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# Adult Perceptions of Children's Relational and Physical Aggression as a Function of Adult Ethnicity and Child Gender

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**ADULT PERCEPTIONS OF CHILDREN'S RELATIONAL AND PHYSICAL  
AGGRESSION AS A FUNCTION OF ADULT ETHNICITY AND CHILD  
GENDER**

A Dissertation Presented

by

SHARICE ANGEL BROWN

Submitted to the Graduate School of the  
University of Massachusetts Amherst in partial fulfillment  
of the requirements for the degree of

DOCTOR OF PHILOSOPHY

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Clinical Psychology Program

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## **DEDICATION**

To my loving, understanding, dependable mother, Ruby M. Brown, without your encouragement and guidance this would not have been possible

And to my very supportive friends and family, I hope I have made you proud.

Finally to my very best friend in the world and future husband, Michael Jason Fontaine, I love you and thank you for bearing with me through these years

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## **ABSTRACT**

### **ADULT PERCEPTIONS OF CHILDREN'S RELATIONAL AND PHYSICAL AGGRESSION AS A FUNCTION OF ADULT ETHNICITY AND CHILD GENDER**

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This study examined how emotion and discipline differed in response to children's relational and physical aggression in African American and European American women. Affective (e.g., concern) and discipline responses of adults toward physical aggression have been linked with children's behavior problems. However, these reactions have not been explored as a function of ethnicity and only little examined as a function of gender. Even less is known about reactions toward relational aggression. Better knowledge about adult perceptions of children's aggressive behaviors could improve theoretical understanding of the development of these problems, and guide efforts at improving treatments. In the present study, hypothetical vignettes depicting a boy or a girl engaging in physical and relational aggression were used to assess how participants report they would respond to such behaviors in their own children. Consistent with initial hypotheses, adults were more concerned and embarrassed about physical aggressive behavior among children than relationally aggressive behaviors. Additionally, adults were more lax for relational aggression and more overreactive toward physical aggression. Adult behavioral responses toward relational aggression

were more likely to include discussion and they were more likely to provide a consequence for physical aggression (i.e., adults displayed more reparation and reprimands for physical aggression). With respect to ethnicity, African Americans generally reacted more strongly to aggression, though European Americans made more reparation responses than African Americans for physical aggression. With regard to gender, participants were more overreactive to boys being relationally aggressive than girls and less overreactive to boys being physically aggressive than girls, and this finding appeared to be largely accounted for by African American participants. Results point to the need for psychoeducation regarding the seriousness of relational aggression.

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## CHAPTER 1

### INTRODUCTION

Despite a large literature on aggression in general, and on physical aggression in particular, there is more to be learned about aggression, including about specific types of aggressive behaviors and their relationship to parenting. The majority of the aggression literature has focused primarily on boys and physical aggression. There is a relatively small amount of information about an important form of aggression, relational aggression, a type of aggressive behavior that has recently come into the limelight (see Crick & Grotpeter, 1995). Relational aggression is defined as behaviors that are intended to damage another's relationships or feelings of inclusion by a group. It is characterized by manipulation and power, using social relationships as the mechanism to harm others. Examples include purposefully withdrawing friendship, spreading rumors, and gossiping. Unlike other disruptive behavior problems, such as physical aggression, relational aggression is disproportionately seen in females (Crick, 2003), who have been understudied in previous aggression research.

Although relational aggression research is in its early stages, associations have been demonstrated between relational aggression and detrimental child outcomes, including poor social skills, poor academic progress, mental health problems, and involvement in crime (e.g., Coie & Dodge, 1998; Crick, 1997; Crick et al., 1999; Dodge & Crick, 1990). Relationally aggressive children are significantly more rejected, lonely, depressed, and isolated, compared to non-relationally aggressive children (Crick & Grotpeter, 1995). Children who engage in high levels of relational aggression are also more likely to experience other concurrent externalizing problems (Crick & Grotpeter,

1995). Relational aggression appears to be a stable trait that has long-term and serious detrimental effects on children's social-psychological adjustment (Crick, 1996). Werner and Crick (1999) found that relational aggression in adulthood is associated with higher levels of peer rejection and antisocial personality features, and lower levels of prosocial behavior. Relational aggression is more common among girls and may possibly have worse effects. Crick (1996) found that relationally aggressive girls become more rejected by peers over time. Relational aggression has also been linked with borderline personality disorder and bulimia in adults, particularly among women (Werner & Crick, 1999). This evidence suggests the need for more research examining relational aggression as well as girls' mental health problems in general.

### **Gender and Social-Psychological Adjustment: The Problem of Invisible Girls**

Despite these findings from the relational aggression literature, there is still relatively little knowledge about the behavioral antecedents of social maladjustment for girls, in particular for aggressive behavior (Coie, Dodge, Kupersmidt, 1990). For example, despite the fact that crime among juvenile females has increased in recent years, little is known about the development and precursors of female delinquent behavior (Hipwell et al., 2002). More generally, aggression research has not adequately addressed the problems of girls. Research has tended to focus on more overt forms of peer maltreatment and aggression (e.g., hitting, biting, pushing, verbal threats), which may be more characteristic of boys than girls, particularly during elementary school (See Crick et al., 2001; Owens, Slee, & Shute, 2000).

Not only have girls' problems been under-researched, girls' problems in general have been under-recognized by adults. For example, girls are at increased risk for

internalizing problems. Given that internalizing problems are less visible to adults, the difficulties of girls tend to be overlooked (Arnold & Doctoroff, 2003; Keenan & Shaw, 1997; Stowe, Arnold, & Ortiz, 2000). Additionally, the primary focus on physical aggression and victimization has resulted in the failure to identify children who are victims of relational aggression (Schäfer, Werner, & Crick, 2002).

Moreover, research on gender, parenting, and relational aggression have produced mixed and somewhat puzzling patterns of findings with respect to child gender. A number of studies have found that parental predictors of relational aggression are stronger in boys than girls (See Crick, 2003; Hart, Nelson, Robinson, Olsen, & McNeilly-Choque, 1998; Nelson & Crick, 2002). In contrast, however, other studies have found stronger predictors for girls (Yang et al., 2004).

In sum, despite clear evidence that relational aggression is important, not enough is known about the etiological factors associated with this type of aggression. Compared to research on physical aggression, relational aggression research is in its infancy. Theory and empirical evidence suggests that parents influence the development of aggressive behaviors, and that adult responses to aggression play a significant role in the development and maintenance of problem behaviors.

### **Parenting and Physical Aggression**

With respect to physical aggression, an extensive research literature links parent-child relationships and interactions to child outcomes, documenting that parenting has a substantial effect on behavior problems, and that behavior problems, in turn, influence parenting. Anger and overreactive discipline strategies (e.g., use of force) by parents are associated with physical aggression in children (Dishion, 1990; Nelson, Nelson, Hart,

Yang, & Jin, 2006; Patterson & Stouthamer-Loeber, 1984; Strassberg, Dodge, Pettit, & Bates, 1994). Maternal overreactivity and children's disruptive behaviors have been associated with correlations as high as .69 (Arnold, O'Leary, Wolff, & Acker, 1993). Patterson (1996) showed that elevated levels of coercive interactions predict the development of antisocial behavior in childhood and adolescence, and parents of clinically disruptive children are more controlling and critical than parents of children without problems (e.g., Robinson & Eyberg, 1981; Webster-Stratton, 1985).

Just as overreactive parenting has been linked to disruptive behaviors, so has lax (very permissive) parenting (e.g., Baumrind & Black, 1967; O'Leary, 1995; Patterson, Bank, & Stoolmiller, 1990). Baumrind's classic work on parenting styles indicated a relationship between permissive parenting and disruptive behavior problems (e.g., Baumrind & Black, 1967). Patterson (1986) documented that when parents fail to follow through with commands, they reinforce children's noncompliance, thus increasing the chance that disobedience will reoccur. Mothers of children with clinical levels of disruptive behavior problems are significantly more lax with their children than other mothers (e.g., Arnold et al., 1993).

### **Parenting and Relational Aggression**

Much less is known about the relationship between parenting and relational aggression. Studies that have been conducted support the idea that parenting is important (Brown, Arnold, Dobbs, Doctoroff, 2007). Brown and colleagues (2007) found that positive maternal affect predicted less relational aggression, negative maternal affect predicted more relational aggression, and maternal laxness was associated with relational aggression in girls but not boys. Hart and colleagues (1998) surveyed Russian mothers,

and found that less maternal responsiveness and more coercion predicted relational aggression. Finally, Linder, Crick, and Collins (2002) found that mothers' alienation predicted romantic relational aggression in college students, suggesting that parenting might be linked to relational aggression, and have extended effects. In sum, these studies suggest that parenting is linked to relational aggression. However, more such studies of parenting and relational aggression are needed.

### **Parental Reactions to Physical and Relational Aggression**

Given the importance of parenting in the development and maintenance of aggression, understanding influences on parenting is critical. Parenting practices are thought to be influenced in part by parental reactions to children's misbehavior. Theory suggests that parental concern about aggression would be a prerequisite to parents taking action to address such behaviors, whereas negative emotions such as embarrassment might interfere with effective parenting by leading to overreactive parenting. Some empirical evidence supports this theory. Coplan, Hastings, Legacé-Séguin, and Moulton (2002) found that in situations depicting children's negative behaviors (aggression, misbehavior, and shyness), authoritarian mothers were more likely to respond with greater anger and embarrassment. Bondy and Mash (1999) found that oppositional misbehaviors of children elicited reports of significantly greater negative affect and significantly greater likelihood of using both coercion and reasoning than inattentive and hyperactive child behaviors. Dix and Lochman (1990) found that mothers of aggressive boys made more negative attributions and reported stronger negative affect than did mothers of nonaggressive boys.

It is possible that one reason relational aggression has not been adequately addressed is that it is not viewed as serious. The prevalence of relational aggression has been reported as high as 74.8% among girls (Hipwell et al., 2002; Sullivan, Farrell, & Kliewer, 2006). Despite its frequency, there are no intervention or prevention programs that target relational aggression, in contrast to a large number of programs that target physical aggression (e.g., Burke, Herron, & Barnes, 2006; Webster-Stratton, 2001; Webster-Stratton & Hancock, 1998). If parents do not view relational aggression as serious, they may not address these behaviors, and this laxness may lead to the continuation or exacerbation of relational aggression. However, this possibility remains speculative, because research has not compared concern about physical and relational aggression.

In perhaps the closest research, Werner, Senich, and Przepyszny (2006) found that mothers reported feeling more upset, angry, and sad in reaction to physical aggression as compared to relational aggression. Additionally, mothers reported they would intervene more in situations involving physical aggression as compared to relational aggression. However, it is problematic that this study did not examine the effects of ethnicity. Risser (2004) found that physical aggression was viewed as being more cruel than relational aggression by mothers of school-age children. While another study found that physical aggression was more likely to be perceived by parents as “bullying” behavior than relational aggression (Stockdale, Haungaduambo, Duys, Larson, & Sarvela, 2002; See also Colwell, Mize, Pettit, & Laird, 2002). Wenger, Berg-Cross, and Berg-Cross (1980) found that physically aggressive behavior was rated as more serious than verbal aggression. Additionally, Dodge, Petit, and Bates (1994) found that parents were more

likely to respond to physically aggressive behaviors than teasing or other verbal types of aggression. However, this research did not include an examination of relational aggression and did not examine the effects of gender or ethnicity. Mills and Rubin (1990) found that for physical aggression, the predominant affective response of mothers was concern, followed by anger, disappointment, and embarrassment, and that physical aggression elicited stronger affective responses than social withdrawal. Mothers reported that they would use more high- to moderate-power discipline strategies, more directive, and more coercive parenting in response to physical aggression. With aggressive behavior, mothers were more likely to choose directive or coercive strategies when these behaviors made them feel angry, disappointed and embarrassed. Again, this study did not examine the influence of ethnicity and did not examine differential reactions to physical and relational aggression. Given the paucity of literature on the relationship between parental reactions and physical and relational aggression, further investigation is warranted.

### **Gender, Parenting and Physical Aggression**

Not only might there be a link between parenting reactions and parenting practices, there is also indirect evidence that parents' reactions toward aggression and in turn, their discipline, is moderated by child gender, and may be a factor in gender differences in problem types. Kim, Arnold, Fisher and Zeljo (2005) found evidence that parents may be more reactive to children who display behaviors that are incongruent with what is socially expected based on the gender of the child. Mills and Rubin (1990) found that mothers reported stronger emotional responses to girls' physically aggressive behaviors than boys' physically aggressive behaviors, and fathers were more likely to

respond to aggressive behaviors in their daughters than their sons. Hastings and Coplan (1999) found that mothers of sons were more accepting of physical aggressive than were mothers of daughters. These findings point to socialization practices, in terms of reactions to problem behaviors, as one possible influence on gender difference in aggression patterns. However, studies have not examined differences in parent reactions to relational aggression as a function of child gender.

### **Ethnicity, Parenting, and Physical Aggression**

Despite theories that suggest that cultural factors may play a significant role in parenting practices, there is a paucity of research that has examined cultural differences in parental concern about aggressive behavior (Coard, Wallace, Stevenson, & Brotman, 2004). Although research has included diverse samples, little has been done in answering the question of what differences or similarities may exist in different ethnic populations with respect to reactions to aggressive behavior of children. Pagano, Hirsch, Deutsch, and McAdams (2002) explored parental socialization practices as they related to race among African American and European American mothers and fathers. Higher levels of social concern and other-oriented themes were observed among African American parents whereas a higher prevalence of individualistic themes was observed among European Americans. Subsequently, how parents think about physical or severe discipline and its purpose as a socialization strategy may differ for African Americans and European Americans (e.g., Deater-Deckard & Dodge, 1997; Garcia Coll, 1990; Gershoff, 2002; Giles-Sims & Lockhart, 2005; Jackson, 1997; Kelley, Power, & Wimbush, 1992; McLoyd, Cauce, Takeuchi, & Wilson, 2000; Ogbu, 1981). For example, ethnic differences have been found in parents' acceptance of spanking (Heffer

& Kelley, 1987). Fewer European Americans, middle-upper income parents rated spanking as acceptable than did low income whites, low income African Americans, and middle-upper income African Americans.

With respect to parenting and disruptive behavior problems, including physical aggression, studies have included ethnically diverse samples, but too few have directly examined ethnic differences (Forehand & Kotchick, 1996). The limited research that has examined ethnic differences supports their importance. Pinderhughes, Dodge, Bates, Petit, and Zelli (2000) examined harsh discipline responses of parents to hypothetical vignettes depicting children engaged in misbehavior. African American parents described harsher discipline than did European Americans. However, the relationship between parents' descriptions of harsh discipline and their children's disruptive behavior problems was stronger in European American than African American families. Similarly, Deater-Deckard, Dodge, Bates, and Petit (1996) found that parental use of physical discipline was associated with higher levels of disruptive behavior behaviors among European American children, but not among African American children, regardless of socioeconomic status (see also Cardona, Nicholson, & Fox, 2000; Kilgore, Snyder, & Lentz, 2000; Pinderhughes et al., 2000). Additionally, African American mothers have reported greater use of physical discipline than European American mothers (Deater-Deckard et al., 1996). African American parents also have displayed more punitive attitudes toward their children (e.g., Reis, Barbera-Stein, & Bennett, 1986). Lansford and colleagues (2005) interviewed mothers and their children from China, India, Italy, Kenya, the Philippines and Thailand. They found country differences in how normative as well as in the prevalence of usage of physical discipline in these countries.

Despite these differences, physical discipline was consistently associated with negative child outcomes. However, how normative physical discipline was did moderate the link between physical discipline and children's aggression, with stronger associations in countries where physical aggression was less normative. These findings point to the importance of considering ethnicity in understanding parenting and disruptive behavior.

### **Ethnicity, Parenting, and Relational Aggression**

Similar to physical aggression, the research on relational aggression, parenting, and ethnicity is limited. I know of no studies directly examining ethnicity as it relates to concern about relational aggression. There is emerging evidence that points to possible ethnic differences in relational aggression (for an excellent review see Nelson et al., 2006). For example, David and Kistner (2000) found that African American children held more positive perceptions of their social acceptance than Caucasian children. Phillipson, Deptula, and Cohen (1999) found that members of African American friendship pairs had more friends, but also engaged in more relational aggression than European American or mixed-race pairs. There are also international studies that suggest that ethnicity may play a factor in the relationship between parenting and relational aggression (See Crick, 1997; Russell, Hart, Robinson, & Olsen, 2003; Schäfer, et al., 2002; Tomada & Schneider, 1997). These studies point to the importance of considering ethnic and cultural factors in understanding the development of relational aggression, but no research has explicitly examined ethnic differences in reactions to children's relational aggression.

## **The Present Study**

The present study examined the relationship between adult affective responses (i.e., concern and embarrassment), and discipline towards relational and physical aggression, and how these varied as a function of child gender and participant ethnicity. The underlying model for my hypotheses was that adult affective responses toward aggression were linked with how adults discipline these problem behaviors. There were four main questions that this study hoped to address.

### **Emotion about Relational and Physical Aggression**

The first question was in regards to how concerned adults would be about relational aggression displayed by children, compared to physical aggression. It was my hypothesis that adults would be less concerned and embarrassed about relational aggression compared to physical aggression.

### **Gender, Emotion, and Relational and Physical Aggression**

The second question this study hoped to answer was whether the relationship between level of concern and type of aggression differed as a function of child gender. It was my hypothesis that the relationship between level of concern and the type of aggression would be moderated by child gender. I expected that adults would be more concerned and embarrassed about gender incongruent behavior. Thus, I predicted that adults would be more concerned and embarrassed about physical aggression in girls than in boys, and more concerned and embarrassed about relational aggression in boys than in girls.

### **Ethnicity, Emotion, and Relational and Physical Aggression**

The third question was whether concern about aggression differed as a function of ethnicity and whether gender patterns would hold across ethnic groups. I predicted that African Americans would display a higher level of concern and embarrassment about physical aggression and relational aggression than European Americans. This was based on the cultural and historical factors of African American families and their reported higher levels of social concern and other-oriented themes, as well as reports of African American parents being more punitive in their discipline. It is also hypothesized that African Americans would show larger gender differences than European Americans. This is based on the literature on African American families that indicates that African American girls receive more strict discipline within African American families than boys, due to seemingly less obstacles as well as less severe societal consequences for African American women expressing femininity as compared to African American men expressing masculinity. Thus, gender difference within the African American family tend to be a result parental perceptions of the opportunity structure their children are exposed to, with African American women seemingly having the greater opportunity for advancement economically and intellectually (Hill & Sprague, 1999; Hill, 2001).

### **Discipline in Response to Relational and Physical Aggression**

The fourth and final question I examined was the types of disciplinarian actions that would be taken, if any, in dealing with these behaviors. First, descriptive information will be presented on the frequency and types of discipline responses that participants report that they would use. Second, it was my hypothesis that relational aggression would receive less discipline than physical aggression. Third, I predicted that

parents would be more likely to talk about relational than physical aggression with their children. Fourth, parents would be more likely to provide a consequence for physical aggression. Fifth, I predicted that physical aggression would elicit more overreactivity and less laxness than relational aggression. With respect to gender, it was my hypothesis that parental discipline would be more overreactive and less lax to physical aggression displayed by girls than displayed by boys. Conversely, it was my hypothesis that parental discipline would be less overreactive and more lax to relational aggression displayed by girls than displayed by boys. With respect to ethnicity, it was tentatively predicted that African American parents overall would be more overreactive and less lax compared to European American parents in response to both types of aggression, given their hypothesized stronger reactions to problem behaviors.

## CHAPTER 2

### METHOD

#### Participants

Participants were 592 female undergraduate students attending the University of Massachusetts in Amherst. Participants were at least 18 years of age and included students of African American descent ( $n = 82$ ) and European American descent ( $n = 510$ ). Participants were students enrolled in classes offered through the Psychology Department at the University of Massachusetts in Amherst. Participants ranged in age from 18 – 43 years old ( $M = 19.82$  years,  $SD = 1.64$ ).

The parental education breakdown for all participants is presented according to the highest degree obtained by either of the parents of the participants. The parental education breakdown for all participants was as follows: 23.99% of participants had a parent who completed an advanced degree beyond college, 26.94% of participants had a parent that completed a four-year college degree, 23.65% of participants had a parent that completed a vocational degree or some college, 22.21% of participants had a parent that completed high school or a high school equivalency exam, and 3.21% of participants had a parent that did not receive a high school diploma. European American participants reported significantly higher levels of both maternal and paternal parental education than African American participants (Mothers' Education:  $t(590) = -2.87, p < .01$ ; Fathers' Education:  $t(590) = -2.87, p < .01$ ).

#### Procedure

Participants were recruited through the EXPERIMENTRAK and SONA systems through the Department of Psychology at UMass-Amherst. Both EXPERIMENTRAK

and SONA were on-line systems by which participants could sign-up to participate in experiments to obtain extra credit in their courses. Participants completed a questionnaire adapted from Hastings and Rubin (1999) with 4 vignettes depicting children engaging in physically aggressive (2 vignettes) and relationally aggressive (2 vignettes) behaviors in same-sex interactions. Participants were randomly assigned to receive vignettes depicting a boy or a girl as their hypothetical child. Of the 592 participants, 54.05% ( $n = 320$ ) received vignettes depicting a male child engaging in physical and relational aggression, and 45.95% ( $n = 272$ ) received vignettes depicting a girl engaged in physical and relational aggression. The order of the relationally aggressive vignettes and physically aggressive vignettes were counterbalanced. After reading each vignette, the participant was asked to respond to questions designed to assess their concern, embarrassment, and discipline reactions to the vignette. Additionally, participants were asked to answer one open-ended question about how they would behaviorally respond to the child's behavior for each vignette. (See Appendix A).

### **Measures**

*Vignettes.* Four vignettes describing relational aggression and four describing physical aggression were created and piloted to verify that the behaviors depicted seemed reasonable. The relationally aggressive behaviors were: a child saying "Don't let her sit next to us on the bus."; choosing not to give a valentine to another child with whom they are upset; ignoring another child; stating that they won't invite another child to their birthday party, if they do not give them a crayon. The physically aggressive behaviors were: throwing a ball to hit another child on purpose; hitting another child; snatching a ball from another child and pushing the child down; threatening to punch another child if

they do not let them play a game. (See Appendix A). Each participant received four vignettes (2 of each type) from this pool of eight; thus different people read different vignettes, to reduce the influence of any particular scenario. Because packets varied with respect to the vignettes chosen, the order of the aggression type, and the child's gender, eight different questionnaire packets were developed.

Each participant received vignettes depicting the same hypothetical child (either a boy or girl). Each participant answered questions about a girl named Ann or a boy named Michael. In each vignette Ann or Michael were depicted engaging in various behaviors with different, same-sex children named Mark, Michael, David, Charles, Jason, Brian, Scott, Ann, Jennifer, Michelle, Marie, Sarah, and Susan. These names were chosen to be gender-specific and common among both African American and European American families.

*Concern.* Concern was assessed with one self-rated question about the reactions of the participants. Participants rated the extent to which they would feel concerned, on a 1-6 likert scale with 6 being “very strong” and 1 being “Not at all.”

*Embarrassment.* Participants rated how embarrassed they would be if they observed their child engaging in the depicted behavior, on the same 6-point likert scale.

*Overreactivity.* Overreactivity was measured using three items from the Overreactivity Subscale of the Parenting Scale (Arnold et al., 1993). The items chosen from this scale were: “When my child misbehaves...(1) I get so frustrated or angry that my child can see I'm upset; (2) I raise my voice or yell; and (3) I spank, grab, slap, or hit my child most of the time.” For the purposes of this study, the stems were changed to “If my son/daughter were to behave this way I would...” (The opposite ends of these items

are given in the appendix.) These items were chosen based on their factor loadings on this subscale (ranging from .62 - .77; Arnold et al., 1993) as well as the feasibility of the questions for the purposes of this study. Reliability alphas for the entire overreactivity subscale of the Parenting Scale have been reported as high as .82 (Arnold et al., 1993). Alpha for the current study was .59 for the physical vignettes and .65 for the relational vignettes. This measure has also been shown to demonstrate good validity (Arnold et al., 1993).

*Laxness.* Laxness was measured using three items from the Laxness subscale of the Parenting Scale (Arnold et al., 1993). The items chosen from this scale were: “(1) When my child does something I don’t like, I often let it go; (2) When my child won’t do what I ask, I often let it go or end up doing it myself; and (3) When my child misbehaves...I coax or beg my child to stop.” For the purposes of this study, the stems were changed to “If my son/daughter were to behave this way I would...” (The opposite ends of these items are given in the appendix.) These items were chosen based on their factor loadings on this subscale (ranging from .57 - .70; Arnold et al., 1993) as well as the feasibility of the questions for the purposes of this study. Reliability for the entire laxness subscale of the Parenting Scale has reported alphas as high as .83 and has demonstrated good test-retest reliability. Alpha for the current study was .71 for the physical vignettes and .70 for the relational vignettes. This measure has also been shown to demonstrate good validity (Arnold et al., 1993). (See Appendix)

*Open-ended question about adult behavioral responses.* The open-ended question of the questionnaire was designed to obtain additional information about their responses to relational and physical aggressive behaviors. The open-ended question asked the

participant to describe what they would do, if anything, in response to the behavior of the child in the vignettes. Four trained undergraduate coders coded the responses for the number of techniques they said they would use as well as the type of technique. Four types of coded responses were evaluated in the current study: problem solving, information seeking, reparation, and reprimands. Examples of open-ended responses included: “I would try to help her to understand that when you are mad at someone you should try to work things out with them rather than trying to upset them since that will only make the situation worse. I would ask her why she is mad at her friend and if there is something to do besides not giving her friend a Valentine’s Day card that would help her friend understand why she is mad at her.” (Problem Solving); “I would want to talk to her to understand her behavior. I would ask her why she said and behaved the way she did.” (Information Seeking); “I would sit down with my son and explain to him that responding in that way is not appropriate and that if he was indeed mad at his friend that he should tell him why. I would explain to him that he cannot go that everyone he is mad at in his life. I would most likely make him apologize to his friend for acting like that and at the same time tell him why he was mad.” (Reparation); and “I would firmly scold him, make him apologize and make him sit out until he realizes he cannot do that.” (Reprimand or Disapproval). Scores for each participant, for each of the four types of interventions were averaged across aggression type. Ten percent of the vignettes were double-coded, yielding kappa values for these variables that ranged from .57 to .86. More specifically, the kappa values were as follows: Problem Solving (.62), Information Seeking (.85), Reparation (.87), and verbal reprimands or disapproval (.57). (See Appendix B). Participant responses were coded on the following scale for each type of

vignette: 0 (behavior response did not occur), 1 (behavior response occurred in one of the vignettes, and 2 (behavior occurred in both vignettes and then averaged across type of vignette).

*Ethnicity.* Ethnicity was recorded based on participants responses to basic demographic questions acquired through the EXPERIMENTRAK and SONA systems. Participants had the option of choosing Hispanic/Latino, Indian/Alaska Native, Asian, Native Hawaiian, Pacific Islander, White, Black/African American, or other/mixed. For the purposes of this study those who identified as African American or as “other” and identified themselves as belonging to ethnic groups such as African, Caribbean, or Cape Verdean, were classified within the Black/African American sample. For those participants who identified as mixed, part Black African American (including White & Black), they were classified within the Black/African American sample, according to the procedures used when a national census is conducted. Acknowledging the complexity and limitations inherent in ethnicity classification, this choice was made based on the fact that census data would encapsulate these ethnicities under the Black/African American category. Participants who identified as White/Caucasian or as “other” and identified themselves as Swedish, Italian, Irish, etc., were included in the European American group. Those participants who identified as Hispanic/Latino, Indian/Alaskan Native, Asian, Native Hawaiian, or Pacific Islander were not included in this study.

## CHAPTER 3

### RESULTS

#### Descriptive Statistics

An examination of the means of the main study variables at the vignette level illustrated there was a greater range in means for relational aggression for self-rated main study variables than for physical aggression. Moreover, there were no overlapping distributions between physical and relational aggression on the discipline or emotional rating scales – for example, concern about the least concerning physical vignette was higher than about the most concerning relational vignette (See Table 1). This pattern suggests that differences in responses to relational and physical aggression are very robust to the specific behaviors described. Additionally, an examination of the correlations between participant's responses on the rating scales within vignette type yielded moderately high and significant correlations for physical aggression. The correlations for relational aggression were significant as well, but lower (See Table 2).

In Table 3, the means and standard deviations for all the main study variables are presented. Table 4 presents these descriptive statistics by gender of the child depicted in the vignettes, and Table 5 by participant ethnicity. Table 6 presents means and standard deviations as a function of participant ethnicity and child gender. Correlations between the participant-rated variables are presented for relational aggression and physical aggression in Table 7.

#### Analytic Plan

In order to examine whether participant ethnicity, child gender, and type of aggression predict level of concern, embarrassment, overreactivity, and laxness, four

three-way ANOVAs [2 (Participant Ethnicity) X 2 (Child Gender) X 2 (Aggression Type)] were conducted. Aggression type was the within-subjects factor and both gender and ethnicity were between-subjects factors.

Additionally, in order to examine whether ethnicity, child gender, and type of aggression predicted the levels of adult behavioral responses (i.e., problem solving, information seeking, reparation, and reprimand), four three-way ANOVAs [2 (Participant Ethnicity) X 2 (Child Gender) X 2 (Aggression Type)] were conducted. Aggression type was the within-subjects factor and both gender and ethnicity were between-subjects factors. It should be noted that, while these responses were aggregated across vignettes of the same type, scores for each participant could nonetheless only be 0, 1, or 2. Therefore this variable violates the ANOVA assumption of normally distributed error – this violation does not bias the estimation of group means; standard errors and hence p-values can be affected, but ANOVA is quite robust to violations of this assumption, (Keppel & Wickens, 2004).

### **Concern**

The ANOVA predicting concern yielded one significant main effect, for the type of aggression,  $F(1, 588) = 798.83, p < .001$ , partial  $\eta^2 = .58$ . As hypothesized, participants were more concerned about physical aggression (marginal  $M = 5.11$ ) than relational aggression (marginal  $M = 3.54$ ). There were no significant main effects of gender or ethnicity with respect to concern ratings, nor were any of the interactions statistically significant.

### **Embarrassment**

The ANOVA predicting embarrassment yielded significant main effects for the type of aggression,  $F(1, 588) = 698.13, p < .001$ , partial  $\eta^2 = .54$ , and ethnicity,  $F(1, 588) = 6.09, p < .05$ , partial  $\eta^2 = .01$ . As hypothesized, participants were more embarrassed by physically aggressive behaviors (marginal  $M = 4.46$ ) than relationally aggressive behaviors (marginal  $M = 2.70$ ). Additionally, contrary to the predicted hypothesis, European American participants displayed a higher level of embarrassment (marginal  $M = 3.73$ ) than African American participants (marginal  $M = 3.43$ ). There was no significant main effect of gender with respect to ratings of embarrassment nor were any of the interactions statistically significant.

### **Laxness**

The ANOVA predicting laxness yielded two statistically significant main effects of the type of aggression,  $F(1, 588) = 522.52, p < .001$ , partial  $\eta^2 = .47$ , and ethnicity,  $F(1, 588) = 4.84, p < .05$ , partial  $\eta^2 = .01$ . As predicted, participants displayed a higher level of laxness for relational aggression (marginal  $M = 3.21$ ) than physical aggression (marginal  $M = 1.67$ ). Consistent with my hypotheses, European American participants displayed more laxness (marginal  $M = 2.54$ ) than African American participants (marginal  $M = 2.34$ ). There was no significant main effect of gender with respect to ratings of laxness.

The results also yielded one significant 2-way interaction effect for the relationship between type of aggression and ethnicity in predicting laxness,  $F(1, 588) = 4.90, p < .05$ , partial  $\eta^2 = .01$ . The difference between African Americans and European Americans was greater for relational aggression than for physical aggression (See Figure

1). Specifically, European Americans (marginal  $M = 3.39$ ) were more lax than African Americans (marginal  $M = 3.03$ ) for relational aggression; European Americans were only slightly more lax than African Americans for physical aggression (European American marginal  $M = 1.70$ ; African American marginal  $M = 1.64$ ). There were no other statistically significant interactions.

### **Overreactivity**

The ANOVA predicting overreactivity yielded two statistically significant main effects of the type of aggression,  $F(1, 588) = 1073.06, p < .001$ , partial  $\eta^2 = .65$  and ethnicity,  $F(1, 588) = 67.83, p < .001$ , partial  $\eta^2 = .10$ . As predicted, participants displayed a higher level of overreactivity for physical aggression (marginal  $M = 4.01$ ) than for relational aggression (marginal  $M = 1.92$ ). Additionally, consistent with my hypotheses, African American participants displayed higher levels of overreactivity (marginal  $M = 3.34$ ) than European American participants (marginal  $M = 2.59$ ). There was no significant main effect of gender with respect to ratings of overreactivity.

The results also yielded two significant 2-way interaction effects for the relationship between type of aggression and ethnicity as they relate to predicting overreactivity,  $F(1, 588) = 43.96, p < .001$ , partial  $\eta^2 = .07$ , as well as type of aggression and gender as they relate to the prediction of overreactivity,  $F(1, 588) = 3.99, p < .05$ , partial  $\eta^2 = .01$ . With respect to the interaction between ethnicity and aggression type (See Figure 2), African Americans (marginal  $M = 4.61$ ) were more overreactive than European Americans (marginal  $M = 3.42$ ) for physical aggression while overreactivity levels were more similar for relational aggression (African American marginal  $M = 2.08$ ; European American marginal  $M = 1.75$ ). With respect to the interaction between gender

of the child and aggression type, patterns matched predictions. Specifically, participants were more overreactive to boys (marginal  $M = 1.98$ ) being relationally aggressive than girls (marginal  $M = 1.86$ ), and less overreactive to boys being physically aggressive than girls (Boys' marginal  $M = 3.95$ ; Girls' marginal  $M = 4.08$ ). (See Figure 3).

Finally, a statistically significant 3-way interaction was observed for the relationship between type of aggression, ethnicity, and gender,  $F(1, 588) = 6.52, p < .05$ , partial  $\eta^2 = .01$ . The significant 3-way interaction appears to indicate that the gender differentiation described above (see Figure 3) is accounted for by African American participants, who showed higher levels of overreactivity towards girls' physical aggression (marginal  $M = 4.74$ ) than boys' physical aggression (marginal  $M = 4.47$ ) and greater overreactivity for boys' relational aggression (marginal  $M = 2.24$ ) than girls' relational aggression (marginal  $M = 1.93$ ). In contrast, levels of overreactivity among European Americans were similar for boys and girls in both situations (See Figure 4).

### **Problem Solving**

The ANOVA predicting adult behavioral responses involving problem solving yielded two statistically significant main effects of the type of aggression,  $F(1, 588) = 33.63, p < .001$ , partial  $\eta^2 = .05$  and gender,  $F(1, 588) = 7.64, p < .01$ , partial  $\eta^2 = .01$ . Consistent with the hypothesis that adults would be more likely to talk about relational aggression than physical aggression, participants displayed a higher level of problem solving behaviors for relational aggression (marginal  $M = .21$ ) than for physical aggression (marginal  $M = .09$ ). Additionally, participants displayed higher levels of problem solving behaviors for boys (marginal  $M = .19$ ) than girls (marginal  $M = .12$ ).

There was no significant main effect of ethnicity with respect to ratings of problem solving behaviors, nor were any of the interactions statistically significant.

### **Information Seeking**

The ANOVA predicting adult behavioral responses involving information seeking yielded only one statistically significant main effect, for the type of aggression,  $F(1, 588) = 5.11, p < .05$ , partial  $\eta^2 = .01$ . Consistent with the hypothesis that adults would be more likely to talk about relational aggression than physical aggression, participants displayed a higher level of information seeking for relational aggression (marginal  $M = .34$ ) than for physical aggression (marginal  $M = .29$ ). There were no significant main effects of gender or ethnicity with respect to information seeking coding, nor were any of the interactions statistically significant.

### **Reparations**

The ANOVA predicting adult behavioral responses involving reparation only yielded one statistically significant main effect, for the type of aggression,  $F(1, 588) = 11.59, p < .01$ , partial  $\eta^2 = .02$ . Consistent with the hypothesis that adults would be more likely to provide a consequence for physical aggression than relational aggression, participants displayed a higher level of reparation response behaviors for physical aggression (marginal  $M = .12$ ) than for relational aggression (marginal  $M = .06$ ). There were no significant main effects of gender or ethnicity with respect to coded reparation responses.

The results also yielded one significant 2-way interaction effect for the relationship between type of aggression and ethnicity as they relate to predicting reparation,  $F(1, 588) = 4.21, p < .05$ , partial  $\eta^2 = .01$ . With respect to the interaction

between ethnicity and aggression type (See Figure 5), European Americans (marginal  $M = .15$ ) made more reparation responses than African Americans (marginal  $M = .10$ ) for physical aggression while the opposite pattern was noted for relational aggression, with African American (marginal  $M = .07$ ) displaying more reparation responses for relational aggression than European Americans (marginal  $M = .05$ ). There were no other significant interaction effects.

### **Reprimands**

The ANOVA predicting adult behavioral responses that included reprimands yielded only one statistically significant main effect of the type of aggression,  $F(1, 588) = 31.65, p < .001$ , partial  $\eta^2 = .05$ . Consistent with the hypothesis that adults would be more likely to provide a consequence for physical aggression than relational aggression, participants reported more reprimands for physical aggression (marginal  $M = .20$ ) than for relational aggression (marginal  $M = .09$ ). There were no significant main effects of gender or ethnicity with respect to reprimands, nor were any of the interactions statistically significant.

## CHAPTER 4

### DISCUSSION

The present study examined the relationship between adult concern, embarrassment, and discipline towards relational and physical aggression, and how these vary as an effect of child gender and participant ethnicity. The underlying model for my hypotheses was that adult emotions, specifically concern and embarrassment, toward aggression are linked with how adults discipline these problem behaviors.

#### **Type of Aggression**

Overall the major finding of this study is that it appears that even when relational aggression is made visible to adults, they still view physical aggression as far more problematic. This is clearly evidenced by the very large effect sizes in comparing relational and physical aggression. For example, mean overreactivity ratings for physical versus relational aggression were 3.6 versus 1.8, representing a difference of approximately 2 standard deviations. Adults were three times more likely to make reparations for physical than relational aggression. Results were consistent and strong across every measure of parental reaction, indicating that adults view physical reaction as much more serious than relational aggression. Additionally, participants displayed higher amounts of behavioral responses that involved attempting to change the child's behavior (i.e., reparation and reprimand) for physical aggression than for relational aggression. Also consistent with my hypotheses participants showed higher amounts of behavioral responses that involved discussion (i.e., facilitative and information seeking) for relational aggression than for physical aggression.

These findings are consistent with the previous literature. While no studies have specifically examined concern and embarrassment, Werner et al., (2006), found that mothers reported being less upset, angry, and sad in response to relational aggression compared to physical aggression. Moreover, Risser (2004) found that mothers of school-age children viewed physical aggression as being crueler than relational aggression. While another study found that physical aggression was more like to be perceived by parents as “bullying” behavior than relational aggression (Stockdale et al., 2002; See also Colwell et al., 2002).

Despite the fact that relational aggression is strongly associated with serious negative outcomes, participants indicated very little concern about these behaviors, in contrast to physical aggression. These results point to the need for more research on why adults view these behaviors as less serious, and to the importance of psychoeducation and intervention development in this area.

### **Ethnicity**

*Emotional reactions.* Contrary to my hypothesis, African Americans and European Americans did not significantly differ in their concern about aggression. However, opposite from predictions, European American women tended to display higher levels of embarrassment than African American women. This is interesting given that the literature on African American families and the important role of socialization in the parenting of their children with regard to interacting with “others” (i.e., those outside of the African American ethnicity) would suggest that people from this ethnic background might be more concerned and embarrassed (e.g., Pagano et al., 2002).

The lack of significant results may be due to the fact that there was a small sample of African Americans within this study, which may have limited my ability to detect ethnic differences. Furthermore, participants were not put in a situation where their focus on ethnicity would be heightened. There was no indication in the vignette of the child's race and participants were not asked to consider their ethnic background when responding to the questions. Additionally, It is also possible that conceptually, participants (and potentially parents) would not differ in how they would react internally to such behaviors, but as the literature indicates would differ in their discipline strategies in dealing with these behaviors. This is difficult to assess, given that most research pertaining to parenting has generally examined the overt acts of discipline (e.g., Pinderhughes et al., 2000) and not necessarily the internal or underlying emotional or cognitive processes that may involved in leading up to the decision to discipline as well as the severity of the discipline. Additionally, given the relative small number of African American participants, it is possible that there was not enough power to detect differences. Moreover, it is possible that ethnicity is not as clear a variable to assess given that it is a socially constructed variable, thus should not be held as a constant when conducting research. Furthermore, it is possible that ethnicity is interacting more so with social class and it is this relationship that should be interpreted. (Lareau, 2007)

*Discipline.* Consistent with the literature, African American adults overall were less lax compared to European American adults in response to both types of aggression (e.g., Deater-Deckard et al., 1996). These findings are supported by the literature that suggests that African American parents tend to be less lax. In sum, expected differences

in ethnicity for discipline strategies were observed; corresponding differences in emotional reactions were not, and the reasons for this discrepancy are not clear.

Consistent with the parenting literature, African Americans overall were more overreactive compared to European Americans in response to both types of aggression (e.g., Deater-Deckard et al., 1996). These results appear to be supported by the literature regarding African American socialization practices as well as the literature that has shown that African American parents tend to be more punitive in their discipline strategies, especially for child misbehavior that is so readily observable to others.

*Ethnicity and type of aggression.* Only limited evidence was found for the hypothesis that ethnic differences might vary depending on the type of aggression. European Americans made more reparation responses than African Americans for physical aggression while the opposite pattern was noted for relational aggression, with African American displaying more reparation responses for relational aggression than European Americans.

### **Gender**

*Gender and type of aggression.* Consistent with predictions, gender did moderate the relationship between type of aggression and overreactivity. Adults were more overreactive to boys being relationally aggressive than girls and they were less overreactive to boys being physically aggressive than girls. The results are consistent with previous findings that adults are more tolerant of gender congruent behaviors than gender incongruent behaviors.

*Gender and ethnicity.* It was also hypothesized that African Americans would show greater gender differences than European Americans. However, there was only one

significant main effect for gender; participants reported that they would utilize higher levels of facilitative behaviors for boys than girls. The lack of findings with regard to gender is contrary to the literature, which suggests that parents tend to show more concern about their children engaging in gender incongruent behaviors.

### **Limitations**

While this study yielded interesting results, the study itself was not without its drawbacks. Specifically, the sample size for African Americans has limited the ability to detect significant effects of ethnicity. Additionally, how the ethnic groups were defined may have been problematic, in that the categories were not as clean as they could have been, which may have added in extra noise, and again affected the ability to detect significant findings.

Other limitations of this study included that fact that vignettes were hypothetical. Therefore, the responses of the participants represent how they think they would react rather than actually depicting of what they would do if the situation were real.

Observations of actual parenting responses to such behavior could yield different results.

Additionally, it is also possible that the gender manipulation may have been too weak. While I attempted to make gender as salient as possible in the instructions as well as throughout the questionnaire through the use of gender specific pronouns (e.g., “she”, “your daughter”), it is possible that these prompts were too subtle and thus would account for the lack of gender effects.

It should also be noted that the sample was composed of college students. It is possible that participants of different ages or educational backgrounds might respond

differently. In addition, participants in the current study were not parents. The processes of parenting may change how participants view misbehavior.

It is also possible that other contextual variables may play significant roles in these relationships; future studies should examine factors such as social class, parent-child relationship quality, personality characteristics of the child and parenting style, as well as cultural or ethnic identity. Furthermore, including men would provide an alternative view of such behaviors as well as potentially allow for further examination of gender differences in the respondents to the behaviors, in addition to the gender of the child engaging in the behavior.

Given that children who engage in relational aggression, as the victim or the perpetrator, have an increased likelihood of social and psychological difficulties, it is important that parents are educated about the importance of such behavior. Moreover, current parenting programs do not address relational aggression, and so are ignoring a major problem, particularly among girls. Future development of new and revisions to parenting programs should address this issue in treatment programs, and in psychoeducation for parents and teachers, towards buffering children from deleterious effects associated with relational aggression.

Table 1

Means and Standard Deviations by Vignette for the Main Study Variables

Vignette	Mean	Std. Deviation	Vignette	Mean	Std. Deviation
Concern About Relational			Concern About Physical		
No Bus Seat	4.12 <sub>a</sub>	1.05	Ball Thrown	5.19 <sub>a</sub>	.94
No Valentine	2.90 <sub>a</sub>	1.04	Hits Child	5.02 <sub>a</sub>	1.12
Teach A Lesson	3.65 <sub>b</sub>	1.17	Ball Snatched	4.96 <sub>b</sub>	1.01
No Party Invitation	3.68 <sub>b</sub>	1.21	Threatens to Punch	5.24 <sub>b</sub>	.92
Embarrassed About Relational			Embarrassed About Physical		
No Bus Seat	3.65 <sub>a</sub>	1.42	Ball Thrown	4.89 <sub>a</sub>	1.18
No Valentine	2.05 <sub>a</sub>	1.18	Hits Child	4.53 <sub>a</sub>	1.34
Teach A Lesson	2.49 <sub>b</sub>	1.32	Ball Snatched	4.26 <sub>b</sub>	1.40
No Party Invitation	3.16 <sub>b</sub>	1.37	Threatens to Punch	4.45 <sub>b</sub>	1.38
Overreactivity Toward Relational			Overreactivity Toward Physical		
No Bus Seat	2.11 <sub>a</sub>	1.05	Ball Thrown	3.59 <sub>a</sub>	1.17
No Valentine	1.42 <sub>a</sub>	.76	Hits Child	3.79 <sub>a</sub>	1.25
Teach A Lesson	1.55 <sub>b</sub>	.75	Ball Snatched	3.23 <sub>b</sub>	1.21
No Party Invitation	2.11 <sub>b</sub>	1.19	Threatens to Punch	3.73 <sub>b</sub>	1.33
Laxness Toward Relational			Laxness Toward Physical		
No Bus Seat	2.82 <sub>a</sub>	1.25	Ball Thrown	1.68 <sub>a</sub>	0.81
No Valentine	3.74 <sub>a</sub>	1.48	Hits Child	1.54 <sub>a</sub>	0.86

Teach A Lesson	3.66 <sub>b</sub>	1.21	Ball Snatched	1.98 <sub>b</sub>	0.96
No Party Invitation	3.10 <sub>b</sub>	1.39	Threatens to Punch	1.56 <sub>b</sub>	0.79
Problem Solving Toward Relational			Problem Solving Toward Physical		
No Bus Seat	0.14 <sub>a</sub>	0.35	Ball Thrown	0.07 <sub>a</sub>	0.25
No Valentine	0.10 <sub>a</sub>	0.30	Hits Child	0.14 <sub>a</sub>	0.35
Teach A Lesson	0.39 <sub>b</sub>	0.49	Ball Snatched	0.07 <sub>b</sub>	0.26
No Party Invitation	0.13 <sub>b</sub>	0.34	Threatens to Punch	0.12 <sub>b</sub>	0.33
Information Seeking Toward Relational			Information Seeking Toward Physical		
No Bus Seat	0.38 <sub>a</sub>	0.49	Ball Thrown	0.19 <sub>a</sub>	0.39
No Valentine	0.20 <sub>a</sub>	0.40	Hits Child	0.21 <sub>a</sub>	0.41
Teach A Lesson	0.59 <sub>b</sub>	0.49	Ball Snatched	0.53 <sub>b</sub>	0.50
No Party Invitation	0.19 <sub>b</sub>	0.40	Threatens to Punch	0.20 <sub>b</sub>	0.40
Reparation Toward Relational			Reparation Toward Physical		
No Bus Seat	0.00 <sub>a</sub>	0.00	Ball Thrown	0.08 <sub>a</sub>	0.27
No Valentine	0.07 <sub>a</sub>	0.26	Hits Child	0.27 <sub>a</sub>	0.44
Teach A Lesson	0.06 <sub>b</sub>	0.24	Ball Snatched	0.15 <sub>b</sub>	0.35
No Party Invitation	0.08 <sub>b</sub>	0.27	Threatens to Punch	0.08 <sub>b</sub>	0.28
Verbal Reprimand Toward Relational			Verbal Reprimand Toward Physical		
No Bus Seat	0.00 <sub>a</sub>	0.00	Ball Thrown	0.12 <sub>a</sub>	0.33
No Valentine	0.07 <sub>a</sub>	0.25	Hits Child	0.11 <sub>a</sub>	0.32
Teach A Lesson	0.00 <sub>b</sub>	0.00	Ball Snatched	0.20 <sub>b</sub>	0.43
No Party Invitation	0.24 <sub>b</sub>	0.43	Threatens to Punch	0.35 <sub>b</sub>	0.48

$${}^a_n = 283. {}^b_n = 309.$$

Table 2

Correlations Averaged Across Vignette and Type of Aggression for the Main Study Variables

	Relational Aggression	Physical Aggression
Concerned	.27**	.37**
Embarrassed	.32**	.57**
Overreactivity	.40	.60
Laxness	.44**	.45**

\*\* . p < .01.

Table 3

Means and Standard Deviations for Main Study Variables ( $n = 592$ )

	Relational Aggression		Physical Aggression	
	Mean	Std. Deviation	Mean	Std. Deviation
Concerned	3.59	0.90	5.11	0.83
Embarrassed	2.84	1.08	4.53	1.19
Overreactivity	1.80	0.79	3.58	1.11
Laxness	3.34	1.13	1.69	0.73
Problem Solving	0.19	0.29	0.10	0.22
Information Seeking	0.34	0.35	0.29	0.37
Reparation	0.05	0.16	0.14	0.26
Reprimand	0.08	0.18	0.21	0.34

Table 4

Means and Standard Deviations for Main Study Variables as a Function of Gender of the Child

	Relational Aggression		Physical Aggression	
	Girls <sub>a</sub>	Boys <sub>b</sub>	Girls <sub>a</sub>	Boys <sub>b</sub>
Concerned	3.58 (0.91)	3.60 (0.90)	5.18 (0.81)	5.04 (0.84)
Embarrassed	2.85 (1.13)	2.83 (1.04)	4.59 (1.15)	4.48 (1.22)
Overreactivity	1.80 (0.83)	1.80 (0.77)	3.58 (1.13)	3.59 (1.10)
Laxness	3.30 (1.18)	3.38 (1.09)	1.67 (0.73)	1.71 (0.73)
Problem Solving	0.17 (0.28)	0.22 (0.30)	0.07 (0.19)	0.13 (0.24)
Information Seeking	0.32 (0.36)	0.36 (0.34)	0.24 (0.34)	0.32 (0.38)
Reparation	0.06 (0.16)	0.05 (0.15)	0.14 (0.26)	0.14 (0.26)
Reprimand	0.07 (0.17)	0.09 (0.19)	0.20 (0.33)	0.22 (0.35)

<sup>a</sup>n = 272. <sup>b</sup>n = 320.

Table 5

Means and Standard Deviations for Main Study Variables as a Function of Ethnicity of the Participant

	Relational Aggression		Physical Aggression	
	African American <sup>a</sup>	European American <sup>b</sup>	African American <sup>a</sup>	European American <sup>b</sup>
Concerned	3.47 (1.08)	3.61 (0.87)	5.07 (0.85)	5.11 (0.82)
Embarrassed	2.46 (1.07)	2.90 (1.07)	4.34 (1.30)	4.56 (1.17)
Overreactivity	2.12 (0.95)	1.75 (0.75)	4.58 (1.10)	3.42 (1.03)
Laxness	3.03 (1.15)	3.39 (1.12)	1.66 (0.77)	1.70 (0.73)
Problem Solving	0.24 (0.33)	0.19 (0.28)	0.10 (0.20)	0.10 (0.22)
Information Seeking	0.34 (0.33)	0.34 (0.36)	0.28 (0.36)	0.29 (0.37)
Reparation	0.07 (0.17)	0.05 (0.15)	0.10 (0.23)	0.15 (0.27)
Reprimand	0.10 (0.20)	0.08 (0.18)	0.20 (0.34)	0.21 (0.34)

<sup>a</sup>n = 82. <sup>b</sup>n = 510.

Table 6

Means and Standard Deviations for Main Study Variables as a Function of Gender of the Child and Ethnicity of the Participant

	Relational Aggression		Physical Aggression	
	Girls	Boys	Girls	Boys
African American Women				
Concerned	3.53 (1.11) <sub>a</sub>	3.43 (1.06) <sub>b</sub>	5.25 (0.67) <sub>a</sub>	4.96 (0.94) <sub>b</sub>
Embarrassed	2.66 (1.13) <sub>a</sub>	2.34 (1.02) <sub>b</sub>	4.50 (1.15) <sub>a</sub>	4.23 (1.39) <sub>b</sub>
Overreactivity	1.93 (0.90) <sub>a</sub>	2.24 (0.97) <sub>b</sub>	4.74 (0.81) <sub>a</sub>	4.47 (1.24) <sub>b</sub>
Laxness	3.00 (1.12) <sub>a</sub>	3.06 (1.18) <sub>b</sub>	1.53 (0.65) <sub>a</sub>	1.75 (0.83) <sub>b</sub>
Problem Solving	0.23 (0.36) <sub>a</sub>	0.25 (0.31) <sub>b</sub>	0.02 (0.09) <sub>a</sub>	0.16 (0.24) <sub>b</sub>
Information Seeking	0.33 (0.37) <sub>a</sub>	0.34 (0.31) <sub>b</sub>	0.33 (0.39) <sub>a</sub>	0.25 (0.34) <sub>b</sub>
Reparation	0.09 (0.20) <sub>a</sub>	0.05 (0.15) <sub>b</sub>	0.06 (0.17) <sub>a</sub>	0.13 (0.26) <sub>b</sub>
Reprimand	0.11 (0.21) <sub>a</sub>	0.10 (0.20) <sub>b</sub>	0.20 (0.38) <sub>a</sub>	0.19 (0.32) <sub>b</sub>
European American Women				
Concerned	3.59 (0.88) <sub>c</sub>	3.63 (0.87) <sub>d</sub>	5.17 (0.83) <sub>c</sub>	5.06 (0.82) <sub>d</sub>
Embarrassed	2.87 (1.13) <sub>c</sub>	2.92 (1.02) <sub>d</sub>	4.60 (1.15) <sub>c</sub>	4.52 (1.19) <sub>d</sub>
Overreactivity	1.79 (0.82) <sub>c</sub>	1.72 (0.69) <sub>d</sub>	3.42 (1.08) <sub>c</sub>	3.42 (0.99) <sub>d</sub>
Laxness	3.33 (1.18) <sub>c</sub>	3.44 (1.06) <sub>d</sub>	1.69 (0.74) <sub>c</sub>	1.71 (0.72) <sub>d</sub>
Problem Solving	0.16 (0.26) <sub>c</sub>	0.21 (0.30) <sub>d</sub>	0.08 (0.19) <sub>c</sub>	0.12 (0.24) <sub>d</sub>
Information Seeking	0.32 (0.36) <sub>c</sub>	0.36 (0.35) <sub>d</sub>	0.23 (0.34) <sub>c</sub>	0.34 (0.39) <sub>d</sub>
Reparation	0.05 (0.16) <sub>c</sub>	0.05 (0.15) <sub>d</sub>	0.15 (0.27) <sub>c</sub>	0.14 (0.26) <sub>d</sub>
Reprimand	0.06 (0.17) <sub>c</sub>	0.09 (0.19) <sub>d</sub>	0.20 (0.32) <sub>c</sub>	0.23 (0.36) <sub>d</sub>

<sup>a</sup>n = 32. <sup>b</sup>n = 50. <sup>c</sup>n = 240. <sup>d</sup>n = 270.

Table 7

## Correlations Between Main Study Variables for Relational Aggression and Physical Aggression

	1	2	3	4	5	6	7	8
1. Concern		.44**	.13**	-.30**	.01	-.01	-.03	-.01
2. Embarrassed	.47**		.25**	-.21**	.03	-.09*	-.05	-.01
3. Overreactivity	.19**	.23**		-.12**	.01	-.14**	-.03	-.13**
4. Laxness	-.41**	-.23**	-.12**		-.03	.11**	-.03	.04
5. Problem Solving	-.02	-.04	-.11**	.06		-.10*	-.09*	-.14**
6. Information Seeking	-.02	-.05	.10*	.01	-.18**		-.13**	.30**
7. Reparation	.01	-.05	.01	.04	.02	-.18**		.27**
8. Reprimand	.02	-.02	.02	.03	-.08*	.31**	.12**	

Note. Relational Aggression correlations appear below the horizontal; Physical Aggression correlations appear above the horizontal  
 \*\* . p < .01. \* . p < .05.

Figure 1.

Interaction of Type of Aggression and Ethnicity in Predicting Laxness.

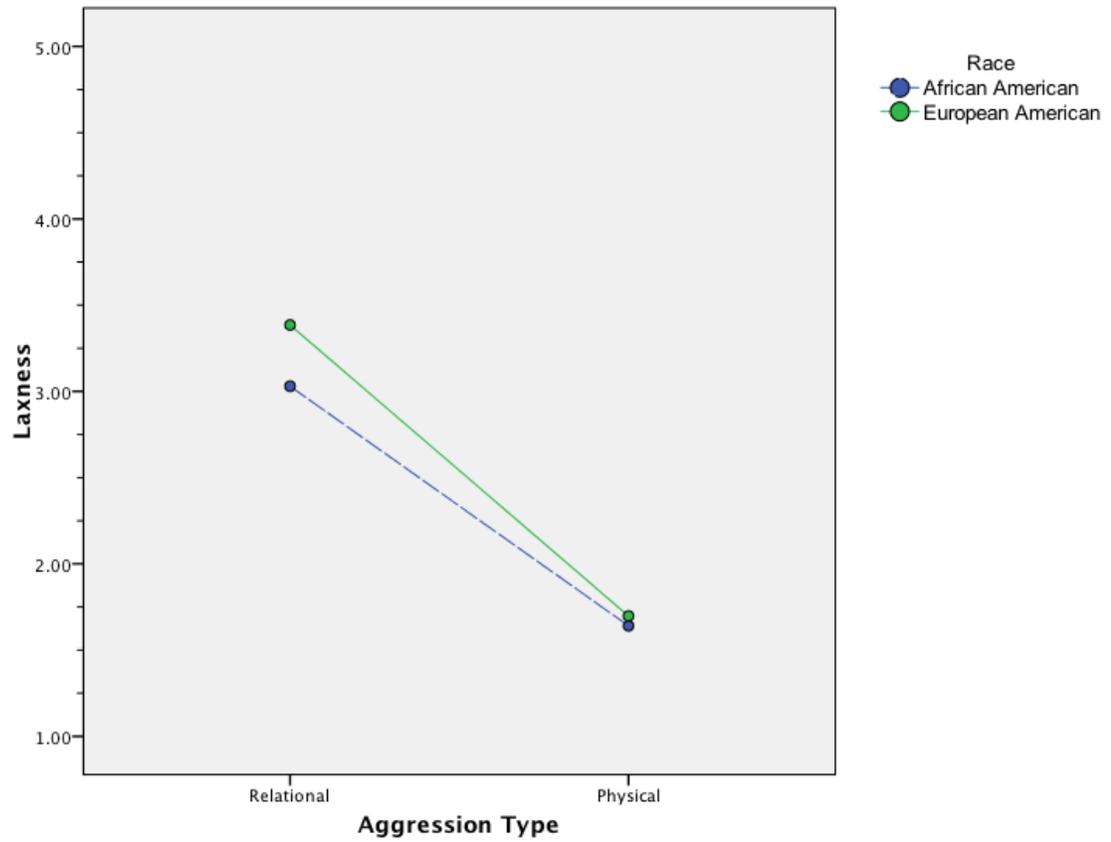


Figure 2.

Interaction of Type of Aggression and Ethnicity in Predicting Overreactivity.

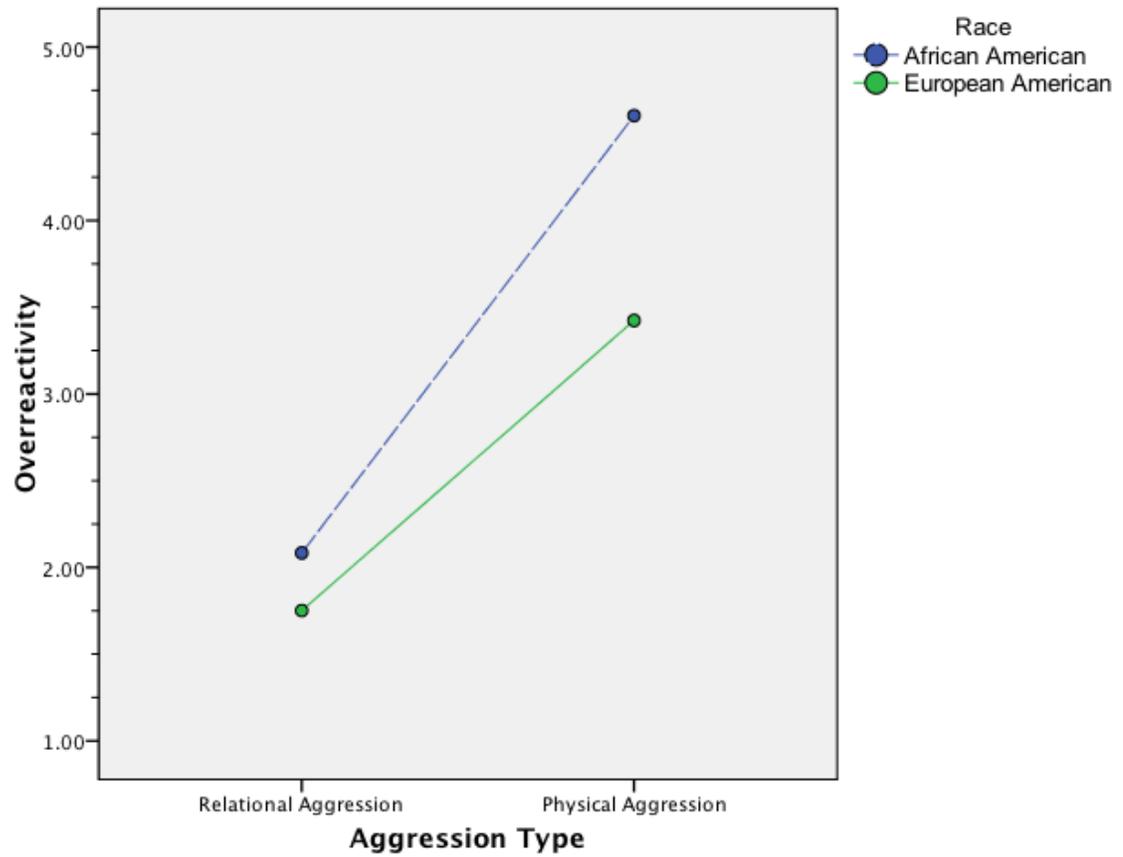


Figure 3.

Interaction of Type of Aggression and Gender of Child in Predicting Overreactivity.

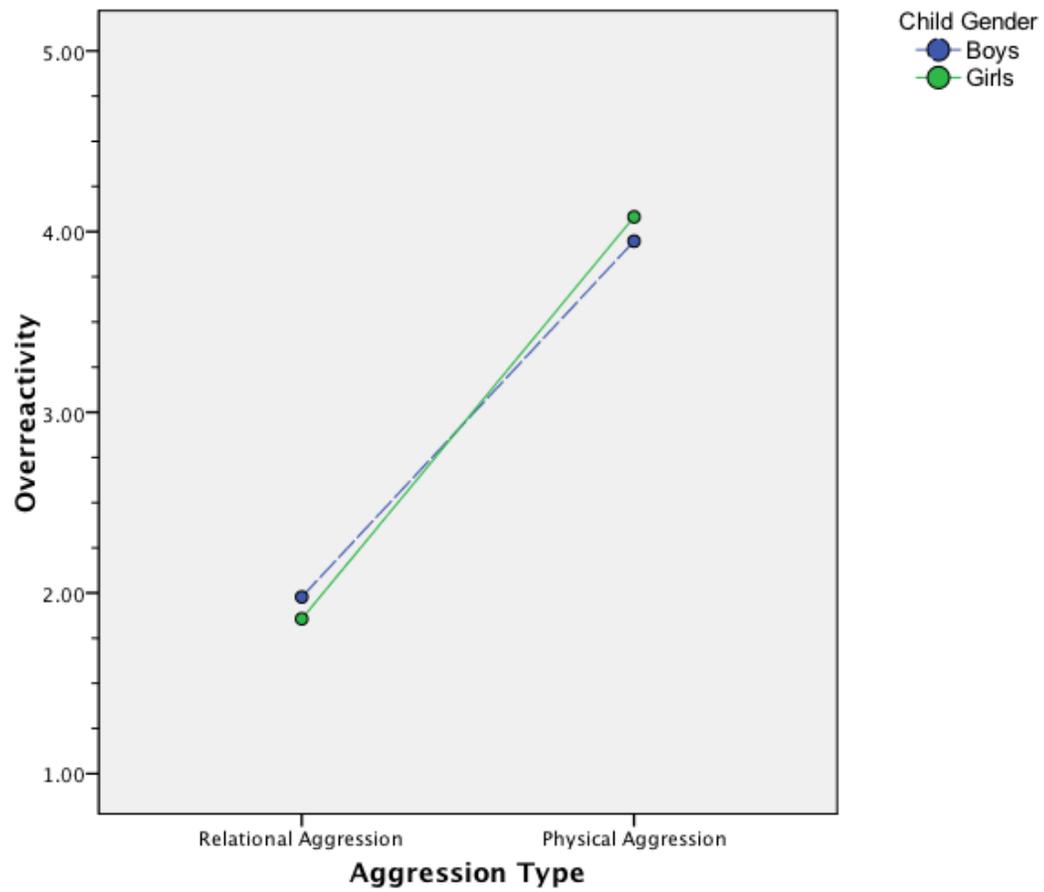


Figure 4.

Interaction of Type of Aggression, Ethnicity, and Child Gender in predicting Overreactivity as a Function of Ethnicity.

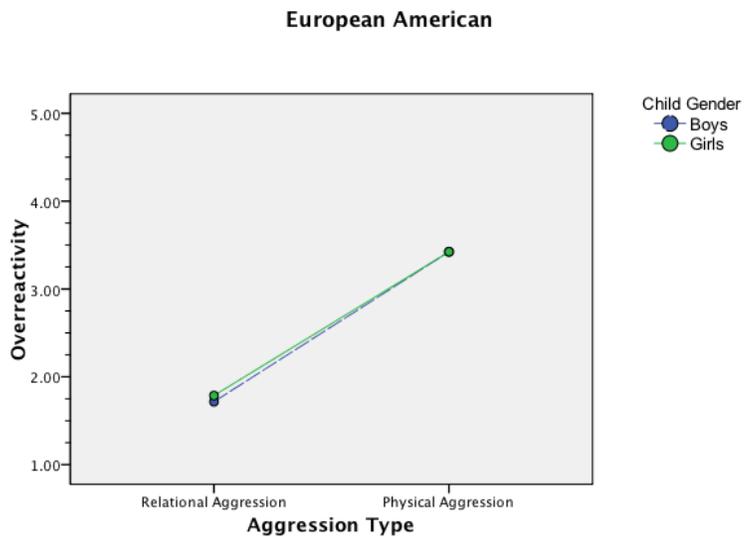
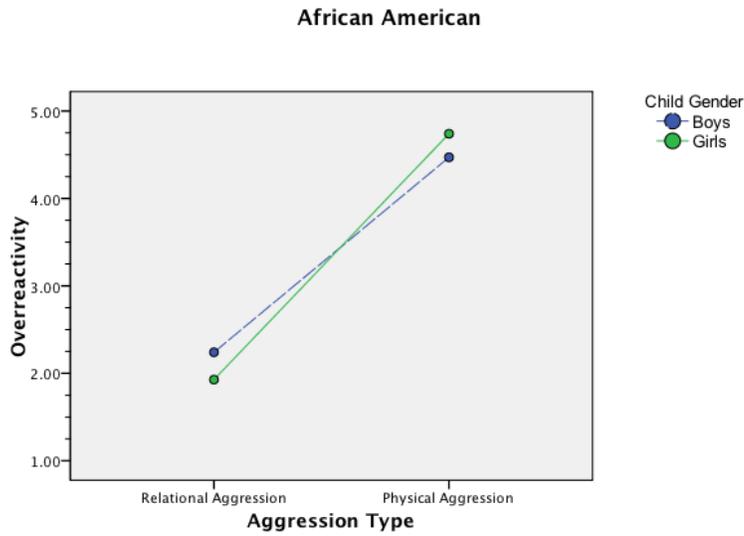
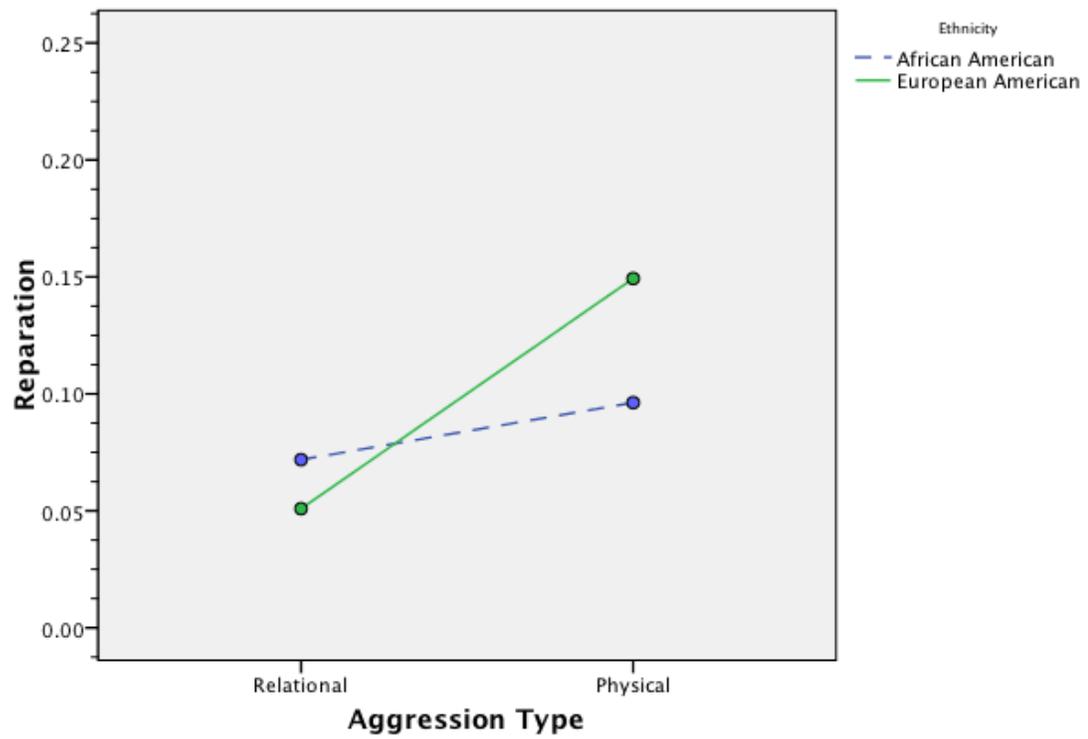


Figure 5.

Interaction of Type of Aggression and Ethnicity in Predicting Participant Reparation Coded Responses.



## APPENDICES

## APPENDIX A

### DISSERTATION QUESTIONNAIRE

#### **Child Behavior Stories: Introduction**

As you read each of the following six stories, please imagine that the child being described is your 8-year-old daughter, Ann. After each story, there are questions about what you would think, feel, and do in the situation. For the first two questions, you will write your answer in your own words. Please write as much or as little as you want.

Please try to answer every question. When you are not sure of an answer, try to give your best guess. There are no “right” or “wrong” answers to any of these questions. We are interested in learning about how you think that you would react to your daughter, Ann. Your honest responses will help us to understand more about how people think about various child behaviors.

#### **Behavior Vignettes**

1. Your daughter, Ann, is outside with a friend. Another girl, Sarah, is standing alone in front of her house. Ann and her friend, Michelle, walk by Sarah and you hear Ann say “don’t let her sit next to us on the bus.”
2. You and your daughter, Ann, are at a playground playing basketball. You notice some girls having a race. Ann throws the basketball at a girl running in the race. The ball knocks the girl down and someone else wins the race. You can tell that Ann did it on purpose.
3. You are helping your daughter, Ann, make Valentine’s Day cards for all of the children in her class. You notice that Ann did not make a card for her friend Susan. You tell Ann that she forgot a card and Ann replies, “No I didn’t. I am mad at her, so I’m not going to give her a card, to get back at her.”
4. Your daughter Ann is playing a game with her friend Marie. Ann loses the game and hits Marie.
5. You are picking up your daughter Ann from school one afternoon. Ann’s friend Michelle smiles, waves and says goodbye to Ann. You see that Ann looks at Michelle and then turns and walks away without saying anything. You ask Ann why she didn’t say goodbye to Michelle and she says, “I am mad at her and I wanted to teach her a lesson”.
6. You and your daughter, Ann, are at a playground. Ann is playing ball with a group of girls. You see Ann snatch the ball from a girl and push her down to the ground.
7. Your daughter Ann and her friend Sarah are coloring. You hear Ann say to Sarah, “If you don’t let me use the blue crayon, then I won’t invite you to my party.”

8. You and your daughter Ann are at an arcade. Ann sees, Jennifer, one of her classmates from school, playing a video game. You hear Ann say, "If you don't let me play now, I am going to punch you".

**Open-Ended and Close-Ended Questions**

1. What, if anything, would you do about your daughter's behavior? What would you **say or do** with your daughter?

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2. Think about how you would feel if you were to see your daughter behave this way. Please rate how strongly you would feel each of the following emotions.

	Not at all	Just a Little	Moderate	Quite a Bit	A lot	Very Strong
A. How <b>concerned</b> would you feel?	1	2	3	4	5	6
B. How <b>embarrassed</b> would you feel?	1	2	3	4	5	6

**For the following question, please mark the circle that best describes what you would do.**

*Sample Question:*

*When deciding what to eat for dinner, I would....*

<i>Sometimes let my daughter decide</i>	<input type="radio"/> — <input type="radio"/> — <input checked="" type="radio"/> — <input type="radio"/> — <input type="radio"/> — <input type="radio"/> — <input type="radio"/>	<i>Always decide</i>
-----------------------------------------	----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------	----------------------

3. If this were really my daughter, I imagine in situations like these I would...

- |                                                                   |                                                                                                                                                                       |                                            |
|-------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------|
| A. <b>Speak to my daughter calmly.</b>                            | <input type="radio"/> — <input type="radio"/> | <b>Raise my voice or yell.</b>             |
| B. <b>Firmly tell my daughter my daughter not to do it again.</b> | <input type="radio"/> — <input type="radio"/> | <b>Coax or beg not to do it again.</b>     |
| C. <b>Spank my daughter never or Rarely.</b>                      | <input type="radio"/> — <input type="radio"/> | <b>Spank my daughter most of the time.</b> |

D. **Do something about it every single time.** ○—○—○—○—○—○—○—○ **Sometimes let the behavior go**

E. Try talking. If talking didn't work then I would. . .

**Take some other kind of action** ○—○—○—○—○—○—○—○ **Let it go**

F. **Handle it without getting angry** ○—○—○—○—○—○—○—○ **Get so frustrated or angry that my daughter could see I was upset.**

## APPENDIX B

### ADULT PERSPECTIVES ON CHILDHOOD BEHAVIORS DISSERTATION CODE FOR OPEN-ENDED RESPONSES

1. *Problem Solving*: Parent suggests or provides a strategy or solution for the child. Comments must be specific to the situation (e.g., “I’d suggest they play something that will include everyone.”), rather than general/neutral (“Be nice.”). This category also includes strategies in which the parent tells the child what to do, but doesn’t apply a punishment or verbally reprimand him/her; e.g., tell my child to get in line with the other kids. May involve a command (see example above), but is different from a reprimand because it doesn’t express disapproval directly.(e.g., I want you to go talk to the other child.”)
2. *Information Seeking*: Parent suggests that he/she would seek out additional information about the situation (e.g., asking child questions about the event, talking to the teacher)
3. *Reparation*: Parent tells the child to make amends or apologize, e.g., telling the child to repair the situation in some specific way (e.g., “I would make my child apologize,” “I would make my child help clean up the paint.” “My child would have to rebuild the block structure.”) This code trumps the problem solving code.
4. *Reprimand*: Parents scolds or corrects sharply; verbal expression of displeasure or disapproval (e.g., “I would reprimand (or scold) my child.”). Parent tells the child to stop what he/she is doing (e.g., “You don’t hit people”; “I’d tell her to stop that”). With this code there has to be something within the response that explicitly signifies displeasure/scolding. This code should also include any response in which the parent states that they would “firmly” talk to their child.

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