Parental Monitoring Sources, Ethnicity, and Child Problem Behaviors

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Abstract

Parental monitoring sources are specific ways in which parents can gain information about child friendship networks and activities. Parental stress, efficacy, and responsivity during early childhood can affect parental monitoring overtime (Patrick, Snyder, Schrepferman, & Snyder, 2005; Pettit, Keiley, Laird, Bates & Dodge, 2007; Shumow & Lomax, 2002). Parental monitoring has been negatively associated with a variety of antisocial behaviors during adolescence, but little research has explored the relationship between parental monitoring and problem behaviors during childhood (Cottrell et al., 2007; Dishion, Patterson, Stoolmiller, & Skinner, 1991; Hayes, Hudson & Matthews, 2003). To truly understand the impact of parental monitoring, scholars have suggested that research should now focus on how parents gain knowledge, and whether such parental monitoring sources each play a similar role in predicting child outcomes (Kerr, Stattin & Trost 1999; Stattin and Kerr, 2000). The present study examines the relationships among early parenting behaviors, sources of parental monitoring, and child aggression and rule-breaking behaviors. In addition, the moderating role of parent ethnicity is examined.

Participants are families who participated in the Early Steps Project, a multi-site, longitudinal, preventative intervention focusing on reducing the early emergence of aggressive and withdrawn behavior in young children. A total of 473 families made up of 312 (66.0%) White Americans and 161 (34.0%) African Americans are included. This study includes data that were collected when children were ages 3, 4, 5, and 7 years old. First, a multiple group Confirmatory Factor Analysis (CFA) was used to determine the unique sources of monitoring in the sample. Second, Structural Equation Modeling (SEM) analyses were conducted to examine how parental stress, efficacy, and

responsivity were related to the unique sources of monitoring. Third, the SEM analyses determined how the unique sources of monitoring were related to child aggression and rule-breaking behaviors. Finally, the SEM analyses identified relationships between any two variables in which the effect significantly differed in strength or direction, based on ethnicity.

Four sources of monitoring emerged: (a) disclosure/solicitation, (b) outside sources, (c) general knowledge, and (d) weekly communication. Some parenting behaviors in early childhood were positively associated with parental monitoring sources in middle childhood. Specifically, parental efficacy positively predicted general monitoring and weekly communication. Additionally, ethnicity was a moderator such that higher parental responsivity during early childhood was associated with higher disclosure/solicitation and general knowledge for African American parents, but for White American parents, there was no significant relationship. Parental monitoring sources were differentially associated with child behavioral outcomes. For White American parents only, outside sources *positively* predicted child aggression as well as rule-breaking behavior, and more disclosure/solicitation was associated with less aggression. For African American parents only, parental weekly communication negatively predicted aggression. However, those relationships did not differ in strength or direction for the ethnic groups. Ethnicity did serve as a moderator such that more disclosure/solicitation was associated with less rule-breaking in children for White American parents, but for African American parents the relationship was not significant. Implications for future research and intervention are discussed.

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Parental Monitoring Sources, Ethnicity, and Child Problem Behaviors

Parental monitoring has been linked to fewer child problem behaviors (Landry, Smith, Swank, Assel, & Vellet, 2001; Lambert & Cashwell, 2004; McFadyen-Ketchum, Bates, Dodge, & Pettit, 1996). Problem behaviors in children can lead to substance abuse, withdrawal from school, risky sexual behaviors, and violence, which can jeopardize the typical transition into young adulthood (Jessor, 1991). However, parental monitoring may continue to be influential in reducing problem behaviors during childhood and into adolescence (Shaw & Bell, 1993; Simons-Morton, Haynie, Eitel, & Saylor, 2001).

Parental monitoring has been broadly defined as the degree to which parents are aware of their child's whereabouts, activities, and peer relationships (Dishion & McMahon, 1998; Moilanen, Shaw, Criss, & Dishion, 2009). Although studies have found that parental monitoring can help reduce child problem behaviors, Stattin and Kerr (2000) argue that defining and measuring monitoring in terms of a parent's general knowledge of a child's behavior does not accurately explain the dynamics of the relationship between parental monitoring and child outcomes. Stattin and Kerr state that researchers have often assumed that parental monitoring is a parent-initiated behavior, and by making such an assumption, researchers do not capture the actual *sources* of parents' knowledge regarding child friendship networks and activities. Stattin and Kerr recommend that researchers reconceptualize parental monitoring, and utilize the sources of monitoring to better understand how much parents know about children, and how parents have gained such information. Therefore, the current study explores the various sources of parental monitoring and whether the sources of monitoring are differentially associated with early parenting behaviors and child behavioral outcomes.

Researchers have suggested there is a bias in the parenting literature regarding ethnicity and parenting behaviors, such that the parenting style considered most optimal for child development is typically authoritative and includes parenting behaviors related to warmth and psychological autonomy (Steinberg, Dornbusch, & Brown, 1992). However, such parenting behaviors can be sensitive to ethnicity because much of the research is calibrated on White American middle- and upper middle-class families, whereas parenting behaviors practiced in lower SES families and families from other ethnic backgrounds share many features with parenting styles considered to be less optimal (Chao, 1994; Leyendecker, Harwood, Comparini, & Yalçpnkaya, 2005).

A few researchers have examined how ethnic differences in parenting may be differentially associated with child outcomes. For example, Park and Bauer (2002) found that for adolescent academic achievement, the most effective parenting style was accepting parenting for White American students, strictness for Hispanic students, and supervision for Asian American students. Additionally, some research suggests that a harsh discipline style does not have the same negative effects on child behavior for African American children as it does for White American children (Deater-Deckard, Dodge, Bates, & Pettit, 1996). Research relating parenting behaviors, ethnicity, and child behavioral outcomes is limited, and ethnic minority parents may still be seen as having inferior parenting strategies. Therefore, in addition to examining the role of ethnicity in parental monitoring, the current study also examines the role of ethnicity in the prediction of child outcomes from parenting behaviors.

Sources of Monitoring

Parents can gain information of child whereabouts, activities, and child friendship networks through three sources: (a) disclosure, (b) solicitation, and (c) parental control (Kerr, Stattin, & Trost 1999; Stattin & Kerr, 2000). Through disclosure, children tell parents about their activities spontaneously and without any prompting. Parental solicitation occurs when parents ask children directly for information regarding their activities. Parents utilize control by imposing rules and restrictions on child activities and associations, thereby attempting to control child behavior in the absence of a parent or other adult, and to limit the amount of freedom children have to do things without telling a parent. As Stattin and Kerr (2000) advocate for redefining monitoring by establishing unique monitoring sources, it is inadvertently assumed that the only way that parents can gain information about child behaviors and whereabouts outside the home is through direct and reciprocal parent-child communication. However, it is also plausible that parents can gain information about children from other sources including siblings, their child's friends, other family members, teachers, other parents, or even notes that are sent home from school.

By examining the sources of parental monitoring, instead of a broad monitoring construct, researchers acquire a better understanding of the specific ways in which parents gain information about their children. Exploring the individual sources of parental monitoring and their relationships to child outcomes, researchers can also make better recommendations regarding the best ways for parents to manage child behavior inside and outside the home.

Disclosure. Parents should establish channels of mutual and open communication so that children are comfortable enough to share their experiences and whereabouts with their parents (Crouter, MacDermid, McHale, & Perry-Jenkins, 1990). The formation of a close parent-child relationship promotes child disclosure and decreases the probability of child antisocial behavior (Vieno, Nation, Pastore, & Santinello, 2009). Thus, child disclosure can be an important aspect of parental monitoring that can contribute to the prevention or reduction of child problem behaviors.

Solicitation. Parents who exhibit solicitation by directly asking the child about his or her activities and behavior as well as the activities and behavior of others who interact with the child, are more knowledgeable about the child's daily experiences than parents who do not exhibit solicitation (Waizenhofer, Buchanan, & Jackson-Newsom, 2004). Parental solicitation may be interpreted by the child as an indicator of parental attention, interest, and concern, and may encourage the child to be more open to questions from parents (Crouter, Helms-Erickson, Updegraff, & McHale, 1999; Dishion & McMahon, 1998). Solicitation of information can be one of the most essential aspects of parental monitoring as mothers have been found to utilize solicitation more than other sources of monitoring (Crouter, Bumpus, Davis, & McHale, 2005).

Control. Behavioral control consists of parental regulation of child behavior through maturity demands, limit setting, establishing rules, and maintaining a clear understanding of behavioral expectations in certain situations (Barber, 1996; Galambos, Barker, & Almeida, 2003) Through control, parents may gain knowledge of child behaviors by establishing rules and expressing expectations that children abide by such rules. Control may foster child self-regulation and compliance, which are related to

decreased child externalizing behaviors (Aunola & Nurmi, 2005; Barber, Olsen, &

Shagle, 1994).

      Outside sources. Crouter et al. (2005) and Stattin and Kerr (2000) acknowledge

that there may be other ways parents can monitor children that do not include direct

parent-child conversation. However, there is a need for empirical research to support such

outside sources as a reliable source of parental monitoring.

Effectiveness of Parental Monitoring Sources

      Stattin and Kerr (2000) suggest that child disclosure of activities and whereabouts

more strongly explains child problem behavior than control and solicitation. Similar

research has found that youth disclosure of information contributes to increased parental

knowledge over time; whereas parent initiated efforts (i.e. solicitation and control), do

not (Cumsille, Darling, & Martinez, 2010; Kerns, Aspelmeier, Gentzler, & Grabill, 2001;

Kerr, Stattin, & Burk, 2010). Thus, many scholars would suggest that the process by

which parents obtain knowledge of their child's activities might be best reflected through

child disclosure, rather than parent initiated monitoring efforts such as solicitation and

control.

      In contrast, Fletcher, Steinberg, and Williams-Wheeler (2004) reported that higher

levels of parental solicitation and control do significantly predict increases in parental

knowledge. Laird and Marrero (2010) found that for youth reporting small amounts of

unsupervised time, higher child disclosure was associated with less antisocial behavior.

However, when youth reported large amounts of unsupervised time, higher disclosure

was not associated with less antisocial behavior after accounting for concealing

strategies, continuity in antisocial behavior, and gender. Laird and Marrero indicated that,

in addition to child disclosure, examining parental monitoring using parent solicitation and control efforts could also be beneficial, particularly when children attempt to conceal their activities.

Parental control can play a role in preventing externalizing behavior. Galambos and colleagues (2003) found that in a group of youth with a high association with deviant peers, there was a general increase in externalizing problems across time. However, for youth whose parents' exerted higher levels of control, the trajectory of externalizing decreased compared to youth with lower levels of control. Results suggest that behavioral control can be negatively associated with rate of change in externalizing problems, implying that the increase in externalizing symptoms is more rapid in children with parents who report less behavioral control.

Overall, there is an important shift in the parental monitoring literature that should encourage researchers to better explore the sources of parental monitoring. Whereas some researchers have begun to examine specific sources of monitoring, no consistent patterns have emerged; thus it remains unclear whether all three sources of monitoring provide unique contributions to child problem behaviors. Stattin and Kerr (2000) suggest that the only important monitoring source is disclosure, but other researchers have found that parental knowledge of child activities is best acquired by some combination of the sources of monitoring (i.e. control, solicitation, and disclosure) (Laird, Marrero, & Sentse, 2010; Lippold, Greenberg, & Feinberg, 2011; Vieno et. al, 2009).

Additionally, no known studies have examined ways that parents can gain information from outside sources, such as from teachers or parents of the child's peers. One of the main goals of this study is to explore the unique role of parental monitoring

sources. In much of the research reviewed here, monitoring is defined as a parent's general awareness and understanding of a child's activities and peer networks and is not a reflection of specific sources of monitoring (Pettit & Laird, 2002). In cases where a specific source of monitoring was incorporated into a study, that source will be identified.

Early Parenting

Parental monitoring is correlated with other parenting behaviors that are related to maintaining positive parent-child relationships (Fletcher et al., 2004). Positive parenting behaviors may lead to an enjoyable and communicative parent-child relationship. Children may feel comfortable disclosing their activities when parents have created a warm, open, and responsive environment. Pettit, Keiley, Laird, Bates and Dodge (2007) found that parents who display positive parenting behaviors are likely to maintain a relatively high level of monitoring over time. Pettit and Laird (2002) also found that parental monitoring during adolescence is predicted by indicators of positive parenting during early childhood such as limit-setting and involvement. In contrast, research suggests that risk factors of parenting, such as stress, can hinder a parent's ability to effectively monitor a child's whereabouts and activities because they can disrupt parental attention to child behavior (Wahler & Dumas, 1989).

Responsivity. Parent responsivity is defined as the degree to which a parent is behaviorally and emotionally sensitive and responsive to the child's moods, interests, and expressions of need (Caldwell & Bradley, 1984; Whiteside-Mansell, Bradley, & McKelvey, 2009). Monitoring in middle and late childhood has been linked to parent responsiveness in early childhood (Dodge, Bates, & Criss 2001; Moilanen, Shaw, Criss, & Dishion, 2009; Patrick, Snyder, Schrepferman, & Snyder, 2005). Parental

responsiveness and availability have been positively associated with levels of child

disclosure (Kerns et al., 2001; Soenens, Vansteenkiste, Luyckx, & Goossens, 2006).

Children of more responsive and accepting parents have a higher accuracy of perceived

parental values and expectations (Knafo & Schwartz 2003). Parents who maintain a

responsive parent-child relationship are likely to have children who are less involved in

problem behaviors and are more open to communication about their whereabouts and

friendship networks (Bogenschneider, Wu, Raffaelli, & Tsay, 1998; Cottrell et al., 2007;

Knafo & Schwartz 2003).

Efficacy. Parental efficacy is a parent's self-perception of the ability to perform

competently and effectively in a particular parenting task or setting as it relates to the

child (Teti & Gelfand, 1991). Efficacy is important in parenting as it is negatively related

to child delinquency (Wright & Cullen, 2001). Higher parental efficacy can also predict

increases in parental monitoring (Shumow & Lomax, 2002).

Stress. Stressors may disrupt parenting practices, which in turn, may increase the

development of child behavior problems and activate a cycle of negative parent-child

interactions (Kazdin, 2003). Parental stress can be a function of several things including

parent factors, such as work or maintaining a home; child factors, such as temperament or

changes in child development; and family system factors, such as marriage or other

children in the home (Crnic & Low, 2002). Stress can negatively affect parents'

attentiveness to child behavior and activities as well as parents' perceptions of the child,

which can hinder the quality of parent-child communication and monitoring (Aber,

Belsky, Slade, & Crnic, 1999; Moss, Rousseau, Parent, St-Laurent, & Saintonge 1998).

Although parental monitoring may contribute to reductions in child problem behaviors,

parental stress can negatively affect later child behaviors because of its potential negative effects on parental monitoring (Assel et al., 2002; Webster-Stratton, 1990).

Studies generally suggest that for parents, the ability to foster and maintain monitoring skills is affected by positive parenting behaviors. However, no research has examined the influence of parenting behaviors during early childhood on specific parental monitoring sources during middle childhood (Moilanen et al., 2009; Patrick et al., 2005; Pettit et al., 2001).

Parental Monitoring and Child Outcomes

Much of the recent research examines parental monitoring during adolescence, when youth typically spend a lot of time out of the home. Parental monitoring has been negatively associated with a variety of antisocial and risk behaviors in adolescence, including smoking, drinking, marijuana use, sexual involvement, dating violence (Brendgen, Vitaro, Tremblay, & Lavoie, 2001; Dishion, Patterson, Stoolmiller, & Skinner, 1991; Griffin, Botvin, Scheier, Diaz, & Miller, 2000). However, it would be beneficial to determine the extent to which monitoring occurs during childhood and to better understand the association between parental monitoring and child problem behavior.

Effective parental monitoring can influence youth to choose friends who do not exhibit risky behaviors and to organize positive social networks and activity outlets (Griffin et al., 2003; Thorlindsson & Bernburg, 2006; Warr, 1993). Dishion and colleagues (1991) examined the role of parental monitoring in child antisocial behavior and peer relationships at ages 10 and 12. Results indicated that parental monitoring at age 10 negatively predicted later associations with deviant peers at age 12. Dishion and colleagues emphasized the need to examine the role of parental monitoring during

childhood as a prevention strategy for conduct problems and delinquency during adolescence. An important study finding was that the relationship between monitoring and involvement with antisocial peers at age 12 became non-significant after accounting for the stability of the boys' peer network and early problem behaviors. The role of the peer group in antisocial behavior may be established earlier than adolescence and remain stable throughout adolescence, suggesting a need to understand the role of parental monitoring during childhood, when the criteria to select friends are typically formed.

Developmental changes in children. Developmental changes in a child can initiate parent withdrawal from monitoring efforts. As children get older, parents may have more difficulty obtaining information from children who are engaged in delinquent behavior as they can be hostile, difficult to track, and unwilling to communicate with parents about their whereabouts and social networks (Fite, Colder, Lochman, & Wells, 2006; Laird et al., 2003). Although parental monitoring may have longitudinal associations with problem behaviors during adolescence, such longitudinal associations can be influenced by the concurrent relationships between monitoring and problem behaviors during childhood (Kiesner, Dishion, Poulin, & Pastore, 2009). Patterson et al. (1992) reported that when parents' efforts to monitor have been repeatedly defeated by the child, any attempt to improve monitoring is often met with intense resistance. One might argue that by the time children reach adolescence, an accepting or resistant pattern of parental monitoring is already established and therefore parental monitoring, or lack thereof, is relatively unmalleable during adolescence.

Research on parental monitoring in a sample of high school students found no significant increases or decreases in monitoring from grades 9 to 12 (Laird, Pettit, Dodge,

& Bates, 2003). Stanger, Dumenci, Kamon, & Burstein (2004) examined parental monitoring in a sample of children and adolescents ages 6-18. Results indicated that poor monitoring increased with age. Furthermore, there were significant negative effects of age on aggressive behavior and attention problems such that younger children exhibited more externalizing problems than older children. Such results provide additional evidence for the importance of examining parental monitoring during childhood in order to better assess the trajectory of problem behaviors as they relate to early parental monitoring.

Problem behaviors. A limited number of studies have examined the specific sources of parental monitoring as they relate to child behavioral outcomes (Dishion, et al., 1991; Dick et al., 2009 & Fulkerson, Pasch, Perry, & Komro, 2008). In the literature on the relationship between monitoring and child outcomes, only three studies were identified that utilized the specific sources of parental monitoring (Crouter, et. al., 1990; Barnes, Reifman, Farrell, & Dintcheff, 2000; Vieno et al., 2009).

Vieno and colleagues (2009) found that mothers who provided high levels of control over child behavior and established a close relationship, promoted more disclosure and decreased the probability that their child would engage in antisocial behavior. Vieno and colleagues suggest that for parents, child disclosure may serve as a pathway to reducing negative outcomes. However, additional research is needed to provide a better understanding of ways in which the unique sources of parental monitoring (i.e. control, solicitation and disclosure) influence child outcomes.

Aggression. Previous research suggests a negative relationship between parental monitoring and aggression. Carlo, Raffaelli, Laible, and Meyer (1999) examined parental

monitoring as a predictor of aggression in a group of teenagers (age 12-19). Results indicated that parental monitoring was significantly negatively related to adolescent aggression. Similarly, Leadbeater, Banister, Ellis, and Yeung (2007) found that parental monitoring was negatively associated with relational aggression in adolescents. There is also evidence of a longitudinal relationship between parental monitoring and problem behaviors such that low levels of parental monitoring during early adolescence are associated with higher levels of aggression and antisocial behavior in late adolescence and early adulthood (Capaldi & Clark, 1998).

Parental monitoring can be a protective factor for common aggressive behaviors such as yelling, hitting, or pushing/shoving (Griffin et al., 2003). Orpinas, Murray, and Kelder (1999) measured a sample of middle school students' perceived monitoring using child reported items of parental awareness of activities outside of the home. The researchers divided the sample into five monitoring levels ranging from *very low* to *very high* monitoring. Aggression scores were almost three times higher among students with *very low* parental monitoring than students with *very high* parental monitoring. As parental monitoring increased, the odds of being involved in violent behaviors, such as fighting or carrying a weapon, decreased.

Rule-breaking. Parental monitoring can also predict future rule-breaking or delinquent behaviors. Specifically, Laird, Pettit, Bates, and Dodge (2003) found that in a sample of eighth grade adolescents, lower levels of parental monitoring predicted higher stealing, lying, and cheating one year later. Laird, Marrero, and Sentse (2010) examined 12 year-olds reported beliefs about the legitimacy of parental authority regarding monitoring and information management. Greater use of disclosing strategies was

associated with less rule-breaking at high levels of authority beliefs, but not at moderate

or low levels of authority beliefs. In contrast, greater use of concealing strategies was

associated with more rule-breaking at low levels of authority beliefs, but not at moderate

or high levels of authority beliefs. Such results support the relationship between parental

monitoring and rule-breaking, but also suggest that it is important to examine different

sources of parental monitoring such as parental solicitation or control, as youth may

attempt to conceal information from parents by not disclosing negative behavior.

Stanger and colleagues (2004) found that after controlling for the effects of child

age, gender, and ethnicity and the gender of the caregiver, poor monitoring was

significantly related to increased rule-breaking behavior in children and adolescents.

Patterson (1984) classified students based on the number of times they came in contact

with the police from seventh and tenth grade. Participants were classified based on the

number of contacts with the police that resulted in a juvenile court record. Classifications

included nondeliquents, moderate offenders (one or two police contacts) and persistent

offenders (three or more police contacts). While contact with police does not necessarily

indicate guilt, results indicated that the parental monitoring variable was the only variable

to differentiate chronic from moderate offenders such that 21% percent of the non-

delinquents reported being poorly monitored, whereas 50% of the moderate offenders and

73% of the persistent offenders reported poor monitoring. Similarly, a self-reported

measure of delinquency indicated that 10% of non-delinquents, 30% of moderate and

76% of serious delinquents indicated poor parental monitoring.

Ethnicity and Parenting

Ogbu's (1981) cultural-ecological theoretical model states that underlying cultural

mechanisms influence parental strategies. The model suggests that adult competencies originate in the nature of cultural tasks based on environment and culturally organized interpersonal skills that have evolved over time. The model proposes that such culturally specific competencies and skills influence parents' theory of parenting and child rearing techniques. Ethnicity and cultural traditions or routines are thought to be integral to parenting and child development and provide the infrastructure for the successful learning and practice of self-regulatory strategies (Dishion & Patterson, 2006; Garcia et al., 1996).

Researchers have argued that there are unique ethnic group factors that can moderate the relationship between parenting behaviors and child outcomes (Ogbu, 1981; Deater-Deckard & Dodge, 1998; Deater-Deckard et al., 1996). Brooks-Gunn and Markman (2005) reported that the main ethnic differences in parenting are related to nurturing, discipline, teaching, and language. Research suggests that ethnicity plays a role in parental monitoring; however, only a few studies could be identified, and results appear inconsistent (Shakib et al., 2003; Shumow & Lowmax, 2002; Simons, Wu, Lin, Gordon, & Conger, 2000).

It is important to recognize that ethnicity represents a fixed attribute of a person, and is not a behavior that can be changed. Thus, Helms, Jernigan, and Mascher (2005) cautions against using ethnicity as an independent variable, but does indicate that there are cases in which using ethnicity as an independent variable is appropriate. In particular, Helms and colleagues state that when there is a theoretical reason to use ethnicity, such as to explore socialization or group cohesion, it can be appropriate to use ethnicity as an independent variable. However, the researchers do not specifically address the use of

ethnicity as a moderating variable. It can appropriate to incorporate ethnicity in statistical analyses as a moderator to explore whether the relationships between behavioral variables are consistent across ethnic groups. Such analyses allow researchers to better identify when relationships differ in the magnitude or direction of effects, in order to make more tailored recommendations for behavioral change that may be based on attributes specific to a particular cultural or ethnic group.

Yasui and Dishion's (2007) review of parenting literature highlights ways in which cultural traditions and values can lead to general ethnic differences in parenting styles and strategies between White American and African American parents. Given that there is literature that supports the cultural components of parenting, it is appropriate to use ethnicity as a moderating variable to better understand how ethnic differences in parenting might affect the relationship between parenting and child outcomes.

White American parents. White American parents tend to be authoritative, and foster autonomy among children (Yasui & Dishion, 2007). Since much of the parenting research consists of mostly White American samples, many models of parenting and problem behavior do not account for the potential ethnic differences in relationships for minority parents (Leyendecker et al., 2005). As a result, interventions have often targeted behaviors, attitudes, and beliefs that are more typical of White American families (Yasui & Dishion, 2007).

African American parents. African American parents tend to exhibit an authoritarian parenting style, in which they emphasize cooperation and make unilateral parenting decisions (Yasui & Dishion, 2007). Some have argued that parenting practices among African American families are directed by parents' perceptions of realistic

dangers and risks such as prejudice and neighborhood disorder that children may

encounter (Ardelt & Eccles, 2001; Natsuaki et al., 2007). Thus, African Americans across

various socioeconomic levels may perceive a strict or "no nonsense" parenting style as

necessary to the development of effective coping abilities in the face of harsh realities of

racism and discrimination (McLoyd, Cauce, Takeuchi, & Wilson, 2000). "No nonsense"

parenting is characterized by high levels of parental control and strictness, including

physical punishment, which occurs along with high levels of affectionate behaviors

(Brody & Flor, 1998). The concept of "no nonsense parenting" was not developed based

on ethnicity; however, several researchers have used the term to characterize African

American parenting (McGroder, 2000; Steele, Nesbitt-Daly, Daniel & Forehand, 2005).

Ethnicity and monitoring. Ethnicity can play a role in the development of

parental monitoring, as well as in the relationship between parental monitoring and child

outcomes. Research has suggested that there is a relationship between parental

monitoring and ethnicity such that some ethnic groups exhibit higher levels of monitoring

than others, but no clear patterns have emerged. In addition, the literature has not

addressed how ethnicity might specifically relate to the different sources of monitoring.

African American and Hispanic American children and parents, for example, may be

more likely than White American children and parents to perceive high levels of parental

control and management as an indication of concerned, involved, and effective parenting

(Elder, Eccles, Ardelt, & Lord, 1995).

Shakib and colleagues (2003) examined parental monitoring in a sample of

Hispanic American, Asian American, multiethnic, and White American children. After

controlling for age, gender, generation status, family household structure and SES,

Hispanic Americans reported the highest levels of monitoring followed by the multiethnic and White American subsamples. Asians reported the lowest levels of parental monitoring. Pratt, Turner, and Piquero (2004) found that Non-White children experienced lower levels of monitoring and higher levels of discipline than White American children.

Among a sample of Taiwanese and White American parents, the Taiwanese scored significantly lower on monitoring than the White American parents (Simons et al., 2000). Additionally, the interaction between parental monitoring and corporal punishment was not significant for the White American boys but was significant for the Taiwanese boys. The interaction indicated that when Taiwanese mothers were high on monitoring, there was no relationship between corporal punishment and conduct problems, but when mothers were low in monitoring, increased use of corporal punishment was associated with higher levels of conduct problems. The researchers did not control for any demographic variables in the analyses.

Huebner, Laurie, and Howell (2003) compared parental monitoring in African American and White American families. There was no direct interaction between ethnicity and monitoring; however, after controlling for child gender and age, an interaction between ethnicity and parent-child communication emerged demonstrating that low communication and minority status predicted higher child risk-taking behaviors. Additionally, there was an interaction between communication and monitoring, indicating that children who received low monitoring and infrequent communication were engaged more in high risk-taking behaviors.

Bohnert, Ríos-Bedoya, and Breslau (2009) examined ethnic influences on the

relationship between parental monitoring and adolescent smoking initiation. Although

there were no differences on levels of monitoring between African American and White

American parents, a significant interaction between ethnicity and parental monitoring

emerged. Specifically, for White American children, an increase in parental monitoring

predicted a decreased likelihood that a youth would initiate smoking behaviors by age 17.

However, for African American adolescents, there was no significant relationship

between parental monitoring and smoking initiation. Shumow and Lowmax (2002) found

that after accounting for SES and age, parental monitoring led to better social emotional

adjustment only for White Americans, not for African Americans or Hispanic Americans.

Scholars have proposed that some parental differences based on ethnicity may

disappear when socioeconomic status (SES) is controlled (Patterson, Kupersmidt, &

Vaden, 1990; McLoyd, 1990). However, such previous work did not focus on parental

monitoring. Other scholars have suggested that controlling for SES does not always

explain potential ethnic effects. Julian, McKenry, and McKelvey (1994) examined

whether ethnic effects in parenting attitudes, behavior and involvement were consistent

across SES. Results provided no indication that the ethnic differences in parenting varied

as a function of SES. In the current study, we will examine the effects of early parenting

and monitoring over and above any potential effect of SES.

Overview of the Current Study

The current study extends the current literature on parental monitoring in several

ways. Mainly, it provides a better understanding of the unique ways in which parents

monitor children by exploring the sources of parental monitoring, including outside

sources of parental monitoring which has not yet been explored in the literature. The goal

is to study provide insight into the development of parental monitoring by examining the

relationships between parenting behaviors during early childhood and parental

monitoring sources during later childhood. Additionally, we explore how the longitudinal

relationships between early parenting and parental monitoring sources can inform the

cross-sectional relationships between parental monitoring sources and child aggression

and rule-breaking behaviors during middle childhood. Innovations of this study include

being among the first to explore parental monitoring sources during childhood and to

examine the role of ethnicity in the associations among early parenting behaviors,

parental monitoring sources, and child outcomes.

Research aims. *Aim 1.* The first aim is to create latent constructs of the sources

of monitoring in order to gain a better understanding their individual effects. The focal

question is: Do parental control, solicitation, disclosure, and outside sources serve as

unique sources of parental monitoring in a diverse sample of low-income families?

Hypothesis 1. Four sources of monitoring will emerge from the measure of overall

monitoring: (a) control, (b) solicitation, (c) disclosure, and (d) outside sources. See Figure

1B for illustration of hypothesized construction of parental monitoring latent variables.

Aim 2. The second aim is to provide insight into the role of early parenting

behaviors in predicting monitoring sources and to identify whether ethnicity is a

moderator of those relationships. Research questions include: Do early parenting

behaviors, when children are ages 3-5, predict later parental control, solicitation,

disclosure, and outside sources when children are age 7? Are the relationships between

early parenting behaviors when children are ages 3-5 and the parental monitoring sources

when children are age 7 moderated by parent ethnicity?

Hypothesis 2a. Overall, early parental responsivity and efficacy will positively predict disclosure, solicitation, and outside sources. In contrast, early parenting stress will be negatively related to disclosure, solicitation, control, and outside sources.

Hypothesis 2b. Ethnicity will act as a moderator only for the relationships between both early parental efficacy and responsivity and parental control such that for African American parents early responsivity and efficacy will be positively related to control. However, for White American parents, early responsivity and efficacy will have a non-significant relationship with control. See Figure 1A for illustration of structural model.

Aim 3. The final aim is to gain a better understanding of the individual roles of each monitoring source in predicting child problem behaviors and to identify whether ethnicity is a moderator those associations. Research questions include: Does each source of parental monitoring when children are age 7 predict parent-reported child aggression and rule-breaking at age 7? Are the relationships between age 7 sources of parental monitoring and age 7 parent-reported child aggression and rule-breaking moderated by parent ethnicity?

Hypothesis 3a. Solicitation, disclosure, control, and outside sources will be negatively related to child aggression and rule-breaking behaviors.

Hypothesis 3b. Ethnicity will moderate the relationships between monitoring sources and child aggression and rule-breaking behaviors such that disclosure will be a stronger predictor of aggression and rule breaking for White American parents, while control will be stronger predictor of aggression and rule breaking for African American parents.

Figure 1. Hypothesized model of study variables. **A.** Direct effects of early parenting on sources of parental monitoring and direct effects of sources of parental monitoring on child aggression and rule-breaking. Child gender, SES and treatment group status are included as covariates. **B.** Abbreviated figure detailing the hypothesized items to construct the latent parental monitoring sources. See Appendix for measure items.

A.
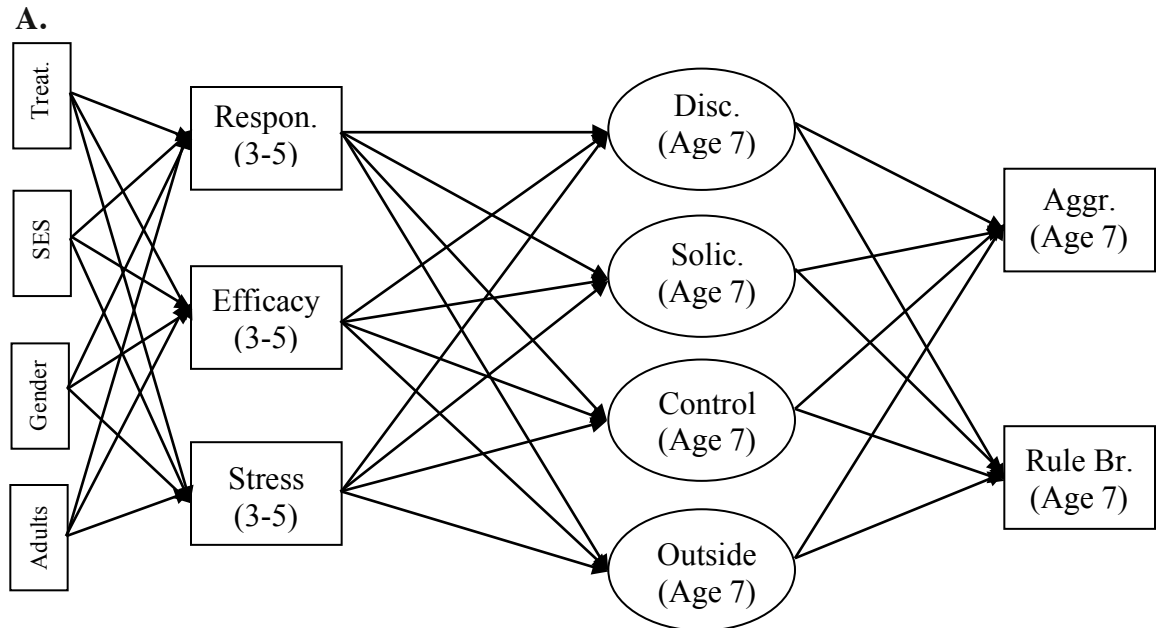
Note: Model error terms and covariances were omitted from the model in order to increase the clarity of presentation, but will be included in analyses.

B.
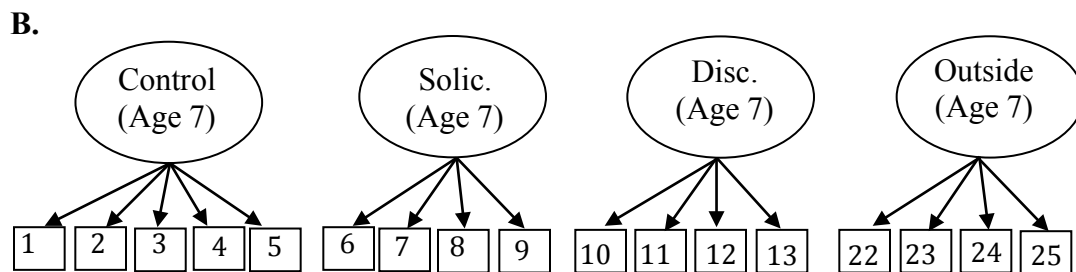
Note: Item numbers correspond with items on the Parental Monitoring Interview (See Appendix).

Method

Participants

The sample consisted of families who participated in The Early Steps Project, a multi-site, longitudinal, preventative intervention focused on reducing the early emergence of aggressive and withdrawn behavior in young children. Families were recruited from Women, Infants and Children (WIC) program centers in Charlottesville, Virginia; Pittsburgh, Pennsylvania; and Eugene, Oregon. Female researchers approached families waiting in the WIC center for appointments and asked them to participate in the study if they had a child age 21-33 months old. Parents were then asked to complete screening measures with questions based on three categories of risk factors for child behavioral problems: (a) SES, (b) parental risk, and (c) child risk. In order to meet criteria for SES risk the families had to have a total income that was within the range of eligibility for WIC services and no more than two years of post-secondary education. In order to meet criteria for parental risk, the parent had to endorse at least one of the following factors: (a) moderate level of depression; (b) moderate level of stress related to child's behavior; (c) use of drugs, alcohol, or mental health services within the past year; or (d) teen child birth. The criteria for child risk involved an endorsement of at least one of the following factors: (a) twelve or more behavioral problems in the child; (b) a high intensity score on child behavior checklist measure; or (c) a low score on adult-child relationship scale.

Of the 1,666 parents who were approached at WIC sites and had children in the appropriate age range, 879 families met at least two of the three risk criteria and 731 of these families agreed to participate in the study during the first wave of data collection

(age-2). The analyses for the current study include a sub-sample of White American and African American families, as these families represent the two largest participating ethnic groups. Moreover, the sub-sample includes parents who participated in the larger study at the age-3, age-4, age-5 and age7 waves. There was no data collection when children were 6 years-old. Of the 565 White American and African American families who participated at the age-3 wave, 487 (86%) were available at the age-4 follow-up, 486 (86%) participated at the age-5 follow-up and 473 (84%) participated at the age-7 follow-up. The 473 families were made up of 312 (66.0%) White Americans and 161 (34.0%) African Americans are included. The average age of the mothers was 28.18 years (*SD* = 6.8). The average level of the mothers' educational attainment was high school diploma/GED certificate. The average gross family income was $27,538 per year (SD = $17,248). White American parents reported significantly higher income and more adults in the home than African American parents (see Table 1).

Table 1

Demographics by ethnic group

Variable	White (*n* =312) Mean (SD)	African American (*n* = 161) Mean (SD)	*p*
Age	28.20 (7.0)	28.14 (6.2)	.92
Gross income	$31,040 ($18,029)	$20,752 ($13,249)	<.001**
Education	HS Grad./GED	HS Grad/GED	.24
Num. adults in the home	2.05 (0.77)	1.68 (0.80)	<.001**
Parent gender-Woman	297	156	.38
Bio parent-Yes	301	154	.66

Note: * *p* < .05; ***p*<.01.

Procedure

Research assistants approached families at the WIC centers, and caregivers who gave consent to participate in the study then filled out a packet of questionnaires, which took 20-25 minutes to complete. The questionnaires focused specifically on parental

depression, parenting stress, child behavior problems and the quality of the adult-child

relationship. Upon completion of the packet, the mothers were paid $10 for their

participation. Based on the risk criteria, eligible families were contacted by telephone and

invited to participate in the study. Of the participating families, approximately half were

randomly assigned to the treatment group condition and approximately half were

assigned to the comparison group condition. A research team then met families at their

home for a 3-hour home visit, in which parents completed additional written

questionnaires and engaged in a series of observational tasks with their child. Parents

were reimbursed $100 for engaging in the 3-hour home visit. The home visits continued

at each subsequent wave of data collection. All parent and child data are collected during

the annual home visits.

Home visit research teams were comprised of 2-3 staff members: a lead examiner,

videographer, and babysitter, if non-target children were present in the home during the

visit. All of the members of the research team underwent training prior to beginning the

home visits to learn the protocol. In addition, all of the lead examiners held at least a

bachelor's degree and took part in a formalized certification process, which required the

approval of both a local and a site-wide Assessment Coordinator and also regular

performance evaluations every three months.

Treatment is based on the Family Check-Up (FCU), a preventative intervention

model that has been adapted to specifically address the normative challenges parents face

during toddlerhood (Dishion et al., 2008, Shaw, Dishion, Supplee, Gardner & Arnds,

2006). After each yearly wave of data collection, participants assigned to treatment

receive the FCU intervention, which involved at least two sessions with the average

number of session being three. The first session focused on a rapport building and an interview with a parent consultant (PC), which is referred to as the Get-to-Know-You (GTKY) visit. After the GTKY, a feedback session was planned during which the PC discusses the results of the assessment and initial interview with attention focused on the caregiver's readiness to change and the delineation of specific change options. At the end of the feedback session, the PC discussed a menu of intervention options, which included (a) monthly to weekly follow-up support, either in person or by phone; (b) assistance with specific problem behaviors or parent issues; (c) parent management training; (d) preschool/daycare consultations; and (e) community referrals. Treatment families can schedule with their PC succeeding visits to work on their particular area of concern. Families in the control group participate in the yearly in-home family assessment and receive a list of community resources, but do not participate in any of the sessions with the PC.

Following the GTKY, the parent consultant analyzed the videotapes of the home visit and the questionnaires for the intervention group families. Based on a standardized scale, the parent consultant rated the mother and the target child on areas related to the child's behavior and the mother's parenting skills. During an additional visit to the home (the feedback session), the mothers were given feedback based on the parent consultant's ratings. The main objective of the feedback session was to explore the parents' willingness to change problematic parenting practices, to support existing parenting strengths, and to identify services appropriate to the family needs. Before concluding the home visit, the parent was offered follow-up sessions that were focused on parenting practices, other family management issues (e.g., co-parenting), and contextual issues

(e.g., child care resources, marital adjustment, housing, vocational training). Families

were given a gift certificate for $25 for completing the FCU at the end of the feedback

session, which could be used at local supermarkets or video stores.

About 30% percent of the families chose to engage in additional parenting

sessions via either phone or home visits. The families in the intervention that did not

engage in additional parenting sessions still received the feedback visit after each annual

home visit from the research team.

Measures

Demographics questionnaire. A demographic questionnaire was administered to

parents during each visit. This measure included questions about family structure,

parental education and income, parental criminal history, and areas of familial stress.

Income was assessed as total household income per year.

Infant/Toddler & Early Childhood Home Observation for Measurement of the

Environment (HOME; Caldwell & Bradley, 1984). The HOME is an observational

instrument that measures the quality and quantity of verbal and emotional stimulation and

support available to a child in the home environment. A research assistant observed

parent child interactions for at least an hour and recorded whether or not specific actions

occurred (ex. "Parent responds verbally to child's vocalizations or verbalizations"). The

infant/toddler version of the HOME Inventory is designed for use during infancy (birth to

age 3). It is composed of 56 items clustered into 8 subscales. A reliability analysis of the

infant/toddler version revealed a Cronbach's alpha value of .45. Because of the low alpha

value for the infant/toddler HOME, this measure was not included in the study and parent

responsivity was not assessed at age 3, as intended. The early childhood version is

composed of 61 items clustered into 8 subscales, and revealed a Cronbach's alpha value

of .69. The subscale included in the current study is parent responsivity.

Parenting Sense of Competency Scale (PSOC; Gibaud-Wallston &

Wandersman, 1978; as cited in Johnston & Mash, 1989). The PSOC is 19-item

measure of parental competence that includes two subscales: efficacy and satisfaction.

The 7-item efficacy subscale, which assesses parents' perceptions of the degree to which

they have acquired the skills and understanding to be a good parent, was used.

Participants rated items on a 6-point scale, with response options ranging from "strongly

agree" to "strongly disagree." The measure has a Cronbach's alpha value of .78.

Parenting Daily Hassles (PDH; Crnic & Greenberg, 1990). This is a 20-item

measure of parental stress related to everyday events parents encounter with children.

Parents rated the frequency of occurrence on a 4-point scale and how hassled they felt by

the event on a 5-point scale. Two factors, frequency and intensity, were created from

these scores. The current study focuses on the intensity factor to measure how stressful

events are for parents, regardless of frequency. The intensity factor has a Cronbach's

alpha value of .88. Research with the PDH has demonstrated relations with child problem

behaviors over and above those accounted for by more global life stresses (Crnic &

Greenberg, 1990).

Parental Monitoring Interview (PAMI; Kiesner, Dishion, Poulin, & Pastore,

2009). The Parental Monitoring Interview is a 25-item measure that assesses parental

monitoring behaviors and child disclosure of and involvement in children's activities,

consistency of discipline, and family rules. The PAMI is adapted from a measure Kiesner

and colleagues (2009) used, which incorporated slightly modified items from the parental

monitoring scale developed by Stattin & Kerr (2000) to represent each source of

monitoring. The measure includes three theoretical subscales: control, solicitation, and

disclosure. The PAMI includes some additional items and an additional theoretical

subscale: outside sources. A five-point response scale was used for all items. Although

the wording of some item responses was changed based on the format of the question,

most ratings ranged from "almost never" to "very often". Five of the items included a

"does not apply" option. This measure is reliable with a Cronbach's alpha value of .72.

Child Behavior Checklist (CBCL ages 6–18; Achenbach, 1991; Achenbach &

Rescorla, 2001). The CBCL is a parent-report instrument designed to capture children's

behavioral and emotional problems and competencies. The CBCL for ages 6-18 is a

parent report measure including 112 problem items and 3 open-ended items for additional

problems, which was administered to parents when the child was 7 years old. Parents

used the three-point scale, ranging from "Not True" to "Very True or Often True", to

report how true a particular statement represents their child's behavior (ex. "Disobedient

at home"; "Can't sit still"). The CBCL was scored using the CBCL syndrome definitions.

The two syndromes included in the current study are rule-breaking behavior and

aggressive behavior. Both the aggressive behavior and the rule-breaking subscales are

comprised of 17 items each, and have Cronbach's alpha values of .91 and .68

respectively.

Data Analysis

Scale Validation

The foundation of the current study relies on the validation of the Parental

Monitoring Interview scale to identify unique monitoring sources as latent constructs of

parental monitoring in a diverse sample of low-income families. Items from the measure have been used in previous empirical research to create disclosure, solicitation, and control variables. However, the constructs have not yet been established via exploratory factor analysis.

An exploratory factor analysis (EFA) and a confirmatory factor analysis (CFA) were performed to address whether disclosure, solicitation, control, and outside sources are unique factor structures of parental monitoring. All items from the Parental Monitoring Interview were included in an EFA to determine if the four latent factors would emerge. Items loading on to factors greater than .30 were submitted to a subsequent multiple group CFA.

A multiple group CFA was used to establish measurement invariance across ethnic groups, meaning that the parental monitoring measure assessed the same constructs across groups. Parameter estimates were modeled separately across both ethnic groups in one model and constrained to be equal in another model. A significant change in X^2 between the two models indicated that the constrained and unconstrained models are the same, thus, the factor model applies across both groups.

SEM Multiple Group Analyses

Multiple group SEM was employed to determine the pathways to child aggressive and rule-breaking behaviors through early parenting behaviors and parental monitoring sources. Model parameters were examined in order to make group comparisons based on ethnicity, which is classified as African American or White American.

The multiple group model verified whether the pathways from early parenting to parental monitoring sources and the pathways from parental monitoring sources to child

outcomes differed for African American or White American parents. Specifically, paths between the three early parenting variables (ages 3-5, averaged) and the four monitoring sources at age 7 were examined. In turn, paths between the four monitoring sources, and child aggression and rule-breaking at age 7 were examined. The multiple group model controlled for child gender, SES, treatment group status and the number of adults in the home.

Assessing Model Fit

Model fit was examined using several common fit indices including X^2, Root Mean Square Error (RMSEA), and Comparative Fit Index (CFI). For X^2 and RMSEA, lower values indicate a better fitting model. A value of 0 represents a perfect fitting model, values less than .06 indicate a close fit, and values larger than .10 indicate a poor fit. For CFI, larger values indicate a better fit, with values of 1.0 indicating a perfect fit, and values of .90 are required to accept the model.

Missing Data

Missing data were addressed using full information maximum likelihood (FIML), a commonly used method to address missingness in SEM analyses, assuming that the data are missing at random (MAR). FIML methods deal with missing data, do parameter estimation, and estimate standard errors all in a single step (Graham, 2009). The FIML algorithm allows for all available data to be used for parameter estimation and calculates missingness at the individual level rather than the group level. Research suggests that FIML is the most efficient way to address missingness in SEM models (Enders & Bandalos, 2001).

Results

A principal axis factor analysis with a varimax (orthogonal) rotation of 23 of the 25 items from the parental monitoring measure was conducted on all 473 participants. A scree test and the eigenvalue greater than 1.0 criteria were utilized to determine how many factors to retain. Initially, two items were excluded from the exploratory factor analysis because of a high level of non-applicable responses among participants. The items were, "When your child is home without an adult, how often are there specific rules about the kinds of things s/he may do?" and "When your child is home without an adult, how often does s/he call you, leave a note, or let you know if s/he leaves your house or yard?" These two items had 69.3% and 82.7% percent of caregivers responding, "does not apply", respectively, thus indicating that the child is never home without an adult. Given that the children in this sample are 7 years old, the amount of "does not apply" responses suggests that these two items are not appropriate for parents of children this age.

The results of the exploratory factor analysis are shown in Table 2. The scree plot for the initial factor analysis suggested four factors but explained only 44.6% of the variance in the measure. Subsequently, items with loadings less than 0.30 were excluded, as well as items that had double loadings, if the difference between the two loadings was less than 0.30. The final exploratory factor analysis consisted of 17 items among four factors and explained 53.9% of the overall variance in the measure. The first factor accounted for 17.1% of the total variance and the six items that loaded on this factor appeared to tap a "disclosure/solicitation" dimension. Thus, the items asking how often parents or children began conversations about various things did not load as two separate

factors, as expected. The second factor accounted for 16.2% of the total variance and the

four items that loaded on this factor appeared to tap an "outside sources" dimension.

Additionally, two unexpected factors emerged. The third factor accounted for 12.2% of

the total variance and the five items that loaded on this factor appeared to tap a "general

knowledge" dimension. The fourth factor accounted for 7.9% of the total variance and

the two items that loaded on this factor appeared to tap a "weekly communication"

dimension. Parental "control" and did not emerge as a unique dimension.

Table 2

Exploratory factor analysis of parental monitoring measure

	Disc/ Solic.	Outside Source	Gen. Know.	Weekly Comm.
TC begins conversations about what TC does during nights and weekends	.820			
TC begins conversations about what TC does w/ free time	.799			
PC begins conversations about what TC does during nights and weekends	.601			
TC begins conversations about who TCs friends are and what they do together	.596			
PC begins conversations about what TC does w/ free time	.586			
TC begins conversations about TCs school performance	.515			
How often do you obtain info from another source about:				
What TC does in free time		.883		
What TC does during nights and weekends		.826		
Who TCs friends are and what they do together		.798		
TCs school performance		.739		
In the past year, to what extent <u>did you really know:</u>				
What TC does w free time			.756	
What TC does during nights and weekends			.700	
Who TCs friends are and what they do together			.666	
TCs performance at school			.568	
When TC going to friends, how often do you check if parent or adult will be there			.304	
In an average week during the school year:				
How often talk w TC about what they did in class				.813
How often talk w TC about what they do with friends or kids at school				.672

Multiple Group Confirmatory Factor Analysis

A test of the absolute fit of the EFA suggested four-factor solution was conducted using item factor loadings greater than .30. A multiple-group CFA modeled parameter estimates separately by ethnic group and assessed measurement equivalence across African American and White American families. We compared the fit between models where loadings in the two samples were constrained to be equal to models where they were allowed to differ (unconstrained), using the likelihood ratio test (a χ^2 difference test) and by examining the change in the comparative fit index (ΔCFI). A Chi-square difference test yielding a nonsignificant p-value ($p \geq .05$) was interpreted as support of measurement invariance (Bontempo, Hofer, & Lawrence, 2006).

The first four factor solution based on the EFA was a poor fit (RMSEA = .075, CFI =.780, χ^2=3.67 , df = 136, p < .001). Modification indices suggested the elimination of 4 items. In particular, two items from the general knowledge factor, one from the disclosure/solicitation factor, and one from the outside sources factor were eliminated. After completing the model modifications, the second four factor solution had good fit (RMSEA = .57, CFI =.903 , χ^2=2.56, df = 136, p <.001). The chi-square statistic value was statistically significant. However, the $\Delta\chi^2$ is more likely to yield Type 1 error for invariance in large samples, indicating there is a statistical difference in the two models, when the difference is not actually present (Hu & Bentler, 1999). However, the ΔCFI, is not influenced by sample size, and was also used to test measurement invariance. Differences in CFI less than or equal to .01 can be interpreted as evidence of noninvariance (Cheung & Rensvold, 2002). The change in CFI between the unrestricted model and the restricted model was .009 indicating that the latent factors actually did not

vary between African American and White American parents. Given the good fit of the

model, we accepted the findings. For both ethnic groups, all inter-factor correlations were

significant and positive with the exception of a non-significant correlation between

weekly communication and outside sources for White American parents (Table 3).

   All of the parameter estimates between items and factors were significant. For the

disclosure/solicitation factor, the five parameter estimates ranged from .442 to .877 ($M =$

.664); for the general knowledge factor, the two parameter estimates were .318 and .986

($M = .652$); for the outside sources factor, the three-parameter estimates ranged from .713

to .986 ($M = .829$); for the weekly communication factor, the two-parameter estimates

ranged from .738 to .897 ($M = .818$).

Table 3

Correlations among parental monitoring sources by ethnic group

	African American				White American			
	1.	2.	3.	4.	1.	2.	3.	4.
1. Disc/Solicit	--				--			
2. General Know	.36**	--			.19**	--		
3. Outside	.36**	.22**	--		.24**	.001	--	
4. Weekly	.42**	.24**	.19*	--	.46**	.27**	.24**	--

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

Early Parenting Behavior Correlations

Relationships between early parenting behavior variables were similar for African

Americans and White Americans (Table 4). Parental efficacy was strongly negatively

correlated with parental stress. Notably, both parental efficacy and parental stress were

not correlated with parental responsivity.

Table 4

Correlations among early parenting behaviors by ethnic group

	African American			White American		
	1.	2.	3.	1.	2.	3.
1. Efficacy	--			--		
2. Responsivity	-.11	--		-.01	--	
3. Stress	-.22**	-.10	--	-.39**	-.06	--

Note: * *p* < .05; **p<.01.

Ethnic Group Parenting Comparisons

Group differences in early parenting behaviors and child outcomes were also

examined using an ANCOVA (Table 5). There was a significant ethnic group difference

in parental responsivity, such that African American parents reported lower responsivity

than White American parents. There was a significant ethnic group difference in parental

efficacy, such that African American parents reported higher efficacy than White

American parents. There was no significant difference in parenting stress.

An ANCOVA, was computed to examine differences in the mean levels of each

parental monitoring latent variable between ethnic group. After accounting for child

gender, SES, treatment group status and the number of adults in the home, there were

some significant ethnic group differences among the parental monitoring variables.

Specifically, African American parents reported significantly higher

disclosure/solicitation than White American parents. Also, African American parents

reported significantly higher weekly communication than White American parents.

Finally, African American parents reported significantly higher monitoring through

outside sources than did White American parents. There was no significant ethnic group

difference with general knowledge. Additionally, no significant ethnic group differences

in parent reports of child rule-breaking or aggression emerged.

Table 5

Ethnic group differences in early parenting behaviors and parental monitoring sources

Parent Behaviors	African American		White American		*F*	*p*
	M	SD	M	SD		
Responsivity	6.57	2.13	7.70	2.06	54.86	.000**
Efficacy	33.71	3.96	32.84	4.28	3.99	.047*
Stress	16.62	5.24	16.95	4.54	0.10	.751
Disclosure/solicitation	15.18	3.94	13.84	3.67	15.00	.000**
General knowledge	7.19	1.23	7.34	0.93	1.54	.216
Weekly communication	7.22	1.25	6.89	1.40	8.30	.004**
Outside sources	8.51	3.38	7.04	3.49	18.17	.000**
Rule-Breaking	3.83	3.18	3.24	2.86	1.43	.232
Aggression	9.84	7.24	9.71	7.20	.503	.478

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

Structural Model

The model to test the moderation fit the data well (RMSEA = .03, CFI =.909, $\Delta\chi^2$ = 2.18, df = 120, p <.001). To understand if there were differences in the paths between ethnic groups, we examined each pair of parameter estimates using Z-scores to assess the magnitude of the group differences.

Early parenting behaviors and monitoring sources. Table 6 shows that, after accounting for child gender, SES, treatment group status and the number of adults in the home, there were two main effects that were significant for both ethnic groups. Increased parental efficacy during early childhood was significantly related to increased general knowledge in later childhood for both White American (β = .164, p = .006) and African American parents (β = .176, p = .025). Similarly, parental efficacy significantly positively predicted weekly communication for both White American (β = .158, p = .008) and African American parents (β = .206, p = .01).

After accounting for child gender, SES, treatment group status and the number of adults in the home, parental efficacy significantly positively predicted disclosure/solicitation for White American parents (β = .131, p = .020), but not for African American parents (β = .140, p = .079). However, parental efficacy significantly positively predicted outside monitoring sources for African American parents (β = .189, p = .018) but not for White American (β = .063, p = .299). Parental responsivity significantly positive predicted general knowledge (β = .203, p = .008) and disclosure/solicitation (β = .159, p = .041) for African American parents, but not for White American parents (β = .064, p = .249; β = .006, p = .921). However, parental

responsivity significantly *negatively* predicted outside sources for White American

parents (β = -.119, p = .034) but not for African American parents (β = -.033, p = .066).

     Next, we investigated whether the size or direction of the regression coefficients

linking early parenting behaviors and parental monitoring sources significantly differed

by ethnic group. While there were differences in several coefficients based on ethnicity,

after examining the *Z*-scores, the magnitude of the difference between ethnic groups was

only marginally significant in the relationship between responsivity and

disclosure/solicitation (Figure 2) as well as the relationship between responsivity and

general knowledge (Figure 3).

Table 6

Standardized path coefficients, standard errors, and critical ratios for parental monitoring sources regressed on early parenting behaviors

African American				White American				Test for
Path	Path coefficient β	Standard Error	Critical Ratio	Path	Path coefficient β	Standard Error	Critical Ratio	moderation Z
Disclosure/Solicitation								
Efficacy	.14	.00	1.76	Efficacy	**.13***	**.00**	**2.19**	-0.29
Responsivity	**.16***	**.01**	**2.05**	Responsivity	-.01	.01	-.10	**-1.73†**
Stress	-.04	1.05	-.50	Stress	-.10	.82	-1.72	-0.67
General Knowledge								
Efficacy	**.18***	**.00**	**2.24**	Efficacy	**.16****	**.00**	**2.75**	-0.69
Responsivity	**.20****	**.00**	**2.64**	Responsivity	.06	.00	1.15	**-1.71†**
Stress	.03	.32	.37	Stress	-.06	.21	-.91	-0.80
Weekly communication								
Efficacy	**.21***	**.00**	**2.59**	Efficacy	**.16****	**.00**	**2.64**	-0.43
Responsivity	.03	.00	.38	Responsivity	-.05	.00	-.90	-0.87
Stress	.08	.33	1.03	Stress	-.08	.31	-1.35	-1.68
Outside Sources								
Efficacy	**.19****	**.00**	**2.37**	Efficacy	.06	.00	1.04	-1.320
Responsivity	-.03	.01	-.43	Responsivity	**-.12***	**.01**	**-2.12**	-0.969
Stress	.08	.90	.96	Stress	.06	.79	.96	-0.086

Note: † p < .10; * *p* < .05; ***p*<.01.
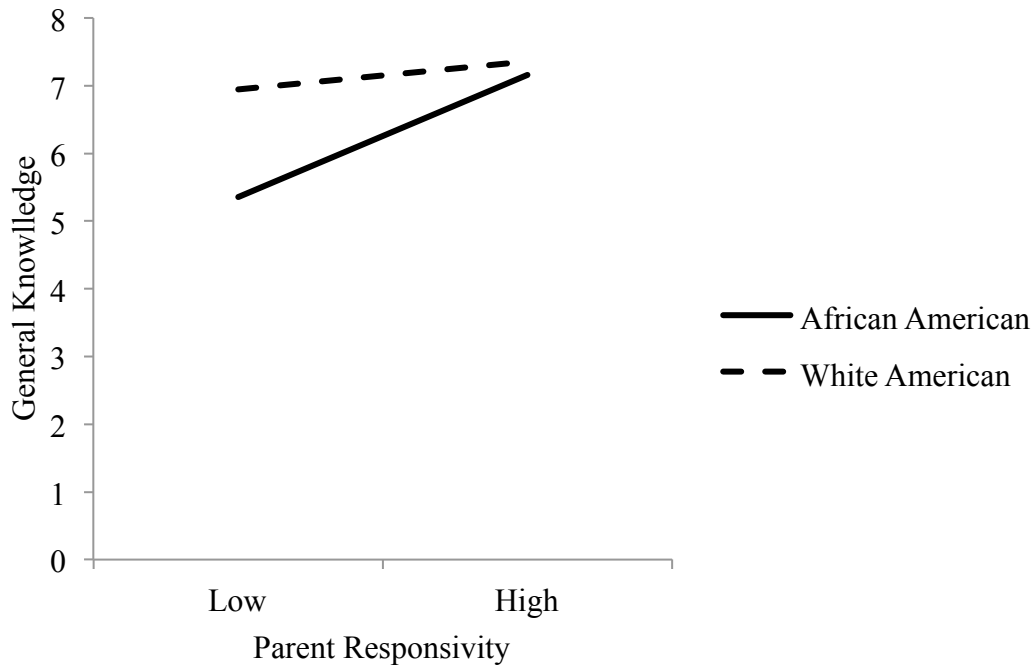
Figure 2. Ethnicity as a moderator of the relationship between parent responsivity and general knowledge (controlling for child gender, SES, treatment group status and the number of adults in home).
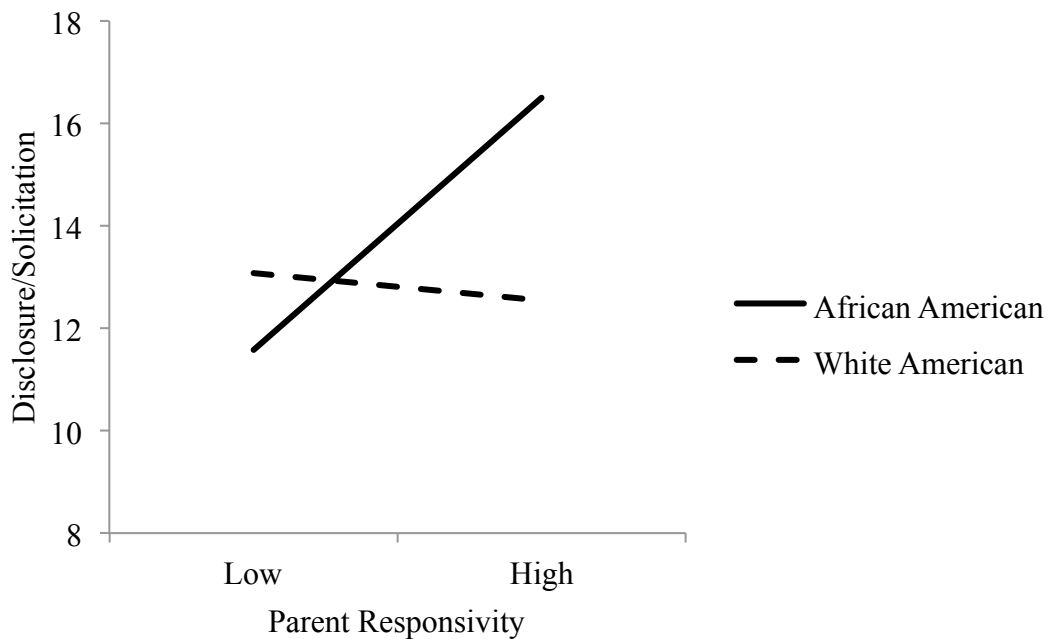
Figure 3. Ethnicity as a moderator of the relationship between parent responsivity and disclosure/solicitation (controlling for child gender, SES, treatment group status and the number of adults in the home).

Monitoring sources and child behavior outcomes. Table 7 shows that after

accounting for child gender, SES, treatment group status and the number of adults in the

home, outside sources significantly *positively* predicted rule-breaking behavior for White

American parents (β = .208, p < .001) but not for African American parents (β = .040, p =

.629). Similarly, outside sources significantly *positively* predicted child aggression for

White American parents (β = .191, p < .001) but not for African American parents (β =

.075, p = .367). Parental weekly communication significantly negatively predicted

aggression for African American parents (β = -.174, p = .041) but not for White

American parents (β = -.116, p = .063). Disclosure/Solicitation significantly negatively

predicted child rule-breaking behavior (β = -.265, p < .001) and aggression (β = -.176, p =

.004) for White American parents, but not for African American parents (β = -.034,

p = .713; β = -.052, p = .575).

Next, we tested to see if the size or direction of the regression coefficients linking

parental monitoring sources and child aggression or rule-breaking significantly differed

in strength or direction by ethnic group. While there were differences in several

coefficients based on ethnicity, after examining the *Z*-scores, the magnitude of the

difference between ethnic groups was only significant for the relationship between

disclosure/solicitation and rule-breaking (Figure 4).

Table 7

Standardized path coefficients, standard errors, and critical ratios for child rule-breaking and aggression regressed on parental monitoring sources

| | African American | | | | White American | | | Test for |
Path	Path coefficient β	Standard Error	Critical Ratio	Path	Path coefficient β	Standard Error	Critical Ratio	moderation Z
Rule-Breaking								
Disc./Solic.	-.03	.02	-.37	Disc/Solic	**-.27****	**.01**	**-4.38**	**-2.03***
Gen. Knowledge	-.07	.06	-.89	Gen. Knowledge	-.08	.05	-1.45	-.20
Weekly	-.13	.06	-1.49	Weekly	-.05	.04	-.73	.92
Outside Sources	.04	.02	.48	Outside Sources	**.21****	**.01**	**3.76**	1.47
Aggression								
Disc./Solic.	-.05	.03	-.56	Disc/Solic	**-.18****	**.02**	**-2.88**	-1.10
Gen. Knowledge	-.03	.09	-.35	Gen. Knowledge	-.09	.07	-1.61	-.75
Weekly	**-.17***	**.09**	**-2.05**	Weekly	-.12	.06	-1.86	.80
Outside Sources	.08	.03	.90	Outside Sources	**.19****	**.02**	**3.41**	.99

Note: † p < .10; * *p* < .05; *******p*<.01.
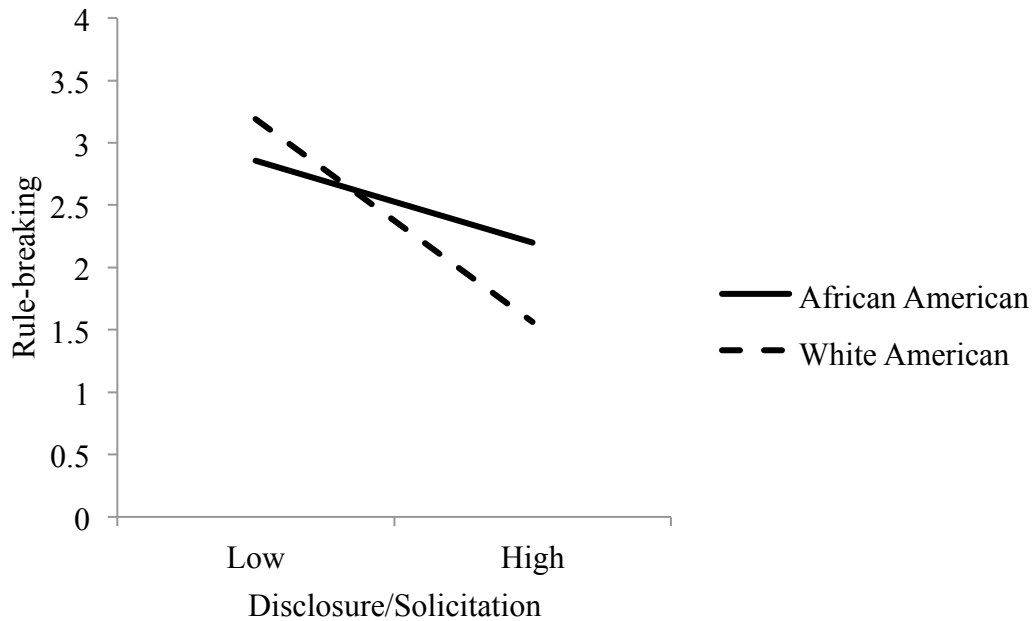
Figure 4. Ethnicity as a moderator of the relationship between disclosure/solicitati
rule-breaking (controlling for child gender, SES, treatment group status and the nu
of adults in the home).

In sum, African American parents reported lower responsivity and higher e

than White American parents. African American parents also reported higher

disclosure/solicitation, weekly communication and monitoring through outside sou

than White American parents reported. For both groups, parental efficacy significa

positively predicted general monitoring and weekly communication. Additionally,

parental efficacy was a significant positive predictor of outside sources for African

American parents, and disclosure/solicitation for White American parents. Parenta

responsivity positively predicted disclosure/solicitation and general knowledge for

African American parents, and negatively predicted outside sources for White Am

parents. Parental stress did not predict any of the monitoring sources at age 7 for ei

ethnic group.

For African American families, the only monitoring source that significantly predicted a child outcome was parent-child weekly communication, which significantly predicted less aggression. For White American parents, greater disclosure/solicitation was associated with less aggression and rule-breaking, but greater use of outside sources was associated with greater aggression and rule-breaking. General knowledge did not predict either aggression or rule-breaking for White American parents or African American parents. Although there were several effects that differed based on ethnicity, only three effects were significant, or trending toward significance. In particular, higher parental responsivity during early childhood was associated with higher disclosure/solicitation and general knowledge for African American parents, but for White American parents, there was no significant relationship. Additionally, more disclosure/solicitation was associated with less rule-breaking in children for White American parents, but for African American parents the relationship was not significant.

We replicated the structural equation models using only the female caregivers to understand ensure the results were no influences of parent gender that we did not parse out previously. Results of the modified analyses were consistent with our original analyses so no additional analyses were needed.

Discussion

Parental monitoring is generally accepted as an essential parenting practice from birth through adolescence. However, empirical research on parental monitoring has often been limited to adolescent samples. Although this study is one of the first to explore parental monitoring during childhood, some main findings are consistent with previous studies conducted at adolescence. Specifically, in research on adolescent, predominately White American samples, parental solicitation/child disclosure has been negatively

associated with rule-breaking as well as aggression. A main finding from the current

study is that those relationships were only present for White American parents, but were

not replicated in the sample of African American parents, suggesting that ethnicity may

play a role in the relationships between parental monitoring and child behavior.

Additionally, by exploring parents' reports of various sources of monitoring during

childhood, we demonstrated other age and ethnic group effects not yet examined in the

literature.

Identifying Sources of Parental Monitoring

As expected, outside sources emerged as a source of monitoring, indicating that

parents utilize informants outside of direct parent-child communication to monitor

children (Bumpus & Rodgers, 2009; Crouter et. al., 2005; Stattin & Kerr, 2000). Also

consistent with previous research, solicitation and disclosure emerged as sources of

monitoring (Crouter, et. al., 1999; Waizenhofer, et. al, 2004). However, findings

contradict Stattin and Kerr (2000) and the study hypothesis that solicitation and

disclosure would emerge as separate factors, as both combined into the same latent

construct.

Two monitoring sources emerged that were not hypothesized. The first, named

general knowledge, included items that asked parents how much they *really knew* about

various things that their child had done with his/her time and with his/her friends. It is

likely that general monitoring emerged because it is consistent with the way researchers

have typically measured monitoring, which is to have parents report on their general

knowledge about child activities and friendship networks (Stattin & Kerr, 2000). It

should be noted that general knowledge assessed how much parents think they know and

not how they come to know it, thus, it could be argued that general knowledge is not an actual source of monitoring, although for our purposes, we have referred to it as such. The second factor, named weekly communication, assessed how much parents and children discuss child school activities during an average week of the school year. Weekly communication could have been considered similar to disclosure/solicitation because it addressed parent-child conversation about activities; however, weekly communication is different because the items did not specify which party initiated conversations, and the questions focused specifically on the conversations that happened regarding school.

In contrast to previous research and the study hypothesis, parental control did not emerge as a unique source of monitoring. However, much of the research exploring parental control utilizes samples of adolescents (Barber, 1996; Galambos, et. al., 2003). Furthermore, Stattin and Kerr (2000) measured parental control by assessing the rules and demands parents set for a child when that child is hanging out with his or her friends, and it is unlikely that many 7-year-old children, such as the ones in the current study, are often out with friends without a parent or other adult around. Our measure of parental monitoring was loosely adapted from Stattin and Kerr's measure for adolescents, so it is likely that parental control did not emerge as a monitoring source because the items that measured control may have been more relevant for parents of adolescents than parents of children in early or middle childhood. In fact, two of the five items that were expected to form the parental control variable were not included in the analyses because they yielded a high percentage of "not applicable" responses.

Ethnic Differences in Parenting

The finding that African Americans exhibited lower responsivity is consistent with previous literature on ethnic differences in parent responsivity (Bradley, et. al., 1989; Luster et. al., 1996; Wagner & Clayton, 1999). African American parents reported higher efficacy than White American parents, supporting some research on efficacy and ethnicity. Specifically, Elder et al. (1995) found that African Americans reported being more efficacious as a result of greater efforts to protect their children and promote positive well-being because parents perceived the community to be unresponsive to their needs. Additionally, Ardelt and Eccles (2001) found that African American mothers who rated themselves higher in parental efficacy also tended to use more positive parenting strategies, a relationship that was not present in White American families. This pattern is consistent with results of parenting behaviors in the current study, as African American parents rated themselves high in efficacy as well as high on other parenting behaviors including monitoring sources.

The finding that African American parents reported higher use of outside sources than White American parents supports the idea that African American parents often utilize social support and extended family and community networks in parenting (Haxton & Harknett, 2009; McAdoo, 2002; Taylor, 2011). African American parents also reported higher weekly communication and disclosure/solicitation than White American parents, which is not consistent with previous research that has found African Americans report lower parent-child monitoring communication (Pratt, et al., 2004; Bumpus & Rodgers, 2009). However, results in this area have been limited and inconsistent. There was no ethnic difference in parent reported general knowledge of child behavior. While the

research specifically examining differences in general monitoring between African

American and White American parents is limited, studies that have examined general

parental monitoring have reported no significant ethnic differences (Bohnert et al., 2009;

Huebner et al., 2003).

Early Parenting Behaviors Predicting Monitoring Sources

Parental efficacy positively predicted weekly communication as well as general

knowledge for both ethnic groups. Additionally, somewhat supporting the hypotheses,

parental efficacy positively predicted disclosure/solicitation for White American parents

and outside sources for African American parents; however, the strength and direction of

these group differences were not significant. Results support previous literature on the

relationship between parental efficacy and monitoring and indicate that aspects of

parental monitoring can be behavioral expressions of parents' beliefs that they can make

a difference in the contexts that influence child behavior (Shumow & Lowmax, 2002).

Findings on the relationships between parent responsivity and parental monitoring

sources were mixed, but generally do not support previous research (Moilanen et al.,

2009). Interestingly, parent responsivity was negatively associated with outside sources

for White Americans but not for African Americans, although the strength and direction

of the ethnic group difference was not significant. Results may indicate that parents who

are less responsive to their child's needs perceive themselves to have some trouble

communicating open and honestly with their child, thus the need to seek information

from other sources about their child, in order to feel informed. Parental responsivity was

not related to weekly communication for either ethnic group. Responsivity is thought to

help improve child openness and communication to the parent, so it is possible that in this

study, it is mostly parents who initiated weekly communication about school, and as

such, parent responsivity would not be beneficial in gaining information about school.

Ethnicity did serve as a moderator of the relationships between parent responsivity and

disclosure/solicitation as well as general knowledge and results are discussed below.

Contrary to positive parenting behaviors, parental stress was not related to any

source of parental monitoring. Results are not consistent with the hypotheses and some

previous research suggesting that parental stress is important to parenting (Aber, et. al.,

1999; Moss, et. al., 1998). However, results somewhat support other research, which

found that parental depressive symptoms were not related to parental monitoring

(Slesnick, Reed, Letcher, Katafiasz, Jones, & Buettner, 2012). While stress and

depression are not the same, they often have similar effects on parenting and child

outcomes (Leigh & Milgrom, 2008; Webster-Stratton & Hammond, 1988).

Ethnicity as a Moderator. The hypothesis that that ethnicity would moderate the

relationships between parental efficacy and responsivity and parental control was not

assessed because control did not emerge as a latent variable. However, ethnicity

moderated some relationships that were not hypothesized. Parental responsivity was

positively related to disclosure/solicitation as well as general knowledge for African

American parents, but not for White American parents. Results highlight that there may

be underlying mechanisms of ethnicity that influence parenting characteristics and

monitoring.

It should be noted that when analyzing the ethnic difference in the strength and

direction of the relationships between parental responsivity and disclosure/solicitation as

well as general knowledge, we found that ethnicity served as a moderator at the trend

level ($p < .10$). A smaller sample size in the African American group could have contributed to a less accurate measure of the African American estimates (i.e., increased standard errors) consequently producing a slight overlap between the African Americans and White Americans estimate confidence intervals.

Parental Monitoring Sources and Child Problem Behavior

Consistent with previous research and the study hypotheses, in White American families, the more disclosure/solicitation that was reported, the less the children engaged in aggression and rule-breaking behavior (Laird, Marrero, & Sentse, 2010; Stattin & Kerr, 2000;Vieno et. al., 2009). Interestingly, our finding that disclosure *and* solicitation negatively predicted child outcomes contradicts Stattin and Kerr's (2000) findings that child disclosure is a better predictor of child behavior than parent solicitation. We found that both disclosure and solicitation matter when predicting child outcomes.

Contrary to the hypothesis, the use of outside sources was *positively* related to aggression and rule-breaking for White American parents, but not African American parents, although the difference in strength and direction was not significant. It could be that receiving information from outside sources may seem like a positive way to increase monitoring efforts for parents, but children may see it as a sign of over controlling parents, and act out more in order to take back some behavioral control (Shumow & Lomax, 2002). It may also be that the more aggressive or rule-breaking acts children commit, the more likely parents will be to seek information from outside sources in order to get as much information as they can about their children.

Somewhat supporting the study hypothesis, weekly communication was negatively related to aggression for African Americans but not White Americans,

although the difference in strength and direction was not significant. Weekly communication was not associated with rule-breaking for either ethnic group. Through weekly communication, parents reported how much discussion they had with their child specifically about school during an average week, but reported on child aggressive and rule-breaking behavior that may have happened outside of school. It may be that children only disclose positive behaviors that happened at school to parents and leave out details related to their own rule-breaking behaviors.

In contrast to previous research and the study hypotheses, general knowledge was not significantly associated with child aggression or rule-breaking for either ethnic group (Laird et al., 2003; Leadbeater et al., 2007; Orpinas et al., 1999). It is likely that the expected relationship did not emerge because much of the previous research utilizes child reports of parent knowledge instead of, or in addition to, parent reports (Brendgen et al., 2001; Carlo et al., 1999; Moilanen et al., 2009). It is difficult to get a true understanding of how much parents know without using child reported measures, because parents can only report on what they know from what their child tells them, or from information they have gathered from others. However, the child usually knows what the parent does or does not know about his or her own behavior and friendship networks. Therefore, in the current study, parents may actually know more or less than they think they know.

Ethnicity as a Moderator. It was hypothesized that the relationships between disclosure and aggression and rule-breaking would be stronger for White American parents, while the relationships between control and child aggression and rule-breaking would be stronger for African American parents. Somewhat consistent with the hypothesis and previous research on parenting and ethnicity, we found that

disclosure/solicitation was negatively related to rule-breaking for White American

parents, but not associated with rule breaking for African Americans (Dishion et al.,

1991; Griffin et al., 2003; Thorlindsson & Bernburg, 2006). This was the only instance in

which ethnicity served as a significant moderator between parental monitoring sources

and child outcomes.

Results of the moderation may be related to African Americans' unilateral

parental decision-making (Lamborn, Dornbusch, & Steinberg, 1996). Borawski, Ievers-

Landis, Lovegreen, and Trapl (2003), found that through parent-child negotiations of

unsupervised time, adolescents reported being allowed to stay out past curfew if they

called, have friends over when their parents weren't home, and have a place in their home

where they can hang out unmonitored. However, White American adolescents reported a

significantly greater amount of parent-child negotiated unsupervised time than African

American Adolescents. Thus, African American parents, may consider negotiating with

the child about rules as a sign of permissive parenting and may set expectations and rules

that are non-negotiable, regardless of the amount of discussion about child activities and

friendships.

Limitations

There are some limitations to be considered. First, it seems that our measure of

parental monitoring did not have the appropriate items to assess parental control as a

unique source of monitoring. Few studies have explored parental monitoring during

childhood, while most focus on adolescents (Cottrell et al., 2007; Dishion et al., 1991;

Hayes, et al., 2003). As such, there are few measures of parental monitoring that are

appropriate for parents of young children. It is important to better understand monitoring

during early and middle childhood because as children grow into adolescents, problem

behavior may become less amenable to changes in parenting (Moilanen et al., 2009).

Measures should be created or modified that are more specific to the monitoring

experiences of young children and should not include specific items that most likely do

not apply to children, such as items regarding a child being somewhere without an adult.

Second, the observations of parental responsivity were not statistically reliable

enough to measure at age 3. We decided only to use parental responsivity observations at

ages 4 and 5, but to use measures of efficacy and stress at ages 3, 4, and 5. Thus, we did

not capture parent responsivity at age 3 like the other early parenting variables. It would

have been useful to have data for all three ages for each early parenting variable to

maintain consistency across all three early parenting behavior variables.

Third, there were not enough male primary caregivers in the study to be

representative of all caregivers. A goal was to extend the literature on parental

monitoring; however, the overwhelming majority of the primary givers in the study were

women, limiting the ability to generalize findings to male caregivers.

Last, because of the differential sample size between the African American ($N =$

161) and the White American ($N = 312$) we must be cautious about estimates within the

African American sample. The difference in sample size could have influenced the ability

to detect significant main effects in the African American group and/or significant group

difference effects at the .05 level, even when a main effect of one group was clearly

different than the same main effect for the other group. When using structural equation

multiple group modeling, researchers often suggest a minimum of 100 cases per group,

but prefer 200 cases per group in order to adequately detect associations amongst

variables (Anderson & Gerbing 1988; Lacobucci, 2010; Tanaka, 1987). Additional research in the area of ethnicity and parental monitoring should incorporate larger sample sizes to ensure that effects are accurately detected.

It is important to note that the correlational nature of this study indicates that the relationships among variables are not causal. The longitudinal design allows for the measurement of constructs at various time points, but does not isolate confounding variables or bidirectional relationships. For example, it is possible that child problem behavior elicits certain parenting behaviors and monitoring strategies. Given the complex nature of parent-child relationship, child behaviors can be associated with a myriad of things outside of parental monitoring.

Future Directions

An immediate next step with this study sample is to utilize future child reports of parental monitoring. The longitudinal nature of the Early Steps study allows us to follow children as they grow older. Thus, future waves of the study will incorporate additional parent reports of monitoring as well as child reports of parental monitoring, beginning when children are 9 years old. While a general knowledge latent variable emerged in the current study, we cannot truly measure how much parents *really* know, without examining the discrepancy between parent and child reports of parent monitoring.

Ethnicity was used to as a proxy of the common cultural parenting experiences ethnic groups may have. However, it might be more informative to establish more specific aspects of culture, context, and parenting that might drive significant effects of ethnicity, such as neighborhood danger or family composition (Ardlet & Eccles, 2001; Brody et al., 2003; Dishion & Patterson, 2006; Garcia et al., 1996). Future research

should continue to focus on the role of ethnicity and culture in parental monitoring and include samples of parents from a variety of ethnicities such as Hispanic parents and Asian parents. In the current study, we did not have the appropriate sample sizes to assess additional ethnic groups, but researchers have shown that aspects of culture and ethnicity can impact parenting style, an idea that should continue to be investigated (Pong, Hao, & Gardner, 2005; Yasui & Dishion, 2007).

To extend the findings on parental monitoring, researchers should examine the effects of multiple children and/or adults in the home. Research has shown that monitoring can differ by parent gender as well as differ based on the relationship dynamics between parents. In particular, Jones, Forehand, Dorsey, Foster, and Brody (2005) found that in co-parenting relationships, high levels of support and low levels of conflict were associated with the high levels of parental monitoring behavior. Bumpus and Rodgers (2009) suggested that adolescents from divorced families may perceive the parent-adolescent relationship as more distant or more conflicting than adolescents from two-parent families and, as a result, be less willing to provide information when parents request it. Other research has shown that mothers know more about child daily activities than fathers. Additionally, mothers know more about their daughter's activities than their son's activities, while fathers are more knowledgeable about their son's than their daughter's activities (Crouter, Helms-Erikson, Updegraff, & McHale, 1999).

Conclusions

The purpose of this study was to extend the ways in which scholars think about ethnicity, parenting behaviors, and parental monitoring. This project is the first to explore how characteristics of early parenting might be differentially related to individual

monitoring sources. Additionally, this study is one of few to examine monitoring in childhood and how individual sources of monitoring might be differentially related to child problem behaviors. This is also the first study to show that it is important to address the impact of entities outside of the parent-child relationship as informants to parents' monitoring efforts. Thus in order to fully understand parental monitoring and its effects on child behaviors, it may be important to capture the types of information parents receive about their children from others and to investigate the impact of these outside sources on the parent-child relationship.

It is important to recognize and consider the ways in which ethnicity and culture can influence parenting styles and values. What we have shown is that relationships among parenting behaviors and child outcomes can differ for parents of different ethnicities and that optimal parenting monitoring styles can vary based on ethnicity or cultural background. Similar to literature on ethnicity and parenting styles, this study suggests that African American parents can be high in positive parenting behaviors as well as high in strictness and control (McLoyd et al., 2000; Steele et al., 2005; Yasui & Dishion, 2007). Additionally, there are differences in average levels of parenting behavior across ethnic majority and minority groups, which can provide insight into the differences in positive, negative, or non-existent effects of parenting on child behavior. This research lends support to intervention and prevention efforts that are tailored and focused on providing parents with skills and resources that are culturally appropriate and effective for the parenting experience and the parent-child relationship.

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APPENDIX

Family ID: **ES** ☐ ☐ ☐ ☐   Resp: ● PC ○ AC   Int ID: ☐ ☐

Date: ☐ ☐ / ☐ ☐ / **2 0 0 7**   Child's Age: ● 5

Directions: Please fill in the circle under the response that best describes your relationship with your child.

	Strongly Agree	Agree	Mildly Agree	Mildly Disagree	Disagree	Strongly Disagree
1. Even though being a parent could be rewarding, I am frustrated while my child is at his/her present age.	○	○	○	○	○	○
2. I go to bed and wake up feeling that I have not achieved very much.	○	○	○	○	○	○
3. Sometimes when I'm supposed to be in control, I feel more like the one being manipulated.	○	○	○	○	○	○
4. My own mother was better prepared to be a good parent than I am.	○	○	○	○	○	○
5. I would make a good role model for new parents who needed to learn what it takes to be a good parent.	○	○	○	○	○	○
6. Being a parent is manageable and any problems are easily solved.	○	○	○	○	○	○
7. A difficult thing about being a parent is not knowing whether you are doing a good job or a bad one.	○	○	○	○	○	○
8. I know what to do when problems arise with my child.	○	○	○	○	○	○
9. I am able to get information to help me better understand my child.	○	○	○	○	○	○
10. Sometimes I feel like I'm not getting anything done.	○	○	○	○	○	○
11. I am satisfied with the way I care for my child.	○	○	○	○	○	○
12. When I need help with problems in my family, I am able to ask for help from others.	○	○	○	○	○	○
13. If anyone can find the answer to what is troubling my child, I can.	○	○	○	○	○	○
14. My talents and interests are in other areas, not in being a parent.	○	○	○	○	○	○
15. Considering how long I've been a parent, I feel completely at home with this role.	○	○	○	○	○	○
16. If being a parent to a child were more interesting, then I would be motivated to do a better job as a parent.	○	○	○	○	○	○
17. I honestly believe that I have all the skills necessary to be a good parent to my child.	○	○	○	○	○	○
18. Being a parent makes me tense and anxious.	○	○	○	○	○	○
19. I now realize the problems of taking care of a child are easy to solve once you know how your actions affect your child.	○	○	○	○	○	○

48321

Family ID: | E | S | | | | |

Int ID: | | |

Date: | | | / | | | / | 2 | 0 | 0 | 7 |

Child's Age: ● 5

1. People present in the house: ○ 2 ○ 3 ○ 4 ○ 5 ○ 6 ○ 7 or more

Responsivity	Yes	No	
2. Parent introduces visitor to child.	○	○	
3. Parent uses correct grammar and pronunciation.	○	○	
4. Parent uses complex sentence structure and vocabulary.	○	○	
5. Parent responds verbally to child's speech.	○	○	
6. Parent shows some positive emotional response to praise of child by visitor.	○	○	
7. Parent's voice conveys positive feelings about the child.	○	○	
8. Parent praises child's qualities twice during visit (e.g. skill, strength or accomplishment).	○	○	
9. Parent caresses, kisses, or cuddles child during visit.	○	○	
10. Parent helps child demonstrate some achievement during visit.	○	○	
11. Child can express negative feelings without harsh reprisal.	○	○	○ Not observed
12. Child is permitted choice in breakfast or lunch menu.	○	○	
13. Child can hit parent without harsh reprisal.	○	○	○ Not observed
14. Children's artwork is displayed some place in the house.	○	○	

Family ID: **E S** ☐☐☐☐   Resp: ☑ PC   ○ AC   Int ID: ☐☐

Date: ☐☐ / ☐☐ / **2 0 0 7**   Child's Age: ● 5

Directions: The statements below describe lots of events that routinely occur in families with young children. These events sometimes make life difficult. Please read each item and fill in how often it happens to you (rarely, sometimes, a lot, or constantly), and then fill in how much of a "hassle" you feel that it is for you. If you have more than one child, these events can include any or all of your children.

	HOW OFTEN DOES IT HAPPEN?				No Hassle				Big Hassle
	Rarely	Sometimes	A Lot	Constantly					
1. Always cleaning up messes of toys or food.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
2. Being nagged, whined at, complained to.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
3. Mealtime problems (picky eaters, complaining, etc.).	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
4. The kids don't listen--won't do what they are asked without being nagged.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
5. Babysitters are hard to find.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
6. The kids' schedules interfere with meeting your own household needs (like preschool, naps, other activities).	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
7. Sibling arguments or fights that need a "referee". ○ N/A: "No siblings"	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
8. The kids demand that you entertain or play with them.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
9. The kids resist or struggle over bedtime with you.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
10. The kids are constantly under foot, interfering with other chores.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5

TELEFORM: ES5HASSL   ES: Daily Hassles   HASSL (DH)   Page 2 of 2

Family ID: **E S** ☐ ☐ ☐ ☐   Resp: ◉ PC ○ AC

HOW OFTEN DOES IT HAPPEN?

	Rarely	Sometimes	A Lot	Constantly	No Hassle				Big Hassle
11. The need to keep a constant eye on where the kids are and what they're doing.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
12. The kids interrupt adult conversations or activities.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
13. Having to change your plans because of an unexpected child need.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
14. The kids get dirty several times a day, needing a change of clothes.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
15. Trouble getting privacy (like in the bathroom).	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
16. The kids are hard to manage in public (grocery store, shopping center, restaurant).	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
17. Trouble getting the kids ready for outings and leaving on time.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
18. Trouble in leaving the kids for a night out, or leaving them at school or daycare.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
19. The kids have trouble with friends (like fighting, not getting along, or having no friends around).	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5
20. Having to run extra errands to meet the kids' needs.	○	○	○	○	○ 1	○ 2	○ 3	○ 4	○ 5

Family ID: E S [ ][ ][ ]   Resp: ○ PC   ○ AC   Child's Age: ● 7   ○ 8   ○ 9   ○ 10

Directions: This questionnaire is about parenting. Read each question carefully and select the answer that best describes you. There are no right or wrong answers, as we know that families are all different and that there are many ways to raise kids today.

	Never	Hardly Ever	Some-times	Frequently	Always or Almost Always	Does Not Apply
1. How often do you think that your child goes places that you ask him/her not to go?	○	○	○	○	○	○
2. When your child is going to a friend's house, how often do you check to see if a parent or another adult will be there?	○	○	○	○	○	○
3. When your child goes out of the house for more than a few minutes, how often are you aware of what s/he is doing?	○	○	○	○	○	○
4. When your child is home without an adult, how often are there specific rules about the kinds of things s/he may do?	○	○	○	○	○	○
5. When your child is home without an adult, how often does s/he call you, leave a note, or let you know if s/he leaves your house or yard?	○	○	○	○	○	○

How often do you begin or start conversations with your child about:

	Never	Hardly Ever	Some-times	Frequently	Always or Almost Always
6. who his/her friends are and what they do together?	○	○	○	○	○
7. what s/he does during nights and on weekends?	○	○	○	○	○
8. his/her performance in school?	○	○	○	○	○
9. what s/he does with his/her free time?	○	○	○	○	○

How often does your child begin or start conversations with you about:

	Never	Hardly Ever	Some-times	Frequently	Always or Almost Always
10. who his/her friends are and what they do together?	○	○	○	○	○
11. what s/he does during nights and on weekends?	○	○	○	○	○
12. his/her performance in school?	○	○	○	○	○
13. what s/he does with his/her free time?	○	○	○	○	○

TELEFORM: ES7PAMI   ES:Parental Interview   PAMI(RB)   Page 2 of 2

Family ID: E S ⬚⬚⬚⬚   Resp: ○ PC ○ AC   Child's Age: ● 7 ○ 8 ○ 9 ○ 10

14. How often does your child go to a friend's house?

○ Less than once a month   ○ Once a month   ○ 2-3 times a month   ○ 1-2 times a week   ○ 3 times a week or more

15. How well do you know the parents of the friend that your child spends the most time with?

○ Don't know at all   ○ Know a little   ○ Know somewhat   ○ Know fairly well   ○ Know extremely well

In the **PAST YEAR**, to what extent did you really know:

	Don't know at all	Know a little	Know Somewhat	Know Fairly Well	Know Extremely Well
16. who your child's friends are and what they do together?	○	○	○	○	○
17. what your child does during nights and on weekends?	○	○	○	○	○
18. your child's performance in school?	○	○	○	○	○
19. what your child does with his/her free time?	○	○	○	○	○

In an **AVERAGE WEEK** during the school year:

	Never	Hardly Ever	Some Days	Most Days	Every Day
20. How often do you talk with your child about what s/he does in class?	○	○	○	○	○
21. How often do you talk with your child about what s/he does with his/her friends or with kids at school?	○	○	○	○	○

Sometimes, parents find out about their children's life and daily activities from sources other than the child, such as relatives, teachers, children's friends, other parents, or even your child's backpack.

How often do you usually obtain information from other sources about:

	Never	Hardly Ever	Some-times	Frequently	Always or Almost Always
22. who your child's friends are and what they do together?	○	○	○	○	○
23. what your child does during nights and on weekends?	○	○	○	○	○
24. your child's performance in school?	○	○	○	○	○
25. what your child does with his/her free time?	○	○	○	○	○

Family ID: E S ☐ ☐ ☐ ☐   Resp: ● PC   ○ AC   Child's Age: ● 7   ○ 8   ○ 9   ○ 10

Directions: Below is a list of items that describe children and youth. For each item that describes your child **now or within the past 6 months**, please fill in the circle under number *2* if the item is *very true or often true* of your child. Fill in the circle under the number *1* if the item is *somewhat or sometimes true* of your child. If the item is *not true* of your child, fill in the circle under the *0*. Please answer all items as well as you can, even if some do not seem to apply to your child.

0=Not True (as far as you know)	1=Somewhat or Sometimes True	2=Very True or Often True

0 1 2

○ ○ ○ 1. Acts too young for his/her age
○ ○ ○ 2. Drinks alcohol without parents' approval (describe): _____
_____
○ ○ ○ 3. Argues a lot
○ ○ ○ 4. Fails to finish things s/he starts
○ ○ ○ 5. There is very little s/he enjoys
○ ○ ○ 6. Can't concentrate, can't pay attention for long
○ ○ ○ 7. Can't sit still, restless, or hyperactive
○ ○ ○ 8. Confused or seems to be in a fog
○ ○ ○ 9. Cries a lot
○ ○ ○ 10. Cruel to animals
○ ○ ○ 11. Cruelty, bullying, or meanness to others
○ ○ ○ 12. Daydreams or gets lost in his/her thoughts
○ ○ ○ 13. Demands a lot of attention
○ ○ ○ 14. Destroys his/her own things
○ ○ ○ 15. Destroys things belonging to his/her family or others
○ ○ ○ 16. Disobedient at home
○ ○ ○ 17. Disobedient at school
○ ○ ○ 18. Doesn't seem to feel guilty after misbehaving
○ ○ ○ 19. Breaks rules at home, school, or elsewhere
○ ○ ○ 20. Fears certain animals, situations, or places, other than school (describe): _____
_____
○ ○ ○ 21. Fears going to school
○ ○ ○ 22. Fears s/he might think or do something bad
○ ○ ○ 23. Feels s/he has to be perfect

0 1 2

○ ○ ○ 24. Feels or complains that no one loves him/her
○ ○ ○ 25. Feels worthless or inferior
○ ○ ○ 26. Gets in many fights
○ ○ ○ 27. Hangs around with others who get in trouble
○ ○ ○ 28. Impulsive or acts without thinking
○ ○ ○ 29. Would rather be alone than with others
○ ○ ○ 30. Lying or cheating
○ ○ ○ 31. Nervous, highstrung, or tense
○ ○ ○ 32. Nightmares
○ ○ ○ 33. Constipated, doesn't move bowels
○ ○ ○ 34. Too fearful or anxious
○ ○ ○ 35. Feels dizzy or lightheaded
○ ○ ○ 36. Feels too guilty
○ ○ ○ 37. Overtired without good reason
○ ○ ○ 38. Overweight

39. Physical problems *without known medical cause:*
○ ○ ○ a. Aches or pains (*not* stomach or headaches)
○ ○ ○ b. Headaches
○ ○ ○ c. Nausea, feels sick
○ ○ ○ d. Problems with eyes (*not* if corrected by glasses) (describe): _____
_____
○ ○ ○ e. Rashes or other skin problems
○ ○ ○ f. Stomachaches
○ ○ ○ g. Vomiting, throwing up
○ ○ ○ 40. Physically attacks people
○ ○ ○ 41. Poor school work
○ ○ ○ 42. Prefers being with older kids

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Family ID: | E | S | | | | | Resp: ○ PC   ○ AC   Child's Age: ● 7   ○ 8   ○ 9   ○ 10

0=Not True (as far as you know)   **1=Somewhat or Sometimes True**   **2=Very True or Often True**

0	1	2	
○	○	○	43. Refuses to talk
○	○	○	44. Runs away from home
○	○	○	45. Screams a lot
○	○	○	46. Secretive; keeps things to self
○	○	○	47. Self-conscious or easily embarrassed
○	○	○	48. Sets fires
○	○	○	49. Sexual problems (describe):_____

_____

0	1	2	
○	○	○	50. Too shy or timid
○	○	○	51. Inattentive or easily distracted
○	○	○	52. Stares blankly
○	○	○	53. Steals at home
○	○	○	54. Steals outside the home
○	○	○	55. Stubborn, sullen, or irritable
○	○	○	56. Sudden changes in mood or feelings
○	○	○	57. Sulks a lot
○	○	○	58. Suspicious
○	○	○	59. Swearing or obscene language
○	○	○	60. Talks about killing self
○	○	○	61. Teases a lot
○	○	○	62. Temper tantrums or hot temper
○	○	○	63. Thinks about sex too much
○	○	○	64. Threatens people
○	○	○	65. Smokes, chews, or sniffs tobacco
○	○	○	66. Truancy; skips school
○	○	○	67. Underactive, slow moving, or lacks energy
○	○	○	68. Unhappy, sad, or depressed
○	○	○	69. Unusually loud
○	○	○	70. Uses drugs for nonmedical purposes (*don't include alcohol or tobacco*) (describe):

_____

0	1	2	
○	○	○	71. Vandalism
○	○	○	72. Withdrawn; doesn't get involved with others
○	○	○	73. Worries

Please write in any problems your child has that were not listed above:

0	1	2	
○	○	○	74. _____
			_____
○	○	○	75. _____
			_____
○	○	○	76. _____
			_____

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