

PROSOCIAL MORAL REASONING, EMPATHY, PERSPECTIVE-TAKING, AND SOCIAL  
BEHAVIOR: A COMPARATIVE STUDY OF DELINQUENT AND NONDELINQUENT  
YOUTH

by

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## ABSTRACT

This research study was guided by four purposes. First, to compare the prosocial moral reasoning of juvenile delinquents with that of their nondelinquent peers. Second, to compare both empathy and perspective-taking between these two groups. Next, to explore and elucidate the relationships among prosocial moral reasoning, empathy, and perspective-taking; and to examine the relationship of these constructs to dimensions of social behavior and aggression in delinquent and nondelinquent youth. And finally, to explore prosocial moral reasoning, empathy, and perspective-taking within the delinquent sample. Forty juvenile delinquent males and 40 of their nondelinquent peers were matched in terms of age and ethnicity. All participants were individually administered measures designed to assess prosocial moral reasoning, empathy, perspective-taking, and positive and negative social behaviors (via teacher and self-reports) in one 50-minute session. Delinquent participants were classified into one of three subgroups on the basis of their scores on a self-report measure of aggression against persons and property; (a) low aggression-against-persons and low aggression-against-property, (b) high aggression-against-persons and low aggression-against-property, and (c) high aggression-against-persons and high aggression-against-property. The results generally revealed that delinquent participants were lower in prosocial moral reasoning, empathy, and perspective-taking than their nondelinquent peers. Further, significant relationships were found among the variables of prosocial moral reasoning, empathy, perspective-taking, positive and negative indices of social behavior, and type of aggression. Finally, delinquent adolescents classified into the subgroup scoring high on both aggression-against-persons and aggression-against-property were found to score significantly lower on both empathy and perspective-taking than delinquents classified as scoring low on both types of aggression. No significant differences were found among any of the three delinquent subgroups on prosocial moral reasoning. Theoretical and practical implications of these findings are discussed in terms of the strengths and limitations of the present study and suggestions for future research.

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## CHAPTER 1

### Introduction

Over the past several decades, a plethora of researchers have examined moral reasoning as conceptualized by Kohlberg (1958, 1969, 1976; for reviews see Rest, 1983, 1986b; Turiel, 1997). One focus of this research has been to identify an association between moral reasoning and moral behavior. In some of these studies, researchers have examined this link by comparing the moral reasoning of typical and atypical populations, such as juvenile delinquents. Delinquency offers a natural ground for testing the relations between moral reasoning and moral behavior, presumably because the moral reasoning of delinquents should be delayed in light of their behaviors (Blasi, 1980; Jurkovic, 1980). Generally, the findings have provided theoretical support for the claim that atypical or deviant youth exhibit more immature forms of moral reasoning than do typical youth (e.g., Campagna & Harter, 1975; Chandler & Moran, 1990; Fodor, 1973; Jurkovic & Prentice, 1977; Lee & Prentice, 1988; McColgan, Rest, & Pruitt, 1983; Trevethan & Walker, 1989).

Nevertheless, recent years have seen the emergence of research on other domains of moral reasoning besides that identified by Kohlberg (e.g., Damon, 1977; Eisenberg-Berg, 1979; Gilligan, 1977). For example, some studies have demonstrated that two different moral orientations exist, a justice- or prohibition-oriented perspective (i.e., Kohlberg's theory of moral reasoning), and a caring or prosocial perspective (Gilligan, 1977; Eisenberg-Berg, 1979; Higgins, Power, & Kohlberg, 1984). Research has also revealed that the prosocial moral perspective makes a significant contribution to the decisions individuals make regarding moral actions (Eisenberg, Lennon, & Roth, 1983). Moreover, prosocial considerations of morality have been documented as separate and distinct from the more prohibition-oriented issues surrounding traditional Kohlbergian conceptions of morality (Eisenberg-Berg, 1979).

Because prohibition-oriented moral reasoning and prosocial moral reasoning are not synonymous terms, preliminary clarifications are essential. In definitive terms, prohibition-

oriented moral reasoning concerns how individuals should think and act toward each other when reasoning about dilemmas where laws, rules, and authorities' dictates are salient concerns.

Prosocial moral reasoning is defined as reasoning about situations in which one person's needs, wants, or desires conflict with those of another in a context in which the role of laws, punishment, authorities, and formal obligations are irrelevant or minimized (Eisenberg, 1986). Although formal obligations are not salient concerns in prosocial moral reasoning, there is still a moral conflict that must be resolved -- conflicts in prosocial moral reasoning involve an individual's reasoning regarding the opportunity to assist another at personal cost (Eisenberg, 1993).

As mentioned above, an abundance of research has compared the prohibition-oriented moral reasoning of typical and atypical populations. Indeed, much is known about prohibition-oriented moral functioning when it has gone awry. No research to date, however, has looked at prosocial moral reasoning in atypical groups. Indeed, because prosocial moral reasoning is a relatively new area of study, our understanding of prosocial reasoning among atypical youth is still limited. Thus, the primary purpose of this study was to compare the prosocial moral reasoning of delinquent and nondelinquent adolescents. Moreover, although research on prosocial moral reasoning in normal populations has found it to be related to empathy, perspective-taking, and social behavior (Eisenberg, Carlo, Murphy, & Van Court, 1995; Eisenberg, Miller, Shell, McNalley, & Shea, 1991; Eisenberg, Shell, Pasternack, Beller, Lennon, & Mathy, 1987), no research has examined whether these variables are related in atypical samples. Thus, a secondary purpose of this research was to explore and elucidate the nature of the relationships among prosocial moral reasoning, empathy, perspective-taking, and social behavior both between and within delinquent and nondelinquent groups.

Research on prosocial moral reasoning has been derived primarily from the cognitive-developmental perspective. Therefore, in order to provide both a theoretical background on the cognitive-developmental perspective and a framework for explicating the differences between prohibition-oriented moral reasoning and prosocial moral reasoning, three influential theories of moral development will be presented. The first consists of a discussion of Piaget's (1932/1965) theory of moral development, followed by the theory of moral development as conceptualized by

Kohlberg (1958, 1969, 1976). The last section involves a discussion of the theory of prosocial moral development as posited by Eisenberg (1979, 1982, 1986). In each section, the extant measures for assessing moral development are delineated within each of the respective theories.

### Piaget's Moral Development Theory

In cognitive-developmental theory, cognition is assigned a central role and people are viewed as being active in their own development rather than being driven by instinctive impulses or molded by environmental factors (Eisenberg, 1986). The cognitive-developmental theory of moral development is based primarily on the work of Jean Piaget (1932/1965), who argued that new knowledge is constructed from the foundations of prior knowledge. Specifically, Piaget posited that the mind builds new knowledge by taking external data and interpreting, transforming, and reorganizing it for every new situation encountered through the processes of assimilation and accommodation. Throughout the course of development, the interaction of new knowledge and prior knowledge create increasingly more complex cognitive structures to represent the world. Indeed, each developmental change presupposes the understandings gained at previous levels of development, resulting in an existing mode of construction that is actually an outgrowth of the prior mode (Colby & Kohlberg, 1987). Although not caused precisely by aging, developmental changes are represented by stages that are associated with certain ages (Flavell, 1985).

As previously noted, the Piagetian cognitive system interacts with external data through the process of adaptation. Specifically, adaptation is composed of two complementary processes, assimilation and accommodation. Assimilation essentially involves interpreting and modifying novel experiences and events into one's existing cognitive structure. When new experiences cannot be assimilated into existing structures, a state of disequilibrium ensues. This state of disequilibrium, or cognitive conflict, motivates the individual to undergo cognitive development by modifying existing structures to accommodate new information. The result is a more developmentally advanced state of equilibrium. According to Piagetian theory, all significant cognitive-developmental advances are made through this kind of equilibration process (Flavell, 1985).

Piaget (1932/1965) formulated his theory of moral development by investigating young children's understanding of ethical issues such as rules, justice, equality, and reciprocity. As a result, he identified two stages of moral development; heteronomous and autonomous morality. The first stage is characterized by the child's belief in and conformity to adult rules and authority. Further, children in this stage judge moral behavior based on the objective consequences of an act as opposed to the intentions of the actor. Through the cognitive process of adaptation, the child matures to the second stage, autonomous morality, where rules are recognized as a means of goal attainment that can be changed if agreed to by all the parties involved. That is, children come to understand the concepts of reciprocity and mutual agreement. Additionally, the child's understanding of culpability matures and the intentions and motives behind acts are considered when judging moral behavior.

Two main techniques for assessing the moral reasoning of children were used by Piaget (1932/1965) in his studies. The first involved questioning a child about the rules of a game. Questions were directed towards clarifying the child's understanding of the rules and determining the child's adherence to the rules. The second technique involved presenting a child with stories that pose a moral dilemma and questioning the child about the stories. Questions in this technique concentrated on issues of whether the morality of harmful action should be judged in terms of the objective consequences of the act, or in terms of the subjective intentions behind the act. Consider the well-known example of the child who inadvertently knocks over a tray containing 15 glasses, breaking them all. This child is contrasted with another who, in trying to reach a jar of jam high on a shelf while his mother is out, knocks over and breaks one glass. By asking which child is the "naughtiest", Piaget was able to demonstrate different understandings of intentionality. Moreover, Piaget believed that the level of maturity in the child's answers would provide evidence of either a heteronomous or autonomous stage of morality.

Although Piaget conducted the first empirical research on the development of moral reasoning, he did not attempt to apply strict or hard-line developmental stage criteria to his levels of moral judgment (Eisenberg, 1986). Moreover, Piaget's theory did not address moral development beyond late childhood. Indeed, it was Lawrence Kohlberg (1958, 1969, 1976) who delineated a

stage theory of moral reasoning development. To that end, Kohlberg's moral development theory must be addressed.

### Kohlberg's Moral Stage Theory

Kohlberg (1958, 1969, 1976) expanded on and modified Piaget's early work on moral development by delineating a six-stage sequence of moral growth. The stages are believed by Kohlberg to reflect true cognitive-developmental changes in the structure of reasoning used to resolve all types of moral conflicts (Colby & Kohlberg, 1987; Kohlberg, 1976). The stages are developmental in that they are characterized by a sequence of qualitative changes from simpler to more complex and differentiated forms of organization (Colby & Kohlberg, 1987; Eisenberg, 1986; Kohlberg, 1976), and are defined by three criteria: (a) invariant sequence, or the progression from one stage to another in sequential order, (b) stage structure, with stages being defined as "structured wholes," as indicated by reasoning at one stage the majority of the time, and (c) hierarchical integration, which implies that higher stages include lower stages as components reintegrated at a higher level.

Stage development depends on the theoretical assumption that certain levels of cognitive understanding must be realized for moral development to occur. That is, moral growth has prerequisites in cognitive domains of thought that must first be reached before moral development can take place. Further, cognitive development, while certainly necessary, is not alone sufficient for moral growth. The attainment of a sufficient level of cognitive growth (e.g., concrete operations) only makes the corresponding moral stage (i.e., Stage 2 - individualism) possible, it does not cause the moral stage to appear (Walker, 1988). According to Kohlberg (1976), certain conditions are needed to stimulate moral growth, including exposure to perspective-taking opportunities, cognitive moral conflict, the consideration of fairness and morality, exposure to the next higher stage of moral reasoning, and active participation in group decision making. In accordance with Piaget, Kohlberg (1969) posited that these conditions can be met primarily through social interactions with peers. Through peer interaction, cognitive disequilibrium can be maximized and movement to the next higher stage of moral reasoning will result. Thus,



disequilibrium is the essential mechanism underlying the transition from one stage of moral development to the next. Kohlberg's six stages of moral development are outlined in Table 1.

Table 1.

Kohlberg's Six Stages of Moral Judgment

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<b>Level 1</b>	<b>Preconventional Morality (Early to Middle Childhood)</b>
Stage 1	Obedience and Punishment Orientation (Egocentric perspective)  Reasons for doing right include obedience to the superior power of authorities and the avoidance of punishment
Stage 2	Individualism, Instrumental Purpose and Exchange Orientation (Concrete individualistic perspective)  Reasons for doing right include serving one's own needs or interests. Right is what's fair, an equal exchange, or an agreement
<b>Level 2</b>	<b>Conventional Morality (Adolescence to Early Adulthood)</b>
Stage 3	Interpersonal Norms Orientation (Perspective of the individual in relationships with other individuals)  Reasons for doing right are based on the need to be viewed by others as a good person
Stage 4	Social System and Conscience Orientation (Differentiates societal perspective from interpersonal motives)  Reasons for doing right involve upholding and maintaining the social order. Right is contributing to society, the group, or the institution
<b>Level 3</b>	<b>Post-Conventional Morality (Adulthood)</b>
Stage 5	Social Contract vs. Individual Rights Orientation (Prior-to-society perspective)  Right is obeying legal standards in the interests of impartiality and maintenance of the social contract. However, some values, like life and liberty, should be upheld regardless of majority opinion
Stage 6	Universal Ethical Principles Orientation (Perspective of a moral point of view)  Right is acting in accordance with one's conscience and with universal ethical principles such as justice, the equality of human rights, and the respect for the dignity of human beings

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Note. Adapted from Kohlberg (1969).

The Moral Judgment Interview (MJJ; Colby & Kohlberg, 1987) is a measure developed by Kohlberg to assess moral reasoning competence. The interview consists of three forms (A, B, and C) that are administered individually. In each form a series of three hypothetical moral dilemmas are presented. Each dilemma is followed by a set of standard probe questions designed to elicit an individual's best reasoning responses. The dilemmas pose a conflict between two moral issues (e.g., contract vs. authority) and individuals are requested, upon reading or hearing a dilemma, to decide what the main character should do in the situation and why. The individual's responses are scored by comparing them with criterion judgments from the scoring manual that represent the various stages of moral reasoning (Colby & Kohlberg, 1987). It should be emphasized that it is not the specific answers per se that an individual gives that determines his or her stage of moral reasoning, but the justifications given by the individual that underlie his or her particular action choice. Consider the following example of the "Joe and the Father" dilemma:

Joe is a 14-year old boy who wanted to go to camp very much. His father promised him he could go if he saved up the money for it himself. So Joe worked hard at his paper route and saved up the \$100 it cost to go to camp and a little more besides. But just before camp was going to start, his father changed his mind. Some of his friends decided to go on a special fishing trip, and Joe's father was short of the money it would cost. So he told Joe to give him the money he had saved from the paper route. Joe didn't want to give up going to camp, so he thinks of refusing to give his father the money. Should Joe give his father the money? Why or why not? (Colby & Kohlberg, 1987, p. 3).

In consideration of the moral reasoning stages outlined in Table 1, Stage 1 moral reasoning is characterized by obedience to authority and the avoidance of punishment. A typical Stage 1 response to the above dilemma would be "[Joe should give his father the money] because you should do what your father or parents tell you to do" (Colby & Kohlberg, 1987, p. 235). At Stage 2, children move to an instrumental purpose orientation, characterized by the satisfaction of personal needs. A response to the above dilemma reflective of Stage 2 reasoning would be "[Joe should give his father the money] because his father will pay him back later, or do favors for him"

(Colby & Kohlberg, 1987, p. 236). At Stage 3, children exhibit an interpersonal cooperation orientation in their moral reasoning that is motivated by the desire to maintain the approval of others. In response to the above dilemma, a Stage 3 reasoner might say “[Joe should give his father the money] to show his father how much he loves him” (Colby & Kohlberg, 1987, p. 238). The reasoning that characterizes Stage 4 moral development is a social systems orientation which takes into account societal laws and maintaining social order. A response typical of Stage 4 reasoning to the above dilemma would be “[Joe should give his father the money] because if there is to be a family unity, there must be an authority in the family (Colby & Kohlberg, 1987, p. 241). Stage 5 moral reasoning emphasizes individual rights and suggests that laws should be changed when they do not meet the needs of the majority of society. In response to the “Joe and Father” dilemma, a Stage 5 reasoner might say “[The most important thing a father/son should consider] is that both persons are individuals with equal rights” (Colby & Kohlberg, 1987, p. 243). Finally, Stage 6 reasoning involves the consideration of universal ethical principles that are valid for humanity. However, in Kohlberg’s longitudinal research, no Stage 6 individuals were found. Colby and Kohlberg suggest that this may be due partly to the inability of their measure to adequately distinguish between Stage 5 and Stage 6. Nevertheless, Colby and Kohlberg hypothesize that Stage 6 reasoners may have included individuals like Ghandi or Socrates.

Although the MJI is both a reliable and valid method of assessing moral reasoning, test administration involves lengthy individual interviews and complex scoring procedures (Rest, 1979). The Defining Issues Test (DIT; Rest, Cooper, Coder, Masanz, & Anderson, 1974), a standardized objective measure of moral reasoning, was developed for quicker and easier assessment. Developed by one of Kohlberg’s students, James Rest, the DIT includes two forms (long and short) that use Kohlbergian dilemmas typical of the interview method, but that do not require verbalization of responses. Instead, after each dilemma, 12 statements representing various stages of moral reasoning relevant to the dilemma are presented. After reading the dilemma, respondents are asked to indicate the importance of each item in deciding what should be done by the protagonist in the dilemma by rating each issue on a Likert-type scale ranging from great importance to no importance. Respondents are then asked to rank the four most important

statements. Two indices can be used in scoring: the P score and the D score. The P score refers to the relative importance a respondent attributes to principled reasoning (Stages 5 and 6), while the D score is an overall index of moral reasoning level. The development of the DIT has provided researchers with a structured self-report measure of moral reasoning that is both reliable and valid, but also more easily administered and scored than the traditional interview method (McColgan et al., 1983). These considerations likely contribute to the fact that the DIT is the most frequently utilized measure of moral reasoning.

In sum, Kohlberg's (1958, 1968, 1976) schema of moral judgment has greatly expanded and contributed to our understanding of moral reasoning. As previously noted, however, recent years have seen the development of a number of other theories that fall within the cognitive-developmental approach, but that do not focus on the prohibitive concerns identified by Kohlberg. Following is a discussion of one of these, the theory of prosocial moral reasoning as conceptualized by Eisenberg (1979, 1982, 1986).

#### Eisenberg's Theory of Prosocial Moral Reasoning

Kohlberg's theory of moral development investigates only one domain of moral judgment, that of prohibition-oriented moral reasoning (Eisenberg-Berg, 1979). Recent years have seen the advent of research suggesting that other domains of moral reasoning exist besides this prohibition-oriented realm (e. g., Damon, 1977; Eisenberg-Berg, 1979; Gilligan, 1977; Higgins, Power, & Kohlberg, 1984). One such domain of moral reasoning -- prosocial moral judgment -- centers on more altruistic and empathic considerations than Kohlberg's justice approach.

In nearly all of Kohlberg's dilemmas, laws, authorities, rules, punishment, and formal obligations are salient concerns. Further, in the typical Kohlbergian dilemma (Colby & Kohlberg, 1987), prosocial moral reasoning is most often cast in a prohibition-oriented context in which a prosocial act necessarily constitutes the violation of an authority's dictates (Eisenberg, 1982). In other words, Kohlberg's dilemmas often pit one prohibition against another. Consider the Joe and Father dilemma previously illustrated (Colby & Kohlberg, 1987), where participants must reason about issues like the breaking of promises, the blatant disregard of a parent's authority, and the

unjust treatment of children's rights. All these considerations are viewed as negative in our society and, hence, all action choices represent a transgression. According to Eisenberg (1982), "Kohlberg's dilemmas do not deal with situations in which the primary cost of helping another is personal, and prosocial action does not necessarily entail committing a transgression and/or violating authorities, rules, or laws" (p. 231).

In light of this, Eisenberg-Berg (1979) began a program of research focusing on prosocial moral reasoning as separate and distinct from prohibition-oriented moral reasoning. Prosocial moral reasoning is defined as reasoning about dilemmas in which one person's needs, wants, or desires conflict with those of another in a context in which the role of laws, punishment, authorities, and formal obligations are irrelevant or minimized (Eisenberg, 1986). In an effort to delineate age-related changes in this type of judgment, Eisenberg and her colleagues conducted a series of longitudinal and cross-sectional studies examining the prosocial moral judgment of children and youth (e.g., Eisenberg et al., 1995; Eisenberg et al., 1983; Eisenberg et al., 1991; Eisenberg et al., 1987; Eisenberg-Berg, 1979; Eisenberg-Berg & Roth, 1980). The typical procedure in their research has been to present participants with four prosocial moral dilemmas during individual interview sessions in order to elicit reasoning responses. The dilemmas are structured similarly to Kohlbergian dilemmas (Colby & Kohlberg, 1987), except that each story involves the needs and wants of one individual (or more) being in direct conflict with those of another (or others) in a context where the roles of prohibitions, laws, rules, obligations, and the like are de-emphasized. Consider the following example that has frequently been administered to younger children:

A poor farming village named Circleville had a harvest that was just enough to feed the villagers with no extra food left over. Just at that time a nearby town named Larksdale was flooded and all this town's food was ruined, so that they had nothing to eat. People in the flooded town of Larksdale asked the poor farmers of Circleville to give them some food. If the farmers did give the food to the people of Larksdale, they would go hungry after working so hard all summer for their crops. It would take too long to bring in food from

other villages further away because the roads were bad and they had no airplanes. What should the poor farming village do? Why? (Eisenberg-Berg, 1979, p. 179).<sup>1</sup>

In her initial study involving second through twelfth graders, Eisenberg-Berg (1979) examined developmental changes in prosocial moral judgment by coding the participants' reasoning into a variety of categories. These "moral consideration categories" resemble Kohlberg's stages in that they reflect both the content and the structure of reasoning (Eisenberg, 1982). By subjecting the categories to various statistical analyses, and by conducting both cross-sectional and longitudinal research (Eisenberg et al., 1995; Eisenberg et al., 1983; Eisenberg et al., 1991; Eisenberg et al., 1987; Eisenberg-Berg & Roth, 1980), it became possible to delineate an age-related sequence of development of prosocial moral reasoning. The stages of prosocial moral reasoning are outlined in Table 2. As can be seen, self-oriented, hedonistic reasoning is the least developmentally mature type of moral judgment, dominant in only the reasoning of preschool and elementary aged school children. Hedonistic reasoning is characterized by self-focused consequences and future reciprocity. In consideration of the dilemma outlined above, a response typical of hedonistic reasoning would be "[the farmers should help] because they might need help from the villagers some day" (Eisenberg-Berg, 1979, p. 180).

Hedonistic reasoning is followed by needs-oriented reasoning, which focuses primarily on concern for the physical and psychological needs of others. Needs-oriented reasoning closely resembles Stage 2 in Kohlberg's system. However, given that it is characteristic of very primitive empathic considerations (Eisenberg, 1986), and that it is negatively related to hedonistic reasoning, needs-oriented reasoning is not analogous in developmental maturity to the egoistic categories of reasoning in Kohlberg's Stage 2 (Eisenberg, 1986). Further, while hedonistic reasoning decreases with age, needs-oriented reasoning increases, suggesting that it is empirically a more developmentally mature type of moral consideration (Eisenberg, 1986). In response to the "flood" dilemma outlined above, a needs-oriented reasoner might say "[they should help] because the

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<sup>1</sup> If a participant responded as if the story were a life and death situation, the interviewer made it clear that the people in the story would not die if the story characters refused to help -- they would only be in pain, be very hungry, and so forth (Eisenberg-Berg, 1979).

villagers in the flooded town would be happy if they had food to eat” (Eisenberg-Berg, 1979, p. 180).

The next stage of prosocial moral reasoning identified by Eisenberg and her colleagues (1983) is approval/stereotyped reasoning, which is based on images of good and bad persons and maintaining the approval of others. A response typical of stereotyped reasoning to the above dilemma might be “[they should help] because it is the nice thing to do”, while an approval-oriented reasoner might say “[they should help] because then others would be proud of them” (Eisenberg-Berg, 1979, p. 180). The next stage of prosocial moral reasoning, level 4a is characterized by self-reflective empathic responding and role-taking. Level 4a reasoners might respond to the “flood” dilemma by saying “[they should help] because otherwise you feel sorry for them” (Eisenberg-Berg, 1979, p. 180). Levels 4b and 5 are the most advanced stages of reasoning, predominate in only a minority of high-school students and no elementary-school children (Eisenberg, 1986; Eisenberg et al., 1983). These stages are characterized by internalized values concerned with the condition of society and protecting the rights and equality of others. A typical response to the above dilemma would be “[they should help] because if everyone helps one another, we would all be better off” (Eisenberg-Berg, 1979, p. 180).

Table 2.

Eisenberg's Levels of Prosocial Moral Reasoning


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<b>Level 1</b>	<b>Hedonistic/Direct-Reciprocity Orientation</b> (Preschool and Early Elementary)
	Concerned with self-focused consequences. Reasons for assisting or not include consideration of direct gain to the self, future reciprocity, or because of affectional ties (one needs and/or likes the other)
<b>Level 2</b>	<b>Needs-Oriented Orientation</b> (Elementary)
	Concern for the physical, material, and psychological needs of others. However, no evidence of self-reflective role taking, sympathy, or internalized affect
<b>Level 3</b>	<b>Approval/Stereotyped Orientation</b> (Mid Elementary/Early High-School)
	Justifications based on images of good and bad persons and behaviors and/or consideration of others' approval
<b>Level 4a</b>	<b>Self-Reflective/Empathic Orientation</b> (Late Elementary/High-School)
	Judgments include evidence of self-reflective empathetic responding or role taking, concern with another's humanness, and/or guilt or positive affect related to the consequences of one's actions
<b>Level 4b</b>	<b>Transitional Level</b> (Minority of High School-Students)
	Evidence of internalized values, norms, duties or responsibilities, concern for the condition of the larger society, and the necessity of protecting the rights and dignity of others. However, these ideas are not clearly or strongly stated.
<b>Level 5</b>	<b>Internalized Orientation</b> (Minority of High-School age and older)
	Internalized values and the desire to maintain individual and societal contractual obligations and improve the condition of society. The belief in the dignity, rights, and equality of all individuals. Positive or negative affect related to the maintenance of self-respect for living up to one's own values.

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Note. Adapted from Eisenberg (1982); Eisenberg et al., (1983)



As noted, the traditional measure for assessing prosocial development is the Prosocial Moral Reasoning Interview (Eisenberg-Berg, 1979). Like typical interview measures, it is susceptible to criticisms because of its reliance on verbal production skills, its extensive scoring procedures, and its vulnerability to experimenter and instrumentation bias (Carlo, Eisenberg, & Knight, 1992). In order to address these concerns regarding the nature of the interview method, an objective measure of prosocial reasoning was developed -- The Prosocial Moral Reasoning Objective Test (PROM; Carlo et al., 1992). The PROM resembles the DIT (Rest et al., 1974) in format and scoring procedures. Although not extensively used to date, the PROM has demonstrated satisfactory psychometric properties and is as easily administered and scored as the measure it was modeled after (Carlo et al., 1992; Eisenberg et al., 1995). Because the PROM was used in the present study to assess prosocial moral reasoning, it will be reviewed in greater detail in Chapter 3.

Thus, although prosocial moral reasoning is a relatively recent area of study compared to the more intensively researched prohibition-oriented realm, recent years have seen important advances in the assessment and understanding of prosocial moral reasoning as a separate and distinct mode of moral judgment. It should be noted that the research on prosocial moral reasoning has found that some conceptual similarities exist between prohibition-oriented and prosocial moral reasoning. For example, the nature of the empirical changes in reasoning indicated by the prosocial moral reasoning stages (Eisenberg et al., 1995; Eisenberg et al., 1983; Eisenberg et al., 1991; Eisenberg et al., 1987; Eisenberg-Berg & Roth, 1980) are consistent, on the whole, with prior research concerning moral judgment. That is, a self-focused or egoistic orientation (i.e., hedonistic) has generally been viewed by researchers as morally immature, while a concern with abstract ethical principles and the imperatives of conscience (i.e., internalized orientation) have been regarded as representative of a relatively high level of development (Eisenberg, 1986). Moreover, both the theory of prosocial moral reasoning and Kohlberg's model of moral judgment are in concert with the notion that development is limited, in part, by individuals' level of cognitive development (Eisenberg, 1986) and their ability to adopt another's perspective (Eisenberg et al., 1991). Consider, for example, that young children are clearly incapable of expressing high level

modes of reasoning, such as levels 4 (i.e., self-reflective orientation) or 5 (i.e., internalized orientation). Further, both theories adopt the cognitive-developmental assumption that the maturity of reasoning underlying an act changes as the capacity for higher-level moral judgment develops (Eisenberg et al., 1987). Indeed, despite individual differences in children's prosocial moral reasoning, "such reasoning does tend to become more altruistic with age" (Eisenberg, 1986, p. 158). Finally, higher-level prosocial moral reasoning has been associated with both the frequency and quality (e.g., more altruistic) of prosocial behavior (Eisenberg et al., 1991).

Nevertheless, several conceptual differences do exist between the development of prosocial and prohibitive moral reasoning. For example, "authority and punishment-oriented considerations are virtually nonexistent in preschoolers' prosocial moral judgment" (Eisenberg, 1986, p. 146). This is surprising, given that it is the major mode of prohibition-oriented moral reasoning among young children in Kohlberg's (1969) theory. In any case, it is probable that children verbalize so few authority or punishment-oriented concerns because they are seldom punished for failing to assist another when they themselves have not caused the harm (Eisenberg, 1986). Secondly, some research suggests that prosocial moral reasoning is developmentally more advanced than prohibition-oriented reasoning (Eisenberg-Berg, 1979; Kurdek, 1981). Indeed, references to empathy-related processes, such as perspective-taking, seem to emerge earlier and are particularly common in prosocial moral reasoning (Eisenberg-Berg, 1979). Again, this is inconsistent with Kohlberg's findings, which include the emergence of empathic considerations in Stage 3. Such findings suggest that empathic abilities play a larger role in prosocial moral reasoning than in prohibition-oriented moral judgment (Eisenberg-Berg, 1979). Further, factors such as socialization influences, personality variables, contextual information, and the interaction of all three play a considerably more important role in the development of prosocial moral judgment than prohibition-oriented moral reasoning (Eisenberg, 1982). Finally, although less mature types of reasoning decrease in frequency with age, high-level reasoners occasionally revert to using lower-level reasoning, particularly when justifying decisions not to assist a needy other (Eisenberg, 1982).

These differences underlie the need to discuss the assumptions Kohlberg's theory makes regarding the structure, sequence, and hierarchical integration of his moral reasoning stages. Because the theory of prosocial moral reasoning is relatively recent, Eisenberg (1986) notes that at this point in time it is not possible to make the same assumptions. Indeed, given that a single individual often exhibits reasoning at a variety of levels, the theory does not claim that stages represent "structured wholes". Additionally, the theory of prosocial moral reasoning does not claim that levels are invariant in sequence. As an example, although level 3 emerges at an earlier age than level 4, some individuals have exhibited level 4 responding without expressing level 3 at all. That is, level 3 appears to have been "skipped" or "passed over" (Eisenberg, 1986). Finally, the data on prosocial moral reasoning reject the assumption of hierarchical integration, adopting instead a "layer-cake" model as proposed by Rest (1979). In this model, higher stages of moral reasoning are added to the individual's existing moral repertoire with no loss of access to lower-stages. The research on prosocial moral reasoning is consistent with this model in that individuals capable of using relatively high moral judgments often simultaneously use a variety of lower-level modes of reasoning (Eisenberg, 1986).

Thus, the theory of prosocial moral reasoning, as it currently stands, does not exemplify "hard" developmental stages as does Kohlberg's theory. Yet, Eisenberg (1986, 1990) has frequently recognized the necessity for further research to expand our current understanding. Indeed, several issues still need to be addressed in future research. First, there is relatively little theoretical or empirical work on the development of prosocial moral reasoning in adolescence (Eisenberg, 1990). Indeed, investigations into moral reasoning development are not typically focused on adolescence in general. As noted by Eisenberg (1990), most research involving adolescents are studies of convenience in that samples range in age from children to adults. Adolescent moral development itself has not been a salient concern. Second, research on prosocial development overall is still somewhat limited. Indeed, as noted, no research has yet examined prosocial moral reasoning in atypical or deviant populations, an oversight that has certainly restricted our understanding of both this important construct and this population.

Thus, it was the aim of the present study to redress these concerns by investigating the prosocial reasoning of adolescents, and in particular, to compare the prosocial moral reasoning of juvenile delinquents with that of their nondelinquent peers. In addition, considering the equivocal findings in the literature, this study aimed to provide further information aimed at clarifying whether delinquent populations differ from their nondelinquent peers on empathy and perspective-taking. Finally, this study explored the relationships among prosocial moral reasoning, empathy, perspective-taking, and social behavior both between and within these two groups. It is hoped this research will enhance our current understanding of prosocial moral reasoning, while providing valued insight regarding the prosocial development of disturbed youth than is presently known. Before presenting this research, a review of relevant empirical research is presented in the following chapter.

## CHAPTER II

### Review of the Literature

This review is divided into six sections. The first section is a review of the literature on the development of prosocial moral reasoning. The purpose of this section is to both provide information on the characteristics and development of this relatively new theoretical perspective, and to adequately differentiate the differences between prosocial and prohibitive moral reasoning. The second section consists of a review of research pertaining specifically to prohibition-oriented moral reasoning in atypical populations, while the third section is comprised of a review of the literature on empathy and perspective-taking in deviant groups. The fourth section includes a review of research regarding the relationship between both modes of moral reasoning and empathy and perspective-taking in atypical populations. The fifth section includes a review of research regarding the relation between moral reasoning and social behavior. Finally, this chapter concludes with the rationale, significance, and research questions of the present study.

#### The Development of Prosocial Moral Reasoning

In the past two decades, research on the development of moral judgment has served to greatly expand our understanding of moral reasoning (e.g., Colby & Kohlberg, 1987; Kohlberg, 1976; Rest, 1983, 1986b). As previously noted in Chapter 1, most of the available studies have focused on only one aspect of morality, that of prohibition- or justice-oriented reasoning. From this theoretical perspective, laws, rules, authorities, and formal obligations are prominent concerns which dominate the reasoning about conflicts (Eisenberg-Berg, 1979). Because individuals make moral decisions based on something other than “justice”, researchers have begun investigations to chart the development and internal structures of what Eisenberg-Berg termed “prosocial moral reasoning”. This type of moral reasoning refers to contexts where rules, laws, and obligations are minimal, but where an individual must choose between satisfying one’s own personal needs and desires or those of another individual. In brief, prosocial moral reasoning

involves situations where the primary cost of helping another is personal. However, failing to do so does not result in committing a transgression or violating an authority, rule, or law. It should be noted that the terms moral reasoning and prohibition-oriented moral reasoning will be used to refer to those studies concerned with Kohlberg's definitions and stages. The term prosocial moral reasoning will be used only in reference to Eisenberg's definition as mentioned above. In order to provide a more comprehensive understanding of prosocial moral reasoning, a review of several of the important studies in this area will now be presented

The earliest study examining prosocial moral reasoning was a cross-sectional study conducted in 1979 by Nancy Eisenberg-Berg. Her primary purpose was to determine whether or not the development of prosocial moral judgment was distinct from prohibition-oriented moral judgment. Eisenberg-Berg designed four prosocial moral dilemmas, similar in style and format to the dilemmas found in Kohlberg's MJI (Colby & Kohlberg, 1987), in order to assess level of prosocial moral reasoning. Research participants included 125 second, fourth, sixth, ninth, eleventh, and twelfth graders. Participants were individually interviewed and their reasoning was coded into a variety of moral judgment categories that delineated the development of prosocial moral judgment.

Results revealed that elementary school children reasoned at lower levels of prosocial moral reasoning (i.e., more hedonistically, stereotypically or approval-oriented), while high school students' reasoning reflected more abstract and empathic moral concerns. Eisenberg-Berg compared the data of her study with previous research on prohibition-oriented moral reasoning (i.e., Kohlberg, 1969) and concluded that the early development of prosocial moral reasoning differed. More precisely, virtually none of the children in her study used punishment and authority-oriented considerations (i.e., Stage 1 in Kohlberg's theory). Additionally, participants in her study used considerably more stereotyped reasoning (defined similarly in both prohibition-oriented and prosocial moral reasoning theories) at an earlier age than had been reported in prohibition-oriented research (Eisenberg-Berg, 1979). Eisenberg-Berg deduced that reasoning that results in positive consequences for others is more advanced than reasoning about moral prohibition. She provided support for this difference by noting that individuals were more likely to

encounter prosocial issues as part of everyday life than to encounter a prohibitive issue as described in Kohlberg's dilemmas. In sum, Eisenberg-Berg's results provided initial support for prosocial moral reasoning as a mode of moral judgment separate and distinct from the more commonly researched prohibition-oriented realm.

In another study, Eisenberg-Berg and Roth (1980) investigated whether differences in prosocial moral reasoning represented developmental advances and not merely cohort effects. That is, the researchers examined whether higher levels of prosocial moral reasoning would be evidenced as age increased. Participants included 18 males and 16 females between the ages of five and seven, who had participated in a previous study (i.e., Eisenberg-Berg & Hand, 1979) approximately 18 months earlier, thereby providing data for longitudinal analyses. Four prosocial moral dilemmas were administered to assess levels of moral reasoning and participants' responses were coded into Eisenberg-Berg's (1979) prosocial moral consideration categories. Cognitive role-taking was also assessed utilizing a seven-picture role-taking task developed by Flavell, Botkin, Fry, Wright, and Jarvis (1968).

Results revealed that hedonistic reasoning had decreased since the previous study, approximately 18 months earlier (see Eisenberg-Berg & Hand, 1979). Conversely, needs-oriented and approval-oriented reasoning increased over time. Thus, the authors postulated that needs-oriented and approval-oriented reasoning characterize more developmentally advanced moral judgments than hedonistic reasoning. Further, no relationship was found between prosocial moral reasoning and role-taking ability. However, Eisenberg-Berg and Roth (1980) attributed this lack of relationship either to the inability of their materials to adequately assess role-taking in the early years, or to the little influence role-taking contributes to prosocial judgment during the early years. Nevertheless, the results, in conjunction with the study conducted by Eisenberg-Berg and Hand, provided some support for the contention that prosocial moral reasoning is age-related, and thus, developmental.

Both theory and research on prohibition-oriented moral reasoning suggest that advances in cognitive capacities such as role-taking and abstract thinking result in qualitative changes in reasoning about moral issues (Kohlberg, 1976). Therefore, it is reasonable to expect judgments

about prosocial issues to also become less egocentric, more other-oriented, and more abstract with age. Given this hypothesis, Eisenberg, Lennon, and Roth (1983) devised a study to determine if the age-related changes in prosocial moral reasoning noted in previous studies continued into the early school years. There were three groups of participants, ranging in age from 7.5 to 8.5 years, of which the primary cohort ( $n = 33$ ) had participated in two previous studies (e.g., Eisenberg-Berg & Hand, 1979; Eisenberg-Berg & Roth, 1980). The participants' scores from the previous experiments were used in conjunction with the 1983 research project in order to provide longitudinal data. The second cohort was comprised of 16 participants who were tested initially at five years of age and again one year later. The final group of 30 participants ( $M$  age = 8) were only administered measures in the present study. Instruments included two prohibition-oriented dilemmas from the MJI (Colby & Kohlberg, 1987), and four prosocial moral dilemmas. All measures were individually administered.

Results revealed that the developmental changes evidenced during the preschool and early elementary years (e.g., Eisenberg-Berg & Roth, 1980) continued into the mid-elementary years. Specifically, the major change in children's prosocial moral development during this time was a shift in degree of self-orientation to other-orientation. That is, a shift from concern and preoccupation with the self to concern for other individuals. This was demonstrated by a steady decrease in hedonistic reasoning and a simultaneous increase in needs-oriented reasoning (Eisenberg et al., 1983). Further, based on the moral consideration categories devised by Eisenberg-Berg in 1979, five age-related stages of prosocial moral reasoning were delineated (see Table 2). In sum, the results confirmed the age-related sequence of development for elementary children's prosocial moral reasoning.

Eisenberg, Shell, Pasternack, Beller, Lennon, and Mathy (1987) also examined prosocial moral reasoning in an investigation aimed at examining changes over a 7-year period. Their study was undertaken in order to further chart the development of prosocial moral reasoning throughout middle childhood and into early adolescence. Moreover, because the association between empathy (defined here as an emotional reaction elicited by and congruent with another's emotional state or situation) and prosocial moral judgment had so seldom been examined, the authors' second



purpose was to examine the association between empathy and prosocial moral judgment. Finally, the interrelations among prosocial moral judgment and behavior were evaluated.

Participants were interviewed during two separate testing sessions approximately 24 months apart, and included 116 children divided into four groups. At the first testing session, the primary longitudinal cohort included 16 males and 16 females between the ages of 8 and 14 years. All of these participants had participated in three previous studies (e.g., Eisenberg et al., 1983; Eisenberg-Berg & Hand, 1979; Eisenberg & Roth, 1980). The second cohort consisted of 7 males and 7 females between the ages of 7 and 10 years. These participants had been interviewed twice before (e.g., Eisenberg & Roth, 1980; Eisenberg et al., 1983). The third group, comprised of 17 males and 22 females, ranged in age from 9 to 11 years. These participants were new to the study and were only interviewed during the first testing session. The fourth group of 11 males and 20 females ranged in age from 11 to 13 years and were only administered measures during the final testing session.

Two important findings emerged from Eisenberg et al.'s (1987) longitudinal analyses. First, consistent with previous research on elementary-aged children, changes in prosocial moral reasoning reflected developmental advances throughout middle childhood and into early adolescence. That is, hedonistic reasoning (i.e., more primitive reasoning) decreased with age, and more sophisticated modes of reasoning (i.e., needs-oriented, approval-oriented, empathic, and internalized values orientation) increased with age. Second, Eisenberg et al. (1987) reported a gender effect in modes of reasoning related to sympathy and role-taking. Specifically, whereas for girls both sympathy and role-taking increased in early adolescence, no increases in these domains were evidenced among boys during early adolescence. The authors argued that this finding reflects different socialization patterns which, for girls, focus on other-orientations (i.e., care-related reasoning, concern for other individuals). On the whole then, this study provided evidence that the age-related sequence of development noted in early elementary school continued throughout middle childhood and into early adolescence.

Given the socio-cognitive changes that occur during mid-adolescence in logical reasoning, perspective-taking skills, and prohibition-oriented moral reasoning, Eisenberg, Miller, Shell,

McNalley, and Shea (1991) expected changes to occur in prosocial moral reasoning as well during this time in the life cycle. These authors conducted an investigation to explore developmental change in prosocial moral reasoning and its interrelations with prosocial behavior and empathy-related responses in groups of adolescents. Participants included three groups of youth between 13 and 16 years of age, the first of which had participated in four previous longitudinal studies (e.g., Eisenberg et al., 1983; Eisenberg et al., 1987; Eisenberg-Berg & Hand, 1979; Eisenberg-Berg & Roth, 1980). Prosocial moral reasoning was assessed with the four moral reasoning dilemmas used in prior research (e.g., Eisenberg et al., 1983; Eisenberg et al., 1987; Eisenberg-Berg, 1979; Eisenberg-Berg & Roth, 1980). Further, empathy and perspective-taking were measured using the Interpersonal Reactivity Index (IRI; Davis, 1983).

Results confirmed the emergence of higher level modes of reasoning, such as generalized reciprocity reasoning, during the adolescent years. Of particular interest was the finding that in mid-adolescence (i.e., 15 to 16 years) there was a slight increase in hedonistic reasoning, primarily for boys. Nevertheless, there was overall decrease in hedonistic, needs-oriented, approval-oriented, and stereotypic modes of reasoning. Further, the authors reported a slight gender effect, with girls generally using somewhat higher levels of reasoning than boys. However, little evidence suggested that this pattern continued beyond age 12. As expected, there was evidence of higher levels of prosocial moral reasoning being associated with more prosocial behaviors, and higher levels of empathy and perspective-taking. Thus, the results of this study provided evidence that normal adolescents generally demonstrate more advanced modes of reasoning and rarely display self-oriented modes (i.e., hedonistic) than do children.

The final study reviewed here was conducted by Eisenberg, Carlo, Murphy, and Van Court (1995) to extend the existing longitudinal research on prosocial moral reasoning into late adolescence and early adulthood. Participants included two groups of young adults. The first group consisted of 16 males and 16 females who had participated in five previous longitudinal studies (e.g., Eisenberg et al., 1983; Eisenberg et al., 1991; Eisenberg et al., 1987; Eisenberg-Berg & Hand, 1979; Eisenberg-Berg & Roth, 1980). The second sample consisted of 14 males

and 20 females, ranging in age from 17 to 18 years. The latter sample was only tested on one occasion, while the former sample was tested at 17 to 18 years of age, and again at 19 to 20 years.

Measures of prosocial moral reasoning included the four moral reasoning dilemmas used in prior research (Eisenberg et al., 1991; Eisenberg et al., 1987; Eisenberg-Berg, 1979; Eisenberg-Berg & Roth, 1980), as well as the Prosocial Moral Reasoning Objective Measure (PROM; Carlo et al., 1992). In addition, social role-taking was measured utilizing three subscales of Davis' (1983) IRI -- namely empathy, perspective-taking, and personal distress. Social desirability, self-reports, parent reports, and friends reports of moral behavior were also assessed.

Overall, results revealed that self-reflective and internalized modes of moral reasoning increased throughout adolescence and early adulthood. Needs-oriented and stereotypic reasoning, which had begun its decline in earlier studies (e.g., Eisenberg et al., 1991) continued to decrease in use into adulthood. A surprising finding was that hedonistic reasoning, which had increased slightly in mid-adolescence (Eisenberg et al., 1991), continued to increase in use from age 19 to 20. The authors argued that this increase is reminiscent of Kohlberg and Kramer's (1969) finding of a regression in moral judgment during early adulthood, as well as Gilligan's (1977) data regarding a focus of responsibility to self during the later stages of development. However, it is important to note that hedonistic reasoning was relatively infrequent in early adulthood, and was used primarily in response to dilemmas in which the costs of helping were high. Moreover, participants' total prosocial moral reasoning scores (i.e., the moral composite score) continued to increase into early adulthood due to the increased use of numerous higher-level modes of prosocial reasoning. In general then, the results of this study provided further support of the age-related trends evidenced in prior research. That is, normal adolescents and adults demonstrated more advanced levels of prosocial moral reasoning, and rarely displayed the self-oriented modes (i.e., hedonistic) typical of younger adolescents and children.

In conclusion, the research reviewed thus far suggests that prosocial moral reasoning represents a mode of moral judgment distinct from the more commonly studied prohibitive-oriented realm. Furthermore, although the empirical evidence is limited, research indicates that prosocial moral reasoning is associated with indices of social role-taking (i.e., empathy and perspective-

taking) in normal populations. However, the “prosocial” side of morality has largely been neglected, particularly in relation to disturbed populations. To date, no research has been conducted on the prosocial moral reasoning of delinquent groups and therefore, it has not been determined whether deviant youth demonstrate the same types of prosocial moral reasoning that characterize typical youth. Clearly the implications for future research on this relatively overlooked theoretical perspective are obvious.

I turn now to a review of several of the relevant studies on prohibition-oriented moral reasoning in atypical populations in order to provide a comprehensive understanding of the moral reasoning deficiencies experienced by deviant youth.

### Moral Reasoning in Atypical Populations

As was noted in Chapter 1, Blasi (1980) has argued that the study of delinquency provides a natural ground for testing the relations between moral reasoning and moral behavior. Indeed, Kohlberg (1958) found, in his initial study of moral reasoning, that delinquents evidenced lower levels of moral development than nondelinquents. A plethora of empirical investigations over the last decade have provided further evidence for the conclusion that delinquent and disturbed youth are characterized by deficiencies in moral reasoning abilities and related competencies (e.g., Chandler & Moran, 1990; Jurkovic & Prentice, 1974; Lee & Prentice, 1988; Trevethan & Walker, 1989; for reviews see Blasi 1980; Jurkovic, 1980; Smetana, 1990). For example, Blasi’s review of the research reports that in 10 of the 15 studies he reviewed, delinquents functioned at lower stages of moral reasoning than nondelinquents. Smetana, in her (1990) review of the literature on morality and conduct disorders, came to a similar conclusion.

While the study of morally deficient reasoning among juvenile delinquents has certainly provided valuable insight into the atypical development of adolescents, an understanding of their prosocial reasoning is as equally important if we are to effectively promote positive adolescent development in both typical and atypical populations. Nevertheless, research on the prohibition-oriented moral reasoning of delinquent and disturbed youth abounds. Because this research is certainly too extensive to be reviewed here in its entirety, only a few studies were selected for

review in order to provide a precise understanding of prohibition-oriented moral reasoning in atypical populations.

One study concerning the moral reasoning of atypical youth was conducted by Campagna and Harter (1975). Their sample included a group of 21 sociopathic preadolescent boys and a control group of 23 normal boys between the ages of 10 and 13. The sociopathic boys were residents of a treatment facility for children manifesting various types of psychopathology and were identified by the researchers as sociopathic based on 26 common antisocial behaviors. These antisocial identifiers included behaviors like impulsiveness, vandalism, pathological lying, and truancy. All participants were matched for social class, as well as IQ and mental age (MA) using the Wechsler Intelligence Scale for Children (Wechsler, 1974) full-scale IQ and MA. Moral reasoning was assessed individually through administration of the MJI (Colby & Kohlberg, 1987).

Results revealed that the moral reasoning of sociopathic participants was less mature than that of MA-matched normal youth. Specifically, while the sociopathic group demonstrated preconventional reasoning at Stage 2, the normal group reached a transitional Stage 2(3) (i.e., between preconventional and conventional levels of moral development). The authors contended that these differences could not be attributed to differences in general level of cognitive development (MA), IQ, or social class, given that these variables were controlled across groups. The findings of this study can be interpreted as supporting the notion that antisocial behavior patterns are related to arrests in moral development.

McColgan, Rest and Pruitt (1983) argue that antisocial behavior in adolescence is one of the most consistent variables found to predict poor prognosis for adult adjustment. Given this, they undertook a study investigating the relationship between moral reasoning and antisocial behaviors in 29 male predelinquents (i.e., at risk for delinquency) and 29 nondelinquents. The groups were matched on the following characteristics: age, IQ, socioeconomic status, race, sex, neighborhood, school, one- versus two-parents homes, and school grades. Additional similarities were insured by exposing matched participants to the same interviewer, the same environmental conditions in the testing session, the same time of testing, the same test instruments, and the same

scoring system. Moral reasoning was assessed with both the MJJ (Colby & Kohlberg, 1987) and the DIT (Rest et al., 1974).

Results revealed lower moral reasoning scores on the DIT for the antisocial predelinquents in comparison to the nondelinquent controls. In contrast, no significant differences between the two groups were found when moral reasoning was assessed via the MJJ. The authors propose that the DIT places less of a load on verbal expressiveness than the MJJ because it is a recognition rather than production task. The authors concluded that, by utilizing a discriminatory measure and by rigorously controlling 14 potentially confounding variables, they were able to demonstrate that the moral judgment development of antisocial adolescents was immature when compared with that of a socially accepted group.

In a study by Chandler and Moran (1990), the empirical relationship between moral development and psychopathology was explored in a group of 60 juvenile delinquents and 20 nondelinquent controls. The authors' intent was to assemble an inclusive portrait of the moral functioning of delinquents by creating a more systematic measure of delinquency, along with a broader measure of moral functioning, than had previously been attempted. To accomplish these goals they assessed seven related dimensions; social conventional understanding (Turiel, 1978), interpersonal awareness (Selman, 1981), moral reasoning maturity (Colby & Kohlberg, 1987), socialization, autonomy, and empathy (Hogan, 1969), and finally, psychopathy (Hare, 1985). Their results indicated that, in comparison to their nondelinquent agemates, delinquents scored lower on essentially every dimension measured. Only the assessment of empathy failed to significantly discriminate groups. But as Chandler and Moran noted, even this variable showed a trend towards significance in the expected direction. These results suggest an "across-the-board deficit in moral maturity for the delinquent participants" (Chandler & Moran, 1990, p.242).

Some researchers propose that, in order to attain a more thorough understanding of the developmental lags that characterize delinquency, the heterogeneous element of this group needs to be considered (Trevethan & Walker, 1989). Indeed, by recognizing that delinquency is not a homogeneous grouping, we can create an opportunity to more closely examine group deficits. One of the earlier studies to embark upon this task was conducted by Fodor (1973). The primary

purpose of his study was to examine the relative levels of moral development achieved by psychopathic and nonpsychopathic delinquents. A secondary purpose was to compare how each group of delinquents perceived parental child rearing practices. Fodor hypothesized that psychopathic delinquents would be less advanced in level of moral development, would report lower levels of nurturing and supportive parenting, and would report higher levels of physical punishment and rejection from parents.

Two groups of 30 delinquent boys between the ages of 14 and 17 were identified as either psychopathic or nonpsychopathic on the basis of major psychopathic personality characteristics as set forth by Cleckley (1976). All participants were individually administered Kohlberg's moral reasoning interview (1958) and the Cornell Parent Behavior Description (1961; cited in Fodor, 1973). Participants were also matched in terms of age, verbal intelligence, race, and amount of education received by the mother. Results revealed that psychopathic delinquents exhibited lower levels of moral development. Interestingly, psychopaths also reported lower levels of nurturance and praise and higher levels of rejection, but only from fathers in particular. Fodor concluded that the activity of the father is most critical in the development of psychopathic characteristics in sons (Fodor, 1973).

Jurkovic and Prentice (1977) also conducted a study that examined homogeneous subgroups of delinquents. Their investigation was undertaken to examine both moral and cognitive developmental differences among groups of psychopathic, neurotic, and subcultural delinquents. According to Quay's classification system (Quay & Parsons, 1971), psychopathic delinquents engage in antisocial behaviors that are accompanied by little anxiety or guilt. Neurotic delinquents are more socialized, but act in response to inner emotional conflicts. Finally, subcultural delinquents are reasonably well socialized, but are more responsive to their delinquency-prone peers than to legitimate authority figures. From a participant pool of approximately 120 institutionalized boys, three groups of 12 delinquents each were formed on the basis of their scores on Quay's classification. Further, 12 nondelinquents were selected from a high-delinquency urban community similar to that in which the delinquents had lived. The delinquent and nondelinquent groups did not differ significantly with respect to age, ethnicity, or

SES. Moral reasoning was assessed using three of Kohlberg's (1969) moral dilemmas. Cognitive role-taking (Flavell et al., 1968) and cognitive logical reasoning (Inhelder & Piaget, 1955/1958) were also assessed.

With respect to moral reasoning, results indicated that psychopathic delinquents reasoned at less mature levels than neurotic delinquents. Moreover, psychopaths reasoned at lower levels of moral reasoning than subcultural delinquents, and at lower levels of moral reasoning than nondelinquents. Unexpectedly, neurotics did not differ from subculturals, or from nondelinquents. Finally, it was found that subcultural delinquents did not differ from nondelinquents. The authors argued that the results of this study can be taken as support for previous empirical observations suggesting a lag in the moral reasoning of delinquent youth. Moreover, this study "demonstrated that dimensions of delinquency can be conceptualized in meaningful cognitive-developmental terms" (p. 419), providing further evidence against viewing delinquency as a unitary syndrome of deviance (Jurkovic & Prentice, 1977).

In another study, Lee and Prentice (1988) examined the relationship between delays in the acquisition of moral reasoning and the social deviation of homogeneous subclasses of adolescent delinquent males. Again, Quay's typology (Quay & Parsons, 1971) was utilized to group delinquents into psychopaths, neurotics, and subculturals. Recall that, according to Quay's classification, psychopathic delinquents engage in antisocial behaviors that are accompanied by little anxiety or guilt. Neurotic delinquents are more socialized, but act in response to inner emotional conflicts. Subcultural delinquents, although reasonably well socialized, are more responsive to their delinquency-prone peers than to legitimate authority figures.

Utilizing 36 delinquent male participants ( $n = 12$  per group) and 18 nondelinquent controls, it was hypothesized that psychopaths and neurotics would prove deficient in moral reasoning as compared to subcultural delinquents and nondelinquents. This hypothesis was expected partly because subcultural delinquents are essentially more like nondelinquent youth than either psychopaths or neurotics, and partly because previous literature suggested that psychopathic and neurotic delinquents were less well developed in both logical and socio-cognitive abilities than subcultural and normal youth. All participants were administered two moral dilemmas from the



MJI (Heinz and the drug and Karl and Bob; Colby & Kohlberg, 1987). Additionally, participants were administered two measures of empathy, the IRI (Davis, 1983) and the Questionnaire Measure of Emotional Empathy (QMEE; Mehrabian & Epstein, 1972), two measures of cognitive role-taking (Flavell et al., 1968), and two measures of logical cognition (Inhelder & Piaget, 1955/1958).

Moral maturity scores from the MJI revealed that the delinquents reasoned at significantly lower levels than their nondelinquent peers. Moreover, it was found that the nondelinquent group had significantly higher moral reasoning scores than any of the three subgroups. No differences, however, were evidenced among the three delinquent subgroups in terms of moral reasoning. It was further found that delinquent and nondelinquent groups differed significantly from each other in moral reasoning even after controlling for age and verbal ability. Overall, the results demonstrated that delinquents are significantly different than nondelinquents with respect to moral reasoning development, although not necessarily different from each other.

Trevethan and Walker (1989) also conducted a study that examined moral reasoning in subgroupings of delinquents. The purpose of their study was to investigate differences in hypothetical and real-life moral reasoning in a group of adolescents. On the basis of Hare's Psychopathy Checklist (1980, 1985), 44 youth between the ages of 15 and 18 were classified as either psychopathic delinquents ( $n = 14$ ), delinquent ( $n = 15$ ), or normal ( $n = 15$ ). Hypothetical moral reasoning was assessed through the use of two dilemmas from the MJI (Colby & Kohlberg, 1987). Real-life moral reasoning was measured by having participants recall and discuss a moral dilemma that they had personally experienced. Real-life moral reasoning was elicited through extensive probing, and responses were scored using procedures specific to the MJI.

Results revealed significant differences among the groups and between the types of dilemmas. Specifically, it was found that normal youth attained an overall moral reasoning level greater than either the psychopathic or delinquent adolescents. Further, all groups scored lower on the real-life moral reasoning dilemmas than on the hypothetical. That is, the moral reasoning levels for the psychopaths, delinquents, and normals were lower when assessed with real-life dilemmas than when assessed with dilemmas from the MJI. However, findings did not reveal significant

differences between the psychopaths and the delinquents, results similar to the Lee and Prentice (1988) study. Nor did the results indicate that incarcerated youth displayed greater disparities between their real-life and hypothetical moral reasoning scores than normal youth, as the authors had predicted. Thus, the authors suggested that hypothetical dilemmas may elicit an individual's level of moral reasoning competence, whereas real-life dilemmas may assess a person's level of moral reasoning performance (Trevethan & Walker, 1989). With respect to the lack of significant findings among the subgroups, clearly further research is warranted to clarify inconsistencies in the literature.

The research discussed thus far has employed only delinquent samples in its investigations. Studies do exist that have looked at the moral development of disturbed youth (e.g., behaviorally disturbed) who have not been classified as delinquent. It is relevant to examine the moral reasoning of deviant youth not adjudicated as delinquent because, as some research suggests (e.g., Freeman, Bliss, & Giebink, 1980), adolescents who later become delinquent have often been identified as emotionally or behaviorally disordered in their earlier years. In one such study, Freeman and her collaborators (1980) explored the moral reasoning of special education sixth-, seventh- and eighth-grade students. A group of 25 preadolescents with learning and/or behavioral disorders were matched with 25 normal preadolescents and assessed for level of moral reasoning using a Kohlberg derived instrument, the Objective Assessment of Moral Development (Freeman, 1974). An analysis of variance indicated significant differences at the eighth grade only, with BD/LD youth scoring lower in moral reasoning than controls. Further, the deviant youth used lower stages of moral reasoning (i.e., Level 1) almost twice as frequently as did control participants. These results suggest that, similar to delinquent participants, adolescents categorized as behaviorally/learning disordered demonstrate delays in the development of moral reasoning. As Freeman et al. note, such findings clearly provide support for the importance of further research into the moral reasoning of adolescents with behavioral disorders.

This task of investigating the moral reasoning of adolescents with behavioral disorders was undertaken by researchers Schonert and Cantor in 1991. The purpose of their study was to investigate the moral development of three groups of adolescents enrolled in traditional versus

alternative educational settings. The control group consisted of 28 randomly selected non-behaviorally disordered students of mixed gender from a traditional high school. Ages ranged from 14 to 18 years ( $M = 15.17$ ). The second group was comprised of 13 youth with behavioral disorders between the ages of 14 to 18 years ( $M = 15.90$ ). These students were enrolled in a traditional school as well, but were placed into a special education classrooms due to behavioral difficulties in the regular class programs. The final group included 12 youth with behavioral disorders, ranging in age from 14 to 18 years of age ( $M = 16.80$ ), who were enrolled in an alternative high school setting. These students had been initially enrolled in a traditional school, but were placed in the alternative setting after the traditional program was deemed ineffective in reducing the students' problem behavior. Thus, these students' behaviors were considered by the researchers to be "...more disruptive, problematic, and severe than those of the BD students in the traditional school setting" (p. 28). All students were assessed for moral reasoning maturity via administration of the DIT (Rest et al., 1974).

Results indicated that the students classified as behaviorally disordered in both traditional and alternative settings scored lower on moral reasoning than their non-disordered peers. While the traditional school disordered youth scored lower than their alternative school disordered counterparts, this difference was not significant. The findings of this study are in concert with the previously discussed literature that has investigated deviant groups. However, the authors posit that this study "...provides information to those researchers and educators specifically concerned with understanding the moral reasoning of BD students..." (Schonert & Cantor, 1991, p. 31).

As is evident from the preceding discussions, a plethora of studies exist supporting the contention that, through a variety of methods and measures, deviant and delinquent youth demonstrate delays in prohibition-oriented moral reasoning (see also Hains & Miller, 1980; Hudgins, & Prentice, 1973; Kohlberg, 1958; Sigman, Ungerer, & Russell, 1983). Still, no research exists that has examined prosocial moral reasoning in atypical populations. It would certainly benefit our understanding of typical and atypical adolescent development to determine if deficiencies exist in the prosocial moral reasoning of deviant groups. Furthermore, although the available research is inconsistent regarding whether delinquent subgroups differ in their levels of

prohibition-oriented moral reasoning, there is very little debate regarding the efficacy of examining such constructs in homogeneous subgroupings of delinquents. Again, no research exists that has examined the prosocial moral reasoning of delinquent adolescents generally, let alone within delinquent subgroups. Clearly, there is a void in our current understanding of both prosocial moral reasoning and delinquent populations.

Finally, although immature moral reasoning may be implicated as a contributor to the development of socially deviant behaviors like delinquency, research suggests that moral reasoning is not a unitary dimension of socio-cognitive development. Instead, it is dependent upon the attainment of both social and cognitive perspective-taking skills (Kaplan & Arbuthnot, 1985; Walker, 1980). In order to provide a more precise understanding of the deficiencies experienced by atypical populations, I turn now to a review of several of the relevant studies on empathy and perspective-taking in these populations.

#### Empathy and Perspective-Taking in Atypical Populations

Social role-taking constitutes a critical factor in both prosocial development and social competence (Eisenberg-Berg & Mussen, 1978). Indeed, according to socio-cognitive theory, social role-taking is a necessary, though not sufficient, condition for children's long-term favorable adjustment (Kohlberg, LaCrosse, & Ricks, 1972; Walker, 1980; Waterman, Sobesky, Silvern, Aoki, & McCaulay, 1981). Traditionally, social role-taking has been classified into two discreet, but related concepts: affective role-taking and cognitive role-taking (Kaplan & Arbuthnot, 1985; Enright & Lapsley, 1980; Kurdek, 1978). Affective role-taking, also known as empathy, is one component of social cognition that includes the recognition of another's feelings and the sharing of those feelings (Kalliopuska, 1983). Although empathy has been defined differently by a variety of researchers, the most common definitions include; the reactions of one individual to the observed experiences of another (Davis, 1983); an emotional reaction elicited by and congruent with another's emotional state (Eisenberg et al., 1987), and finally; the ability to vicariously appreciate the experiences and emotions of others (Mehrabian & Epstein, 1972). Clearly, all definitions involve the ability to match one's feelings with the corresponding feelings of someone else.

Because empathy is an affective state, it will be defined throughout the following review as an individual's emotional responsiveness to the emotional experiences of another (Davis, 1983). In contrast, cognitive role-taking refers to an individual's ability to infer another's cognitions, such as thoughts, intentions, and motives (Kurdek, 1978). Throughout this review, cognitive role-taking will be referred to simply as perspective-taking (Davis, 1983; Selman, 1971).

Interest in the study of social role-taking has been spurred, in part, by research findings suggesting that empathy and perspective-taking act as significant antecedents to altruistic and helping behavior (Eisenberg et al., 1987; Eisenberg-Berg & Mussen, 1978). Moreover, some research has found that juvenile delinquents, who characteristically function at low levels of prohibition-oriented moral reasoning, demonstrate significantly lower levels of affective empathy and cognitive perspective-taking than their nondelinquent peers (e.g., Chandler, 1973; Cohen & Strayer, 1996; Kaplan & Arbuthnot, 1985; Rotenberg, 1974), although these findings are by no means unanimous (e.g., Chandler & Moran, 1990; Lee & Prentice, 1988). Despite the inconsistencies in the literature, some researchers have suggested that deficiencies in empathy and perspective-taking function as among the most significant contributors to delinquent activity in adolescence (Hogan, 1969, 1973; Kaplan & Arbuthnot, 1985).

In light of this, Waterman et al. (1981) conducted a study to examine social role-taking deficits (i.e., cognitive and affective role-taking) among emotionally disturbed and learning disabled children. It was hypothesized, on the whole, that emotionally disturbed and learning disabled children would manifest deficits in age-appropriate social cognition compared to a sample of normal children. Participants were drawn from nine schools in a middle-class community and included 31 boys from special education classes for children with emotional and behavioral problems, 31 boys from special education classes for children with learning disabilities, and 14 boys from regular school classes. To assess cognitive role-taking, all participants were administered one of the widely used cognitive perspective-taking tasks developed by Flavell et al. (1968). Affective role-taking was measured with eight videotaped vignettes of characters displaying different emotions (i.e., frustration, relief, sadness, fear, loneliness, embarrassment, and anger). After viewing each vignette, participants were asked to pretend that the experimenter

had not seen the tape and to report to the experimenter what the character in the skit had been thinking and feeling. Affective role-taking was scored by assigning participants' responses on each of the vignettes to one of six categories, ranging from 0 (misrepresentation of the main point) to 5 (accurate interpretation of the characters emotions, motives, and actions). Total scores reflecting a sum of the scores on each of the eight vignettes were employed in data analyses, with higher scores indicative of greater affective role-taking.

The results revealed that, as hypothesized, emotionally disturbed boys were significantly deficient in their cognitive and affective role-taking scores when compared to the normal boys. Although this finding held for cognitive role-taking when mental age was partialled out, the significant findings diminished for affective role-taking when mental age was statistically controlled. It was also found that, on both the cognitive and affective role-taking tasks, the learning disabled boys scored higher than the emotionally/behaviorally disturbed children, and lower than the control group, although these differences did not reach significance. Overall, the authors argued that these findings have implications for mental health intervention. Specifically, the existence of a consistent relationship between poor socio-cognitive skills and adjustment difficulties suggest the need for interventions aimed at training affective and cognitive role-taking skills, rather than attempting to resolve emotional/behavioral difficulties. Thus, further research is necessary to determine the nature and extent of socio-cognitive deficits in atypical populations.

A second study aimed at clarifying the role of empathy in the development of antisocial and aggressive delinquent behavior was reported by Ellis in 1982. Participants included 331 delinquent males and 64 nondelinquent controls between the ages of 12 and 18. The delinquent participants were divided into groups along two factors: "subgroup" of delinquency and type of aggression. The subgroup of delinquency was determined through the use of Quay's typology (Quay & Parsons, 1971), which resulted in three groups of delinquents: 137 psychopathic delinquents, 94 neurotic, and 100 subcultural delinquents. Type of aggression for all participants was determined by identifying the charges on record for each delinquent. Based on their charges, delinquent participants were classified as either nonaggressive ( $n = 81$ ), aggressive-against-

persons ( $n = 159$ ), or aggressive-against-property ( $n = 91$ ). All participants were assessed for level of empathy using Hogan's Empathy Questionnaire (1969).

Results revealed that delinquents were significantly delayed or arrested in the development of empathy as compared to nondelinquents. Specifically, the neurotic delinquents scored significantly lower than the psychopathic delinquents, who in turn, scored lower than the subcultural delinquents. In addition, the aggressive-against-person delinquents were slightly lower in empathy than the aggressive-against-property delinquents, but not significantly. Empathy was also found to be age-related in this study. That is, the nondelinquent group exhibited a significant age-related increase in empathy during adolescence, while the delinquent group did not. These findings indicate the developmental importance of empathy and suggest the potential for intervention among deviant groups at specific ages (Ellis, 1982). Finally, the author argues that his results highlight the significance of empathy as an inhibitor of aggression.

Kaplan and Arbuthnot (1985) also conducted research to examine empathy in atypical populations. In their study, it was hypothesized that delinquents would perform more poorly on empathy and cognitive perspective-taking tasks than would their nondelinquent peers. Ten male and 10 female delinquents between the ages of 13 and 15 were compared with 10 male and 10 female nondelinquent age-mates. Participants were individually administered three independent measures; The Index of Empathy for Children and Adolescents (Bryant, 1982), an adapted version of Duggan's Measure of Empathy (1978), and the perspective-taking measure as originally developed by Flavell et al. (1968) and modified by Chandler (1973).

Results revealed marginal support for the hypothesis. That is, delinquents scored lower than nondelinquents on the Duggan measure of empathy, but demonstrated no significant differences than their nondelinquent peers on the Bryant measure. The authors attributed this difference to the disparate nature of the two measures. Specifically, the Duggan measure was an unstructured self-report task requiring adolescents to generate and verbalize empathic responses. In contrast, the Bryant measure involved structured self-reporting that required participants to rate agreement or disagreement to empathic items in a relatively passive manner. Further, sex

differences were reported in this study, with males demonstrating, as expected, less empathic responding than females.

Contrary to expectations, Kaplan and Arbuthnot (1985) failed to find significant differences in perspective-taking between the delinquent and nondelinquent groups. However, according to the authors, these results are suspect due to the environmental differences between the delinquent and nondelinquent samples. That is, the delinquent participants in this study were selected from an urban center, while the nondelinquents resided in rural communities. The authors cite previous research (e.g., Hallos & Cowan, 1973; Nahir & Yussen, 1977) that have found children from more populated and communal environments to be better perspective-takers than those living in rural areas. Thus, the poor role-taking skills expected in the delinquent group may have been mediated by environmental factors. Overall then, the results of this study provide moderate support the conception the delinquent adolescents demonstrate arrests in empathy and perspective-taking as compared to nondelinquents. However, the findings also suggest the need for additional research on this relatively inconsistent topic.

Although not examining empathy or perspective-taking specifically, a study by Panella and Henggeler (1986) provides some support for the notion that deviant youth do not accurately interpret the emotions of others. Their study examined the relationship between problem behavior and adolescent peer interactions. The authors' purpose was to determine whether youth with behavioral disorders display differences in the competence of their peer interactions when compared to well-adjusted adolescents. Teachers were requested to identify students who were either conduct-disordered, anxious-withdrawn, or well-adjusted so that distinct sampling groups could be delineated. Three groups ( $n = 10$ ) comprised of lower-class, black participants, ranging in age from 15 to 18 years constituted the sample. Participants were requested to bring their closest male friend so that an observational method of peer interaction assessment could be employed. The purpose of this method was to evaluate various types of interactions, including: conflict, dominance, affect, and social competence displayed with a friend and with a well-adjusted stranger.



Results revealed that both conduct-disordered and anxious-withdrawn participants displayed less positive affect (i.e., empathy) and less social competence in interactions with both friends and strangers than well-adjusted adolescents. Conduct-disordered youth particularly appeared unable to engage in appropriate social interactions. Additionally, they were unable to employ either the empathic or responsive behaviors reflective of social competency (Panella & Henggeler, 1986). As a result, such adolescents form either unhealthy friendships, or no friendships at all. Consequently, they have less opportunities to experience the social interactions necessary for healthy development and that this lack "exacerbates existing problems and sets the stage for interpersonal problems in adulthood" (p. 10).

In a more recent study, Schonert-Reichl (1993) explored the relationship between empathy and social competence in a group adolescents classified as behaviorally disordered. A sample of 39 adolescents with behavioral disorders between the ages of 14 and 19 years were matched with 39 non-disordered adolescents. To measure their social competence, participants' extracurricular participation, amount of contact with peers, number of close friends, and quality of relationships was assessed. Schonert-Reichl utilized the QMEE (Mehrabian & Epstein, 1972) to assess empathy as another dimension of social competency, citing evidence which suggests that "empathy plays a significant role in enhancing or diminishing the quality of one's social relationships" (p. 191).

It was hypothesized that disordered adolescents would be lower than their age-matched peers in both empathy and other areas of social competency. Results supported this hypothesis, indicating that adolescents with behavioral disorders had lower levels of empathy, participated in fewer extracurricular activities, had less frequent contacts with friends, and had lower quality relationships than their non-disordered peers. Overall, these findings are in concert with the hypothesis that, due to deficits in social skills and related competencies, deviant youth experience poor interpersonal relationships.

The final study reviewed in this section was conducted by Cohen and Strayer (1996) who put forth five hypotheses regarding differences in empathy between conduct-disordered and comparison youth. Specifically, they hypothesized that (a) overall empathy would be lower among conduct-disordered (CD) youth than among comparison youth, (b) antisocial and maladjusted

attitudes would correlate inversely with empathic responding, (c) the affective component of empathy in particular would be lower among CD youth, (d) the cognitive component of empathy, as measured by the correct identification of another's emotion, would be lower among CD youth than among a comparison group, and finally, (e) the cognitive component of empathy, as measured by personal attributions, perspective-taking, and imaginal involvement, would be lower in the CD group.

Empathy was measured by two methods. One focused on empathic responses to an Empathy Continuum (EC) -- a post-stimulus interview measure assessing participants' emotions and cognitions in response to people on videotaped vignettes (Strayer, 1993). The second method focused on self-reported dispositions assessed with two questionnaires; Bryant's (1982) Empathy Index, and the IRI (Davis, 1983). The authors also administered a measure of social desirability and the Jesness Inventory (Jesness, 1969), a measure for differentiating aggressive and antisocial participants from those who do not express such behaviors and attitudes.

Results revealed significant support for all five hypotheses tested. Specifically, overall empathy was lower among CD youth than among comparisons, and was found to be inversely related to aggressive and antisocial attitudes for all participants tested. With respect to affective empathy, CD youth reported fewer concordant emotional responses to people on videotaped vignettes than did their non-conduct disordered peers. Further, the CD group scored significantly lower than the non-disordered group on both the Empathy Index and the empathic concern scale of the IRI (Davis, 1983). Cognitively, CD adolescents reported fewer correct identifications of people on videotaped vignettes, lower mean levels of cognitive attributions for their own responsive emotions, and lower scores on the perspective-taking scale of the IRI. The authors also reported a significant gender difference, with girls scoring higher on self-report measures of empathy and emotional responsiveness. However, no gender differences were found on the cognitive scales of the IRI, nor on the cognitive component of the EC, implicating only the affective component of empathy in gender differences. The authors concluded that, while the present findings identify several areas of deficiency in the processing of empathic responses of CD

youth, further research is necessary to clarify developmental factors contributing to group differences.

Thus, in considering the extant research, it appears that questions still exist regarding the nature of the deficiencies in empathy and perspective-taking among disturbed and delinquent populations. As has been demonstrated throughout this section of the literature review, some research supports the contention that juvenile delinquents experience delays in the acquisition of empathy, while other studies suggest no differences between deviant and normal populations. The inconsistent results in the literature clearly point to the need for further research in this area.

Although the previous section on moral reasoning in atypical populations provided an overview of research demonstrating that deviant groups function at delayed levels of moral judgment, whether such groups concomitantly experience delays in empathy and perspective-taking has not yet been addressed. Therefore, in the following section I will review several important studies that have examined the nature of the relationships among moral reasoning, empathy, and perspective-taking in both normal and deviant populations.

#### The Relationship Between Moral Reasoning and Indices of Social Role-Taking in Typical and Atypical Populations

By now, it should have become clear that an abundance of empirical investigations have provided evidence for the conclusion that delinquent and disturbed youth are characterized by deficiencies in moral reasoning abilities. Further, some research suggests that delinquent youth function at immature levels of empathy and perspective-taking. The next logical step in this review would be to evaluate whether these constructs are related in both typical and atypical groups. That is, are deficiencies in one construct related to deficiencies in the others. Indeed, some research suggests an association between empathy and perspective-taking and relatively high levels of both prohibition-oriented and prosocial moral reasoning in normal populations (Eisenberg-Berg & Mussen, 1978; Kalliopuska, 1983). The idea that empathy is related to mature moral judgment is not a new conception. As indicated in Hoffman's (1991) review of the literature, more than two centuries ago "David Hume (1751/1957) suggested...that empathy not only influences moral

judgment but may also serve as the ultimate validating criterion for the correctness of a moral judgment” (p. 287).

Despite long-standing assumptions, few studies have empirically investigated the association between prohibition-oriented moral reasoning, and empathy and perspective-taking. Furthermore, only a handful of studies have examined empathy, perspective-taking, and prosocial moral reasoning in particular (e.g., Eisenberg et al., 1995; Eisenberg et al., 1991; Eisenberg et al., 1987; Eisenberg-Berg & Mussen, 1978). Because of this paucity, I have integrated studies investigating both prohibition-oriented and prosocial moral reasoning into the current section. To provide an organizational structure that is parsimonious, studies that have examined both modes of moral reasoning and empathy and perspective-taking in typical samples will be discussed first, followed by studies on both modes of moral reasoning and the indices of social role-taking in atypical populations.

#### Moral Reasoning and Social Role-Taking in Typical Populations

As previously mentioned, few studies have empirically investigated the relationships among moral reasoning, and empathy and perspective-taking in normal samples, despite long standing assumptions that social role-taking is a significant antecedent of moral judgment (Eisenberg & Miller, 1978).

One study that did investigate prohibition-oriented moral development and empathy in particular was conducted by Kalle and Suls in 1978. Utilizing 90 male college students in their study, the authors hypothesized that higher levels of moral reasoning would be related to higher levels of empathy. All participants were administered the QMEE (Mehrabian & Epstein, 1972) and the short form of the DIT (Rest et al., 1974) during one hour of regularly scheduled class time.

Results revealed an expected positive relationship between empathy and conventional levels of moral reasoning (i.e., DIT score for Stage 4). In contrast, the relationship between empathy and postconventional (i.e., DIT score for Stage 5) moral reasoning was not significant. However, the authors contend that empathic feelings may actually interfere with more advanced levels of moral reasoning which are based on abstract principles. More specifically, Kalle and Suls argued that because conventional levels of moral reasoning focus on the needs of the group and on shared

relationships, it should reasonably be associated with higher degrees of empathy. Conversely, postconventional reasoning requires a preference for abstract principles above the dictates of the group. Highly emotional responses may only serve to distract individuals from such considerations, which serves to explain the absence of a significant relationship between empathy and more advanced moral reasoning. However, because this explanation was only a hypothesis yet untested, the authors recognized the need for further research.

Kalliopuska (1983) conducted a study examining the relationship between prohibition-oriented moral reasoning and affective empathy. In her study, two Kohlbergian dilemmas (Colby & Kohlberg, 1987) and a modified version of the QMEE (Mehrabian & Epstein, 1972) were administered to 342 participants ranging in age from 9 to 12 years.

In general, the results demonstrated a positive significant relationship between empathy and moral reasoning. Moreover, a gender effect for empathy was found, with girls scoring significantly higher than boys. Empathy was also found to be age related for both sexes. Finally, the results suggested that individuals who make more mature moral judgments tend to be better socialized and autonomous than those who do not. Given that the participants in this study functioned primarily at conventional stages of moral reasoning, Kalliopuska concluded that her findings support previous research by Kalle and Suls (1978), that reported a significant relationship between conventional levels of moral judgment and emotional empathy.

A study that looked specifically at the relationship between cognitive perspective-taking and prohibition-oriented moral judgment was conducted in 1971 by Selman. Participants included 30 boys and 30 girls between the ages of 8 and 10 years who were administered Kohlberg's Moral Judgment Scale (MJS; Kohlberg, 1963), and two perspective-taking tasks (Flavell et al., 1968). The perspective-taking responses were scored on the basis of the ability to shift social perspectives and ranged from 1 (nonreciprocal perspective-taking) to 3 (reciprocal perspective-taking).

Overall, the results indicated that the ability to take another's perspective is related to higher levels of moral reasoning. Specifically, only those participants who had achieved a reciprocal level of perspective-taking reached a conventional level of prohibition-oriented moral reasoning (i.e., Stage 2). Moreover, approximately one year later, Selman re-examined the scores of 10

participants whose perspective-taking and moral judgment scores were low in the original study (i.e., a nonreciprocal level of perspective-taking and a moral judgment Stage 1). He found that no participants attained conventional levels of moral judgment without also reaching reciprocal levels of perspective-taking. However, reciprocal perspective-taking was attained without conventional moral judgment. Selman concludes that these findings provide support for the hypothesis that perspective-taking is a necessary, but not sufficient, condition for the development of moral thought.

With respect to prosocial moral reasoning and empathy, one study to examine the relationship between these variables was conducted by Eisenberg-Berg and Mussen (1978). Participants included 72 high school students in grades 9, 11, and 12. Students were administered Mehrabian and Epstein's QMEE (1972) and were assessed for level of prosocial moral reasoning using four moral dilemmas (Eisenberg-Berg, 1979). Helping behavior was also measured after the session by asking each student whether he or she would be willing to volunteer as a subject, without pay, in an hour-long dull task in the next few weeks.

The results of this study revealed that empathy and prosocial moral reasoning were significantly correlated. Further, the authors found that empathy was unrelated to grade level, indicating that the significant correlations were not due to age-related changes in moral judgment and empathy. Nevertheless, the authors did not indicate how each level of prosocial moral reasoning (i.e., hedonistic, needs-oriented, approval-oriented, stereotyped, internalized) correlated with the empathy scores. Finally, it was found that males who volunteered to help had higher empathy scores than those who did not, suggesting the empathy acts as an antecedent of prosocial behavior. Eisenberg-Berg and Mussen (1978) concluded that their results support the hypothesis that "...empathy is a critical predisposing factor in prosocial reasoning" (p. 186).

Another study to examine the relation between prosocial moral reasoning and empathy was conducted by Eisenberg et al. (1987). Recall from the section devoted to reviewing the literature on prosocial moral reasoning that this study was a longitudinal endeavor designed primarily to chart the development of prosocial moral judgment across childhood and adolescence. Participants included 116 children divided into four groups, who were interviewed on two separate testing

occasions, approximately 24 months apart. Recall that the primary longitudinal cohort ( $n = 32$ ) had participated in three previous studies (e.g., Eisenberg et al., 1983; Eisenberg-Berg & Hand, 1979; Eisenberg-Berg & Roth, 1980), while the second ( $n = 14$ ) had been interviewed twice before (e.g., Eisenberg et al., 1983; Eisenberg-Berg & Roth, 1980). The third group ( $n = 39$ ) was new to the study and were only interviewed during the first testing session. The fourth group ( $n = 31$ ) were only administered measures during the final testing session. The measures included four prosocial moral dilemmas (Eisenberg et al., 1983; Eisenberg-Berg, 1979; Eisenberg-Berg & Roth, 1980), and Bryant's Index of Empathy for Children and Adolescents (1982).

The results revealed that empathy was significantly positively related to needs-oriented reasoning, which Eisenberg et al. (1987) consider a primitive type of empathic responding. Further, empathy was found to related to higher-level prosocial moral judgments, such as internalized reasoning. Moreover, a negative relationship was found between empathy hedonistic reasoning, the most self-focused and egoistic stage of prosocial moral development. Eisenberg et al. argued that these findings are consistent with the suggestion that empathic responsivity may enhance and facilitate the development and use of more advanced levels of prosocial moral judgment.

Eisenberg et al. (1991) examined prosocial moral reasoning and its relation with both indices of social role-taking -- namely, empathy and perspective-taking. Participants included three groups of youth between 13 and 16 years of age, the first of which had participated in four previous longitudinal studies (e.g., Eisenberg et al., 1983; Eisenberg et al., 1987; Eisenberg-Berg & Hand, 1979; Eisenberg-Berg & Roth, 1980). Prosocial moral reasoning was assessed with the four moral reasoning dilemmas used in prior research (e.g., Eisenberg et al., 1983; Eisenberg et al., 1987; Eisenberg-Berg, 1979; Eisenberg-Berg & Roth, 1980). Empathy and perspective-taking were measured with the IRI (Davis, 1983).

As expected, there was evidence of higher levels of prosocial moral reasoning being associated with empathy and perspective-taking. In general, it was found that empathy and perspective-taking were negatively related to hedonistic reasoning, the lowest level of prosocial moral judgment. Consistent with prior research (Eisenberg et al., 1987), empathy was found to be

positively related to needs-oriented reasoning. Finally, perspective-taking was positively related to the moral judgment composite score. The authors concluded that, overall, prosocial moral reasoning, empathy, and perspective-taking were interrelated in important and meaningful ways that merit further research.

The final study reviewed herein on the relations among prosocial moral reasoning, empathy, and perspective-taking was conducted by Eisenberg et al. (1995). These authors investigated the relations of prosocial moral reasoning to social role-taking in two groups young adults ranging in age from 17 to 20. The first group ( $n = 32$ ) had participated in five previous longitudinal studies (e.g., Eisenberg et al., 1983; Eisenberg et al., 1991; Eisenberg et al., 1987; Eisenberg-Berg & Hand, 1979; Eisenberg-Berg & Roth, 1980). The second group ( $n = 34$ ) was new to the study. Measures of prosocial moral reasoning included the four moral reasoning dilemmas used in prior research (Eisenberg et al., 1991; Eisenberg et al., 1987; Eisenberg-Berg, 1979; Eisenberg-Berg & Roth, 1980), as well as the Prosocial Moral Reasoning Objective Test (PROM; Carlo et al., 1992). Social role-taking was measured utilizing the empathy and perspective-taking subscales of the IRI (1983).

The results revealed that, consistent with prior research and expectations, prosocial moral reasoning, empathy, and perspective-taking were positively related. Specifically, empathy was negative related to hedonistic reasoning. Empathy was also positively correlated with the highest level of moral reasoning -- internalized reasoning -- and with the PROM moral judgment composite score. Furthermore, perspective-taking was negatively related to both hedonistic reasoning and to approval-oriented reasoning, and positively related to the PROM moral judgment composite score. Thus, judging from the findings in previous research, the general patterns of relations among moral reasoning, empathy, and perspective-taking were fairly similar across late adolescence and early adulthood. However, because the majority of these correlations were only moderately related, the authors urge additional research.

### Summary

Overall, the research does indicate significant positive relationships among prohibition-oriented moral reasoning and indices of social role-taking in normal populations. Significant



relationships have been found among prosocial moral reasoning and indices of social role-taking in normal populations as well. However, because the studies reviewed thus far have only looked at moral reasoning, empathy, and perspective-taking in normative samples, we know little, at this point, about the development of these constructs in those individuals exhibiting problem behaviors (e.g., delinquency). Thus, it is imperative in this investigation to consider research that has examined the association between moral reasoning, empathy, and perspective-taking in deviant groups.

### Moral Reasoning and Social Role-Taking in Atypical Populations

One of the earlier studies to examine the relationships between prohibition-oriented moral reasoning and perspective-taking in an atypical population was conducted by Jurkovic and Prentice (1977). Recall from the previous section devoted specifically to reviewing the literature on moral reasoning in atypical populations that their investigation was undertaken to examine both moral and cognitive differences between subgroups of delinquents (i.e., psychopaths, neurotics, and subculturals). Participants included three groups of 12 delinquents and one group of 12 nondelinquents selected from a high-delinquency urban community similar to that in which the delinquents had lived. Moral reasoning was assessed using three of Kohlberg's (1969) moral dilemmas. Perspective-taking (termed cognitive role-taking by the authors) was measured utilizing Flavell et al's. (1968) tasks.

First, results revealed that moral maturity scores were significantly positively related to perspective-taking. Specifically, higher moral reasoning was associated with higher perspective-taking. Further, nondelinquents were found to display significantly higher levels of moral reasoning and perspective-taking than either the psychopathic delinquents or the neurotics, who did not differ from each other. According to the authors, the findings of this study can be taken not only as support for a relationship between moral reasoning and perspective-taking, but as evidence of the deficiencies in moral reasoning and perspective-taking experienced by delinquent youth.

Lee and Prentice (1988) extended the research of Jurkovic and Prentice (1977) by investigating both the affective and cognitive components of social role-taking in a group of delinquent youth. That is, they conducted a study to examine the relationships among prohibition-

oriented moral reasoning, empathy, and perspective-taking in three subgroups of delinquent males (i.e., psychopaths, neurotics, and subculturals). In their study, participants were individually administered two of Kohlberg's (1958) moral dilemmas, two measures of cognitive perspective-taking (Flavell et al., 1968), and two measures of empathy, the IRI (Davis, 1983), and the QMEE (Mehrabian & Epstein, 1972).

Results revealed that the nondelinquent group had significantly higher prohibition-oriented moral reasoning scores than any of the three subgroups. Further, the nondelinquents scored significantly higher in perspective-taking than all three delinquent subgroups, although the subgroups did not differ from each other. Two very surprising and unexpected findings were revealed. First, it was found that the relations among moral reasoning, empathy, and perspective-taking were nonsignificant. Second, there was a lack of significant differences in empathy between delinquent and nondelinquent groups. One possible explanation for the inconsistent results may be the questionable validity of the paper-and-pencil measures used to assess empathy. It is also possible that, as Cohen and Strayer (1996) argue, the authors did not use Davis' IRI empathy measure as it was intended, thereby influencing the accuracy of results. That is, Lee and Prentice computed the IRI as a total mean score across all four of its scales, neglecting the multidimensional component of each subscale, which had been specifically designed to separately assess the affective and cognitive aspects of social role-taking. Regardless, the authors conclude that further research on the relationship between empathy and delinquency is needed, particularly since their findings conflict sharply with literature that portrays delinquents as egocentric and deficient in emotional empathy.

In a more recent study aimed at clarifying the development of empathy in deviant groups, Schonert-Reichl (1994) examined the interrelations among moral reasoning, empathy, and age. Her sample included 39 adolescents with behavioral disorders and 39 non-disordered peers between the ages of 14 and 19. Participants were matched for age, race, SES, school, and neighborhood. All participants were individually administered the DIT (Rest et al., 1974) and the QMEE (Mehrabian & Epstein, 1972) in a 45-minute session.

Findings provided evidence that adolescents with behavioral disorders exhibit more immature forms of both principled moral reasoning and empathy than their non-disordered counterparts. Interestingly, the correlations between moral reasoning and empathy remained positive, regardless of the existence of behavioral disorders. Additionally, this study confirmed the findings by other researchers (e.g., Eisenberg et al., 1991; Ellis, 1982) that empathy in adolescents is age-related. Overall, Schonert-Reichl's (1994) findings provide support for the contention that deviant groups exhibit more immature forms of socio-cognitive abilities than do their non-disturbed counterparts.

With respect to the relation of prosocial moral reasoning to empathy and perspective-taking, no research exists that has examined these constructs in atypical populations such as juvenile delinquents. Although the last section reviewed research demonstrating that prosocial moral judgment, empathy, and perspective-taking were related in normal populations (Eisenberg et al., 1991; Eisenberg et al., 1987; Eisenberg-Berg & Mussen, 1978), it is not known whether this relationship extends to deviant populations as well.

### Summary

The research reviewed on the relations of prohibition-oriented moral reasoning, empathy, and perspective-taking in atypical populations has yielded results indicating that, in general, moral reasoning, empathy, and perspective-taking are positively related. Nevertheless, the findings have not been unequivocal, particularly in regard to empathy in atypical populations. For example, Lee and Prentice reported an absence of significant relationships among moral reasoning, empathy, and perspective-taking. Moreover, Lee and Prentice found that the delinquent and nondelinquent groups in their study did not differ with respect to empathy. Although these findings conflict sharply with some previous research (e.g., Chandler, 1973; Cohen & Strayer, 1996; Kaplan & Arbuthnot, 1985; Rotenberg, 1974; Schonert-Reichl, 1994b), they support other investigations that have failed to find significant group differences in empathy (e.g., Chandler & Moran, 1990; Waterman et al., 1981). Clearly, the role of empathy in moral development is a complex one and further research is needed in order to elucidate the relationship between empathy and moral reasoning in atypical populations.

With regard to prosocial moral reasoning, it has been frequently noted throughout this study that no research to date has examined the relationships of prosocial moral judgment, empathy, and perspective-taking in deviant groups. Clearly, further research is necessary. From a developmental psychopathology perspective, such an investigation will aid in the discovery of deviations from the normal developmental trajectory and provide a way to identify age-appropriate abilities in the midst of pathology (Cicchetti, 1993).

### Moral Reasoning and Social Behavior

The school environment has long been recognized as a vital contributor to the development of social competencies and interpersonal relationships. Recently, researchers have become interested in determining the relationship between social behavior and moral reasoning in the classroom, given that the classroom provides an environment in which to facilitate moral development (Kohlberg, 1975). Moreover, any understanding of social behavior requires an equal understanding of moral reasoning because "moral judgment...is the single most important or influential factor yet discovered in moral behavior" (Kohlberg, 1975, p. 672). With this in mind, a consideration of social behaviors outside the classroom environment is as equally important.

With regards to prosocial moral reasoning, the few studies that do exist reveal that higher levels of prosocial moral reasoning have been associated with both the frequency and quality (e.g., more altruistic) of prosocial behavior (Eisenberg et al., 1991). Because disturbed and delinquent adolescents are defined primarily by their behavior, and because they characteristically function at lower levels of moral reasoning than non-disturbed populations, it is probable that they demonstrate behavior problems in both the classroom environment, and outside of it in their daily lives. Therefore, it is essential in this study to discuss the literature that supports a relationship between moral reasoning and behavior.

One study that looked at the association between prohibition-oriented moral reasoning and social behaviors was conducted by Schonert-Reichl in 1996. The purpose of her study was to examine both the prosocial and antisocial behavioral correlates of moral reasoning during early adolescence. The sample included 108 fifth-, sixth-, and seventh-grade students who were

individually administered two moral dilemmas from the MJI (Colby & Kohlberg, 1987). Social behavior was determined using a behavioral nomination method, where students were asked to indicate which of their classmates demonstrated various prosocial and antisocial behaviors.

Overall, the results confirmed that moral reasoning was positively related to peer-nominated prosocial behaviors. Further, it was found that moral reasoning was negatively related to peer-nominated antisocial behaviors. However, many of these relationships were different for boys and girls. For example, for those nominations that boys received from girls, moral reasoning was significantly positively related to all of the prosocial behaviors (e.g., cooperative, trustworthy, fair, helpful). In a similar pattern, those nominations that girls received from boys indicated that all the prosocial behaviors were positively related to moral reasoning. In general then, these results provide some evidence that moral reasoning is positively related to prosocial behaviors and negatively related to antisocial behaviors among adolescents.

One study that examined the relationship between prohibition-oriented moral reasoning and classroom behavior was conducted by Bear and Richards (1981). The purpose of their study was to determine the association between moral reasoning and conduct problems in the classroom. Given that morally immature reasoners (i.e., preconventional) demonstrate an orientation toward satisfying their own needs with little regard for others, it follows that they will have little interest in conventional standards of conduct and will act impulsively whenever there is a minimal chance of being punished. Further, since preconventional reasoning is based on deference to superior power, such reasoners are likely to be more variable in their behavior than their conventional counterparts, who are more autonomous in their functioning. This rationale led the authors to posit two hypotheses in their study: first, that children who use lower levels of moral reasoning would display more conduct problems, and second, that these same children would display more variability in their conduct ratings than those who reasoned at higher levels. Research participants included 32 boys and 28 girls from the sixth grade. Participants were assessed individually for level of moral reasoning using the MJI (Colby & Kohlberg, 1987). Teachers rated conduct problems in the classroom with the Behavior Problem Checklist (Quay & Peterson, 1979).

Overall, the results supported both hypotheses, even after the effects of sex, verbal ability, and social class were controlled statistically. Specifically, it was found that as levels of moral reasoning increased, conduct problem ratings in the classroom declined. Moreover, it was found that the variance of conduct problems in the lowest stages of moral reasoning was much higher than that of the highest stages of moral reasoning, suggesting a greater variability of conduct behaviors in the lower stages of moral reasoning. The authors concluded by positing that these findings suggest a link between lower levels of moral development and behavior problems.

Additional research on prohibition-oriented moral reasoning and social behavior in the classroom was continued by Bear (1989). He argued that, although some research had linked immature moral reasoning to juvenile delinquency, very few studies had explored its relationship to behavior problems in normal children. It was hypothesized in this study that prohibition-oriented moral reasoning would be negatively related to acting out and other externalizing kinds of antisocial behaviors. Participants involved 77 sixth graders, none of whom were identified as being eligible for special education services because of social or emotional disorders. Measurements included the Revised Behavior Problem Checklist (Quay & Peterson, 1987) and a moral reasoning preference task, the Social Preference Task (Bear, 1989), which is a self-report measure utilizing Kohlberg's dilemmas and based on his six stages of moral reasoning.

The results supported a significant link between moral reasoning and what the author identified as socialized antisocial behavior (i.e., stealing, lying, cheating). Specifically, children with low moral reasoning displayed more stealing, lying, and cheating behaviors than children with high moral reasoning. A significant relationship was also found between moral reasoning and unsocialized antisocial behavior (i.e., fighting, teasing, cruelty). That is, children with low moral reasoning displayed more fighting and teasing behaviors than children with higher moral reasoning. Furthermore, a gender effect was found. Specifically, a significant relationship between maturity of moral reasoning and both types of antisocial behaviors was found among boys. However, no significant relationships were found for girls. The author concluded that, on the whole, his findings concurred with previous studies indicting that moral reasoning is related to the expression of antisocial behaviors in the classroom.

In another inquiry, Richards, Bear, Stewart, and Norman (1992) noted that two competing hypotheses exist regarding how moral reasoning influences classroom conduct. The merits of each were compared in this study. In the first hypothesis, the authors cite previous research (e.g., Candee & Kohlberg, 1987) that argues that moral conduct continuously improves with advances in moral reasoning, thereby suggesting a monotypic relationship. In the second hypothesis, they argued that classroom conduct deteriorates as youngsters move from Stage 1 to Stage 2, then improves once again as they move into more conventional reasoning. This hypothesis can be clarified simply by considering that children in Stage 1, although egoistic, rigidly adhere to rules and strive to avoid punishment by maintaining an obedience to superior power. Children in Stage 2 are more aptly characterized by "feisty independence" than children in Stage 1 (Lickona, 1983). That is, the instrumental exchange perspective descriptive of Stage 2 contributes to greater variability among children and less conformity to teacher expectations. Finally, it was hypothesized that behavior would improve as children adopt better perspective-taking skills and understand normative expectations by consolidating their reasoning at a more conventional level (i.e., Stage 3). Thus, the authors hypothesized that the relationship between moral development and conduct is curvilinear, with the least and the most morally mature children demonstrating fewer behavior problems in the classroom.

Participants included fourth- and eighth-grade children selected from two different educational institutions -- one public and one private. The first sample was comprised of 60 students from the public school system. These students were from predominantly lower class homes. The second sample consisted of 83 students from a private school. While all social classes were represented, the majority of children in this sample came from middle-class homes. Measures included the MJI (Colby & Kohlberg, 1987), and the Behavior Problem Checklist (Quay & Peterson, 1987).

Results supported the second hypothesis, thereby suggesting a curvilinear relationship between moral reasoning and classroom behavior. Specifically, children who functioned at either a lower stage of moral reasoning (i.e., Stage 1), or at a higher stage of moral reasoning (i.e., Stage 3) displayed fewer conduct problems than did children functioning at the middle stage of moral

reasoning (i.e., Stage 2). The authors attributed the increased conduct problems demonstrated by Stage 2 reasoners to characteristics inherent in this stage. That is, Stage 2 reasoners were not impressed by authority, were less regulated by fear of punishment, and were less inclined to follow rules than either Stage 1 or Stage 3 reasoners. Moreover, although the conforming behaviors of Stage 1 reasoners were due primarily to the avoidance of punishment, the improved behavior of children who reasoned at higher levels (i.e., Stage 3) could be attributed to an increased respect for the rights of others, a developing sense of responsibility, a greater concern for pleasing the teacher, and the emergence of internalized standards of conduct. The authors concluded that encouraging the development of moral reasoning may be the surest route to ensuring positive social behaviors in the classroom.

Spurred by findings of Richard et al.'s. (1992) study suggesting a curvilinear relationship, Bear and Rys (1994) set out to further explicate the relationship between moral reasoning and behavior by measuring prosocial moral reasoning among children. They hypothesized that the distinction between hedonistic and needs-oriented moral reasoning would explain the substantial variance in conduct found among children who reason predominantly at Stage 2. In particular, they expected that hedonistic reasoners would display more conduct problems than needs-oriented reasoners. Additionally, the researchers examined the influence of prosocial moral reasoning on sociometric status within the classroom, viewing sociometric status as an indication of social adjustment. They argued that children who are well integrated among their peers have greater opportunities for role-taking, and thus would possess more mature prosocial moral reasoning. In investigating this relationship, they argued that prosocial moral reasoning would influence sociometric status both directly and indirectly (i.e., through social behavior).

Research participants included 133 students from 11 second- and third-grade classrooms wherein approximately one-third of the children had been placed for learning or behavioral difficulties. The four prosocial moral reasoning dilemmas utilized in previous research (e.g., Eisenberg et al., 1983; Eisenberg et al., 1987; Eisenberg-Berg, 1979; Eisenberg-Berg & Roth, 1980) were individually administered to all participants. Ratings of behavior were provided by



teachers, who completed the Teacher-Child Rating Scale (Hightower, Spinell, & Lotyczewski, 1987). Finally, sociometric status was obtained for each participant through peer nominations.

The results confirmed associations between prosocial moral reasoning, social adjustment difficulties, behavior problems, and social preference ratings, but only among boys. Specifically, for boys, hedonistic reasoning was found to be associated lower social competencies, the presence of acting-out behaviors, and less favorable social status than was needs-oriented reasoning. The authors explain the gender differences as a possible result of either girls exhibiting less direct forms of aggression (such as tattling or taking things from others) that were not measured in this study, or as a consequence of socialization (i.e., rule forming behavior being habitual among girls). In sum, these results are especially relevant for the present investigation because they provide support for the notion that lower levels of prosocial moral reasoning are associated with a greater frequency of behavior problems.

In conclusion, although the research is scarce, it has generally found a link between prohibition-oriented moral reasoning and social behaviors in both the classroom environment and in daily life. Further, while studies do exist that have looked at the relationship between prosocial moral reasoning and social behavior in normal populations (e.g., Bear & Rys, 1994; Eisenberg et al., 1991; Eisenberg et al., 1987), no literature has examined this association in adolescents adjudicated as juvenile delinquent. Because behavior difficulties are often instrumental in the classification of adolescents as delinquent, this topic is of considerable interest to those who work with problem youth (e.g., teachers, clinicians, counsellors, youth care workers, probation officers), particularly if we are to enhance their ability to effectively promote positive adolescent development.

### Rationale and Significance of the Study

The research findings presented in this literature review have suggested that delinquent and disturbed youth are characterized by deficiencies in moral reasoning abilities and related competencies (e.g., Campagna & Harter, 1975; Chandler & Moran, 1990; Jurkovic & Prentice, 1977; Sigman et al., 1983). These deficits may be due, at least partly, to the dearth of social interactions and role-taking opportunities available to them. According to Gibbs, Arnold, Ahlborn, and Cheesman (1984), "children and adolescents who are not afforded adequate role-taking opportunities thereby fail to develop a cognitive buffer against antisocial influences and temptations" (p. 37). Indeed, delinquent and disturbed populations have been found to function at lower levels of prohibition-oriented moral reasoning, demonstrate inadequate empathic abilities, lack the necessary social skills required for the development of meaningful relationships, and demonstrate problem behaviors in the classroom. Consequently, these youth are at risk for healthy adult adjustment.

It has been noted by Trevethan and Walker (1989) that a better appreciation of the development lags that characterize juvenile delinquents will contribute to our understanding of developmental psychopathology. Moreover, an enhanced understanding will serve to facilitate the development and implementation of effective intervention programs. However, prior to the development of any successful intervention for disturbed youth, it is first necessary to become aware of exactly what deficits exist in the population. For this reason, research into the prosocial moral reasoning of delinquent adolescents is essential. The research on prosocial development is still somewhat limited, and no research exists that has examined this mode of moral reasoning in delinquent populations. Furthermore, although some research has revealed that prosocial moral reasoning is associated with social behavior (Eisenberg et al., 1991), it is not clear whether this relationship exists among or within juvenile delinquents. Thus, an investigation into the association between prosocial moral reasoning and social behavior among deviant populations also needs to be considered.

Moreover, given the existing paucity of research on prosocial moral reasoning among delinquent youth in general, it stands to reason that that no research has examined prosocial moral

within delinquent subgroups. At a theoretical level, such information can provide a better understanding of the processes or mechanisms underlying prosocial moral reasoning by examining this construct along various dimensions of deviancy. At a practical level, the isolation of delinquent subgroups has significant implications for the designation of intervention programs more appropriately oriented towards the precise deficiencies displayed by each subgroup (Jurkovic & Prentice, 1977). There is research to suggest that some studies are confounded by the conceptual domain by which groups are classified (Smetana, 1990). Consider that juvenile delinquents commit a variety of offenses for which they are adjudicated, ranging from the conventional (e.g., drug-related offenses, vandalism, and petty theft), to the amoral (e.g., violating the rights and welfare of others). Clearly, a careful separation of delinquent subgroups on the basis of a conceptual domain will yield a more precise indicator of the relationships between prosocial moral reasoning, empathy, and delinquency (Smetana, 1990). The present study attempted such a separation by classifying delinquents on the basis of crimes committed against persons (moral domain) and crimes committed against property (conventional domain).

Additionally, although Ellis (1982) argues that empathy is crucial for development, no research has investigated this relationship in delinquent populations. Moreover, because research examining both empathy and perspective-taking in disturbed populations have yielded equivocal results, it becomes exceeding clear that more information is required and more research needs to be conducted.

Finally, adolescence seems to be a particularly salient time in the life-span for the study of empathy and perspective-taking development because youth are beginning to emerge from an egocentric stage, yet are still developing role-taking and empathic skills (Kaplan & Arbuthnot, 1985). Furthermore, because adolescence is a crucial period of transition and change with regards to prohibition-oriented moral reasoning, social relationships, perspective-taking, and affective responding, it is expected to be a period of growth for prosocial reasoning as well (Eisenberg, 1990). Additionally, it appears that the onset of deviant behavior and social behavior difficulties that may eventually lead to delinquency usually occur between early and mid-adolescence

(Campagna & Harter, 1975). For these reasons, adolescence is a group that may be particularly appropriate to target for investigation.

It would greatly benefit the designation and implementation of interventions for special populations if researchers were cognizant of the different factors contributing to the interference of age appropriate skills, particularly regarding several critical dimensions of socio-cognitive development, such as prosocial moral reasoning. Therefore, it was the purpose of the present study to progress beyond what is already known about juvenile delinquents with regards to their developmental lags in prohibition-oriented moral reasoning and investigate their prosocial moral reasoning. Specifically, this study aimed to compare the prosocial moral reasoning of juvenile delinquents with that of their nondelinquent peers. This study also explored the relationship of prosocial moral reasoning to empathy, perspective-taking, and social behavior both between and within these two groups. The following questions provided the focus of the study:

1. Do delinquent and nondelinquent adolescents differ in their levels of prosocial moral reasoning?
2. Do delinquent and nondelinquent adolescents differ in their levels of empathy and perspective-taking? That is, will scores of delinquents be delayed or arrested when compared to controls?
3. What is the nature of the relationships among prosocial moral reasoning, empathy, and social behavior between delinquent and nondelinquent groups?
4. Are there differences in prosocial moral reasoning, empathy, and perspective-taking among delinquent youth? That is, will differences in prosocial moral reasoning, empathy, and perspective-taking be evidenced when delinquent adolescents are divided into homogeneous subgroups?

## CHAPTER III

### Methods

#### Participants

Participants included 40 male juvenile offenders incarcerated at a residential correction facility and a comparison group of 40 nondelinquent peers from the regular school system. All participants ranged in age from 13 to 18 years, with a mean of 16.39 years ( $SD = 1.30$  years), and were selected from the 8th through 12th grades. Only males were selected for participation in the study because of the small percentage of females incarcerated at the correction facility as juvenile offenders. This is in accord with findings from prior research that has found few adolescent females identified as juvenile delinquent (e.g., Riffel & Ozgood, 1992). The selection of participants was accomplished in a similar manner for both delinquents and nondelinquents. The delinquent data were obtained first in order to facilitate the selection of comparison participants. Each group is discussed, in turn, below.

#### Delinquent Adolescents

Delinquent adolescents were given a brief description of the study and the procedures to be used. Clarification of the confidential nature of the individual results was strongly emphasized, along with the assurance that participation was entirely voluntary. Among the 48 students solicited for participation, 43 (90%) agreed to take part in the study. However, data from three delinquents were excluded from the study because they failed to meet criterion on the consistency check of the Prosocial Moral Reasoning Objective Measure (PROM; Carlo et al., 1992), resulting in a final total of 40 delinquent participants.

The sample of delinquent youth ranged in age from 13 to 18 years with a mean of 16.43 years ( $SD = 1.34$  years). With regard to the ethnicity of the delinquent sample, 28 participants (70%) were Caucasian, 3 (8%) were Indo-Canadian, and 9 (22%) defined themselves in terms of mixed heritage (e.g., Asian/Native Indian). Verbal ability test scores, as measured by the Quick Word Test (QWT; Borgatta & Corsini, 1960) ranged from 5 to 37, with a mean of 25.58 ( $SD =$

7.06). On the basis of the Socioeconomic Index for Occupations (Blishen, Carrol, & Moore, 1987), the socioeconomic status (SES) ratings of the families of the delinquent youth ranged from 21.37 to 64.07, with means of 39.88 ( $SD = 9.22$ ) and 32.88 ( $SD = 7.78$ ) for father's and mother's occupations respectively. Examples of occupations typical of scores close to the means include service managers (40.99), health aides (39.86), and taxi drivers (30.92). Only 31 students were able to provide information regarding their father's occupation, while 35 provided information regarding their mother's. Further, two delinquents reported that their fathers were incarcerated in correctional facilities. One of these youth also reported that his mother was incarcerated.

With respect to parental educational level, 31 adolescents were able to provide information. Specifically, 11 (35%) delinquent adolescents reported that their fathers had only some high schooling, and 7 (22%) reported that their fathers had graduated high school only. Further, 3 (10%) reported that their fathers had attended a vocational or technical college, while 3 (10%) reported that their fathers had acquired some academic college. Lastly, 3 (10%) delinquent adolescents reported that their fathers had graduated university, and 4 (12%) reported that their fathers had attended graduate school. Concerning mother's educational level, 6 (20%) delinquents reported that their mothers had only some high schooling, while 12 (39%) reported that their mothers had graduated high school only. Further, 1 (3%) delinquent reported that his mother had attended a vocational or technical college, while 7 (22%) delinquents reported that their mothers had acquired some academic college, and 5 (16%) reported that their mothers had graduated university. Finally, none of the mothers of delinquents had attended graduate school.

#### Nondelinquent Adolescents

Nondelinquent participants were drawn from a secondary school in the same city in which the delinquent institution was located. Further, all nondelinquent adolescents were selected from a school in a working class community because of the expectation that SES would approximate the delinquent group with reasonable accuracy. Matching of nondelinquent participants with respect to age and race was accomplished in the following manner. First, a roster of all the students enrolled in the classes being taught by three participating teachers was requested. The participating teachers

taught social studies classes that were mandatory for all students, thus, the potential participants were considered representative of the school population. Second, from this roster, and in consultation with the teachers, a list of male nondelinquent students the same age (i.e., within one month of the birthdate) and race was compiled for each delinquent participant. Finally, adolescents from this list were randomly selected and contacted in person to inquire about research participation.

Nondelinquent adolescents were given a presentation similar to the delinquent group, along with the standard information and permission forms to be taken home to parents. Among the 45 students contacted for participation, 42 (93%) returned parental permission slips. Because three students did not return permission slips, three additional students were selected from the list of suitable matches. These students obtained parental permission to participate in the study. Preliminary analysis of data revealed that three students should be excluded from the study for failing to meet criterion on the consistency check of the PROM (Carlo et al., 1992). Finally, in order to be eligible for participation as a nondelinquent participant, students were required to have no prior criminal record of juvenile offenses. An item in the demographics questionnaire addressed this issue by asking students to report whether they had ever been arrested and convicted of a crime. Because two students reported having juvenile records, they were excluded from further analyses, resulting in a final total of 40 nondelinquent participants.

Nondelinquent adolescents ranged in age from 13 to 18, with a mean of 16.35 years ( $SD = 1.25$  years). As with the delinquent sample, 28 participants (70%) were Caucasian and 9 (22%) defined themselves as being of mixed heritage. However, in contrast to the delinquent group, the nondelinquent sample also included 2 (5%) Asian students, and only 1 (3%) Indo-Canadian adolescent (versus 3 in the delinquent sample). Verbal ability test scores, as obtained from the QWT (Borgatta & Corsini, 1960), ranged from 11 to 40 with a mean of 27.88 ( $SD = 7.49$ ). The Socioeconomic Index for Occupations (Blishen et al., 1987) indicated that nondelinquent SES ratings ranged from 21.24 to 101.32, with a mean of 41.48 ( $SD = 16.08$ ) for father's occupations, and 36.91 ( $SD = 9.98$ ) for mother's. Some examples of occupations close to the mean include

office secretaries (41.82), insurance agents (40.51), and hairdressers (35.62). Only one nondelinquent failed to provide his father's and mother's occupation information.

Information on parental educational level was provided from 37 nondelinquent adolescents. Specifically, 4 (11%) nondelinquent adolescents reported that their fathers had only some high schooling, and 13 (35%) reported that their fathers had graduated high school only. Four (11%) nondelinquent adolescents reported that their fathers had attended a vocational or technical college, 7 (19%) reported that their fathers had acquired some academic college, and 7 (19%) reported that their fathers had graduated university. Further, 2 (5%) nondelinquents reported that their fathers had attended graduate school. With respect to the educational level of mothers, 5 (13%) nondelinquents reported that their mothers had only some high schooling, and 15 (41%) reported that their mothers had graduated high school only. Further, 4 (11%) nondelinquents reported that their mothers had attended a vocational or technical college, 4 (11%) reported that their mothers had acquired some academic college, and 9 (24%) reported that their mothers had graduated university. As in the delinquent sample, none of the nondelinquent adolescents reported that their mothers had attended graduate school.

It will be recalled that adolescents were matched as closely as possible for age and ethnicity. As can be seen in Table 3, it appears that matching was accomplished across the variables. An independent samples t-test revealed that the groups were not significantly different in terms of age,  $t(78) = .61$ ,  $p > .05$ . Although 8% of students across groups differed ethnically, this difference was not significant,  $\chi^2(4, N = 80) = 3.00$ ,  $p > .05$ . Further, independent samples t-tests revealed that participants did not differ significantly in terms of father's occupation,  $t(58) = -.45$ ,  $p > .05$ ; mother's occupation,  $t(53) = -1.66$ ,  $p > .05$ ; father's educational level,  $t(66) = -1.04$ ,  $p > .05$ ; or mother's educational level,  $t(66) = -.41$ ,  $p > .05$ . Finally, an independent samples t-test revealed that the verbal ability scores of the delinquent and nondelinquents, as measured by the QWT (Borgatta & Corsini, 1960), were not significantly different from one another,  $t(78) = -1.41$ ,  $p > .05$ .



Table 3.

Sample Description

Variable		Delinquent ( <u>n</u> = 40)	Nondelinquent ( <u>n</u> = 40)	Significance
Age				
	<u>M</u> ( <u>SD</u> )	16.43 (1.34)	16.35 (1.25)	ns
Race				
<u>n</u> (%)	Caucasian	28 (70)	28 (70)	ns
	Asian	-	2 (5)	ns
	Indo Canadian	3 (8)	1 (3)	ns
	Mixed Heritage	9 (22)	9 (22)	ns
SES				
	<u>M</u> ( <u>SD</u> ) father's occupation	39.88 (9.22)	41.48 (16.08)	ns
	mother's occupation	32.88 (7.78)	36.91 (9.98)	ns
Quick Word Test				
	<u>M</u> ( <u>SD</u> )	25.58 (7.06)	27.88 (7.49)	ns

MeasuresDemographic Information (Appendix F)

A questionnaire designed to collect information regarding age, ethnicity, and family background (i.e., family composition, parent's occupation and education) was administered to each adolescent. As noted previously, demographic data were collected from the delinquent sample first in order to develop matching criterion for the selection of the nondelinquent comparison group.

Quick Word Test (QWT; Borgatta & Corsini, 1960, Appendix G)

The QWT is a self-report measure comprised of 100 items that is designed to assess vocabulary skills of adolescents and adults. For the present study, a shortened version of the QWT (50 items) was utilized because previous researchers have noted the difficulty of maintaining

adolescent interest in completing the longer version (Carlo et al., 1992). Research on the QWT has found this shortened version to be as equally reliable as the full version (Borgatta & Corsini, 1960). Participants received a score based on the number of correct responses, ranging from a score of 0 (no correct responses) to a score of 50 (all responses correct).

Prosocial Moral Reasoning Objective Measure (PROM; Carlo et al., 1992, Appendix H)

The PROM is an objective self-report measure of prosocial moral reasoning that resembles the Defining Issues Test (DIT; Rest et al., 1974) and is based on Eisenberg-Berg's (1979) Prosocial Moral Reasoning Interview. The prosocial moral reasoning interview method involves presenting a participant with four prosocial moral dilemmas during an individual interview session in order to elicit reasoning responses regarding what the protagonist in the dilemma should do. The dilemmas are structured similarly to Kohlbergian dilemmas (Colby & Kohlberg, 1987), except that each story involves the needs and wants of one individual being in direct conflict with those of another in a context where the roles of prohibitions, laws, rules, obligations, and the like are de-emphasized (see Chapter 1 for a detailed discussion). The PROM was developed to facilitate the assessment of adolescents' prosocial moral reasoning by utilizing a paper-and-pencil measure that would not be subject to the limitations inherent in traditional interview measures (see Gibbs, Arnold, Morgan, Schwartz, Gavaghan, & Tappan, 1984; Rest, 1979). Given the sound psychometric properties and easy administration of the DIT, Carlo et al. chose the DIT as a model in the construction and development of the PROM. Specifically, the PROM is a recognition rather than production task, thereby placing less emphasis on verbal expressiveness. Recognition tasks of this sort have been found to be more sensitive in discriminating between delinquent and nondelinquent groups than interview methods (McColgan et al., 1983; Schonert-Reichl, 1994). Considering the sample selected for this study, the PROM seemed an appropriate alternative to the traditional interview method.

The PROM includes seven moral dilemmas that are similar to the vignettes used in Eisenberg-Berg's (1979) interview method. These dilemmas were designed to invoke a conflict between the actor's needs, wants, and desires with those of another (or other's). Only five of the seven PROM dilemmas were utilized in the present study, given that two of the dilemmas are

intended for use with young (i.e., elementary school) children (Eisenberg et al., 1995). In each dilemma, participants indicated whether the protagonist in the story should or should not help the needy other. Following this decision, participants rated the importance of six reasons that state why the protagonist should or should not help on a 5-point scale (ranging from 1 = not at all to 5 = greatly). After rating the items for each dilemma, participants are asked to rank the three most important items from the set of six. An example of one prosocial moral reasoning dilemma taken from the PROM is as follows:

A young boy named Tony had a very unusual type of blood. One day right after Tony had begun school and was accepted on the baseball team, a doctor called to ask him to give a large amount of blood to a boy who was very sick and needed more blood of the same kind as Tony's to get well. Because Tony was the only person in the town with the sick boy's type of blood, and since this was a rare and serious sickness, the blood would have to be given a number of times over a period of several weeks. So, if Tony agreed to give his blood, he would have to go into the hospital for several weeks. Being in the hospital would make Tony feel weak for a while, he would lose his spot on the team, and he would be very far behind in school. What should Tony do? (Carlo et al., 1992).

The six statements following the dilemma represent Eisenberg et al.'s. (1983) five levels of prosocial moral reasoning, plus one lie/nonsense item. Specifically, each of the five stories includes one hedonistic item, which pertains to simple hedonistic or direct reciprocity reasoning (Level 1 in Eisenberg et al.'s. schema; e.g., "It depends whether Tony feels that losing his spot on the team is important or not"), one needs-oriented item (Level 2; e.g., "It depends how sick the other boy will get"), an approval-oriented item (Level 3; e.g., "It depends whether Tony's parents and friends will like what he did or not"), a stereotypic item (Level 3; e.g., "It depends whether Tony thinks that helping is nice or not"), and one item reflecting higher-level reasoning, such as perspective-taking, sympathetic, or abstract-internalized thinking (Levels 4 and 5; e.g., "It depends whether Tony can understand how badly the other boy is feeling"). As noted previously,

one lie/nonsense item is also included (e.g., “It depends on Tony’s unidimensional approach to social classes”).

Seven scores were computed from the ratings of PROM dilemmas according to criteria delineated by Carlo et al. (1992). The first five refer to the relative importance attributed to each of the five stages of prosocial moral reasoning, as outlined above. PROM ratings that corresponded to each of the five stages were summed across the five moral dilemmas to obtain a “frequency score” for each stage of prosocial moral reasoning. Thus, frequency scores included a hedonistic score, a needs-oriented score, an approval-oriented score, a stereotypic score, and an internalized reasoning score. Each of these scores ranged from 5 to 25 for each stage indicated. Frequency scores were then transformed to “proportion scores” by dividing each by the “potential category score”. The potential category score is the sum of all five PROM frequency scores, which ranges from 25 to 125. In effect, proportion scores were used to determine the level of prosocial moral reasoning for each student by reflecting a preference for one reasoning type relative to the other reasoning types.

The sixth PROM score involved the computation of the lie/nonsense items in order to determine the reliability of a participant’s responses. Lie/nonsense items were coded as described above for frequency scores, but were not used in computing preferences for prosocial moral reasoning. Instead, they were used to identify participants who frequently selected items as important on the basis of their apparent complexity or verbal sophistication, rather than on their meaning. Relying on Rest’s (1986a) description of the reliability check of the DIT, Carlo et al. (1992) suggested that a frequency score of 60% or higher on the lie/nonsense items indicates a potentially invalid questionnaire. A further check of questionnaire validity involved the use of importance rankings, used to identify whether participants were too discrepant between their ratings and rankings. For example, a participant who rated reason number six as “greatly important”, then proceeded to rank reason number six as the “first most important “ reason was considered consistent. If however the participant ranked reason number two (or any other number that was not given the highest rating of the six reasoning items), then the participant was

considered inconsistent. Criterion for inconsistency included three out of five dilemmas (Rest, 1986a).

The seventh PROM score is an overall composite score computed using methods devised by Carlo et al. (1992) and Eisenberg et al. (1995) in which the proportion of internalized reasoning is multiplied by 3, the proportion of needs-oriented and stereotypic reasoning are multiplied by 2, and proportions of hedonistic and approval-oriented reasoning are multiplied by 1.<sup>2</sup> These values were then summed for a PROM weighted average composite score (PWAS).

Previous research investigating the psychometric properties of the PROM have reported satisfactory convergent and concurrent validity. Test-retest reliabilities ranging from .70 to .79, and Cronbach's alphas ranging from .56 to .78 have also been reported (Carlo et al., 1992; Eisenberg et al., 1995). In the present study, alphas for the hedonistic, needs-oriented, approval, stereotypic, internalized, and nonsense scales were .70, .50, .76, .58, .65, and .62 respectively, which are fairly high given that there were only 5 items per scale (Eisenberg et al., 1995).

#### Interpersonal Reactivity Index (IRI; Davis, 1980, 1983, Appendix I)

The IRI is a 28-item self-report measure consisting of four 7-item subscales: perspective-taking, fantasy, empathic concern, and personal distress. Because previous research utilizing the IRI has linked the perspective-taking and empathic concern scales to prosocial moral reasoning (Eisenberg et al., 1991; Eisenberg et al., 1995), only these two subscales were used in the present investigation. The perspective-taking scale assesses the tendency to spontaneously adopt the psychological perspective of others, (e.g., "I try to look at everybody's side of a disagreement before I make a decision"), while the empathic concern scale assesses the tendency to feel warmth, compassion, and concern for other individuals, (e.g., "I often have tender, concerned feelings for people less fortunate than me"). Respondents indicated on a 5-point scale (ranging from 1 = never

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<sup>2</sup> Although approval-oriented reasoning is considered of moderate level in studies of spontaneously elicited moral reasoning, research has found that approval-oriented items on the PROM reflect relatively low level moral reasoning (Eisenberg et al., 1995). That is, because the PROM is a preference measure of moral judgment requiring merely the endorsement or rejection of options, students tend to reject the blatantly worded approval-oriented items (Eisenberg et al., 1995). For this reason approval-oriented reasoning items were multiplied by 1 in the computation of the PROM weighted average score.

to 5 = very often) how frequently they engage in the behaviors listed in each subscale. Higher scores suggest a greater degree of empathy and perspective-taking.

Satisfactory convergent and discriminant validity have been reported for the IRI, as well as test-retest reliabilities ranging from .62 to .71 (Davis, 1983). Satisfactory internal consistency reliabilities have also been reported, with Cronbach's alphas ranging from .75 to .83 on the empathic concern scale and from .66 to .73 on the perspective-taking scale (Carlo et al., 1992; Eisenberg et al., 1991). In the present study, Cronbach's alpha was found to be adequate for both empathy (alpha = .77) and perspective-taking (alpha = .67).

#### The Social Skills Rating System (SSRS; Gresham & Elliot, 1990)

The teacher and student rating forms of the SSRS were employed in this study in order to assess several dimensions of social behavior in both the classroom and in daily-life. A brief description of each rating form will be discussed in turn below, followed by a section on scoring procedures and a review of psychometric properties.

SSRS - Teacher Form (Appendix J). The teacher form of the SSRS is a 51-item questionnaire designed to assess three domains: social skills, problem behaviors, and academic competence. The social skills scale is further comprised of three subscales: cooperation, assertion, and self-control. The cooperation subscale measures behaviors such as helping others, sharing materials, and complying with rules and directions (e.g., "Finishes class assignments within time limits"). The assertion subscale includes initiating behaviors, such as introducing oneself and asking others for information (e.g., "Initiates conversations with peers"). Finally, the self-control subscale measures behaviors that emerge in conflict (e.g., "Controls temper in conflict situations with peers"), and non-conflict situations (e.g., "Accepts peers ideas for group activities").

The problem behavior domain consists of two subscales -- the externalizing behaviors subscale and the internalizing behaviors subscale. The externalizing subscale measures behaviors involving verbal or physical aggression, poor control of temper, and arguing (e.g., "Gets angry easily"). The internalizing subscale involves behaviors indicating anxiety, loneliness, and poor self-esteem and includes questions such as "Appears lonely", or "Acts sad and depressed".

Both the social skills and problem behavior domains utilize two types of ratings based on frequency and importance. Using a three-point frequency scale (0 = never, 1 = sometimes, 2 = very often) teachers are asked to indicate “How Often” the student being rated engages in the behaviors described. A three-point importance scale determines “How Important” (0 = not important, 1 = important, 2 = critical) each item is in terms of classroom success. However, the importance scale not used in scoring responses.

The final domain, academic competence, includes items concerning student academic functioning, such as reading, mathematics, and general cognitive ability. This domain asks questions like, “Compared with other children in the classroom, the overall academic competence of this child is...”. Academic competence was assessed using a 5-point scale in which teachers rated each student relative to other students in various academic areas (1 = lowest 10% of the class, 5 = highest 10% of the class).

SSRS - Student Form (Appendix K). The student self-report form of the SSRS is a 39-item questionnaire evaluating the social skills domain only. This form includes the same three subscales as the teacher form (i.e., cooperation, assertion, and self-control) with questions worded in a similar manner, but with the student rating him or herself. The student form also includes a subscale for empathy which is designed to assess behaviors that show concern and respect for others’ feelings and viewpoints. An example from the empathy subscale is “I feel sorry for others when bad things happen to them”. Given that empathy was measured in the present study using Davis’ IRI (1983), empathy scores from the SSRS subscale were not included in the analyses.

As in the teacher form, the student form asks respondents to indicate for each item how often they engage in the behaviors described (ranging from 0 = never to 2 = very often). Students are also asked to indicate how important (ranging from 0 = not important to 2 = critical) each item is in their perceived relationships with other people. As previously noted, the importance ratings are not used in scoring.

Scoring SSRS Domains. In both teacher and student forms, an overall score was determined by totaling each of the subscales for that category and adding them together for a global score for that domain (e.g., externalizing and internalizing behavior scores would be summed to

yield a global score representing problem behaviors). As previously noted, academic competence was assessed using a 5-point scale in which teachers rated each student relative to other students (1 = lowest 10% of the class, 5 = highest 10% of the class).

Gresham and Elliot (1990) have reported satisfactory reliability and validity for both forms of the SSRS. Internal consistency estimates range from Cronbach's alphas of .83 to .92 for the social skills domain in both teacher and student forms, from .80 to .89 for the problem behaviors domain, and at .95 for the academic domain. Subscale internal consistency estimates range from .74 to .84 in both teacher and student forms of the social skills domain, and from .74 to .90 in the problem behaviors domain. In the present investigation, the six subscales of the teacher form proved reliable, as indicated by Cronbach's alphas ranging from .74 to .94 (cooperation = .89; assertion = .88; self-control = .86; externalizing problems = .90; internalizing problems = .74; academics = .94). Cronbach's alphas for the student subscales ranged from .73 to .81 (cooperation = .73; assertion = .73; self-control = .81; empathy = .77).

#### Self-Reported Delinquency Scale-Arnold (SRDS-A; Arnold, 1965, Appendix L)

Designed to measure the frequency of offenses relating to attacks against persons and attacks against property, the SRDS-A is a 21-item self-report measure consisting of three subscales: attacks-against-persons, vandalism, and theft. The subscales are comprised of items describing particular "delinquent" activities. Respondents are requested to read each item and indicate the number of times they have performed the act in the past 6 months: never, 1 or 2 times, 3 or 4 times, 5 to 10 times, or more than 10 times. For the purposes of the present investigation, the SRDS-A was slightly modified. Specifically, five questions were added to the attacks-against-persons subscale and scoring procedures were adapted to provide a more comprehensive representation of the frequency with which offenses were committed.

Several factors were considered in the decision to modify the measure. One principal concern involved the year in which the SRDS-A was initially developed. That is, there was a concern that the offenses listed on the 1965 version of the SRDS-A were not reflective of the types of offenses committed in 1997. Indeed, some research suggests that the types of offenses committed by youth have changed considerably over the last couple decades (Riffel & Ozgood,



1992; Rutter & Giller, 1983). Given the dated nature of the measure, it was determined that the existing questions did not adequately depict the types of crime in which youth participate, particularly in terms of violent offenses committed against others. Indeed, Arnold (1965) himself reports that in his investigations, the attacks-against-persons subscale appears to measure “antisocial behavior which is less serious than the crimes normally called attacks against persons” (p. 64). Thus, the subscale was adapted to include questions aimed at determining whether acts of physical aggression were perpetrated against others. Questions were drawn from the Provincial Resource Program’s Young Offender Profile (Riffel & Ozgood, 1992), which provides an indication of the nature of delinquent crime. Five items were added in order to balance the number of items in each scale (e.g., 13 items each), for a total of 26 items.

Further, it was necessary to adapt scoring procedures in order to provide a wider range of responses than that available from original scoring methods. In the original scoring procedures, each item received a score of 0 or 1 based on the alternative chosen (i.e., response of never receives a 0, all other responses receive 1). This method does not provide a clear portrayal of the frequency with which various types of crime are committed. Thus, responses were scored from 0 (never) to 4 (more than 10 times). As in the original scoring version, two global scores are computed from SRDS-A responses; a high score on the attacks-against-person subscale indicates a high frequency of aggression against others (i.e., aggression-against-persons), while high scores on the vandalism and theft scales suggest tendencies to commit crimes against property in terms of increased activities involving damage and theft (i.e., aggression-against-property).

Previous research has reported both construct validity and internal consistency reliability of the SRDS-A (Brodsky & Smitherman, 1983). Arnold (1965) demonstrated internal consistency estimates of .89, .91, and .94 for the attacks-against-persons, vandalism, and theft subscales, respectively. Internal consistency reliabilities of .94 for the attacks-against-persons subscale, .92 for the vandalism subscale, and .93 for the theft subscale have also been reported by Liska (1974). Cronbach’s alphas for the modified measure in the present study were .94 for the attacks-against-persons subscale, .87 for the vandalism subscale, and .85 for the theft subscale. Recall that, in accord with the original scoring procedures of the SRDS-A, the vandalism and theft subscales

were collapsed to produce a global score representative of aggression-against-property ( $\alpha = .91$ ). Thus, there were two indices of self-reported delinquency -- aggression-against-persons and aggression-against-property.

### Procedures

Delinquents and nondelinquents were individually administered measures during one 50-minute session in a separate room in the detention center or school in which they were enrolled. Confidentiality of the testing procedures was emphasized prior to administration. One graduate student, with previous experience in data collection and interviewing adolescents, assisted the author in the administration of questionnaires at the correction facility. Two other experienced graduate students assisted in data collection at the secondary high-school. All participants were administered the measures in the same order, with the instructions and items of each measure being read aloud to compensate for any reading difficulties. Participants had their own copy of each test in order to follow along and mark their responses. Teacher forms of the SSRS were given to teachers of participating students to complete at their convenience ( $n = 4$  teachers for delinquents;  $n = 3$  teachers for nondelinquents).

## CHAPTER IV

### Results

As described in Chapter 1, one of the purposes of the present study was to compare the prosocial moral reasoning, empathy, and perspective-taking of juvenile delinquents with that of their nondelinquent peers. In addition, this study aimed to explore the relationships between prosocial moral reasoning, empathy, perspective-taking, and social behavior between and within these two groups. Given the research questions guiding this study as outlined in Chapter 2, the presentation of the results will be divided into four sections, (a) group differences in prosocial moral reasoning, (b) group differences in empathy, and perspective-taking, (c) the relationships among prosocial moral reasoning, empathy, perspective-taking, and social behaviors for delinquent and nondelinquent groups, and (d) differences in prosocial moral reasoning, empathy, and perspective-taking among delinquent subgroups. This chapter concludes with an overall summary of the findings.

#### Group Differences in Prosocial Moral Reasoning

It will be recalled that the first question that provided the focus of this study was whether delinquent and nondelinquent adolescents differed in their levels of prosocial moral reasoning. Table 4 summarizes the means, standard deviations, and range of scores for the PROM subscales for the two groups. Because some researchers argue that significance testing methods must be replaced with estimates of practical significance (Schmidt, 1996), effect sizes are also reported in the present study using Cohen's (1969) established conventions of .20 for a small effect, .50 for a moderate effect, and .80 for a large effect. Group differences were examined in a matched samples t-test, utilizing the PROM weighted average composite score (PWAS) as the dependent variable. Recall that higher composite scores reflect more mature prosocial moral reasoning. Results revealed significant group differences, with the delinquent group scoring significantly lower than nondelinquents, (delinquent mean = 1.86, SD = .09; nondelinquent mean = 1.93, SD = .09),

$t(39) = -3.59, p = .001$ . As can be seen in Table 4, an effect size of .78 between the delinquent and nondelinquent groups on the PWAS indicates that large differences were found between the two groups.

To more specifically examine group differences in prosocial moral reasoning, a one-way multivariate analysis of variance (MANOVA) was conducted using the five subscales of the PROM as dependent variables (i.e., hedonistic, needs-oriented, approval-oriented, stereotyped, and internalized), and group status as the independent variable (i.e., delinquent and nondelinquent). Wilks's criterion confirmed a significant multivariate effect,  $F(5, 74) = 6.56, p < .001$ . Matched samples t-tests revealed significant group differences in both hedonistic reasoning, (delinquent mean = .21,  $SD = .05$ ; nondelinquent mean = .18,  $SD = .04$ ; effect size = .66),  $t(39) = -2.31, p < .05$  and internalized reasoning, (delinquent mean = .22,  $SD = .03$ ; nondelinquent mean = .26,  $SD = .03$ ; effect size = 1.00),  $t(39) = 4.45, p < .001$  (see Table 4). Thus, significant differences were found between the two groups at the highest and lowest levels of prosocial moral reasoning. Moreover, moderate to large effect sizes suggest meaningful differences between the delinquent and nondelinquent groups on hedonistic and internalized reasoning.

Table 4.

Descriptive Statistics for Delinquent and Nondelinquent Groups on PROM Subscales

PROM Scores	Delinquent ( $n = 40$ )		Nondelinquent ( $n = 40$ )		Effect Size
	<u>M</u> ( <u>SD</u> )	Range	<u>M</u> ( <u>SD</u> )	Range	
Hedonistic	.21 (.05)*	.11 - .41	.18 (.04)*	.09 - .30	.66
Needs	.20 (.03)	.10 - .27	.21 (.03)	.13 - .27	.33
Approval	.15 (.04)	.07 - .22	.15 (.04)	.07 - .23	0
Stereotyped	.21 (.03)	.16 - .28	.21 (.04)	.15 - .33	0
Internalized	.23 (.03)**	.16 - .30	.26 (.03)**	.20 - .35	1.00
PWAS	1.86 (.09)*	1.57-2.02	1.93 (.09)*	1.79-2.15	.78

\*  $p < .05$ . \*\*  $p < .001$ .

### Group Differences in Empathy and Perspective-Taking

The second question addressed in this study concerned whether delinquent and nondelinquent youth would differ in their levels of empathy and perspective-taking. Results from matched samples t-tests revealed that delinquent adolescents scored significantly lower than their nondelinquent peers on both empathy (delinquent mean = 20.50, SD = 5.16; nondelinquent mean = 25.23, SD = 4.53; effect size = .97),  $t(39) = 4.69$ ,  $p < .001$ , and perspective-taking (delinquent mean = 18.43, SD = 5.05; nondelinquent mean = 21.90, SD = 4.05; effect size = .76),  $t(39) = 3.89$ ,  $p < .001$  (see Table 5). Large effect sizes on both empathy and perspective-taking suggest meaningful differences between the delinquent and nondelinquent groups.

Table 5.

#### Descriptive Statistics for Delinquent and Nondelinquent Groups on Empathy and Perspective-Taking

IRI Subscales	Delinquent ( <u>n</u> = 40)		Nondelinquent ( <u>n</u> = 40)		Effect Size
	<u>M</u> ( <u>SD</u> )	Range	<u>M</u> ( <u>SD</u> )	Range	
Empathy	20.50 (5.16)	7 - 30	25.23 (4.53)	13 - 33	.97
Perspective-taking	18.43 (5.05)	9 - 31	21.90 (4.05)	15 - 28	.76

### Correlations of Prosocial Moral Reasoning, Empathy, Perspective-Taking, and Social Behavior Between Delinquents and Nondelinquents

A third focus of this study was to explore the nature of the relationships among prosocial moral reasoning, empathy, and perspective-taking between delinquents and nondelinquents. In this study, I was also interested in examining relationships among these variables with indices of social behavior as measured by both teacher and self-reports. Correlational analyses were conducted separately for the delinquent and nondelinquent youth because it was of interest in the

present study to determine whether the nondelinquent adolescents would demonstrate prosocial moral reasoning results similar to prior research utilizing the PROM (e.g., Carlo et al., 1992; Eisenberg et al., 1995). Further, this study was interested in comparing and contrasting the relationships of prosocial moral reasoning, empathy, perspective-taking, and social behavior between the delinquent and nondelinquent youth. The results of these correlational analyses will be presented separately for the delinquent and nondelinquent groups below.

#### Delinquent Adolescents

Prosocial Moral Reasoning, Empathy, and Perspective-Taking. Results of the first series of correlations conducted between the six PROM scores, and empathy, and perspective-taking for delinquents are presented in Table 6. As shown, hedonistic reasoning was significantly negatively related to empathy ( $r = -.41$ ). As well, empathy and perspective-taking were found to be significantly positively related to each other ( $r = .65$ ). No other significant relationships were found.

Prosocial Moral Reasoning and the Social Skills Rating System. The second series of correlations, involving prosocial moral reasoning and indices of social behavior as measured by the teacher and student subscales of the SSRS, are presented for delinquents in Table 6. As can be seen, hedonistic reasoning was found to be positively related to teacher rated externalizing behaviors ( $r = .33$ ), and negatively related to students' perceptions of their own self-control ( $r = -.32$ ). Both approval-oriented and stereotyped reasoning were positively related to teacher rated internalizing behaviors ( $r = .40$  and  $r = .33$ , respectively).

Prosocial Moral Reasoning and the Self-Reported Delinquency Scale. The third series of correlations examined the relationships between the six PROM scores and the aggression-against-person and aggression-against-property scores of the SRDS-A. Table 6 illustrates that significant positive correlations were found between hedonistic reasoning and aggression-against-persons ( $r = .33$ ), and between hedonistic reasoning and aggression-against-property ( $r = .33$ ). Moreover, internalized reasoning was found to be negatively related to aggression-against-persons ( $r = -.32$ ).

Empathy, Perspective-Taking, and the Social Skills Rating System. Correlations were also conducted among empathy, perspective-taking, and the SSRS subscales. Table 6 demonstrates

that, for delinquents, student rated cooperation was significantly positively related to empathy ( $r = .57$ ) and to perspective-taking ( $r = .45$ ). Student rated self-control was also found to be significantly positively related to empathy ( $r = .45$ ) and to perspective-taking ( $r = .64$ ).

Empathy, Perspective-Taking, and the Self-Reported Delinquency Scale. The final series of correlations shown in Tables 6 concern empathy, perspective-taking, and the aggression-against-persons and aggression-against-property scores of the SRDS-A. Results revealed that empathy and perspective-taking were related to both types of aggression among delinquents. Specifically, it was found that empathy was significantly negatively related to aggression-against-persons ( $r = -.38$ ) and aggression-against-property ( $r = -.39$ ). Similarly, perspective-taking was found to be significantly negatively related to both aggression-against-persons ( $r = -.45$ ) and aggression-against-property ( $r = -.40$ ).

Table 6.

Correlations Among PROM, Empathy, Perspective-Taking, SSRS, and SRDS-A Subscales for the Delinquent Sample

	Prosocial Moral Reasoning						Empathy	Perspective-Taking
	Hedonistic	Needs	Approval	Stereo	Internal	PWAS		
<i>IRI Subscales</i>								
Empathy	-.41**	.04	.13	.27	.22	.25	—	
Persp. Taking	-.26	-.01	.12	.14	.14	.13	.65***	—
<i>Teacher SSRS</i>								
Cooperation	-.05	.07	.04	-.17	.07	.01	.09	-.07
Assertion	.03	-.01	-.08	.03	-.01	-.01	.02	.02
Self-Control	-.16	.06	.06	-.09	.19	.12	.13	.07
Academics	.01	.01	.01	-.24	.15	.01	.16	.10
Externalizing	.33*	-.11	-.09	-.14	-.26	-.29	-.11	-.09
Internalizing	-.29	-.14	.40*	.33*	-.11	-.01	.11	.03
<i>Student SSRS</i>								
Cooperation	-.29	.24	-.02	-.04	.23	.22	.57***	.45**
Assertion	-.07	.05	.13	-.21	.05	-.03	.19	-.01
Self-Control	-.32*	.18	.06	.05	.17	.18	.45**	.64***
<i>SRDS-A</i>								
Agg. Persons	.33*	-.14	-.07	-.01	-.32*	-.28	-.38*	-.45**
Agg. Property	.33*	-.17	-.11	.04	-.30	-.26	-.39*	-.40**

\*  $p < .05$ . \*\*  $p < .001$ . \*\*\*  $p < .001$ .

Nondelinquent Adolescents

Prosocial Moral Reasoning, Empathy, and Perspective-Taking. Results of the first series of correlations conducted between the six PROM scores, and empathy, and perspective-taking for nondelinquents are presented in Table 7. As illustrated, hedonistic reasoning was significantly negatively related to empathy ( $r = -.44$ ) and to perspective-taking ( $r = -.45$ ). Comparatively, approval-oriented reasoning was significantly negatively related to empathy ( $r = -.36$ ) and to perspective-taking ( $r = -.41$ ). Significant positive relationships were also found between



stereotypic reasoning and empathy ( $r = .41$ ), and among internalized reasoning and both empathy and perspective-taking ( $r = .37$  and  $r = .51$ , respectively). The PROM composite score (PWAS) was also found to be significantly positively related to empathy and perspective-taking ( $r = .45$  and  $r = .53$ , respectively) in the nondelinquent sample. Finally, empathy and perspective-taking were significantly positively related to each other ( $r = .52$ ).

Prosocial Moral Reasoning and the Social Skills Rating System. The second series of correlations, involving prosocial moral reasoning and indices of social behavior as measured by the teacher and student subscales of the SSRS, are presented for nondelinquents in Table 7. As shown, needs-oriented reasoning was found to be significantly negatively related to teacher's perceptions of student self-control ( $r = -.44$ ). In addition, the PWAS was positively related to both teacher rated externalizing behaviors ( $r = .34$ ) and student rated self-control ( $r = .36$ ). No other significant relationships were found.

Prosocial Moral Reasoning and the Self-Reported Delinquency Scale. The third series of correlations examined the relationships between the six PROM scores and the aggression-against-person and aggression-against-property scores of the SRDS-A. As seen in Table 7, no significant relationships were found among these variables in the nondelinquent sample.

Empathy, Perspective-Taking, and the Social Skills Rating System. Of the correlations calculated among empathy, perspective-taking, and the SSRS subscales, only one significant relationship was found for nondelinquent adolescents. Specifically, student rated self-control was found to be positively related to perspective-taking ( $r = .39$ ).

Empathy, Perspective-Taking, and the Self-Reported Delinquency Scale. The final series of correlations involved empathy, perspective-taking, and the aggression-against-persons and aggression-against-property scores of the SRDS-A. As in the delinquent sample, perspective-taking was significantly negatively related to aggression-against-persons ( $r = -.34$ ) and aggression-against-property ( $r = -.41$ ) among nondelinquent adolescents. However, in contrast to the delinquent sample, empathy was found to be only significantly negatively related to aggression-against-property ( $r = -.50$ ) and not to aggression-against-persons.

Table 7.

Correlations Among PROM, Empathy, Perspective-Taking, SSRS, and SRDS-A Subscales for the Nondelinquent Sample

	Prosocial Moral Reasoning						Empathy	Perspective-Taking
	Hedonistic	Needs	Approval	Stereo	Internal	PWAS		
<i>IRI Subscales</i>								
Empathy	-.44**	.09	-.36*	.41**	.37*	.45**	—	
Persp. Taking	-.45**	.22	-.41**	.25	.51**	.53**	.52***	—
<i>Teacher SSRS</i>								
Cooperation	-.08	.01	.14	-.07	.03	.01	.08	.30
Assertion	.03	-.28	.05	.09	.07	-.01	.02	.13
Self-Control	.17	-.44**	.25	.05	-.12	-.22	.07	.22
Academics	-.11	.08	.07	-.06	.07	.06	.09	.20
Externalizing	-.28	.31	-.27	.14	.23	.34*	-.01	-.23
Internalizing	-.02	.28	-.24	-.12	.17	.18	-.04	.07
<i>Student SSRS</i>								
Cooperation	-.02	.14	-.09	-.08	.07	.06	.10	.18
Assertion	-.26	.13	-.23	.08	.31	.28	.28	.13
Self-Control	-.29	.17	-.30	.27	.28	.39*	.06	.39*
<i>SRDS-A</i>								
Agg. Persons	.07	.09	.10	-.15	-.09	-.09	-.21	-.34*
Agg. Property	.29	.13	.12	-.30	-.13	-.23	-.50***	-.41**

\*  $p < .05$ . \*\*  $p < .01$ . \*\*\*  $p < .001$ .

Differences in Prosocial Moral Reasoning, Empathy, and Perspective-Taking  
within Delinquent Subgroups

Delinquency is not a homogeneous grouping. Indeed, several studies have attempted to subclassify juvenile delinquency on the basis of psychological criteria (e.g., Campagna & Harter, 1975; Fodor, 1973; Jurkovic & Prentice, 1977; Lee & Prentice, 1988). Thus, it was of interest in this study to examine whether differences in prosocial moral reasoning, empathy, and perspective-taking would be revealed within the delinquent group. To answer this question delinquent participants were divided into one of four subgroups based on their delinquent behavior scores as measured by the SRDS-A. Specifically, utilizing a mean split procedure, participants were classified into one of four categories, (a) high on aggression-against-person and low on aggression-against-property, (b) low on both aggression-against-person and on aggression-against-property, (c) high on both aggression subscales, or (d) low on aggression-against-persons and high on aggression-against-property (Ellis, 1982; Kantner, 1976). That is, if participants scored above the mean on aggression-against-persons and below the mean on aggression-against-property, they were categorized into the first group. If the scores were below the mean on both types of aggression, they were categorized into the second group. Conversely, if they were above the mean on both types of aggression, they were defined as belonging to group three. Finally, if participants scored below the mean on aggression-against-persons and above the mean on aggression-against-property, they were put into group four. The mean-split analyses of scores revealed that none of the delinquent participants could be categorized into this last group.

After delinquent participants were categorized into one of the three "offense-type" groups, a series of analyses were conducted to examine subgroup differences in terms of prosocial moral reasoning, empathy, and perspective-taking. First, the PROM composite score (PWAS) was examined in a one-way ANOVA, with group status serving as the independent variable. As seen in Table 8, the mean for the subgroup categorized as "low on both" aggression-against-persons and aggression-against-property was higher than the means for the other two groups. However, the differences did not reach statistical significance,  $F(2, 37) = 2.93, p > .05$ .

To more specifically examine group differences in prosocial moral reasoning, a one-way multivariate analysis of variance (MANOVA) was conducted using the five subscales of the PROM as dependent variables (i.e., hedonistic, needs-oriented, approval-oriented, stereotyped, and internalized), and group status as the independent variable (i.e., low on both types of aggression, high aggression-against-persons/low aggression-against-property, high on both types of aggression). Wilks's criterion failed to confirm a significant multivariate effect,  $F(10, 66) = 1.02$ ,  $p > .05$  (see Table 8), and thus, no further analyses were conducted.

Table 8.

Descriptive Statistics for Delinquent Subgroups on PROM Subscales

	Low-Person/Low- Property ( <u>n</u> = 12)	High-Person/Low- Property ( <u>n</u> = 16)	High-Person/High- Property ( <u>n</u> = 12)
PROM Scores	<u>M</u> ( <u>SD</u> )	<u>M</u> ( <u>SD</u> )	<u>M</u> ( <u>SD</u> )
Hedonistic	.18 (.04)	.22 (.04)	.23 (.07)
Needs	.21 (.04)	.21 (.03)	.20 (.04)
Approval	.15 (.04)	.15 (.04)	.14 (.04)
Stereotyped	.22 (.03)	.21 (.02)	.21 (.03)
Internalized	.25 (.03)	.22 (.02)	.22 (.04)
PWAS	1.91 (.07)	1.85 (.06)	1.84 (.12)

Next, an examination of empathy scores across the three subgroups in an one-way ANOVA revealed a significant main effect for group,  $F(2, 37) = 6.17$ ,  $p < .01$ . Tukey follow-up procedures indicated that the subgroup categorized as "high on person and high on property" ( $\bar{M} = 16.92$ ,  $SD = 5.13$ ) scored significantly lower in empathy than the subgroup categorized as "high on person and low on property" ( $\bar{M} = 21.00$ ,  $SD = 4.76$ ). Significant differences also emerged between the subgroup identified as "high on person and high on property" ( $\bar{M} = 16.92$ ,  $SD = 5.13$ ), and the subgroup identified as "low on person and low on property" ( $\bar{M} = 23.42$ ,  $SD =$

3.70), with the former scoring lower in empathy than the latter. No other significant differences were found between subgroups.

A third and final ANOVA examining perspective-taking between the delinquent subgroups also revealed a significant main effect,  $F(2, 37) = 5.13, p < .01$ . However, post hoc analyses revealed only one significant difference. The group categorized as "high on person and high on property" ( $M = 15.50, SD = 4.00$ ) had a lower perspective-taking score than the group categorized as "low on person and low on property" ( $M = 21.50, SD = 4.93$ ).

Table 9.

Descriptive Statistics for Delinquent Subgroups on Empathy and Perspective-Taking

	Low-Person/Low- Property ( $n = 12$ )	High-Person/Low- Property ( $n = 16$ )	High-Person/High- Property ( $n = 12$ )
IRI Subscales	<u>M</u> ( <u>SD</u> )	<u>M</u> ( <u>SD</u> )	<u>M</u> ( <u>SD</u> )
Empathy	23.42 (3.70) <sub>a</sub>	21.00 (4.76) <sub>b</sub>	16.92 (5.13) <sub>ab</sub>
Perspective-Taking	21.50 (4.93) <sub>c</sub>	18.31 (4.74)	15.50 (4.00) <sub>c</sub>

Note. Means with the same subscript are significantly different from one another at  $p < .05$  in the Tukey honestly significant difference comparison.

### Summary of Findings

The results of the present study suggest that delinquents differ from nondelinquents in both their overall prosocial moral reasoning, as measured by the PROM composite score, and in the specific levels of prosocial moral reasoning defined by the five stages (i.e., hedonistic, needs, approval-oriented, stereotyped, and internalized). More specifically, delinquents scored significantly higher in hedonistic reasoning, and significantly lower in internalized reasoning, than their nondelinquent counterparts. The findings also indicate that delinquents function at lower levels of both empathy and perspective-taking than their nondelinquent peers.

The relations of prosocial moral reasoning, empathy, perspective-taking, and social behavior revealed several relationships, many of which were different for the delinquent and nondelinquent groups. In general however, lower levels of prosocial moral reasoning were associated with lower levels of empathy and perspective-taking. The opposite relationship was also found. That is, higher levels of prosocial moral reasoning were associated with higher empathy and perspective-taking. The present study also found that lower levels of prosocial moral reasoning were related to higher levels of antisocial behavior and aggression. In contrast, high prosocial moral reasoning was associated with lower incidents of antisocial behavior and aggression. Finally, it was generally found that higher levels of empathy and perspective-taking were associated with lower levels of antisocial behavior and aggression, while greater empathy and perspective-taking were related to lower levels of antisocial behavior and aggression.

With respect to delinquent subgroup differences, the results suggest the utility of employing a heterogeneous classification of delinquents by revealing some significant group differences. Specifically, the delinquent subgroup categorized as high on aggression-against-person and low on aggression-against-property scored significantly higher in empathy than the subgroup categorized as high on both types of aggression. Further, the subgroup identified as low on both types of aggression scored significantly higher in empathy than the subgroup identified as high on both types of aggression. In terms of perspective-taking, the low on both group scored higher than the group identified as high on both types of aggression. No other significant differences were found.

## CHAPTER V

### Discussion

This chapter will discuss the findings of the present study in five sections. First, differences in prosocial moral reasoning, empathy, and perspective-taking between delinquent and nondelinquent adolescents will be discussed. Next, there will be a discussion of the relations of prosocial moral reasoning, empathy, and perspective-taking to indices of social behavior as obtained through teacher and self-reports. This will be followed by a discussion of differences in prosocial moral reasoning, empathy, and perspective-taking within delinquent subgroups. Finally, this chapter will conclude with a consideration of the strengths and limitations of the study, as well as implications for further research.

#### Prosocial Moral Reasoning, Empathy, and Perspective-Taking in Atypical Populations

Two of the central questions in this study were whether delinquent groups would differ in both their levels of prosocial moral reasoning and their levels of empathy and perspective-taking when compared to their nondelinquent peers. Overall, the answer to these questions was yes. That is, the delinquent adolescents in the present study were found to function at lower levels of prosocial moral reasoning, empathy, and perspective-taking than a group of matched nondelinquent adolescents. These findings and their implications will be discussed in greater detail in the following sections.

#### Group Differences in Prosocial Moral Reasoning

Recall from Chapters 1 and 2 that, compared to the more prevalently examined prohibition-oriented realm of moral reasoning (e.g., Campagna & Harter, 1975; Chandler & Moran, 1990; Jurkovic & Prentice, 1974; Lee & Prentice, 1988; McColgan et al., 1983; Trevethan & Walker, 1989), prosocial moral reasoning is a relatively recent area of study, the understanding of which is dependent upon a handful of investigations (e.g., Eisenberg et al., 1995; Eisenberg et al., 1983; Eisenberg et al., 1991; Eisenberg et al., 1987; Eisenberg-Berg, 1979; Eisenberg-Berg & Roth,

1980). Indeed, the development of prosocial moral judgment in deviant groups, such as juvenile delinquents, has been completely overlooked in the research. It was therefore the aim of the present study to redress this issue by investigating the prosocial moral reasoning of delinquent adolescents in order to provide a more comprehensive portrayal of the atypical moral landscape than that provided by previous research.

A plethora of research studies exist that suggest that delinquent and disturbed populations function at developmentally delayed levels of prohibition-oriented moral reasoning (e.g., Campagna & Harter, 1975; Chandler & Moran, 1990; Jurkovic & Prentice, 1974; Lee & Prentice, 1988; McColgan et al., 1983; Trevethan & Walker, 1989; for reviews see Blasi 1980; Smetana, 1990). The findings of the present investigation provide some evidence that, similar to prohibition-oriented moral reasoning, delinquent adolescents also exhibit more immature forms of prosocial moral judgment as compared to their nondelinquent peers.

Both Eisenberg's (1986) theory of prosocial moral reasoning and Kohlberg's (1976) model of moral judgment agree that development is limited partly by an individual's level of cognitive development. In both theories of moral reasoning, stage development depends on the assumption that certain levels of cognitive understanding must be realized for moral development to occur. As succinctly noted by Eisenberg (1986), an individual's level of cognitive development appears to limit the range of potential levels of moral reasoning available to the individual for use. If this is indeed true, then it is possible that the delinquent adolescents in the present study lacked the requisite stage of cognitive development necessary for more advanced prosocial moral reasoning.

Although cognitive development was not directly examined in the present study, results of verbal ability as measured by the Quick Word Test (Borgatta & Corsini, 1960) revealed no significant differences between the delinquent and nondelinquent groups. If one assumes that verbal ability is a proxy for overall intelligence, these findings give some support for the notion that the groups are functioning at similar levels of cognitive development. Moreover, previous research suggests that delinquent and disturbed youth do not experience delays in their abilities to attain age-appropriate levels of cognitive growth (Sigman et al., 1983; Selman, 1977). To a much greater extent, disturbed youth experience delays in the interpersonal and moral realm of



development as compared to their non-disturbed peers (Selman, 1977). If such is the case among delinquent participants in the present investigation, then some other explanation for their prosocial moral reasoning deficiencies is called for.

Eisenberg's (1986) theory of prosocial moral reasoning posits that, in addition to the requisite level of cognitive development, an individual's moral reasoning is influenced by personal values and personality characteristics, which in turn are based in part on the individual's socialization history. Socialization variables that effect children's prosocial moral reasoning include the quality of the parent-child relationship, parental modeling of prosocial behaviors, verbal preachings (such as instructions to help another), and methods of discipline (Eisenberg, 1986; Eisenberg, 1992; Radke-Yarrow, Zahn-Waxler, & Chapman, 1983; Zahn-Waxler, Radke-Yarrow, & King, 1979). Research has found that a warm and nurturing parent-child relationship, combined with effective modeling of prosocial action, verbal preachings of giving aid to others, and disciplinary techniques such as reinforcement and inductive reasoning, foster personal values and "personality" traits which support prosocial reasoning and behaviors in children (Eisenberg, 1986; Eisenberg, 1992). These personal values and traits may include a higher degree of positive valuing of other people, a high level of self-esteem, and a lower level of self-concern, all of which influence an individual's needs, preferences, and goals (Eisenberg, 1986). Consider for instance that an individual concerned with the social appearances and the approval of others would tend to use an approval-oriented stage of prosocial moral reasoning. Alternatively, a self-focused individual concerned with deriving gains for the self would tend to use a hedonistic level of reasoning (Eisenberg, 1986).

Thus, although an individual's level of prosocial moral reasoning is limited by factors such as cognitive development, "performance within one's sphere of competence is believed to be a function, in part, of individual differences on a variety of personal variables" (Eisenberg, 1986, p. 186). Although socialization variables and personality factors were not directly examined in the present study, research suggests that the family and socialization histories of delinquent youth are often less than optimal in providing opportunities for the development of positive self-esteem, the valuing of other people, or prosocial responding (Cohen & Strayer, 1996; Fodor, 1973; Gove &

Crutchfield, 1982). Indeed, delinquent youth are frequently exposed to family experiences such as one-parent homes, marital discord, lack of parental control or supervision, ineffectual parent behavior (e.g., alcoholism and/or drug abuse, harsh physical punishment, neglect) and poor parent-child relationships (Farrington, 1978; Gove & Crutchfield, 1982). The literature clearly indicates that these factors are integrally related to delinquency (Gove & Crutchfield, 1982). Thus, it is possible that the deficits in prosocial moral reasoning evidenced by the delinquent group in this study were a result of socialization histories that failed to encourage personal traits and values conducive to the development of high levels of prosocial moral reasoning.

Despite the importance of both cognitive development and personal characteristics, Eisenberg (1986) stresses the significance of another influence on an individual's prosocial moral reasoning -- that of the context. Examples of variables in the context that may influence prosocial development include the cost of helping another, characteristics of the potential recipient, and the potential benefits for helping. Moreover, there is clearly an interaction between the factors of context and personal characteristics. Thus, for a delinquent whose socialization history has likely encouraged the development of self-focused personal values and traits, contexts which are interpreted as involving few potential benefits at a great personal cost will support lower levels of prosocial reasoning and responding.

Because the research on the role of context in prosocial moral development is scarce, studies that have examined the role of context in facilitating or impeding prohibition-oriented moral reasoning may provide some useful insights. Some research has suggested that environmental contexts with better moral climates contribute to improvements in both prohibition-oriented moral reasoning (e.g., Schonert & Cantor, 1991) and behavior (e.g., Taylor & Walker, 1997). Further, research has found that contexts that provide exposure to prohibition-oriented moral levels higher than one's own produce cognitive conflict, and hence, moral development (Turiel, 1966; Walker, 1983). Finally, research has demonstrated that both empathy and perspective-taking skills develop in contexts that provide through meaningful social experiences and interactions with others (Kohlberg, 1969), which in turn facilitate the development of moral reasoning. Thus, it is entirely possible that the delinquent institution in the present study represented an environmental context

with a poor moral climate, where advanced levels of prosocial moral reasoning were not encouraged or facilitated. For example, delinquents may have only interacted with peers at the same level of prosocial moral reasoning, thereby limiting opportunities for differing perspectives that encourage cognitive conflict. Such an environment may not have been conducive to the development of meaningful social experiences or interactions with others that encourage the enhancement of empathy or perspective-taking skills.

Given these influences on prosocial moral reasoning, one can envision a delinquent whose socialization history and environmental experiences have combined to produce an egoistic and avaricious personality type who behaves prosocially only in situations that provide greater benefits than costs. Accordingly, it should come as no surprise that the present study also revealed that delinquent and nondelinquents significantly differed in hedonistic reasoning and internalized reasoning, the lowest and highest levels of prosocial moral reasoning identified by researchers (Eisenberg et al., 1995; Eisenberg et al., 1983; Eisenberg et al., 1991; Eisenberg et al., 1987; Eisenberg-Berg, 1979; Eisenberg-Berg & Roth, 1980). Specifically, delinquents scored higher on hedonistic reasoning than nondelinquents, and lower on internalized reasoning than nondelinquents. Hedonistic reasoning is considered to be reflective of self-focused and egoistic concerns, the least developmentally mature type of prosocial moral judgment, dominant in the reasoning of preschool and elementary aged school children (Eisenberg, 1986). In contrast, internalized reasoning reflects a concern with abstract ethical principles and the imperatives of conscience. This stage of prosocial moral judgment is the most developmentally advanced, predominating in late adolescence and early adulthood in normative samples (Eisenberg, 1986). Given that delinquents typically function at the most primitive and developmentally immature stages of prohibition-oriented moral reasoning -- namely, Stages 1 and 2 (Blasi, 1980; Campagna & Harter, 1975; Fodor, 1973; Gibbs, 1987; Jurkovic & Prentice, 1977), and considering the influences on the development of prosocial moral reasoning as previously discussed, it is not surprising that the results of this study revealed significant differences in the least and most developmentally advanced levels of prosocial judgment.

Overall, these results extend prior research by contributing new and valuable information regarding the prosocial moral judgment of deviant groups, particularly given the paucity of studies examining this construct in disturbed and delinquent populations. Such information can aid in the discovery of deviations from the normal developmental trajectory and provide important information for the design and implementation of effective interventions.

#### Group Differences in Empathy and Perspective-Taking

The findings of the present study lend support to previous research that has found group differences in social role-taking, defined in the present study as empathy and perspective-taking. Specifically, the current findings indicate that delinquent adolescents differ significantly from their nondelinquent peers in both empathy and perspective-taking. To date, research results regarding empathy in delinquent groups have been equivocal. That is, while some investigations support the contention that juvenile delinquents function at delayed levels of empathy compared to their nondelinquent peers (Chandler, 1973; Cohen & Strayer, 1996; Ellis, 1982; Kaplan and Arbuthnot, 1985; Miller & Eisenberg, 1988), other studies have failed to find differences in empathy between delinquent and nondelinquent groups (e.g., Chandler & Moran, 1990; Lee & Prentice, 1988; Waterman et al., 1981). Cohen and Strayer (1996) have argued that the presence of inconsistent findings across studies appear to be dependent upon the numerable ways empathy has been operationalized (i.e., as an affective or cognitive construct), and the variety of measures employed to assess empathy (e.g., self-report questionnaires versus facial expressions). In the present study, the Interpersonal Reactivity Index (1983) was used to operationalize and assess empathy. This measure has been found to be a reliable and valid measure of both the affective and cognitive component of social role-taking in normal (e.g., Eisenberg et al., 1995; Eisenberg et al., 1991) and deviant populations (e.g., Cohen & Strayer, 1996). Thus, the findings of the present investigation provide support for the IRI as one of the more sensitive empathy measures for discriminating between delinquents and nondelinquents.

Disturbed children and youth, such as juvenile delinquents, are frequently characterized by their antisocial egocentrism, their lack of concern for the feelings of others, and their superficial empathy (Gibbs, 1987; Schonert-Reichl, 1994). Perhaps not surprisingly, some research has

shown that similar factors are responsible for the development of both empathy and prosocial moral reasoning, namely, socialization variables. According to various researchers (e.g., Eisenberg, Fabes, Carlo, & Karbon, 1992; Gibbs, 1987; Hoffman, 1982), there are a number of ways in which socialization agents influence emotional responding. First, children's empathic skills develop through modeling the emotions of others (Eisenberg et al., 1992; Radke-Yarrow et al., 1983; Zahn-Waxler et al., 1979). Socializers<sup>3</sup> who readily exhibit emotion and regularly react to the expression of emotion tend to influence their children's ability to accurately decode emotion. Second, the ways in which families deal with the expression of emotion, such as a socializers' willingness to discuss feelings, seems to relate to children's awareness of the emotional states of others (Dunn, Bretherton, & Munn, 1987). For example, boys whose parents teach them to deal with negative emotions and situations are less likely to experience vicariously induced negative emotion and more likely to experience sympathy (Eisenberg, 1993; Eisenberg et al., 1992). In contrast, children raised by parents who restrict the expression of emotion are more likely to experience personal distress and concern for the self (Eisenberg et al., 1992). Considering that characteristics inherent in families of delinquent youth are not conducive to the modeling, expression, and discussion of empathic emotions (e.g., marital discord, abusive/neglectful parenting, poor parent-child relationships), it is not surprising that delinquent adolescents fail to develop adequate empathic abilities.

Finally, socialization may effect whether or not children tend to focus on others' needs or on their own in situations involving vicarious emotion. Verbal messages that parents provide, such as inductions that make children aware of the consequences of their behavior, help children to focus on the feelings and emotions of others (Eisenberg et al., 1992). When socializers do not explain to their children why their transgressions are wrong, children fail to develop a sense of anyone's feelings or perspectives other than their own. Moreover, if disciplinary tactics are employed that involve harsh, arbitrary power assertions, as is frequently the case in delinquent

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<sup>3</sup> It is frequently the case that juvenile delinquents are raised by adults other than their natural parents (Riffel & Ozgood, 1992). Thus, the term "socializers" will be used loosely to apply any adult or guardian responsible for the welfare of a child (e.g., parents, foster families, siblings, extended relatives).

families (Gove & Crutchfield, 1982), children tend to develop a sense of displaced anger and antagonism (Gibbs, 1987). These factors combine to produce a child who has not been directed to attend to others' distress or to their role in causing such distress. Hence, "their empathy remains [an] undeveloped matter of isolated impulses or sentiments that are superficial and erratic..." (Gibbs, 1987, p. 308).

When a child from a socialization background as just described approaches peer situations, the matter is only worsened. The child's anger displacement, confrontational approach, and inability to respond to others prosocially preclude opportunities to perspective-take in peer interactions (Gibbs, 1987). Recall from Chapter 1 that, according to both Eisenberg et al. (1991) and Kohlberg (1976), certain conditions are needed to stimulate socio-cognitive and moral growth, one of which is exposure to perspective-taking opportunities. One of the primary prerequisites for the development of perspective-taking abilities is participation in a group -- and in particular, a peer group (Kohlberg, 1969). Moreover, for a child who has not been afforded adequate opportunities at home, peer interactions are especially critical (Gibbs, 1987). However, research has frequently demonstrated that delinquent adolescents lack the social cognitive abilities necessary for developing and maintaining the relationships necessary for successful peer group interactions (Gibbs, Arnold, Ahlborn, & Cheesman, 1984; Waterman et al., 1981). Certainly, such adolescents often manifest disruptive and inappropriate behavior, which tends to discourage the development and maintenance of meaningful friendships. As a result, delinquent youth are often deprived of essential peer experiences -- which may have compensated for inadequate opportunities at home -- necessary for the development of perspective-taking abilities (Gibbs, 1987; Schonert, 1989). In sum, it is possible that the low empathy and perspective-taking scores exhibited by the delinquents in the present investigation are a result of adverse family backgrounds along with poor peer relationships, both experiences which engendered fewer perspective-taking opportunities than that available to typical adolescents.

### Summary

It should have become apparent by this point that prosocial moral reasoning, empathy, and perspective-taking are inextricably linked in Eisenberg's (1982, 1986, 1990) theory of prosocial development. That is, specific socialization variables, including parental modeling, verbal preachings, and disciplinary tactics play significant roles in the development of prosocial and empathic responding. Indeed, it has been noted that empathy-related processes seem to emerge earlier and are particularly common in prosocial moral reasoning (Eisenberg, 1993; Eisenberg-Berg, 1979), suggesting that empathy plays a larger role in prosocial moral judgment than in prohibition-oriented moral reasoning. It can certainly be argued that empathy and perspective-taking constitute critical components of the personal traits and values that influence an individual's level of prosocial responding. For example, it is entirely possible that a nurturing parent-child relationship that combines prosocial verbal preachings and inductive disciplinary techniques initially fosters empathy and perspective-taking, which consequently lead to higher degrees of positive valuing of other people and a lower levels of self-concern. Considering the apparent relationship between prosocial moral reasoning and empathic responding, and given the plethora of research findings that delinquent adolescents are characterized by deficiencies in prohibition-oriented moral reasoning and related competencies (e.g., Blasi 1980; Jurkovic & Prentice, 1974; Lee & Prentice, 1988; Smetana, 1990; Trevethan & Walker, 1989), it is not surprising that delinquent participants in the present study exhibited deficiencies in their levels of prosocial moral reasoning, empathy, and perspective-taking skills. A more thorough discussion of the nature of the relationships among these variables and prosocial and antisocial behaviors will be discussed in the following section.

Relations Among Prosocial Moral Reasoning, Empathy, Perspective-Taking  
and Social Behavior in Typical and Atypical Populations

Another question addressed in the study was in regards to the nature of the relationships among prosocial moral reasoning, empathy, perspective-taking, and social behavior as measured by teacher- and self-reports. Several revealing relationships were found, many of which are in accord with findings of previous research. These will be discussed in greater detail below.

Prosocial Moral Reasoning in Relation to Empathy and Perspective-Taking

With respect to the delinquent sample in the present study, only one significant relationship was found between prosocial moral reasoning, and empathy and perspective-taking -- that of a negative association between hedonistic prosocial moral reasoning and empathy. Given the self-focused and egoistic concerns associated with hedonistic reasoning (Eisenberg, 1986; Eisenberg, 1992; Eisenberg et al., 1987), a negative relationship might be expected among delinquent youth who, according to this research, tend to operate at delayed levels of empathy. Nevertheless, it remains unclear as to why the remaining correlations between prosocial moral reasoning and empathy, and between prosocial moral reasoning and perspective-taking did not reach statistical significance in the delinquent sample. Although one might hypothesize that the correlations were not significant due to a restricted range in the delinquent sample of moral reasoning, empathy, and perspective-taking scores, a close examination of the scatterplots and standard deviations reveal this to not be the case. As indicated in both Tables 4 and 5, the range and variability of prosocial moral reasoning, empathy, and perspective-taking scores among the delinquent group are comparable to those found in the nondelinquent group.

Thus, it appears that neither a restricted range nor differences in variability are responsible for the absence of significant relationships. Clearly, the manner in which prosocial moral reasoning interacts with empathic responding and perspective-taking is complex. Perhaps there is some variable not measured in this study relevant in the lives of delinquents that is responsible for moderating the relationships. For example, as has been repeatedly noted, the importance of socialization factors cannot be overlooked as influences on the nature of the relationships among prosocial moral reasoning, empathy, and perspective-taking. It is highly possible that family



socialization practices did not encourage the development of higher level moral judgment, perspective-taking skills, or empathic responding in the delinquent sample. This may have influenced the relationships evidenced in the present study.

However, for the nondelinquent youth in the present study, the relationships found among prosocial moral reasoning, empathy, and perspective-taking are consistent with results demonstrated by Eisenberg et al.'s (1995) research on normal adolescents. In the present investigation, both hedonistic reasoning and approval-oriented reasoning were found to be significantly negatively related to empathy. Hedonistic and approval-oriented reasoning were also found to be significantly negatively related to perspective-taking. Significant positive relationships were found between stereotypic reasoning and empathy, between internalized reasoning and empathy, and between internalized reasoning and perspective-taking. Finally, the present study revealed the PROM composite score to be significantly positively related to both empathy and perspective-taking. In Eisenberg et al.'s investigation, significant negative relationships were found between hedonistic reasoning and empathy, between hedonistic reasoning and perspective-taking, and between approval-oriented reasoning and perspective-taking. Conversely, Eisenberg et al. found positive relationships between stereotypic reasoning and empathy, between internalized reasoning and empathy, and between the PROM composite score and empathy. These same positive relationships were found for perspective-taking. Thus, the results regarding nondelinquents in this study replicate Eisenberg et al.'s findings almost exactly. The only exception being a significant negative relationship found between approval-oriented reasoning and empathy in the present investigation. Nevertheless, Eisenberg et al. did find a similar negative relationship, although it did not reach statistical significance.

In summary, different relations of prosocial moral reasoning, empathy, and perspective-taking reached significance for the delinquent and nondelinquent groups in the present study. With respect to the delinquent sample, this study provided new information on the association of prosocial moral reasoning to empathy and perspective-taking that was previously unknown, given that no research has examined prosocial moral reasoning in deviant groups. In regard to the

nondelinquent sample, this study's findings provide support for previous research findings on prosocial moral reasoning, empathy, and perspective-taking in normal populations.

#### Prosocial Moral Reasoning in Relation to Social Behavior

It was also of interest in this study to examine the nature of the relationship between prosocial moral reasoning and social behavior. Recall that the teacher report and student self-report forms of the Social Skills Rating Scale (Gresham & Elliot, 1990) were utilized as one of the measures of social behavior in the present study.

In the delinquent sample, hedonistic reasoning was found to be positively correlated with externalizing social behaviors as reported by teachers. These findings are in concert with results demonstrated by Bear and Rys (1994) who examined moral reasoning and externalizing behaviors in elementary school children. Specifically, Bear and Rys found that hedonistic reasoning was associated with a lack of social competencies and the presence of acting-out behaviors in the classroom as rated by teachers. Moreover, previous research has found that the egoistic and self-centered focus of hedonistic reasoning produces a general insensitivity to the impact of one's behavior on others (Miller & Eisenberg, 1988). Thus, it is not surprising to find an association between hedonistic reasoning and externalizing behaviors in the delinquent group, given the finding in the present study that these youth have high levels of hedonistic prosocial moral reasoning.

Also found among the delinquent group were positive associations between approval-oriented reasoning and internalizing behaviors, and between stereotypic reasoning and internalizing behaviors. Recall from Chapter 3 that internalizing problems in this study refer to behaviors indicative of anxiety, depression, and poor self-esteem. The results revealed in the present investigation are in concert with previous research that has found higher levels of developmental maturity associated with greater levels of internalized psychopathology (Noam, 1992; Thoma & Ladewig, 1997). Specifically, in their study of moral judgment development and adjustment in late adolescence, Thoma and Ladewig found higher levels of moral reasoning associated with higher levels of depressive affect. Moreover, Noam, Kilburn, and Ammen-Elkins (1989) found, in their study on the socio-cognitive development of adolescents with internalizing problems, that

adolescents who functioned at higher “conformist” levels of social cognition had consistently higher levels of depression than did adolescents who functioned at more immature “pre-conformist” levels of social cognition. Given that both stereotyped and approval-oriented levels of prosocial moral reasoning are concerned with “conforming” to stereotyped ideals and the expectations of others, it is not surprising to find an association between these levels of prosocial moral reasoning and higher levels of internalizing problems.

A final relationship found among the delinquent sample in the present study concerned a negative association between hedonistic reasoning and perceived self-control as reported by the delinquents themselves. Recall from Chapter 3 that self-control refers to behaviors that emerge in both conflict (e.g., controlling temper, responding appropriately to teasing) and non-conflict situations (e.g., compromising, accepting ideas from peers). In consideration of the meanings behind hedonistic reasoning and self-control, these results appear to make some sense. That is, an adolescent functioning at the lowest, most primitive, and most egocentric level of prosocial moral reasoning may also be expected to lack the self-control necessary for resisting self-concerned behaviors and for responding to others in a self-controlled and appropriate manner. These findings are supported by research demonstrating a significant negative association between moral reasoning and peer-nominated antisocial behaviors (e.g., inappropriate responses to teasing) in a sample of normal adolescents (Schonert-Reichl, 1996). Moreover, Bear and Rys (1994) found, in their study of normal elementary school children, that hedonistic reasoning was negatively related to social competency, which included a measure of frustration tolerance (e.g., controlling temper, accepting teasing, accepting imposed limits) similar to the measure of self-control in the present study.

With regard to the nondelinquent sample, a significant negative association was found between needs-oriented reasoning and teachers’ perceptions of student self-control. Needs-oriented reasoning represents a concern for the physical, material, and psychological needs of others with little evidence of self-reflective role taking, sympathy, or internalized affect (Eisenberg, 1986). This stage of prosocial responding is most common among elementary-aged school children and is seen very infrequently among adolescents. Thus, adolescents functioning at this

stage of prosocial moral reasoning would not be demonstrating age-appropriate levels of reasoning. In consideration, it makes sense that self-control was negatively related to this primitive form of prosocial moral reasoning among a sample of normal adolescents. That is, perhaps students who demonstrate a preponderance of needs-oriented reasoning appear more immature than their peers who exhibit age-appropriate prosocial responding (i.e., stereotyped and approval-oriented reasoning). As a result, these youth are viewed more critically by their teachers in terms of having little self-control over their behaviors, and hence, are rated more poorly.

Also among the nondelinquent sample, the prosocial moral reasoning composite score (PWAS) was found to be positively related to student-rated self-control. This finding was expected, given that high prosocial moral reasoning should be associated with the ability to control negative impulses (such as the expression of anger or aggression). However, an unusual finding was the significant positive relationship found between the PROM composite score and teachers' ratings of externalizing behaviors among the nondelinquent sample. This finding was surprising because one would not expect high moral reasoners to display externalizing behaviors in the classroom (Bear, 1989). However, it may be the case that students with high prosocial moral reasoning are also more sophisticated and intelligent, and therefore question their teachers more often, or become bored or frustrated easily. Consequently, these students are disruptive and rated by their teachers as behaving more poorly. Indeed, some research supports this contention. In a study on the influence of children's temperament on teacher behavior, Pullis and Cadwell (1982) found an association between children's intelligence, their academic performance, and their tendency to act-out and become overly upset when frustrated. That is, those children with high intelligence were more likely to act-out and become frustrated than those children with average or low intelligence. Perhaps future research should consider differentiating between behaviors that teachers consider challenging and "attention seeking" from behaviors that are designed to be disruptive, aggressive, and destructive.

In sum then, this study found relationships between prosocial moral reasoning and social behavior, although many of these relationships were different for delinquent and nondelinquent groups. In the delinquent sample, hedonistic reasoning was negatively associated with both

teacher-rated externalizing behaviors and student-rated self-control. Also among delinquents, both stereotyped and approval-oriented reasoning were positively associated with teacher-rated internalizing behaviors. Yet, in the nondelinquent sample, needs-oriented reasoning was negatively related to teacher-rated self-control, and the PWAS was positively related to student-rated self-control. Obviously, the nature of the relationships between these variables are different for delinquent and nondelinquent adolescents. Perhaps different variables influence how delinquents rate themselves in terms their own social skills and behaviors and how they are rated by their teachers as compared to their nondelinquent peers. It is also possible that delinquent adolescents conceptualized their social behaviors differently than did nondelinquent youth as a result of different social experiences or other variables not measured in the current investigation.

#### Prosocial Moral Reasoning in Relation to Delinquent Behavior

Recall that the aggression scales of the Self-Reported Delinquency Scale (Arnold, 1965) were utilized as the measures of delinquent behavior in the present study. With respect to the delinquent sample, the findings of the present investigation revealed a positive relationship between hedonistic reasoning and aggression-against-persons, and between hedonistic reasoning and aggression-against-property. As previously discussed, hedonistic reasoners are primarily self-focused and concerned with direct gain to the self (Eisenberg, 1986). As well, hedonistic reasoning produces a general insensitivity to the impact of one's behavior on others (Miller & Eisenberg, 1988). In consideration, it should come as no surprise to find a hedonistic reasoner engaging in acts of aggression against other people or against property, especially if the aggressive behavior is self-promoting and beneficial to the actor. In other words, hedonistic reasoners are concerned primarily with satisfying the self. If satisfying the self necessitates having to behave antisocially and aggressively to achieve set goals, than that is how hedonistic reasoners will behave.

Also in the delinquent sample, the highest level of prosocial moral reasoning -- internalized -- was found to be negatively related to aggression-against-persons. According to Eisenberg (1986) internalized reasoners adopt the belief in the dignity, rights, and equality of all individuals. They are concerned with maintaining individual and societal obligations and improving the

condition of society. Thus, it is possible that the very nature of internalized reasoning is responsible for inhibiting acts of aggression against others.

With respect to the nondelinquent sample, no significant relationships were found between prosocial moral reasoning and either aggression-against-persons or aggression-against-property. The absence of significant findings may be due to the infrequent incidents of either types of aggression reported by nondelinquent youth. Indeed, an examination of the scatterplots and standard deviations revealed this to be the case. The range of scores for aggression-against-persons in the nondelinquent group was from 0 to 21 ( $SD = 5.03$ ), while the range for aggression-against-property was from 0 to 20 ( $SD = 4.76$ ). In contrast, the range for aggression-against-persons in the delinquent sample was from 4 to 50 ( $SD = 13.43$ ), and for aggression-against-property from 1 to 52 ( $SD = 13.86$ ). Thus, it appears that both a restricted range, and differences in the variability of aggression scores, may be somewhat responsible for the absence of significant relationships in the nondelinquent sample.

Overall, this study found relationships between prosocial moral reasoning and aggression, but only in the delinquent sample. The absence of findings in the nondelinquent group appear to be due, in part, to a restricted range and variability. In any case, the significant findings among delinquent adolescents appear to suggest the need for facilitating prosocial moral reasoning in an effort to decrease the frequency of antisocial behaviors against both persons and property.

#### Empathy and Perspective-Taking in Relation to Social Behavior

The associations found in the current study between empathy and social behavior, and between perspective-taking and social behavior, are in concert with both theoretical and empirical research (Eisenberg et al., 1995; Eisenberg et al., 1991; Eisenberg & Miller, 1987). Specifically, with respect to student-rated behaviors in the delinquent sample, the present study found that empathy was positively related to both self-control and cooperation. A positive association was also found between perspective-taking and self-control, and between perspective-taking and cooperation. These results are in accord with a meta-analysis of the literature, which has examined the relation of empathy to prosocial and related behaviors in normative samples, and has found positive associations between empathy and indices of interpersonal competence and cooperative

behavior (Eisenberg & Miller, 1987). Perhaps the findings of the present study can be taken as an indication of the role both empathy and perspective-taking play in influencing delinquents' cooperative prosocial behavior and ability to control negative impulses.

With respect to the teacher-rated behaviors in the delinquent sample, this study failed to reveal significant findings between empathy and social behavior, or between perspective-taking and social behavior. This suggests that perhaps the delinquent participants rated their own levels of cooperation and self-control significantly higher than that expressed in their classroom behaviors, and therefore recognized by their teachers. Three explanations seem possible for these findings. Perhaps the students themselves had a more detailed understanding of their own behavior than their teachers were able to report in the context of the classroom. Alternatively, it could be that the terms cooperation and self-control were conceptualized differently for delinquents than for their teachers. Finally, it is possible that the delinquents rated themselves highly on cooperation and self-control during the administration of the measures in this study because it was socially desirable to be viewed as such by the researcher.

With respect to student-rated behaviors in the nondelinquent sample, the present study found only one significant relationship. Specifically, perspective-taking was positively related to student-rated self-control. This finding is in accord with prior research that has found higher levels of perspective-taking associated with greater social competencies and adequate adjustment in normal populations (Kohlberg et al., 1972; Selman, 1971; Waterman et al., 1981). Because self-control contributes to social competence and adjustment via age-appropriate behavior (e.g., controlling temper, responding appropriately to teasing, compromising with peers), it makes sense who are more socially competent and adjusted would display higher levels of perspective-taking.

In consideration of the teacher-rated behaviors in the nondelinquent sample, the relations of empathy and perspective-taking to teacher-rated social behaviors failed to reach significance. Recall that similar findings were demonstrated in the delinquent sample. Again, perhaps teachers in the nondelinquent sample had a different understanding of the terms that did their students. It is also possible that the nondelinquent students themselves had a more detailed understanding of their

own behavior (i.e., self-control) than their teachers were able to report in the context of the classroom.

In sum then, this study found that different relationships reached significance in the delinquent and nondelinquent groups with respect to empathy, perspective-taking, and student-rated behaviors. Why did different relationships reach significance for the delinquent and nondelinquent groups? Clearly, the nature of associations among empathy, perspective-taking, and indices of social behavior are different for delinquent and nondelinquent youth. Perhaps these delinquent and nondelinquent adolescents conceptualized the terms in the measures differently on the basis of their life experiences. That is, perhaps adolescents' understanding of the terms were moderated by variables not measured in the current study, such as family histories or peer relationships.

Further, both the delinquent and nondelinquent groups failed to find significant relations of empathy, perspective-taking, and teacher-rated social behaviors. It may be that this difference is due to students having a more detailed understanding of their own behaviors than their teachers did, and thus, were able to report on in the classroom context. It was also considered that perhaps teachers and students had different understandings of the terms utilized in this study to identify social behaviors.

#### Empathy and Perspective-Taking in Relation to Delinquent Behavior

Recall that aggression-against-person and aggression-against-property were operationalized as delinquent behavior in the present study. The findings of the present study revealed a significant negative relationship between empathy and both aggression-against-persons and aggression-against-property in the delinquent group. Perspective-taking was also found to be significantly negatively related to both types of aggression in the delinquent sample. The findings of the present study are in accord with results demonstrated by Cohen and Strayer (1996) in a conduct disordered sample. In their study, adolescents with higher scores on maladjustment and aggression scored significantly lower in both empathy and perspective-taking than participants who did not score high on maladjustment and aggression.



Similar correlations were found among the nondelinquent sample in the present study. Specifically, empathy was found to be negatively related to aggression-against property while perspective-taking was negatively related to both aggression-against-persons and aggression-against-property. Although no association was found for empathy and aggression-against-persons in the nondelinquent sample, the relationship was in the expected negative direction.

Overall, the associations found between empathy and both types of aggression, and perspective-taking and both types of aggression seem to suggest that lower empathy and perspective-taking are associated with greater tendencies toward aggression in youth (Cohen & Strayer, 1996; Gibbs, 1987). Further, these results are in accord with a meta-analysis on the relation of empathy to aggressive and externalizing/antisocial behaviors (Miller & Eisenberg, 1988), which found that high empathy and perspective-taking abilities are related to fewer incidents of aggression. A more thorough discussion of empathy, perspective-taking, and incidents of aggression will be discussed in the following section.

#### Prosocial Moral Reasoning, Empathy, and Perspective-Taking within Delinquent Subgroups

The final question addressed in this study was whether delinquent subgroups would differ in their levels of prosocial moral reasoning, empathy, and perspective-taking. As discussed in greater detail in Chapter 4, the delinquent sample was subdivided into three groups on the basis of the frequency of committing either aggressive crimes against people or crimes against property. Participants were categorized as either (a) high on aggression-against-person and low on aggression-against-property, (b) low on both aggression-against-person and on aggression-against-property, or (c) high on both aggression subscales.

Recall from the discussion of prosocial moral reasoning, empathy, and perspective-taking in the first section of this chapter that children at risk for delinquency are those who have experienced harsh, arbitrary power assertion, little inductive discipline, and no role-taking opportunities at home or at school (Gibbs, 1987). Such factors lead to displaced anger and a defensive perception of others as would-be obstructers of desires and wishes. Such a perception

readily leads to a rationalizing tendency to view others in derogatory terms and thereby deserving of victimization (Gibbs, 1987). It was noted in the previous section that the results of the present study are in concert with prior research that has found associations between lower empathy and perspective-taking and aggressive impulses in adolescence (Cohen & Strayer, 1996; Gibbs, 1987). However, the present study extends prior research on prosocial moral reasoning, empathy, and perspective-taking by exploring differences within delinquent subgroups.

First, with respect to prosocial moral reasoning as measured by the PROM composite score, no significant subgroup differences were found, although the relationship was in the expected direction. However, the lack of significant findings may be due to small sample sizes in each of the three groups. Clearly, the manner in which prosocial moral reasoning is associated with aggressive behavior among delinquents is complex. If the intricacies of this complicated construct are to be more fully understood, more research is undoubtedly needed that examines prosocial moral among heterogeneous delinquent groupings.

Nevertheless, the findings of the present study do provide support for a significant association between empathy and aggression. Specifically, this study found that delinquents who were rated as scoring high on both types of aggression (i.e., aggression-against-persons and aggression-against-property) scored significantly lower in empathy than the remaining two groups. Further, the group identified as scoring low on both types of aggression had higher empathy scores than the group identified as scoring high on both types of aggression. Cohen and Strayer (1996) found similar results in their study on the comparison of empathy in conduct-disordered and normal youth. Specifically, they found that both conduct-disordered and normal youth who scored high on social maladjustment and aggression scored significantly lower in empathy. Alexsic (1976), in his study on the ability of empathy to inhibit aggression in delinquent youth, also found that aggressive delinquent adolescents scored lower on empathy than did non-aggressive delinquents. Finally, in a study of empathy in delinquent subgroups, Ellis (1982) found that aggressive-against-person delinquents scored lower on empathy than did aggressive-against-property delinquents, although his difference did not reach significance. Thus, it appears that higher levels of empathy are associated with lower levels of aggression in both deviant and

normal youth, suggesting that empathy acts as an inhibitor to aggressive impulses and temptations (Gibbs, 1987).

Furthermore, this study revealed that the group identified as scoring high on both types of aggression (i.e., aggression-against-persons and aggression-against-property) had significantly lower perspective-taking scores than the group identified as low on both types of aggression. No other significant differences among subgroups in perspective-taking were found. However, the absence of further significant findings may be due to small sample sizes in each of the three groups.

Nevertheless, these results, in combination with the empathy findings, lend further support to the assertion that empathy and perspective-taking may act as inhibitors of aggression against others (Cohen & Strayer, 1996; Ellis, 1982; Gibbs, 1987; Gibbs, Arnold, Ahlborn, & Cheesman, 1984; Miller & Eisenberg, 1988). Further, as noted by Waterman et al. (1981), evidence of a consistent relationship between poor socio-cognitive skills and adolescent adjustment difficulties suggest the need for interventions aimed at training affective and cognitive role-taking skills. Certainly, the results of the present study provide support for the designation and implementation of interventions aimed at promoting the development of empathy and perspective-taking abilities in delinquent youth in order to inhibit the expression of aggressive and antisocial behaviors.

#### Strengths and Limitations of the Study

Several methodological strengths exist in this study. First, this study examined a relatively unexplored topic, that of prosocial moral reasoning in both delinquent and nondelinquent adolescents. Second, the delinquent and nondelinquent youth were matched on a number of important variables. That is, by controlling for potentially confounding variables, I have to a certain degree been able to demonstrate that the prosocial moral judgment, empathy, and perspective-taking skills of delinquent youth are immature when compared normal youth of the same age and ethnicity. Third, similar to prior research (e.g., Schonert, 1989), extreme care was taken to assure a high return rate on parental permission slips in the nondelinquent sample, thereby

minimizing volunteer effects and increasing the generalizability of the findings. Further, nondelinquents were specifically asked whether they had ever been arrested and convicted of a crime, controlling to a certain extent the inclusion of adjudicated delinquents in the nondelinquent sample. As well, all participants were read aloud each of the measures, which minimized difficulties due to reading ability, and ensured that all questionnaire items were completed, thereby reducing the possibility of missing data. Moreover, some data (i.e., social behavior) was obtained from both teacher and self-reports, thereby eliminating problems inherent in mono-method data collection procedures. Finally, this study provided some support for the psychometric strength of the PROM. For example, it appears that the PROM can be used to reliably detect differences in the prosocial moral reasoning of delinquent youth.

Nevertheless, the results of this study must be interpreted cautiously. First, it must be considered that the differences in the delinquent and nondelinquent groups do not represent true group differences, particularly given that delinquency is a legal classification that includes a variety of child psychopathologies (Cohen & Strayer, 1996). The classification and labeling of delinquency is often dependent upon the amount of discretion available to correctional authorities in deciding which adolescents should be adjudicated, as well as certain social factors such as the tolerance level of the community, the visibility of the offense, and the social status of the adolescent. Although nondelinquents in the present study were asked whether they had ever been arrested and convicted of crime, controlling to a certain extent the inclusion of adjudicated offenders in the nondelinquent sample, this study could not determine whether the nondelinquent participants did indeed engage in delinquent acts, but avoided being caught. This consideration, as well as the small number of participants and the exclusion of females in the study, limit the generalizability of the findings. Further, as noted by previous researchers (e.g., Schonert-Reichl, 1993; Smetana, 1990), one should always be cautious when interpreting findings derived from self-report questionnaires. Empathy and perspective-taking were assessed in the present study by the IRI (1983), a self-report dispositional measure. The IRI may have been influenced by socially desirable responding in that participants reported how they desire to be viewed by others, or how they wish to view themselves, rather than how they actually respond in real-life situations. As

well, the correlational results cannot be interpreted to imply causation. In several relationships, the reverse causal sequence may be possible (Cohen & Strayer, 1996). For example, it may be the case that participation in aggressive and antisocial acts inhibits opportunities for empathic responding and perspective-taking. Moreover, both low levels of empathy and aggressive attitudes and impulses may evolve from similar sources and therefore develop contemporaneously (Cohen & Strayer, 1996). Clearly, further research is warranted. Still, the results of this research provide ample justification for pursuing in greater detail the relationships between prosocial moral reasoning, empathy, perspective-taking, and social behaviors.

### Implications for Future Research

The present findings indicate that delinquent youth exhibit deficits in prosocial moral reasoning, empathy, and perspective-taking. Prior research suggests that higher-level prosocial moral reasoning has been associated with both the frequency and quality of prosocial behavior (Eisenberg et al., 1991), as have both empathy and perspective-taking (Eisenberg & Miller, 1987). Given that delinquent youth are delayed in their levels of prosocial moral reasoning, empathy, and perspective-taking, it stands to reason that interventions aimed at promoting the development of such variables would be beneficial. Further, the findings suggest that highly aggressive delinquents experience deficits particularly in empathy and perspective-taking. If affective and cognitive role-taking truly help to buffer antisocial temptations and influences as some research suggests (Gibbs, Arnold, Ahlborn, & Cheesman, 1984), then interventions designed to facilitate empathic responding and perspective-taking would be especially useful for aggressive youth. Indeed, it has been noted by some researchers (e.g., Jurkovic and Prentice, 1977) that the isolation of delinquent subgroups has particular implications for the designation of intervention programs oriented specifically towards the precise deficiencies displayed by these delinquents. Given that delinquency is one of the most noted variables responsible for atypical adult adjustment, it is hoped these findings can be used to provide recommendations to those who work with problem youth (i.e., teachers, school counsellors, probation officers, clinicians) in order to enhance their ability to promote positive adolescent development.

Nevertheless, before the designation and implementation of effective interventions, further research is needed to examine several variables overlooked in the present study. The inclusion of family and socialization variables would clearly serve to clarify the factors contributing to the differences obtained in the present study (Cohen & Strayer, 1996). As well, an examination of delinquent peer groups and peer group interactions cannot be disregarded as important components that contribute to our understanding of delinquency. Finally, it would be an efficacious endeavor to examine the nature of the changes in prosocial moral reasoning across age groups in order to determine if the developmental changes in prosocial moral reasoning evident in typical adolescents occur among deviant populations as well.

### References

- Alexsic, P. (1976). A study of empathic inhibition of aggression in juvenile delinquents (Doctoral dissertation, Miami University, 1975). Dissertation Abstracts International, 36, 4675B-4676B. (University Microfilms No. 76-6602).
- Arnold, W. R. (1965). Continuities in research: Scaling delinquent behavior. Social Problems, 13, 59-66.
- Bear (1989). Sociomoral reasoning and antisocial behaviors among normal sixth graders. Merrill-Palmer Quarterly, 35, 183-196.
- Bear, G., & Richards, H. (1981). Moral reasoning and conduct problems in the classroom. Journal of Educational Psychology, 73, 644-670.
- Bear, G., & Rys, G. (1994). Moral Reasoning, classroom behavior and sociometric status among elementary school children. Developmental Psychology, 30, 633-638.
- Blasi, A. (1980). Bridging moral cognition and moral action: A critical review of the literature. Psychological Bulletin, 88, 1-45.
- Blishen, B., Carrol, W., & Moore, C. (1987). Socioeconomic index for occupations. Canadian Review of Sociology and Anthropology, 24, 465-488.
- Borgatta, E. P., & Corsini, R. J. (1960). The Quick Word Test. Journal of Educational Research, 54, 15-20.
- Brodsky, S. L., & Smitherman, H. (1983). Handbook of scales for research in crime and delinquency (pp. 241-245). New York: Plenum.
- Bryant, B. (1982). An index of empathy for children and adolescents. Child Development, 53, 412-425.
- Campagna, A. F., & Harter, S. (1975). Moral judgment in sociopathic and normal children. Journal of Personality and Social Psychology, 31, 199-205.
- Candee, D., & Kohlberg, L. (1987). Moral judgment and moral action: A reanalysis of Haan, Smith, and Block's (1968) free-speech movement data. Journal of Personality and Social Psychology, 52, 554-564.

Carlo, G., Eisenberg, N., & Knight, G. P. (1992). An objective measure of adolescents' prosocial moral reasoning. Journal of Research on Adolescence, 2, 331-349.

Chandler, M. J. (1973). Egocentric and antisocial behavior: The assessment and training of social perspective-taking skills. Developmental Psychology, 9, 326-332.

Chandler, M., & Moran, T. (1990). Psychopathy and moral development: A comparative study of delinquent and nondelinquent youth. Development and Psychopathology, 2, 227-246.

Cicchetti, D. (1993). Developmental psychopathology: Reactions, reflections, projections. Developmental Review, 13, 471-502.

Cleckley, H. (1976). The mask of sanity (5th ed.). St. Louis MO: Mosby.

Cohen, J. (1969). Statistical power analysis for the behavioral sciences. New York: Academic Press.

Cohen, D., & Strayer, J. (1996). Empathy in conduct-disordered and comparison youth. Developmental Psychology, 22, 988-998.

Colby A., & Kohlberg, L. (1987). The measurement of moral judgment: Vol. 1. Theoretical foundations and research validation. Cambridge, England: Cambridge University Press.

Damon, W. (1977). The social world of the child. San Francisco: Jossey-Bass.

Davis, M. H. (1980). A multidimensional approach to individual differences in empathy. JSAS Catalogue of Selected Documents in Psychology, 10:85, MS, 2124.

Davis, M. H. (1983). Measuring individual differences in empathy: Evidence for a multidimensional approach. Journal of Personality and Social Psychology, 44, 113-126.

Duggan, H. (1978). A second chance. Massachusetts: Lexington Books.

Dunn, J., Bretherton, I., & Munn, P. (1987). Conversations about feeling states between mothers and their young children. Developmental Psychology, 23, 132-139.

Eisenberg, N. (1982). The development of reasoning regarding prosocial behavior. In N. Eisenberg (Ed.), The development of prosocial behavior (pp. 220-248). New York: Academic Press.



Eisenberg, N. (1986). Altruistic emotion, cognition, and behavior. Hillsdale, NJ: Erlbaum.

Eisenberg, N. (1990). Prosocial development in early and mid-adolescence. In R. Montemayor, G. R. Adams, & T. P. Gullotta (Eds.), From childhood to adolescence: A transitional period? Vol. 2. Advances in adolescence (pp. 240-269). Newbury Park, CA: Sage.

Eisenberg, N. (1992). The caring child. In J. Bruner, M. Cole, & A. Karmiloff-Smith (Series Eds.), The developing child. Harvard: University Press.

Eisenberg, N. (1993). In search of the good heart. In M. R. Merrens & G. C. Brannigan (Eds.), The developmental psychologists: Research adventures across the life span (pp. 88-104). New York: McGraw-Hill.

Eisenberg, N., Carlo, G., Murphy, B., & Van Court, P. (1995). Prosocial development in late adolescence: A longitudinal study. Child Development, 66, 1179-1197.

Eisenberg, N., Fabes, R. A., Carlo, G., & Karbon, M. (1992). Emotional responsivity to others: Behavioral correlates and socialization antecedents. New Directions for Child Development, 55, 57-73.

Eisenberg, N., Lennon, R., & Roth, K. (1983). Prosocial development: A longitudinal Study. Developmental Psychology, 19, 846-855.

Eisenberg, N., & Miller, P. (1987). The relation of empathy to prosocial and related behaviors. Psychological Bulletin, 101, 91-119.

Eisenberg, N., Miller, P., Shell, R., McNalley, S., & Shea, C. (1991). Prosocial development in adolescence: A longitudinal study. Developmental Psychology, 27, 849-857.

Eisenberg, N., Shell, R., Pasternack, J., Beller, R., Lennon, R., & Mathy, R. (1987). Prosocial development in middle childhood: A longitudinal study. Developmental Psychology, 23, 712-718.

Eisenberg-Berg, N. (1979). Development of children's prosocial moral judgment. Developmental Psychology, 15, 128-137.

Eisenberg-Berg, N., & Hand, M. (1979). The relationship of preschoolers' reasoning about prosocial moral conflicts to prosocial behavior. Child Development, 50, 356-363.

Eisenberg-Berg, N., & Mussen, P. (1978). Empathy and moral development in adolescence. Developmental Psychology, 14, 185-186.

Eisenberg-Berg, N., & Roth, K. (1980). Development of young children's prosocial moral judgment: A longitudinal follow-up. Developmental Psychology, 16, 375-376.

Ellis, P. L. (1982). Empathy: A factor in antisocial behavior. Journal of Abnormal Child Psychology, 10, 123-134.

Enright, R. D., & Lapsley, D. K. (1980). Social role-taking: A review of the constructs, measures, and measurement properties. Review of Educational Research, 50, 647-674.

Farrington, D. P. (1978). The family backgrounds of aggressive youth. In L. A. Hersov & M. Berger (Eds.), Aggression and anti-social behavior in childhood and adolescence. Oxford, England: Pergamon.

Flavell, J. H. (1985). Cognitive development (2nd ed.). Engelwood Cliffs, NJ: Prentice-Hall.

Flavell, J. H., Botkin, P. T., Fry, C. I., Wright, J. W., & Jarvis, P. E. (1968). The development of role-taking and communication skills in children. New York: Wiley.

Fodor, E. M. (1973). Moral development and parent behavior antecedents in adolescent psychopaths. Journal of Genetic Psychology, 122, 37-43.

Freeman, S. J. (1974). Individual differences in moral judgment by children and adolescents. Unpublished doctoral dissertation, University of Wisconsin, WI.

Freeman, S. J. M., Bliss, B., Giebink, J. W. (1980). Moral reasoning in young adolescents with special needs. Counseling and Values, 25, 47-56.

Gibbs, J. C. (1987). Social processes in delinquency: The need to facilitate empathy as well as sociomoral reasoning. In W. M. Kurtines & J. L. Gerwitz (Eds.), Moral development through social interaction (pp. 301-321). New York: Wiley.

Gibbs, J. C., Arnold, K. D., Ahlborn, H. H., & Cheesman, F. L. (1984). Facilitation of sociomoral reasoning in delinquency. Journal of Consulting and Clinical Psychology, 52, 37-45.

Gibbs, J. C., Arnold, K. D., Morgan, R. L., Schwartz, E. S., Gavaghan, M. P., & Tappan, M. B. (1984). Construction and validation of a multiple-choice measure of moral reasoning. Child Development, 55, 527-536.

Gilligan, C. (1977). In a different voice: Women's conceptions of self and morality. Harvard Educational Review, 47, 481-517.

Gove, W. R., & Crutchfield, R. D. (1982). The family and juvenile delinquency. Sociological Quarterly, 23, 301-319.

Gresham, F. M., & Elliot, S. N. (1990). Social skills rating system manual. Circle Pines, MN: American Guidance Service.

Hains, A. S., & Miller, D. J. (1980). Moral and cognitive development in delinquent and nondelinquent children and adolescents. Journal of Genetic Psychology, 37, 21-35.

Hallors, M., & Cowan, P. A. (1973). Social isolation and cognitive development: Logical operations and role-taking ability in Norwegian settings. Child Development, 44, 630-641.

Hare, R. D. (1980). A research scale for the assessment of psychopathy in criminal populations. Personality and Individual Differences, 1, 111-117.

Hare, R. D. (1985). Comparison of procedures for the assessment of psychopathy. Journal of Consulting and Clinical Psychology, 53, 7-16.

Higgins, A., Power, C., Kohlberg, L. (1984). The relationship of moral atmosphere to judgments of responsibility. In W. M. Kurtines & J. L. Gerwitz (Eds.), Morality, moral behavior, and moral Development (pp. 74-106). New York: Wiley.

Hightower, A. D., Spinell, A., & Lotyczewski, B. S. (1987). Teacher-child rating scale: A brief objective measure of elementary children's school problem behaviors and competencies. School Psychology Review, 15, 393-409.

Hoffman, M. L. (1991). Empathy, social cognition, and moral action. In W. M. Kurtines & J. L. Gerwitz (Eds.), Handbook of moral behavior and development: Vol. 1. Theory (pp. 275-301). Hillsdale, NJ: Erlbaum.

Hoffman, M. L. (1982). The development of prosocial motivation: Empathy and guilt. In N. Eisenberg (Ed.), The development of prosocial behavior (pp. 281-313). New York: Academic Press.

Hogan, R. (1969). Development of an empathy scale. Journal of Consulting and Clinical Psychology, 33, 307-316.

Hogan, R. (1973). Moral conduct and moral character: A psychological perspective. Psychological Bulletin, 79, 217-232.

Hudgins, W., & Prentice, N. M. (1973). Moral judgment in delinquent and nondelinquent adolescents and their mothers. Journal of Abnormal Psychology, 82, 145-152.

Inhelder, B., & Piaget, J. (1958). The growth of logical thinking from childhood to adolescence. A. Parsons & S. Milgrim (Trans.). New York: Basic Books. (Original work published 1955).

Jesness, C. F. (1969). The jesness inventory manual. Palo Alto, CA: Consulting Psychologists Press.

Jurkovic, G. J. (1980). The juvenile delinquent as a moral philosopher: A structural-developmental perspective. Psychological Bulletin, 88, 709-727.

Jurkovic, G. J., & Prentice, N. M. (1974). Dimensions of moral interaction and moral judgment in delinquent and nondelinquent families. Journal of Consulting and Clinical Psychology, 42, 256-262.

Jurkovic, G. J., & Prentice, N. M. (1977). Relation of moral and cognitive development to dimensions of juvenile delinquency. Journal of Abnormal Psychology, 86, 414-420.

Kalliopuska, M. (1983). Relationship between moral judgment and empathy. Psychological Reports, 53, 575-578.

Kalle, R. J., & Suls, J. (1978). The relationship between Kohlberg's moral judgment stages and emotional empathy. Bulletin of the Psychonomic Society, 11, 191-192.

Kantner, J. E. (1976). The relationship between moral judgment and personality variables in adult offenders (Doctoral dissertation, Purdue University, 1975). Dissertation Abstracts International, 36, 5262B-5263B.

Kaplan, P. J., & Arbuthnot, J. (1985). Affective empathy and cognitive role-taking in delinquent and nondelinquent youth. Adolescence, 20, 323-333.

Kohlberg, L. (1958). The development of modes of moral thinking and choice in the years ten to sixteen. Unpublished doctoral dissertation, University of Chicago, Ill.

Kohlberg, L. (1963). The development of children's orientation toward a moral order, I: Sequence in the development of moral thought. Vita Humana, 6, 11-33.

Kohlberg, L. (1969). Stage and sequence: The cognitive-developmental approach to socialization. In S. A. Goslin (Ed.), Handbook of socialization theory and research (pp. 347-480). Chicago: Rand McNally.

Kohlberg, L. (1975). The cognitive-developmental approach to moral education. Phi Delta Kappa, 56, 670-677.

Kohlberg, L. (1976). Moral stages and moralization: The cognitive-developmental approach. In T. Lickona (Ed.), Moral development and behavior: Theory, research and social issues (pp. 31-53). New York: Holt, Rinehart, & Winston.

Kohlberg, L., & Kramer, R. (1969). Continuities and discontinuities in childhood and adult moral development. Human Development, 12, 93-120.

Kohlberg, L., LaCrosse, J., & Ricks, D. (1972). The predictability of adult mental health from childhood behavior. In B. B. Wolman (Ed.), Handbook of socialization theory and research (pp. 1217-1284). New York: McGraw-Hill.

Kurdek, L. (1978). Perspective-taking as the cognitive basis of children's moral development. Merrill-Palmer Quarterly, 24, 3-28.

Kurdek, L. (1981). Young adults' moral reasoning about prohibitive and prosocial dilemmas. Journal of Youth and Adolescence, 10, 263-273.

Lee, M., & Prentice, N. M. (1988). Interrelations of empathy, cognition, and moral reasoning with dimensions of juvenile delinquency. Journal of Abnormal Child Psychology, 16, 127-139.

Lickona, T. (1983). Raising good children. New York: Bantam.

Liska, A. E. (1974). Causal structures underlying the relationship between delinquent involvement and delinquent peers. Sociology and Social Research, 59, 23-26.

McColgan, E. B., Rest, J. R., & Pruitt, D. B. (1983). Moral judgment and antisocial behavior in early adolescence. Journal of Applied Developmental Psychology, 4, 189-199.

Mehrabian, A., & Epstein, N. (1972). A measure of emotional empathy. Journal of Personality, 40, 525-543.

Miller, P., & Eisenberg, N. (1988). The relation of empathy to aggressive and externalizing/antisocial behavior. Psychological Bulletin, 103, 324-344.

Nahir, H. T., & Yussen, S. R. (1977). The performance of kibbutz and city-reared Israeli children on two role-taking tasks. Developmental Psychology, 13, 450-455.

Noam, G. G. (1992). Development as the aim of clinical intervention. Development and Psychopathology, 4, 679-696.

Noam, G. G., Kilburn, D., & Ammen-Elkins, G. (1989). Adolescent development and psychiatric symptomatology. McLean Hospital Report, 4.

Panella, D., & Henggeler, S. W. (1986). Peer interactions of conduct-disordered, anxious-withdrawn, and well-adjusted black adolescents. Journal of Abnormal Child Psychology, 14, 1-11.

Piaget, J. (1965). The moral judgment of the child. New York: Free Press. (Original work published 1932).

Pullis, M., & Cadwell, J. (1982). The influences of children's temperament characteristics on teacher's decision strategies. American Educational Research Journal, 19, 165-181.

Quay, H. C., & Parsons, L. B. (1971). The differential behavioral classification of the juvenile offender (2nd ed.). Washington, DC: Bureau of Prisons, US Department of Justice.

Quay H. C. & Peterson, D. R. (1979). Manual for the behavior problem checklist. Coral Gables, FL: University of Miami.

Quay H. C. & Peterson, D. R. (1987). Manual for the revised behavior problem checklist. Coral Gables, FL: University of Miami.

Radke-Yarrow, M., Zahn-Waxler, C., & Chapman, M. (1983). Children's prosocial dispositions and behavior. In P. Mussen (Ed.), Handbook of child psychology: Vol 4. Socialization, personality, and social development (pp. 469-546). New York: Wiley.

Rest, J. R. (1979). Development in judging moral issues. Minneapolis, MN: University of Minnesota.

Rest, J. R. (1983). Morality. In J. H. Flavell & E. M. Markman (Eds.), Handbook of child psychology: Vol. 3. Cognitive development (pp. 556-629). New York: Wiley.

Rest, J. R. (1986a). The defining issues test manual (3rd ed.). Minneapolis, MN: University of Minnesota Press.

Rest J. R. (1986b). Moral development: Advances in research and theory. New York: Praeger.

Rest, J. R., Cooper, D., Coder, R., Masanz, J., & Anderson, D. (1974). Judging the important issues in moral dilemmas: An objective test of development. Developmental Psychology, 10, 491-501.

Richards, H., Bear, G., Stewart, A., & Norman, A. (1992). Moral reasoning and classroom conduct: Evidence of a curvilinear relationship. Merrill-Palmer Quarterly, 38, 176-190.

Riffel, E., & Ozgood, B. (1992). [Provincial resource program's profile of the young offender]. Unpublished raw data.

Rotenberg, M. (1974). Conceptual and methodological notes on affective and cognitive role-taking (sympathy and empathy): An illustrative experiment with delinquent boys. The Journal of Genetic Psychology, 125, 177-185.

Rutter, M., & Giller, H. (1983). Juvenile delinquency: Trends and perspectives. Harmondsworth: Penguin.

Schmidt, F. L. (1996). Statistical significance testing and cumulative knowledge in psychology: Implications for training of researchers. Psychological Methods, 1, 115-129.

Schonert, K. A. (1989). The relationship among empathy, social participation, and moral reasoning in behaviorally disordered adolescent males and their non-disordered peers. Unpublished doctoral dissertation, University of Iowa, IA.

Schonert, K. A., & Cantor, G. (1991). Moral reasoning in behaviorally disordered adolescents from alternative and traditional high schools. Behavioral Disorders, 17, 23-35.

Schonert-Reichl, K. A. (1993). Empathy and social relationships in adolescents with behavioral disorders. Behavioral Disorders, 18, 189-204.

Schonert-Reichl, K. A. (1994). The interrelations of moral reasoning, empathy, and age among adolescents with behavioral disorders. B. C. Journal of Special Education, 18, 248-262.

Schonert-Reichl, K. A. (1996). Peer relationships and moral reasoning during early adolescence: The influence of peer status, social participation, and friendship quality. Paper presented at the biennial meeting of the International Society for the Study of Behavioral Development, Quebec City, Quebec.

Selman, R. L. (1971). The relation of role taking to the development of moral judgment in children. Child Development, 42, 79-91.

Selman, R. L. (1977). A structural-developmental analysis of interpersonal conceptions in poorly adjusted and well adjusted preadolescents. In A. Pick (Ed.), Tenth Annual Symposium on Child Development. Minneapolis, MN: University of Minnesota.

Selman, R. L. (1981). The development of interpersonal competence: The role of understanding in conduct. Developmental Review, 1, 401-422.

Sigman, M., Ungerer, J. A., & Russell, A. (1983). Moral judgment in relation to behavioral and cognitive disorders in adolescents. Journal of Abnormal Child Psychology, 11, 503-512.

Smetana, J. G. (1990). Morality and conduct disorders. In M. Lewis & S. M. Miller (Eds.), Handbook of developmental psychopathology (pp.157-178). New York: Plenum.

Strayer, J. (1993). Children's concordant emotions and cognitions in response to observed emotions. Child Development, 64, 188-201.

Taylor, J. H., & Walker, L. J. (1997). Moral climate and the developmental of moral reasoning: The effects of dyadic discussion between young offenders. Journal of Moral Education, 26, 21-43.

Thoma, S. J., & Ladewig, B. H. (1997). Moral judgment development and adjustment in late adolescence. Unpublished manuscript, University of Alabama at Tuscaloosa.

Trevethan, S. C., & Walker, L. J. (1989). Hypothetical versus real-life moral reasoning among psychopathic and delinquent youth. Development and Psychopathology, 1, 91-103.

Turiel, E. (1966). An experimental test of the sequentiality of developmental stages in the child's moral judgments. Journal of Personality and Social Psychology, 6, 611-618.

Turiel, E. (1978). The development of concepts of social structure: Social convention. In J. Glick & A. Clarke-Stewart (Eds.), The development of social understanding. New York: Gardner Press.

Turiel, E. (1997). The development of morality. In W. Damon (Ed.), Handbook of child psychology: Vol. 3. Social, emotional, and personality development. New York: Wiley.

Wechsler, D. (1974). Manual for the wechsler intelligence scale for children - revised (WISC-R). San Antonio, TX: The Psychological Corporation.

Walker, L. J. (1980). Cognitive and perspective-taking prerequisites for moral development. Child Development, 51, 131-139.



Walker, L. J. (1983). Sources of cognitive conflict for stage transition in moral development. Developmental Psychology, 19, 103-110.

Walker, L. J. (1988). The development of moral reasoning. Annals of Child Development, 5, 33-78.

Waterman, J. M., Sobesky, W. E., Silvern, L., Aoki, B., & McCaulay, M. (1981). Social perspective-taking and adjustment in emotionally disturbed, learning-disabled, and normal children. Journal of Abnormal Child Psychology, 9, 133-148.

Zahn-Waxler, C., Radke-Yarrow, M., & King, R. A. (1979). Child rearing and children's prosocial initiations toward victims of distress. Child Development, 50, 319-330.

Appendix A  
Nondelinquent Adolescent Recruitment Form

## THE UNIVERSITY OF BRITISH COLUMBIA



Department of Educational Psychology  
and Special Education  
Faculty of Education  
2125 Main Mall  
Vancouver, B.C. Canada V6T 1Z4  
Tel: (604) 822-8229  
Fax: (604) 822-3302

Dear Student:

You have been selected to participate in a research project that I am conducting in your school. The purpose of this study is to examine how teenagers think and feel about certain social issues. **It is not a test and there are no right or wrong answers.** Only your answers are important. Because there is very little research about Canadian teenagers, more research is needed to help us understand teenagers better. By participating in this study, you will help teachers and parents understand teenagers better and improve education for all.

If you decide to participate, you will be asked to fill out a set of questionnaires that will help me learn a little about you. One questionnaire will ask you questions about your background, like your age, gender, and number of people in your family. The remaining questionnaires will ask you about various social issues, about "putting yourself in someone else's place", and about how you think and act in certain situations at school. You will also be asked to fill out a short set of questions on vocabulary. The questionnaires will take approximately 50 minutes to complete. **All of your answers will be completely confidential.** Your name will not be kept with your answers so that no one but myself and my advisor will know who answered the questions. **This means that your answers will not be available to your teachers, friends, parents, or to anyone else.** You may also choose not to answer any question, as well as refuse to participate or withdraw from the study at any time. If this is your choice, there will be absolutely no penalty, nor will your class standing or marks be effected in any way. **Those students who choose not to participate will be given something else to do in class that is related to regular classroom instruction.**

In order for you to participate in this study, you will need to take home the attached parental permission slip and give it to your parents so that they may sign it. **IF YOU RETURN YOUR PERMISSION SLIP, YOU WILL HAVE A CHANCE OF WINNING A \$20.00 GIFT CERTIFICATE FROM A&B SOUND.** Please do your very best to have it returned to your teacher by **TOMORROW**. Thank you for considering this request and I hope you agree to participate!

Sincerely,

Cory L. Elaschuk, B.A.  
Department of Educational Psychology and Special Education  
University of British Columbia

## Appendix B

### Delinquent Adolescent Recruitment Form

# THE UNIVERSITY OF BRITISH COLUMBIA



## Department of Educational Psychology and Special Education

Faculty of Education

2125 Main Mall

Vancouver, B.C. Canada V6T 1Z4

Tel: (604) 822-8229

Fax: (604) 822-3302

Dear Student:

You have been selected to participate in a research project that I am conducting in your school. The purpose of this study is to examine how teenagers think and feel about certain social issues. **It is not a test and there are no right or wrong answers.** Only your answers are important. Because there is very little research about Canadian teenagers, more research is needed to help us understand teenagers better. By participating in this study, you will help teachers and parents understand teenagers better and improve education for all.

If you decide to participate, you will be asked to fill out a set of questionnaires that will help me learn a little about you. One questionnaire will ask you questions about your background, like your age, gender, and number of people in your family. The remaining questionnaires will ask you about various social issues, about "putting yourself in someone else's place", and about how you think and act in certain situations at school. You will also be asked to fill out a short set of questions on vocabulary. The questionnaires will take approximately 45 minutes to complete. **All of your answers will be completely confidential.** Your name will not be kept with your answers so that no one but myself and my advisor will know who answered the questions. **This means that your answers will not be available to your teachers, friends, parents, or to anyone else.** You may also choose not to answer any question, as well as refuse to participate or withdraw from the study at any time. If this is your choice, there will be absolutely no penalty, nor will your class standing or marks be effected in any way. **Those students who choose not to participate will be given something else to do in class that is related to regular classroom instruction.**

Finally, I know that your time is valuable. In order to thank you for taking the time to participate in this study I will be giving **"THANK YOU TREATS"** to those participants after they have completed their questionnaire. I hope you agree to participate!

Sincerely,

Cory L. Elaschuk, B.A.

Department of Educational Psychology and Special Education  
University of British Columbia

Appendix C  
Parental Permission Slip

# **PARENT CONSENT FORM**

**Study Title:** "Investigating Adolescent Prosocial Development"

**Researcher:** Cory L. Elashuk

**Faculty Advisor:** Dr. Kimberly A. Schonert-Reichl, Ph.D.  
Assistant Professor  
Department of Educational Psychology and Special Education  
University of British Columbia  
2121 Main Mall  
Vancouver, B.C. V6T 1Z4

---

## **(KEEP THIS PORTION FOR YOUR RECORDS)**

I have read and understood the attached letter regarding the study entitled "Investigating Adolescent Prosocial Development".

☐ Yes, my son has my permission to participate

☐ No, my son does not have my permission to participate

**Parent's Signature** \_\_\_\_\_

**Son's Name** \_\_\_\_\_

**Date** \_\_\_\_\_

---

## **(DETACH HERE AND RETURN TO SCHOOL)**

I have read and understood the attached letter regarding the study entitled "Investigating Adolescent Prosocial Development"

I have also kept copies of both the letter describing the study and this permission slip.

☐ Yes, my son has my permission to participate

☐ No, my son does not have my permission to participate

**Parent's Signature** \_\_\_\_\_

**Son's Name** \_\_\_\_\_

**Date** \_\_\_\_\_

Appendix D  
Student Consent Form



Appendix E  
Teacher Consent Form

### TEACHER CONSENT FORM

**Study Title:** "Investigating Adolescent Prosocial Development"  
**Researcher:** Cory L. Elashuk  
**Faculty Advisor:** Dr. Kimberly A. Schonert-Reichl, Ph.D.  
Assistant Professor  
Department of Educational Psychology and Special Education  
University of British Columbia  
2121 Main Mall  
Vancouver, B.C. V6T 1Z4

---

I have read and understood the attached letter regarding the study entitled "Investigating Adolescent Prosocial Development".

\_\_\_\_\_ Yes, I agree to participate

\_\_\_\_\_ No, I do not agree to participate

**Name (please print)** \_\_\_\_\_

**Signature** \_\_\_\_\_

**Date** \_\_\_\_\_

Appendix F  
Demographic Questionnaire



8. How much education does your father (stepfather, male guardian) have? **(Check one)**

- ☐ some high school
- ☐ graduated from high school
- ☐ vocational or technical school
- ☐ some college
- ☐ graduated from university
- ☐ attended graduate school (for example, to be doctor, lawyer or teacher)
- ☐ don't know

9. What is your father's job? **(Be Specific)** \_\_\_\_\_

10. How much education does your mother (stepmother, female guardian) have? **(Check One)**

- ☐ some high school
- ☐ graduated from high school
- ☐ vocational or technical school
- ☐ some college
- ☐ graduated from university
- ☐ attended graduate school (for example, to be doctor, lawyer or teacher)
- ☐ don't know

11. What is your mother's job? **(Be Specific)** \_\_\_\_\_

12. How do you describe yourself in terms of cultural or ethnic heritage? **(Check One). If you are of mixed heritage, check "other" and explain in the space provided.**

- ☐ White (Anglo, Caucasian, etc.)
- ☐ Black (African, Haitian, Jamaican, etc.)
- ☐ Native Indian
- ☐ Asian (Oriental, Chinese, Japanese, Korean, etc.)
- ☐ Indo Canadian (East Indian, etc.)
- ☐ Latin (Spanish, Mexican, South American, etc.)
- ☐ Other (please describe in the space provided: \_\_\_\_\_)

13. What language(s) do you speak at home? \_\_\_\_\_

14. How long have you lived in Canada? \_\_\_\_\_

15. Have you ever been arrested and convicted of a crime ? **(Check One).**

- ☐ Yes
- ☐ No

Appendix G

The Quick Word Test

**Quick Word Test: Level 1 - Form AM**

 Edgar F. Borgatta  
 The University of Wisconsin

 Raymond J. Corsini  
 University of California

**Directions:** From the four choices given for each question, circle the word that means the same as the first word. If you do not know the answer, **GUESS**. Work quickly and **ANSWER ALL THE QUESTIONS**.

**EXAMPLE:**

happy	dull	seam	glad	fast
-------	------	------	------	------

1. pouch	sack	lean	flag	toss	26. rouse	bird	wood	wake	fall
2. drink	wink	rain	tope	edge	27. agile	teen	leap	deft	reed
3. frizz	cool	sear	hall	haul	28. shore	bank	true	land	trim
4. hasty	tart	mean	rash	rich	29. orbit	site	chew	herb	path
5. stout	tall	bold	ugly	mete	30. adorn	gold	gild	gilt	barb
6. strip	peel	cash	rope	hula	31. rhyme	hoar	skin	song	poem
7. newel	post	raid	ally	moan	32. sober	weep	wash	dirk	cool
8. salve	salt	work	find	ease	33. aloft	cool	high	room	barn
9. rinse	soap	wash	soar	dash	34. right	turn	true	road	hand
10. watch	tick	bolt	tend	grab	35. check	book	menu	curb	toss
11. pluck	bite	drum	fowl	pick	36. rivet	flow	tray	bolt	part
12. eject	emit	cart	oust	rush	37. haunt	lair	hush	wild	home
13. jetty	pier	tide	crag	fast	38. spawn	eggs	loan	yard	bold
14. relic	lean	bite	hang	ruin	39. weary	pine	mesh	lime	tire
15. order	cash	beat	rank	send	40. knave	apse	ship	mall	jack
16. teepee	tent	warm	swim	riot	41. dwarf	pier	spin	tree	runt
17. ashen	pale	coal	dark	sick	42. incur	dose	wolf	meet	hurt
18. alibi	read	true	base	plea	43. sieve	many	sift	rain	surf
19. booth	pick	shed	twin	lave	44. humid	damp	male	plot	mist
20. suave	oily	leak	hero	prig	45. evade	foil	raid	sway	trim
21. noose	hand	loop	nose	flay	46. strut	step	cord	play	twig
22. mince	step	cake	chop	meat	47. chill	drag	lean	ague	felt
23. admit	gate	send	omit	avow	48. guise	male	rope	fast	form
24. imply	hint	joke	flat	full	49. lunge	jerk	leap	pull	pass
25. maize	stun	game	trap	corn	50. drill	bore	work	push	dell

## Appendix H

### The Prosocial Moral Reasoning Objective Measure



**Instructions: carefully read the stories and make sure all the questions are answered. If you have any questions at any time, please ask.**

### Sandy's Story

Sandy was a student at a new school. One day Sandy was walking into her new class early and saw an older girl teasing and making fun of another girl clothes. The girl started crying. There was no one else around and Sandy did not know the girls very well, but she had heard that the girl who was crying was very poor and that the older girl had a lot of friends. Sandy thought that maybe she should try to stop the older girl but she was afraid that the older girl might pick on her and tease her also.

What should Sandy do? (**Check one**)

- ☐ Sandy should try and stop the older girl  
☐ Not sure  
☐ Sandy should not try and stop the older girl

How important were each of the following reasons in making your decision?  
**IMPORTANCE (Circle one for each):**

Great	Much	Some	Little	No	1. it depends whether Sandy thinks the older girl is being really mean or not
Great	Much	Some	Little	No	2. it depends whether the other girl is crying a lot
Great	Much	Some	Little	No	3. it depends whether Sandy can find other friends to do things with in school
Great	Much	Some	Little	No	4. it depends whether Sandy thinks that she is doing what she believes she should do
Great	Much	Some	Little	No	5. it depends whether Sandy's classmates would approve of what she does
Great	Much	Some	Little	No	6. it depends whether Sandy is morally-abstracted about affective ties or not

From the list of reasons above, choose the three most important. (**Circle one for each**)

Which was the <b>FIRST</b> most important?	1	2	3	4	5	6
Which was the <b>SECOND</b> most important?	1	2	3	4	5	6
Which was the <b>THIRD</b> most important?	1	2	3	4	5	6

### Tony's Story

A young boy named Tony had a very unusual type of blood. One day right after Tony had begun school and was accepted on the baseball team, a doctor called Tony to ask him to give a large amount of blood to a boy who was very sick and needed more blood of the same kind as Tony's to get well. Because Tony was the only person in the town with the sick boy's type of blood, and since this was a rare and serious sickness, the blood would have to be given a number of times over a period of several weeks. So, if Tony agreed to give his blood, he would have to go into the hospital for several weeks. Being in the hospital would make Tony feel very weak for awhile, he would lose his spot on the team, and he would get very far behind in school.

What should Tony do? (**Check one**)

- ☐ Tony should not give blood  
☐ Not sure  
☐ Tony should give blood

How important were each of the following reasons in making your decision?  
**IMPORTANCE (Circle one for each):**

Great	Much	Some	Little	No	1. it depends whether Tony thinks that helping is nice or not
Great	Much	Some	Little	No	2. it depends on Tony's unidimensional approach to social classes
Great	Much	Some	Little	No	3. it depends whether Tony believes his friends and parents will like what he does or not
Great	Much	Some	Little	No	4. it depends whether Tony feels that losing his spot on the team is important or not
Great	Much	Some	Little	No	5. it depends whether Tony can understand how badly the other boy is feeling
Great	Much	Some	Little	No	6. it depends how sick the other boy will get

From the list of reasons above, choose the three most important. (**Circle one for each**)

Which was the <b>FIRST</b> most important?	1	2	3	4	5	6
Which was the <b>SECOND</b> most important?	1	2	3	4	5	6
Which was the <b>THIRD</b> most important?	1	2	3	4	5	6

### The Accident

One day John was going to a friend's party. On the way, he saw a boy who had fallen off his bike and hurt his leg. The boy asked John to go to the boy's house and get his parents so that the parents could come and take him to a doctor. But if John did run and get the boy's parents, John would be late for the party and miss all the fun and social activities with his friends.

What should John do? (**Check one**)

- ☐ John should run and get the boy's parents  
☐ Not sure  
☐ John should go to his friend's party

How important were each of the following reasons in making your decision?  
**IMPORTANCE (Circle one for each):**

Great	Much	Some	Little	No	1. it depends how John would feel about himself if he helped or not
Great	Much	Some	Little	No	2. it depends how much fun John expects the party to be and what sorts of things are happening at the party
Great	Much	Some	Little	No	3. it depends whether John believes in people's values of metacognition or not
Great	Much	Some	Little	No	4. whether John's parents and friends will think he did the right thing or he did the wrong thing
Great	Much	Some	Little	No	5. it depends whether the boy really needs help or not
Great	Much	Some	Little	No	6. it depends whether John thinks it's the decent thing to do or not

From the list of reasons above, choose the three most important. (**Circle one for each**)

Which was the <b>FIRST</b> most important?	1	2	3	4	5	6
Which was the <b>SECOND</b> most important?	1	2	3	4	5	6
Which was the <b>THIRD</b> most important?	1	2	3	4	5	6

### The Swimming Story

Scott was very good at swimming. He was asked to help young handicapped children who could not walk learn to swim so that they could make their legs strong for walking. Scott was the only one in town who could do this job because he was a good swimmer and a swimming teacher. But helping the crippled children would take up much of Scott's free time left after work, and Scott wanted to practice swimming very hard for an important swimming contest coming up. If Scott could not practice swimming in all of his free time, he would probably lose the swimming contest and not receive the prize for winning, which was money. Scott was planning on using the prize money for his college education or for other things he wanted.

What should Scott do? (Check one)

- ☐ Scott should teach the swimming class  
☐ Not sure  
☐ Scott should practice for the swimming contest

How important were each of the following reasons in making your decision?  
**IMPORTANCE (Circle one for each):**

Great	Much	Some	Little	No	1. it depends on the natural philosophies of ethical stature and societal incorporation
Great	Much	Some	Little	No	2. it depends whether Scott believes teaching the children is the nice thing to do
Great	Much	Some	Little	No	3. it depends if Scott really wants to win the swimming contest
Great	Much	Some	Little	No	4. it depends if the handicapped children's legs hurt or not
Great	Much	Some	Little	No	5. it depends whether Scott's parents and the community will think he did the right thing or he did the wrong thing
Great	Much	Some	Little	No	6. it depends whether Scott would feel good about the children being able to walk better

From the list of reasons above, choose the three most important. (Circle one for each)

Which was the <b>FIRST</b> most important?	1	2	3	4	5	6
Which was the <b>SECOND</b> most important?	1	2	3	4	5	6
Which was the <b>THIRD</b> most important?	1	2	3	4	5	6

### Math Story

Eric knows a lot about math. One day a boy who had just moved into Eric's class asked Eric to help him with his math homework that weekend. The boy was having a hard time catching up with his math class, he had only the weekend to prepare for the math test the next Monday, and the boy needed to pass. If Eric helps the boy with his math homework, then he won't be able to go to the beach with his friends that weekend.

What should Eric do? (**Check one**)

- ☐ Eric should help the boy with his math homework  
☐ Not sure  
☐ Eric should go to the beach with his friends

How important were each of the following reasons in making your decision?  
**IMPORTANCE (Circle one for each):**

Great	Much	Some	Little	No	1. it depends whether Eric's parents and friends think he did the right thing or the wrong thing
Great	Much	Some	Little	No	2. it depends if Eric thinks its the nice thing to do or not
Great	Much	Some	Little	No	3. it depends if Eric thinks the boy really needs help or not
Great	Much	Some	Little	No	4. it depends if Eric really wants to go to the beach or not
Great	Much	Some	Little	No	5. it depends whether justice can be served in furthering the cause of reciprocity in priorities
Great	Much	Some	Little	No	6. it depends whether Eric feels that everyone is better off if each person helps each other

From the list of reasons above, choose the three most important. (**Circle one for each**)

Which was the <b>FIRST</b> most important?	1	2	3	4	5	6
Which was the <b>SECOND</b> most important?	1	2	3	4	5	6
Which was the <b>THIRD</b> most important?	1	2	3	4	5	6

Appendix I

The Interpersonal Reactivity Index - Empathy and Perspective-Taking Subscales

<b>The Interpersonal Reactivity Index</b> (Davis, 1983)
--

The following sentences ask about your feelings and thoughts in different situations. For each sentence, **INDICATE HOW WELL IT DESCRIBES YOU BY CIRCLING THE NUMBER THAT DESCRIBES HOW TRUE IT IS FOR YOU. READ EACH SENTENCE CAREFULLY.** Answer honestly. Thank you.

	Not At All True	A Little True	Somewhat True	Pretty True	Really True
1. I believe that there are two sides to every question and I try to look at them both.	1	2	3	4	5
2. When I'm upset at someone I usually try to "put myself in his shoes for awhile"	1	2	3	4	5
3. I am often quite touched by things that I see happen	1	2	3	4	5
4. I try to look at everybody's side of a disagreement before I make a decision	1	2	3	4	5
5. When I see someone being treated unfairly, I sometimes don't feel very much pity for them	1	2	3	4	5
6. I sometimes find it hard to see things from the "other guy's" point of view	1	2	3	4	5
7. Before criticizing someone, I try to feel how I would feel if I was in their place	1	2	3	4	5
8. If I'm sure I'm right about something I don't waste much time listening to other people's arguments	1	2	3	4	5
9. Sometimes I don't feel very sorry for other people when they are having problems	1	2	3	4	5
10. I often have tender concerned feelings for people less fortunate than me	1	2	3	4	5

	<b>Not At All True</b>	<b>A Little True</b>	<b>Somewhat True</b>	<b>Pretty True</b>	<b>Really True</b>
11. I sometimes try to understand my friends better by imagining how things look from their point of view	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>	<b>5</b>
12. Other peoples misfortunes do not usually disturb me a great deal	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>	<b>5</b>
13. When I see someone being taken advantage of, I feel kind of protective toward them	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>	<b>5</b>
14. I would describe myself as a pretty soft-hearted person	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>	<b>5</b>



Appendix J  
Social Skills Rating System - Student Form

This paper lists a lot of things that students your age may do. Please read each sentence and think about yourself. Decide **how often** you do the behavior described.

If you **never** do this behavior, circle the 0.

If you **sometimes** do this behavior, circle the 1.

If you **very often** do this behavior, circle the 2.

Then, decide how important the behavior is to your relationships with others.

If it is **not important** to your relationships, circle the 0.

If it is **important** to your relationships, circle the 1.

If it is **critical** to your relationships, circle the 2.

Here are two examples:

	How Often?				How Important?		
	Never	Sometimes	Very Often		Not Important	Important	Critical
I start conversations with classmates.	0	1	(2)		0	(1)	2
I keep my desk clean and neat.	0	(1)	2		(0)	1	2

*This student **very often** starts conversations with classmates, and starting conversations with classmates is **important** to this student. This student **sometimes** keeps his or her desk clean and neat but a clean and neat desk is **not important** to this student.*

If you change an answer, be sure to erase completely. Please answer all questions. When you are finished, wait for further directions from your teacher. Be sure to ask questions if you do not know what to do. There are no right or wrong answers, just your feelings of how often you do these things and how important they are to you.

**Begin working when told to do so.**

FOR OFFICE USE ONLY How Often?				How Often?			How Important?			
C	A	E	S	Never	Sometimes	Very Often	Not Important	Important	Critical	
				1. I make friends easily.	0	1	2	0	1	2
				2. I say nice things to others when they have done something well.	0	1	2	0	1	2
				3. I ask adults for help when other children try to hit me or push me around.	0	1	2	0	1	2
				4. I am confident on dates.	0	1	2	0	1	2
				5. I try to understand how my friends feel when they are angry, upset, or sad.	0	1	2	0	1	2
				6. I listen to adults when they are talking with me.	0	1	2	0	1	2
				7. I ignore other children when they tease me or call me names.	0	1	2	0	1	2
				8. I ask friends for help with my problems.	0	1	2	0	1	2
				9. I ask before using other people's things.	0	1	2	0	1	2
				10. I disagree with adults without fighting or arguing.	0	1	2	0	1	2
				11. I avoid doing things with others that may get me in trouble with adults.	0	1	2	0	1	2
				12. I feel sorry for others when bad things happen to them.	0	1	2	0	1	2
C	A	E	S	SUMS OF HOW OFTEN COLUMNS.						

FOR OFFICE USE ONLY					Social Skills (cont.)			How Often?			How Important?		
								Never	Sometimes	Very Often	Not Important	Important	Critical
C	A	E	S										
				13. I do my homework on time.	0	1	2	0	1	2	0	1	2
				14. I keep my desk clean and neat.	0	1	2	0	1	2	0	1	2
				15. I do nice things for my parents like helping with household chores without being asked.	0	1	2	0	1	2	0	1	2
				16. I am active in school activities such as sports or clubs.	0	1	2	0	1	2	0	1	2
				17. I finish classroom work on time.	0	1	2	0	1	2	0	1	2
				18. I compromise with parents or teachers when we have disagreements.	0	1	2	0	1	2	0	1	2
				19. I ignore classmates who are clowning around in class.	0	1	2	0	1	2	0	1	2
				20. I ask someone I like for a date.	0	1	2	0	1	2	0	1	2
				21. I listen to my friends when they talk about problems they are having.	0	1	2	0	1	2	0	1	2
				22. I end fights with my parents calmly.	0	1	2	0	1	2	0	1	2
				23. I give compliments to members of the opposite sex.	0	1	2	0	1	2	0	1	2
				24. I tell other people when they have done something well.	0	1	2	0	1	2	0	1	2
				25. I smile, wave, or nod at others.	0	1	2	0	1	2	0	1	2
				26. I start conversations with opposite-sex friends without feeling uneasy or nervous.	0	1	2	0	1	2	0	1	2
				27. I accept punishment from adults without getting mad.	0	1	2	0	1	2	0	1	2
				28. I let friends know I like them by telling or showing them.	0	1	2	0	1	2	0	1	2
				29. I stand up for my friends when they have been unfairly criticized.	0	1	2	0	1	2	0	1	2
				30. I invite others to join in social activities.	0	1	2	0	1	2	0	1	2
				31. I use my free time in a good way.	0	1	2	0	1	2	0	1	2
				32. I control my temper when people are angry with me.	0	1	2	0	1	2	0	1	2
				33. I get the attention of members of the opposite sex without feeling embarrassed.	0	1	2	0	1	2	0	1	2
				34. I take criticism from my parents without getting angry.	0	1	2	0	1	2	0	1	2
				35. I follow the teacher's directions.	0	1	2	0	1	2	0	1	2
				36. I use a nice tone of voice in classroom discussions.	0	1	2	0	1	2	0	1	2
				37. I ask friends to do favors for me.	0	1	2	0	1	2	0	1	2
				38. I start talks with classroom members.	0	1	2	0	1	2	0	1	2
				39. I talk things over with classmates when there is a problem or an argument.	0	1	2	0	1	2	0	1	2
C	A	E	S	SUMS OF HOW OFTEN COLUMNS			Stop. Please check to be sure all items have been marked.						

Appendix K  
Social Skills Rating System - Teacher Form

Next, read each item on pages 2 and 3 (items 1 - 42) and think about this student's behavior during the past month or two. Decide **how often** the student does the behavior described.

- If the student **never** does this behavior, circle the 0.
- If the student **sometimes** does this behavior, circle the 1.
- If the student **very often** does this behavior, circle the 2.

For items 1 - 30, you should also rate **how important** each of these behaviors is for success in *your* classroom.

- If the behavior is **not important** for success in your classroom, circle the 0.
- If the behavior is **important** for success in your classroom, circle the 1.
- If the behavior is **critical** for success in your classroom, circle the 2.

Here are two examples:

	How Often?				How Important?		
	Never	Sometimes	Very Often		Not Important	Important	Critical
Shows empathy for peers.	0	1	(2)		0	(1)	2
Asks questions of you when unsure of what to do in schoolwork.	0	(1)	2		0	1	(2)

*This student **very often** shows empathy for classmates. Also, this student **sometimes** asks questions when unsure of schoolwork. This teacher thinks that showing empathy is **important** for success in his or her classroom and that asking questions is **critical** for success.*

**Please do not skip any items.** In some cases you may not have observed the student perform a particular behavior. Make an estimate of the degree to which you think the student would probably perform that behavior.

FOR OFFICE USE ONLY			Social Skills	How Often?				How Important?		
C	A	S		Never	Sometimes	Very Often		Not Important	Important	Critical
			1. Produces correct schoolwork.	0	1	2		0	1	2
			2. Keeps his or her work area clean without being reminded.	0	1	2		0	1	2
			3. Responds appropriately to physical aggression from peers.	0	1	2		0	1	2
			4. Initiates conversations with peers.	0	1	2		0	1	2
			5. Volunteers to help peers on classroom tasks.	0	1	2		0	1	2
			6. Politely refuses unreasonable requests from others.	0	1	2		0	1	2
			7. Appropriately questions rules that may be unfair.	0	1	2		0	1	2
			8. Responds appropriately to teasing by peers.	0	1	2		0	1	2
			9. Accepts peers' ideas for group activities.	0	1	2		0	1	2
			10. Appropriately expresses feelings when wronged.	0	1	2		0	1	2
			11. Receives criticism well.	0	1	2		0	1	2
			12. Attends to your instructions.	0	1	2		0	1	2
			13. Uses time appropriately while waiting for your help.	0	1	2		0	1	2
			14. Introduces himself or herself to new people without being told to.	0	1	2		0	1	2
			15. Compromises in conflict situations by changing own ideas to reach agreement.	0	1	2		0	1	2
C	A	S	SUMS OF HOW OFTEN COLUMNS							

FOR OFFICE USE ONLY How Often?			Social Skills (cont.)			How Often?			How Important?		
C	A	S		Never	Sometimes	Very Often	Not Important	Important	Critical		
			16. Acknowledges compliments or praise from peers.	0	1	2	0	1	2		
			17. Easily makes transition from one classroom activity to another.	0	1	2	0	1	2		
			18. Controls temper in conflict situations with peers.	0	1	2	0	1	2		
			19. Finishes class assignments within time limits.	0	1	2	0	1	2		
			20. Listens to classmates when they present their work or ideas.	0	1	2	0	1	2		
			21. Appears confident in social interactions with opposite-sex peers.	0	1	2	0	1	2		
			22. Invites others to join in activities.	0	1	2	0	1	2		
			23. Controls temper in conflict situations with adults.	0	1	2	0	1	2		
			24. Ignores peer distractions when doing class work.	0	1	2	0	1	2		
			25. Stands up for peers when they have been unfairly criticized.	0	1	2	0	1	2		
			26. Puts work materials or school property away.	0	1	2	0	1	2		
			27. Appropriately tells you when he or she thinks you have treated him or her unfairly.	0	1	2	0	1	2		
			28. Gives compliments to members of the opposite sex.	0	1	2	0	1	2		
			29. Complies with your directions.	0	1	2	0	1	2		
			30. Responds appropriately to peer pressure.	0	1	2	0	1	2		
C	A	S	SUMS OF HOW OFTEN COLUMNS								

FOR OFFICE USE ONLY How Often?		Problem Behaviors		How Often?		
E	I		Never	Sometimes	Very Often	
		31. Likes to be alone.	0	1	2	
		32. Fights with others.	0	1	2	
		33. Is easily embarrassed.	0	1	2	
		34. Argues with others.	0	1	2	
		35. Threatens or bullies others.	0	1	2	
		36. Talks back to adults when corrected.	0	1	2	
		37. Has temper tantrums.	0	1	2	
		38. Appears lonely.	0	1	2	
		39. Gets angry easily.	0	1	2	
		40. Shows anxiety about being with a group of children.	0	1	2	
		41. Acts sad or depressed.	0	1	2	
		42. Has low self-esteem.	0	1	2	
E	I	SUMS OF HOW OFTEN COLUMNS				

Do not make  
importance ratings  
for items 31 - 42

Go on to  
Page 4. ➡

## Academic Competence

The next nine items require your judgments of this student's academic or learning behaviors as observed in your classroom. Compare the student with other children who are in the same classroom.

Rate all items using a scale of 1 to 5. Circle the number that best represents your judgment. The number 1 indicates the lowest or least favorable performance, placing the student in the lowest 10% of the class. Number 5 indicates the highest or most favorable performance, placing the student in the highest 10% compared with other students in the classroom.

FOR OFFICE USE ONLY		Lowest 10%	Next Lowest 20%	Middle 40%	Next Highest 20%	Highest 10%
	43. Compared with other children in my classroom, the <b>overall academic performance</b> of this child is:	1	2	3	4	5
	44. In <b>reading</b> , how does this child compare with other students?	1	2	3	4	5
	45. In <b>mathematics</b> , how does this child compare with other students?	1	2	3	4	5
	46. In terms of grade-level expectations, this child's skills in <b>reading</b> are:	1	2	3	4	5
	47. In terms of grade-level expectations, this child's skills in <b>mathematics</b> are:	1	2	3	4	5
	48. This child's <b>overall motivation</b> to succeed academically is:	1	2	3	4	5
	49. This child's <b>parental encouragement</b> to succeed academically is:	1	2	3	4	5
	50. Compared with other children in my classroom this child's <b>Intellectual functioning</b> is:	1	2	3	4	5
	51. Compared with other children in my classroom this child's <b>overall classroom behavior</b> is:	1	2	3	4	5
AC	SUM OF COLUMN					

**Stop. Please check to be sure all items have been marked.**

FOR OFFICE USE ONLY

SUMMARY								
SOCIAL SKILLS			PROBLEM BEHAVIORS			ACADEMIC COMPETENCE		
<b>HOW OFTEN?</b> TOTAL (sums from p. 2) (sums from p. 3)			<b>HOW OFTEN?</b> TOTAL (sums from page 3)			<b>RATING</b> TOTAL (sum from page 4)		
<b>BEHAVIOR LEVEL</b> (see Appendix A) Fewer Average More			<b>BEHAVIOR LEVEL</b> (see Appendix A) Fewer Average More			<b>COMPETENCE LEVEL</b> (see Appendix A) Below Average Above		
C + =	[ ]	[ ]	E	[ ]	[ ]	Total AC	[ ]	[ ]
A + =	[ ]	[ ]	I	[ ]	[ ]			
S + =	[ ]	[ ]	Total (E + I)	[ ]	[ ]			
Total (C + A + S)	[ ]	[ ]						
(see Appendix B) Standard Score [ ] Percentile Rank [ ]			(see Appendix B) Standard Score [ ] Percentile Rank [ ]			(see Appendix B) Standard Score [ ] Percentile Rank [ ]		
(see Appendix E) SEM + Confidence Level 68% [ ] 95% [ ]			(see Appendix E) SEM + Confidence Level 68% [ ] 95% [ ]			(see Appendix E) SEM + Confidence Level 68% [ ] 95% [ ]		
Confidence Band (standard scores) [ ] to [ ]			Confidence Band (standard scores) [ ] to [ ]			Confidence Band (standard scores) [ ] to [ ]		

Note: To obtain a detailed analysis of this student's Social Skills strengths and weaknesses, complete the Assessment-Intervention Record.

## Appendix L

### Self-Reported Delinquency Scale - A



<b>The Self-Reported Delinquency Scale - A</b> (adapted from Arnold, 1965)
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The following sentences talk about some activities that you may have participated in. For each of the following activities, circle the statement that tells whether you have participated in it **DURING THE LAST SIX MONTHS**, "none of the time", "one or two times", "three or four times", "five to ten times", or "more than ten times". **READ EACH SENTENCE CAREFULLY.** Answer honestly. Thank you.

1. Walked on some grass, yards, or fields where you weren't suppose to walk	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
2. Marked with a pen, pencil, knife or chalk on walls, sidewalks, or desks	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
3. Threw eggs, tomatoes, garbage or anything else like this at any person, house, or building	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
4. Broke some windows on purpose	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
5. Broken down anything such as fences, a flower bed, or a clothes line	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
6. Put paint on anything you weren't suppose to be putting paint on	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
7. Broken out any light bulbs on the street or elsewhere	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
8. Let the air out of somebody's tires	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
9. Taken little things (worth less than \$2) that you were not suppose to take	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
10. Taken things from somebody else's desk or locker at school that the person would not want you to take	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
11. Taken things of value (between \$2 and \$50) that you were not suppose to take	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
12. Taken a car for a ride without the owner's permission	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10

13. Taken things of large value (over \$50)	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
14. Disobeyed your parents	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
15. Purposely did mean things to someone to get back at them for something they had done to you	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
16. Had a fight with one other person in which you hit each other or wrestled	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
17. Disobeyed teachers, school officials, or other adults who told you what to do	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
18. Defied your parents' authority to their face	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
19. Made anonymous phone calls just to annoy the people you were calling	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
20. Beat up anybody in a fight	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
21. Signed somebody else's name other than your own name as an excuse for absence from school	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
22. Got into a fight with another person where you used a weapon of any kind to hurt them	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
23. Used a weapon of any kind in order to make someone do what you wanted them to do	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
24. Broke into somebody's house without their permission	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
25. Picked on someone else by teasing them, threatening them, or pushing them around	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10
26. Disobeyed, lied to, or ran from the police in order to avoid getting into trouble for something	None	1 or 2 times	3 or 4 times	5 to 10 times	More than 10