-committed repeated offenders (boys) and a matched sample of non-delinquents, found that both mothers and fathers of delinquents were less affectionate than control parents. Nye (1958) found a significant relationship between parental rejection and delinquency. Glueck & Glueck (1950) found that mothers of delinquents were much more likely to be rated as indifferent, hostile or rejecting, and much less likely to be rated as warm than mothers of non-delinquents; a greater proportion of mothers of delinquents were over-protective, indifferent, and openly hostile and rejecting. Similarly, only half as many fathers of delinquents as of non-delinquents could be classified as warm, sympathetic and affectionate; and more fathers of delinquents expressed open hostility toward their sons.

McCord et al. (1959) found that a significantly higher percentage of sons of cruel, passive or neglecting mothers were convicted as juveniles than sons of mothers in the remaining categories (e.g. loving, accepting); and likewise that cruel, neglecting fathers were associated with a high proportion of delinquents. West & Farrington (1973) also found that cruel, passive or neglectful fathers and mothers were associated with high delinquency; almost twice as high a percentage of delinquents came from families in which the mother was described as indifferent, neglecting or cruel, as in families in which the mother was described in more positive terms; and boys with cruel,

passive or neglecting fathers were almost twice as likely to become delinquents as those with warm fathers.

There has been some discussion about which is more damaging, rejecting mothers or rejecting fathers (Glueck & Glueck, 1950; McCord et al., 1959; West & Farrington, 1973), or mutual rejection of parents and children (Nye, 1958). Glueck & Glueck (1950), in their study of 500 offenders and 500 non-offenders, reported that all of the affectional patterns in the home (i.e. mother-child, father-child, child-parent, child-child), were significantly related to delinquency. They suggested, however, that the most important relationship was the father's affection for the boy; indifferent, rejecting, or hostile paternal attitudes were more frequent than similar maternal attitudes in delinquents. In contrast, McCord et al. (1959), in their Somerville youth study, suggested that bad fathers were not as damaging as bad mothers, implying that the mother-child relationship is more important. Finally, West & Farrington (1973), in their Cambridge study of a working class population in England, concluded that "...cruel, passive or neglectful fathers were just as damaging as cruel, passive or neglectful mothers," (p. 50) suggesting approximately equal importance of mothers and fathers in producing delinquency.

Other evidence suggests that rejection of the parents by the adolescent and mutual parent-adolescent rejection are particularly detrimental (Nye, 1958). Although Nye (1958) found that rejection of the adolescent by parents was significantly related to delinquency, it was not as highly related as was rejection of parents by the delinquent, nor mutual parent-adolescent rejection, the latter having

the highest relationship to delinquency. Mutual parent-child rejection is particularly typical of delinquent families and is associated with rejection of the parent as a role-model (Glueck & Glueck, 1950; McCord et al., 1959). Glueck & Glueck (1950) found that about half as many delinquents as non-delinquents had close ties with their fathers, and about four times as many delinquents as non-delinquents expressed open hostility toward their fathers. Similarly, significantly fewer delinquents than non-delinquents indicated affection for their mothers (and fewer delinquents had normal warm relationships with their siblings). McCord et al. (1959) also found that fathers' rejection interacts with role-model; boys with criminal fathers tended to be delinquent, particularly if the fathers had been cruel or neglecting, alcoholic or sexually unfaithful. They concluded that "...the father's role-model exerts the greatest influence when the father is either cruel or neglecting" (p. 93). They did find, however, that consistent discipline appears to militate against delinquency; boys with criminal fathers who used consistent discipline had a lower delinquency rate than those whose fathers used erratic discipline.

Finally, mothers' role-model was found to be significantly related to delinquency (McCord et al., 1959). McCord et al. (1959) found that if the mother was deviant (e.g. had a criminal record, was an alcoholic or sexually promiscuous) almost twice as many boys were convicted of crimes than if the mother was not deviant. Moreover, if the mother was non-loving and used erratically punitive punishment, as well as being deviant, then the probability of her son becoming a criminal was significantly increased; 94% of the boys from homes with

a deviant mother who used erratically punitive punishment were convicted of crimes. McCord et al. (1959) concluded that "...maternal affection and role-model are two primary determinants of criminality" (p. 103).

Evidence suggests that family cohesiveness (McCord et al., 1959) and parental acceptance (West & Farrington, 1973) are related to the type of discipline employed. McCord et al. (1959) found that cohesive homes tended to utilize love-oriented techniques, while quarrelsome homes utilized erratically punitive techniques. The relationship between home atmosphere and discipline was particularly evident for the quarrelsome-neglecting condition; every boy with a home background of both lax discipline and a quarrelsome-neglecting parent had a criminal record. Among the boys who had lax discipline, the crime rate increased significantly from high cohesive to low cohesive (quarrelsome-neglecting) homes. Family cohesiveness seemed to militate against criminal behaviour among boys experiencing lax discipline. West & Farrington (1973) found that loving parents were associated with greater use of love-oriented discipline and less delinquency.

Harsh maternal attitude and discipline was particularly damaging (West & Farrington, 1973). West & Farrington (1973) found a significant relationship between parental behaviour and delinquency. Parental behaviour was a composite measure including maternal attitudes and discipline, paternal attitudes and discipline, and parental conflict. Boys from families having the worst parental behaviour were more than twice as likely to become delinquents as boys from good or average parental behaviour homes. Moreover, the effects

of poor parental behaviour were particularly evident among recidivists and among boys first convicted at an early age; almost five times the proportion of boys from homes with the worst parental behaviour became recidivists as those from the remaining homes, and almost twice the proportion of those experiencing poor parental behaviour were convicted at an early age. Of the three components of parental behaviour, maternal attitude and discipline was most closely associated with delinquency; harsh maternal discipline (i.e. cruel, brutal, rejecting) was associated with high delinquency. As West & Farrington (1973) suggest, the significant relationship between parental behaviour and delinquency in their longitudinal study is particularly interesting because it "...is a possible cause, not merely a precursor of juvenile delinquency" (p. 61), since data were gathered in advance of the boys becoming delinquent. This deserves further investigation.

There is some indication that low cohesiveness exacerbates the adverse effect of poverty (McCord et al., 1959); and that low income exacerbates the effect of poor parental behaviour (West & Farrington, 1973). McCord et al. (1959) found that significantly more boys from non-cohesive, poor families became delinquent than from cohesive, poor families. They suggested that non-cohesiveness gives rise to emotional frustration and the tendency to seek gratification outside the home (often with delinquent gangs). West & Farrington (1973) also found a significant effect due to poor parental behaviour among boys from low income families; boys from low income homes with poor parental behaviour were much more likely to become delinquent than

boys from higher income homes with poor parental behaviour. Still, the effect of poor parental behaviour remains significant when family income, family size and parental criminality were controlled. They concluded that "...parental behaviour was an important factor associated with delinquency independently of other basic factors" (p. 61). Nevertheless, poor parental behaviour in combination with poverty is associated with high delinquency.

The pattern of parent-child rejection appears to be passed on from generation to generation (Jonsson, 1967). Jonsson (1967) studied the grandparents of delinquent Swedish boys and found they, too, had rejected their children more frequently than grandparents of a control group. Almost 50% of maternal grandparents and more than 40% of paternal grandparents of delinquents were rejecting and critical of their children. Thus, parents, who themselves have been rejected as children, tend to reject their own children; rejection breeds rejection.

Not only is parental rejection related to delinquency, but it may also be related to successful treatment (Wilgosh, 1973). Wilgosh (1973) studied group home placements as a treatment for delinquent behaviour and found that a positive, supportive parental attitude toward the child was positively related to successful treatment outcome.

Two studies report no relationship between family cohesion and delinquency (Rahav, 1976; Wilson, 1974). Rahav (1976) found no significant correlation between family relationships and delinquency in Israeli middle class delinquents and concluded that "...disruption of harmony in the family is not necessarily linked to delinquency" (p.

268) although he acknowledged that in Israel "...the conflict and stresses resulting from social change and culture conflict overshadow the troubled family as causes of delinquency" (p. 268). Wilson (1974) in her study of poverty families in Britain, found that a contented home atmosphere was not associated with less delinquency in the children; neither a warm home atmosphere (high cohesiveness) nor the father's interest in the boy was significantly related to delinquent behaviour. Only strict supervision was associated with less delinquency. These results seem contrary to those of other researchers (McCord et al., 1959; West & Farrington, 1973) in which high cohesiveness appeared to militate against delinquency for low income families. Perhaps the low income conditions in the latter two studies were not as extreme, nor as stressful, as the conditions in the Rahav (1976) and Wilson (1974) studies, and that under extreme stress family relationship variables become less important. Further research is indicated.

Nye (1958) offers an explanation of the mechanism by which high family cohesiveness, (or strong parent-child acceptance), operates to reduce antisocial behaviour. It involves "...affectional identification with the parent..." which is directly related to the desire of the child to please, or reluctance to hurt, or disappoint the parent, which in turn is directly related to internal (indirect) social control over the child. The stronger the affectional identification (the more positive the parent-child relationship) the greater is the child's reluctance to injure, or disappoint the parent; and contrariwise, the less strong the affectional identification (neutral or negative parent-child relationships) the less is the

child's reluctance to disappoint the parent. Indeed, mutual parent-child rejection may lead to deliberate intent to injure or disappoint the parent as a means of revenge.

In conclusion, high family cohesiveness (low parental rejection) tends to be associated with low delinquency. Unfortunately, parental rejection appears common among delinquent families. Both mothers' and fathers' acceptance is important, although mutual parent-child acceptance may be even more important in the prevention of delinquency. Parental rejection interacts with role-model; boys with criminal fathers tended to be delinquent, particularly if the fathers had been cruel or neglecting, alcoholic, or sexually unfaithful; boys with deviant mothers (e.g. had a criminal record, was an alcoholic or sexually promiscuous), who were non-loving and used erratically punitive punishment, were much more likely to become delinquents than if the mother was non-deviant and loving. Maternal and paternal affection and role-model are therefore powerful determinants of delinquency. Parental rejection interacts with disciplinary technique; accepting parents use love-oriented disciplinary techniques, while rejecting parents use erratically punitive techniques. Cruel, brutal, rejecting maternal discipline is particularly damaging, and may be a possible cause of delinquency. Parents who reject their children have themselves been rejected as children. Parental acceptance may facilitate successful treatment in group home placements. Studies which find no relationship between family atmosphere and delinquency have investigated extremely stressful conditions, in Israel (war and social upheaval) and Britain (poverty).

D Parental Conflict

Closely related to family cohesiveness is parental conflict. As with family cohesiveness, parental conflict has been found to be significantly related to delinquency (Bennett, 1960; Glueck & Glueck, 1950; Jonsson, 1967; McCord, McCord & Gudeman, 1960; Sollenberger, 1968; Stewart & Leone, 1978; West & Farrington, 1973). Bennett (1960) found that disturbed relationships between father and mother were more common among delinquent families than among families where the child had some kind of neurosis. Glueck & Glueck (1950) found that only 37% of parents of delinquents, compared with 65% of parents of non-delinquents, had good conjugal relationships (e.g. reasonable compatibility, freedom from quarrelling). Similarly, McCord, McCord & Gudeman (1960) found that parental relationships were affectionate in only 12% of criminal families. More recently, Stewart & Leone (1978) found a significant relationship between parental conflict and antisocial behaviour (unsocialized aggressive behaviour). Sollenberger (1968) attributed the low delinquency rate among Chinese-Americans to, among other things, the high degree of harmony and integration within the family. West & Farrington (1973), in their study of working class families in Britain, found that about twice as many delinquents emerged from families in which there was a significant degree of marital disharmony than from normal families.

Marital disharmony is often associated with "...an undue dominance by one parent in family matters" (West & Farrington, 1973, p. 54). Paternal and maternal dominance were almost equally damaging;

boys with neither parent dominant were much less likely to become delinquents. As West & Farrington (1973) point out, these results appear to differ from those of Glueck & Glueck (1950) in which no difference between delinquents and non-delinquents in parental dominance was found. But Glueck & Glueck (1950) "...categorized nearly all their cases as either mother-dominant or father-dominant, thereby obscuring the possibility that more or less equally balanced parents produced less delinquents" (p. 54). West & Farrington (1973) computed a parental conflict score by combining marital disharmony, parental inconsistency and dominance, and found this to be significantly related to delinquency; boys from families suffering from parental conflict were more than twice as likely to become delinquent as those from non-conflict families.

Finally, there is some evidence that disharmony runs in the family (Jonsson, 1967). Jonsson (1967) found that significantly more fathers of delinquent boys came from disharmonious homes than fathers of non-delinquent boys. There was a trend for mothers also to follow this pattern.

Contrary evidence was found by three researchers (Andry, 1960; Rahav, 1976; Wilson, 1974) although there were extenuating circumstances in some cases. Andry (1960) failed to find a significant difference between delinquents and non-delinquents in the amount of quarrelling that went on between parents. Rahav (1976) did not find a significant correlation between family relationships and delinquency in an Israeli population. As he noted, however, the stresses related to rapid social change and culture conflict in the

country at that time may have masked the relationship between family disharmony and delinquency. Wilson (1974), studying poverty families in Britain, reported that a warm, contented home atmosphere was unrelated to delinquent behaviour in the children. What was related to delinquency was strict supervision. Again, the extremeness of the poverty conditions may have overridden the importance of family relationship variables.

Finally, McCord (1979), in a 30-year follow-up study of the original McCord, et al. (1959) data, found evidence for both positions; both parental conflict (e.g., reports of disagreement between the parents about the child, about values, money, alcohol, religion) and parental aggressiveness (i.e., the extent to which the parent used little restraint when angry, e.g., threw things, hit people, broke windows, shouted abuses) during childhood were significantly predictive of serious adult personal crimes (e.g., assault, attempted rape, rape, attempted murder, kidnapping, and murder), but were not predictive of serious adult property crimes (e.g., larceny, auto theft, breaking and entering, arson).

In conclusion, the weight of the evidence suggests that parental conflict is related to criminality--at least some forms of it. In situations where parental conflict and/or parental aggressiveness are evident, it may be necessary to provide assistance to the parents before the delinquent's problem can be solved (Steward & Leone, 1978) and/or it may be necessary to temporarily remove the delinquent from the family stress situation (Power, Asch, Schoenberg & Sirey, 1974).

E Broken Homes

Many studies have supported the view that delinquents are more likely than non-delinquents to come from broken homes (Baron & Feeney, 1976; Glueck & Glueck, 1950; Haarman et al., 1976; Koller, 1971; McCord et al., 1959; Monahan, 1957; Peterson & Becker, 1965; Ryan, 1974; Wolf et al., 1976). Glueck & Glueck (1950), in their study of 500 delinquents and 500 nondelinquents, found that a greater number of the parents of delinquents than of non-delinquents were separated, divorced, had never been married to each other, or were no longer living. Monahan (1957) found that delinquents from broken homes were more likely to be recidivists than delinquents from unbroken homes. Koller (1971), investigating parental deprivation and delinquency in 160 delinquent girls at a training school in Australia, found that 62% had experienced a prolonged parental loss, compared with 13% in a matched control group; and a further 32% had experienced at least one other lengthy separation. Absence of both parents or the father because of separation, divorce or placement in an institution was most common. McCord et al. (1959) found that broken homes was associated with a significantly greater degree of criminality than cohesive or quarrelsome-affectionate homes, but not as great as quarrelsome-neglecting homes. Baron & Feeney (1976), in their Sacramento Diversion Program, found that a greater number of pre-delinquent and delinquents were living with one parent (35%) and one natural parent and one step-parent (greater than 60%) than in the general population. Haarman, Hildenbrand, Siefold and Conlin (1976), in their Louisville Youth Diversion Project, found that 65% of the youths (about 70-80 percent of whom were classified as delinquents)

lived with only one natural parent, and 48% lived with their mothers only. Ryan (1974), investigating an educationally oriented re-socialization program for adjudicated delinquent males, found that 81% of the youths were from one-parent families. Wolfe, Philips, Fixsen, Braukmann, Kirigin, Willner & Schumaker (1976), investigating a residential treatment program for adjudicated delinquent boys and girls, found that two-thirds of the delinquent and pre-delinquent referrals were from families from which at least one parent was absent. Peterson & Becker (1965) reported that delinquents are one-and-a-half to two-times more likely to come from broken homes than non-delinquents. They concluded that the "...substantial relationship between delinquency and broken homes remains as one of the over-riding facts any conception of delinquency must take into account" (p. 69)..

The effect of broken homes on delinquency depends upon the type of separation, with the most damaging effects being associated with divorce, separation or desertion, and least damaging due to death (Banks, 1965; Bruce, 1970; Burt, 1925; Douglas et al., 1968; Wallis & Maliphant, 1967; West & Farrington, 1973). Banks (1965) and Bruce (1970) found that separation due to death was least damaging, while Wallace & Maliphant (1967), Burt (1925), and Douglas et al. (1968) found that separation due to divorce or desertion was most damaging. Douglas et al. (1968) found that the delinquency rate for families broken by divorce or separation was more than twice as high as that for families broken by death of a parent. West & Farrington (1973) found that divorce, or separation after a long family strife was most damaging. Burt (1925) found no differences between delinquent and

non-delinquent groups in regards to death of the father, but significant differences in the incidence of divorce, separation and desertion. Finally, Wallis & Maliphant (1967) found that delinquents were more likely than non-delinquents to come from homes that had been broken by divorce or separation.

Illegitimacy has been associated with high delinquency (Glueck & Glueck, 1950; West & Farrington, 1973), although there is not complete agreement (Burt, 1925; Castle & Gittis, 1957; Wallace & Maliphant, 1967). Glueck & Glueck (1950) found that 6% of delinquent mothers as opposed to 2% of non-delinquent mothers of illegitimate children never married the fathers. West & Farrington (1973) found that illegitimate boys who had had little contact with their fathers, were particularly prone to delinquency, both as first offenders and recidivists. On the other hand, other researchers (Burt, 1925; Castle & Gittis, 1957; Wallace & Maliphant, 1967), all investigating samples of delinquents from London, England, found no significant relationship between illegitimate births and delinquency. As suggested by Wallace & Maliphant (1967) lack of findings may be due to the "...disintegrative effects on family life and parental control to which possibly the bad housing and poverty of the urban environment in these areas have contributed" (p. 274). This view is consistent with that of others who suggest that the economic condition is a more important precursor of delinquency than broken homes (Chilton & Markle, 1972; West & Farrington, 1973).

The evidence regarding the age of separation is controversial, with some studies suggesting that the impact of family disruption is less serious for adolescents than pre-adolescents (Monahan, 1957,

1960; Peterson & Becker, 1965; Power et al., 1974; Toby, 1959) and others suggesting no difference in the effects of early versus late separation, both are equally deleterious (McCord et al., 1959; Nye, 1958; West & Farrington, 1973). Peterson & Becker (1965), citing Toby (1957) and Monahan (1957, 1960), concluded that the effect of family disruption is more serious for pre-adolescents than adolescents. Power et al. (1974), studying juvenile delinquents in London, also concluded that early family breakdowns (under 7 years of age) were more closely associated with delinquency than older ones (7 years or older). Contrariwise, McCord et al. (1959) reported that there was not a greater proportion of criminals from homes which were broken when the child was young (in infancy or before 5 years old) than in homes which were broken when the child was older. Nye (1958) found no differences in delinquent behaviour among children from homes broken early (5 years or younger), later (6 to 11 years) or in adolescence (12 years or older). Finally, West & Farrington (1973) found that early separations (age 5 years or under) were not more damaging than later ones (6 years and older).

Generally, studies have found that girls are more strongly affected than boys by broken homes (Burt, 1929; Peterson & Becker, 1965; Rodman & Grams, 1967); recent evidence, however, suggests that the relationship may be spurious (Datesman & Scarpitti, 1975). Burt (1929) found that absence of the mother was significantly related to delinquency, and the effect was particularly noticeable for girls. Rodman & Grams (1967) found that delinquent girls more often came from broken homes than delinquent boys. In their review, Peterson & Becker (1965) concluded that girls were more strongly affected by family

disruption than boys. In contrast, Datesman & Scarpitti (1975) found that although there were significant differences between males and females for moral offences (e.g. premarital sexual activity) there were no differences in this regard for property offences. They suggested that the higher incidence of delinquent females from broken homes reported in previous studies is an artifact of the way in which delinquency is defined (i.e. premarital sexual behaviour is a delinquent act for females, but not for males). A re-examination of the relationship between broken homes and sex, which takes into account the nature of the offence, is needed.

There is some suggestion that broken homes are associated with the more serious forms of delinquency (Chilton & Markle, 1972; McCord et al., 1959; Nye, 1958; Weeks, 1940). McCord et al. (1959) found that boys from broken homes more often committed violent crimes. Nye (1958) found that delinquents from broken homes were more likely to commit "ungovernable" types of delinquent acts (e.g. truancy, running away from home, expulsion from school, driving without a license, drinking alcoholic beverages). Weeks (1940) found that delinquents from broken homes were more likely to be incorrigible and to commit sexual offenses than those from intact homes (reported in Nye, 1958). Finally, Chilton & Markle (1972) found that the more serious delinquent behaviours were more often associated with broken families than less serious delinquent behaviours.

There is controversy also as to which is more detrimental, mother absence or father absence. Most studies suggest that mother absence is more detrimental (Burt, 1929; Kraus & Smith, 1973; Shanok & Lewis,

1977), others suggest father absence (Verkkunen, 1976), while still others suggest that mother and father absence are equally detrimental (McCord et al., 1959). Burt (1929) found that absence of the mother was particularly detrimental for girls. Shanok & Lewis (1977), investigating the number of court referrals of psychiatrically disturbed children, found that there were more motherless children, or children living with stepmothers in the juvenile court clinic than in the child guidance clinic, even though the proportion of broken homes was similar. They suggested that when mothers are absent there is no-one to protect the psychiatrically disturbed child by directing him to a therapeutic rather than a correctional facility. They concluded that the father "...may be unable to take on an effective mothering role" (p. 1133), implying that mothers are more important than fathers in that they are indispensable. Even stepmothers in this study were not able to reverse the effects of the absence of the biological mother. Shanok and Lewis (1977) suggested that they may have entered the home too late for "...an adequate reciprocal bond to form between the child and the surrogate mother" (p. 1133). Further evidence of the inability of the father to compensate for absence of the mother comes from a study by Kraus & Smith (1973) of male juvenile offenders in Australia. They found a highly significant association between "father only" families and recidivism, but not for "mother only" families. They suggested that families with "fathers only" "...lack a home atmosphere, which results in the boy spending more time away with their peers and thus exposing themselves to an increased risk..." (p. 55) of becoming involved in delinquent behaviour. Mothers, on the

other hand, are more able to create the home atmosphere, and by implication are therefore more important than fathers.

McCord et al. (1959) suggested that mothers and fathers are of equal importance, in that each can compensate for the absence of the other given a warm, loving attitude. On the other hand, there is at least one study that suggests that the father is more important than the mother (Verkkunen, 1976). Verkkunen (1976), investigating the relationship between parental deprivation and recidivism in juvenile offenders (mostly boys) sentenced to prison in Finland, found that recidivists had had considerably more paternal deprivation in adolescence than comparable controls, while there was no difference in this regard for maternal deprivation. Recidivists also less often had stepfathers or adoptive fathers than controls, and again, there were no differences between recidivists and controls in this regard for mothers. Verkkunen (1976) concluded that the "...absence of the mother or mother-substitute did not seem to be so important as the absence of the father or father-substitute" (p. 283).

A number of researchers have questioned the assumed relationship between broken homes and delinquency (Chilton & Markle, 1972; Grinnell & Chambers, 1979; Hennessy, Richards & Burk, 1978; Maskin & Brookins, 1974; Nye, 1959; West & Farrington, 1973; Wilgosh & Paltich, 1974). Hennessy et al. (1978) criticized earlier studies demonstrating a relationship between broken homes and delinquency, pointing out that they suffer from a number of methodological problems: (1) non-random assignment of subjects to the delinquent and control groups, i.e. "known delinquents are singled out and compared with the

non-incarcerated, non-apprehended general adolescent population so that a priori differences are maximized" (p. 508), e.g. Glueck & Glueck, 1950); (2) the attempt to get at multivariate effects with the use of univariate analyses, e.g. chi-square, t-tests; (3) the biased nature of the juvenile justice system (i.e. their tendency to sentence adolescents from lower class and broken homes to institutions rather than give them a warning, and the tendency for there to be more police contact with these groups leads to an over-representation of children from broken homes in officially delinquent populations. Hennessy et al. (1978), studying self-reported delinquency in middle class high school students, and using regression analysis to isolate the effects of broken homes, found no evidence of a relationship between broken homes and delinquency. Consistent with Hennessy et. al. (1978), Grinnell & Chambers (1979) also found no relationship between broken homes and middle-class delinquency, as measured by official court records. Wilgosh & Paitich (1974), reporting data collected from delinquents and their parents at the Toronto Juvenile and Family Court Clinic, concluded that there was "...no evidence that more delinquents came from broken homes" (p. 74). This conclusion, based on the finding that 49.5% of the delinquents' homes had only one natural parent present, while 50.5% of the homes had both parents present, would seem to be in error. According to data presented by Peterson & Becker (1965, Table 3-1) 49.5% of delinquents from broken homes indicates a strong association between broken homes and delinquency. The percentage of delinquents from broken homes in 11 studies ranges from 27.7 to 73.2, with a mean of 48.0, while the range of broken homes for the controls in these studies was 7.0 to 44.8, with a mean

of 26.0. Wilgosh & Paitich (1974) results, therefore, seem consistent with those of previous studies showing almost twice as many broken homes in delinquent populations (about 48%) as in the general population (about 26%). There is a need to incorporate comparable control groups in these kinds of studies to avoid such confusion.

Recent evidence suggests that economic factors are more important than "broken homes" as a precursor of delinquency (Chilton & Markle, 1972; West & Farrington, 1973). Chilton & Markle (1972), comparing 5,376 delinquents from the juvenile and county courts of Florida with children in the U.S. population in general, found that although proportionately more delinquents live in broken families the proportion decreases with increased family income (over \$5,000). They suggested that "for children from families with very low income it would appear that the family's economic situation and not its composition (e.g. husband and wife, mother only, father only, neither parent) is a more important factor in understanding the child's apprehension for delinquency" (p. 99). Similarly, West & Farrington (1973), in their Cambridge study of delinquent boys, found a strong association between marital separations and future delinquency, but the relationship disappeared when delinquents and non-delinquents were matched for income. They concluded that broken homes "...is an important precursor of delinquency only insofar as it reflects the presence of other more basic family background factors" (p. 72).

Perhaps the underlying factor in the relationship between broken homes and delinquency is the quality of family relationships (Maskin & Brookins, 1974; Nye, 1958). Nye (1958) found that delinquency was

less in broken homes than in unbroken homes with poor marital adjustment. He suggested that happiness of the marriage is more important than whether or not the marriage is the original one, a re-marriage, or one parent only. Maskin & Brookins (1974), studying 126 female delinquents placed by a California juvenile court into a girls' treatment unit, found that recidivism was highest in the natural parent group as compared with foster parents and single parents. They concluded that "...the broken home as generally defined is ineffective and misleading as an indicator of family disorganization that contributes to delinquency" (p. 342). They suggested that it is the quality of the family relationship that is important, not whether or not the family is intact. Consistent with this view, McCord (1979), in a 30-year follow-up study of the original McCord, et al. (1959) data, found that father's absence during childhood did not discriminate significantly between criminals and non-criminals in adulthood, whereas parental characteristic variables (e.g., mother's self-confidence, father's deviance) and child-rearing variables (e.g. mother's affection, parental supervision) did.

In conclusion, the bulk of the evidence suggests that there is an association between broken homes and high delinquency for lower-class families but not for middle-class families, and it is likely not a causal one. Recent evidence shows that the relationship disappears when income is controlled, suggesting that income is more of a basic factor in the etiology of delinquency. Other researchers suggest that it is the family disruption created by the separation that is the causal agent, rather than broken homes per se. Positive family

relationships reduce the effects of broken homes. Homes broken by divorce or separation are most damaging, while those broken by death are least detrimental. There appears to be no difference due to age of separation, although the evidence is controversial. There also appears to be no difference in the effects of family disruption on sex when the type of offence is controlled; girls are more strongly affected than boys only for moral offences, where premarital sexual activity is an offence for females and not for males. Both mother and father absence is detrimental, with mother absence being slightly more detrimental. Broken homes tend to be associated with the more serious crimes. The tendency for the juvenile justice system to treat adolescents from lower class and broken homes differently from others biases the results of studies in favour of these groups being over-represented in officially delinquent populations.

F Family Income

Most studies report a significant negative relationship between family income (or indices thereof) and delinquency (e.g. Bordoia, 1959; Chilton, 1964; Shaw & McKay, 1942; West & Farrington, 1973). Shaw & McKay (1942), for example, found that the highest delinquency rates in Chicago were in neighbourhoods of rapid population change, poor housing, poverty, tuberculosis, adult crime, and mental disorders. Chilton (1964) reports significant correlations between a number of income-related variables and delinquency on data from three U.S. major cities, Baltimore, Detroit, Indianapolis (in Gibbons, 1976). Education, rent, and owner-occupied dwellings, were all significantly

negatively correlated with delinquency in the three cities, while overcrowding and substandard housing were significantly positively correlated with delinquency in each city. Other studies (e.g. Polk, 1967; Quinney, 1964; Willie, 1967) found that low income and low family stability were related to high delinquency. The major controversy revolves around "causal significance." Are some factors more fundamentally related to delinquency, while others are associated only through their relationship to the more fundamental, causal ones?

Other early American studies provided partial support for a relationship between economic variables and delinquency (summarized in Gibbons, 1976). Shaw & McKay (1942) from their studies of delinquency concluded that high delinquency rates tend to occur in neighbourhoods near the industrial areas and deteriorated community areas around the city centre. Both of these areas tend to be occupied by lower income families. Lander (1954) found that low education, low rent, low owner-occupied dwellings, high percentage of non-white population, high overcrowding and high substandard housing were significantly related to delinquency. Although all of the variables were significantly correlated with delinquency, Lander (1954), on the basis of factor analysis, concluded that only two of the variables were independent correlates of delinquency rate, (1) percentage of non-whites and (2) the percent of owner-occupied homes. Lander (1954) also concluded that delinquency was due to anomie, or social instability, and that economic factors were of less importance. Confirmation for Lander's (1954) results was provided by Bordoia (1959) in a study of delinquency in Detroit. He also found that home

ownership was most strongly related to delinquency, and that economic variables were unrelated to delinquency when the effect of other variables was partialled out. Similarly, Polk (1958), investigating delinquency in San Diego, found that although there was a significant negative relationship between economic status and delinquency, when other variables were partialled out the relationship disappeared.

Contrary evidence to the above findings is provided by a number of other studies (Chilton, 1964; Gordon, 1967; Rosen & Turner, 1967). Chilton (1964), studying delinquency in Indianapolis, concluded that (1) delinquency was most closely associated with transiency, poor housing and some economic variables, and (2) there was no evidence that anomie was more closely related to delinquency than economic characteristics as suggested by Lander (1954). Chilton (1964) used a number of correlational procedures along with factor analysis. Gordon (1967) suggested that partial correlation and other statistical procedures were inappropriately applied in a number of instances. He criticized the studies of Lander (1954), Bordua (1959), and Polk (1958) and concluded that the correct interpretation of their data would indicate a strong relationship between delinquency and socio-economic status. Rosen & Turner (1967) also criticized Lander's (1954) interpretation of the factor analysis results. They suggested that the anomie factor could just as well have been interpreted as an economic factor, and they disagreed with Lander's (1954) conclusion that economic factors are not fundamentally associated with delinquency. Further, Rosen & Turner (1967), studying delinquency in Philadelphia, found that income was the best predictor of delinquency

in white areas, whereas the percent of non-white population was the best predictor of delinquency overall.

Other evidence suggests that family stability moderates the negative effects of low income on delinquency (Polk, 1967; Quinney, 1964; Willie, 1967). Polk (1967), studying court referrals in Portland, Oregon, found that delinquency rates were generally highest for the lower income areas and lowest in the better income areas. As well, although there was some inconsistency, delinquency rates were highest in income areas where family stability was lowest. Quinney (1964) also found that delinquency rates were highest in the low income-low family stability areas, and lowest in the high income-high family stability areas in a Kentucky sample. Family stability appears to moderate the effect of economic variables on delinquency, the more stable the family, the less likely delinquency will occur. Willie (1967), studying 6,269 youths referred to the juvenile court in Washington, D.C., found high correlations between delinquency and economic status (-.65) and delinquency and family instability (-.64). He also found differences as a function of race. In the non-white areas, delinquency rates were higher in the low income areas (with both low and high family instability) than in the higher income areas. On the other hand, for whites the highest delinquency rate was in the low family instability-low income area, but the next highest rate was in the high income-low family instability. Thus, family instability had a greater influence on delinquency rate in the white than non-white areas. Willie (1967) suggested that poverty among the non-whites is so overwhelming that it masks the usual effect of family instability.

Major studies of delinquency in the United States have supported the view that low income, low socio-economic status is associated with high delinquency (Baron & Feeney, 1976; Glueck & Glueck, 1950; Haarman et al., 1976; Ku & Blew, 1977; McCord et al., 1959; Ryan, 1974; Wolf et al., 1976; Wolfgang et al., 1972). Glueck & Glueck (1950) found that families of delinquents compared with non-delinquents were more dependent for financial assistance on relief agencies or relatives; more than twice as many families of delinquents as non-delinquents were dependent on others for support. McCord et al. (1959) found that uncohesive families in poor neighbourhoods (involving slums, material poverty, the existence of gangs, and a lack of community organization) were associated with the highest crime rate. Wolfgang et al. (1972) found that lower socio-economic status boys were more likely to be delinquents, recidivists and chronic offenders than higher socio-economic status boys; that lower socio-economic status (SES) boys are likely to commit more serious crimes than higher SES boys; that lower SES boys begin their delinquency career at a slightly earlier age (11.7 years) than higher SES boys (12.6 years). They concluded that prevention programmes directed at lower SES non-white, first offenders and lower SES chronic offenders would reduce, not only the amount but also the seriousness, of the offenses.

Baron & Feeney (1976), in their Sacramento Diversion Program, found that the largest proportion of their referrals came from the lower end of the socio-economic scale. Haarman, et al. (1976), in their Louisville Youth Diversion Program, found that the average income of the families of their referrals was lower than the average family income of the families of their referrals was lower than the

average family income for the population in general in that area, and that about 40% of the families were receiving public assistance. Ku and Blew (1977), in their adolescent diversion program in Urbana-Champaign, Illinois, found that all of their referrals were from lower to lower-middle class families. Ryan (1974), reporting on an educationally oriented re-socialization program for delinquent males, found that most of their referrals came from economically marginal families, e.g., income low, unemployment high and size of families, large. Wolfe, et al. (1976), reporting on a residential treatment program in Lawrence, Kansas, for delinquent boys and girls, found that 60% of the referrals came from families with below average annual incomes, with 53% of the families on welfare.

English studies also generally support the view of a significant association between low socio-economic status and high delinquency (Douglas, Ross, Hammond & Mulligan, 1966; MacDonald, 1969; West & Farrington, 1973), although there was not complete consistency (Palmai, Storey & Briscoe, 1967). Palmai et al. (1967) found no significant relationship between social class and delinquency in a randomly selected sample of adolescents appearing before London juvenile courts. The measure of social class in this study was the Registrar's General Scale, which others (e.g. Douglas et al., 1966; West & Farrington, 1973) have found unsuitable. West & Farrington (1973) did not find social class differences when the Registrar General's Scale was used as a measure of social class, whereas they did find differences when they used income as their index. MacDonald (1969) also found a significant relationship between social class (father's occupation) and incidence of juvenile court appearances in a

London sample of adolescents. Again, no differences were found in this study when the Registrar General's Scale was used as a measure of social class.

West & Farrington (1973), in their Cambridge study of a working class population in England, found that boys from poor families, from unsatisfactory housing, from neglected accommodation and from the lowest socio-economic class were more prone to delinquency than those from more favourable circumstances. Not only was there a higher percentage of boys from poor homes as one-time delinquents (about one and a half times as many), but also there was a much higher proportion of boys from poor homes as recidivists (almost four times as many), compared with boys from good homes. Similarly, age of first conviction was related to income; 57.9% of those convicted at age 10 or 11 came from poor families, while only 30.8% of those first convicted at age 12 to 16 years came from poor families.

The relationship between low income and delinquency is far from clear, however, as it is usually associated with a constellation of unfavourable home conditions; low parental income has been found to be significantly related to poor parental supervision, poor child-rearing practices, separations, parental conflict and large families, all of which make delinquency more probable (West & Farrington, 1973). Still the relationship between low income and delinquency remains even after matching for parental behaviour or parental supervision, suggesting that economic deprivation has an effect independent of its association with inadequate child-rearing (West & Farrington, 1973). On the other hand, the relationship between low income and delinquency disappears

when intelligence is taken into account, suggesting that intelligence is of greater importance than income in understanding delinquency. More research is needed to clarify the relationship between family income and delinquency.

A major Swedish study (Jonsson, 1967) found a significantly greater number of paternal grandfathers and maternal grandfathers of delinquents than grandfathers of non-delinquents in the lowest socio-economic group; twice as many grandfathers of delinquent boys as grandfathers of non-delinquent boys were in the lower socio-economic group. Poverty also was about twice as common among grandparents of delinquent boys than grandparents of non-delinquent boys.

The relationship between high delinquency rates and socio-economic disadvantage has been demonstrated in an Australian sample (Vinson & Homel, 1975). These authors, using principal components analysis along with classification analysis, found significant relationships between rate of delinquency and unemployment (.45), mental hospital admissions (.65), use of social agencies (.58), truancy (.48) and prematurity (.45). Using factor scores from the first principal component, seven suburbs of the city of Newcastle were identified as distinct problem areas. Although they represented only 5.5% of the population of the Newcastle urban area, they contained six times their quota of agencies' clients, two-and-a-half times their share of truancy and disease, twice their share of perinatal mortality, prematurity, divorce and school exemptions, three times their share of unemployment, two-and-a-half times their share of juvenile delinquency, three times their share of charged cases heard at courts of petty sessions, and six times their share of drug

offences. Vinson & Homel (1975) propose an intervention programme which involves "...conceptualizing the neighbourhood as 'client' and treating it as a social entity with its own functional requirements" (p. 29). A three-level approach is involved: "(1) community building through involvement of local residents; (2) insuring that health and welfare services are relevant and accessible to people in the identified areas; (3) the generation of ideas for improving social policy and administration" (p. 29).

Other researchers have found that delinquency is positively related to unemployment (Fleisher, 1965; Guttentag, 1965; Wallis & Maliphant, 1967). Wallis & Maliphant (1967), studying a group of 914 boys from London committed to institutions during the period 1960-1962, found that high delinquency was associated with overcrowding, low education, low social class and unemployment. Fleisher (1965), investigating the relationship between delinquency and unemployment, calculated that a 10% rise in income could reduce the delinquency rate by 15-25% in highly delinquent areas. Guttentag (1965), cautions that unemployment and poverty account for only part of the variance in delinquency statistics, noting that delinquency rates are higher in industrialized societies than in developing societies, and that at least some researchers have found an inverse relationship between unemployment and delinquency. She suggests that it is "anomie" associated with shifting populations and the resulting normlessness, both of which are positively related to unemployment and delinquency, that is the true cause.

Berg (1967) goes so far as to suggest that lower class delinquency may be an appropriate response to the inescapable plight of the poor. He advocates the adoption of economic policies that ensure full employment as a step in the right direction toward solving the delinquency problem. He acknowledges that elimination of poverty conditions is not likely to eliminate all delinquency, but suggests that there is a good chance that it would eliminate a large proportion of it and, of course, the extent to which delinquency results from non-economic factors will never be known until economic factors are controlled. Similarly, Wilson (1974), investigating delinquency and poverty, recommended that large scale fiscal policies be introduced to increase slum clearance and housing schemes, to improve local family facilities, to supplement family income and to improve the job market, particularly for the unskilled and the disabled. Other researchers also have advocated large scale financial infusion as a means of dealing with poverty-related delinquency (Glueck & Glueck, 1950; Chilton & Markle, 1972; West & Farrington, 1973, 1977).

There is some evidence to suggest that low socio-economic status is associated with more serious forms of delinquency (Johnstone, 1978; Wolfgang et al., 1972). Johnstone (1978) investigated the influence of four factors, (1) peer group influence, (2) family influence, (3) social class position, and (4) community poverty, on six classes of delinquency varying in degrees of seriousness, (1) violent acts (e.g. carrying a weapon, fighting in a gang), (2) criminal delinquency (e.g. burglary, larceny, robbery), (3) automobile offences (e.g. driving without a license, car theft), (4) property offences (e.g.

shoplifting, vandalism, petty theft), (5) use of illicit drugs (e.g. marijuana, psychedelics, barbituates, amphetamines), (6) status violations (e.g. truancy, irritating the teacher sufficiently to be thrown out of class) in a sample of Chicago youth. He found that family integration was most highly related to less serious crimes, e.g. drug use, status violations, and least related to the more serious crimes, e.g. violent acts and criminal delinquency. On the other hand, poverty was most highly related to the two most serious offences, e.g. violent acts and criminal delinquency; both violent acts and criminal delinquency were positively related to community poverty, and negatively related to socio-economic status of the family. As Johnstone (1978) suggests, it appears that intervention with families would be a more effective strategy for status offenders and drug violators, while massive community intervention would be more effective for serious criminal behaviour and gang delinquency. Wolfgang et al. (1972) also found an association between socio-economic status and seriousness of delinquency. These authors computed a seriousness score for each offense. They found that non-whites and lower socio-economic boys had higher mean seriousness scores for personal injury offenses, while whites and higher socio-economic boys had higher mean seriousness scores for damage and theft offenses. They suggested that "...social action, if concentrated on the lower SES chronic offenders, would not only reduce the amount but also the seriousness of the offences committed" (p. 105).

Four studies did not find a relationship between social class and delinquency (Nye, 1958; Rahav, 1976; Robins, West & Herjanic, 1975;

Mccord, 1979). Nye (1958) found no relationship between socio-economic status and delinquency. Rahav (1976), investigating family relations and delinquency in Israel, found no relationship between delinquency and four levels of socio-economic status in 14-16 year old boys arrested in Tel Aviv during 1960. He suggested that the conflicts and stresses in Israel at that time may have influenced the results. Robins et al. (1975) interviewed and collected delinquency records of fathers of children in black urban families in St. Louis. They found that parental arrest histories were the most powerful predictors of their children's delinquency, and that social class, as reflected in the father's job, accounted for little additional variance when parental deviance was taken into account. This, of course, does not show that socio-economic status is not related to delinquency, rather, it shows that socio-economic status is not related to delinquency when parental deviance is controlled. Consistent with this view, a more recent study, a report of 30-year follow-up data on the original McCord et al. (1959) data showed that, although father's deviance (e.g. an alcoholic, conviction for drunkenness, or a serious crime such as theft, burglary, assault, rape, attempted murder, or murder) did significantly predict adult criminality, social status (e.g., father's occupation, neighborhood) did not.

There is a problem with any study of the relationship between lower class variables (e.g. socio-economic status, broken homes, large families, parental deviance) and delinquency, and that is a referral bias (Johnstone, 1978; Shanok & Lewis, 1977). This, of course, applies only to those studies using some form of official record as

their measure of delinquency, and not to those studies using self-report measures. Shanok & Lewis (1977) compared the psychiatric symptoms, socio-economic status, family structure, family size and occurrence of treated parental mental illness in 136 children referred to a juvenile court and 82 children referred to a child guidance clinic in New-Haven, Connecticut. They found that, although the prevalent sub-psychiatric and organic symptoms and treated parental psychopathology in both groups of children did not differ, a significantly higher percentage of those children referred to the juvenile court clinic were from the lower classes than those children referred to the child guidance clinic. There was also a greater number of motherless children in the juvenile court clinic population. These findings confirm earlier results in which adopted children were found to be referred to court clinics and training schools more often than neglected children with natural parents, even though the latter group had committed more frequent and more serious delinquent acts (Lewis, Bella, Lewis et al., 1975). A similar bias in the selection of delinquents from unstable family backgrounds is suggested by Johnstone (1978). This has the effect of over-representing low socio-economic status, family disintegration, broken home families in the court records, and therefore inflating the relationship of these variables to delinquency.

In conclusion, most studies find a significant negative relationship between social class (e.g. socio-economic status, income, employment, education) and delinquency. Low socio-economic status boys are more likely to be recidivists, chronic offenders, young delinquents, one-time delinquents, and are more likely to commit more

serious crimes than higher SES boys. Low income and delinquency tend to run in the family; grandparents of delinquents tend to come from the lower socio-economic group. The relationship between low income and delinquency appears to be indirect; it disappears when such factors as intelligence, family stability and parental criminality are controlled. Family stability appears to moderate the effects of economic variables on delinquency; the more stable the family, the less likely delinquency will occur in both low income and high income groups. A major problem in the study of lower class variables and delinquency is the referral bias, i.e. the greater tendency for children from low income families to be referred to the juvenile justice system, rather than to a guidance clinic or other appropriate social agencies. This has the effect of over-representing low income families in the court records and inflating the relationships of these variables to delinquency. One author suggests that lower class delinquency may be an appropriate response to the plight of the poor. Most authors recommend massive infusions of money into low income areas, along with mobilization of community resources to eliminate slums, to improve family facilities, to supplement family income and to improve the job possibilities, as a means of reducing delinquency. Although alleviating poverty conditions, providing rehousing, full employment, etc. are desirable goals in themselves, it seems unlikely that this alone will solve the problem. Low income in delinquent families is usually associated with a constellation of unfavorable home conditions, e.g. poor parental supervision, poor child rearing practices, separations, parental conflict, parental deviance, large families, all of which, themselves, are associated with delinquency

proneness. Remedial efforts directed toward improving parental characteristics (e.g. aggressiveness, mother's self-confidence, father's deviance) and child rearing practices (e.g. mother's affection, child supervision, parental conflict), along with financial assistance should have a much better chance of success.

G Criminality in the Family

A number of early studies have shown that a boy is more likely to become a delinquent if other members of his family have criminal records (Ferguson, 1952; Glueck & Glueck, 1950; Jonsson, 1967; McCord et al., 1959). In his Glasgow survey, Ferguson (1952) found that boys with criminal fathers were twice as likely to become delinquents as other boys, and boys with delinquent older brothers were more than three times as likely to become delinquents themselves. Ferguson (1952) showed that criminality in the family was a significant predictor of delinquency independently of other factors, such as over-crowding or boys scholastic attainment. Jonsson (1967) also found that delinquent boys in Sweden were more likely to have criminal parents than non-delinquent boys. In their American study, Glueck & Glueck (1950) found that two-thirds of the fathers of delinquents had a history of criminality, compared with one-third of the fathers of the non-delinquent control group. McCord et al. (1959) also found that boys with criminal fathers were more likely to become delinquents, although the relationship was considerably diminished if fathers used consistent disciplinary strategies.

More recent studies also support the view that children with delinquent siblings or parents are more likely to become delinquent

themselves (Knight & West, 1975; McCord, 1979; Robins et al., 1975; West & Farrington, 1973; Wilson, 1975). Wilson (1975), investigating socially handicapped delinquents in Britain, found juvenile delinquency correlated significantly with parental criminality. Knight & West (1975) found that the "continuing" delinquent group had a greater number of boys who had a family member (parent or sibling) with a criminal record acquired before the boy was 10 years old than the "temporary" delinquent group. Robins et al. (1975) studied arrests and delinquency in black urban families and their children in the U.S.. They found that parental arrest histories were powerful predictors of their children's delinquency, more powerful than the child's early delinquency, more powerful than social class, and equally potent for boys and girls. Although it was not a statistically significant predictor because of the small numbers, delinquent offspring of both sexes tended to have delinquent mothers. The best single predictor for both sexes was arrests of the father. The two best predictors for boys were arrests of father and mother, and for girls, arrests of father and mother's delinquency. In addition, paternal grandparents' antisocial behaviour was significantly associated with delinquency in the grandchildren, although this relationship was less powerful than the relationship between parents' behaviour and children's delinquency. When the two best parental predictors were partialled out (parents' arrests for boys, and father's arrest history plus mother's delinquency for girls), the relationship of the grandparents' behaviour to grandchildren's delinquency disappeared. From this, Robins et al. (1975) concluded that the primary influence of the grandparents'

deviance was to produce antisocial parents, who in turn produced antisocial children. They also speculated that since delinquency of both parents was associated with delinquency in children of both sexes the mechanism of influence does not appear to be identification with the same sex parent. They acknowledged, however, that in view of the low number of arrested mothers the effect of mother's delinquency on children's behaviour was not given a fair test. They also speculated that since the father's adult arrests was a more important predictor than his own delinquency, the mechanism must be environmental rather than genetic. Confirmation of these notions will have to await further research.

West & Farrington (1973) in their study of a working class population in Britain found that 10-year-old boys who had had at least one convicted parent were more than twice as likely to become delinquents as those who did not have convicted parents. Whether it was a convicted father or a convicted mother made little difference; both were equally bad. Often both parents were criminals, as there was a strong tendency for criminal mothers to be married to criminal fathers. In this study parental criminality, family size and low income were also highly interrelated; boys from poor families had twice as high an incidence of criminal parents as boys from more affluent families; similarly, boys from large sized families had more than twice the incidence of criminal parents. Still, when delinquents and non-delinquents were matched on income level, delinquents had significantly more criminal parents. The same was true for family size. They concluded, therefore, that parental criminality

contributes to offspring delinquency independently of social level of the family. They did find, however, some evidence of an interaction between income and parental criminality; parental criminality was less closely associated with delinquency in the more affluent income group, suggesting that affluence may provide some protection against the influence of parental criminality.

Boys' delinquency in the West & Farrington (1973) study was also closely related to delinquency among their siblings. There was almost three times as many delinquents among the group that contained a known delinquent sibling compared with the remaining no delinquent sibling group. Also, boys with delinquent older brothers were much more likely to have criminal parents, and if the boy already had a criminal parent the presence of a delinquent older brother made little difference to his probability of becoming a delinquent. Overall, the probability of a boy becoming a delinquent increased more than two-and-a-half times if he had an older member of the family convicted of a criminal offence (i.e. father, mother, older brother or older sister). West & Farrington (1973) identified parental criminality as one of five independent factors significantly related to delinquency. The others were low family income, large family size, low intelligence and poor parental behaviour. McCord (1979), in her 30-year follow-up study of the original McCord, et al. (1959) data, also found that father deviance (e.g., an alcoholic, conviction for drunkenness, serious crimes such as theft, burglary, assault, rape, attempted murder, or murder) during childhood significantly predicted adult criminality, although low income (social status) did not.

Further evidence supporting the relationship between parental deviance and offspring antisocial behaviour comes from a study of unsocialized aggressive boys (Stewart & Leone, 1978). Stewart & Leone (1978) investigated the psychiatric histories of relatives of boys admitted to an inpatient unit with unsocialized aggressive behaviour problems. They found that fathers of these boys qualified for diagnosis of antisocial personality disorder more often than fathers of control boys; that uncles of the experimental boys more often had a history of antisocial behaviour than relatives of controls; and that siblings of the experimental boys more often had a history of behaviour problems as children or adolescents than siblings of controls. They concluded that there is an association between unsocialized aggressive reaction in boys and antisocial personality disorders in their adult relatives, and suggested that behavioural remedial programmes aimed at the child's problems are unlikely to be successful unless the parents are also given assistance.

In conclusion, criminality in the family, whether it be parents or siblings, is a powerful predictor of children's delinquency, more powerful than the child's early delinquency, more powerful than social class, and equally potent for boys and girls. Although parental criminality contributes independently of social class, there is some evidence of an interaction with income; parental criminality was less closely associated with delinquency in the more affluent income group, suggesting that affluence may provide some protection against the influence of parental criminality. In instances of parental criminality, remedial programs focussing on the child's delinquency problems are unlikely to be successful unless the parents are also

given assistance. A word of caution, the presence of several delinquents in one family does not prove that association is the causal factor; it may be that the same environmental conditions that produced delinquency in one member also produce it in other members of the family (Jeffrey & Jeffrey, 1967).

H Family Size

Research indicates that delinquents tend to come from larger families than non-delinquents (Glueck & Glueck, 1950; Jeffrey & Jeffrey, 1967; Nye, 1958; Robins et al., 1975; Ryan, 1974; Shanok & Lewis, 1977; West & Farrington, 1973). Glueck & Glueck (1950) found that delinquent boys came from larger families than non-delinquent boys; 66.1% of delinquent boys came from one of five, or more living children, as compared with 51.6% of boys from non-delinquent families. The average number of children in delinquent families was 6.8, while the average number of children in non-delinquent families was 5.9. Nye (1958), investigating self-reported delinquency in high school adolescents in Washington, found less delinquent behaviour for boys in smaller families than larger ones. No relationship emerged for girls. Ryan (1974), investigating an educational oriented resocialization program for adjudicated delinquent males, found that family size was very large, e.g. 2/3's of the families had five or more children, and 1/4 of the families had 10 or more children. Jeffrey & Jeffrey (1967) review a number of studies that show that the number of children per delinquent family is significantly higher than that for non-delinquent controls; estimates of the average number of children for delinquent and non-delinquent families vary from 5.7 to 6.8 and 2.9 to 5.9 for

delinquent and non-delinquent families, respectively. Robins et al. (1975), investigating delinquency in two generations of black urban families in St. Louis, found that family size was significantly related to delinquency, even when parental criminality was controlled. For both boys and girls, children with fewer siblings were less likely to be delinquent, even when they had two arrested parents. Boys of two arrested parents who had three or more siblings were delinquent 100% of the time, girls 50% of the time; boys with one or two siblings and two delinquent parents were delinquent 50% of the time, girls 22% of the time. Moreover, the usual relationships between delinquency and socio-economic status, broken family, and education disappeared when parental criminality was controlled. Such was not the case with family size; the effect of family size remained when parental criminality was controlled. This suggests that family size is a very powerful predictor of delinquency, which itself is a very powerful predictor of delinquency.

West & Farrington (1973), in their Cambridge study of a working class population in England, also found that delinquents tended to come from large families. A greater percentage of recidivists, one-time delinquents and police contact boys came from large families (i.e. boys with four or more siblings) than from small families (i.e. boys with less than four siblings). Moreover, like family income, large family size was particularly evident among boys first convicted at an early age; 58% of the boys first convicted at age 10-12 years were from large families, compared with only 32% first convicted at age 13-14 years, and 32% first convicted at age 15-16 years. Large family size was significantly correlated with low family income, as

well as with other indices of low social level, i.e. poor housing, interior of the house neglected, boy physically neglected, erratic paternal work record. Still, when delinquent and non-delinquent boys were matched on income level, the relationship between large family size and delinquency remained, again indicating that family size is an important predictor of delinquency. West & Farrington (1973) identified family size as the second of five important background predictors of delinquency.

Shanok & Lewis (1977) also found that the relationship between family size and delinquency remains when socio-economic status is controlled. Shanok & Lewis (1977), investigating referrals to juvenile court clinic and child guidance clinic in New-Haven, found that children in the lowest socio-economic classes 6 and 7 (Warner's 7-point scale of occupation) at the juvenile court clinic had significantly more siblings than children in the socio-economic classes 6 and 7 at the child guidance clinic.

A number of explanations have been offered to account for the positive relationship between family size and delinquency (Ferguson, 1952; Glueck & Glueck, 1950; Nye, 1958; West & Farrington, 1973). Nye (1958) suggests that emotional involvement and interaction is less intense in larger families, leading to less close parent-child affectional ties, and less effective control over the child. West & Farrington (1973) found that large family size was significantly associated with poor (i.e. lax and careless) parental supervision; over-burdened mothers simply cannot give sufficient attention to each child. Glueck & Glueck (1950) also suggest that greater family size leads to less parental attention, "...more likelihood of emotional

strain, tension, friction, and loss of privacy, with resulting sexual and other emotional trauma" (p. 120). They suggest, as have others (Ferguson, 1952; West & Farrington, 1973), that overcrowding is a key factor. Ferguson (1952) found that boys from large families were more delinquent-prone if they were also from the most overcrowded homes. He found no relationship between family size and delinquency in the least overcrowded homes. West & Farrington (1973), confirming these results, found that family size was significantly related to delinquency for the boys in the overcrowded homes, but not in the least crowded homes. They also found that the influence of family size (although still significant) was considerably reduced after matching for income, suggesting that overcrowding is a key factor (assuming that increased income is associated with decreased overcrowding).

Another possible explanation of the relationship between family size and delinquency is provided by West & Farrington (1973). They suggest that the presence of brothers may lead to delinquency "...by infectious example" (p. 32). They found, however, that the number of sisters of each boy was only slightly less correlated with delinquency ($r=.22$) than the number of brothers ($r=.23$), while the number of younger brothers was just as closely correlated as the number of older brothers ($r=.18$ in both cases), suggesting that increased numbers of sisters as well as brothers is associated with greater delinquency and therefore "infectious" brothers cannot account for family-size - delinquency relationship. They concluded that it was "...the actual size of the sibship rather than its composition by age or sex which

was associated with future delinquency" (p. 32).

West & Farrington (1973) suggest that family size may mediate the relationship between birth order and delinquency. They suggest that this relationship is "...merely a secondary consequence of family size, because middle born children tended to come from larger families with higher delinquency potential" (p. 33). A number of researchers (e.g. Glueck & Glueck, 1950; Hirschi, 1969; McCord et al., 1959; Nye, 1958) have reported a greater propensity for middle children to commit crimes. West & Farrington (1973) also found that oldest and youngest children in families were less likely to become delinquents than intermediate children for very large or very small families, but found no evidence of a relationship between birth order and delinquency for moderately sized families (e.g. 3 or 4 children). Indeed, the reverse appeared to be the case for these families; 21% of oldest boys and 48% of youngest boys became delinquents, while only 16% of middle-born boys became delinquents. As West & Farrington (1973) point out, data on very large families and very small families are misleading because there are no middle born children in families of 1 or 2 children, and there are too many, proportionately, middle-born children in large sized families. Both of these factors bias the results.

In conclusion, there can be little doubt that family size is related to delinquency. The relationship has been found to remain when income, socio-economic status, parental criminality and family composition (e.g. age, sex) have been controlled. Learning delinquency through "infectious example" does not appear to be the mechanism through which large families are associated with

delinquency. More likely, it has to do with conditions of overcrowding, in which competition for parental attention, increased emotional strain and inadequate parental supervision prevail. Large family size appears to mediate the relationship between birth order and delinquency.

I Working Mothers

Since parents are the primary socializing agents, it might be expected that their absence, even such temporary absences as mother working (as well as the father), might be related to failures in socialization (such as delinquency). Peterson & Becker (1965), in their review of the literature of delinquency, note that some early studies found slight positive relationships between working mothers and delinquency (Nye, 1958), no relationship between working mothers and delinquency (Glueck & Glueck, 1950; Andry, 1960), a significant positive relationship between fathers on shift work and delinquency (Andry, 1960), and then concluded that "working mothers" is only slightly related to delinquency. "Occupation outside the home would thus seem to bear some relationship to delinquency, but the association is slight, and it is complicated by a number of other factors" (p. 71). They suggested that mother absence is not very deleterious when the basic relationships in the family are favourable.

Further evidence supporting the undesirable effects of working mothers is provided by McCord, McCord & Thurber (1963). McCord et al. (1963) found that delinquency for sons was greater for mothers employed outside the home than for mothers not employed outside the

home, even when "broken homes" was controlled, in their middle class sample of families.

One of the complicating factors suggested by Peterson & Becker (1965) is supervision of the children during the mother's work hours, proper supervision minimizes any adverse effects. Jeffery & Jeffery (1967) agree that whether or not the mother is employed outside the home is immaterial; the crucial factor is supervision of the child. If the working mother arranges for adequate care for the child in her absence, he is no more likely to become a delinquent than the adequately supervised child of the non-working mother. This is consistent with other research showing that the most effective protection against delinquency in poverty areas is strict supervision (Wilson, 1974), and that supervision is more important than mothers' employment in predicting "home-based delinquency" (Biron & LeBlanc, 1977).

Not only may there not be adverse effects associated with working mothers, but there is some evidence to indicate that there may be beneficial effects (Gold & Andres, 1978; West & Farrington, 1973). In a recent study of adolescent children of employed and non-employed mothers in Canada, Gold & Andres (1978) found that both sons and daughters of employed mothers were better adjusted than those of non-employed mothers. They speculated that the results could be due to less restrictive child-rearing attitudes and greater paternal activity reported in "mother employed" families. West & Farrington (1973) found that a smaller percentage of delinquents came from families in which the mothers had a full-time job than in families

where the mothers did not work outside the home. They speculated that this was because employed mothers tended to increase the family income and to have fewer children, both of which are associated with low delinquency. In any event, they concluded that "... (smaller) family size and (higher) social class far outweigh any effect that could be attributed to working mothers" (p. 28).

In conclusion, evidence suggests that there is little direct relationship between maternal employment and offspring delinquency. Other variables such as family relationships, child supervision, father participation, size of family, and income tend to be confounding factors. In situations where the mother arranges for proper supervision of her child in her absence, where the father actively participates in the child-rearing process, where there is a positive family relationship, where family size is moderate and income is adequate, the probability of the child becoming delinquent, whether or not the mother works, is very low. Indeed, recent research suggests that maternal employment can be associated with better offspring adjustment than maternal non-employment.

J Family Recreation

Engagement in family recreation is believed to increase the affectional bond between parents and children, and thereby facilitate parental control over the child (Nye, 1958); it improves "...parent-child understanding of interests, problems, and points of view of each by the other; it...facilitates communication between parent and child." (p. 102). Family recreation (e.g., playing games, cards, swimming, skiing) provides the opportunity for interaction on a

positive, or at least neutral level from the child's point of view. This is important when we consider that "much of parent-child interaction consists of do's and don't's of family chores, regulations, school work and other responsibilities and restrictions." (p. 102). Positive family interaction during recreational activities tends to counteract to these negative forces.

There is some empirical support for a negative relationship between degree of home recreation and delinquency (Glueck & Glueck, 1950, 1968; Gold, 1963; Nye, 1958; West & Farrington, 1973). Glueck & Glueck (1950) found that there was a lesser degree of family recreational activities (e.g. picnicking, going to the beach together, riding in the country, visiting relatives) among delinquent families than among non-delinquent families. There was absolutely no family recreation undertaken in approximately two-thirds of the delinquent families, as compared with approximately one-third of the non-delinquent families. They suggested that this reflects less cohesiveness in the families of delinquents, and that this in turn "...increases the tendency to act with little regard for family desires or standards." (p. 114). With respect to another aspect of family recreation, that of entertaining children's friends at home, delinquents were also worse off. Only about one-fifth of the parents of delinquents were hospitable to their children's friends and encouraged them to come again, as compared with about two-fifths of parents of non-delinquents. Finally, in regards to provision of recreation in the home (e.g. games, books, toys), delinquent families again suffered. About one-half of the homes of delinquents had

inadequate recreational facilities, as compared to about one-third of non-delinquent families. In a follow-up study Glueck & Glueck (1968) found that almost twice as many (70%) families of non-delinquents shared family recreation activities as delinquent families (41%). Nye (1958) found that low delinquency in both boys and girls was associated with frequent recreation at home with both parents. They also found that frequency of attending ball games with the father was negatively associated with delinquent behaviour in both sexes. They speculated that "...frequent family recreation increases affectional identification with parents and therefore increases indirect control..." (p. 107).

In a more recent study of 12-13 year old boys, West & Farrington (1973) found that boys that spent their leisure time with other members of their family, or at home, were less likely to become delinquents. Moreover, this relationship was evident throughout all income levels. For boys, fathers are particularly important. Over twice as many (35.5%) boys with fathers who never joined in their leisure activities became delinquents, as compared with boys whose fathers did join in their leisure activities (17%). Although there was a minority of boys who had not had a holiday, as a group they were particularly prone to delinquency. Not having had a holiday was highly related to low income families, but the relationship between no holidays and delinquency was independent of family income. These results are consistent with those of a study by Gold (1963), in which it was found that delinquents and their parents engaged in very few activities together. As West & Farrington (1973) suggest, it appears that, relative to non-delinquents, delinquents "...receive relatively

little encouragement to spend time with their parents or to organize their leisure constructively" (p. 57). Instead, they "...tended to spend their time on the street, to be given no holidays away from home, and to have fathers who did not participate in their leisure pursuits." (p. 57).

In conclusion, family recreation is important, for fathers as well as mothers. It provides the opportunity for family members to interact on a positive basis, rather than the usual negative basis. Positive interaction is thought to increase affectional bonds between parents and children, and thereby facilitate parental control (and delinquency reduction). Empirical studies support the view that frequent family recreation is associated with less delinquency.

K Allowance

Although there has been a great deal written about the negative effects of low income and poverty on delinquency (e.g. West & Farrington, 1973; Wilson, 1974, 1975) little has been done in regards to the relationship between children's allowance and delinquency. Nye (1958) is an exception. He found that satisfaction with parental allocation of money was associated with low delinquency behaviour. He points out that as commercial recreational opportunities increase, there is a need for more and better management of money for satisfaction of adolescent needs. The problem is, what amount of money should adolescents be given? A small amount does not permit the same degree of need satisfaction (e.g. it doesn't permit the adolescent to own a car, for example), but it does permit greater external control by parents. The adolescent who is out driving

around in his car is not under the same degree of external control as is the one who is at home with his friends in the rumpus room. Although Nye (1958) found a significant positive relationship between adolescent need satisfaction and delinquency, the relationship was not simple. Overall, delinquent behaviour was more frequent when parents were less generous than average, but it was not correspondingly less frequent when generosity was greater than average; an optimal amount of generosity was associated with least delinquency. For boys the pattern was clear; large sums of money was related to frequent delinquent behaviour. Whether this was due to the amount of money given as allowance, or the amount earned outside the family, or both, the pattern was the same. There was no relationship in this regard for girls. Nye (1958) suggested that the influence of money is indirect in that it "...permits the use of cars to enable the adolescent to move beyond the view of family, peer group, and community." (p. 137). He found that a greater number of all delinquent acts, except defiance of parents' authority, was committed by those adolescents who had most money. He concluded that loss of parental control far outweighs the increased need satisfaction associated with adolescents' possession of increased amounts of money, the implication being that adolescents shouldn't be allowed to have too much money. He did raise the issue, but didn't offer a solution, that adolescents at some point need to learn how to manage money, and to do so need a reasonable amount of money. Presumably he would agree that parents need to provide their children with supervision and guidance in the management of their finances, and exercise special caution when the amount of money is larger than normal. West and

Farrington (1977) did find that 16-18 year old delinquents (in their follow-up study) tended to have higher incomes than non-delinquents by virtue of taking unskilled jobs with relatively high pay and little opportunity for advancement. Delinquents also tended to spend more than they earned, and were more likely to be in debt and to have no savings. This suggests that delinquency is not caused by economic deprivation, but rather by mis-management of financial resources.

In conclusion, although little emphasis has been directed toward the provision of allowance for adolescents, the limited amount of research in this area suggests that it is curvilinearly related to delinquency, with high delinquency being associated with either too little or too much money and low delinquency being associated with a moderate amount of money. The dilemma concerns adolescent need satisfaction and parental control over the adolescent. A large amount of money allows high need satisfaction but low parental control, and is associated with high delinquency. Similarly, a small amount of money is associated with low adolescent need satisfaction, high parental control, but still a high degree of delinquency. The optimal amount of money is associated with moderate need satisfaction and the lowest degree of delinquency. Children need to be taught how to manage their financial resources.

L Freedom and Responsibility

Again, Nye (1958) is the only author who has devoted appreciable time and space to the discussion of freedom and responsibility and delinquency, although others make reference to these concepts in their discussions of parental discipline and child-rearing practices (e.g.

Peterson & Becker, 1965; Hoffman & Saltzstein, 1967; West & Farington, 1973). Nye (1958) defines freedom as involving "...self-interpretation of society's rules with choices of alternative behaviour," and responsibility as "...decision-making allocated to the individual." (p. 93). He suggests that appropriate freedom is likely to be associated with good social and personal adjustment, and that freedom has "...prestige value in the adolescent world." (p. 93). The allocation of freedom and responsibility implies trust.

The problem is, how much freedom? As Nye (1958) notes, total freedom deprives the adolescent of supervision and control, and also "...a set of expectations from which to develop acceptable internal moral standards," while the absence of freedom deprives the adolescent of "...recreation and companionship with his peer group and an opportunity to gradually assume adult status." (p. 100). An optimal amount of freedom is desirable.

In his study Nye (1958) found that two aspects of freedom (concern over where boys go on dates, number of nights girls are allowed out) were significantly related to delinquency. For girls, the relationship between nights allowed away from home and delinquent behaviour was curvilinear; delinquent behaviour was high when total freedom was allowed, low when considerable freedom was allowed and high again when little freedom was allowed. He concluded that direct controls are effective only up to the point where they interfere with expected peer group behaviour. No such relationship was found for boys. More research into the relationship between the allocation of adolescent freedom and delinquency for boys is needed.

Amount of responsibility given the adolescent by parents, and parental respect for the judgement of the adolescent, were found to be negatively related to delinquent behaviour; the greater the responsibility and parental respect, the less the delinquency. One problem in the interpretation of these results is that it is probable that those adolescents who are least likely to become delinquents in the first place, are the ones that are given the most responsibility. If such responsibility were given to adolescents who are unwilling, or incapable of accepting it, results may be disastrous. In any event, the relationship suggests that child-rearing practices should be geared toward developing individual responsibility.

That responsibility and trust are important in the socialization process is suggested by a study of Chinese-American child-rearing practices and delinquency (Sollenberger, 1968). As an explanation for the low delinquency rate among Chinese-Americans, in spite of the extremely adverse environmental conditions, Sollenberger (1968) concluded that "through an abundance of nurturance and protection through early childhood, a reservoir of security and trust is built up, so that after the age of six, when the rigid demands for conformity are expected, they will be accepted with a minimum of hostility" (p. 287). This reservoir of trust acts as a protection against future delinquency.

In conclusion, an optimal amount of adolescent freedom and responsibility is associated with less delinquency. Too much freedom deprives the adolescent of supervision and control, and the opportunity to develop the appropriate internal moral standards; while

too little freedom deprives the adolescent of the opportunity for interaction with his peer group and gradual transition to adult status. The allocation of freedom and responsibility implies trust, which is also negatively related to delinquency. More research into the delinquent's concepts of responsibility and trust is needed.

M Summary and Conclusions

A number of topics related to delinquency are discussed, parental discipline, parental supervision, family cohesiveness, parental conflict, broken homes, family income, family criminality, family size, working mothers, family recreation, allowance, freedom and responsibility. Many of these are interrelated, making it extremely difficult to determine the causal chain relating them to delinquency. In spite of this, and the methodological difficulties in many of the studies a number of tentative conclusions seem clear:

1. Lax, restrictive, inconsistent or harsh physical, discipline is associated with high delinquency. Inconsistent discipline obscures the distinction between approved and disapproved behaviour; lax discipline provides inadequate guidance in this distinction; while extreme restrictiveness and physical punishment leads to frustration and bitterness. Severe physical punishment is associated with highly aggressive crimes against persons. Love-oriented discipline involving reasoning is associated with low delinquency. The use of power assertion, which is effective with pre-school children, must be replaced by reasoning in adolescence.

2. High parental supervision is associated with low delinquency, particularly under extremely adverse conditions (e.g. poverty, parental criminality).

3. High family cohesiveness (low parental rejection) is associated with low delinquency. Mutual parent-child acceptance is important in the prevention of delinquency. Parental rejection along with parental deviance is particularly damaging; boys with cruel, neglecting, alcoholic or criminal fathers are particularly prone to delinquency, as are boys with non-loving, punitive, alcoholic or sexually promiscuous mothers. Boys with cruel, brutal, rejecting mothers, however, are most likely to become delinquents. Rejecting families breed rejecting families; rejecting parents have themselves been rejected as children.

4. Parental conflict is positively associated with delinquency. Boys from families suffering from parental conflict are more than twice as likely to become delinquent as those from non-conflict families. Marital disharmony also runs in the family; fathers of delinquent boys also come from disharmonious homes.

5. Broken homes is associated with high delinquency, although high income moderates the relationship. Homes broken by divorce or separation are more damaging than those broken by death or illness. The adverse effects of broken homes appears to be independent of age of separation, and the effects are equally damaging for boys and girls for other than moral offences (girls are more strongly affected than

boys for moral offences, only because premarital sexual activity is an offence for girls, but not for boys). Both mother and father absence is detrimental, with mother absence being slightly more so. Broken homes tends to be associated with the more serious crimes. It appears to be the family disruption created by broken homes rather than broken homes per se that is the crucial factor. Positive family relationships reduce the adverse effects of broken homes.

6. Family criminality, whether it be parents or siblings is a powerful predictor of children's delinquency. The probability of a boy becoming delinquent increases more than two-and-a-half times if he has an older member of the family convicted of a criminal offence.

7. Large family size is related to high delinquency, and this relationship remains when income, socio-economic status, parental criminality and family composition (e.g. age, sex) have been controlled. Large family size tends to be associated with overcrowding, competition for parental attention, emotional strain and inadequate parental supervision, all of which are conducive to delinquency.

8. Although some studies show such a relationship, maternal employment is not necessarily related to high delinquency. In homes where the mother arranges for proper supervision of her child in her absence, where the father actively participates in the child-rearing process, where there is a positive family relationship; where family size is moderate and income is adequate, the probability of the child

becoming delinquent, whether or not the mother works, is very low. Indeed, a recent study shows that maternal employment can be associated with better offspring adjustment than maternal non-employment.

9. Allowance appears to be curvilinearly related to delinquency, with high delinquency being associated with either too little or too much money, and low delinquency being associated with a moderate amount of money. The dilemma concerns adolescent need satisfaction and parental control over the adolescent. A large amount of money allows high need satisfaction, but low parental control and is associated with high delinquency. On the other hand, a small amount of money is associated with low adolescent need satisfaction, high parental control, but still a high degree of delinquency. An optimal amount of money is associated with moderate need satisfaction and the lowest degree of delinquency. Research is needed to clarify the relationship between adolescents' allowance and delinquency.

10. Frequent family recreation is associated with low delinquency. Family recreation provides the opportunity for family members to interact on a more positive basis. Positive interaction increases affectional bonds between parents and children and thereby facilitates parental control.

11. Assignment of freedom and responsibility to adolescents is curvilinearly related to delinquency. Too much freedom deprives the adolescent of supervision and control, and the opportunity to develop

the appropriate internal moral standards. Too little freedom deprives the adolescent of the opportunity for interaction with his peer group and gradual transition to adult status. An optimal amount of freedom and responsibility is associated with less delinquency. More research investigating the delinquent's concepts of responsibility and trust is needed.

12. Social class is negatively related to delinquency. Low socio-economic status boys are more likely to be recidivists, chronic offenders, young delinquents, one-time delinquents, and to commit more serious crimes than higher socio-economic status boys. The relationship between low socio-economic status and delinquency appears to be indirect; it disappears when such factors as intelligence, family stability and parental criminality are controlled. Family stability appears to moderate the negative effects of economic variables on delinquency; the more stable the family, the less likely delinquency will occur in both low income and high income groups.

13. More research into all of these areas is needed. The bulk of the conclusions are based on correlational data, from which causal relationships cannot be determined. Results from correlational studies have identified potentially fruitful areas for further investigation. The next step is to design a series of well controlled manipulative studies to investigate more precisely the effects on delinquency prevention of family intervention programs which counter the adverse effects of such factors as harsh parental discipline, poor parental supervision, low family cohesiveness, parental conflict,

one-parent families, low income. Some such attempts have been made, and are the focus of discussion in the next section.

II

PROGRAMS INFLUENCING FAMILY VARIABLES IN THE CONTROL OF DELINQUENCY

Virtually all programs, except those that take place in an institution, attempting to control or prevent juvenile delinquency deal in some aspect with the family, usually in the form of family counselling, either alone or as an adjunct to other services such as educational upgrading and employment placement. Even with programs where youths are temporarily removed from the home and placed in a residence or an institution counselling and other forms of assistance are also provided to the family for the youth's eventual re-entry into the home. Such programs have been labelled diversion programs since they involve diverting delinquent or pre-delinquent youth away from the traditional juvenile court system to a community rehabilitative program. Diversion programs may be designed to provide educational and/or employment upgrading, employment placement, individual and family counselling, a combination of these, or simply diversion from the juvenile justice system which alone is seen as beneficial.

Four reviews of such programs are discussed, followed by a detailed presentation and discussion of nine diversion programs recently, or presently in operation, and one long-term follow-up (30 years) study. The long-term follow-up study is discussed apart from the others because it is separated from them by a great deal of time (about 30 years) during which approaches have changed considerably, and because of the special issues it raises regarding (1) the need for long-term follow-up data to properly evaluate community intervention

programs, and (2) the possibility that long-term (e.g. 5 years) family intervention programs may have negative consequences.

I Past Reviews

Four studies are reported which review past diversion projects, two of them deal with juveniles (Bohnstedt, 1978; Gibbons & Blake, 1976), and two of them deal with primarily adults (Fishman, 1977; Rovner-Piecznik, 1974), and are therefore less applicable to the present review, other than providing insight into the methodological problems of diversion studies and emphasizing the urgency of developing viable preventative and rehabilitative programs for delinquents and pre-delinquents. In general, reviews have been negative, although most recommend continuing with and improving diversion programs.

A Bohnstedt (1978) Review

Bohnstedt (1978) reviewed eleven California diversion projects involving 3,871 youths. These projects utilized varying degrees of individual counseling, family counseling and educational tutoring. He concluded that: (1) there was no net savings in operating these diversion programs relative to the traditional court system; (2) that recidivism was not reduced, e.g. most of the diversion project clients were rearrested within six months at about the same rate as matched controls; and (3) there was a "widening of the net" of the juvenile justice system, e.g. only half of the clients participating in the diversion projects could be construed as diverted since they would not have been processed further anyway.

Three of the eleven projects reviewed by Bohnstedt (1978), however, did reduce recidivism rates; a finding which offers at least, a glimmer of hope. These were the (1) Compton, (2) Oxnard and (3) Stockton projects, which focused on family-crisis counseling provided by community services in one case, trained counselors from the community in another, and trained probation officers in the third.

Although the client recidivism rates for these three projects were lower than the comparison group recidivism rates, they were higher than the average client recidivism rate for the other eight projects, which did not reduce recidivism. This apparent paradox may be explained by the fact that the Compton, Oxnard, & Stockton projects were dealing with higher risk clients (e.g. individuals more likely to recidivate) than the clients of the other eight projects, and as such had more problems which could be (and evidently were) resolved by the diversion projects, (Bohnstedt, 1978). As Bohnstedt (1978) suggests, it appears to be more difficult to show significant reductions in recidivism rates for low risk clients.

The Compton project acted as a brokerage firm providing services. Clients were referred to community agencies, who were paid for their services. The two major services provided were counseling and educational upgrading, e.g. tutoring and an alternate school. Clients were referred to the project by law enforcement agencies; their needs were assessed and they were referred to the appropriate community agency for the service. Clients received an average of 5.6 months service. The majority of clients were black, male, status offenders with an average of two prior arrests. There were only 19 youths in the

experimental group and 19 in the comparison control group, a rather small sample size.

Although significant reduction in recidivism rates for the clients relative to the comparison controls were found while the clients were enrolled in the program (approximately 6 months) no significant difference in recidivism was found between the two groups at 12 months; thus, when the youths were no longer engaged in the activities of the program they reverted to their original delinquent behavior. In the final analysis, therefore, the Compton project can be considered only marginally successful.

The Oxnard project served a Mexican American neighborhood providing clients with individual contact and counseling. Most of the counselors were trained community persons familiar with the problems facing the clients. Individual counseling was provided two hours a week for eight months, and some informal family counseling was added in some cases. In addition to individual and family counseling a good deal of time was spent providing recreational opportunities for the youth. The youths were mostly Mexican American, male, criminal offenders with an average of three prior arrests. There were 40 youths in the experimental group and 40 in the comparison control.

Twelve-month comparisons showed significant differences in recidivism rates between the experimental and control groups. Moreover, 17 of the clients and 19 of the comparison controls were followed for 18 months, and again the clients were rearrested significantly less often than the controls. Thus, in contrast to the Compton project, the beneficial effects of the program lasted beyond program participation (at least 10 months).

The Stockton project, quite different from the Compton and Oxnard projects, was operated by highly trained probation officers, who provided family counseling. Each probation officer had over 600 hours of training in the theory and practice of family therapy. Families received five or six counseling sessions, about one per week. The youths were mostly white, male, status offenders with two prior police contacts. There were 90 experimental youth, participating in the program, and 51 comparison controls.

Recidivism data showed that, at 12 months, the experimental youths were arrested significantly less often than the comparison controls. Moreover, these results were replicated with 122 new clients and 65 new comparison controls; experimental clients were rearrested significantly less often than comparison controls.

The Stockton project was very similar to the Sacramento Diversion project which showed reduced recidivism (Baron & Feeney, 1976), and is discussed in detail later in the report. It is also similar to two other programs which showed reduced recidivism (California Taxpayers Association, 1974).

In conclusion, despite his pessimistic view, Bohnstedt (1978) suggests that the Oxnard-type individual contact and counseling and the Stockton-type, family-crisis counseling should be pursued further. Both procedures show promise, particularly the Stockton program which requires about one-fifth of the time required by most other programs. Research studies, employing the appropriate design, controls and follow-up periods, are needed to compare the relative effectiveness of alternative procedures for dealing with delinquent youth.

B Gibbons & Blake (1976) Review

Gibbons & Blake (1976) reviewed nine studies of juvenile diversion programs conducted throughout the United States. The programs offered employment services, short-term individual, group and family counseling, family-crisis therapy, parent-child communication and coping skills, intensive individual counseling, and volunteer partners. They concluded that "there is insufficient evidence in the nine studies...for one to have much confidence in diversion arguments and contentions." (p. 420). Yet, five of the studies showed support for diversion as a viable alternative to the juvenile court system. Granted, there were a number of methodological flaws in the studies (e.g. small sample size, contamination of the control group, short follow up-period) but, the consistency of positive findings, suggests that such programs, at least, deserve further consideration.

The projects (1) Crossroads, (2) Alternate Routes, (3) Sacramento County 601, and two volunteer programs (4) Partners Court Diversion and, (5) University Diversion of Juvenile Delinquents, all produced positive results.

Project Crossroads provided employment and counseling services to an experimental group of 191 first-time offenders. These were compared with a control group of 105 which was later divided into two groups, (1) screened - those who had been screened at some time before adjudication, and (2) adjudicated - those who were ultimately adjudicated. Fifteen-month follow-up data showed that recidivism was lower for the diverted group (31% were re-arrested) than the screened group (44%) and the adjudicated group (47%). Moreover, comparison of satisfactory with unsatisfactory participants (who returned to the

court for formal processing) showed that satisfactory clients (N=140) recidivated about half as often (22%) as unsatisfactory clients (57% of 51 youths). Results suggest that providing counseling and employment can have positive effects.

Alternate Routes was a California project which accepted referrals from the police, schools and community agencies. It provided short-term individual, group and family counseling. The 142 youths in the experimental project were compared with 190 youths arrested in the two years prior to the program who were matched on offenses (control group). Twelve-month follow-up data showed that the recidivism rate for the experimental group was about one eighth (6%) that of the control group (47%), a highly significant difference. It was concluded by the evaluators that treatment was provided more quickly and at less cost through diversion than through the official justice system.

As Gibbons & Blake (1976) note, there are methodological difficulties with this study, most notably; (1) only 87 of the 142 diverted youth were police referrals (the others were referred by parents, schools and community agencies) so that the experimental group consisted of less serious cases than the controls; and (2) that the follow-up period (less than 12 months) was not of sufficient length for a true indication of recidivism. Still, results are suggestive that short-term family counseling could be effective in reducing recidivism. The next study provides additional support for this view.

The Sacramento County 601 Diversion Project is the first stage of a project reported in more detail later in this report. Probation

officers provided short-term family crisis counseling to families of delinquents. Youth referred to the courts were randomly assigned to the experimental group (who received family counseling) and a control (who proceeded in the normal manner through the juvenile court system).

Data gathered during the first nine months of the project indicated that about one tenth (2.2%) as many of the 803 experimental youth had petitions filed for offenses as the 558 controls (21.5%). Moreover, 7-month follow-up data showed that fewer of the experimental group (36%) than the controls (46%) were rearrested; and when they were, fewer of the experimentals (18%) than controls (31%) were rearrested on criminal charges. Again, Gibbons & Blake (1976) suggest that the follow-up period was too short (7 months), and needs extending before the full impact of the program can be known. Still, data are suggestive that short-term family counseling may reduce recidivism.

Partners Court Diversion is one of two programs which used volunteers as companions, counselors and role models. This program, located in Denver, Colorado, used older volunteers who were expected to spend a minimum of three hours a week for one year with the client. Youths who would normally have had petitions filed in juvenile court were diverted to Partners Incorporated, a semi-private, community-based program.

Evaluation was based on a random selection of 27 youth who had gone through the program (experimental group) and 22 control cases selected from intake records. Measures included (1) self-reported recidivism, (2) self-concept changes, (3) attitudinal change, and (4)

changes in the quality of the youth-volunteer relationship. Evaluation took place over an 8-month period of participation in the program. Interviews were conducted two months after program assignment and again six months later. Results showed significantly less recidivism for the experimental group relative to the controls. The experimental group had some reduction, or no increase in delinquent offenses over the 6-month period, while the controls exhibited increases in delinquent behaviour. Recidivism reduction was also found to be significantly related to the youths perception that their "senior partner" viewed them positively, suggesting that a positive relationship with a "significant other" may be an important element in the program's effectiveness. Similarly, positive views of the police, of themselves, and of parental support were positively associated with delinquency-reduction. As Gibbons & Blake (1976) note, there were methodological difficulties with this study, namely, (1) no follow-up (2) difference in age between the experimental group (13.6 years) and the control group (15.9 years) and (3) difference in sex between the experimental (more girls) and the control groups. But again, results are suggestive that the use of volunteers as companions and counselors may effectively reduce delinquency. Results from the next study provide further support for this view.

The Midwest Volunteer Diversion Program, the second diversion volunteer program used trained university students as companions and interventionists. This is a report of the first year operation of an Adolescent Diversion project discussed later in this report (Ku & Bleu, 1977). The university volunteers adopted either a behavioural contracting or a child advocacy approach, both of which were taught by

university faculty advisors, to solve the youths problems. The behavioural contracting approach utilizes negotiated contracts specifying responsibilities and privileges for the agreeing parties. The student volunteer acts as a mediator, negotiator, facilitator. In the child advocacy approach he acts as an advocate, supporter, advisor, representative for the client in acquiring community resources. Thirty-seven youths were randomly assigned to the experimental (N=25) and control (N=12) groups, The average age was 14.1 years and the number of police contacts before referral 2.16.

Evaluation data were obtained from (1) pre-assessment, (2) termination interviews with the youths, their parents, and peers, and (3) police and court records during one- and two-year follow-ups. Results indicated that at both time periods, both experimental groups had fewer contacts, of less severity, and fewer petitions filed than the control group. No changes, or differences between the experimentals and controls were found in school grade-point averages or school attendance. The relatively long follow-up period in this study suggests that the positive findings are long-lasting. The one draw-back is the small sample-size, which casts some doubt on the generalizability of the results.

In conclusion, Gibbons & Blake (1976) also were rather pessimistic about the viability of diversion programs. Still, notwithstanding the methodological difficulties, over half of the programs they reviewed did support diversion of youth from the juvenile justice system. These authors, too, argue for large-scale sophisticated evaluation of alternate programs.

C Fishman (1977) Review

Fishman (1977) reviewed 18 diversion programs operating in New York City. These were rehabilitative programs whose goal was to provide services to offenders, ex-offenders, and in some cases, pre-offenders. The programs provided a combination of remedial education, job training and mental health counseling. There was diversion from the regular criminal justice process upon completion of the program. Paraprofessionals, along with professionals, were used in some projects. Three of the projects provided residence, another three provided recreation, while two offered legal assistance. Again the specific results of these studies are not directly applicable to most juvenile populations since 55% of the clients were adults and those that were juveniles appear to be extremely high risk clients. It seems probable that high-risk clients will require different kinds and more intense treatment than their low-risk counterparts.

All clients were males (N=2860) and had participated in the programs for a least 12 months duration. 24% were juveniles (7-12 years) 21% age 16-18, and 55% 19 and older. Sixty-eight percent were black, 25% Spanish origin, and 7% white, or other. Sixty percent had less than a high school education (9-11 years of school), while only 33% of those 18 years or older had either completed 12 or more years of school, or had obtained a high school equivalency diploma.

More than 90% of the clients had at least one prior arrest, and most of the remaining had some kind of a police record. The average number of arrests ranged from .8 to 4.6 for those aged 20 and younger, while it was 3.3 to 18.7 for those aged 21 and older. For both groups, the arrests included many serious charges, e.g., homicide,

forceable rape, robbery, aggravated assault, burglary.

Three methods were used to measure the impact of the projects: (1) control group comparisons, (2) arrests before and after project entry, and (3) comparison of recidivism among the projects. In the case where there were control groups available, (e.g., in the age range 21-39 years) no differences in recidivism rates were found between the experimental and control groups. In most cases, however, appropriate control groups were not available.

When the arrest rates for the year after project entry were compared with the arrest rates for the second year before project entry, recidivism was found to be significantly higher during the project for the 18 years and younger age group, not different for the 19-20 age group, lower for the 21-39 age group, and not different for the 40-71 age group. There were no significant differences in recidivism rates among projects. Recidivism rates were high, ranging from 51% for 12-15 year olds to 24% for 40-71 year olds. Moreover, for those in the younger aged groups (13-18 years) the ones with the highest levels of severity of prior arrests had the highest recidivism rates (60% for this age group). The highest recidivism rate (72%) was found in the age group 19-21 years in one of the projects. Sixty-seven percent of the total number of arrests of the recidivists were for serious crimes; 4% of the arrests were for violent crimes, 4% for forcible rape, 69% for robbery and 23% for aggravated assault. This was true for all age groups. In general, by whatever measure used in the evaluation, those persons aged 20 and younger had a higher magnitude and greater severity of criminal recidivism; and highest was for 500 juveniles (13-15 years) from five diversion projects, whose

recidivism rate was 51% during the year after beginning participation in the projects. A significant association was also found between prior and subsequent history of violent crimes for persons age 7-18 years and 21-39 years for rape, robbery and assault but not for homicide.

Fishman (1977) concluded that rehabilitation by these projects was a failure, particularly for the young clients, and in relation to violent crimes. Forty-one percent of the 2860 clients from 7-71 years of age were arrested for a total of 2072 times during the 12 months after project entry. Of these, 29% were for violent crimes, meaning that 50 persons may have been killed or raped, and 555 robbed, or severely assaulted by these recidivists. Thus, "...the human costs of this recidivism are too high". (p.299) "...it appears to be unjustified,...to continue to fund such 'rehabilitative' services... as a means of reducing and preventing juvenile delinquency (p.302). This is a very high-risk population and for them, as Fishman (1977) suggests, it may be necessary to have mandatory minimum sentencing or preventative detention to ensure the safety of the people. Or the use of residential homes with close supervision might be effective. Various alternatives for high-risk youngsters need to be explored and evaluated.

Finding employment does not appear to work with this high-risk population. The recidivism rates for one of the projects which provided jobs with subsidized wages was not significantly different from those of a control, or comparison group that was not provided with this service. Moreover, recidivism rates for this group also did not differ significantly from comparable clients in seven other

projects whose vocational services consisted almost entirely of job referral. As Fishman (1977) notes, it seems likely that the job has to have some degree of desirability before it can be expected to have an effect on the youth's criminal behavior. Just any job is not good enough, it must be an acceptable job. Unfortunately, most attractive jobs (e.g., white collar jobs) are beyond the qualifications of most of these youth. The solution invariably must involve educational and vocational upgrading, as well as the matching of individual abilities to job aptitude requirements and the establishment of realistic aspiration levels.

In conclusion, like the others (Bohnstedt, 1978; Gibbons & Blake, 1976), Fishman (1977) also, was not optimistic about the acceptability of diversion. After reviewing 18 projects operating in New York City he concluded that the rehabilitative programmes were a failure, particularly with the younger-aged youth (13-15 years) and for violent crimes (rape, robbery, assault). He recommended discontinuing government funds to such projects and suggested mandatory minimum sentences, or preventative detention for the protection of society. Admittedly, it is more difficult to rehabilitate hardened criminals, and it may be necessary to enforce preventative detention when juveniles reach this stage, nevertheless, some attempt at rehabilitation needs to be made. Preventative programmes need to be devised so as to reduce the number of youth who become criminals. This undoubtedly will require family intervention at an early age before delinquent patterns are firmly established.

D Rovner-Pieczenik (1974) Review

Rovner-Pieczenik (1974) reviewed 15 demonstration projects operating across the United States and found most of them to be lacking in basic experimental design, i.e., inappropriate control groups, non-representative samples, inadequate follow-up after termination of the program, insufficient description of the intervention procedure. It should be noted that most of the clients in the 15 studies reviewed by Rovner-Pieczenik (1974) were adult offenders (greater than 17 years old) often with prior records, so that the results, or lack of, therefore, are not directly applicable to the pre-delinquent, younger-aged, lower-risk youth, who are the focus of attention in the present paper. The length of the programs ranged from three months to six months, with one 12 months. The intervention strategies included counseling, employment and educational and job readiness up-grading. Occasionally emergency housing was provided to needy participants. Counseling was provided by professional and paraprofessionals, and intensive ongoing staff training was characteristic of those programs using paraprofessionals. Community agencies providing remedial education, drug, alcohol and mental health treatment, were used by some programs. The methodological difficulties characteristic of these studies and the recommendations for change, however, are general, and are applicable to pre-delinquent populations.

The weaknesses in the projects are attributed to a number of factors: (1) that the evaluative research component is usually not an integral part of the planning of the project, resulting in post-hoc research designs which unavoidably suffer from methodological and

operational difficulties; (2) that the evaluational research component is generally given low priority in the allocation of resources, resulting in inadequate investigation of the research hypotheses; (3) that program directors are often asked to first demonstrate the feasibility of their programs, not the effectiveness of the program, resulting in concentration of efforts on the former rather than the latter which ultimately determines its viability; and (4) that evaluation research tends not to be policy oriented, i.e., rather than focusing on the how, why, and under what conditions a program is most effective, researchers tend to use statistics to prove or disprove effectiveness.

Rovner-Pieczenik (1974) makes a number of recommendations for future evaluation research: (1) that evaluation research be an integral part of the initial planning of a diversion program; (2) that policy-makers be educated so that they understand the limitations of the research and its applicability; (3) that policy-makers be involved early in the evaluation research process so that they will have a better understanding of the issues, and the usefulness of the data in decision-making; (4) that a variety of research models and techniques be explored so as to be able to accommodate the diversity of research issues; (5) that there be ongoing evaluation and feedback to permit adjustment of new programs on a continuous basis; (6) that researchers compare the relative effectiveness of alternate approaches to determine which works best with what kind of clients.

After applying the principles of classical research design (e.g., appropriate control groups, randomization, pre- post-measure, follow-up) to 15 studies Rovner-Pieczenik (1974) draws a number of

conclusions: (1) that short-term (in program) employment gains were found by two programs; (2) that long-term (6 months post-program) employment gains were suggested by two programs; (3) that short-term recidivism reduction was found in three programs; (4) that long-term recidivism reduction could not be assessed; (5) that successful participants tended to be less disadvantaged and a better risk at program entrance than the unsuccessful participants, i.e., they tended to be older, have a relatively good employment and educational history, and have a charge for a property offense or a misdemeanor, or a felony, be female and a non-addict.

In addition a number of policy recommendations were made by Rovner-Piecznik (1974): (1) that pre-trial diversion programs continue to be funded, and for a sufficient time period (a minimum of 3 years) for a program to be developed, stabilized and evaluated; (2) that program emphasis be on the supervision of employment and counseling services (particularly for the economically disadvantaged participant); (3) that participant eligibility criteria be expanded "...to the highest level of community tolerance,"; (4) that, as eligibility guidelines expand, new service components and strategies be devised for the different client populations; and (5) that programs should continue to draw on the service of paraprofessionals, and evaluate objectively their effectiveness.

E Summary & Conclusions

Four reviews of diversion programs, two of them dealing with juveniles, one of them dealing with juveniles and adults, and one dealing with adults (17 years and older) are presented. The first two

reviews involved approximately 5,000 youths, the third one about 1,400, and the number of youths processed by the 15 projects reviewed by the fourth reviewer is not reported. However, a fair approximation is that at least 6,000 youths have been processed by the diversion projects and subjected to a wide range of services, including individual and family counseling, educational tutoring, employment counseling and placement, and companionship. Services were provided by community volunteers (university students), probation officers, and trained experts from social service agencies and educational institutions. Length of programs ranged from short-term (e.g., 6 weeks of family counseling) to relatively long-term (e.g., 8-12 months of educational and employment upgrading along with individual and family counseling).

Although most of the projects suffered from methodological difficulties (e.g., small sample size, short follow-up period, non-random assignment of youths to experimental and control groups) significant positive findings did emerge; namely, reduced recidivism and increased employment. Moreover, preliminary results suggest that short-term, family-crisis counseling can be effective with low-risk clients.

With the exception of one reviewer (who was dealing with high-risk delinquents and adults), all reviewers recommended continuation of funding for diversion projects with the view of developing viable preventative and rehabilitative programs for delinquents and pre-delinquents. One reviewer made a number of specific recommendations for researchers and policy-makers, with which the present author agrees: (1) that diversion programs be funded for

a sufficient period of time (a minimum of 3-5 years) for a program to be developed, stabilized and evaluated; (2) that evaluation research be an integral part of the initial planning of new programs; (3) that policy-makers also be involved in the evaluation research so that they have a better understanding of the issues, the usefulness and limitations of the data; (4) that there be ongoing evaluation and feedback to new programs so that appropriate adjustments can be made on a continuous basis; (5) that large-scale studies evaluate the relative effectiveness of alternate programs to determine which works best with what kind of client; (6) that new programs continue to utilize the services of community volunteers, and evaluate their effectiveness; and (7) that new programs emphasize employment-placement, and counseling services. The present author would add educational up-grading as a third necessary component of rehabilitative and preventative programs.

11 Present Reviews

Nine diversion projects are evaluated and presented in summary form below. A detailed description of each project is contained in Appendix A. These projects were selected from over 40 reviewed. They were selected on the basis of their relative methodological sophistication, and the extent to which conclusions were data-based. Most of the reports reviewed contained only a description of the program along with some general impressions, but no supporting data. These studies were not included in the present report. All studies which made some attempt at determining the effectiveness of a treatment program and provided supporting data are included.

Three of the programs are short-term (5-6 weeks), high-volume (1000-1800 clients per year) programs offering family counselling; two of them are moderate term (3-4 months), low-to-medium volume (73-436) offering counselling, job placement and educational upgrading; four programs are long-term (8-12 months), low-volume (41-121) programs offering counselling, educational upgrading and job-placement, while one program is short-term (5-6 weeks) low-volume, offering family counseling. All studies found reduced recidivism rates relative to controls (if incorporated), and/or projected recidivism rates on the basis of historical data. In general, results are positive, but the methodological deficiencies in the studies lessen confidence in the reliability and generalizability of the findings. Still, results offer suggestions for continued research and development of programs which will provide a viable alternative to the traditional juvenile justice system.

A The Adolescent Diversion Project - Ku & Blew (1977)

The Adolescent Diversion Project, operated by the Community Psychology Action Centre of the University of Illinois, Champagne, Illinois, utilize volunteer graduate and undergraduate students, supervised by a faculty, to provide support services to delinquent and pre-delinquent youths. Two formats, forming two experimental groups, (1) behavioral contracting, and (2) child advocacy, were used. In the behavioural contracting approach student volunteers negotiated contracts between the clients and their parents, teachers, and other authority figures, so as to make explicit the privileges and responsibilities of each. In the child advocacy approach the

volunteer student acted as an advocate, supporter, advisor, representative when dealing with the court, the police, social agencies, and parents in an attempt to acquire satisfaction of the youths needs. The duration of the intervention period was eighteen weeks. The follow-up time was two years.

Thirty-seven youths were randomly assigned to the experimental groups (n=25) and control group (n=12) in the first year of operation; and 36 youths were randomly assigned to the experimental groups (n=24) and a control group (n=12) for the second year of operation. The youths age ranged from 11-17 years with a mean age of 14.5 years. All youths had two or three previous police contacts and were considered beyond the "lecture and release state".

Evaluational data were gathered during the program, one-year follow-up for the second year of the study and two-year follow-up for the first year of study. Results indicated, (1) a significant reduction in the number and severity of police contacts and court petitions filed both during and after the intervention period for the experimental groups relative to the control group, and (2) no difference in grade point average, but a significantly better school attendance record for the experimental groups relative to the control group in the second year of study.

This is a well designed study, with random assignment of youths to experimental and control groups, and the longest follow-up period (1 and 2 years) of any of the studies reported here. The results are positive, and have been replicated once -- replication increases considerably the confidence in the findings. The small number of subjects limits the generalizability of the results. Relative to

other programs this may be considered of intermediate duration (four-and-a-half months), low volume (36 youths per year) program catering to low-to-moderate risk clients. The per-client operating cost of the program is likely to be greater than for the short-term, high-volume, programs (e.g., Sacramento 601), but less expensive than institutional costs. Operational cost figures were not reported. The use of volunteer students and university faculty lessens the overall cost of the program.

B Project Intercept - Knott (1975)

Project Intercept was a delinquency prevention program operating in Denver, Colorado, under the auspices of the Colorado Youth Services Institute. The program utilized volunteer community workers as behavioral analysts under the supervision of professionals. Behavioral analysts worked with the youths and their families providing family counselling, educational upgrading and peer-group resocialization. Behavioral analysts visited the families an average of 1.4 times per week, and the clients an additional 2.5 times per week. Two-hour peer-group sessions were scheduled for once a week.

Youth, who had been adjudicated by the juvenile court, were referred by the Youth Service Bureaus, public schools and district attorney's office. Data were gathered over a two year period, 1973 and 1974. By the end of 1974, 107 youths had been terminated from the program, 73 of them successfully and 34 unsuccessfully (e.g. had not met one or more of the treatment goals). During the first year of operation, 1973, a control group of 21 youngsters was established by randomly assigning one of every four youngsters to the control. This

had to be discontinued after the first year of operation because of public pressure. Almost all of the youths were 14 years or younger, the mean age was 12.8 years. 76% of the experimental sample exhibited cross-hemispheric dominance, suggesting deficits in neurological functioning. Coincidentally, 75% of the sample suffered from severe learning disabilities. The average length of time in the program was 12 months and two weeks (including referral time) for the total sample, 18 months for the 1973 sample and six months, one week for the 1974 sample. Seven-month follow-up data were reported for the 107 youths who were terminated from the program. The average length of time in the program for this group was eight months.

Results indicated, (1) a significant reduction in recidivism, over the 18-month period, for the 1973 sample relative to controls, i.e. the control group's ratio of impact rearrests was about three times greater than that of the experimental sample, and its ratio of all offense rearrests was about twice as great as that of the treatment group, (2) a significant reduction in recidivism during the first 12 months for the 1973 sample, compared with the projected percentage based on historical data on over 2000 delinquents, i.e. only 19% of the 1973 sample were rearrested for impact offenses, while the projected expected percentage was 40%, a considerable reduction (52%) in burglary and assault crimes, (3) a significant reduction in recidivism during the six-month in-program period for the 1974 sample, i.e. the reduction for impact offenses was 70.5%, and for all offenses 50.7%, (4) a significantly greater recidivism rate for unsuccessful terminators relative to successful terminators during the seven-month follow-up period, i.e. the rearrest ratio for the unsuccessful group

was about five times as great as that for the successful group, and (5) a significant increase in school attendance and academic grade (at least one grade level) for the experimental group.

This began as a well designed study with random assignment of youths to an experimental and control group. Unfortunately, public pressure forced the discontinuance of the control group. The follow-up period (7 months) is short and in need of extension. The length of a program is moderate (6 months). Results are favorable suggesting that the use of behavioral analysts to work intensively with families of delinquents can effectively reduce recidivism in moderate risk youths. The high percentage of youths apparently suffering from neurological deficiencies deserves further consideration. The relationship between neurological deficits, learning disabilities and delinquency needs further study.

C Project New pride - Blew, McGillies & Bryant (1977)

Project New Pride, a community-based program, was located in the lower income areas of Denver, Colorado. The program provided, (1) educational upgrading, (2) counselling, (3) employment placement, (4) cultural education, to adjudicated delinquents. The length of the program was 12 months, and it accommodated approximately 60 youths per year. Community volunteers acted as coordinators, teachers aids, and administrative assistants.

Evaluation of the program was based on 121 experimental and 76 control youths, who were randomly selected from a pool of subjects meeting the following eligibility criteria, (1) age 14-17 years, (2) recent arrests, or convictions for burglary, robbery, or an assault

related to robbery, (3) prior conviction, (4) a resident in Denver County. Due to opposition from community leaders and judicial officials the control group did receive treatment from other programs, and in the later stages of the program had to be discontinued. The average age of the youth was 16 years. 78% of the youths had at least one learning disability and 71% of them had multiple learning disabilities. The most common learning disabilities were faulty auditory discrimination, followed by auditory and visual memory deficits. New Pride youths were compared with (1) a randomly selected control group, (2) a group of Denver juveniles (n=2203) matched to the New Pride juveniles on ethnicity, sex and prior record.

Results indicated, (1) a significant reduction in recidivism for the experimental group relative to the controls, (2) a reduced rearrest rate for the employed youths compared with the unemployed youths, i.e. the rearrest rate for the employed youths was approximately one-third that of the unemployed youths, and (3) a significant increase in academic achievement scores for the experimental group. Although there was a significant improvement in academic achievement, 70% of the youths still performed three or more grades below their last assigned grade level. About 70% of the experimental youths were placed in jobs following vocational training - 90% of them were part-time jobs. No follow-up data were presented.

This also began as a well designed study with random assignment of youths to experimental and control groups. Unfortunately, due to public pressure, the existing control group received treatment, and subsequent assignment of youths to a control group had to be discontinued. Despite the bias in favor of the control group,

however, the experimental group showed significantly greater recidivism reduction. A major problem with this study is the lack of follow-up data. 3-5 year follow-up data are desirable to properly evaluate the effectiveness of the program. Relative to other programs, this may be considered a long duration (1 year), small capacity (60 youths per year) program catering to moderately high-risk clients. The cost (\$ 3,960.00 per client) is likely to be higher than the short-term, larger capacity program, (e.g. Sacramento 601 project) but considerably lower than the traditional juvenile court procedure (\$ 800.00 per client) plus incarceration (\$ 12,000.00 per client per year) (McGillies & Bryant, 1977).

D Louisville Youth Diversion Project - Haarman, Hildenbrand, Siefold & Conlin (1976)

The Louisville Kentucky youth diversion project involved six Youth Services Centers (YSC) located in high delinquency areas in Jefferson County. The centers offered immediate, short-term counseling in family-crisis situations, and also attempted to identify and mobilize community resources to provide assistance to delinquent and pre-delinquent youths. The program was not designed as a treatment facility, but rather as a stop-gap measure providing short-term counseling and referral to the appropriate agencies. Family counseling sessions are few in number, a maximum of five, provided by social workers.

Referrals were received from individuals (about one-third), police (slightly less than one-third), and schools and social agencies (slightly more than one-third). Youth were referred because of

employment needs (25%), shoplifting (17%), truancy (12%), ungovernable behaviour (8%) disorderly conduct (6%) and other non-delinquent behaviour (15%). Data were presented for 2 years of operation, 1974 and 1975. 1894 referrals were received the first year, of whom 1,095 (about 58%) were considered to have been diverted from the juvenile justice system. 1684 youths were referred during the second year, and about 84% (N=1417) could be classified as divertees. Of these, about 80% were for minor and status offenses. The average age of the youth was 14.0 years the first year, and 13.4 the second year. No control groups were established.

Six-month follow-up data showed that (1) 14% of the diverted youths from the 1974 sample were later referred to the Juvenile Court, and (2) 20% of the 1975 sample of diverted youth recidivated. No comparison data were given.

This is a short-term, high-volume program for low-risk youths, which appears to effectively reduce delinquency. The 14% and 20% recidivism rates compare favourably with other studies discussed herein. Project Intercept, for example, had a 19% recidivism rate, and Achievement Place a 19% recidivism rate. Unfortunately, however, the YSCs in addition to providing short-term family counseling, referred the youths to other service agencies for assistance, (e.g. interaction groups, volunteer groups) recreational groups, the effectiveness of which was not evaluated independently of the counselling. Thus, the program effectiveness cannot be attributed solely to family counseling. Also, no control groups were incorporated and the follow-up period was too short (6 months). No information was provided on the cost-effectiveness of the program.

Still, providing family counseling does appear to have merit, as results from the next study suggest.

E Sacramento Diversion Project - Baron & Feeney (1976)

The Sacramento Diversion Project was another program providing short-term (5 weeks), family-crisis counseling to low- and moderate-risk youths, in this case by trained probation officers. Referral was made to social agencies for the more difficult cases. The Sacramento project involved two sub-projects, (1) the first dealing with less serious 601 offenses (e.g. runaways, truants; those beyond reasonable control), and (2) the second dealing with more serious 602 offenses (e.g. petty theft, possession of drugs, drunk and disorderly conduct).

1589 referrals for 601 offenses were made, 612 control youths and 977 experimental youths were compared. Youth were assigned to the experimental group four days a week and control group three days a week, rotating the experimental and control days monthly to avoid biases due to day of intake. Similarly 111 youth were assigned to the experimental groups and 105 to the control for 602 offenses. The average age of the youth was 14.4 years.

One-year follow-up data for the 601 project showed, (1) an 80% reduction in the number of court petitions for the experimental youth relative to the controls, (2) a reduction in the number of over-night detentions of more than 50%, (3) a reduction of 14% in the number of repeat offenses, (4) a reduction of 25% in the number of youths subsequently becoming involved in criminal behaviour, and (5) the cost of the program for the experimental group was less than half the

cost of the traditional procedure. Similarly, 7-month follow-up data for 602 project showed, (1) a 99% reduction in the number of court petitions for the experimental youth relative to the controls, (2) a 40% reduction in the number of repeat offenses for the experimental relative to the controls, and (3) a 50% reduction in the overall cost of the family counseling programs relative to the traditional juvenile court procedure.

This is a well designed study, involving a large number of youths, randomly assigned to experimental and control groups. The follow-up periods (1 year and 7 months for Project 601 and 602, respectively), however, need to be extended to increase confidence in the findings. The 602 portion of the study represents a replication of the original findings of the 601 study and provides strong support for the effectiveness of the program. The overall results are highly favourable and suggest that short-term family counselling can effectively reduce delinquency with low-to-moderate risk youth.

F Achievement Place - Philips, Philips, Fixsen & Wolf (1973,); Wolf et al (1976)

Achievement Place, located in Lawrence, Kansas, was a residential treatment facility for delinquent boys and girls. It offered a family style setting in which professional teaching parents acted as substitute mothers and fathers. The treatment program was designed to improve academic, social and self-care behaviours of the youths, and made extensive use of the token-economy and point system. Six-to-eight boys or girls, age 11-16 years, along with their teaching parents constituted a family.

Sixteen, court-adjudicated youths, selected by a Board to participate in Achievement Place, served as the experimental group. These data were compared with Boys School (n=15) and Probation (n=13) data, one and two years following treatment. No random control group was established. The average age of the youth was 14 years. Time spent at Achievement Place was 8-12 months.

Results showed, (1) a significant decrease in recidivism for Achievement Place youths relative to Boys School and Probation youths, i.e., two-year follow-up data showed that 53% of the Boys School youths and 54% of the probation youths had committed a delinquent act and had been re-adjudicated by the court, while only 19% of Achievement Place youths were re-adjudicated either during or after treatment, (2) a significant increase in school attendance and school achievement for the Achievement Place youths relative to the other two groups, and (3) a significant reduction in the cost of handling the youths at Achievement Place, e.g., cost per youth at Achievement Place was \$ 3,000.00 - \$ 4,000.00, while the cost for a youth at an institution was \$ 6,000.00 - \$ 12,000.00 per year.

This is a relatively long-term (8-12 months), low-volume program (n=15) administered by professional staff. It is therefore more expensive than other programs which are shorter-term and which make use of community volunteers. Still, as the authors note, it is about half as expensive as operating institutions. Methodologically, the study suffers from small sample size and no control group. But, the program has been replicated 35 times (Wolf, et. al., 1976), and the two-year follow-up period is one of the longest of the studies reported herein, both of which provide strong evidence of the

effectiveness of the program. The youth participating in the Achievement Place program appear to be low-to-moderate risk. Would the program be equally effective with high-risk youths? Studies need to be conducted to determine what kinds of programs are effective with what types of clients.

G Providence Educational Center - Ryan (1974)

The Providence Educational Center, located in St. Louis, Missouri, offered intensive remedial education and counselling to adjudicated delinquents. University student volunteers acted as tutors, working from 3-10 hours per week.

Referrals were received from the juvenile court and from youth agencies. 118 youths, age 12-16 years, in grades 5, 6 and 7, constituted the experimental group. No control group was established. All youths were several years behind in school. Over two-thirds of the youths were referred for impact offenses (e.g., stranger-to-stranger crime, or burglary); most of the remainder were referred for minor offenses (e.g., truancy, shoplifting, parole violation, inhaling intoxicating fumes, trespassing, disturbing the peace, incorrigibility); and a small proportion were referred for more serious offenses (e.g., stealing, armed robbery, assault, attempted forcible rape, homicide and arson). The average time spent in this program was 14 months, 8 months on remedial education and 6 months after-care, i.e., activities associated with transition to the public schools, vocational training schools, or employment. Six-month follow-up data were obtained and compared with pre- and during-program behaviour.

Results indicated, (1) a significant decrease in involvement in crimes in the year during participation relative to the year prior to the program, (2) a significant increase in educational achievement, (3) a significant decrease in truancy, and (4) a significant reduction in criminal activity during the six months post-program relative to the six months prior to the program.

This is another of the relatively long-term, low-volume, higher-cost programs. As the author notes, the cost of providing services to each youth for the 1972-1973 school year was \$ 3,300.00, which is higher than the per-student cost for the public school system, but lower than the client cost for two comparable institutional programs. The per-youth cost at the Missouri Hills Home for Boys was \$ 6,800.00, and that at the State Training School was \$ 11,000.00. The use of student volunteers is a plus, and makes the program less expensive than otherwise would be the case. Two methodological difficulties with the study are, (1) no control group, and (2) insufficient follow-up time, both of which lessen confidence in the significance of the findings. Clients may be considered mostly moderate risk, with some low risk and a small proportion high risk.

H Florida Study - Quay & Love (1977)

The Florida project, located in Pinellas County, was operated by Learning Systems Incorporated. The program provided, (1) vocational counselling, training and job placement, (2) educational upgrading, and (3) individual and group counseling. Community volunteers assisted in providing services.

436 participants aged 12 to 16 years (mean 15.8 years), were divided into three subgroups, (1) those children legally adjudicated as delinquents by the juvenile courts, (2) those children designated as being in need of supervision by the juvenile court and (3) informal referrals of children not in formal contact with the court system, referred by police, schools, and various other community agencies. Similarly, there were 132 control youths divided into 3 subgroups (average age 15.8 years) treated in the usual manner by the juvenile justice system. Youths were randomly assigned to the experimental and control groups after an initial interview. The average in-program time for both experimental and control groups was 3 months; the average follow-up time was 10 months.

Results indicated, (1) a significant reduction in recidivism only for the informal referrals, suggesting that the program was effective for the low-risk group only, and (2) a significant reduction in recidivism for successful terminators compared to unsuccessful terminators, suggesting that successful completion of the program is an important goal to reach.

This is a well designed study, with random assignment of youths to experimental and control groups. The follow-up period (approximately 1 year) is longer than most. The length of the program is relatively short (3 months), permitting it to handle a large number of youths at a time, and making it less expensive than longer-term, low-volume programs. No cost figures were given. The use of volunteers also makes it less expensive. The follow-up time, although moderate (10 months), needs to be extended for increased confidence in the findings. A major problem with the program is that it appears to

be effective only with the low-risk youths -- those youths referred by police, schools, and community agencies, but having no formal contact with the court system.

I The University of Utah Study - Alexander & Parsons (1973)

The University of Utah project is a short-term, behavioural intervention program for delinquent families, located in Salt Lake County, Utah. The program utilized graduate students, under the supervision of university faculty, as interventionists. Treatment consisted of extinguishing maladaptive family interaction patterns, and instituting reciprocity, through a behaviour modification approach. Social contracts among family members were negotiated, and appropriate communication patterns were reinforced through the use of social reinforcement (e.g., praise). Average treatment duration was 12-15 sessions over a 5-6 week period. Follow-up time ranged from six to 18 months.

Eighty-six families of clients were randomly assigned to one of four groups, (1) short-term, family behavioural treatment (n = 46), (2) client-centered family groups treatment (n = 19), (3) eclectic psychodynamic family treatment (n = 11), and (4) no treatment controls (n = 10). Youth ranged in age from 13-16 years, and had been arrested, or detained, at the juvenile court for behavioural offenses, e.g., runaway, ungovernable, habitually truant, shoplifting, possession of alcohol, soft drugs or tobacco. Two additional comparison groups, (5) post hoc selected no treatment controls, and (6) county recidivism rates, 1971, were instituted.

Recidivism data gathered during the interval 6-18 months following program termination indicated (1) similar recidivism rates for the three control groups (about 50%), (2) a similar recidivism rate for the client-centered family groups treatment (47%), (3) the highest recidivism rate for the eclectic psychodynamic family treatment group (73%), and (4) the lowest recidivism rate for the short-term family behavioural treatment group (26%). In addition to having the lowest recidivism rate, the family behavioural treatment group had lower variance in talk time, less silence, and more interruptions - in all a more favourable outcome on the process measures. Finally, a comparison of recidivists with non-recidivists, independent of treatment group, showed that non-recidivism was associated with a more favourable process outcome, i.e., lower variance in talk time, less silence and more interruptions.

This is a well designed study, with random assignment of youths to experimental and control groups, and one of the longest follow-up periods (e.g., 6-18 months) of the studies reported here. The results are positive. The length of the program is short (5-6 weeks), permitting it to handle a larger number of youths at a time, and making it less expensive than longer term, low volume programs. No cost figures are given. The use of university graduate students as interventionists also makes it less expensive. The clients may be considered relatively low risk. This perhaps is the type of program that would work well with high risk clients. Studies need to be conducted to determine if such a program would be effective with relatively high risk youths.

J Summary and Conclusions

Nine diversion projects for delinquent and pre-delinquent youths were evaluated. The programs offered individual and family counseling, educational upgrading, pre-employment counseling and job placement, and peer-group counseling. The length of the programs ranged from short-term (e.g., 5-6 weeks) to relatively long-term (e.g., 8-12 months). The intervention techniques varied from short-term, family-crisis, counselling by probation officers and university students to long-term, intensive work with the youth and their families using a number of approaches, e.g., behavioural contracting, child advocacy, behavioural analysts, educational specialists. Volunteers (e.g., university students, community workers) were utilized in six studies, as tutors, advocates, counsellors for the youth and their families.

Youths participating in diversion programs ranged in age from 11 to 17 years, with an average age of about 14 years. They were referred to the programs by the police, the juvenile courts, youth service bureaus, public schools and other social agencies, and varied from low (no police contacts) to moderately high-risk (1-2 prior convictions) in terms of past history of delinquent behaviour and likelihood of successful rehabilitation. Approximately 4700 youths in all were involved in diversion programs. All of the programs reported reduced recidivism, and those that provided educational and employment upgrading reported significant progress in those areas. Cost-effectiveness information was provided for two of the reports, and in both cases was deemed to be less (in one case 50% less) than the traditional juvenile justice procedure. Two of the studies found

learning disabilities, and one found corresponding neurological deficits.

A number of methodological difficulties continue to plague diversion studies. These include, (1) a small number of subjects in the experimental and control groups, particularly in the control groups, (2) youth in the control group not remaining free of some kind of treatment, (3) lack of random assignment to experimental and control groups, and (4) insufficient post-treatment follow-up time. Small number of subjects, non-random assignment of subjects to experimental and control groups, and contamination of control groups all mitigate against generalizing the findings to the population as a whole.

The lack of a comparable no-treatment control group makes it impossible to confidently attribute significant effects to the treatment program. Positive effects, for example, may have been due to a number of factors, e.g., simple passage of time, a particularly low risk sample, some unknown environmental influence. Even when control groups are introduced at the beginning of a study it is difficult to ensure that they are retained throughout the duration of the study. Only five of the nine studies began with control groups, and two of the control groups had to be discontinued in the face of public pressure against withholding beneficial treatment (assumed) from those in need. The longer-term studies typically suffered from small number of subjects, and contaminated and/or lack of control groups.

Post-treatment, follow-up data are essential for determining the stability of the treatment effects. A program which deters delinquent

behaviour only during in-program time does little more than incarceration. For pre-delinquent and delinquent youths, age 12-14 years, it would seem desirable to follow them at least until their late teens, which would mean 3-5 years follow-up period. The optimal length of the follow-up period needs to be investigated since different results can emerge depending upon the group being studied and the post-treatment time interval. Two-year follow-up data gathered by Achievement Place researchers, for example, showed that the recidivism rate doubles (from 6-12%) during the second year of follow-up for the experimental group, while it increased by 43% (from 10% to 53%) for a Boys School control, and by 24% (from 30% to 54%) during the second year follow-up for a Probation Control group (Phillips et al, 1975). McCord (1978), in a 30-year follow-up of the original McCord et al (1959) study, reported no positive effects and some negative effects (e.g. greater likelihood of committing more than one crime, greater manifestation of serious mental illness, lower SES, lower work satisfaction, greater number of stress related diseases, younger age at death) of a 5-year family treatment program involving counselling, academic tutoring and recreational guidance. The accuracy of these conclusions was questioned by Vosburgh and Alexander (1978). Nevertheless, such results suggest that long-term post-treatment follow-up data (e.g., 10, 20, 30 years) may be necessary to obtain an accurate indication of the effects of family intervention programs.

All but one of the diversion programs reported follow-up data, gathered at from six months to two years following treatment. In all cases, recidivism was reduced relative to a control group, or a

projected recidivism rate based on past experience. Still, especially for the younger-aged youths, longer follow-up periods are necessary to monitor the effectiveness of the treatment program.

Despite the methodological difficulties with the studies, a number of tentative conclusions and recommendations deserve consideration, (1) diverting youth from the traditional juvenile justice system to a program involving one, or a combination of counselling, educational upgrading, job placement, does appear to be a viable alternative to the usual court procedure, (2) short-term (e.g., 5-6 weeks), family-crisis counselling appears to effectively reduce recidivism for low-risk clients (e.g., youths not formally adjudicated), but not for higher risk clients, (3) more intensive (e.g., a combination of counselling, educational upgrading, job placement), longer-term (e.g., 8-15 months) treatment appears to be effective with moderate and moderately high-risk clients, (4) remedial programs directed at correcting learning disabilities (and neurological deficits) may need to be a component of educational upgrading programs for delinquents, and (5) researchers need to compare the relative effectiveness of alternate programs to determine which seems best for what type of client.

111 The Cambridge - Somerville Follow-up Study - McCord (1978)

The Cambridge-Somerville treatment program began in 1939 and continued for an average of five years. The present report is a 30-year follow-up of treatment effects. Treatment included family counseling, academic tutoring, medical or psychiatric assistance and

referral to youth organizations, e.g., Boy Scouts, Y.M.C.A. Trained counselors provided the treatment.

Clients and referral source

Four-hundred-and-eighty men, 95% of the original group of 506 youths selected in 1939, were located. Of these, 48% (9%) had died and 340 (79%) were living in Massachusetts. In 1939, 506 youths from the densely populated, factory dominated areas of eastern Massachusetts were selected, divided into pairs on the basis of similarity in age, delinquency-prone histories, family background, and home environments, and each member of the pair randomly assigned to either the control or treatment group.

Referrals were received from schools, welfare agencies, churches, and the police, who recommended both "difficult" (50%) and "average" (50%) youngsters to the program. Average youngsters were average, well adjusted boys. Difficult youngsters were judged as maladjusted, disordered, pre-delinquent youngsters. They may be considered low-to-moderate risk youth in terms of their program for rehabilitation. The boys were aged 5-13 years, with a median age of 10 1/2 years.

Data are based on responses to questionnaires received from 113 men in the treatment group (54%) and 122 in the control group (60%) and official records from courts, mental hospitals, alcoholic centers, etc. from 253 men in both the treatment and control groups.

Intervention

The treatment program began in 1939 and continued for an average of five years. Counselors were assigned to each of the experimental

families and visited them on an average of twice per month. For one-third of the experimental group the primary focus was on family counseling to deal with the family problems. Over half of the boys received academic tutoring, while about one-fifth received medical or psychiatric attention, and one-fourth went to summer camps. Families were encouraged to utilize the services of the program. Most of the boys were introduced to various community programs, e.g., Boy Scouts, Y.M.C.A.

Results

Data were gathered from official records, personal contacts and questionnaires in 1975 - 1976, 30 years after termination of the program. Results are discussed with regard to, (1) criminal behaviour, and (2) health; work; leisure time, beliefs and attitudes. The experimental and control groups were compared on a variety of measures of criminal behaviour. Results indicated no differences between the experimental and control group, (1) in the number of youths committing crimes as juveniles, (2) the number of persons committing crimes as adults, (3) in the number of serious crimes committed, (4) in age when a first crime was committed, (5) in age when committing a first serious crime, (6) in age after which no serious crime was committed, (7) in criminal behaviour when delinquency scores were controlled, (8) in criminal behaviour when seriousness of juvenile record and juvenile incarceration were controlled. Significant differences between the treatment and control groups were found, however, (9) in the number of persons committing more than one crime--in the opposite direction to that predicted. A

higher proportion of criminals from the experimental group than from the control group committed more than one crime; 78% of those from the experimental group committed at least two crimes, while 68% of those from the control group committed at least two crimes. Finally, (10) there was no difference between the experimental and control groups in the number of persons, referred as "difficult", committing crimes--34% of the experimental group and 30% of the control group had official juvenile records, while 20% of the experimental group and 21% of the control group had unofficial records.

Results from the questionnaire data indicated, (1) no differences between the experimental (7%) and control (8%) groups in the number of men treated for alcoholism, (2) of those who received psychiatric treatment (21 persons from each group) more serious psychiatric problems for the experimental group (e.g., a majority diagnosed as manic depressive or schizophrenic) relative to the control group (e.g., a diagnosis of personality disorder or psychoneurotic), (3) of those who died (24 from each group), an earlier age at death for the experimental group relative to the control group, (4) a greater number of men from the experimental group than the control group reporting as having had at least one of a number of stress related diseases (e.g., arthritis, gout, emphysema, depression, ulcers, asthma, allergies, high blood pressure, heart trouble), (5) a greater number of men from the experimental group (21%) than the control group (11%) reporting having had symptoms of stress in the circulatory system (e.g., high blood pressure or heart trouble), (6) about equal numbers of men from the experimental and control groups as being married (61% and 68% for the experimental and control groups, respectively), never married (14%

and 9%, respectively), separated, divorced, or widowed (10% and 13%, respectively), and remarried (15% and 10%, respectively), (6) about equal proportions of the experimental (29%) and control (27%) men being unskilled workers, although (7) a greater proportion of the control group (43%) than the experimental group (29%) were white collar workers or professional, (8) almost all of the men who held white collar or professional positions (97%) reporting that their work was satisfying, while (9) among blue collar workers, those in the experimental group (80%) were less likely to report that their work was generally satisfying than those in the control group (95%), (10) no differences between the experimental and control groups in their reported use of leisure time (e.g., reading, travelling, doing things with their families, sports, working around the house, watching television, enjoying music or theatre or photography, doing service work, enjoying crafts or tinkering, participating in organized group activities), (11) no differences in response to questions about authoritarian beliefs and attitudes, (12) no differences between the experimental and control groups in political orientation.

In general, not only does the objective evidence fail to support the major hypothesis that positive intervention into the families of potential delinquents will reduce the probability of subsequent criminality, but also it suggests that such a program may lead to negative side-effects, e.g., greater likelihood of committing more than one crime, greater manifestation of serious mental illness, lower economic status, less work satisfaction, greater number of stress related diseases, younger age at death. McCord (1978) speculates as to why the provision of counselling, academic tutoring, medical

assistance, may have led to these undesirable outcomes: (1) internal conflicts are produced through interaction with adults whose values are different from those of the family milieu, (2) long-term intervention creates a dependency on outside assistance, which when withdrawn leads to resentment, (3) unfulfilled high expectations created by the treatment program, (4) a self-perception created by long-term treatment of "requiring help." It is suggested that the undesirable side effects are the manifestation of conflict, feelings of dependency, resentment and helplessness created by long-term family intervention.

Summary and Conclusions

This is a 30-year follow-up on a long-term, family intervention program for pre-delinquents, which took place in eastern Massachusetts during the late 1930's and late 1940's. Professional counsellors provided family counselling, visiting families twice per month over a five year period. Boys also received educational tutoring, and medical or psychiatric assistance where needed. Other community resources, e.g., Boy Scouts, Y.M.C.A., summer camps, were also utilized.

Five-hundred-and-six members of the original program, 253 experimentals and 253 matched controls, were traced through court records, mental hospital records, records from alcoholic treatment centers, and Vital Statistics in Massachusetts. Questionnaire data were based on 113 men in the treatment group and 122 men in the control group. When the program began in 1939, the boys were aged 5-13 years, with a median age of 10 1/2 years. They were matched on

delinquency proneness, family background and home environment variables. Boys were referred by schools, welfare agencies, churches, and the police, who judged them to be "difficult" (50%) or "average" (50%). Difficult boys were rated as well adjusted. In general, boys in this study may be considered low-to-moderate risk in terms of their prognosis for rehabilitation.

Criminal and questionnaire data were gathered in 1975-1976, 30 years after termination of the original treatment program. Results of the criminal behaviour data indicated (1) a significant difference between the treatment and the control groups in the proportion of criminals committing more than one crime, with a higher proportion of criminals from the treatment group committing more than one crime. Results from the questionnaire data indicated, (1) a higher percentage of controls (43%) than experimentals (29%) in the white collar or professional category, (2) greater work satisfaction for white collar workers than blue collar workers, (3) among blue collar workers greater work satisfaction for the control group relative to the treatment group, (4) more serious psychiatric problems for the experimental group, (5) greater number of stress related diseases for the experimental group, and (6) younger age at death for the experimental group.

This is a well designed study, with random assignment of the youths to experimental and control groups. The follow-up period is extremely long (30 years), probably longer than is necessary, although this remains to be determined. The length of the program also is extremely long (5 years) relative to other similar programs. Although the follow-up methodology used by McCord (1978) and the conclusions

drawn have been severally criticized (Vosburgh & Alexander, 1980) results, in general, are negative, and if replicated in subsequent studies lead to the disturbing conclusion that family intervention programs risk damaging the very individuals they are designed to assist. The negative side-effects, it is suggested, are the result of feelings of dependency, resentment and helplessness created by the long-term family intervention program. Researchers need to monitor these feelings and to clarify how they are produced and how they are related to negative outcomes. One, 5, 10 and 15 year follow-up data may be necessary to adequately monitor and assess treatment effects needs to be determined.

III

RESEARCH AND POLICY IMPLICATIONS

Researchers in the area have made a number of suggestions that may be useful in guiding future research and policy decisions relating to the area of delinquency prevention. These are discussed under two general sub-headings, (1) general considerations, and (2) program implications.

I General Implications

A number of general suggestions for delinquency prevention have been made by researchers. These include, (1) strengthening family life through counseling, therapy, parent training, behavioural contracting and family planning, (2) providing financial resources to alleviate delinquency associated conditions, e.g., low family income, unemployment, slums, lack of community facilities (day nurseries, leisure time facilities) and lack of educational opportunities, (3) equipping schools so that they may identify and counsel potential delinquents, offer curricula relevant to these youths, and provide non-deviant role models, (4) investigating the constructive use of leisure time, (5) minimizing unpleasant contacts with the social justice system, (6) exercising greater control over the employment of youth to avoid their being enticed to forego education, training, apprenticeship for short term gains from employment in dead-end jobs,

and (7) directing remedial efforts towards third-time and subsequent offenders so as to reduce numbers and cost.

A. Strengthening family life

Strengthening family life has widespread support from researchers in the area. This can be done through education (Glueck & Glueck, 1950, 1968; West & Farrington, 1973), through family planning (West & Farrington, 1973), through counseling (McCord et al., 1959; Steward & Leone, 1978), through therapy (Freeman & Savastano, 1970), through parent effectiveness training (Gordon, 1976), through behavioural contracting (McCombs, Filipczak, Friedman & Wodarski, 1978; Stuart, 1971; Stuart, Jayaratne, & Tripodi, 1976; Stuart, Tripodi, Jayaratne & Camburn, 1976; Weathers & Liberman, 1975). Glueck & Glueck (1950) point out that family life must be strengthened though the introduction of large scale programs designed to tap the resources of "...mental hygiene, social work, education, and religious and ethical instruction (so that) ...the vicious circle of character damaging influence on children exerted by parents who are themselves the distorted personality products of adverse parental influences..." (p. 287) can be broken. They later say that "...a dollar spent on housing projects, massive welfare services, recreational activities, and other well-intentioned services. ...will...not play a definitive role (in reducing delinquency)...without preparation of marriage and child-rearing and improvement of the emotional climate of family life" (Glueck & Glueck, 1968, p. 187). They suggest that little progress can be made in the prevention of delinquency until family life is strengthened "...through a large scale, pervasive, many faceted,

continuous program designed to bring to bear all the resources..." (p. 187). They further point out that not only would families of delinquents benefit from such a program, but so too would families of non-delinquents.

Instruction in child-rearing, in the role of the father and the mother, in the need for supervision is necessary (Glueck & Glueck, 1968). Adolescents need to be educated "...in the practical skills of parenthood and in the psychological needs of children..." (West & Farrington, 1973, p. 204). The importance of pro-social parental models needs to be taught, as does the importance of spending time with children, helping them make constructive use of their leisure time, the use of love-oriented disciplinary techniques, and the importance of parental affection for their children; and this needs to be a continuing educational process after school is completed (West & Farrington, 1973). Counseling and guidance for prospective parents, prior to having a family, is desirable, even guidance in the proper selection of mates for young people (Glueck & Glueck, 1968).

Other researchers have noted the need for parental counseling and guidance (Freeman & Savastano, 1970; Gordon, 1976; McCord et al.; 1959; Stewart & Leone, 1978). McCord et al. (1959) make reference to the need for family counseling "intensive work with the families seems a prerequisite to successful treatment" (p. 183). They also note that unfortunately, parents who need the guidance tend not to seek it out, and thus agencies must take the initiative. Helping parents to resolve their own problems may allow them to give the necessary emotional support to their children. Treating the family as a unit in conjoint therapy is suggested as a means of dealing with the affluent

offender, since delinquent behaviour in this case "...seems to stem from unresolved personal conflicts rather than from social problems..." (Freeman & Savastano, 1970, p. 272). Stewart & Leone (1978) also suggest that family treatment is essential and warn that "...behavioural approaches to a child's problems are unlikely to work until his parents are helped to feel more positively about themselves and each other" (p. 116).

Behavioural contracting has been one way of dealing with families of delinquents (Alexander & Parsons, 1973; Stuart, 1971; Stuart et al.; 1976) and has met with limited success (McCombs et al.; 1978; Stuart et al.; 1976; Weathers & Liberman, 1975). McCombs et al. (1978) report on a five-year follow-up of behaviour modification with high-risk adolescents. Immediate benefits were evident, significant increases in reading and mathematics scores, improvement in social skills. The long-term, follow-up data they suggest, however, "...failed to conclusively demonstrate the long-term merits of the behavioural program..." (p. 21). Weathers & Liberman (1975) failed to find any impact of behavioural contracting on school attendance, compliance with curfew and chores, except for a possible beneficial effect for verbal abusiveness. They suggest that massive intervention involving the families and peer group are necessary, and that contingency contracting should be viewed as a supplementary aid in the overall program, and not as a "treatment package" in itself. They concluded that "for the present, contingency contracting should be viewed with caution and with limited objectives" (p. 365). Having said this, however, Alexander & Parsons (1973), in a well controlled study, have demonstrated that behavioural intervention with delinquent

families can effectively reduce recidivism in first-time offenders, suggesting that contingency contracting can be made to work. Unfortunately, the follow-up period in this study was only 18 months--too short to fully assess the impact of the results.

Maintenance of behavioural change produced by behaviour modification programs is a problem. Two researchers suggest ways of enhancing the maintenance and generalization of changed behaviour patterns (Farrington, 1979; Wodarski, Filipczak, McCombs, Koustenis, & Rusilko, 1979). Farrington (1979) notes that behaviour modification is based on the theory that the probability of the behaviour pattern occurring depends upon the associated rewards and punishments in the environment. It makes sense therefore, that reinforcement contingencies in the natural environment need to be modified if one wishes to modify behaviour (e.g. delinquent behaviour) in the real world (Farrington, 1979). Wodarski, et al. (1979) suggest that maintenance and generalization of behaviour change can be enhanced by incorporating a number of specific procedures into behavioural programs; (1) training relatives or significant others in the youth's environment; (2) training behaviours that have a high probability of being reinforced in the natural environment; (3) varying the conditions of training; (4) gradually removing the contingencies; (5) using different schedules of reinforcement; and (6) using delayed reinforcement and self-control procedures. These are taken from Kazdin (1975, 1977).

Another practical problem of behaviour modification with families is parental resistance (Tharp & Wetzel, 1969), or parental inability to apply behavioural management techniques (Patterson, Cobb, & Ray,

1973). Patterson, et al. (1973) reported that mothers alone, raising children in extreme poverty conditions had difficulty in learning and applying behaviour modification techniques. Tharp & Wetzel (1969) reported that parents raised many objections to practicing child management techniques; (1) some felt that rewarding children for desirable behaviour was "bribery" and that children should be intrinsically motivated to be good; (2) some felt that physical punishment was the best way to control the child, believing that "spare the rod was to spoil the child"; (3) some got so angry with their children that they were unable to use child management techniques (in Farrington, 1979). In these instances where parents are resistant to the use of behaviour modification techniques, Farrington (1979) suggests that the juvenile can be trained to change his parents' behaviour towards him, citing as evidence the case of a 16-year-old youth who was successfully trained to extinguish his uncooperative parents' responses to his inappropriate behaviour and to reinforce their responses to this appropriate behaviour. Nine-month follow-up data from the father in this case showed that the youth had stopped stealing and lying and was spending more time at home. Farrington (1979) concludes that "more research should be done on helping children to modify the behaviour of other people in their environment, and on helping groups of children to modify the behaviour of each other." (p. 366).

Gordon (1976) presents a parent effectiveness training model, involving fifteen 90 minute class modules, for improving parent-child relationships. Little evidence, other than that provided by the author himself (which is favourable), is available on the effective-

ness of this program. This experimental program deserves further evaluation.

Finally, West & Farrington (1973) note that "family planning is a basic necessity" (p. 203). Research consistently shows that in high delinquent areas delinquency increases with increases in family size. "Overburdened parents, with limited money and...limited skills, cannot cope with many children" (p. 203). They advocate the use of medical abortion, sterilization and widespread distribution of contraceptive information (at age 18 delinquents were found to be more sexually promiscuous, and less likely to consider contraception than non-delinquents) as a means of limiting the size of delinquent-prone families.

Strengthening family life, through any means, is a good suggestion. Programs designed to do this should be funded and evaluated. These might include instruction in child-rearing, Parent Effectiveness Training, instruction in family planning including information on contraceptives, sterilization and abortion. Such programs should focus on enhancing mother's affection, parental supervision, mother's self-confidence and reducing parental conflict and parental aggression. Universities and/or social service agencies could sponsor and evaluate such programs offered via T.V., community projects, or university extension classes. Behaviour modification techniques show great promise as a means of changing attitudes and behaviour. Research needs to be done, (1) to find ways to enhance the maintenance and generalizability of positive behavioural changes that do occur, (2) to help children to modify the behaviour of other people

in their environment, and (3) to help groups of children to modify behaviour of each other.

B Alleviating Delinquency Associated Conditions

It has been suggested that there is a need for re-distributing the wealth in some form or other, (e.g., family allowances, negative taxation) to help alleviate the conditions of poverty that so often accompany delinquency (Chilton & Markle, 1967; Fleisher, 1965; West & Farrington, 1973, 1977); massive economic programs are needed to clear slums (Wilson, 1974), and to provide re-housing (Wallis & Maliphant, 1967), to sponsor neighbourhood intervention programs (Vinson & Homel, 1975) and full employment (Berg, 1967). West & Farrington (1973, 1977) suggest that, in addition to direct support in the form of family allowances, social assistance, indirect financial support in the form of nursery schools, babysitters, are needed to provide relief for overburdened mothers. And to make these policies work, West & Farrington (1973) suggest that they "...need to be on a generous scale and directed specifically towards the most needy families" (p. 204). Glueck & Glueck (1950) also suggest that money needs to be directed toward financing "...the education of youngsters in healthy and law-abiding self-management, and...the instruction of young parents in the mental hygiene of family life" (p. 287). Chilton & Markle (1972) suggest that the provision of a reasonable minimum income would reduce delinquency due to family disruption. Fleisher (1963) calculates that a 10% rise in income would reduce delinquency rates by 15-25% in highly delinquent areas. Johnstone (1978) notes that family socio-economic status and community poverty are associated with violent acts

and criminal delinquency, and suggests that massive financial infusion in areas of low income is necessary to alleviate the more serious forms of delinquency.

Wallis & Maliphant (1967) note that delinquent areas tend to be disguised by "...overcrowded houses deficient in basic amenities, a concentration of industry and commerce, with the latter tending to increase, and by a poverty of parks and open spaces" (p. 264). They suggest that re-housing these areas would alleviate many of the adverse conditions. Wilson (1974) suggests that slum families need help urgently if they are to be given a chance to live normally. Rather than retraining, however, they need "...large scale fiscal measures to speed up slum clearance and housing schemes, to improve local amenities, to boost family income by general family allowances, to improve the job market to the inner city especially for the unskilled and the disabled, and to implement the proposed expansion of nursery provisions" (p. 254). Berg (1967) suggests that lower class delinquency may be an appropriate response to the inescapable plight of the poor. He advocates adoption of economic policies that will ensure full employment. Finally, Vinson & Homel (1975) propose a "neighbourhood" program of intervention to deal with high risk delinquency areas. This involves a three level approach: (1) community building through involvement of local residents; (2) ensuring that health and welfare services are relevant and accessible to people in the identified areas; (3) the generation of ideas for improving social policy and administration." (p. 29).

Alleviating poverty conditions, providing re-housing programs, full employment are themselves desirable goals. But whether or not

they will lead to reduced delinquency remains to be proven. Finding employment for delinquents, for example, at least for high risk youth, has not always been found to be associated with reduced recidivism (Rovner-Piecezenik, 1974); re-housing of slum areas in England has not been accompanied by lower delinquency rates; and social status (e.g. father's occupation, neighbourhood) during childhood has not been found to be a significant predictor of adult criminality (McCord, 1979). Undoubtedly, financial assistance is necessary for low income areas. But that alone is not enough. These families need help in dealing with problems of day-to-day living. Low income in delinquent families is usually associated with a constellation of unfavourable home conditions, e.g., poor parental supervision, poor child-rearing practices, separation, parental conflict, large families, all of which, themselves, are associated with delinquency proneness. Programs, which address these problems, in conjunction with financial have a much higher probability of success.

C. Role of the Schools

Schools need to be equipped to provide, (a) early identification of potential delinquents (Glueck & Glueck), 1950, 1968; West & Farrington, 1977), (b) more attractive and relevant curricula (Glueck & Glueck, 1950, 1968; West & Farrington, 1973, 1977) and (c) substitute parents (Glueck & Glueck, 1968; McCord et al., 1959). Glueck & Glueck (1950, 1968) suggest that teachers (and other community workers, recreational workers, boys' club workers, police, parents) need to be trained to recognize early and to provide treatment for pre-delinquents showing signs of undesirable tendencies (e.g. defiance

of authority, excessive feelings of hostility, extreme suspiciousness, destructiveness, sadism). West & Farrington (1977) also suggest that community resources (e.g. teachers, health workers, volunteers) can aid in the identification and counseling of future delinquents. They suggest that education of the "worst" pupils should begin earlier than grade 1, in nursery schools, since these children (the duller and more troublesome) are the ones most likely to become juvenile recidivists in later years (West & Farrington, 1973). These children need "... to have acceptance and to experience some kind of achievement, otherwise they become confirmed outcasts and rebels" (p. 206). To provide this, West & Farrington (1973) suggest greater emphasis on practical and social activities, opportunity for self-expression, and minimization of academic competition.

Other changes to accommodate the potential delinquent have been suggested by Glueck & Glueck (1968) and West & Farrington (1977). to minimize the tension, frustration, etc. experienced by pre-delinquents in the traditional school system, changes in curricula, allowing for greater flexibility and variety in programs and experiences are needed (Glueck & Glueck, 1968). One possibility is to "...set up school programs in which half the day is spent in the classroom activities and half in paid work of various kinds outside the school" (p. 193). West & Farrington (1977) suggest that changes in the school curricula are needed to "...try to accommodate and capture the interest of the active, aggressive rebel who lacks academic inclination or ability..." (p. 163). Such programs need to be tailored to individual student needs, so that failure experiences are minimized (Glueck & Glueck, 1950).

The teacher's role as a parent substitute needs to be investigated (Glueck & Glueck, 1968; McCord et al.; 1959). In view of the poor parent-child relationships, and the presence of deviant models among delinquent families, a major role as a parent substitute can be played by teachers. This would require a greater number of young adult male teachers in the early grades and kindergarten. Glueck & Glueck (1968) suggest that even "...husband-wife teams of teachers could provide a more natural and wholesome emotional climate in the classroom and present to many people a previously unknown standard of parental relations" (p. 193). McCord et al.; (1959) also points out that, in the case of deviant role models in the family, the child needs an opportunity to interact with non-deviant role models so that he will be more likely to "...internalize the values consistent with those of society" (p. 179).

Finally, community financial and educational resources may need to be concentrated more intensively in fewer areas. Intermittent treatment is at best neutral and may even be harmful (McCord et al, 1959).

School teachers, guidance counsellors in the schools, can play a major role in delinquency prevention programs. Early identification of potential delinquents is important. The prognosis for a successful outcome of treatment programs is much better for youth who have not yet established firm delinquent behaviour patterns. School curricula have changed a great deal over the past 10-15 years, and most urban schools, offer a wide range of vocationally oriented classes (e.g., mechanics, woodworking, photography, etc.) in junior and senior high school years. Schools are also hiring more male teachers, some of

whom teach primary grades, and in some cases husband-and-wife teams. All of these changes should have indirect beneficial effects in terms of delinquency prevention, and should be encouraged.

D. Improving Recreation Facilities

There is a need to provide leisure time facilities that would attract the potentially delinquent youngsters off the street (Glueck & Glueck, 1968; West & Farrington, 1973, 1977). Glueck & Glueck (1968) suggest there is a need for "...a systematic coping with the leisure time problem through carefully designed community action (programs)" (p. 195). Delinquent boys tend not to make good use of their leisure time. They tend to become members of gangs, to prefer companions older than themselves, and to dislike the confinement of playgrounds, supervised recreation, attendance at clubs; and they tend to prefer risk and adventure. Some means is needed to redirect this energy into socially constructive channels. West & Farrington (1973) note that delinquents tend to be more venturesome and impulsive than non-delinquents and suggest that the provision of "unconventional and risky pursuits, in which they can prove their masculinity..." (p. 208) may be helpful. They, too, acknowledge that constructive use of leisure time may "...divert (the adolescents') aggression from more antisocial outlets" (p. 208).

The provision of recreational programs for pre-delinquents would seem to be intuitively beneficial. For one thing, youth participating in recreational activities have less free time to engage in delinquent behaviour than those not involved in such programs. Providing facilities alone, again, is probably not sufficient. Indeed, most

communities today provide a number of facilities, e.g., Y.M.C.A., squash clubs, gun clubs, ski clubs, hockey, ball, soccer, etc. The problem appears to be more of one of attitude, interest and motivation to make use of the available facilities and organizations. Programs designed to encourage and assist pre-delinquent and delinquent families to participate in community recreational activities need to be developed and evaluated.

E. Reducing the Negative Effect of Contact with the Social Justice System

Better Management of police-youth interaction (Hraba, Miller & Webb, 1975) or minimal contact with the police (West & Farrington, 1973, 1977) and the social justice system (Wolfgang et al., 1972) is recommended as a means of reducing delinquency. Hraba et al. (1975) suggest that delinquency can be reduced by changing attitudes towards the police, and towards the entire criminal justice system. They state "Since unfriendly contact with the police is...strongly associated with delinquency, a better management of police-youth interaction is...needed in preventative programs." (p. 418). West & Farrington (1973) note that delinquents quickly develop hostile attitudes towards the police, often because of "...unsympathetic handling by the police and of unfairly loaded versions of events presented to the courts" (p. 208). They emphasize avoidance of unpleasant contacts with the police so that the offender can blame no-one but himself for his criminal behaviour. Later they note that contact with the law should be minimized as it only aggravates an already bad situation (West & Farrington, 1977). It "...alienate(s)

youths still further from their teachers and employers, and discourages their more respectable companions of either sex from continuing to associate with them" (p. 162). Wolfgang et al. (1972) also mention the deleterious effects of contact with the juvenile justice system. They found that a greater number of delinquents who received punitive treatment (e.g. institutionalization, fine, probation) than those who were given remedial disposition (i.e. the police recorded delinquent behaviour but did not process the case further) continued to violate the law and, in addition, committed more serious offenses more often. They concluded that "...the juvenile justice system, at its best, has no effect on the subsequent behaviour of adolescent boys and, at its worst, has a deleterious effect on future behaviour" (p. 252).

Formal contact with juvenile justice system, whether it be with the police or the juvenile courts, appears to have adverse effects. Minimizing contact with the police and the courts through the use of diversion programs, at least for the low risk youths, seems clearly the direction of the future. Not all youth, however, are suitable candidates for bypassing the juvenile court system. It may be necessary, for example, to process in the usual way (including incarceration) high-risk youth for reasons of protecting society's rights. Continued research and development of viable diversion programs, and the types of clients for which they work best is necessary. The development of programs for improving youth-police relations would also be helpful.

F. Employment Exploitation

West & Farrington (1973) suggest that there should be stricter controls on the employment (exploitation) of youngsters leaving school early "...to prevent them from being recruited for jobs that have no provision for training" (p. 207). These tend to be the retarded and the delinquent and are therefore the ones who need training the most. Without it, they have no occupation, tend to drift from job to job with little hope of attaining full employment.

Stricter controls on leaving school early may not be the best approach to take. Rather, the focus might better be on requiring employers to provide training (perhaps subsidized) for future upgrading after a specified time period. Another obvious approach is to advertise more fully the disadvantages of lack of formal education, or a certified trade, in long-term vocational planning.

G. Intervention After Third Offense

It has been suggested that intervention programs could be profitably delayed until after the delinquent's third offense (Wolfgang et al., 1972). They found, in their cohort study of 10,000 boys, that 46% of delinquents stopped after the first offense, and another 35% stopped after the second offense, suggesting that expensive treatment programs for the first offenders, and even the second offenders, would appear to be wasteful, particularly with limited resources available. They suggest that intervention could be delayed until after the third offense, when the number of boys requiring attention will be considerably reduced.

Delaying treatment until after the third offense contradicts the principle of early intervention before behaviour patterns become firmly established. Granted, it seems wasteful to provide treatment for those who don't need it. On the other hand, studies of early educational intervention suggest that the earlier the better (Palmer, 1978), although direct comparisons of the effects of different age of intervention have generally not been made. Palmer (1978) reviewed studies which show positive effects resulting from intervention at infancy, 24 months, or two years, or four years; and the effects appear to be stable. One study, for example, involving weekly sessions of two-hours each, at ages two and three produced significant positive effects still evident at school age. The crucial question is are third-time offenders more difficult to rehabilitate than they would have been had they been treated earlier, i.e. prior to the first offense, after the first offense, or after the second offense? My suspicion is 'yes'. But research studies are needed to confirm this suspicion. If the answer is 'no', then substantial savings in time and money would be achieved.

H. Summary & Conclusions

A number of suggestions for delinquency prevention have been made, (1) strengthening family life, (2) alleviating delinquency related conditions, (3) giving the schools a more active role, (4) encouraging delinquent and pre-delinquent families to make greater use of community recreational facilities, (5) minimizing the negative consequences of interaction with the juvenile justice system, (6) minimizing the adverse effects of employment exploitation of the

youth, and (7) directing remedial programs toward third-time offenders. All but the last suggestion seem reasonable and could well have significant positive effects in reducing delinquency. Waiting until after the third offense to treat youth seems advisable only on an experimental basis, at least until it has shown that there are not adverse consequences associated with the delay. In all areas new ideas and programs need to be developed and evaluated.

II Program Implications

A number of implications emerge from the foregoing review of diversion programs. These include, (1) the use of short-term, family-crisis counseling for low risk youth, (2) the use of longer term intervention programs for moderate and high risk youth, (3) the need to determine the optimal duration of family intervention programs, (4) further investigation into the desirability of peer group intervention, (5) the need to deal with learning disabilities prevalent in delinquent populations, (6) the need for further evaluation of the use of volunteers as an integral part of delinquency prevention programs, (7) the need for greater care in the design of evaluational studies of delinquency prevention programs, (8) the evidence for financial savings arising from the operation of diversion programs, (9) the evidence for recidivism reduction, (10) the need for further evaluation of the relationship between providing employment and delinquency reduction, and (11) the need for further evaluation of home-based programs.

A Short-Term, Family-Crisis Counselling for Low Risk Youth

Short-term, high volume programs offering family-crisis counselling appear to be effective with low-risk, but not high-risk clients (Alexander & Parsons, 1973; Baron & Feeney, 1976; Haarman et al., 1976). Baron & Feeney (1976) found that short-term (5 weeks), family counselling provided by trained probation officers significantly reduced recidivism in low to moderate risk youths (e.g., runaways, truants, those beyond reasonable control, petty theft, possession of drugs, drunk and disorderly). Alexander & Parsons (1973) found that short-term (5-6 weeks), behavioural intervention (e.g., social contracts) with delinquent families reduced recidivism in low-risk youths (e.g., runaways, ungovernable, truants, those arrested for shoplifting, possession of alcohol, soft drugs). Graduate students under the supervision of university faculty acted as interventionists. Haarman et al., (1976) found that short-term (e.g. 5 weeks), family-crisis counselling was associated with reduced recidivism for low risk (e.g. shoplifting, trauncy, ungovernable behaviour, disorderly conduct) clients. Two other similar projects, reported in Bohnstedt (1978), providing short-term, family-crisis counselling found significantly reduced recidivism for the experimental youths relative to controls.

There are methodological difficulties with these studies, which lessens the confidence in the reliability and generalizability of the findings. Nevertheless, the bulk of the evidence suggests that short-term, family-crisis counselling provided either by volunteers or paid professionals effectively reduces the probability of subsequent criminal behaviour in low-risk youths. Such programs need to be

further evaluated and improved. Perhaps if they were offered to pre-delinquents at the earliest stage of detection (e.g., kindergarten, elementary grade school) they would be even more effective as a preventative measure.

B Long-Term, Family Intervention for Moderate and High Risk Youth

More intensive, longer term, treatment appears to be necessary for moderate and moderately high risk clients (Blew, McGillies & Bryant, 1977; Knott, 1975; Ku & Blew, 1977; Phillips et al., 1973; Quay & Love, 1977; Ryan, 1974). Ku & Blew (1977) found that a program involving behavioural contracting and child advocacy of intermediate duration (4 1/2 months) effectively reduced recidivism relative to the control group in low to moderate risk clients (e.g., at least three police contacts). Knott (1975), utilizing volunteer community workers as behavioural analysts under the supervision of professionals, providing family counselling, educational upgrading and peer-group re-socialization found significantly reduced recidivism for the experimental group of moderate risk youth (e.g. court adjudicated) relative to controls. Blew, McGillies & Bryant (1977) found that a program of educational upgrading, counselling, employment placement and cultural education of relatively long-term (e.g. 12 months) effectively reduced recidivism in an experimental group of moderate to high risk clients (e.g., recent arrests, convictions for burglary, robbery or an assault related to robbery) relative to a control group. Phillips, et al. (1973) found reduced recidivism in a group of moderate risk youths (e.g. court adjudicated) relative to Boys' School and Probation youths two years following participation in a 8-12 month

residential treatment program where professional teaching parents acted as substitute mothers and fathers. Ryan (1974) found that a program of intensive remedial education and counselling for low (e.g., minor offenses including truancy, shoplifting, parole violation), mostly moderate (e.g., burglary) and a small proportion high risk (e.g., serious offenses such as stealing, armed robbery, assault, attempted forcible rape, homicide and arson) youth was associated with reduced recidivism over the year during the treatment relative to the year prior to treatment. Quay & Love (1977) found that a three-month program offering vocational counselling, job placement, educational upgrading and individual counselling was associated with reduced recidivism only for low risk clients (e.g., informal referrals by police, schools, community agencies), and not for moderate risk clients (e.g., those adjudicated as delinquents, and those designated as being in need of supervision by the juvenile court) suggesting that moderate risk clients require longer, more intensive treatment. These results, however, seem inconsistent with those of Ku & Blew (1977) in which, a 4 1/2 - month treatment program was associated with reduced recidivism in moderate risk clients (e.g., youths who had two or three previous police contacts). Further study is needed to evaluate alternate programs to determine what length and what kinds of programs are most effective with low, moderate and high risk clients.

C Duration of Family Intervention Programs

The optimal duration of family intervention programs needs careful investigation. The shorter, the better, from a financial standpoint, and perhaps from a psychological view point to avoid

creating a dependency on welfare services. But short-term programs (e.g., 5-6 weeks) appear to be effective only with low risk clients (Alexander & Parsons, 1973; Baron & Feeney, 1976; Haarman, et al., 1976). Longer term (e.g., 4 1/2 months - 12 months), more intensive programs appear to be necessary for moderate to high risk clients (Blew, McGillies & Bryant, 1977; Knott, 1975; Ku & Blew, 1977; Philips, et al., 1973; Ryan, 1974). One study of a three-month program found reduced recidivism for low risk clients only, and not for moderate risk clients (Quay & Love, 1977), suggesting that three months in-program-time may not be sufficient length for moderate risk youth. At the other end of the continuum, one study found no positive effects and some negative effects of a five-year treatment program involving family counselling, academic tutoring, and recreational guidance provided by trained counsellors for low risk clients, (McCord, 1978). McCord (1978) reported on a 30-year follow-up of a family intervention program introduced in the 1930's, which suggests that not only may long-term programs not produce positive effects, but also they may produce negative effects. Researchers need to investigate thoroughly the optimal length of family intervention programs and long-term follow-up data (e.g., 10, 20, 30 years) may be necessary for an accurate indication of the effects of the program.

D Peer Group Intervention

Peer group intervention needs further research. One study investigated ways of influencing positively anti-social peer groups (Knott, 1975). Four approaches were investigated: (1) the street corner approach, i.e., working with the naturalistic peer group in its

own setting; (2) leader influence approach, i.e., convince the leader to accept a pro-social value system, and influence the group through him; (3) key individual approach, i.e., providing key individuals in the group with pro-social experience in another group, returning these individuals to their own group and influencing the group through them; and (4) the establishment of new pro-social peer groups, which turned out to be more difficult, more time consuming than starting anew. The assistance of youngsters who had already successfully completed the peer group training was found to facilitate the establishment of new pro-social peer groups.

Peer group intervention is intuitively appealing. It is well known that peer group pressure is a powerful force influencing the behaviour of adolescents. If this influence is negative then the resulting behaviour will be negative; if it is positive then behavior will be positive. Researchers in the Knott (1975) study judged that 60% of the youths in their sample could benefit from peer group therapy. No differences were found, however, in re-arrest rates between those youths who received peer group therapy and those who did not. As the author notes, a fair test of the effectiveness of peer group therapy was not attained, however, since subjects were not randomly assigned to therapy or no therapy and the two groups, therefore, may have differed systematically at the outset, which would account for the lack of findings. Further research is needed to determine the usefulness of peer group intervention in reducing delinquency.

E Learning Disabilities

Remedial programs dealing with learning disabilities (and neurological deficits) need to be a component of educational upgrading programs for delinquents. Two studies, the only ones that tested for it, found a high percentage of delinquents suffering from learning disabilities (Blew, McGillies & Bryant, 1977; Knott, 1975. Knott (1975) found that 67% of the experimental sample exhibited cross-hemispheric dominance, suggesting deficits in neurological functioning. Coincidentally, 75% of them had multiple learning disabilities. Blew, McGillies & Bryant (1977) found that 78% of their sample had at least one learning disability and 71% of them had multiple learning disabilities. The most common learning disabilities were faulty auditory discrimination, followed by auditory and visual memory deficits. The relationship between neurological deficits, learning disabilities and delinquency needs further study.

F Use of Volunteers

The use of volunteers (e.g., university students, community workers) as tutors, advocates, counsellors has proven successful (Alexander & Parsons, 1973; Blew, McGillies & Bryant, 1977; Knott, 1975; Ku & Blew, 1977; Quay & Love, 1977; Ryan, 1974). Alexander & Parsons (1973) used graduate students under the supervision of university faculty as family interventionists using a behaviour modification approach, e.g., social contracts, social reinforcement. Ku & Blew (1977) used volunteer graduate and undergraduate students under the supervision of university faculty to provide support services to delinquent and pre-delinquent youths. Behavioural

contracting and child advocacy approaches were used to help the youths meet their responsibilities and satisfy their needs. Knott (1975) used volunteer community workers under the supervision of professionals as behavioural analysts, who worked with youths and their families providing family counselling, educational upgrading and peer group re-socialization. Blew, McGillies & Bryant (1977) used community volunteers as coordinators, teachers aides and administrative assistants to provide educational upgrading, counselling, employment placement, and cultural education to adjudicated delinquents. Ryan (1974) used volunteer university students as tutors in an intensive remedial education program. Quay & Love (1977) used community volunteers to assist in providing vocational counselling, job placement, educational upgrading and counselling.

The use of community volunteers, particularly university students, as interventionists has been shown to be successful, and it reduces the cost of the program considerably. Further evaluation, however, is necessary to determine what kinds of volunteers work best with what kinds of clients. It may be that senior high school students under the supervision of professionals can also be effectively utilized as advocates for delinquent youths. This would considerably increase the availability of interventionists.

G Experimental Design in the Evaluation of Delinquency Prevention Programs

Greater care needs to be taken in the design of evaluational studies of delinquency prevention programs to avoid the methodological

difficulties of past studies. Bohnstedt (1978) in his review of 11 California diversion projects noted that properly designed studies employing appropriate controls and follow-up periods are needed to compare the relative effectiveness of alternative procedures for dealing with delinquent youth. Gibbons & Blake (1976) reviewing nine studies of juvenile diversion programs conducted throughout the United States mention a number of methodological difficulties with such studies: (1) non-comparability of experimental and control groups, (2) short, post-treatment follow-up periods, (3) small sample size, and (4) lack of a control group. A number of methodological difficulties are evident from the studies reviewed herein, (1) a small number of subjects in the experimental and control groups, particularly in the control groups, (2) youth in the control groups not remaining free of some kind of treatment, (3) lack of random assignment to experimental and control groups, and (4) insufficient post-treatment follow-up time. Small number of subjects, non-random assignment of subjects to experimental and control groups, and contamination of control groups all mitigate against reliable and generalizable results. The lack of a comparable non-treatment control group makes it impossible to confidently attribute significant effects to the treatment program. The lack of post-treatment follow-up data makes it impossible to determine whether initial significant effects are maintained. At least 3-5 years follow-up data are necessary, and 10-20 year follow-up data may be desirable until the optimal follow-up time is determined.

H Financial Savings

Contrary to Bohnstedt's (1978) conclusion there does appear to be financial savings in the operation of diversion programs relative to the traditional court system (Baron & Feeney, 1976; Blew, McGillies & Bryant, 1977; Philips, et al. 1973; Ryan, 1974). Baron & Feeney (1976) reported a 50% reduction in the overall cost of providing a family counselling program through the use of probation officers relative to the traditional juvenile court procedure. Blew, McGillies & Bryant (1977) reported that the per-client cost in the operation of a community based program offering educational upgrading, counselling, employment placement and cultural education was about one-third that of incarceration. Similarly, Philips, et al. (1973) report that the cost of handling youths at Achievement Place, a residential treatment facility, was about one-half to one-third to that required in an institution. And Ryan (1974) estimated that the cost of providing intensive remedial education and counselling to youths was about one-half to one-third of that of institutional programs.

The costs of such programs need to be carefully recorded and reported so that relative costs can be compared. Many reports do not include cost-effectiveness information.

I Recidivism Reduction

Also contrary to Bohnstedt's (1978) view, recidivism was reduced relative to controls, or projected recidivism rates (Alexander & Parsons, 1973; Baron & Feeney, 1976; Blew, McGillies & Bryant, 1977; Knott, 1975; Ku & Blew, 1977; Phillips, et al. 1973; Quay & Love, 1977; Ryan, 1974). Alexander & Parsons (1973) found that short-term,

behavioural intervention with delinquent families was associated with significantly reduced recidivism rate for the treatment group relative to three comparable control groups. Baron & Feeney (1976) reported that short-term, family crisis counselling provided by probation officers led to a significantly reduced number of court petitions and number of repeat offenses for the experimental group relative to the control group. Knott (1975) reported that family counselling and educational upgrading provided by volunteer behavioural analysts was associated with significantly reduced recidivism over an 18 month period for the experimental group relative to a control group. Ku & Blew (1977) found that family intervention provided by volunteer graduate and undergraduate students was associated with a significantly reduced number of severity of police contacts and court petitions for the experimental group relative to the control group. Blew, McGillies & Bryant (1977) found that a program of educational upgrading, counselling, employment placement and cultural education provided by community volunteers and professions was associated with significantly reduced recidivism for the experimental group relative to the control group. Phillips, et al. (1973) concluded that family style residential treatment by professional teaching parents significantly reduced recidivism for the experimental group relative to Boy's School and Probation Youth groups. Quay & Love (1977) reported that a program offering vocational counselling, job placement, educational upgrading and individual counselling significantly reduced recidivism in low-risk youths relative to controls. Ryan (1974) found that intensive remedial education and counselling was associated with significantly reduced criminal

activity during the six months post program time relative to the six months prior to the program entry. No control group was established in this study. The last study by Haarman, et al. (1976) in which short-term, family crisis counselling was offered reported very low recidivism rates for the experimental youths -- recidivism rates comparable to other successful programs such as those reported by Phillips, et al. (1973) and Knott (1975), although no comparison data were provided.

In summary, recidivism does appear to be reduced, at least in the short-term. Three-to-five year (and perhaps longer) follow-up evaluation, however, is needed to ensure that the beneficial behavioural changes are maintained.

J Employment and Delinquency Reduction

The effectiveness of providing employment in reducing delinquent behaviour needs further investigation. Apart from its being a desirable goal in itself, it is not clear that employment placement is related to delinquency reduction. Clearly, employed youths have less time available than unemployed youths to engage in delinquent behaviour, and remuneration from the employment provides the opportunity for need satisfaction, both of which would seem intuitively to eliminate some motivation toward delinquent behaviour. Still, research results have not consistently supported the supposed negative relationship between employment and delinquency (Fishman, 1977; Blew, Gibbons & Blake, 1976; McGillies & Bryant, 1977; Quay & Love, 1977). Fishman (1977), reviewing 18 diversion programs which provided a combination of remedial education, job placement and mental

health counselling with high risk clients (e.g., mostly offenders and ex-offenders, but some pre-offenders), concluded that job placement did not effectively reduce recidivism with this group. It should be noted, however, that 55% of the clients in these studies were adults (e.g., 19 years or older), as well as being high risk and results, therefore, are not directly applicable to the low risk, younger aged group, which is the focus of study in the present report. Results must be taken as suggestive only.

Three studies, however, did find support for an association (although not unequivocal) between employment and reduced delinquency (Blew et al, 1977; Gibbons & Blake, 1978; Quay & Love, 1977). Blew et al (1977), investigating the effect of educational upgrading, counselling, employment placement and cultural education on adjudicated upgrading, counselling, employment placement and cultural education on adjudicated delinquents (moderately high risk), found a significantly lower re-arrest rate for the employed youths compared with unemployed youths. The re-arrest for the unemployed youths was approximately 1/3 that of the unemployed youths, suggesting that employment, per se, is significantly associated with less delinquency. Gibbons & Blake (1976), in their review of nine studies of juvenile diversion programs in the United States, report on one program (Project Crossroads) which provided employment and counselling services to moderate risk youth (e.g., first-time offenders) and found significantly reduced recidivism for the experimental group relative to a control group, suggesting that counselling and employment can have positive effects. The difficulty here, however, is that the effects of employment have not been shown to be independent of the

effects of counselling, which itself is known to be effective. Similarly, Quay & Love (1977), investigating a program offering vocational counselling, training and job placement, education upgrading and counselling, found significantly reduced recidivism in low risk experimental youth relative to a control, but no evidence is provided for the effects of employment independently of the effects of the other variables (e.g., educational upgrading, counselling). Further research is needed to determine if job placement alone is sufficient to reduce delinquency.

K Home-Based Programs

Nonresidential, home-based programs need to be developed and evaluated. Not only are they cheaper to operate, but behavioural changes supported by contingencies in the home environment should have greater generalizability and stability over time (Farrington, 1979; Wodarski, et al. 1979).

L Summary & Conclusions

A number of implications for delinquency prevention programs have been made, (1) use short-term, family crisis counselling for low risk youths, (2) provide longer term family intervention programs for moderate and high risk youths, (3) exercise greater care in the design of evaluational studies of delinquency prevention programs, (4) further evaluate, (a) the optimal duration of the intervention programs, (b) the efficacy of peer group intervention, (c) use of volunteers as part of delinquency prevention programs, (d) the efficacy of providing employment for delinquents and pre-delinquents,

(e) home-based programs, (f) financial savings resulting from delinquency prevention, and (g) programs designed to counteract learning disabilities in delinquent and pre-delinquent populations.

IV

SUMMARY

A Objectives and Methodology

The purpose of the present paper was to review, (1) the literature on family relationship variables and delinquency, and (2) programs attempting to influence family variables in the control and prevention of juvenile delinquency. Computer searches were made of Sociological Abstracts (completed May, 1978), Psychological Abstracts (completed March 30, 1978), Social Sciences Citation Index (completed May 16, 1978), the National Criminal Justice Reference Service (completed February, 1978). Manual search for relevant articles and books at the University of Saskatchewan library and others (e.g. National Council on Crime and Delinquency Information Centre) was also carried out. In an attempt to update information on the programs reported herein a letter requesting recent developments was sent to all project directors in September, 1979. Replies were received from only two of nine project directors, and reported no change in the status of their programs.

B Principal Conclusions

Many significant inter relationships have been found among family variables and delinquency. There are generally consistent and replicable. Still, the precise nature of the relationship between many of these variables and delinquency is as yet unclear. Similarly, studies evaluating programs attempting to influence family variables in the control and prevention of delinquency report many

positive findings, but because of methodological difficulties inherent in these studies firm conclusions are difficult to draw. The following conclusions, therefore, must remain tentative.

1. Lax, restrictive, inconsistent or harsh physical discipline is associated with high delinquency. Inconsistent discipline obscures the distinction between approved and disapproved behaviour; lax discipline provides inadequate guidance in this distinction; while extreme restrictiveness and physical punishment lead to frustration and bitterness. Love-oriented discipline involving reasoning is associated with low delinquency.

2. High parental supervision is associated with low delinquency, particularly under extremely adverse conditions (e.g. poverty, parental criminality).

3. High family cohesiveness (low parental rejection) is associated with low delinquency. Mutual parent-child acceptance is crucial in the prevention of delinquency. Parental rejection along with parental deviance is particularly damaging; boys with cruel, neglecting, alcoholic or criminal fathers are particularly prone to delinquency, as are boys with non-loving, punitive, alcoholic or sexually promiscuous mothers. Rejecting families breed rejecting families; rejecting parents have themselves been rejected as children.

4. Parental conflict is positively associated with delinquency, although the relationship appears not as strong as that between other

family variables and delinquency (e.g. parental supervision, mother's affection, mother's self-confidence). Marital disharmony also runs in the family; fathers of delinquent boys also come from disharmonious homes.

5. Broken homes is associated with high delinquency, although again, the relationship appears weaker than other family variables in the causal chain explaining delinquency. It appears to be the family disruption created by broken homes rather than broken homes per se is the crucial factor. Positive family relationships minimize the adverse effects of broken homes. Homes broken by divorce or separation are more damaging than those broken by death or illness. The adverse effects of broken homes appears to be independent of age of separation, and the effects are equally damaging for boys and girls for other than moral offenses (girls are more strongly affected than boys for moral offenses, only because premarital sexual activity is an offense for girls, but not for boys). Both mother and father absence is detrimental, with mother absence being slightly more so. Broken homes tends to be associated with the more serious crimes.

6. Family criminality, whether it be parents or siblings is a powerful predictor of children's delinquency. The probability of a boy becoming delinquent has been found to increase more than two-and-a-half times if he has an older member of the family convicted of a criminal offense.

7. Large family size is related to high delinquency, and this relationship remains when income, socio-economic status, parental criminality and family composition (e.g. age, sex) have been controlled. Large family size tends to be associated with overcrowding, competition for parental attention, emotional strain and inadequate parental supervision, all of which are conducive to delinquency.

8. The supposed negative relationship between maternal employment and delinquency appears to be moderated by a number of factors, e.g. child supervision, father participation in the child-rearing process, family size, income, family conflict. In homes where the mother arranges for proper supervision of her child in her absence, where the father actively participates in the child-rearing process, where there is a positive family relationship, where family size is moderate and income is adequate, the probability of the child becoming delinquent, whether or not the mother works, is very low. Indeed, a recent study showed that maternal employment can be associated with better offspring adjustment than maternal non-employment, if proper care is taken.

9. Allowance appears to be curvilinearly related to delinquency, with high delinquency being associated with either too little or too much money, and low delinquency being associated with a moderate amount of money. The dilemma concerns adolescent need satisfaction and parental control over the adolescent. A large amount of money allows high need satisfaction, but low parental control and is

associated with high delinquency. On the other hand, a small amount of money is associated with low adolescent need satisfaction, high parental control, but still a high degree of delinquency. An optimal amount of money is associated with moderate need satisfaction and the lowest degree of delinquency. Few researchers have addressed this issue; more work need to be done.

10. Frequent family recreation is associated with low delinquency. Family recreation provides the opportunity for family members to interact on a positive rather than the usual negative basis. Positive interaction increases affectional bonds between parents and children and thereby facilitates parental control. Again, relatively little research has been directed toward this area and more work needs to be done.

11. Assignment of freedom and responsibility to adolescents has been found to be curvilinearly related to delinquency. Too much freedom deprives the adolescent of supervision and control, and the opportunity to develop the appropriate internal moral standards. Too little freedom deprives the adolescent of the opportunity for interaction with his peer group and gradual transition to adult status. An optimal amount of freedom and responsibility is associated with low delinquency. As with the above, little research in this area has been done and more is needed.

12. Social class (income) has been found to be negatively related to delinquency, although the relationship appears not as strong as family

variables (e.g. mother's supervision, mother's affection) and disappears when such factors as intelligence, family stability and parental criminality are controlled. Family stability appears to moderate the negative effects of economic variables on delinquency; the more stable the family, the less likely delinquency will occur in both low income and high income families. Nevertheless, low SES boys are the more likely to be recidivists, chronic offenders, young delinquents, one-time delinquents, and to commit more serious crimes than higher SES boys.

13. Of family variables describing social status (e.g., neighborhood, father's occupation), parental characteristics (e.g., parent aggressiveness, mother's self-confidence, father's deviance) and child rearing practices (e.g., mother's affection, parental supervision, parental conflict) parental supervision followed by mother's affection during childhood appear to be the two most important variables accounting for adult criminality.

14. Diverting youths from the traditional juvenile justice system to a program involving one, or a combination of counselling, educational upgrading, job placement, does appear to be a viable alternative to the usual court procedure; it is less expensive and it reduces recidivism.

15. Short-term, family-crisis counselling appears to be effective with low risk clients, but not with high risk clients.

16. More intensive, longer-term, treatment appears to be necessary for moderate and moderately high risk clients.

17. Remedial programs directed at correcting learning disabilities (and neurological deficits) may need to be a component of educational upgrading programs for delinquents.

18. The use of volunteers as tutors, and counsellors, in delinquency prevention programs, has proven successful.

19. Home-based, community-oriented delinquency prevention programs appear to be the direction of the future.

20. Evaluation studies of delinquency prevention programs, in general, are poorly designed.

21. The efficacy of peer group intervention has not been determined.

22. The optimal duration of family intervention programs has not been addressed.

23. The effectiveness of employment counselling and placement in reducing delinquency has not been determined.

C Implications For Policies, Operations And Research

1. Strengthening family life through education, counselling, therapy, parent training is likely to have high pay-off. Programs

designed to do this need to be developed and evaluated. These might include instruction in child rearing, family planning including information on contraceptives, sterilization and abortion. Such programs should focus on enhancing mother's affection, parental supervision, mother's self confidence and reducing parental conflict and parental aggression. Universities and/or social service agencies could sponsor and evaluate such programs offered via television, community projects, or university extension classes.

2. Providing financial assistance is likely necessary in low income areas to provide a reasonable family income. Financial assistance alone, however, is probably not sufficient to reduce delinquency. Delinquency-prone families, in addition to low income, usually manifest a whole host of unfavourable home conditions, e.g., poor parental supervision, poor child rearing practices, separation, parental conflict, all of which are associated with delinquency proneness. Programs which address these problems, in conjunction with financial assistance, are more likely to succeed.

3. School teachers, guidance counsellors in the schools, can play a major role in delinquency prevention programs. They are in an excellent position to identify early and provide counselling, or referral, to potential delinquents. Early identification of potential delinquents is important. The prognosis for a successful outcome of treatment is much better for youths who have not yet established firm delinquent behaviour patterns. To be able to do this teachers would need special training, and probably assistance from consultants, both of which would cost extra money but be worth it in the long term. Such programs need to be developed and evaluated.

4. The provision of leisure time facilities alone is not likely to have high pay-off in terms of delinquency reduction. Indeed, most communities today provide an ample number of facilities. The problem is more one of convincing delinquent and pre-delinquent families to participate in community recreational activities and to utilize the facilities. Such programs need to be developed and evaluated.

5. Contact with the social justice system appears to be detrimental. Contact, therefore, should be minimized, at least for minor, first-time, offenders. Continued use, research and development of viable diversion programs for delinquent youths is recommended. Programs for improving youth-police and community-police relations should also be helpful.

6. There is a need for researchers to compare the general effectiveness of alternate delinquency prevention programs to determine which are most effective with what kinds of clients. Short-term, family-crisis counselling has been shown to be effective with low-risk youths, while longer term, more intensive family intervention appears to be needed to deal with moderate and high-risk youths. Further study, however, is needed to determine what length and what kinds of programs are most effective with low, moderate and high-risk clients.

7. The optimal duration of family intervention programs needs careful investigation. A recent 30-year follow-up study on a long term (5 years) treatment program involving family counselling, academic tutoring and recreational guidance for low risk clients found no lasting positive effects and, some negative effects (e.g., greater likelihood of alcoholism, greater likelihood of committing more than

one crime, greater manifestation of serious mental illness, lower economic status, less work satisfaction, greater number of stress related diseases, younger age at death). These results require verification, and if accurate, indicate the necessity of determining the optimal length of intervention programs, and of finding ways of minimizing potentially adverse effects.

8. Further research is needed to determine the usefulness of peer group intervention in reducing delinquency. Peer pressure is a powerful force influencing the behaviour of adolescents, and could prove a valuable technique for instilling pro-social norms and values in delinquent and pre-delinquent youth. One study attempted to do this. The results were inconclusive. More research is needed.

9. Community volunteers (e.g., university students) are an extremely valuable source of manpower for community based delinquency prevention programs. The use of volunteers as tutors, counsellors, under the supervision of professionals, has proven successful in a number of experimental studies and should be continued. Further evaluation of their use, however, is necessary to determine what kinds of volunteers work best with what kinds of clients. It may be that senior high school students, under the supervision of professionals, can also be effectively utilized as companions, counsellors and tutors for pre-delinquent youths. This would considerably increase the availability of interventionists for such programs.

10. Apparently a high percentage (75%) of delinquents and pre-delinquents suffer from learning disabilities and this needs to be verified. If this is indeed the case, then remedial programs dealing with learning disabilities need to be a component of educational

upgrading for delinquents. The entire area, i.e., the proportion of delinquents suffering from learning disabilities and the relationship between neurological deficits, learning disabilities, and delinquency, is in need of further study.

11. Research results to date have not consistently supported the assumed negative relationship between employment and delinquency. In addition, for those studies that do support the hypothesis, there invariably is confounding between employment and counselling making it impossible to attribute the beneficial effects to employment placement alone. Further research is needed to determine if job placement by itself is sufficient to reduce delinquency.

12. Home-based programs would appear to be the direction of the future. Behavioural changes supported by contingencies in the home environment have a greater chance of survival. Development of such programs should be encouraged.

13. Of extreme importance, is the need for better designed evaluational studies. Most studies are inadequate methodologically, making it extremely difficult to draw conclusions of any kind. In particular, there needs to be careful assignment of subjects to experimental and control groups, specifying clearly the selection criteria; these needs to be a clear description of the procedures followed; and there needs to be sufficient post-treatment follow-up time to properly evaluate the effectiveness of the program. The optimal length of post-treatment follow-up is not known. Probably a minimum of five years is necessary for 13 and 14-year-olds, while 10-15 years follow-up may be necessary to obtain a reasonably accurate assessment for younger aged youths, e.g., 7-8 year olds.

14. There is a need for delinquency prevention programs to be funded for a sufficient time period for the program to be developed, stabilized and evaluated. Programs will differ, but the typical one may require 6-8 months start-up time, 6-12 months intervention period, and probably should have 3-4 post-treatment follow-up periods at something like 1, 5, 10, 15 - year stages following treatment to accurately determine the effectiveness of the program. The importance of follow-up data cannot be over-emphasized. A treatment program which deters delinquency only during in-treatment program time does little more than incarceration. A commitment for follow-up studies should be made at the time of the awarding of the initial grant.

APPENDIX A: DETAILED DESCRIPTION OF DIVERSION PROGRAMS

A The Adolescent Diversion Project. Urbana-Champaign, Illinois. - Ku & Blew (1977).

The Adolescent Diversion Project (ADP) was operated by the Community Action Center of the University of Illinois. It was implemented in 1972 in Urbana-Champaign, and took place over a three year period, with the first year being a pilot test year and the last two years, experimental. Support and guidance was provided to the youth and their families by volunteer university students under the supervision of professionals.

Organization

The Adolescent Diversion Project involves children, parents, professors, graduate and undergraduate students, policeman, teachers, and community social service workers in a cooperative attempt to help youngsters in trouble with the law. It uses the educational pyramid model for training future professionals and nonprofessionals, and implementing the diversion program. The model combines the use of graduate students in the program administration and training with undergraduates or other nonprofessionals (e.g. community volunteers) as workers, under the supervision of an experienced professional. The Adolescent Diversion Project was part of a larger program staffed by two principal investigators. Under their direction The Adolescent Diversion Project director (an advanced graduate student) is

responsible for the day to day operations. Reporting to the project director are two clinical supervisors and a research supervisor (graduate students), who are responsible for the training and supervising of the undergraduate student volunteers and paid staff (part-time coders, interviewers).

Clients & Referral Source

Referrals were received from the police who judged the youth as being beyond the "lecture and release" stage. One-third of the youths was assigned to a (1) control group, with two-thirds assigned to one of two experimental groups, (2) behavioral contracting and (3) child advocacy. In the first year of research (1973-74), 37 youths went through the program, and in the second year (1974-75) there were 36. The type of offenses for which they had been arrested ranged from very minor (curfew violations) to very severe (attempted murder).

Of the 37 youths referred to the program, during the first year, 28 were male, nine were females; 28 were white and nine were black; and the mean age was 14.1 years, with a range of 11-17 years. The average grade level was grade eight. The average number of police contacts in the year prior to referral was 2.16. They were randomly assigned to the experimental (N=25) and control (N=12) groups, according to a stratified procedure controlling for time of referral, sex, race and referring juvenile offices.

Of the 36 youths referred to the project during the second year, 33 were male and three were female; 21 were white and 15 black; and the mean age was 14.5 years. All were from lower- to lower- middle class families, and they had an average of 2.22 police contacts in the

year prior to program referral. As in the previous year, youths were randomly assigned to the experimental (N=24) and release control (N=12) groups, using a stratified procedure.

Intervention

Upon referral youths and their parents are interviewed and the program explained to them. The interviewer then administered four assessment instruments to the youth and the parent: (1) the Marlowe-Crowne Social Desirability Scale (1963) -- to assess the positive description of behaviour, (2) a 16-item version of Rotter's Internal-External Locus of Control Scale (1966) -- to measure the degree to which people see themselves having control over their own destiny, (3) an especially developed social labelling scale--to assess the degree to which the youths see themselves as having been labelled 'delinquent', or 'deviant' by others, and (4) a 15-item behavioral check-list of commonly committed offenses-- to assess self-reported illegal activities during the past 3 months. Youths are asked to nominate a close friend, whom they are told would be asked to complete the same assessment instruments with the youth as the referent. Nominated peers are interviewed within 48 hours of the referral. Both the youths and the nominated peers are paid \$5.00 for completing the results.

Following the initial assessment period youths are randomly assigned to either an experimental or control group. Those assigned to a control group are released and have no further involvement with either the police or the project until 18 weeks later when they are contacted for post-assessment. Those assigned to the experimental

group are introduced to a volunteer university student, who spends a great deal of time getting to know the client. The volunteer student may call on the youth at his home several times a week in the first few weeks establishing such common grounds of interest as sports, rock music, or automobiles. A majority of the time is spent together in recreational settings. During the "getting acquainted" stage, the volunteer students attempt to assess the youth's family and peer relationships, and school or neighbourhood problems. This information is used to develop the best intervention strategies, to meet individual needs. In general the youngsters are receptive to the university students, many of them "hitting it off" after a couple of meetings. Some were not so friendly, however, displaying hostility and disinterest, and a great deal of time and effort is required to overcome these feelings.

Some of the youths had additional police contacts within the first few weeks of referral to the ADP. This created special problems for the student volunteer, who was forced to focus attention on the youngsters immediate needs rather than long range intervention plans. In this case, the student took the position of a sympathetic friend and companion which, may in itself be an important intervention technique (Ku & Blew, 1977).

Student volunteers are expected to devote 8 - 10 hours weekly to the project, 2 hours for training and supervision, and 6 - 8 hours working with the youth. The total intervention period is 18 weeks, including the first few weeks required to establish rapport and design a treatment program. Too long a period, it is reasoned, would lead to too great a reliance by the youth on the student volunteer. Toward

the end of the 18 week period the youths are encouraged to lessen their reliance on the student and become more independent.

Two intervention approaches are used, (1) behavioural contracting, and (2) child advocacy. The behavioural contracting approach, outlined by Stuart (1971), is taught too students as part of the university credit class. Briefly, delinquency is seen as the result of reinforcement of inappropriate behaviour, with little or no reinforcement for the desired behaviour by parents, teachers, and other authority figures. The focus of intervention is on eliciting positive behaviour through the use of written contracts specifying each parties' responsibilities and privileges. For example, a contract between a youth and his parents may contain the terms of agreement for the extension of curfew hours if the youth agrees to inform his parents where he is going and when he will be home.

Student volunteers have a great deal of responsibility under this scheme. They mediate any disagreement in contract negotiations; they monitor performance to insure that the contracts are adhered to; and they insure that the contract is fair to all parties concerned. Written contracts are negotiated at about the 4th week in the intervention phase, after rapport and trust have been established, and the volunteer student has had a chance to assess the clients situation.

Often contracts need re-negotiation; and this is a critical point. The desire to re-negotiate a contract may reflect legitimate inequities in responsibilities and privileges for the parties, or it may reflect a lack of commitment (for which contract renegotiation is a symptom). If parts of the contract proves to be inequitable, or

unrealistic, then it is important that this be detected at any early stage and rectified. If it represents a lack of commitment (cop-out) then this too must be identified and dealt with. In either of these cases contracts may be re-negotiated anytime after the initial one, but as a general rule it is suggested re-negotiation should not be considered until at least 4 weeks following the implementation of the initial agreement. All parties, including the supervisory group, have input into the re-negotiation process.

At about the 14th week, four weeks prior to termination of the student involvement, the student volunteer reviews the behavioural contracting process with the youth and other persons involved in the contract, and begins to ease himself out, so that by the 18th week he can terminate his services.

The child advocacy explanation of delinquency maintains that youths have the right to community resources. The focus of intervention is on identifying individual needs and acquiring community resources to satisfy these needs. The youths' needs are met by adapting the community resources to the individual. Persuasion strategies ranging from pleading to threats are the mode of intervention. The role of the volunteer student is that of an advocate, supporter, advisor, representative in the clients' dealings with the court, the police, social services, and other agencies that affect his well-being. The goal of intervention is to increase the quantity and quality of resources to the youth and to teach him to gain access to these resources on his own.

By way of an example, the child advocacy method of dealing with a 12-year-old pre-delinquent might be to set out the following

strategies as a means of meeting the youth's needs: (1) advertising in the neighbourhood of the youths availability for odd jobs, (2) contacting the local youth hockey club for information about eligibility requirements, time commitments, fees; (3) registering for a weekly gymnastics program after school; (4) registering for the Saturday swimming program at school; (5) attending an organizational meeting for the neighborhood boy scouts troop. These strategies were in response to the youth and his parents' desire that he (1) should be earning his own money, (2) joining a hockey club, (3) becoming involved in a recreational group, (4) becoming involved in a nature study group.

Strategies and responsibilities change with changing circumstances. In the above example, the youth's family decided that they would be moving to another city, after the first year. The volunteer student and the youth then turned their attention to preparing for the move, by obtaining information on some of the activities in the new community.

A number of changes were introduced during the second year of research, (1) a separation of the training and supervisory orientations of behavioral contracting and child advocacy, (2) the inclusion of process interviews, and (3) changes in the pre-post-attitude questionnaire measures, in an attempt to clarify the treatment process. The training and supervisory orientations of behavioral contracting and child advocacy were separated in an attempt to differentiate the effects of behavioral contracting and child advocacy treatments. College students in each of these conditions received exclusively either a behavioral contracting orientation or a

child advocacy orientation, with no overlap (as was the case earlier). Different training manuals and master evaluations were used. To obtain a more detailed understanding of the critical components of the intervention approaches, process interviews were conducted at 4, 10 and 16 weeks after referral. The youths, their parents, the volunteer students, and the student supervisor were interviewed. Several changes in the questionnaires were introduced, (1) the Gough-Peterson (1952) Socialization Scale was used as an indicator of socialization, (2) the Nowicki-Strickland (1973) Locus of Control Scale was used as a measure of internal-external locus of control, (3) a card-sort procedure developed by Gold (1970) was used as a measure of self-reported delinquency. As before, questionnaire measures were obtained from the youth, one of his parents, and a nominated peer.

Results

Results are presented separately for the first and second year intakes. Data were obtained from (1) pre-, post-questionnaire measures, (2) police and court records, (3) school records, and in the second year only (4) process analysis. Evaluation of the first year intake showed, (1) no differences between experimental and control groups in the number of police contacts, seriousness of police contacts, or the number of petitions filed with the court, during the one year prior to referral to the ADP, (2) no significant changes on any of the verbal report measures from the youths, their parents, or their peers for either the experimental or the control groups, (3) significantly fewer number of police contacts, severity of police contacts, and number of petitions filed for the experimental groups

relative to the control group over the approximately 27 month interval from time of referral to the two-year follow-up point, (4) no significant change over the 27 month period in grade-point average and school attendance for any of the groups, and (5) no significant differences in number of police contacts, seriousness of contacts and number of petitions filed between the behavioral contracting and the child advocacy experimental groups either during the treatment period or the follow-up period.

Results of the second year were very similar to those of the first year evaluation. Evaluation of the second year intake showed, (1) no significant changes on any of the verbal report measures from the youths, their parents, or their peers for either the experimental or the control groups, (2) significantly fewer number of police contacts, severity of police contacts, and number of petitions filed for the experimental groups relative to the control group during the time period from referral to one-year follow-up, (3) no differences in grade-point average between the experimental and the control groups, but a significantly better school attendance for the experimental groups during the time from referral to the two-month follow-up period, (4) no differences in the number of police contacts, seriousness of contacts, and number of petitions filed between the behavioural contracting and child advocacy experimental groups either during the treatment period or the one-year follow-up period.

Process analysis indicated, (1) that the two intervention techniques, behavioral contracting and child advocacy, were behaviorally distinguishable, i.e., the contracting condition was carried out according to the contracting model, and the advocacy

condition followed the advocacy model, (2) that the success, or failure, of each procedure was determined by the focus of the intervention. One or more further police contacts and/or less than 2 days per week attendance at school was considered failure of the intervention, while conversely, no further police contacts and an average of 2 days per week and conversely, no further police contacts and 2 days or more school attendance per week was considered successful. The behavioral contracting group success was associated with focus on changes on the family area, and in the youths school performance; while failure was associated with difficulty in initiating the contracting model with less focus on improving relationships and school performance, and more emphasis on finding employment.

Success for the child advocacy group was associated with emphasis on finding employment, working with the youths friends, improvement in the school performance, and some work with the family. Failure for this group was associated with no family intervention, minimal school intervention and uninvovement with socially approved roles.

Summary & Conclusions

The Adolescent Diversion Project, operated by the Community Psychology Action Centre of the University of Illinois, Champagne, Illinois, utilized volunteer graduate and undergraduate students, supervised by a faculty, to provide support services to delinquent and pre-delinquent youths. Two formats, forming two experimental groups, (1) behavioral contracting, and (2) child advocacy, were used. In the behavioural contracting approach student volunteers negotiated

contracts between the clients and their parents, teachers, and other authority figures, so as to make explicit the privileges and responsibilities of each. In the child advocacy approach the volunteer student acted as an advocate, supporter, advisor, representative when dealing with the court, the police, social agencies, and parents in an attempt to acquire satisfaction of the youths needs. The duration of the intervention period was eighteen weeks. The follow-up time was two years.

Thirty-seven youths were randomly assigned to the experimental groups (n=25) and control group (n=12) in the first year of operation; and 36 youths were randomly assigned to the experimental groups (n=24) and a control group (n=12) for the second year of operation. The youths age ranged from 11-17 years with a mean age of 14.5 years. All youths had two or three previous police contacts and were considered beyond the "lecture and release state".

Evaluational data were gathered during the program, one-year follow-up for the second year of the study and two-year follow-up for the first year of study. Results indicated, (1) a significant reduction in the number and severity of police contacts and court petitions filed both during and after the intervention period for the experimental groups relative to the control group, and (2) no difference in grade point average, but a significantly better school attendance record for the experimental groups relative to the control group in the second year of study.

This is a well designed study, with random assignment of youths to experimental and control groups, and the longest follow-up period (1 and 2 years) of any of the studies reported here. The results are

positive, and have been replicated once -- replication increases considerably the confidence in the findings. The small number of subjects limits the generalizability of the results. Relative to other programs this may be considered of intermediate duration (four-and-a-half months), low volume (36 youths per year) program catering to low-to-moderate risk clients. The per-client operating cost of the program is likely to be greater than for the short-term, high-volume, programs (e.g., Sacramento 601), but less expensive than institutional costs. Operational cost figures were not reported. The use of volunteer students and university faculty lessens the overall cost of the program.

B Project Intercept, Denver, Colorado - Knott (1975)

Project Intercept, located in Denver, Colorado, is a community-based program providing services to pre-delinquents in three general areas, (1) family, (2) education, (3) peer-group. Volunteer community workers are designated behavioral-analysts who work as part of a team providing Intercept services. All intervention is conducted in the youth's community, (i.e., home, school, neighbourhood), by case-workers indigenous to the community.

Organization

There are 21 staff at Project Intercept, most of whom (10) are volunteer case workers, (behavioral analysts); 3 are professional supervisors, 5 are educational staff, and 3 are administrative-clerical staff. The behavioral analysts work in teams under the supervision of professionally trained experts, and will eventually

form a pool of community workers experienced in behavioral intervention techniques.

A board of directors consisting of a wide range of community persons provides the formal structure for community input and policy development. Unfortunately the board concept did not work well in this project as only a few of the 25 members attended board meetings and only rarely did they provide useful suggestions for program implementation. It was suggested that the board members need to be more carefully selected, and include more business and civic leaders, if it is to be effective (Knott, 1975).

Clients & Referral Source

Data were gathered over a two-year period, 1973, 1974, on 239 youth, 118 the first year and 121 the second. For the first-year-and-one-half referrals were restricted to youth service bureaus. Because of lack of numbers, it was decided to receive referrals from public schools, the district attorney's office, and other community centers as well as from the youth service bureaus, in the late summer of 1974.

Criteria for acceptance of referrals from the schools were, (1) that the youngster must be a chronic truant (50% better truancy in the previous 3 months), and/or (2) he must be assaultive either to peers and/or to teachers. Typically, youngsters referred by the schools had a history of assaults, classroom disruption, truancy, poor grades and low academic achievement.

During the first year of operation, 1973, a control group was established by randomly assigning one of every 4 youngsters to a no-treatment control. Unfortunately, toward the end of 1974 the

control group was terminated because of the increase in number of youth programs available in the Denver area and the committant lack of referrals to Project Intercept, so that only a small number of youth were available for comparison purposes (n=21).

Biographical data were available only on the 190 youngsters. Of these, 75% were male, 25% female, 59% black, 10% Anglo and 31% other; 63% were received from youth service bureaus, 27% from the schools, 3% from the district attorney's office, 7% from other sources. All youngsters were 16 years or younger, with a mean age of 12.8 years.

Eighty-nine percent of the youngsters had severe academic deficits; 75% had learning disabilities and 75% had rather serious perceptual-motor deficiencies.

No information was provided about the incidence, or type of crimes committed.

Intervention

The intervention process was divided into three phases. (1) Orientation phase (1-2 months), (2) treatment phase (4-8 months), and (3) weaning phase (1-3 months). The orientation (intake) phase involved developing a relationship with the client's family, obtaining baselines and diagnostic data, designing a treatment program culminating the signing of a social contract as a commitment to the plan. The treatment phase lasting 4 to 8 months, involved the implementation of remedial programs, (e.g., education, family relationships, peer group, and further individual assessment). The weaning phase, lasting 1 to 3 months, involved gradually withdrawing the services. Upon receiving a referral the project director assigns

the youngster to a behavioral analyst who is expected to make an initial contact with the family within 24 hours, and personal contact within 48 hours to explain the goals and activities of project Intercept. During the initial meeting with the family the behavior analysts observe and make notes on a number of family relationship dimensions: (1) power relationships within the family, i.e. which members appear to manipulate other members; (2) how, and under what circumstances these manipulations occur; (3) methods of communication within the family: (4) the kinds of demands made of the youngster: (5) the child-rearing practices used, particularly the type of punishment and reward, and the degree of supervision. This information is utilized by the behavioral analyst and his supervisor (team leader) to devise an initial treatment plan for the family. School teachers, with the parents present, may also be interviewed, particularly if the youngster is a school referral.

Most families agree to cooperate with Project Intercept sometime during this thirty-day familiarization period. Some agree after 60 days, and a small percentage refuse Intercept's services. If an agreement hasn't been reached by the end of 60 days the family is considered to have rejected the services offered.

Once the family agrees to participate in the Intercept program then the behavioral analyst and his team leader meet with the family and present their treatment plan. After discussion, suggestions and alterations the plan is implemented with the signing of a social contract for family services. It is explained that the contract is not legally binding, but that it is a pledge of mutual commitment to solving the families problems. It is felt by Intercept staff that

signing the contract encourages a more positive approach to the treatment program. Programs are usually modified in the course of treatment.

In summary, within the first 30 and sometimes 60 days of referral behavioral analysts meet with the family with the view of (1) building rapport, confidence, and commitment to a treatment program; (2) developing a basic outline of a treatment planned for the youngster and family; (3) acquiring base-line and psychological and educational testing information on the youngster. This is followed by specific intervention programs directed towards family, education and peer group problems.

All families receive assistance in dealing with their everyday problems. Various formats are used; individual and group counseling, assertive training, communication training. Families are taught problem-solving strategies, negotiation and compromise. They are taught how to assert themselves without "putting down" other persons, the importance of child supervision in parental control. The goal is to improve family communications, decrease negative interaction, and in general, to improve family relationships through any technique that appears to be effective, including behavioral contracting, role-playing and modeling.

The total family was seen on an average of 1.4 times per week, and youth clients were seen an additional 2.5 times per week. This does not include peer group contacts. Family contacts average 1.5 hours, while youth contacts average one-half hour per session. Educational achievement tests are administered in 2-3 sessions each 1-2 hours long. The psychological inventories include a number of

psychological and educational achievement tests are administered in 2 - 3 sessions each 1 - 2 hours long. The psychological inventories include: (1) a self reported inventory of non-reported delinquent offences committed by the youngster over the 12 month period prior to referral to intercept; (2) The Quay-Peterson delinquency scale, which permits classification of the offender into one of four categories, subcultural, neurotic, psychopathic, inadequate-immature; (3) The Coopersmith self esteem inventory which provides an overall measure of a persons state of mental health; (4) A biographical-historical inventory to obtain personal and family history data; and (5) the Glueck Scale, which identifies the dynamics of family interaction. The Coopersmith and self-report delinquency scales are re-administered during the termination stage to monitor changes over time.

A variety of educational achievement (WRAT, Munroe Diagnostic) and perceptual-motor (Perdue) tests may be administered. The Wide Range Achievement Tests (WRAT) measures the youths basic skills in reading, math and spelling. The Monroe diagnostic test provides a measure of skills in reading comprehension, addition, subtraction, use of phonetics, as well as form perception, space perception, figure-ground relationships, in general perceptual abilities. The Perdue Perceptual Motor Survey provides a measure of the perceptual-motor ability associated with academic work.

Using these tests, Intercept staff have found that approximately 75% of their youngsters have rather serious perceptual-motor deficiencies. Other tests, e.g. tests of visual processing of information, auditory processing, motor development, may be administered as the need arises.

Following the diagnosis the second stage is to design a remedial program for each youngster taking into account his strength and weaknesses. This is presented to the youngster, the family and school teachers involved and a treatment contract is signed. There are three alternative educational treatment plans: (1) Ten percent of the youngsters are placed at the intercept school program on a full time basis (the most severe cases); (2) Seventy percent of the youngsters attend the Intercept program for approximately 2 hours a day receiving individual educational and perceptual programming, and spending the rest of the school day in his normal school classes (selected by intercept personal); (3) Twenty percent of the youngsters remain in their current school but enrol in a reorganized program (reorganized by intercept staff in consultation with the teachers).

Special attention is given to making school a rewarding experience, to "turning the student on" to at least some aspects of academic work. Initially all youngsters are placed on an incentive program where they receive points that can be exchanged for concrete rewards, e.g. opportunity to go to the gymnasium where he can play basketball, pinball, pool, pingpong, etc. Points are given for every 30 minutes of sustained effort, or completion of a designated sub-program. As the youngster progresses he can earn additional points which can be exchanged for desirable items, e.g. Afro combs, caps, hats, transistor radios, etc. After 2-3 months on the point system most youngsters choose to work toward academic achievement itself rather than the external rewards.

It was judged that 60% of the youth could benefit from peer group "therapy". Over a 2 year period Project Intercept staff experimented

with a number of approaches attempting to influence the peer groups in a pro-social way: (1) the street corner approach which involved working with a naturalistic peer group in its own setting; (2) leader influence approach, which was an attempt, after the leaders of the peer-group had been identified, to "win them over" to a pro-social value system and influence the group via the leader; (3) change through association approach in which key individuals in the group are identified, taken out of the group and given experience with a pro-social peer group and then returned to their own group - - again, an attempt to influence the group via the leader; and (4) the establishment of new pro-social peer groups with regular meetings at Intercept headquarters.

Surprisingly, establishing new peer groups was found to work best. The first three approaches involved changing already established peer groups. This was much more difficult, and required a great deal more of staff time than to establish pro-social behavior in new peer groups.

Peer groups are now formed of 8-10 youngsters who live in close proximity to each other. They meet at Intercept Headquarters about once per week for 1-3 hours. A behavioral analyst attends all of the meetings of the peer-group initially and fosters pro-social attitudes, norms and behaviors. As the group evolves and pro-social norms are accepted the Intercept staff member ceases to attend the meetings.

A recent modification in the format involves soliciting the cooperation of youngsters and families who have successfully completed the Intercept program and making them part of the treatment of

incoming youngsters and families. These youngsters assist the behavioral analyst in establishing new pro-social peer groups.

Results

Results are discussed in terms of, (1) re-arrest data, (2) academic achievement data, and (3) self-report delinquency data. Recidivism data are presented for the (1) 1973 sample alone (N=118), (2) 1974 sample alone (N=121), and (3) total sample (N=239). Data were evaluated relative to a control group and baseline data on juvenile offenders compiled by the Denver Anti-Crime Commission (N=2000+) for the 1973 sample and baseline data only for the 1974 sample and the total sample.

A significant reduction in re-arrest rate from baseline and from the control group re-arrest rate was found for the 1973 sample of Intercept youth. Projected re-arrest rates from baseline data for impact offenses (e.g., burglary, assault, robbery) was 40%. The actual rate for the Intercept youth was 19% during the 12-month period of the program, a 53% reduction. Relative to the control group this was about one-third the ratio of re-arrests for impact offenses. For all offenses the re-arrest rate for the Intercept youth was about one-half as great as that of the control group.

The actual re-arrest rate for impact offenses for the 1974 sample also was lower than the projected baseline rate; the projected baseline rate was 19%, the actual rate was 4%, a reduction of 78%. Similarly, for all offenses there was a 63% reduction in re-arrests from projected baseline data. The improvement in recidivism reduction for the 1974 sample over the 1973 sample was attributed to the

increased sophistication, experience and quality of the staff after one year experience. The mean treatment time for the 1974 sample was six months and one week, also significantly less than the mean treatment time for the total sample (12 months and 2 weeks) and the 1973 sample (18 months).

Recidivism reduction for the total sample over the two year period of the operation of Intercept was 62% relative to projected baseline figures, for all offenses, and 71% for impact offenses.

One problem with these data, however, is that they represent in-program time, not follow-up time. During participation in the program the youth is kept busy and his behaviour is monitored. Under such conditions a reduction in delinquent behaviour would be expected, (1) partly because of lack of time, and (2) partly because of increased supervision. Three-to-five year follow-up data are necessary for an adequate test of the program.

No differences were found in re-arrest rates between those youths receiving peer-group therapy and those not receiving such therapy. As the author notes, this is not a test of whether or not peer group therapy is effective, as youth were not randomly assigned to participate in peer group therapy and therefore may be systematically different from the non-therapy group. Further research is needed to delineate the effects of peer group therapy.

By the end of 1974, 107 youngsters had been terminated from the Intercept program, 73 of them successfully and 34 unsuccessfully (e.g., had not met one or more of the treatment goals within a reasonable amount of time). Recidivism rates for the successful and unsuccessful groups were compared after seven months of termination

from the program. Results showed that the successful terminators had significantly fewer arrests than the unsuccessful terminators during the follow-up period; the re-arrest ratio for the unsuccessful group was about five times as great as that of the successful group. Such results emphasize the importance of successful completion of the program. Every effort needs to be made to ensure that all youths complete the program successfully.

Nineteen youths and/or families (about 11%) rejected Intercept services in 1974. Comparison of recidivism rates showed that those who refused services had a significantly higher re-arrest rate than those who accepted. Rejectors appeared to fall into two categories, about 50% in each, (1) those families who rejected Intercept services because they honestly felt that the youth has "had his fling" or "made a one-time mistake," and was unlikely to do it again; and (2) those families that rejected Intercept services because they were suspicious and fearful of outsiders. In the former group there usually existed a reasonable degree of organization and positive structure in the families, and these were usually two parent families. In these cases the family was usually correct; the boys didn't become recidivists. The latter group of families were usually much more disorganized and fragmented; recidivists nearly always came from these families.

It is well known that a substantial proportion of criminal offenses do not get reported to official agencies, and therefore are never officially recorded. A scale measuring unreported delinquency during the 12 months prior to admission was administered to all youths. Comparison of these results with police statistics indicated a ratio of six unreported offenses to one reported offense.

Academically, grade levels and school attendance increased and school disruptiveness decreased for Intercept youths. Analysis of the first 100 clients terminated from the educational program showed an increase of at least one grade level, although still leaving them approximately one year behind their appropriate grade level. The gain, however, was achieved in about one-quarter of the time required by the public school system. About 40 hours per subject of special instruction was given in reading, mathematics and spelling over 5-8 month period by Intercept staff. By contrast, the public school system normally requires about 180 hours of work per subject to obtain an advance of one year.

School attendance data are based on 86 youngsters who received remedial education in 1974, some of whom attended the public schools, some the Intercept school. Attendance in the public school increased from 52 to 69 percent, which is at the lower end of the range of school attendance (70-80%). Attendance at the Intercept school averaged 89%, well above the average school attendance. School grades for this sample increased from an average of D+ to C+, and school disruptiveness decreased from an average of 1.2 incidents per week before referral to .4 incidents per week after referral. As the author notes, disruptiveness data are vulnerable to reporting bias, i.e., teachers knowing that a student is part of the Intercept program may inadvertently bias the data in favour of better behaviour. It is noteworthy that 76% of the youth in this sample exhibited cross-hemispheric dominance (e.g., right handed, left eyed, left footed), suggesting deficits in neurological functioning, and a

possible basis for the high percentage of youth experiencing learning disabilities (75%).

Summary & Conclusions

Project Intercept was a delinquency prevention program operating in Denver, Colorado, under the auspices of the Colorado Youth Services Institute. The program utilized volunteer community workers as behavioral analysts under the supervision of professionals. Behavioral analysts worked with the youths and their families providing family counselling, educational upgrading and peer-group resocialization. Behavioral analysts visited the families an average of 1.4 times per week, and the clients an additional 2.5 times per week. Two-hour peer-group sessions were scheduled for once a week.

Youth, who had been adjudicated by the juvenile court, were referred by the Youth Service Bureaus, public schools and district attorney's office. Data were gathered over a two year period, 1973 and 1974. By the end of 1974, 107 youths had been terminated from the program, 73 of them successfully and 34 unsuccessfully (e.g. had not met one or more of the treatment goals). During the first year of operation, 1973, a control group of 21 youngsters was established by randomly assigning one of every four youngsters to the control. This had to be discontinued after the first year of operation because of public pressure. Almost all of the youths were 14 years or younger, the mean age was 12.8 years. 76% of the experimental sample exhibited cross-hemispheric dominance, suggesting deficits in neurological functioning. Coincidentally, 75% of the sample suffered from severe learning disabilities. The average length of time in the program was

12 months and two weeks (including referral time) for the total sample, 18 months for the 1973 sample and six months, one week for the 1974 sample. Seven-month follow-up data were reported for the 107 youths who were terminated from the program. The average length of time in the program for this group was eight months.

Results indicated, (1) a significant reduction in recidivism, over the 18-month period, for the 1973 sample relative to controls, i.e. the control group's ratio of impact rearrests was about three times greater than that of the experimental sample, and its ratio of all offense rearrests was about twice as great as that of the treatment group, (2) a significant reduction in recidivism during the first 12 months for the 1973 sample, compared with the projected percentage based on historical data on over 2000 delinquents, i.e. only 19% of the 1973 sample were rearrested for impact offenses, while the projected expected percentage was 40%, a considerable reduction (52%) in burglary and assault crimes, (3) a significant reduction in recidivism during the six-month in-program period for the 1974 sample, i.e. the reduction for impact offenses was 70.5%, and for all offenses 50.7%, (4) a significantly greater recidivism rate for unsuccessful terminators relative to successful terminators during the seven-month follow-up period, i.e. the rearrest ratio for the unsuccessful group was about five times as great as that for the successful group, and (5) a significant increase in school attendance and academic grade (at least one grade level) for the experimental group.

This began as a well designed study with random assignment of youths to an experimental and control group. Unfortunately, public pressure forced the discontinuance of the control group. The

follow-up period (7 months) is short and in need of extension. The length of a program is moderate (6 months). Results are favorable suggesting that the use of behavioral analysts to work intensively with families of delinquents can effectively reduce recidivism in moderate risk youths. The high percentage of youths apparently suffering from neurological deficiencies deserves further consideration. The relationship between neurological deficits, learning disabilities and delinquency needs further study.

C Project New Pride - Denver, Colorado - Blew, McGillies & Bryant
(1977)

New Pride is located in the north-east part of Denver, Colorado in two neighbouring houses (renovated by students, staff and volunteers), in Denver's lower income area. A Learning Disability Center, associated with Project New Pride, is located in the inner city area. Services are offered to adjudicated juveniles in four major areas: (1) academic education, (2) counseling, (3) cultural education and (4) employment.

Organization

New Pride staff consists of a project director, and assistant director/educational coordinator, job placement specialist, three group leaders (counselors), a volunteer coordinator, two teachers, part-time educational aid, and office manager. Staff at the Learning Disabilities Center include a director, who also serves as a data collector for the program, assistant director/teacher, teacher, group

leader (counselor), and part-time visual therapist, learning disabilities specialist, and developmental therapist. In addition, the services of a psychologist, sociologist, and optometrist are contracted when needed.

There are two schools under the direction of New Pride. Each is headed by supervisors who provide general monitoring and policy suggestions. The teachers and the learning disabilities specialists develop weekly and daily lesson plans for the students in their classroom. Each counselor (a group leader) is responsible for five clients (in addition to about 10-12 clients in the follow-up stage) and works with teachers, the job placement specialist and other volunteers in response to the client's needs. Treatment plans and counseling are flexible and individualized to meet the requirements and interests of the clients. One counselor is permanently assigned to the Learning Disabilities Center.

Typically, six or seven clients are accommodated at the Learning Disabilities Center, with the remaining clients (about 15) are accommodated at the central building. This does not include youths at both locations in the follow-up stage. The staff-student ratio is deliberately kept low so that staff members, regardless of their roles, can spend time with the youths, on a one-to-one basis, and develop friendly inter-personal relations.

Contrary to the case with some programs, staff turnover with New Pride has been very low. After three years, four of the original seven staff members are still with the project. The staff are relatively young, and prior to coming to New Pride, have spent a few years either working with a local community agency dealing with

juveniles, or teaching in the public schools. The majority of the staff have M.A. degrees in special education, guidance or psychology, or are presently working on advanced degrees.

When New Pride was first formed the professional staff went through an extensive training program, part of which included a 3 day retreat focusing on inter-personal relations, management by objectives, and presentations by juvenile, court and volunteer officials.

Training seminars to maintain and up-grade the professional skills of the staff are held on an on-going basis. Seminars ranging from assertiveness training to academic planning for the learning disabled student have been conducted by local university and mental health personnel. Volunteers, along with the full time staff are encouraged to attend these sessions.

Volunteer services are an essential aspect of New Pride's ability to function effectively. Volunteer recruitment and coordination are directed by a full time coordinator, a woman with a degree in volunteer administration. A commitment of at least 90 days (which is the term of the intensive phase of a treatment per group) is required from volunteers. It was felt that the intensive treatment phase should be conducted by the same person, so as to allow the establishment of a positive adult-youth relationship. About 20-25 volunteers are engaged in providing services in the program at any one time. Volunteers are obtained from community organizations, local colleges, and universities. Undergraduate and graduate students in psychology, sociology, and social work serve internships at Project New Pride.

Volunteers are selected carefully, and particularly those with racial prejudices and difficulties getting along with people, are eliminated. Three training sessions are conducted for each new group of volunteers. The first session is conducted by a juvenile court judge and is a brief introduction to the juvenile justice system. The second session focuses on juvenile delinquency, while the final session involves an introduction to New Pride operation and their responsibilities. Finally, volunteers are required to sign a contract outlining their responsibilities to New Pride, and New Pride's responsibilities to them.

Community volunteers may provide administrative and clerical assistance, or classroom assistance, or special activity programs such as a yoga course, or mechanical shop. Student interns, in addition to the above, may provide counseling assistance. The average volunteer contributes one/half day of service weekly, although several individuals work 20-40 hours a week in regular positions.

A spin-off from the volunteer program has been donations from individuals in the business community. Part of the coordinator's job is to speak to business clubs and organizations about New Pride to arouse their interest and to encourage them to support the program. Donations, ranging from a corporate fund for emergency client problems or special trips to free dinners, ski passes and tickets to recreational events have been the result.

Clients & Referral Source

During the 2-year operation of the project, 121 youths participated in the program, 60 the first year and 61 the second.

Referrals were guided by the following eligibility criteria: (1) age 14-17 years; (2) recent arrest or conviction for burglary, robbery, or assault related to robbery; (3) one prior conviction; (4) a resident in Denver County. Every 4 months, 20 youths were randomly selected from a pool of eligible youth provided by the police probation department to participate in project New Pride, (1) the experimental group and 20 randomly selected to a (2) no treatment control group. However, since community leaders and judicial officials were strongly opposed to a no treatment control group the controls often received some form of treatment from other programs; and the control group had to be discontinued after the first four intakes. There were 76 youth in the control group corresponding to the first four intakes in the experimental group (N=80). The most appropriate statistical comparisons, therefore, were between the control intakes and their corresponding first four experimental intakes.

Of the 121 youths a large majority were male (95%) and were either Black or Spanish ethnicity (97%). The ages ranged from 14 to 18, with an average of 16 years. Two-thirds of the clients were school dropouts and the majority of clients were operating at the third-to-sixth grade levels in reading and mathematical skills, well below their assigned grades (the average last grade assigned was 10).

Multiple learning disabilities were found in a large proportion of the clients; seventy-one percent of the youths showed at least 2 deficiencies. Auditory and visual memory were the two most prevalent deficiencies. Seventy-eight percent of the 121 clients had at least one disability of some kind. Deficiency in auditory discrimination was found in almost two-thirds of the clients, with auditory and

visual-meter deficiencies in approximately 25% of the remaining clients.

A large proportion of the clients had two or more prior arrests; 74% had two or more prior arrests, while 86% had at least one conviction. Only 8% had no or one prior conviction.

Blew, et. al. (1977) present a composite profile of the typical client:

"The typical New Pride client is a Spanish sir named male; an adjudicated delinquent, with a history of six or more prior arrests. He is 16 years old, from a single parent family (usually the mother), and has 3 or more siblings, who in most cases have also had contact with the juvenile justice system. The family is usually receiving some form of public assistance, living a transient life-style, and includes one member who has been incarcerated. The child has probly dropped out of school, completing either 9th or 10th grade, and has several identifiable learning disabilities, although possessing average or above average intelligence. He has a history of expulsion and/or other school-related failures. The child's most recent attendance in school can usually be attributed to a court order.

The client's home is unstable, nonsupportive, and frequently other family members are involved in

illegle activities and may be contributing to the delinquency of the client. A child is often viewed as an unwanted burden. He has frequently been placed in a variety of treatment programs designed to rehabilitate him. In almost all cases these "treatments" have been failures and have contributed to his feelings of low self-esteem. He has been incarcerated for brief periods of time and expects to be rearrested." (P.31)

Intervention

The New Pride program focuses on four main areas: (1) academic education, (2) counseling, (3) employment, and (4) cultural education. Programs are flexible and individualized to accommodate the youths' needs and interests. For the first 3 months of a 12 months period, youths receive intensive educational and counseling services. For the last 9 months individualized treatment, geared to the youths' needs and interests is provided.

During the intake phase diagnostic tests are administered and youths are assigned to classes either the (1) New Pride Alternative School, or (2) the Learning Disabilities Center. The alternative school, staffed by two teachers, a part-time educational aid and volunteers, provides one-to-one tutoring to the clients. Staff are strongly supportive of students efforts, and try to make the academic work as rewarding to the students as possible. The goal is to reintegrate youths back into the regular school system.

At the beginning of each semester students are interviewed to determine their goals and interests. The majority of students indicate a desire to return to school and obtain their high school diploma. Individualized lesson plans to remediate the weaknesses identified by the diagnostic tests are prepared. A tutor is assigned. Some students, rather than attend the New Pride alternative school, remain in the local school system. They also are provided with tutors.

For those students not wishing to complete high school, a special program, directed toward a specific goal is designed. For example, one client wished to obtain a motorcycle. The long-term goal, therefore, was to obtain a motorcycle. The short-term goal, however, was to obtain employment, to earn money to buy a motorcycle. A program whereby the youth was encouraged to read career guidance manuals and want ads, to plan a savings budget, and to read articles and books on motorcycles, was developed. In this way, the academic skills, math, reading, writing, were upgraded, and at the same time a high level of motivation was maintained. A volunteer tutor arranged visits to various kinds of businesses so that the youth could consider what type of a job he would like. A job placement specialist also worked with the youth, discussing possible career opportunities available in the companies he visited. Eventually, the youth enrolled in a drafting school, still with the view of earning money to buy a motorcycle.

Three days a week are devoted to academic work, and two days to recreational activities, field trips, health and sex education, and

guest speakers. Some students spend afternoons in the woodworking shop, or receive special lessons or tutoring from volunteers.

At the end of each semester students are awarded academic credit on the basis of a minimum of 60% of a possible total points. Points are awarded for attendance, promptness, attitude, completion of lessons, etc. Most student graduate.

About 71% of New Pride clients are diagnosed as having at least two learning disabilities, the most common being (1) problems with auditory discrimination, and (2) auditory and visual memory deficits. Not all of these youths can be accommodated by the Learning Disabilities Center, however, because of insufficient resources and staff. Only about 25% of New Pride clients, therefore, go through the Learning Disability Center.

All Learning Disability clients receive an intensive examination by an optometrist, after which a treatment program is designed taking into account the deficiencies identified. In addition to the academic program, Learning Disability clients participate in special exercises designed to compensate for their handicap. These include (1) visualization sessions to enhance visual imagery, (2) accommodative exercises to assist in eye focusing, (3) frustration level sessions to help the client to endure stress, (4) binocular and monocular exercises to improve integration of functioning of the body halves, (5) fine eye control sessions, and (6) problem solving sessions. The Learning Disability Center holds two sessions per day, one in the morning and one in the afternoon. Clients attend daily sessions.

All clients receive counseling. Immediately upon intake, clients are assigned a counselor, whose job is to involve himself in all

aspects of the client's life. Counselors maintain frequent contact with family, teachers, social workers; they may even sit in the classroom to observe the client's participation and progress. Daily contact is made with the clients, either in formal counseling sessions or recreational activities. Family counseling is provided to families where it's needed, and particularly in cases where the youth has been removed from the home. The counselor serves as a liaison between the youth and other staff, monitoring and reporting on the youth's progress. The overall goal is to enhance the youth's self-image and to help him to cope with his environment. Techniques such as behavior modification and behavioral contracting are utilized where appropriate.

The employment part of the program is designed to prepare youths for the working world, and to find a job for them. Since they are still attending school part-time jobs are normally sought. About 70% of all clients get part-time jobs and the re-arrest rates for these persons is considerably less than that for the unemployed clients.

The first month is devoted to a job skills workshop designed to teach students how to complete applications, and how to dress for and act during interviews. Opportunity is provided for practice interviews which are videotaped and critiqued. Each youth is counseled by the job placement specialist and helped to identify his vocational interests and make a realistic appraisal of his skills and aspirations.

On-the-job training takes place during the second and third months of the New Pride program. Youths are placed with employers in part-time afternoon jobs by the job placement specialist. Salaries

are paid by Project New Pride. When a position becomes available usually the job placement specialist accompanies the youngster to the interview, although sometimes this is not necessary. Other times youths are able to obtain jobs on their own, again with New Pride paying their salary. Most positions are in the service industries, e.g., janitorial, delivery.

Employers are thoroughly briefed on the aims and objectives of New Pride and the type of worker they're dealing with. The job placement specialist maintains weekly contact with the employer and youth to monitor progress and handle difficulties that arise. Some of the employers offer to provide funding for the positions when the New Pride funded period is terminated. If not, youths are encouraged to seek jobs elsewhere.

The Cultural education program is designed to expose youths, who often possess little social knowledge outside their immediate neighbourhoods, to a wider range of experiences and activities. Youths may go on a visit to a television station, on a ski trip, to a professional sports event, to a dinner at a restaurant, or numerous other educational and recreational events. Following these "field trips" youths may be asked to present oral or written reports, although this is not mandatory.

After three months of intensive work, there is a 9-month-follow-up phase during which services are provided. The services offered depends upon the youth's needs. For example, some youths may continue to attend project schools, although every effort is made to reintegrate the youths into the public schools. Weekly visits at the youth's home are made by the counselor. Employment sites are visited

by the job placement specialist and recreational events and field trips are still offered.

After one year youths are officially terminated, from New Pride youths (about 25%) still maintain contact and use New Pride services.

Results

Results are discussed in terms of (1) recidivism reduction, (2) job placement, and (3) remedial education. Recidivism was evaluated by comparing New Pride youth with (1) control youth, and (2) a group of Denver juveniles (n=2203) matched to New Pride youth on ethnicity, sex and prior record. Comparable recidivism rates are presented for (1) referral offenses (e.g., robbery, assault, burglary), (2) status offenses (e.g., truancy, curfew violations), and (3) all offenses (e.g., the above plus auto theft, larceny, drugs).

Based on projected baseline data from the matched Denver juveniles 79% of the New Pride youths would be expected to recidivate within one year. Only 50% of them did so. This converts to a 36% reduction in all offenses, and an impressive 67% reduction in impact offenses.

Relative to the control group, however, the results are not so dramatic. There were no significant differences between the first four intakes (experimental) and their corresponding controls (control) in first re-arrests; the recidivism rate for the control group was 68%, and that for the experimental group was 57%. There was, however, a significant difference between all six intakes (experimental) and the first four control intakes (control); the recidivism rate for the experimental group was 50%, compared with 68% for the control. The

50% recidivism rate for the six intake experimental group was due to the very low recidivism rates for the fifth and sixth intakes, which were 40 and 30 percent, respectively. Of the first four intakes, only the fourth intake was significantly lower in recidivism than its corresponding control. The reason for this is not readily apparent, although as discussed later, a number of difficulties were encountered with the control groups, which could account for the differences. Finally, no significant differences were found between the experimental groups and the control groups either for status offenses or referral offenses separately.

The lack of results for the experimental relative to the control groups may be attributed to one, or more, difficulties encountered with the controls, (1) significant differences in prior conviction records between the experimental and control groups, (2) difficulty in obtaining complete re-arrest information on the controls, and (3) the participation of the some of the controls in other juvenile justice programs. Despite the use of random assignment of youths to the experimental and control groups, those with the worst conviction records tended to be assigned to the experimental group, a factor biasing against showing significant treatment effects. New Pride youths average 4.9 all offense convictions and 1.9 referral offense convictions prior to treatment, while control youths average 1.7 prior all offense convictions and 1.0 prior referral offense convictions. Part of the difference may be explained by the fact that not all of the youths were randomly assigned. For some of the juveniles a court order was issued indicating that they should participate in the New Pride program, resulting in their by-passing the random assignment

procedure. Only for a very small percentage of the youths (three of 121) did this happen, however, -- not enough to account for the differences.

Another difficulty with the control group, which would mitigate against finding significant treatment effects, is that many of the youths participated in projects other than New Pride. This happened for two reasons, (1) logistical problems of notifying other projects which youths were designated controls, and (2) ethical considerations and community pressure. A number of social service agencies are available to provide services to needy youths. Identifying, informing, and enlisting the cooperation of each of these is a time-consuming task which sometimes does not get done with the kind of care that's necessary to ensure that participation in other youth programs does not occur. Moreover on ethical grounds, and in the face of judicial and community pressure it is difficult to deny control youths the right to participate in other programs. Employment is a good example. If an unemployed juvenile has the opportunity for gainfull employment it's difficult to justify a decision that he not take advantage of the opportunity because he is a "control" subject and would thereby bias the statistical results. An attempt was made to assess the effects of participation in other programs. Preliminary data suggest that participation did have a positive effect; those youths who participated in other programs (and this could only be roughly determined) had significantly lower recidivism rates than those who did not. Seventy-three percent of those who had not participated in other programs were arrested at least once for all offenses, and 57% were arrested for referral offenses, while only 64%

of those who had participated in other programs were arrested for all offenses, and only 27% for referral offenses.

Still another source of bias against finding statistically significant differences in favour of New Pride youths is the difference in availability of recidivism data for the experimental and control groups. Careful and thorough records were kept on the experimental group. Such was not the case, however, for the control group. The result is that the number of arrests for the control youths is likely to be underestimated, a factor which would reduce the possibility of showing statistically significant differences between the experimental and the control groups.

Evaluation of the employment program showed that there was considerable success in placing youths in jobs; 70% of all the youth were placed in jobs following vocational training. Most of the employment (about 90%) was part-time, since the youth were also attending school. Few of the youth continued at their first job for more than two months. Still, the employment program does seem to be worth while; re-arrest rates for employed youth declined to 27%, approximately 1/3 the rate of unemployed youths. The conclusion, therefore, would appear to be that efforts directed at improving opportunities and finding jobs for youths would reduce subsequent delinquent behaviour. The difficulty with this reasoning, however, is that the nature of the relationship between employment and delinquent behaviour is not clear. Because of personality characteristics, skills, aptitudes, etc., finding employment is relatively easy for some youths, but very difficult for others. It may be that those youths who have the characteristics favourable to finding employment,

also have the characteristics which make it less likely that they would recidivate, even without employment. Employment per se, therefore, may not be as important as the predisposing characteristics in determining subsequent delinquent behaviour. On the other hand, there can be no denying that employed youths have less time available to engage in delinquent behaviour than unemployed youths, which suggests that both predisposing characteristics and employment influence delinquent behaviour. Further research is needed to more precisely determine the nature of the relationship between employment and delinquent behaviour.

Evaluation of the remedial education program must remain tentative as data were available on only 43% of the sample. Pre-test data from standardized achievement tests showed that a large majority of the youths were extremely low achievers; 85% of the youths scored four grades or more below their last assigned grade in mathematics, for example. The mean pre-test grade level ranged from 4.65 to 4.96. Significant improvement occurred, however, post-program achievement scores showed, (1) that the number of youths scoring four grades or more below their last assigned grade levels decreased from 85% to 55%, (2) that mathematical achievement levels increased to 5.86 to 6.62 grade level -- an increase of 1.45 grade levels, (3) that reading achievement level increased by 1.24 grade levels, and (4) that spelling achievement increased 1.11 grade levels. Education achievement was assessed using the Wide Range Achievement Test (WRAT). Although significant improvements did occur, 70% of the youths still performed three or more grades below their last assigned grade level. After completion of their educational upgrading program a majority of

the youths (74%) returned to the regular school system. No data were presented however, on the length of time the youths remained in school after being reintegrated in the normal school system. Still, the New Pride remedial education program does appear to have beneficial effects.

No assessment was made of the counseling, cultural education programs, and volunteer services.

Summary & Conclusions

Project New Pride, a community-based program, was located in the lower income areas of Denver, Colorado. The program provided, (1) educational upgrading, (2) counselling, (3) employment placement, (4) cultural education, to adjudicated delinquents. The length of the program was 12 months, and it accommodated approximately 60 youths per year. Community volunteers acted as coordinators, teachers aids, and administrative assistants.

Evaluation of the program was based on 121 experimental and 76 control youths, who were randomly selected from a pool of subjects meeting the following eligibility criteria, (1) age 14-17 years, (2) recent arrests, or convictions for burglary, robbery, or an assault related to robbery, (3) prior conviction, (4) a resident in Denver County. Due to opposition from community leaders and judicial officials the control group did receive treatment from other programs, and in the later stages of the program had to be discontinued. The average age of the youth was 16 years. 78% of the youths had at least one learning disability and 71% of them had multiple learning disabilities. The most common learning disabilities were faulty

auditory discrimination, followed by auditory and visual memory deficits. New Pride youths were compared with (1) a randomly selected control group, (2) a group of Denver juveniles (n=2203) matched to the New Pride juveniles on ethnicity, sex and prior record.

Results indicated, (1) a significant reduction in recidivism for the experimental group relative to the controls, (2) a reduced rearrest rate for the employed youths compared with the unemployed youths, i.e. the rearrest rate for the employed youths was approximately one-third that of the unemployed youths, and (3) a significant increase in academic achievement scores for the experimental group. Although there was a significant improvement in academic achievement, 70% of the youths still performed three or more grades below their last assigned grade level. About 70% of the experimental youths were placed in jobs following vocational training - 90% of them were part-time jobs. No follow-up data were presented.

This also began as a well designed study with random assignment of youths to experimental and control groups. Unfortunately, due to public pressure, the existing control group received treatment, and subsequent assignment of youths to a control group had to be discontinued. Despite the bias in favor of the control group, however, the experimental group showed significantly greater recidivism reduction. A major problem with this study is the lack of follow-up data. 3-5 year follow-up data are desirable to properly evaluate the effectiveness of the program. Relative to other programs, this may be considered a long duration (1 year), small capacity (60 youths per year) program catering to moderately high-risk clients. The cost (\$ 3,960.00 per client) is likely to be higher than

the short-term, larger capacity program, (e.g. Sacramento 601 project) but considerably lower than the traditional juvenile court procedure (\$ 800.00 per client) plus incarceration (\$ 12,000.00 per client per year) (Blew, McGillies & Bryant, 1977).

D Louisville Youth Diversion Project - Haarman, Hildenbrand, Siefold & Conlin (1974, 1975, 1976)

The Louisville Youth Diversion Project (YDP) began operation in November 1973 with six Youth Services Centers located in high delinquency areas in Jefferson county. The overall objectives were (1) to divert as many youths as possible from the formal juvenile justice system, (2) to provide the necessary services and monitoring to prevent the youths from subsequently becoming involved with the juvenile justice system, and (3) to reduce the rate of first offenders who subsequently become involved with the court system. These objectives were to be accomplished by; (1) developing programs to alleviate delinquency-causing condition, (2) identifying and mobilizing community resources to help solve youth problems, and (3) providing immediate short-term family counseling in crisis situations.

Organization

The youth Diversion Project staff consists of a director, two area supervisors, and a secretary. Each center is staffed by one social worker and three detached workers. All centers operate afternoons and evenings (12:00 p.m. to 8:00 p.m.) and one center is open on Saturday afternoon and evening.

There were staff problems at some of the centers; low pay, low morals, and high staff turnover. There was frustration with the lack of cooperation of youth and adults in the community and the apparent lack of community acceptance. A number of recommendations for improvement were made, (1) more training in community organization, (2) more information about resources available in the community, (3) more practical training, (4) more individualized on-the-job training in counseling and interviewing, (5) better communication between the staff and directors and supervisors, (6) better communication with the police and other agencies, (7) greater authority and flexibility for the front-line workers, (8) higher staff salaries, (9) more money for equipment and program development, (10) increased staff, higher qualified staff, and (11) reduction in the amount of time spent on paper work.

Clients & Referral Source

Data were gathered over a two year period, 1974 and 1975. Each will be discussed separately. During the first year of operation the YDP received 1,894 referrals, 1,095 (58%) of whom were considered to be diverted from the juvenile justice system, i.e., referrals for delinquent, or status offenses. The most common reasons for referral were employment needed (25%), shoplifting (17%), truancy (12%), ungovernable behaviour (8%), disorderly conduct (6%), and other non-delinquent behaviour (15%), i.e., referrals from family and individuals for counseling, school problems, and recreational programs. Minor offenses was the largest category of reasons for referral (34%), followed by employment needed (25%), social offenses

(22%), and other non-delinquent referrals (15%). Seventy-eight percent of the youths were either first offenders, or non-delinquent. The most common source of referrals was individuals (30%), followed by police (29%), schools (21%), and social agencies (13%).

The average age of the youths was 14 years. There were more males (63%) than females, more blacks (62%) than whites. Sixty-five percent of the youths lived with only one natural parent, and 48% lived with their mothers only. The average income of the youths' family (\$5829.00 per year) was lower than the average family income for the population in general in that area. Thirty-nine percent of the families were receiving public assistance. Most of the youth (91%) were still attending school.

1,684 persons were referred to the YDP in the second year of operation (1975). Of these 1,417 (84%) could be classified as divertees (i.e., referrals for delinquent or status offenses), 63% were male and 37% female. Unlike the previous year there were more whites (53%) than blacks (47%). These percentages more closely mirrored the racial composition of the general population in the area. The most common sources of referral were the police (54%), schools (19%) and social agencies (13%). The most common reasons for referral were shoplifting (42%), followed by truancy (13%), ungovernable behavior (9%), and disorderly conduct (4%), with job referrals only (2%), much lower than 1974 sample. The vast majority of the referrals were for minor and status offences (about 80%). The majority of youths served by the YPD continued to be first offenders (64% first offense, 12% no offense), with about one quarter (24%) of the youths having prior referrals either to juvenile court or the YDP. The 1975

youths (13.4 years) tended to be slightly younger than those in the 1974 sample (14.0 years).

The parental configuration for the 1975 sample was about the same as that for the 1974 sample. Only about one-third of the clients lived with both natural parents (36%), while almost a half lived with mother only (47%). The income level of the YDP clients appeared to increase (by approximately \$1,000.00) in 1975 over 1974. Only about 26% of the families were making less than \$4,000.00 in 1975, as compared with 35% in this category in 1974; and 18% were making \$10,000.00 and up in 1975 compared with 10% in 1974. The percentage of families receiving public assistance remained about the same in 1975 (40%) as in 1974 (39%). Similarly, the percentage of clients attending school was about the same in 1975 (91%) as in 1974 (91%).

Intervention

No information about the treatment procedure was provided in other than the overall strategy that families are encouraged to view the youths' difficulties as a family problem and be willing to become involved and provide assistance in determining the solutions. Short-term (5 sessions) family counseling provided by social workers is available.

Results

The overall objective of the Louisville Diversion Project was to divert as many youths as possible from the juvenile justice system by providing immediate short-term, family counseling and mobilizing community resources and programs to alleviate delinquency-causing

conditions. Results from the first year operation showed that 1,095 delinquent youths were diverted. Six-month follow-up data on all YDP youths (1,894 delinquent and non-delinquent) showed that 14% were later referred to juvenile court. In the absence of comparison data the significance of these results is not clear. Although in comparison to other programs 14% is a low recidivism rate, almost half of the referrals were non-delinquent to begin with, and those that were referred for delinquency could be considered low risk. Another factor which could bias the results in favour of a more positive outcome is that 13% of the youths could not be contacted.

One objective of the YDP was to develop community programs in an attempt to prevent delinquency. Twenty-four youth related programs were developed by the YDP personnel. These included, (1) youth boards - to involve the youth in decision-making activities related to YDP program development, (2) job banks - to assist the youth in finding employment, to give them something constructive to do with their free time, and to provide them with the experience of obtaining and keeping employment, (3) drop-in centers - to provide planned supervised activities for the youth, and to provide a centralized place for the program staff to meet potential clients on their own level; (4) youth interaction groups - to provide group experience, to help youths relate to one another, and to learn about their personal feelings, (5) volunteer programs - to involve adults in the youth program and activities; (6) drug information seminar - to provide information to youths and parents about the abuse of drugs; (7) pre-job counseling programs - to provide job readiness information; (8) other

recreational groups such as judo, karate clubs, grooming classes, drama club, soft ball team, dancing classes, sewing, reading classes.

1,417 youth were diverted from the juvenile justice system in the second year of operation. Follow-up data were obtained on all of those referred to the YDP September 1, 1974 and August 31, 1975. Results showed that 80% of the delinquent youth had no subsequent juvenile court referrals, 11% had only one and another 4% had only two referrals; of the non-delinquent youths about 90% had no subsequent juvenile court referrals, 8% had only one referral and 2% two referrals. Again, in the absence of comparison data the significance of these results is somewhat unclear, Still, data are suggestive that short-term, family counseling does effectively reduce delinquent behaviour in low-risk youth.

Finally, the YDP personnel designed and implemented a number of programs needed by youths and lacking in the community during 1975. These included, (1) a job preparation course - a one-month training program to provide youths with the necessary skills for obtaining employment, (2) a youth health education program, (3) a tutoring program, (4) a girls soft-ball team, (5) a community resource coordinating committee to coordinate service and develop a program of planning at the community action, and (6) a community school project to provide after school recreation, crafts, and other cultural activities. No evidence is provided, however, to show that these programs actually reduce delinquency.

Summary & Conclusions

The Louisville Kentucky youth diversion project involved six Youth Services Centers (YSC) located in high delinquency areas in Jefferson County. The centers offered immediate, short-term counseling in family-crisis situations, and also attempted to identify and mobilize community resources to provide assistance to delinquent and pre-delinquent youths. The program was not designed as a treatment facility, but rather as a stop-gap measure providing short-term counseling and referral to the appropriate agencies. Family counseling sessions are few in number, a maximum of five, provided by social workers.

Referrals were received from individuals (about one-third), police (slightly less than one-third), and schools and social agencies (slightly more than one-third). Youth were referred because of employment needs (25%), shoplifting (17%), truancy (12%), ungovernable behaviour (8%) disorderly conduct (6%) and other non-delinquent behaviour (15%). Data were presented for 2 years of operation, 1974 and 1975. 1894 referrals were received the first year, of whom 1,095 (about 58%) were considered to have been diverted from the juvenile justice system. 1684 youths were referred during the second year, and about 84% (N=1417) could be classified as divertees. Of these, about 80% were for minor and status offenses. The average age of the youth was 14.0 years the first year, and 13.4 the second year. No control groups were established.

Six-month follow-up data showed that (1) 14% of the diverted youths from the 1974 sample were later referred to the Juvenile Court,

and (2) 20% of the 1975 sample of diverted youth recidivated. No comparison data were given.

This is a short-term, high-volume program for low-risk youths, which appears to effectively reduce delinquency. The 14% and 20% recidivism rates compare favourably with other studies discussed herein. Project Intercept, for example, had a 19% recidivism rate, and Achievement Place a 19% recidivism rate. Unfortunately, however, the YSCs in addition to providing short-term family counseling, referred the youths to other service agencies for assistance, (e.g. interaction groups, volunteer groups) recreational groups, the effectiveness of which was not evaluated independently of the counselling. Thus, the program effectiveness cannot be attributed solely to family counseling. Also, no control groups were incorporated and the follow-up period was too short (6 months). No information was provided on the cost-effectiveness of the program. Still, providing family counseling does appear to have merit, as results from the next study suggest.

E Sacramento Diversion Project - Baron & Feeney (1976)

The Sacramento, California Diversion Program was set up in response to the need for a better way of handling juveniles charged with minor offenses, e.g., habitually refusing to obey parents, guardians, or school authorities, a truancy from school, run-aways (California State Law 601 offenses). The overall objective of the Diversion Project was to demonstrate the validity of the diversion concept of delinquency prevention by producing, (1) a reduction in the number of cases going to court, (2) a decrease in overnight

detentions, (3) a reduction in the number of repeat offenses, and (4) a reduction, or at least no increase in the cost of processing the youth. This was to be accomplished by providing short-term, family-crisis counseling at the earliest possible time following the report of an offense. The 601 program began operation as an experimental project in October, 1970, and by November, 1973, the project techniques became standard approach for all run-away, beyond control, and incorrigible type cases. By April, 1972, the program was expanded to include the more serious 602 offenses (e.g., petty theft, possession of drugs, drunk and disorderly conduct). Data are available from both projects.

Organization

The Diversion unit staff initially consisted of a supervisor and 6 counselors, with probation experience ranging from none to 4 years. There were 3 male and 3 female counselors. Those with no probation experience all had some previous experience in a social service agency. With the expansions of the programs to include minor 602 offences (e.g., petty theft, possession of drugs, auto theft not involving damage to the car taken, and minor offences such as drunk and disorderly conduct), 4 additional officers, 3 males and 1 female, were attached to the diversion project.

The training program for both the 601 and 602 projects was similar. All staff underwent an initial week of training, supplemented throughout the year by regular consultations with the project psychiatrist and psychologist, and by other short term programs. In 601 cases conflict between the youth and his parents was

often quite high and initial counseling sessions had to focus on reducing this hostility before other problems could be dealt with. In 602 cases this initial hostility was usually not so visibly present. Counselors found this more difficult to deal with and several training sessions were subsequently spent assisting them with this problem.

The initial training for the probation officers consists of one week duration, in which counseling experts (e.g., psychiatrists, clinical psychologists) attempted to familiarize the project staff with family counseling techniques. Training, for the most part, takes place on the job. It is therefore essential that there be an on-going training and consultation program. This occurs on a regular basis in the form of: (1) case demonstration, (2) individual consultation, (3) role playing, (4) videotape feedback, and (5) group process workshops.

In the case demonstration, an experienced family therapist works with a family in the staff's presence, or as a co-therapist with one of the staff members, or observes a staff member work with a family. In each case there is discussion and feedback with the view of improving staff family counseling skills. Individual consultation provides the opportunity for staff members to present troublesome cases to the consultant and obtain valuable advice as to how to resolve the difficulty.

Staff members may role-play family problems and have consultants demonstrate their therapy techniques in working with such a family. Or, the staff member may role play both the family and the therapist and solicit comments from the consultant. Both techniques allows the staff member to experience at first hand, the intervention process.

Some staff members prefer to videotape their family therapy

sessions and have other staff members and consultants view them and offer their comments. This provides the staff members with an opportunity to see themselves in operation, which can provide valuable information for the development of counseling skills.

Finally, group process workshops provide the opportunity for staff members to express their feelings, confide in each other and the consultants, and provide each other with support.

Clients & Referral Source

Referrals were received from the police, the schools and the parents. Only those who had committed 601 offenses were eligible for the program during the first couple of years. These included petty theft, malicious mischief, curfew, alcohol offences and other misdemeanours. In the third year those committing minor 602 offenses (e.g., petty theft, possession of drugs, drunk & disorderly conduct) became eligible. The most frequent type of case was drug related (34%); the second more frequent type of case was petty theft (22%). No other single category was as high as 10%.

During the first stage of operation, 977 cases were processed through the experimental group, and 612 through the control group for 601 offences. Youths were assigned to a control group (receiving no treatment) three days a week, and an experimental group (receiving counseling) four days a week. To control for possible differences resulting from day of assignment, days were rotated monthly so that each day was included approximately the same number of times for both the experimental and control groups. During the second stage of

operation 111 youths were processed through the experimental group and 105 through the control group for 602 offences.

Typical of pre-delinquent and delinquent populations there was a greater number of children living with one parent (35%) and one natural parent and one step-parent (greater than 60%) than in the general population. In the Sacramento community area, less than 20% of all children live with only one natural parent.

Minority ethnic groups were represented in the experimental group to about the same extent as in the general population. There were 8% blacks, 6% Mexican American, and 76% white children. This compares with 6% blacks and 9% Mexican American in the general population of Sacramento County.

Characteristically, the largest proportion of cases came from the lower end of the socio-economic scale (59% from families earning less than \$15,000.00, 11% from families earning \$15,000.00 or more, and 30% no information), although the extent to which the cases came from families at the higher income bracket, (11%) and educational level (14%) was somewhat surprising. In the general population in the Sacramento area about 25% of the families have incomes above \$15,000.00, and about 30% have one member with college education.

The peak age groups were 14 (20%), 15 (20%), and 16 (24%) years, with an average age of 14.4 years. Surprisingly, there are more females (59%) than males (40%). The youth tended to be average students, and to have run away from home at least once.

Intervention

The family counseling approach used by probation officers has three overriding guidelines: (1) counseling with the family as a unit rather than as individuals, (2) focusing on the family as a whole rather than on the individual wrong-doer, (3) and ensuring that communication is between the family members directly rather than through the counselor as an intermediary.

The whole family refers to the youth, his parents, brothers, sisters, grandparents, boyfriends, anyone involved in the home situation. The reason for including the whole family is that invariable part of the problem involves poor communication among, at least some of the members of the family. Having everyone there allows each person to communicate directly with all of the others, and provides the opportunity to express viewpoints and feelings. This lessens the probability that anyone would want to sabotage the treatment plan. Even having young aged siblings (1-2 year old) present can be advantageous. It allows the counselor to observe total family interactions between parents and children of all ages. The youngster in trouble with the law is viewed by the counselor--probation officer as a symptom of underlying family problems. The problems may be between the parents, between parents and children, or between the children themselves. Bringing all of the members of the family together and focusing on the family, it is believed, is the best way to handle the difficulty. It, (1) provides a learning experience for the family members, (2) an opportunity for the counsellor to observe family interaction and determine whether or not the members can communicate adequately with each other, and (3)

avoids the temptation for counselors to provide the family with ready-made solutions to their problems.

When a client is referred by the police, school, or the parents, a family counseling session is scheduled as soon as possible, within an hour or two, or within the day. The first question is whether the youth is to be detained (locked up) or returned to the home. This decision is taken by the parents, or guardians, and the counselor - probation officer. Detention is discouraged, while returning to the home with a commitment to work through the problems is encouraged. However, if the underlying emotions are strong and negative the youths may not be returned to the home immediately, and a temporary alternative place is found. Detention is discouraged because it may be looked upon by the parents as just punishment and of absolving them of the responsibility of dealing with the youngster and the underlying family problem.

The diversion process is voluntary and must be agreed upon by the youngster and his parents. It is explained to them that if they wish they may follow through with the regular court system, take the diversion counseling route, and/or consult an attorney before deciding on whether or not to accept the diversion offer. Most families choose to go with the diversion counseling process.

The diversion family counseling process usually involves a maximum of five 1-hour sessions, although more sessions and longer hours are needed in some cases. All sessions after the first one are voluntary and in many cases contact with the family may be made by telephone. Long-term problems are referred to community agencies for further assistance.

Results

Results are discussed separately for 601 and 602 offenses. In general, the results were very encouraging; court petitions, and overnight detentions were reduced by a wide margin; recidivism was reduced; and the cost of handling the cases was reduced by about 50%.

For 601 offenses a comparison of the experimental and control youth showed that (1) the number of court petitions was reduced by over 80%, (2) the number of overnight detentions was reduced by more than 50%, (3) the number of youths involved in repeat offenses was reduced by more than 14%, (4) the number of youths subsequently becoming involved in criminal behaviour was reduced by 25%, and (5) the cost of the program for the experimental group was less than half the cost of the traditional procedure prior to the introduction of the family counseling program.

Data on overnight detention in Juvenile Hall following initial referral show that about four times as many of the control group (55%) spent at least one night in Juvenile Hall as the experimental group (14%). Experimental youths spent an average of .5 nights in detention following initial handling, while control group youths spent an average of 4.6 nights in detention. It is noteworthy that control youths also spent more nights in detention over a 12 month follow-up period than experimental youths.

All youths were followed for one year following the date of the initial handling, and recidivism rates for both the experimental and control groups were compared. Although the rate of repeat offenses for both groups was high, the experimental group did significantly

better than the control group; 54% of the control group were re-booked for either 601 offenses or violations of the penal code, while 46% of the experimental group were similarly re-booked. This represents a decrease in recidivism of 14% for the experimental group relative to the control group.

Moreover, in a comparison of the two groups on recidivism involving the more serious offenses (e.g., felony, drugs) the improvement is greater still. Only 13% of the experimental group were re-booked for such offenses, while 22% of the controls were booked for felony and drugs, a difference of about 40%. Finally, there were fewer experimental youths (25%) than control youths (32%) who were re-booked twice, and few experimental (7%) than control (12%) be booked two or more times. As the authors point out, data suggest that most of the Project impact occurs early in the process (not so surprising when the emphasis is on providing immediate help to the youth and their families).

Although it is difficult to determine precisely, evidence suggests that use of the family counseling program results in significant cost and manpower savings. Based on a rather complicated method of calculation, the authors found that the average handling time for experimental youths (9.9 hours) was slightly more than half that required for the control youths (17 hours). This, results in a considerable reduction in the cost of handling experimental cases. In addition to handling costs there are considerably greater detention costs (e.g., maintaining Juvenile Hall, foster homes, boys' ranches, etc.) for the controls, who spend more time in detention, than the experimental youth. Taking all of this into consideration, the

authors conclude that the cost to the probation department of handling cases in the regular way (controls) is nearly twice as expensive as the cost of diversion (experimentals).

In addition to lower handling and detention costs, it is suggested that there is a reduction in the manpower necessary to process experimental youth relative to control youth. Work loads can be classified into time spent on petitions, supervision and placement supervision. When experimental and control groups are compared on these dimensions, results favour the experimental group; significantly less time per youth is required to be spent with experimental youth. The net saving over the course of a year was approximately 2/10 of a position.

Results for 602 youth were also very positive: (1) court petitions were reduced by over 99%; (2) the number of youths committing new criminal offenses was reduced over 50%; (3) the number of youths who recidivated was reduced over 40%; and (4) the overall cost of the family counseling program was about half that of the traditional procedure.

About one-third of the experimental group relative to the control group ultimately went to court. And the recidivism rate for the control group was significantly higher (33%) than for the experimental group (23%). About one-third of the control group (35%) recidivated, while only about one-quarter (26%) of the experimental group recidivated. These results were based on 7 month follow-up. For more serious offenses (e.g., criminal conduct, felony, drugs) the discrepancy between the experimental and control groups was even

greater; the recidivism rate for the control group was 33%, while that for the experimental group was 23%.

Summary & Conclusions

The Sacramento Diversion Project was another program providing short-term (5 weeks), family-crisis counseling to low- and moderate-risk youths, in this case by trained probation officers. Referral was made to social agencies for the more difficult cases. The Sacramento project involved two sub-projects, (1) the first dealing with less serious 601 offenses (e.g. runaways, truants, those beyond reasonable control), and (2) the second dealing with more serious 602 offenses (e.g. petty theft, possession of drugs, drunk and disorderly conduct).

1589 referrals for 601 offenses were made, 612 control youths and 977 experimental youths were compared. Youth were assigned to the experimental group four days a week and control group three days a week, rotating the experimental and control days monthly to avoid biases due to day of intake. Similarly 111 youth were assigned to the experimental groups and 105 to the control for 602 offenses. The average age of the youth was 14.4 years.

One-year follow-up data for the 601 project showed, (1) an 80% reduction in the number of court petitions for the experimental youth relative to the controls, (2) a reduction in the number of over-night detentions of more than 50%, (3) a reduction of 14% in the number of repeat offenses, (4) a reduction of 25% in the number of youths subsequently becoming involved in criminal behaviour, and (5) the cost of the program for the experimental group was less than half the

cost of the traditional procedure. Similarly, 7-month follow-up data for 602 project showed, (1) a 99% reduction in the number of court petitions for the experimental youth relative to the controls, (2) a 40% reduction in the number of repeat offenses for the experimental relative to the controls, and (3) a 50% reduction in the overall cost of the family counseling programs relative to the traditional juvenile court procedure.

This is a well designed study, involving a large number of youths, randomly assigned to experimental and control groups. The follow-up periods (1 year and 7 months for Project 601 and 602, respectively), however, need to be extended to increase confidence in the findings. The 602 portion of the study represents a replication of the original findings of the 601 study and provides strong support for the effectiveness of the program. The overall results are highly favourable and suggest that short-term family counselling can effectively reduce delinquency with low-to-moderate risk youth.

F Achievement Place, Lawrence Kansas - Phillips, et al. (1973)
Wolf et al, (1976).

Achievement place, located in Lawrence, Kansas is a residential treatment facility for adjudicated delinquent boys and girls. It offers a family style setting in which professional teaching parents act as substitute mothers and fathers. Each family is composed of 6-8 boys or girls between the ages of 11-16 years. The treatment program is designed to improve academic, social and self care behaviours of the youths who are (or about to be) suspended from school, or in trouble with the community, and who are thought to be uncontrollable

by their parents. Close contact with the adolescences parents is maintained and a gradual transition back to the home is pre-planned. Preliminary evaluation of the program is positive.

Organization

The treatment program is community controlled. A local board of directors (12 members) is responsible for the physical facility and the financial arrangements for Achievement Place. The board of directors, in cooperation with the teaching parents, local school officials, juvenile court officials, representatives of local church groups, and other interested citizens, select the specific goals of the treatment program. A candidate selection committee (representatives from the board of directors, the school, the juvenile court, social services and the teaching parents) select candidates who are most in need of treatment, i.e. boys who are the greatest threat to the community, the schools and the homes. The board of directors is also responsible for evaluating the treatment program and recommending changes. Community control and involvement, it is argued, facilitates community acceptance of the program, and frees the teaching parents from many of the administrative problems.

The staff at each residential home consists of one set of teaching parents who have advanced education and extensive training (Wolf, Phillips, Fixsen, Braukmann, Kirigin, Willner & Schumaker, 1976). After a B.A. in behavioral sciences teaching parents enroll in a special training program consisting of five parts; (1) a one week workshop and the University of Kansas on how to operate the program; (2) a three month practicum, or internship in a residential treatment

setting where they receive guidance and consultation from the training staff: (3) at the end of the third month an evaluation of the treatment program by the training staff and by each of the consumers of the program (e.g. the juvenile court, the department of social welfare, the schools, the youths, and their parents; (4) a second advanced training workshop at the University of Kansas concerning the operation and evaluation of a successful treatment program; and (5) after 6 and 12 months of operation further evaluations of the treatment program.

The third and sixth month evaluations are designed to provide feedback to the teaching parent trainees, while the 12 month evaluation, in addition to providing feedback to the teaching parent trainees provides information to the Board of Directors and agencies that refer the youths to the program.

Additional training during the second workshop is given to teaching parent trainees who are having difficulties (as indicated by the three month evaluation). Their effectiveness is again evaluated at the end of six months and further training and consultation are given if required. The majority of teaching parent trainees can function successfully after three months, and their performance improves throughout the first year of training. At the end of the year, following the 12 month evaluation, most couples receive their certification as teaching parents.

Clients & Referral Source

Subjects were the first 41 youths admitted to the achievement place program for boys. There were age 10-16 years (average 14 years);

the majority were white (61%), with some Black (29%), American Indian (7%) and a few Mexican American (2%). Two-thirds of the youths came from families in which at least one parent was absent; Sixty percent came from families whose annual income was below seven thousand dollars; and 53% of the families were on welfare.

The intelligence of subjects averaged 97, with a range of 73-113. Forty one percent were considered slow learners, 12% retarded, and 12% brain damaged. The average grade level was grade 7; the average achievement level was grade 5. They missed an average of forty of 180 days of school, and 65% of them had been suspended from school. A high percentage of them were considered behaviour problems by the schools (80%) and 53% were considered emotionally disturbed.

All subjects had been court adjudicated prior to admission; 52% allegedly had been involved in delinquent acts, 45% in drug abuse, and 94% in other offences. Sixty-eight percent had spent some time in jail and 43% had been in some type of residential care or treatment before coming to achievement place.

Intervention

The point system (token economy) is utilized at achievement place. This facilitates the learning of socially appropriate behaviour. Points can be earned by watching T.V. news, or reading the newspaper, cleaning and maintaining a neat room, reading appropriate books, doing dishes, doing homework, obtaining desirable grades on school report cards, etc. Points may be lost by failing grades on report cards, speaking aggressively, forgetting to wash his hands before meals, disobeying, being late, stealing, lying or cheating,

etc. Initially, points are exchanged for privileges each day: later, after initial skills and self control are developed a weekly exchange system is substituted. Privileges which may be earned with points include extra allowance, access to a bicycle, extra television, snacks, opportunity to go downtown, to go home for a weekend, opportunities to stay up late past the normal bedtime, etc. Most youths earn all of the regular privileges about 90% of the time.

Programs are individualized. Competencies and deficiencies are assessed and realistic goals set for each youth. As skills and self-control develop, the highly structured point system is gradually withdrawn and replaced by a more natural set of feedback conditions. This is the merit system in which no points are given or taken away, and all privileges are free. At this stage the youth must be ready to accept freedom and responsibility. If he is not (if he does not continue to use the newly acquired skills that he learned while on a point system) then he loses his merit status and reverts back to the point system.

After four successful weeks on the merit system the youth graduates to a homeward bound system in which he spends most of his time in his own home. The family receives counseling in behavioral management practices. The boys progress with his family and in school is monitored for several months. If he begins to have problems then he may return to achievement place for a few days or weeks to work through them.

Most of the youths continued to attend the same schools in which they had had behavioral and academic problems before entering achievement place. This allows teaching parents to work closely with

the school teachers to solve the youths schools problems. Teachers provide systematic feedback for each youth by completeing a report card each day. The youth earns or loses points depending on his performance at school.

At the supper table, or shortly thereafter, the teaching parents and the youths hold a family conference. This is part of the homes self-government process. There is a discussion of the days events, and the possible modification of rules, and/or a decision regarding the consequences for rule violations. Self-governing behaviours such as participation in group decision making, negotiation, compromise, constructive criticism, are specifically taught. Individual counseling sessions may follow, particularly with those having serious problems at school, or at achievement place. Counseling involves the expression of concern and affection and problem-solving (the joint exploration of various alternative solutions). Finally, the last part of the day is spent in family recreation (e.g. games, discussing the events of the day, watching T.V.).

Overall, the emphasis is on feedback and encouragement.

Results

The effectiveness of the program has been evaluated a number of times (Wolf, et. al. 1976), and in general, the results are positive. One such evaluation was done by Phillips, Phillips, Fixen & Wolf (1973) in which Achievement Place youth (n=16) were compared with probation youth (n=13) and Boys' School youth (n=15) 1 and 2 years after treatment on a number of dimensions, e.g., police and court contacts, recidivism, grades and school attendance.

Results of the police and court contact data indicated that although the number of contacts for the Achievement Place youth and the Boys' School youth were similar before and during treatment, they were significantly different after treatment; the Boys' School youths had a significantly higher number of contacts, while the Achievement Place youths had a lower number of contacts following treatment. Similarly, the probation youths had significantly more police and court contacts than Achievement Place youths after treatment, although they had fewer contacts before treatment. Two years after treatment the differences were even more marked; 53% of the Boys' School youths and 54% of the probation youths recidivated (e.g., were re-adjudicated by the court and placed in a state institution), while only 19% of the Achievement Place youths recidivated, either during or after treatment.

School attendance and school performance were also superior for Achievement Place youths; only 9% of the Boys' School and 37% of the probation youths were still attending school by the end of the third semester after treatment, while 90% of the Achievement Place youths were still in school at this time. Of those who were in school, the grades for the Achievement Place youths were significantly better than those for the control groups; only 40-50% of the Boys' School and probation youths earned grades of D- or better, while 90% of the Achievement Place youths earned grades of D- or better; and the grade point average for the Achievement Place youths was higher (C-) than that for the Boys' School youths (D-) and the probation youths (D+).

As Wolf, et. al. (1976) note, almost all aspects of the program have been evaluated, e.g., the token economy, self-government system,

elected manager system, daily report card system, vocational training, speech correction, social skills training, academic behavior, and the results have all been favourable. But, because of the small sample size, and lack of random assignment, only tentative conclusions can be drawn. These are stated by Wolf, et. al. (1976).

The Achievement Place group-home model has provided an alternative to institutionalization for the majority of youths it has served.

The youths who took part in the Achievement Place program were much less likely to be institutionalized within two years following treatment than were similar youths who were originally treated in the institutional program.

During treatment in achievement place, there was a marked reduction in police and court contacts, and an increase in school attendance.

In the second year, after treatment, the Achievement Place youths had fewer police and court contacts than before treatment care however, equivalent aged youths who had been treated in an institution had a similar reduction.

The achievement place youths were more likely to continue in school after treatment than were the youths who were treated in the institution.

The cost of treatment in achievement place was substantially less than the cost of treatment in the institution.

The group home program consumers (youths, parents, board of directors, school personnel, court personnel, social welfare personnel, and juvenile court personnel) were very satisfied with the achievement place program.

The achievement place research program produced a training program that resulted in approximately 35 replications of the original program and has also extended the model to homes for girls. (p.99)

The cost of an Achievement Place program is considerably less (about one-fourth) than the cost of an institution, both capital costs and operating costs. Operating costs at Achievement Place were reported to be less than half that for the Boys' School in Kansas.

One difficulty at Achievement Place is keeping the teaching parents for a reasonable length of time. Teaching parents now stay for an average of 16 months, only a few months after completion of

their training program. The major reasons for their short stay are (1) low salary, (2) the small amount of private living space, and (3) insufficient amount of relief time. These dissatisfactions would seem to be easily taken care of by additional expenditures for increased living space and additional staff, which would still leave the family group homes much less expensive than institutionalized confinement.

Summary & Conclusions

Achievement Place, located in Lawrence, Kansas, was a residential treatment facility for delinquent boys and girls. It offered a family style setting in which professional teaching parents acted as substitute mothers and fathers. The treatment program was designed to improve academic, social and self-care behaviours of the youths, and made extensive use of the token-economy and point system. Six-to-eight boys or girls, age 11-16 years, along with their teaching parents constituted a family.

Sixteen, court-adjudicated youths, selected by a Board to participate in Achievement Place, served as the experimental group. These data were compared with Boys School (n=15) and Probation (n=13) data, one and two years following treatment. No random control group was established. The average age of the youth was 14 years. Time spent at Achievement Place was 8-12 months.

Results showed, (1) a significant decrease in recidivism for Achievement Place youths relative to Boys School and Probation youths, i.e., two-year follow-up data showed that 53% of the Boys School youths and 54% of the probation youths had committed a delinquent act and had been re-adjudicated by the court, while only 19% of

Achievement Place youths were re-adjudicated either during or after treatment, (2) a significant increase in school attendance and school achievement for the Achievement Place youths relative to the other two groups, and (3) a significant reduction in the cost of handling the youths at Achievement Place, e.g., cost per youth at Achievement Place was \$ 3,000.00 - \$ 4,000.00, while the cost for a youth at an institution was \$ 6,000.00 - \$ 12,000.00 per year.

This is a relatively long-term (8-12 months), low-volume program (n=15) administered by professional staff. It is therefore more expensive than other programs which are shorter-term and which make use of community volunteers. Still, as the authors note, it is about half as expensive as operating institutions. Methodologically, the study suffers from small sample size and no control group. But, the program has been replicated 35 times (Wolf, et. al., 1976), and the two-year follow-up period is one of the longest of the studies reported herein, both of which provide strong evidence of the effectiveness of the program. The youth participating in the Achievement Place program appear to be low-to-moderate risk. Would the program be equally effective with high-risk youths? Studies need to be conducted to determine what kinds of programs are effective with what types of clients.

G Providence Educational Center - Ryan (1974)

The Providence Educational Center (PEC) is an educationally oriented resocialization program for adjudicated delinquent males. Two overall goals are proclaimed: (1) to prevent juvenile recidivism and reduce criminal behavior; and (2) to assist youths to adjust to

and function effectively in the public school, the community, and on the job. To achieve these goals, PEC's program focuses on (1) reducing truancy, (2) maintaining close and cooperative contacts with students' families, (3) increasing levels of academic achievement, and (4) developing new coping skills and more positive modes of behavior.

Organization

PEC is sponsored by the Providence Inter-City Corporation, a private non-profit organization incorporated in 1968, in the city of St. Louis, Missouri. The Board of the Providence Inter-City Corporation is a policy setting body for PEC and consists of ten members selected from the local and city business community. PEC has an executive director who is an ex-officio member of the Board, serves on all of the Board's committees, and is responsible for the administration and implementation of Board policies. The Board has three functions: (1) to establish policies for PEC, (2) to raise funds and other resources for the program, and (3) to develop and maintain positive relations with the larger community. Twenty-six people make up the professional staff of administrators, management personnel, teachers and educational specialists, and social workers at PEC. Ten of the staff have Bachelor degrees in education, six have undergraduate degrees in sociology, and others have undergraduate degrees in economics, english, mathematics, recreation and business management. Three of the staff have M.A.'s in education, three have graduate degrees in counseling or social work, and two others have M.A.'s in other subjects. One staff member has a Ph.D. degree.

Reporting to the executive director are the (1) secretary, (2) business manager and three coordinators, (3) educational director, (4) director of social services, and (5) after-care coordinator, who are responsible for the maintenance and operation of their departments. The educational director has a secretary, a curriculum specialist, a reading specialist, 12 volunteers and 12 classroom teachers working with him. The social services director has a secretary, a school counselor, two social workers and one student intern. The after-care coordinator has one after-care staff, some volunteer tutors, three maintenance and operations persons and one cafeteria and food service person.

The business manager is responsible for the agency's fiscal policies, financial records, and the flow of funds in and out of the agency.

The educational director is responsible for the overall instructional program; i.e., organizing, scheduling, and supervising the educational activities and supporting and supervising the teaching staff. He also is involved in interviewing and selecting prospective students referred by the court, and determining when students are ready to graduate from PEC.

The director of social services is responsible for the overall planning and implementation of the social services program. He, too, is responsible for hiring and firing and supervising of his staff and helping them to improve and develop their professional skills. As well, he is responsible for, along with the director of education, the coordination of the educational and social services treatment program,

and he participates in student selection and student graduation decisions.

The after-care coordinator is responsible for the administration and coordination of all activities associated with student transition to the public schools, vocational training schools, or employment. This involves contact with school officials, public and private agencies, and the juvenile court.

The educational staff consists of the assistant principal (who also serves as the curriculum specialist), the reading specialist, the classroom teachers, and the reading volunteers, is responsible to the director of education. All of the paid members of the educational staff are full time. Volunteers work from 3-10 hours each week.

The curriculum specialist is concerned with the identification and the development of educational resources and curriculum, and instructional materials appropriate for PEC clientele. He is also responsible for assisting classroom teachers in the proper use of these materials, and the supervision of the library staff and educational resource center.

The reading specialist is responsible for the development of remedial reading programs and the supervision of the reading laboratory. He must diagnose reading difficulties, and develop reading treatment plans for all students requiring remediation. He assists the teachers in planning and implementing the remediation programs and supervises the volunteer staff in the reading lab.

Classroom teachers are the frontline workers. They work as teams, and each team shares the responsibility for planning the individualized educational programs for the students, and for

implementing the educational program in the classroom. Each team involves a social worker who is responsible for assisting with behaviour problems and for initiating referrals to principal, school counselor, reading specialist, etc. Other teachers on staff include shop teachers, arts and crafts teachers, physical education teachers, who are responsible for curriculum in these areas.

The social services staff consists of social workers and a school counselor, all of whom are full time employees. Social workers work with classroom teacher teams to deal with behaviour problems. They provide individual and group counseling to students in the class, and maintain monthly contact with the students' parents so that they might serve as a liaison with the court and other agencies.

The school counselor is responsible for the psychological services program. Students with special needs or problems that can't be met by the classroom team are referred to the school counselor. The school counselor also reviews each student's treatment program and self-evaluation each month, and provides feedback, advice and consultation to the classroom teachers.

The after-care staff consists of an after-care worker and volunteer tutors. The after-care worker is responsible for serving as a liaison with the schools, vocational programs, public and private agencies and employers. He is a full time member of the staff.

The tutors are university student volunteers, who are assigned to PEC students on a one-to-one basis to facilitate their successful transition back into the local public schools.

Staff training and development occur in a number of ways: (1) planned workshops; (2) weekly "short-day" training and orientation

sessions; (3) departmental meetings and team meetings; (4) technical assistance in the classroom. Workshops are designed to meet specific needs that arise periodically. The first workshop, involving staff and students, was a week-long retreat in the form of a camping trip designed to introduce staff to each other and to the youths, and to encourage them to work together cooperatively. Another workshop, also one week long, involved only staff, and was designed to provide training in the theory and use of behaviour modification as a means of controlling disruptive classroom behaviour, and changing interaction patterns between students and staff, students and their families, and students and the community.

The "short-day" training occurs every Friday afternoon. Attendance of the staff is mandatory, and students are dismissed early to allow staff to attend. The focus of these sessions is on problems, concerns and needs of staff. The content varies widely from training in the use of new curriculum materials, or in a particular skill (e.g., how to teach multiplication of fractions) to orientation to new administrative policies.

Departmental meetings occur weekly and team meetings bi-weekly. Their major focus is on the progress of individual students. Staff training and development often occurs as a by-product of these meetings.

The technical assistance training is more indirect and informal, and occurs when the school counselor, the curriculum specialist, or the reading specialist consults with members of a classroom team about a particular student or about counseling or teaching methods. It is

not planned, and does not occur on a regular basis. It occurs on an "as needed" basis.

Clients & Referral Source

The primary referral source is the juvenile court (70%), with 30% being referred by youth agencies. To be eligible for admission to PEC, the youth must normally meet a number of criteria: (1) he must have had prior involvement with the juvenile court and be under the supervision of a deputy juvenile officer, or case worker; (2) he must be between ages 12-16 years; (3) he must not be seriously emotionally disturbed, retarded, or severely handicapped; (4) he must be functioning at below high school achievement level in reading, i.e. less than grade eight; and (5) the referring agent, parent, and child must agree to participation in the program.

Results are based on 118 youths between the ages of 12-16 years processed by the program between September 1972 and December 1973. All but two of the youths were black. Most of them came from economically marginal families; the average income of the families was \$5,284.00 a year. Unemployment was high; only 38% of the families had one parent working. The size of the families was very large, e.g. two-thirds of the families had five or more children, and one quarter of the families had 10 or more children. Families were often unstable; eighty-one percent were one-parent families, and 45% had one or more other children involved with juvenile court.

Almost all of the youths were behind in school; only 1.7% of them were achieving their correct grade level, and over half (55%) were one-to-four years behind.

The average number of prior referrals was 4. Over two-thirds of the youths were referred for impact offences (a stranger to stranger crime or burglary) and over one-third had multiple impact referrals. Others were referred for minor offences including truancy, shoplifting, parole violation, inhaling intoxicating fumes, trespassing, disturbing the peace, incorrigibility. Still others were referred for a variety of more serious offences including stealing, armed robbery, assault, attempted forceable rape, homicide and arson.

Intervention

There are three basic components to the PEC programs, (1) educational component, (2) social services component and (3) the after-care component.

Education is the central aspect of the Providence Educational Center. It is the primary means for "resocialization" of the youths coming to PEC from the juvenile court system. The PEC program is offered as an alternative to the public schools and unlike the public schools, its educational program and approach are specifically designed for "misfits" -- youths who have typically failed in the public school system. PEC's goal is to prepare these kids to re-enter the public school system, and to be able to perform successfully there, and avoid further contacts with the law. PEC focuses on development and upgrading of the basic academic skills so that these youths will be able to function in the regular classroom.

There are a number of features in the PEC approach that maximize the probability of success: (1) small classes, (2) a non-departmental

approach, (3) ungraded classes, (4) a non-traditional approach to curriculum development, (5) an emphasis on development of fundamental skills, and (6) individualized instruction.

The size of classes is relatively small, averaging 12 students per class. Small classes have the advantage of permitting extensive class interaction and individual attention, when needed. Moreover, PEC classes are staffed by two classroom teachers, plus outside specialists when needed, so that the effective class size is six. The student-teacher ratio is 6:1.

Students do not move from classroom to classroom and teacher to teacher as is the recent traditional way. When a student is assigned to a particular class, it is expected that he will stay with that class for the entire school year and receive all of his instruction by the two teachers (and specialists) on the classroom team. Almost all of the youths enrolled at PEC are functioning at the elementary grade levels (grade 6 or less) at the time they enter. All classroom teachers at PEC, therefore, have training and experience in elementary education. In addition, they must be "generalists" qualified to teach in a variety of subject areas. Non-departmental teaching permits greater continuity and contact between students and teachers and maximizes the benefits of a positive relationship between a teacher and student.

A modified version of the non-departmental approach is being tried in one of five classrooms at PEC. It involves four teachers and 24 students, still a student-teacher ratio of 6:1. The class meets in the same room throughout the day, but student groups are formed on the basis of similar proficiency in a subject, so that it is easier to

give special instruction to those who need it. One teacher is assigned the responsibility of working almost entirely with small groups of three or four students who need special assistance. The other three teachers have special subject areas, i.e., one for arithmetic, one for reading, and one for language arts. The continuity and contact between the teachers and students is still maintained, while at the same time providing greater depth in specialized subject areas. Preliminary evaluation of this procedure has been positive.

Students are assigned to classes on the basis of the grade levels at which they are functioning to that the youth may have different classmates if he is operating at grade six in arithmetic, grade four in reading, and grade five in language arts. Students are usually not functioning at the same grade level in all subjects. Class assignment at PEC reflects this fact. Classes do not have grade designations.

Removal of grade designations from classes, it is felt, decreases the probability of basing performance expectations on an artificial grade level, which may be inappropriate. Performance expectations are based on actual performance levels. Each PEC student is in competition with himself, not other students, arbitrary standards, age, or grade.

At PEC, curriculum is developed from a "bottom up" rather than the "top down" process, which is the traditional way of doing it. Curriculums are based on the needs of the individual students, as identified by the classroom team. Teachers set instructional goals for each student each month. These then, determine the curriculum for each student.

Once teachers have established instructional goals they may get advice from the curriculum specialist as to how most appropriately to accomplish these goals, and they may go to the resource center to obtain materials and instructional aids. Curriculum materials may range from work-sheet exercises and workbooks designed to provide practice in the use of a particular skill (e.g., punctuation, use of capital letters, subtraction of decimals, etc.) to more contemporary material which have a strong appeal to kids (e.g., lip reader series), to materials related to more immediate interests and concerns of the students. One teacher, for example, took a class to a used car lot to choose a car they might wish to buy. They examined a number of cars, considered the various options, and chose a car. Later they discussed the price and payment terms with the salesman, contacted a bank to compare interest charges and payment terms, contacted insurance companies about insurance coverage and costs. Finally, they computed travel times and mileage costs for two cars, a luxury car and an economy car. This is an example of an integrated lesson where students are involved in a range of different mathematical operations (e.g., use of percentages, interest rates, decimals and fractions, etc.), and at the same time learn about other relevant information related to the seemingly simple decision of buying a car.

Although the major focus of the PEC educational program is on three areas, reading, language arts and arithmetic (which are stressed in every class, at least once a day) other courses are also offered. Students may enroll in various shop courses (e.g., woodworking, elementary electronics, arts and crafts), physical education, or other extra-curricular activities such as the student newspaper, or student

council. Each of these activities contributes to the student's development and resocialization. The physical educational program, for example, can lead to improvement in the student's ability to cooperate with each other as a team, as well as to improving physical competence and self confidence. The shop program encourages disciplined work habits.

Despite the variety and range of courses, reading, language arts and arithmetic remain the core program. All three are stressed in every class, on a daily basis by the classroom teachers. Specialists are available to work with teachers, and to develop remedial programs. Staff volunteers work with the youth in the reading laboratory. Audiovisual programmed instruction cassettes, programmed reading kits, and reading games are available. Those students with the least developed reading skills in each class are scheduled for daily one-half hour one-to-one remedial sessions in the reading laboratory. Slow readers may get two sessions per day.

Individualized instruction is offered for all three of the core courses, reading, language arts and arithmetic. It is usually not offered for the non-core subject areas, science, social studies, where the class is taught as a group. For the core classes, instruction is geared to meet the specific need of each student, and where possible it is congruent with the student's style of learning and rate of development.

A number of factors are considered by the classroom team when designing treatment programs for a student: (1) the amount of time each day for each subject and the length of each session; (2) whether a tutor, specialist, or neither is desirable; (3) the student's

learning style, i.e., abstract or concrete; (4) the necessary instructional aids. The amount of time scheduled for any one subject varies, depending upon a number of factors, for example, student's attention span, the degree of deficiency. Some students may spend only one hour a day on arithmetic, while other students with longer attention spans may spend two hours on arithmetic. Some students need specialists and tutors, others do not. Some students are able to readily grasp abstract concepts, while others need more examples, analogies, or the opportunity to manipulate concrete materials to learn the concept. For these students, special instructional materials may be necessary aids to the educational process. These decisions are made during weekly planning sessions where teachers assess the progress of each student in their class.

The over-riding criteria in designing individualized instructional plans for each student is that he will succeed; that there will be successful accomplishment and encouragement; that learning will be a positive experience. There is concern that students experience success rather than failure, that they accept responsibility for their own behavior, and that the skills they learn are functional, i.e., help them to get along in the real world.

The major purpose of PEC's social service department is to provide support for the educational program. Social workers are part of classroom teams, one social worker to two teams. Social workers are responsible for determining the social treatment goals, designing a program to meet these goals, and monitoring students' progress and development. They serve as liaison with the students' families,

juvenile court, and other agencies that provide services needed by the students or their families.

All students receive counseling. One-hour, weekly group counseling sessions are scheduled for each class. Half-hour individual counseling sessions also occur once a week. Students who require more extensive counseling are scheduled more frequently, as often as is needed.

Social workers usually lead the group counseling sessions, which may be attended by other members of the classroom team. Group counseling attempts to: (1) develop more positive self images; (2) develop more positive ways of relating to peers (particularly non-delinquent peers), parents and other adults; (3) develop individual responsibility for their behavior; (4) enhance self understanding; (5) develop peer group support for socially accepted behavior and a positive self image; (6) provide the opportunity to give students information about and discuss problems that commonly confront teenagers (e.g., drug abuse, venereal disease, etc.), and to foster the development of skills for dealing with common life situations (e.g., applying for a job, meeting a girl, current conflicts in the classroom, etc.). A variety of techniques and aids are utilized in conducting group counseling sessions, including field trips, films, role playing, group problem solving, tape recording for feedback.

Individual counseling is conducted by either the social worker or the school counselor, the latter dealing with the more severe cases. It is primarily aimed at improving students' self image, increasing self awareness, and controlling behavior. The first few sessions

focus on the reasons the student is at PEC, his view of his past offenses, his performance in public school, and his relationships with his family and peers. Later, the counseling sessions focus more on present behavior and performance at PEC, or on further encounters with the law enforcement agencies, or the court, if that occurs.

An important aspect of the re-socialization process is the involvement of the youths' parents. The social worker on each team has the responsibility of maintaining contact with the students' families. Contact with parents usually comes about as follows: (1) follow-ups related to student absence; (2) regular once-a-month home visits; and (3) assistance to parents.

When a student is absent from class the social worker contacts the parents by telephone to determine the reason for the absence. If the student is absent for a second day the social worker visits the home whether or not the absence is justified. Parents are reminded of the importance of regular school attendance and are urged to encourage it.

Whether or not students are absent from school, social workers make at least one home visit per month. During these meetings parents are given feedback about their children's performance and encourage the parents to provide additional reinforcement for positive changes in behavior and successful performance in classroom work or shop projects. The youth's behavior at home, his family relationships are also discussed, and parents are offered counseling in how to relate to their children, when needed. Home meetings are scheduled when the student is at home so that he is aware that there is continuous

contact between PEC and his parents. Two days a week are taken up with home visits.

Social workers often must help parents get services they require. This usually involves identifying the appropriate agencies or resources, initiating referrals, or acting as a liaison with the agency, providing transportation, or accompanying the parent on initial visits to health, welfare, or other agencies serving the community.

School counselors are responsible for identifying agencies and coordinating the services needed by youths both enrolled, and graduating from PEC. In addition, when one of the students is arrested while enrolled at PEC, the school counselor may attend the court hearing with the youth.

The after-care component is responsible for helping the youth to re-enter the general community, the public school system, or employment. The after-care staff work directly with the students during and after their stay at PEC, with the public schools, employers, other agencies working with PEC's ex-students, and their parents. The after-care component provides, (1) support for youth in the program, and (2) feedback for improving PEC's program.

The after-care staff provides support for the youth when they go into the normal public school system or into the job market. If they are to re-enter the public school system at the high school level they must score at the 5th grade level on the Iowa Test of Basic Skills (ITBS). Even if they are to re-enter the elementary school system, or seek employment, grade 5 level ITBS scores are desirable, but not required.

In addition to meeting the grade level requirement, students must be able to adjust behaviorally and socially to the school or job environment. If a student meets the grade level qualifications, but is judged not yet mature enough to cope socially, then he may be assigned to a special (honor) class. With honor classes individual group counseling sessions focus on preparing students for re-entry into the public schools, a job, or vocational training programs.

The after-care staff are involved in these sessions, the aim of which is to develop realistic expectations about the schools, or employment possibilities. For example, students are provided with information about public school rules and regulations, procedures, and classroom relationships, or about the appropriate behavior for obtaining and maintaining a job. Students re-entering the public school system are taken to the public school in their district and introduced to the relevant school officials, i.e., guidance counselors, principal, assistant principal, classroom teacher, so that there is less formality and impersonality in making the transition. Each student's program in the public school is discussed with the student and the teachers, and each other's expectations are clarified. Sometimes students are able to attend the public school, sit in and attend classes, on a trial basis, so that potential difficulties can be dealt with early.

For those who enter the job market after graduation from PEC, the after-care staff provides assistance in identifying potential jobs (in the immediate community, if possible), and introducing youths to other job placement agencies and resources, in how to fill out applications,

and how to function during the job interview. They may even accompany the youth to the job interview.

To formally graduate from the PEC program, approval must be obtained from the juvenile court. Court acceptance of PEC's termination recommendation is facilitated by court officers participation in PEC team meetings where the graduate recommendation is initially formulated. No PEC recommendations for termination have been refused by the juvenile court to date.

After formal graduation the PEC after-care component is the only contact between the youth and PEC. This contact is maintained for at least six months, and sometimes as long as a year after graduation. The frequency of contact varies from student to student, ranging from almost daily for some, to once a month or less for others. About 20-25% of the graduates require regular and rather intensive contact.

The 25% of the graduates requiring intensive follow-up are contacted several times a week. After-care staff must seek them out in the schools, on the job, at home, on the street, or in the neighbourhood hand-outs, or wherever else they might be. This is a tremendously time consuming job and staff energies are disproportionately taken by this group. For example, staff may have to wake up the youths in the morning and take them to school, or to work to ensure that they get there, and to try to establish new acceptable behavioral patterns. They have to follow up on absenteeisms and intercede in family problems and school or job relationships. They may become involved if the youth is arrested for an offense after leaving PEC. At the request of the judge, parent, juvenile officer, they may attend the hearing, and provide the court

with relevant information about the youth and his family.

The major aspect of the after-care staff's job is to prevent "back-sliding". This requires close monitoring of the youth's behavior, especially during the transition from PEC to the normal school or job situation. PEC youths tend to become discouraged, and will revert back to the old ways if support is not provided. For example, graduates were found to withdraw (stay hom from school) if they didn't understand some particular school procedure, or if they were faced with regulations they didn't understand. After-care's staff's job is to help these youths overcome these hurdles.

The after-care staff provide feedback to PEC administration about the effectiveness of their program. Effectiveness is measured by the degree to which the graduates now function competently in the community (without committing further offences). After-care staff attempt to assess the strengths and weaknesses of PEC's graduates based on their performance in the public schools, vocational training programs, or jobs. For example, after the first graduating class a recommendation came forth suggesting modification of the group counseling to include more information about procedures, rules and regulations in various high schools, and the difficulty in functioning in a large school with large classes. Another recommendation was for the expansion of the vocational training program at PEC to include not only job preparation and placement, but also on-the-job supervision during the transition.

Results

Data were gathered on 118 youths in the program during the 9-month period, March 15, 1973 - December 31, 1973. For those in the program on March 15, 1973, all available data were obtained back to September, 1972. Program effectiveness was determined from data related to (1) truancy, (2) academic achievement, and (3) court referrals.

Truancy was reduced significantly. School records showed that the truancy rate of the youths the year prior to entering PEC was 55%, (and one-third of the students were not enrolled in any school at all) while at PEC, the average truancy rate was 16.4%, a reduction of about 35%. Moreover, this may be considered a conservative estimate of the reduction in truancy at PEC since the public schools counted only unexcused absences as truancies, while PEC counted all absences as truancies.

There was significant improvement in the level of academic achievement for youth enrolled at PEC. The objective was to increase the academic achievement levels of the youth to the point where they could pass the 8th grade equivalency test and thereby become eligible for entry into the high school. In many cases the youth were so far behind that it was impossible for them to reach this level of performance during their stay at PEC. About 25% of them (N=34), however, did take the 8th grade equivalency test, and of these, 74% passed it. Of the nine students who did not pass the test, eight of them were still placed in the high school, on the recommendation of the PEC staff after considering their test scores, achievement levels, and degree of maturity. Of those youths attending the regular public

schools, nearly half had adjustment problems when they entered large classrooms after having had the intense individualized instruction at PEC. This resulted in frequently missed classes, or initial failure, although only one of the 80 youths was suspended from school (and this youth did well in his second placement). These youths continued to receive PEC tutoring and counseling from the after-care component. About 25% of the youths received 'good' to 'excellent' reports from the schools. Significant reduction in referral rates was found both during and six months following participation in PEC programs.

In the absence of a control group, PEC compared the levels of delinquent activities of the youths before, during, and after their enrollment in PEC, as a way of evaluating recidivism reduction. Data were available on 106 students, of whom 47% were still enrolled in PEC and 53% terminated. Data for all offenses showed that slightly greater than one-third (39%) of the youths were referred to juvenile court during the period of their enrollment in PEC. Of these, about 50% had higher referral rates during their stay at PEC than during the prior year, while the other 50% had referral rates about the same or lower than they had had the year prior to entering PEC.

Recidivism rates for impact offences (e.g., stranger-to-stranger crimes, or burglaries) showed that 90% of the youths had no impact referrals while enrolled at PEC. Of the 10% who did, 65% had higher impact referral rates while they were at PEC than prior to their enrollment at PEC, while 35% had lower impact referral rates while at PEC compared with prior to entering PEC.

Data were obtained on 56 of the 68 youths who had been terminated from PEC for six months or more. For these youths referral rates for

the six months following termination from PEC were compared with referral rates for the six month period immediately prior to enrollment in PEC. Results indicated that 70% of the youths had no referrals at all (for all offenses) in the six months following termination from PEC. During the six months prior to their admission to PEC, the 56 youths had a total of 52 referrals. In the six months following termination from PEC this group had 25 referrals, a decrease of 52%. For impact offences, 91% of the youths had no referrals during the six months following termination.

Recidivism rates were found to be related to (1) length of enrollment in PEC prior to re-referral to the courts, (2) attendance at PEC, and (3) total length of enrollment in PEC. Of the 41 youths who had referrals while enrolled in PEC, 27% were referred to the juvenile court within 30 days after entering PEC, and another 15% were referred during their second month at PEC. Thus, about 42% of all re-referrals occurred during the first 2 months of enrollment, an insufficient period of time for the program to have had an effect, it is suggested.

A significant positive relationship was found between court referrals and the frequency of attendance by youths during their first month at PEC. For example, 64% of those absent for 30% or more of the time during the first month at PEC incurred another referral; while only 28% of those students who were absent for 0-9% of the time during the first month incurred another referral. No information is presented on relationship between referral rates and total length of enrollment in PEC.

Summary & Conclusions

The Providence Educational Center, located in St. Louis, Missouri, offered intensive remedial education and counselling to adjudicated delinquents. University student volunteers acted as tutors, working from 3-10 hours per week.

Referrals were received from the juvenile court and from youth agencies. 118 youths, age 12-16 years, in grades 5, 6 and 7, constituted the experimental group. No control group was established. All youths were several years behind in school. Over two-thirds of the youths were referred for impact offenses (e.g., stranger-to-stranger crime, or burglary); most of the remainder were referred for minor offenses (e.g., truancy, shoplifting, parole violation, inhaling intoxicating fumes, trespassing, disturbing the peace, incorrigibility); and a small proportion were referred for more serious offenses (e.g., stealing, armed robbery, assault, attempted forcible rape, homicide and arson). The average time spent in this program was 14 months, 8 months on remedial education and 6 months after-care, i.e., activities associated with transition to the public schools, vocational training schools, or employment. Six-month follow-up data were obtained and compared with pre- and during-program behaviour.

Results indicated, (1) a significant decrease in involvement in crimes in the year during participation relative to the year prior to the program, (2) a significant increase in educational achievement, (3) a significant decrease in truancy, and (4) a significant reduction in criminal activity during the six months post-program relative to the six months prior to the program.

This is another of the relatively long-term, low-volume, higher-cost programs. As the author notes, the cost of providing services to each youth for the 1972-1973 school year was \$ 3,300.00, which is higher than the per-student cost for the public school system, but lower than the client cost for two comparable institutional programs. The per-youth cost at the Missouri Hills Home for Boys was \$ 6,800.00, and that at the State Training School was \$ 11,000.00. The use of student volunteers is a plus, and makes the program less expensive than otherwise would be the case. Two methodological difficulties with the study are, (1) no control group, and (2) insufficient follow-up time, both of which lessen confidence in the significance of the findings. Clients may be considered mostly moderate risk, with some low risk and a small proportion high risk.

F Florida Juvenile Diversion Program - Quay & Love (1977)

The Florida Juvenile Diversion Program was sponsored by the Juvenile Services Program and operated by the Learning Systems Incorporated under a contract to the U.S. Department of Labour.

Clients & Referral Source

Four hundred and thirty six participants, age 12-16 years, (average 15.8 years), were divided into three sub-groups, (1) those children legally adjudicated as delinquents (DEL) by the juvenile court (N=71), (2) those children designated as being in-need-of supervision (CINS) by the juvenile court (N=268) and (3) informal referrals (INF) of children not in formal contact with the court

system referred by police, schools, and various other community agencies (N=93). Similarly, there were three sub groups of controls (average age 15.8 years) treated by whatever other means were available to the juvenile justice system; CINS (N=18), DEL (N=92), and INF (N=22) for a total of 132 control cases.

Cases were randomly assigned to the experimental and control groups after an initial intake interview. The experimental participants had a minimum of 30 days post program community experience, with an average of 311 days, while the controls had a minimum of 90 days exposure and an average of 450 days. The experimental groups had an average of 89 days in-program time.

The average beta I.Q. for all subjects was 98.7, the average reading level about grade 7.4.

There were no differences between the experimental and control subjects on the number of biographical variables. The average age was 15.8 years, the highest school grade completed 8.7 years. No differences were found between the experimental and control groups on a number of prior status offences, offences against the person, property offences, victimless offences, personality problems, or maturity. There was one significant difference between the two groups, and that was a behavioral rating of conduct disorder, suggesting that the experimental subjects had a history of more acting out, aggressive behaviour than the controls.

Intervention

Detailed information about the intervention procedures was not available. Services were provided in three major areas, (1)

vocational counseling, job training and placement, (2) educational tutoring, and (3) individual and group counseling.

Community volunteers assisted in providing academic tutoring.

Results

Results indicated that the CINS and DEL experimentals did not differ from their corresponding controls in the average number of rearrests per individual. The INF experimentals, however, averaged significantly fewer rearrests per individual than their control counterparts. The program effect, therefore, was evident only for the informal referrals (e.g. the low risk group).

Seventy-two percent of the experimental youths were considered to have successfully completed the program. Rearrest data gathered during the post-program period showed that only 28% of the successful terminators were rearrested, while 44% of the unsuccessful terminators were rearrested. Moreover, a small percentage (21%) of the unsuccessful terminators accounted for a disproportionate (34%) number of total rearrests for the experimental group. Successful termination, therefore, is an important criterion to reach. Both groups averaged 89 days in the program.

The fact that the greatest degree of success was obtained with the informally referred participants suggests that intervention for adolescents might best take place at the time they come to the attention of some social service or educational agencies. (Quay & Love, 1977).

Only 25% of the 93 experimental informal group were rearrested following program participation, while 64% of the 22 control

informals recidivated, a highly significant difference. This represents successful diversion by a non criminal justice agency, and is in the true sense delinquency prevention (Quay & Love, 1977).

Summary & Conclusions

The Florida project, located in Pinellas County, was operated by Learning Systems Incorporated. The program provided, (1) vocational counselling, training and job placement, (2) educational upgrading, and (3) individual and group counseling. Community volunteers assisted in providing services.

436 participants aged 12 to 16 years (mean 15.8 years), were divided into three subgroups, (1) those children legally adjudicated as delinquents by the juvenile courts, (2) those children designated as being in need of supervision by the juvenile court and (3) informal referrals of children not in formal contact with the court system, referred by police, schools, and various other community agencies. Similarly, there were 132 control youths divided into 3 subgroups (average age 15.8 years) treated in the usual manner by the juvenile justice system. Youths were randomly assigned to the experimental and control groups after an initial interview. The average in-program time for both experimental and control groups was 3 months; the average follow-up time was 10 months.

Results indicated, (1) a significant reduction in recidivism only for the informal referrals, suggesting that the program was effective for the low-risk group only, and (2) a significant reduction in recidivism for successful terminators compared to unsuccessful

terminators, suggesting that successful completion of the program is an important goal to reach.

This is a well designed study, with random assignment of youths to experimental and control groups. The follow-up period (approximately 1 year) is longer than most. The length of the program is relatively short (3 months), permitting it to handle a large number of youths at a time, and making it less expensive than longer-term, low-volume programs. No cost figures were given. The use of volunteers also makes it less expensive. The follow-up time, although moderate (10 months), needs to be extended for increased confidence in the findings. A major problem with the program is that it appears to be effective only with the low-risk youths -- those youths referred by police, schools, and community agencies, but having no formal contact with the court system.

I The University of Utah Study - Alexander & Parsons (1973)

The University of Utah project, a family intervention program, was introduced through the Family Clinic at the University of Utah, and operated from October, 1970 to January, 1972. It is a short-term, behaviourally oriented family intervention program designed to increase family reciprocity and clarity of communication. Volunteer first- and second-year graduate students in clinical psychology, under the supervision of faculty, provided the treatment.

Organization

Graduate students in clinical psychology participate as part of their clinical practicum. Initial training includes: (1) four weeks

of group training involving role playing, discussions of therapist training manuals, and live observations through one-way mirrors of faculty dealing with families, (2) practice sessions dealing with families supervised by faculty, and (3) bi-weekly meetings with faculty to consult on the progress of the intervention with the families. In general, students receive about six hours of training and supervision each week.

Clients and Referral Source

Referrals were received from the Salt Lake County Juvenile Court. The families of 86 youths, 38 male and 48 female, ranging in age from 13-16 years, were randomly assigned to one of four conditions, (1) short-term family behavioural treatment (n = 46), (2) client-centered family groups treatment (n = 19), (3) eclectic psychodynamic family treatment (n = 11), and (4) no treatment controls (n = 10).

Youth had been arrested or detained for the following offenses; (1) runaway, (2) ungovernable, (3) habitually truant, (4) shoplifting, and (5) possession of alcohol, soft drugs, or tobacco, and may be considered low risk in terms of their progress for rehabilitation.

There were no differences among groups on a number demographic variables (e.g., age, socioeconomic status, sex), and prior recidivism rates.

Intervention

Forty-six families were randomly assigned to the short-term behavioural family intervention treatment. The intervention was aimed at extinguishing maladaptive interaction patterns and instituting

reciprocity in their place. The attempt was to modify the interactions of delinquent families so that they approximate the patterns of well-adjusted, normal families. Previous research has shown that deviant families tend to be more silent, talk less equally, have fewer positive interruptions, and are less active than normal families (Alexander, 1970; Duncan, 1968; Mischler & Waxler, 1968; Stuart, 1968; Winter & Ferreira, 1969). These kinds of maladaptive family behavioural patterns have been submitted under the label lack of reciprocity in family interaction by Patterson & Reid (1970), who have shown that when the amount and balance of mutual positive reinforcement has been made more equitable the rate of disruptive behaviour in the family is significantly reduced.

To modify delinquent family interactions the process of contingency contracting (Stuart, 1968) was used. In this process, the family interventionists model, prompt and reinforce family members to provide, (1) clear communication of substance and feelings, (2) a clear presentation of demands and alternative solutions. This leads to negotiation of privileges and responsibilities for each family member. Since most family members are initially unwilling to negotiate on the major issues that led to the delinquent offense, family interventionists are forced to choose less crucial issues to use in training family members in contingency contracting (e.g., remaining after school until supper in return for washing dishes). Generally, this procedure worked well, i.e., success in resolving minor issues was accompanied by a willingness to negotiate on the major issues.

A second major manipulation involved the systematic application of social reinforcement (praise) for appropriate communication behaviour. A number of communication patterns were identified, (1) interruption for clarification, (2) interruption for clarification about the topic or about one's self in relation to the topic, and (3) interruption for feedback to other family members. The interventionist explicitly stated the meaning and purposes of these interruptions and also praised family members for exhibiting these kinds of statements. Family members were encouraged to reinforce each other, and in some of the families, each member was asked to identify the ways in which he would like to be rewarded by the others, as a means of increasing satisfaction from the reinforcement.

Results

Results are discussed with regard to, (1) process data, and (2) recidivism data. Recidivism data were obtained during a 6-18 month interval following termination of the program. Although the follow-up period for individual families varied widely, across groups the follow-up period was comparable. In addition to the four original groups, (1) short-term family behavioural treatment, (2) client-centered family group treatment, (3) eclectic psychodynamic family treatment, (4) no treatment control, two additional control groups, (5) post hoc selected no treatment controls, and (6) county-wide recidivism rates, 1971, were instituted. For the post hoc selected control group, 46 families were randomly selected in a yoked fashion to correspond to the short-term family behavioural treatment group. They were selected from several hundred court cases referred, but not

assigned treatment, during the project period. The last comparison group consisted of the recidivism rates for 2800 cases seen in Salt Lake County during the year 1971, some of whom received treatment (i.e., Community Mental Health, church sponsored counseling, private therapy, etc.), but most not.

Results of the recidivism data indicated that (1) the control groups all had about the same recidivism rate, i.e., 50% for the no treatment controls, 48% for the post hoc selected no treatment controls, and 51% for the county recidivism rates, 1971, (2) Group 2, the client-centered family groups treatment had about the same recidivism rate as the controls (47%), (3) Group 3, the eclectic psychodynamic family treatment group had the highest recidivism rate (73%), and (4) Group 1, the short-term family behavioural treatment group had the lowest recidivism rate (26%).

Process analysis indicated that the short-term behavioural family group had significantly lower variance in talk-time, less silence, and more interruptions (e.g., higher quality) than the client-centered family groups and no treatment controls. Thus, the short-term family behavioural treatment group had not only the lowest recidivism rate, but also the most favourable process outcome. As confirmation of the relationship between the process variables and outcome variables, all cases were divided into recidivism vs. not recidivism groups, independent of treatment category, and compared for differences on the process measures. Results indicated significantly lower variance, less silence and more interruptions for the non-recidivism cases relative to the recidivism cases, thus supporting the relationship between process and outcome variables.

J Summary and Conclusions

Nine diversion projects for delinquent and pre-delinquent youths were evaluated. The programs offered individual and family counseling, educational upgrading, pre-employment counseling and job placement, and peer-group counseling. The length of the programs ranged from short-term (e.g., 5-6 weeks) to relatively long-term (e.g., 8-12 months). The intervention techniques varied from short-term, family-crisis, counselling by probation officers and university students to long-term, intensive work with the youth and their families using a number of approaches, e.g., behavioural contracting, child advocacy, behavioural analysts, educational specialists. Volunteers (e.g., university students, community workers) were utilized in six studies, as tutors, advocates, counsellors for the youth and their families.

Youths participating in diversion programs ranged in age from 11 to 17 years, with an average age of about 14 years. They were referred to the programs by the police, the juvenile courts, youth service bureaus, public schools and other social agencies, and varied from low (no police contacts) to moderately high-risk (1-2 prior convictions) in terms of past history of delinquent behaviour and likelihood of successful rehabilitation. Approximately 4700 youths in all were involved in diversion programs. All of the programs reported reduced recidivism, and those that provided educational and employment upgrading reported significant progress in those areas. Cost-effectiveness information was provided for two of the reports, and in both cases was deemed to be less (in one case 50% less) than

the traditional juvenile justice procedure. Two of the studies found learning disabilities, and one found corresponding neurological deficits.

A number of methodological difficulties continue to plague diversion studies. These include, (1) a small number of subjects in the experimental and control groups, particularly in the control groups, (2) youth in the control group not remaining free of some kind of treatment, (3) lack of random assignment to experimental and control groups, and (4) insufficient post-treatment follow-up time. Small number of subjects, non-random assignment of subjects to experimental and control groups, and contamination of control groups all mitigate against generalizing the findings to the population as a whole.

The lack of a comparable no-treatment control group makes it impossible to confidently attribute significant effects to the treatment program. Positive effects, for example, may have been due to a number of factors, e.g., simple passage of time, a particularly low risk sample, some unknown environmental influence. Even when control groups are introduced at the beginning of a study it is difficult to ensure that they are retained throughout the duration of the study. Only five of the nine studies began with control groups, and two of the control groups had to be discontinued in the face of public pressure against withholding beneficial treatment (assumed) from those in need. The longer-term studies typically suffered from small number of subjects, and contaminated and/or lack of control groups.

Post-treatment, follow-up data are essential for determining the stability of the treatment effects. A program which deters delinquent behaviour only during in-program time does little more than incarceration. For pre-delinquent and delinquent youths, age 12-14 years, it would seem desirable to follow them at least until their late teens, which would mean 3-5 years follow-up period. The optimal length of the follow-up period needs to be investigated since different results can emerge depending upon the group being studied and the post-treatment time interval. Two-year follow-up data gathered by Achievement Place researchers, for example, showed that the recidivism rate doubles (from 6-12%) during the second year of follow-up for the experimental group, while it increased by 43% (from 10% to 53%) for a Boys School control, and by 24% (from 30% to 54%) during the second year follow-up for a Probation Control group (Phillips et al, 1975). McCord (1978), in a 30-year follow-up of the original McCord et al (1959) study, reported no positive effects and some negative effects (e.g. greater likelihood of committing more than one crime, greater manifestation of serious mental illness, lower SES, lower work satisfaction, greater number of stress related diseases, younger age at death) of a 5-year family treatment program involving counselling, academic tutoring and recreational guidance. Such results suggest that long-term post-treatment follow-up data (e.g., 10, 20, 30 years) may be necessary to obtain an accurate indication of the effects of family intervention programs.

All but one of the diversion programs reported follow-up data, gathered at from six months to two years following treatment. In all cases, recidivism was reduced relative to a control group, or a

projected recidivism rate based on past experience. Still, especially for the younger-aged youths, longer follow-up periods are necessary to monitor the effectiveness of the treatment program.

Despite the methodological difficulties with the studies, a number of tentative conclusions and recommendations deserve consideration, (1) diverting youth from the traditional juvenile justice system to a program involving one, or a combination of counselling, educational upgrading, job placement, does appear to be a viable alternative to the usual court procedure, (2) short-term (e.g., 5-6 weeks), family-crisis counselling appears to effectively reduce recidivism for low-risk clients (e.g., youths not formally adjudicated), but not for higher risk clients, (3) more intensive (e.g., a combination of counselling, educational upgrading, job placement), longer-term (e.g., 8-15 months) treatment appears to be effective with moderate and moderately high-risk clients, (4) remedial programs directed at correcting learning disabilities (and neurological deficits) may need to be a component of educational upgrading programs for delinquents, and (5) researchers need to compare the relative effectiveness of alternate programs to determine which seems best for what type of client.

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