

Does Level of Parental Involvement Predict Juvenile Delinquency?

EVAN RIPLEY-McNEIL AND KENNETH M. CRAMER, PH. D.
University of Windsor

Overall, research supports the positive impact of parents on their children; effective parenting not only prevents criminal behavior in youth but also cultivates a host of other desirable psychosocial outcomes later in life. Parental involvement is examined in this archival analysis of the National Survey on Drug Use and Health (NSDUH) to determine whether parental involvement predicts juvenile delinquency, using a community sample of 13,287 youth aged 12 to 17 years. Parental involvement was negatively associated with number of arrests and differed considerably between justice-involved and non-justice-involved youth; racial category was included as an exploratory analysis. Whether youth were placed on probation (but not parole) was coupled with lower parental involvement compared to non-justice-involved youth. These results are indicative of the protective effect that parents may have on adolescent outcomes, showing that higher parental involvement is associated with reduced juvenile delinquency.

Keywords: parental involvement, juvenile delinquency, adolescence, criminal behavior, socialization

Globalement, la littérature soutient l'influence du rôle parental sur la prédiction du comportement criminel des jeunes. L'implication parentale est examinée dans l'analyse archivistique de *l'Enquête nationale sur la consommation de drogues et la santé* (NSDUH) en utilisant un échantillon communautaire de 13 287 jeunes âgés de 12 à 17 ans afin de déterminer si celle-ci prédit bel et bien la délinquance juvénile. L'implication parentale était négativement associée au nombre d'arrestations et différait considérablement entre les jeunes pris en charge par le système judiciaire et ceux ne l'étant pas; la catégorie raciale a été incluse comme analyse exploratoire. Une implication parentale moindre a été associée aux jeunes placés en probation (mais pas en libération conditionnelle) comparativement aux jeunes non judiciairisés. Ces résultats révèlent l'effet protecteur de l'implication parentale sur le développement de comportements juvéniles, avançant qu'une implication parentale plus élevée serait associée à une délinquance réduite chez l'adolescent.

Mots-clés : implication parentale, délinquance juvénile, adolescence, comportement criminel, socialisation

Parental involvement is considered a fundamental component of early child socialization (Holden, 2010). Parental figures typically offer the first meaningful relationship in childhood, and it is by these interactions that one learns the appropriate social behaviors and cultural norms. The importance of the parent-child relationship has been posed since the beginning of modern psychology, venerated in each of psychoanalytic, behavioral, and cognitive theories as a salient factor of psychosocial development (Ainsworth, 1969; Klein, 1927; Kohut, 1977; Maccoby, 2015; Watson, 1928). The psychological literature has maintained its importance, with the finer minutiae explored across multiple modalities, and

found to have lasting effects on a child's academic, social, and emotional development; and even less desired behaviors such as drug use, substance abuse, and delinquency (Barger et al., 2019; Day & Cramer, 2018; Khouri & Cramer, 2019). The present study asks, among a large community sample, whether parental involvement (or a parent's relative engagement in their children's lives) can predict their youth's criminal behavior.

Parental involvement is manifest in a host of ways: Involved parents will set firm limits for their children, discuss risky behaviors, or reinforce positive behaviors. Indeed, the parent's involvement may have consequential effects on the child's adjustment, personality, social cognition, risk-taking behaviors, and other psychosocial outcomes. The National Centre for Juvenile Justice in the United States reported 1.6 million juvenile arrests in 2010 among youth aged 16 to 17 years; albeit distressing, this was a 21% decrease from levels assessed in 2001 (Sickmund & Puzanchera, 2014). The investigators also indicated

My sincerest appreciation goes out to my supervisor Dr. Kenneth Cramer for his invaluable support and mentoring in development of this article. I would also like to thank the Journal of Interpersonal Relations, Intergroup Relations and Identity (JIRIRI) editorial team for their insight and enthusiasm. Correspondence concerning this article should be addressed to Evan Ripley-McNeil. Email: ripleye@uwindsor.ca

that youth in community-based supervision and aftercare services were more likely to attend school and work and were less likely to reoffend. Whereas the National Centre for Juvenile Justice suggests that most juvenile offenders reduce their offending patterns over time, research has also shown that a majority of adult offenders commit their first criminal acts as a youth, and only a small portion commit their first crime during adult years (Farrington et al., 2012). The high number of offenses by youth reported in the United States further begs the investigation into factors that may mitigate these deleterious outcomes. The gravity of the parent-child relationship, as it pertains to protecting the child from delinquent behavior early in development, cannot be understated. To that end, the present study will review the preceding literature on parental involvement in an effort to fully inform the current analysis.

Parental Involvement Through Socialization

Based on the internal working model, Ainsworth and Bowlby (1991) describe the process whereby children learn to socialize from their parents by structuring expectations for future relationships; as the first major association in a child's life, parents are the foundational figures by which these expectations are built. Further, Maccoby (2015) comments that contemporary research emphasizes the enduring impact of parenting that continues throughout the lifespan. Hill and Tyson (2009) conducted a meta-analysis in their review of the parental involvement and academic achievement literature from 1985 to 2006 (including 50 empirical articles). In addition to a positive relation between parental involvement and achievement in middle school, the authors identified one unique form of involvement — academic socialization — that showcased the strongest relation to achievement. Academic socialization specifically involves communicating expectations for educational and occupational aspirations, discussing learning strategies with the child, preparing and planning for the child's future, fostering analytical thinking and internalized motivations for achievement — which had the strongest positive relation to achievement, over and above that of school-based and home-based involvement. Though much of the work on parental involvement has focused on achievement and delinquency, the construct is positively associated with negative affect regulation (Davidov & Grusec, 2006), level of child's physical activity (Gustafson & Rhodes, 2006), and socioemotional functioning (El Nokali et al., 2010).

Parental Involvement and Juvenile Delinquency

A significant relation between parenting and delinquency has reliably surfaced in the psychological

literature. In a meta-analysis, Hoeve and colleagues (2009) compiled 161 manuscripts from 1950 to 2007 on parenting and delinquency. Their findings establish a firm link between parenting and delinquency, reporting negative correlations for involvement, supportive parenting, and parental monitoring; and inversely, positive correlations for neglect, hostility, rejection, and psychological control. Of keen note, the researchers included parenting styles in the meta-analysis, but due to the limited number of studies that looked directly at parenting styles and delinquency they were only able to compute a mean effect size for authoritative parenting. In support to these findings, Flanagan et al. (2019) recently looked at the role of parental supervision by examining 19 longitudinal studies from 1996 to 2016; they reported that poor supervision was associated with higher probabilities of offending, whereas effective supervision was linked with a lower probability of offending later in life. Further expanding this complex relationship, Walters (2013) set out to determine whether parental involvement would influence delinquency in adolescence and crime in early adulthood. Results indicated that not only did parental involvement partially predict these outcomes, but the relationship also differed by sex.

Janssen et al. (2017) examined whether various aspects of parenting were able to protect children from the likelihood of delinquent behaviors in criminogenic urban areas (settings where criminal behavior is likely to occur). The researchers conducted a longitudinal analysis of 603 adolescents, comparing three factors within the parent-adolescent relationship: parental monitoring, parental limit setting, and quality of the relationship. Their results suggest that time spent engaging in unstructured socializing (time spent with friends that is unsupervised and with no structured activity) was positively related to delinquency. Further, delinquency was negatively correlated with each of parental monitoring, parental limit-setting, and quality of relationship. The authors concluded that although unstructured socializing was associated with greater delinquency, this effect differed by level of parental monitoring and relationship quality. These findings suggest that parenting can buffer (i.e., protect from or reduce) the potential risks associated with criminogenic settings.

Attachment Theory

Proponents of attachment theory would maintain the significance of the parent-child relationship on the socialization process. Kenny et al. (2014) suggest that both attachment theory and social control theory would predict lower delinquency in youth who are securely attached to their parents. The theory of attachment, developed by John Bowlby (1969), has

been utilized and refined extensively since its creation. In the context of the infamous Strange Situation task—wherein infants confront an unfamiliar condition—Ainsworth and Bell (1970) laid the groundwork for the development of three attachment styles that help classify the patterns of child-to-parent relationships: secure, insecure-avoidant, and insecure ambivalent/resistant. Secure attachment is characterized by a supportive relationship between the child and the parental figure, by which the child can explore interactions and experiences outside of the parental dyad knowing they have a comfortable base of return. Conversely, insecure-avoidant attachment is typified by the child avoiding contact with and showing no preference for the parent. Insecure ambivalent/resistant attachment is differentiated when the child exhibits little exploration, is wary of separation, and both seeks and avoids contact intermittently (Bowlby, 1988; Boyd & Bee, 2013). Main and Solomon (1990) introduced a fourth attachment style, disorganized attachment, to explain children that were considered unclassifiable in the previous study. Inversely to secure attachment, disorganized attachment is strongly correlated with peer aggression, externalizing behaviors, and delinquency (Bohlin et al., 2012).

Initially, attachment research focused on the mother-child relationship in a single direction. Since then, research has explored the bidirectional effects of mothers and fathers concerning each attachment type. Yoder et al. (2016) explored the effects of non-residential fathers (i.e., male parents absent from the child's household) on delinquent behavior. Their results suggest that anger/alienation and trust/communication in the father-child relationship would both predict youth delinquency. For example, a non-residential father that conveys anger or mistrust toward the child would increase the likelihood of them being delinquent, whereas being trusting and communicative would decrease that likelihood. The quality of the relationship between the parent and child, and more specifically, the interaction between attachment styles and parental approach, appear to have important effects on the child's developmental trajectory.

Recent research on attachment theory has identified a discrepancy in delinquency between youth from a unique racial background. Wampler and Downs (2010) assessed a group of minority youth (Latino and African American) from lower socioeconomic status (SES) neighborhoods. Their study revealed three meaningful attachment groups: isolated, connected, and disconnected. Isolated adolescents (high alienation) reported more violent behavior and symptoms of depression; this group was at the highest risk if alienation was experienced from

both peers and parents. Connected adolescents (high attachment) reported fewer internalizing and externalizing behaviours, and less psychological distress. Disconnected adolescents (low attachment) did not report strong feelings of alienation (compared to isolated adolescents) despite reporting the lowest attachment, possibly reflecting the preference for distance from others and limited communication. Interestingly, though the study found these categories meaningful, compared to a normative sample of adolescents, all three groups reported more delinquent behaviors. The authors suggest this is due to a multitude of contextual factors such as poverty, single parenting, impoverished schools, and dangerous neighborhoods. This raises an important concern: racial minorities are subject to a host of environmental factors that complicate the pathway from parental involvement to juvenile delinquency. Wheelock and Uggen (2006) discuss occupational, public, and civic restrictions that all serve to exacerbate the inequalities experienced by the minoritized and the impoverished.

Immigrant youth has received unjustified attribution to greater delinquency. Empirical studies exploring the differences between native-born versus immigrant adolescents have shown no differences in offence rates (Chen & Zhong, 2013). It is believed that immigrant youth, during their period of acculturation, are less likely to offend in the host society due to enduring traditional traits from their home country. The authors suggest that worries about high levels of delinquency among immigrants are socially constructed and the associated panic is disproportional to the actual level of harm. There is a peculiar stratification of race in regard to parental involvement and juvenile delinquency. While it is not the purpose of this article to fully explore the racial or ethnic implications for this line of research, they can not be ignored entirely as significant differences persist in the literature and have important implications for the interpretation of any results in this line of inquiry.

Parenting Styles

Much of the scientific research on parenting stems from Baumrind's (1966, 1971) conceptualization of parenting styles, still commonly used to describe the predominant patterns in parent-child relationships. Baumrind explored various dimensions of parenting and how they combine to form different parenting styles; looking at characteristics such as warmth, or nurturance; demandingness, in the way of expectation setting; control or being clear and consistent in rule setting, and effective communication between the parent and the child. Three different approaches were outlined by Baumrind using these characteristics, which were later broadened by Maccoby and Martin (1983; as cited in Boyd & Bee, 2013) to include four

parenting styles based on the level of (a) warmth or responsiveness, and (b) control or demandingness:

Authoritative: considered to be the optimal parenting style, authoritative parenting is comprised of high levels of all characteristics described by Baumrind; parents are encouraged to score high on both responsiveness and demandingness. This parenting style is associated most consistently with positive outcomes such as lower utilization of corporal punishment; higher reported self-esteem; higher achievement orientation; higher altruistic behavior; and improved adherence to parental demands.

Permissive: described as being indulgent or lenient, this parenting style is comprised of high-responsiveness with low-demandingness. The permissive parenting style offers the child little guidance and authority whilst being perceived as loving and responsive. Permissive parenting is associated with potentially negative outcomes such as higher aggressiveness, lower maturity, and lessened independence, but high self-esteem.

Authoritarian: low responsiveness paired with high demandingness describes the authoritarian parenting style. This approach utilizes high exertion of authority while reflecting low levels of warmth and acceptance. This is associated with several negative outcomes such as impoverished social skills, self-esteem, and behavior regulation.

Neglectful: deficient responsiveness and demandingness embody the neglectful parenting style. This approach has been most consistently associated with negative outcomes such as difficulties in social relationships; higher levels of anti-social behavior; higher impulsiveness; lower achievement orientation; and heightened risk-taking behavior and delinquency in early adolescence.

Darling and Steinberg (1993) highlight an important distinction, defining parenting styles as an emotional climate or context that is typical of the parent-child relationship, as opposed to a description of the specific behaviors of the parents. Nevertheless, research applying parenting styles has indeed maintained the utilization of the typology in psychological research, repeatedly showing the positive benefits of authoritative parenting, and, sustaining the negative consequences associated with authoritarian, permissive, and neglectful parenting styles. Using the same sample, both Lamborn et al. (1991) and Steinberg et al. (1994) measured approximately 10,000 high school students from Wisconsin and California under the four-style parenting typology, demonstrating that Maccoby and Martin's (1983; as cited in Boyd & Bee, 2013) model could offer an applicable empirical framework. Their

research revealed that children of authoritative parents were more confident, better adjusted, and less likely to be delinquent; on the other hand, children of neglectful parents reported lower perceived competence, more negative self-perceptions, higher delinquency, and greater psychological distress. Children of authoritarian parents displayed both positive and negative traits: scoring high on measures of obedience and conformity, and lower on delinquency; yet, they seem to have diminished self-confidence and self-reliance, coupled with more negative self-perceptions. Finally, permissive parenting was associated with more deviant behavior (drug and alcohol use, school misconduct), and higher reported somatic distress. Steinberg et al. replicated these results in their work on juvenile offenders in 2006, reporting a similar pattern of 1) benefits for children of authoritative parents, 2) negative outcomes for children of neglectful parents, and 3) mixed outcomes for children of authoritarian and permissive parents. Further evidence for the association between parenting styles and psychosocial outcomes has been provided in more contemporary research: Yazdani and Daryei (2016) found that authoritative parenting was positively associated with psychological adjustment, and Akhter et al. (2011) found that parenting styles were predictive of externalizing and internalizing problems among children.

Importantly though, researchers have recognized that the parent-child relationship is much more complex than a 2x2 model of responsiveness and demands. There is a growing concern for the reciprocal effect between the parent and the child, known as the bidirectional effect (Gault-Sherman, 2012). Furthermore, investigators have expanded the concept of parenting behaviors to include parental involvement, parental monitoring, and adolescent disclosure – in addition to the dimensions originally proposed by Baumrind (viz. warmth, demandingness, control, and communication; see Willoughby & Hamza, 2011 for a review).

The Present Study

Can parents protect their children from the consequences associated with juvenile delinquency? Research generally supports the persisting impact parents have on their children's lives, perhaps leading to more positive psychosocial outcomes. In regard to risk-taking behavior, Day and Cramer (2018) found that parental involvement played a significant role in the absolute use of illicit substances such as marijuana, cocaine, and heroin; and Khouri and Cramer (2019) showed that higher parental involvement predicted a lower likelihood of using alcohol and tobacco products in general. The present study pursues a similar question by exploring the

association between parental involvement and juvenile delinquency.

Current research on the topic suggests that parental involvement should impact the criminal behavior of adolescents, by buffering the potential negative consequences of criminogenic settings (Janssen et al., 2017) and mediating delinquent behavior (Walters, 2013). This leads to the following research question: What role does parental involvement play in adolescent criminal behavior?

Hypotheses

Based on both Day and Cramer (2018) and Khouri and Cramer (2019), who found that parental involvement was a significant predictor of alcohol, tobacco, and illicit substance use, we hypothesize that there will be a negative correlation between parental involvement and youth arrests, such that greater involvement will predict fewer arrests (i.e., number of times arrested or booked in the past 12 months). Further, we predict that non-justice-involved youth (were never arrested or booked for breaking the law) will report higher levels of parental involvement compared to justice-involved youth (ever arrested or booked for breaking the law in the past 12 months). The justification for these hypotheses stems from the extensive literature on parental involvement and its proclaimed positive effects. We expect a higher level of parental involvement to have a lasting impact on youth's behavior, resulting in reduced juvenile delinquency.

Considering that incarceration is not the only outcome for justice-involved youth, we also hypothesize that there will be differences for youth that are granted probation, an alternative sentence to incarceration where the offender is given supervised release into the public, and parole, which is an early release from prison by which the offender serves the remainder of their sentence in the community under certain conditions. These groups receive an alternative or a modified sentence suggesting that there is some fundamental attribution that separates them from other justice-involved youth that were not granted either probation or parole. We suggest that parental involvement will be lower for those individuals allocated probation or parole compared to non-justice-involved youth. Beyond that, we also predict that youth granted an alternative or modified sentence will have greater parental involvement compared to other justice-involved youth.

Method

Participants

Data were extracted from the National Survey on Drug Use and Health (U.S. Department of Health and Human Services, 2019; $N = 67,791$), which is completed in the United States annually and includes respondents from all 50 states. Each year, the survey includes roughly 70,000 respondents (aged 12 years and older) and includes over 3000 variables to assess participants' attitudes toward (among other things) tobacco, alcohol, and drug use, mental health, and other health-related issues. The present study included only youth-aged respondents (12–17 years), totaling $N = 13,287$ (51% male; see Table 1 for sample demographics by sex and age). The racial composition of the sample includes 52% Non-Hispanic White (3553 males and 3374 females); 23% Hispanic (1543 males and 1469 females); 14% Non-Hispanic Black/African-American (902 males and 896 females); and 12% indicating 'other' racial categories. Respondents received a \$30 cash incentive for completing the survey. The overall response rate was reported as 48.8% (Center for Behavioral Health Statistics and Quality [CBHSQ], 2019).

Materials and Procedure

The National Survey on Drug Use and Health was administered using computer-assisted self-interviewing software, designed to provide a private and confidential method of responding, increasing the level of honest reporting. The survey is a cross-sectional self-report measure of illicit drug use, alcohol use, tobacco use, and other mental health issues in the noninstitutional population of the United States. Households are randomly selected to complete a few general questions, at which point the interviewer may ask one or two residents to complete the full interview. An interviewer provided a laptop for the respondent to complete the survey in their own home; the interview takes about one hour to complete (CBHSQ, 2019).

Parental Involvement. Level of parental involvement ($M = 6.64$, $SD = 1.861$) was calculated as a linear composite variable consisting of 9 Likert-scale items (see Appendix), wherein higher scores reflect greater parental involvement. Respondents were asked to reflect on their parents' engagement pertaining to the past twelve months. Questions such as Have you talked with your parents about the dangers of tobacco and alcohol? (1 = *yes*, 2 = *no*) and During the past 12 months, how often did your parents limit the amount of time you went out with friends on school nights? (1 = *always through* 4 = *never*). Authors of the dataset included recoded variables of the parental involvement questions wherein responses were formed into dichotomous scores where '0' would reflect lower involvement and '1' greater involvement. The

averaged sum of these scores was used to calculate the continuous variable of level of parental involvement.

Internal consistency estimates were acceptable. The KR20 index for dichotomous variables (Kuder & Richardson, 1937) for parental involvement was .627. Excluding item 9 (*During the past 12 months, how many times have you argued or had a fight with at least one of your parents?*) improved estimates to .633 but was retained in light of modest gains.

Juvenile Delinquency. Several variables were included in the analysis of criminal behavior: arrested: meaning ever taken into custody and processed by the police for a criminal offense (1 = *yes*, 2 = *no*); number of times arrested within the past 12 months (0 = *none* to 3 = *three or more times*); number of nights spent in jail or juvenile detention center in the past 12 months (1–7 = *1–7 nights accordingly*, 8 = *8 or more*); and, stayed overnight in jail or juvenile detention center in the past 12 months (1 = *yes*, 2 = *no*). Further, to examine alternative and modified sentences, probation (1 = *yes*, 2 = *no*) and parole (1 = *yes*, 2 = *no*) were included. Due to the overlap of these alternative sentences with the test variable, all members of the parole and probation groups are considered to be justice-involved (i.e., responded yes to ever arrested). The following crimes were associated with arrests related to justice-involved youth in this study: arson, burglary, possession of drugs, possession of tobacco, drunkenness, driving under the influence, fraud, larceny, motor vehicle theft, robbery, sexual offenses, assault, serious violent offense, and a category for other offenses.

Results

Statistical analyses were completed using SPSS Statistics 25. The normality of the data was assumed in light of the central limit theorem which suggests that the sample will approach normality as *N* increases. Skewness (-.879) and kurtosis (.442) for parental involvement were both within the acceptable range. Considering the importance of race in regard to juvenile delinquency (Wampler & Downs, 2010), a simple effects analysis was included in a Factorial ANOVA between parental involvement and arrests as an exploratory analysis of differences between arrested and not arrested for different racial groups.

The authors recognize the greater likelihood of a Type 1 error from conducting multiple tests; therefore, a significance level of .005 was set for all analyses. While this modification allows for greater certainty of significant findings, it is also more conservative, which will increase the probability of a Type 2 error (not rejecting a null hypothesis).

Parental Involvement and Number of Arrests

To evaluate whether parental involvement was negatively correlated with the number of arrests, a Pearson's partial correlation was calculated controlling for the level of income. Both number of times arrested, and the number of nights spent in jail or at a juvenile detention center were assessed in this manner. Results indicated a negative relationship between parental involvement and the number of times arrested, $r(13,067) = -.07, p < .001, 95\% CI[-.089, -.055]$. The correlation was not significant between the level of parental involvement and the number of nights spent either in jail or at a detention center, $r(66) = .10, p = .429, 95\% CI [-.0148, .331]$. However, the power of this analysis may be limited by the small sample size.

Parental Involvement and Justice-Involvement

Results of the independent sample *t*-test indicated that justice-involved youth reported lower parental involvement than non-justice-involved youth, $t(441) = -7.18, p < .001$ (see Table 2 for means, standard deviations, sample sizes, and significance values of all *t*-tests conducted). Conversely, the results of the second *t*-test comparing the (yes/no) groups of youth that stayed overnight in jail or juvenile detention center were not significant ($p = .217$).

Exploratory Analysis

To advance the previous evaluation of differences between justice-involved and non-justice-involved youth, race was included in an exploratory analysis. A factorial ANOVA was conducted with arrested (yes/no) and race (Non-Hispanic White, Non-Hispanic Black/African American, Hispanic; and Other) as the independent variables and parental involvement as the dependent variable. The assumption of equality of variances was violated as Levene's Test of Equality of Error Variances (Levene, 1960) indicated that error variance was not equal across groups, $W(7, 13191) = 7.03, p < .001$. There was a significant main effect of arrested, $F(1, 13233) = 61.05, p < .001, \eta^2 = .01$, and a significant main effect for race, $F(3, 13233) = 3.20, p < .001, \eta^2 = .001$. A noteworthy interaction effect was uncovered, $F(3, 13233) = 4.83, p = .0023, \eta^2 = .00$; suggesting a distinguishable difference between the racial categories and the importance of parental involvement when predicting whether youth would be arrested. A simple effects analysis looked at parental involvement and arrestation at each level of the racial categories. These comparisons (see Table 3) were significant for the Non-Hispanic White ($F = 54.32, p < .001$) and Other ($F = 18.16, p < .001$) groups but not the Non-Hispanic Black/African American ($p = .012$) or Hispanic ($p = .025$) groups. The parental involvement means for Non-Hispanic Black/African

American ($M = 6.29$, $SD = 1.92$) and Hispanic ($M = 6.22$, $SD = 2.12$) justice-involved youth appeared to have higher scores compared to Non-Hispanic White ($M = 5.60$, $SD = 2.15$) and Other ($M = 5.29$, $SD = 2.44$). The non-justice-involved group had similar means across the race categories.

Parental Involvement and Probation or Parole

The third hypothesis stated that parental involvement would be lower for individuals granted probation or parole. To test this, an independent samples t-test compared involvement scores based on the court's decision to offer probation (yes/no) or parole (yes/no) to that of non-justice-involved youth. Results revealed that youth on probation ($M = 6.14$, $SD = 2.14$) reported lower perceived parental involvement compared to non-justice-involved youth, $t(203) = -3.32$, $p = .001$. The result was not significant for youth that received parole ($p = .036$) despite reporting a lower mean ($M = 5.93$, $SD = 2.47$) than those on probation; the low sample size along with the more stringent alpha level may account for this null finding.

To examine whether youth granted probation differed from other-justice-involved youth on their parental involvement, an independent samples t-test compared their means on parental involvement. Equal variances were assumed for this portion of the analysis. Youth given probation did not differ significantly from other-justice-involved youth (i.e., arrested but did not receive probation), $t(416) = 2.33$, $p = .020$. Similarly, no significant difference was found for youth allotted parole $t(414) = .12$, $p = .905$, suggesting that their parental involvement did not differ compared to other-justice-involved youth (i.e., arrested but did not receive parole).

Discussion

The purpose of the present study was to investigate the relation of parental involvement in juvenile delinquency outcomes. Analyzing data from the National Survey on Drug Use and Health, four hypotheses were tested in this endeavor: (a) is parental involvement negatively correlated to the number of arrests; (b) is there a meaningful difference in parental involvement scores between justice-involved and non-justice-involved youth; (c) do youth allotted probation or parole report lower parental involvement than non-justice-involved youth, and (d) do youth allotted probation or parole report higher parental involvement than other-justice-involved youth. Parental involvement is a meaningful predictor of both the absolute use of illicit substances (e.g., marijuana, cocaine, heroin, etc.; Day & Cramer, 2018), as well as the absolute use of tobacco and alcohol products (Khouri & Cramer, 2019). Their results encouraged

the investigation of parental involvement in other domains of malfeasance, initiating the inquiry of parental involvement in the realm of juvenile delinquency.

Results of the analysis were generally supportive of the hypotheses put forward, contributing sufficient support for the ability of parental involvement to influence the delinquent outcomes of youth. Granted, the particularities of the individual analyses indeed warrant a discussion of their contributions and depreciation to the above claim. The first hypothesis was scarcely supported by the analysis, showing that parental involvement was negatively correlated to the number of arrests (admittedly marginally), but not to the number of nights spent in jail or a juvenile detention center. Partially contradicting, the difference between these two findings is likely a result of the limited sample size and will be discussed further in the limitations. The level of income did not significantly detract from the relation between parental involvement and juvenile delinquency as evidenced by the partial correlation. The relatively weak relationship though may coincide with that of previous research, Hoeve et al. (2009) also reported a significant relation between parental involvement and delinquency in their meta-analysis; notably though, the mean effect size ($ESr = -.16$, $p < .10$) could be taken as an iota of consequence compared to that of other factors in the study. The rather small effect observed in this study still gives some confidence in the role of parental involvement, albeit contingent on the findings of previous researchers and other findings of this study.

Exploring the parental involvement scores of youth, results were indicative of a general predictability to being justice-involved or not. The average parental involvement scores of justice-involved youth were lower when compared to non-justice-involved youth (hypothesis-2) demonstrating that a substantial difference exists between them. These results were expected due to the considerable literature that has shown the association between parental involvement and delinquency (Barger et al., 2019; Day & Cramer, 2018; Flanagan et al., 2019; Gault-Sherman, 2012; Hoeve et al., 2009; Maccoby & Martin, 1983, as cited in Boyd & Bee, 2013; Steinberg et al., 2006; Walters, 2013; Willoughby & Hamza, 2011).

Interpreting the differences between the various racial categories suggests that connecting parental involvement to juvenile delinquency may not be ubiquitous across groups (see Table 3). The greatest difference was uncovered for the Non-Hispanic White group, with arrested youth ($M = 5.60$, $SD = 2.15$) being significantly different from youth never arrested

($M = 6.67$, $SD = 1.84$). Meaningful differences were not found for either the Non-Hispanic Black/African American category or the Hispanic category; however, justice-involved youth ($M = 5.29$, $SD = 2.44$) were dissimilar to non-justice-involved youth ($M = 6.59$, $SD = 1.84$) for other races. The category of other races included: Non-Hispanic Native American/Native Alaskan, Non-Hispanic Native Hawaiian/Other Pacific Islander, Non-Hispanic Asian, and Non-Hispanic Multiracial. The groups were collapsed into the most prevalent representations from the study for sufficient sample size comparisons; this separation will be discussed further in the limitations. These findings would suggest that justice-involved youth can be differentiated based on their parental involvement scores for the Non-Hispanic White and Other groups, but not the Non-Hispanic Black/African American or Hispanic groups. Interpreting the mean comparisons of the two nonsignificant groups however does suggest that justice-involved youth did score lower on parental involvement; but the effect was not found to be statistically significant. Perceptions of parental involvement may partially explain why the results were insignificant for Non-Hispanic Black/African American and Hispanic youth. But more broadly, this finding could be due to more systemic issues in the United States criminal justice system, showing that criminal punishment disadvantages minoritized youth (Wheelock & Uggen, 2005) regardless of parental involvement.

Extension of the basic finding—that parental involvement is an important determinant of juvenile delinquency—to all racial categories would be an erroneous assumption. If nothing else, these findings indicate that the complexity of the proposed relation requires further investigation of youth outside of the Western, Educated, Industrialized, Rich, and Democratic (WEIRD; Henrich et al., 2013) samples in the United States, before these results can be generalized.

Parental involvement did appear to be a significant predictor of youth placed on probation. A small but noteworthy difference in parental involvement scores was found between non-justice-involved youth and youth on probation. Interestingly, the results were insignificant for youth on parole. Importantly though, the mean parental involvement of youth that received parole was lower than youth that received probation; therefore, the insignificant finding may just be a product of the smaller sample for comparison and the corrected alpha value. This would suggest that both youths granted parole and probation could be differentiated based on their parental involvement scores; though, the findings of this study were unable to substantiate this for parole. Furthermore, comparing the average parental involvement score of other-

justice-involved youth to those that received parole and those that granted probation, indicated that parole and probation could not successfully be differentiated from the other-justice-involved group in this study. Though the results of this study were unable to establish that youth on parole and probation were different from other-justice-involved youth, this conclusion warrants further investigation. Despite the insignificant findings, we suggest that there is merit in investigating parental involvement as it differs between youth that receive alternative or modified sentences from both justice-involved and non-justice-involved youth. These findings demonstrate the pertinence of parental involvement as an influential factor for juvenile delinquency. The results of the present study indicate distinguishable differences in parental involvement between youth with varying experiences in the criminal justice system.

The implications of this study are numerous. While the notion of encouraging parental involvement has been long-standing and shown to lead to positive outcomes for youth, this study adds to the body of research by elucidating the theoretical connection from involvement to juvenile delinquency. This study also highlights the distinction of youth granted alternative and modified sentences. The parental involvement scores were notably different for youth on probation compared to non-justice-involved youth, but not for youth granted parole. This opens up an avenue of investigation regarding differences between these groups. Further, the racial differences demonstrated in this study can inform the clinical community of outcomes based on parental involvement, and how those outcomes are influenced in different racial and socio-economic backgrounds. The importance of the involvement in the parent-child relationship may have differing explicit and implicit meanings for youth of different racial and socio-economic backgrounds, which leads to a culturally informed treatment approach that is considerate of individual idiosyncrasies.

Limitations

Conclusions stemming from the results of this study should be considered in light of a few limitations. Despite the considerable number of respondents present in the NSDUH, individual analyses were impeded by lower sample sizes extensively across the various analyses. This impediment has multiple ramifications for the statistical tests that were conducted. Firstly, the samples compared for most of the independent-samples t-tests were vastly disproportionate. This could have a large impact on the parental involvement means of these groups, skewing the results of the analyses. Similarly, the lack of sample size for the

different racial categories resulted in the collapse of groups into the four most prominent. Secondly, the limited sample sizes could impact Levene's Test for Equality of Variances, meaning that equal variance could not be assumed for most of the analyses, resulting in a more conservative assessment of the results (with lower t-values and degrees of freedom). While the present study was limited to respondents that completed both the parental involvement questions and the particular crime outcomes, researchers intending to explore this avenue would be astute to include as many respondents as possible.

Another limitation of the present study is the nature of the cross-sectional design. While these results can be compelling, they are merely correlational and do not account for the effect or change over time, such as those observed in Walters (2013), or confounds that may alter this relationship such as the moderation effect found in Janssen et al. (2017). The purpose of the present study was to find a general effect of parental involvement on youth and therefore excluded any sex, or bidirectional effects (as seen in Gault-Sherman, 2012) that may impact the effect of parental involvement on youth's behavior.

Concerning the categorization of race in this study. Adequate representation of minority groups restricted meaningful comparisons in the present analysis. This superficial treatment regarding the effect of race on juvenile delinquency, while informative, is inadequate to probe the potential deviation between these groups. The collapsing of groups for sufficient sample sizes hinders the exploration into other racial categories. While this is a result of the confines of archival data analysis, it is a limitation, nonetheless. Moreover, the inequities in the American justice system and disproportionate arrests of minority individuals play a distinct role in the depiction of juvenile delinquency. Therefore, socio-economic barriers influence the criminal acts of individuals. While income was included in a partial correlation, there were not enough variables to examine the impact of SES on juvenile delinquency. Another deficient area is related to sexual orientation, which may confound delinquency problems in youth. The present study was unable to examine these matters in considerable depth and will be put forth as ideas for future research.

Future Directions

Future research should look to explore the distinctive characteristics of youth (i.e., puberty, peer relations, academic and extracurricular engagement), as well as explicit parenting behaviors, such as supervision, limit-setting or communication, within the parent-child relationship. Emphasis could also be given to the intricacies of the family unit, including

the effect of alternative parental figures (e.g., grandparents, close relatives), atypical family units, sibling relationships, and level of family intimacy. Further research could investigate the parental involvement of youth that has committed specific felonies to determine whether parental involvement could prove to be a valuable predictor of heinous crimes. The contrast between parole and probation could be examined more closely, as the difference may be due to various socio-economic factors that could potentially account for more lenient sentencing.

The exploratory analysis including race revealed that there is a disparity in how parental involvement is connected to juvenile delinquency in youth of different racial backgrounds. Future research should look to illuminate this discrepancy. Studies outside of the United States could do much to expand upon these findings, supporting or weakening the generalizability of these results. Multi-cultural and feminist psychology perspectives could be included to greater inform the influence of race, ethnicity, SES, gender identity, and sexual orientation.

Conclusion

The modest relation found in the analyses prompts additional investigation into the weight of parental involvement as it pertains to juvenile delinquency but does not expunge its importance as a salient factor of psychosocial development. It is safe to suggest that parental involvement is linked to juvenile delinquency. The effect that involved parents seemed to extend well beyond the initially foreseeable impact. This means that parents should heed the body of literature promoting the benefits of active involvement, as it may in part determine the positive or negative outcomes in their children's lives. Additionally, clinicians can ascertain much from the reported data. Acknowledging ethnic differences in parental involvement and juvenile delinquent outcomes can lead to a better understanding of individual perceptions and engender an improved therapeutic alliance.

The methods employed to measure parental involvement, while effective, fail to explore the complex relationship between parents and their children. The present measure of parental involvement and other applicable constructs used in recent studies (Flanagan et al., 2019; Hoeve et al., 2009; Janssen et al., 2017) are an improvement relative to previous attempts of conceptualizing the parent-child relationship, moving far beyond the simple two-dimensional approach of Baumrind (1966; 1971) and Maccoby and Martin (1983; as cited in Boyd & Bee, 2013). This improvement reflects a greater awareness of socio-cultural factors necessary to understand the

components of human behavior. Yet, more work needs to be done on the differences in race, ethnicity, gender identity, sexual orientation, socio-economic status, and the like, to further understand the complex mechanisms by which parental involvement influences delinquent behaviors.

References

- Ainsworth, M. D. (1969). Object relations, dependency, and attachment: A theoretical review of the infant-mother relationship. *Child Development, 40*, 969-1025. <https://doi.org/10.2307/1127008>
- Ainsworth, M. D., & Bell, S. M. (1970). Attachment, exploration, and separation: Illustrated by the behavior of one-year-olds in a strange situation. *Child Development, 41*, 49-67. <https://doi.org/10.2307/1127388>
- Ainsworth, M. S., & Bowlby, J. (1991). An ethological approach to personality development. *American Psychologist, 46*, 333-341. <https://doi.org/10.1037/0003-066X.46.4.333>
- Akhter, N., Hanif, R., Tariq, N., & Atta, M. (2011). Parenting styles as predictors of externalizing and internalizing behavior problems among children. *Pakistan Journal of Psychological Research, 26*, 23-41.
- Barger, M. M., Kim, E. M., Kuncel, N. R., & Pomerantz, E. M. (2019). The relation between parents' involvement in children's schooling and children's adjustment: A meta-analysis. *Psychological Bulletin, 145*, 855-890. <https://doi.org/10.1037/bul0000201>
- Baumrind, D. (1966). Effects of authoritative parental control on child behavior. *Child Development, 37*, 887-907. <https://doi.org/10.2307/1126611>
- Baumrind, D. (1971). Current patterns of parental authority. *Developmental Psychology, 4*, 1-103. <https://doi.org/10.1037/h0030372>
- Bohlin, G., Eninger, L., Brocki, K. C., & Thorell, L. B. (2012). Disorganized attachment and inhibitory capacity: Predicting externalizing problem behaviors. *Journal of Abnormal Child Psychology, 40*, 449-458. <https://doi.org/10.1007/s10802-011-9574-7>
- Bowlby, J. (1969). Attachment and loss v. 3 (Vol. 1). *Attachment*. New York, United States: Basic Books.
- Bowlby, J. (1988). *A secure base: Parent-child attachment and healthy human development*. New York, United States: Basic Books.
- Boyd, D. R., & Bee, H. L. (2013). *The developing child* (13th ed.). New York, United States: Pearson.
- Center for Behavioral Health Statistics and Quality. (2019). *2018 National survey on drug use and health public use file codebook*, Substance Abuse and Mental Health Services Administration, Rockville, MD. Retrieved from <https://datafiles.samhsa.gov/>
- Chen, X., & Zhong, H. (2013). Delinquency and crime among immigrant youth—An integrative review of theoretical explanations. *Laws, 2*, 210-232. <https://doi.org/10.3390/laws2030210>
- Darling, N., & Steinberg, L. (1993). Parenting style as context: An integrative model. *Psychological Bulletin, 113*, 487-496. <https://doi.org/10.1037/0033-2909.113.3.487>
- Davidov, M., & Grusec, J. E. (2006). Untangling the links of parental responsiveness to distress and warmth to child outcomes. *Child Development, 77*, 44-58. <https://doi.org/10.1111/j.1467-8624.2006.00855.x>
- Day, N., & Cramer, K. M. (2018). The effects of parental involvement on youth substance abuse. *Journal of Interpersonal Relations, Intergroup Relations and Identity, 11*, 66-74.
- El Nokali, N. E., Bachman, H. J., & Votruba-Drzal, E. (2010). Parent involvement and children's academic and social development in elementary school. *Child Development, 81*, 988-1005. <https://doi.org/10.1111/j.1467-8624.2010.01447.x>
- Farrington, D. P., Loeber, R., & Howell, J. C. (2012). Young adult offenders: The need for more effective legislative options and justice processing. *Criminology and Public Policy, 11*, 729-750. <https://doi.org/10.1111/j.1745-9133.2012.00842.x>
- Flanagan, I. M., Auty, K. M., & Farrington, D. P. (2019). Parental supervision and later offending: A systematic review of longitudinal studies. *Aggression and Violent Behavior, 47*, 215-229. <https://doi.org/10.1016/j.avb.2019.06.003>
- Gault-Sherman, M. (2012). It's a two-way street: The bidirectional relationship between parenting and delinquency. *Journal of Youth and Adolescence, 41*, 121-145. <https://doi.org/10.1007/s10964-011-9656-4>
- Gustafson, S. L., & Rhodes, R. E. (2006). Parental correlates of physical activity in children and early adolescents. *Sports Medicine, 36*, 79-97. <https://doi.org/10.2165/00007256-200636010-00006>
- Henrich, J., Heine, S. J., & Norenzayan, A. (2013). The weirdest people in the world? In S. M. Downes & E. Machery (Eds.), *Arguing about philosophy. Arguing about human nature: Contemporary debates* (pp. 198-216). Routledge/Taylor & Francis Group.
- Hill, N. E., & Tyson, D. F. (2009). Parental involvement in middle school: A meta-analytic assessment of the strategies that promote achievement. *Developmental Psychology, 45*, 740-763. <https://doi.org/10.1037/a0015362>
- Hoeve, M., Dubas, J. S., Eichelsheim, V. I., Van der Laan, P. H., Smeenk, W., & Gerris, J. R. (2009).

- The relationship between parenting and delinquency: A meta-analysis. *Journal of Abnormal Child Psychology*, 37, 749-775. <https://doi.org/10.1007/s10802-009-9310-8>
- Holden, G. W. (2010). *Parenting: A dynamic perspective*. United States: Sage Publications, Inc.
- Janssen, H. J., Weerman, F. M., & Eichelsheim, V. I. (2017). Parenting as a protective factor against criminogenic settings? Interaction effects between three aspects of parenting and unstructured socializing in disordered areas. *Journal of Research in Crime and Delinquency*, 54, 181-207. <https://doi.org/10.1177/0022427816664561>
- Kenny, D., Blacker, S., & Allerton, M. (2014). Reculer pour mieux sauter: A review of attachment and other developmental processes inherent in identified risk factors for juvenile delinquency and juvenile offending. *Laws*, 3, 439-468. <https://doi.org/10.3390/laws3030439>
- Khoury, M., & Cramer, K. M. (2019). The role of perceived involvement in alcohol consumption and tobacco use in youth. *Journal of Interpersonal Relations, Intergroup Relations and Identity*, 12, 10-18.
- Klein, M. (1927). The psychological principles of infant analysis. *The International Journal of Psychoanalysis*, 8, 25-37.
- Kohut, H. (1977). *The restoration of the self*. Chicago, United States: University of Chicago Press.
- Kuder, G. F., & Richardson, M. W. (1937). The theory of the estimation of test reliability. *Psychometrika*, 2, 151-160. <https://doi.org/10.1007/BF02288391>
- Lamborn, S. D., Mounts, N. S., Steinberg, L., & Dornbusch, S. M. (1991). Patterns of competence and adjustment among adolescents from authoritative, authoritarian, indulgent, and neglectful families. *Child Development*, 62, 1049-1065. <https://doi.org/10.2307/1131151>
- Levene, H. (1960). Contributions to probability and statistics. *Essays in honor of Harold Hotelling*, 278-292. Stanford University Press.
- Maccoby, E. E. (2015). Historical overview of socialization research and theory. In J. E. Grusec & P. D. Hastings (Eds.), *Handbook of socialization: Theory and research* (pp. 3-32). New York, United States: Guilford Press.
- Main, M., & Solomon, J. (1990). *Procedures for identifying infants as disorganized/disoriented during the Ainsworth Strange Situation*. In M. T. Greenberg, D. Cicchetti, & E. M. Cummings (Eds.), *The John D. and Catherine T. MacArthur Foundation series on mental health and development. Attachment in the preschool years: Theory, research, and intervention* (pp. 121-160). Chicago, United States: University of Chicago Press.
- Sickmund, M., & Puzanhera, C. (Eds.). (2014). *Juvenile offenders and victims: 2014 national report*. Pittsburgh, PA: National Center for Juvenile Justice. Retrieved from <https://www.ojjdp.gov/ojstatbb/nr2014/>
- Steinberg, L., Blatt-Eisengart, I., & Cauffman, E. (2006). Patterns of competence and adjustment among adolescents from authoritative, authoritarian, indulgent, and neglectful homes: A replication in a sample of serious juvenile offenders. *Journal of Research on Adolescence*, 16, 47-58. <https://doi.org/10.1111/j.1532-7795.2006.00119.x>
- Steinberg, L., Lamborn, S. D., Darling, N., Mounts, N. S., & Dornbusch, S. M. (1994). Over-time changes in adjustment and competence among adolescents from authoritative, authoritarian, indulgent, and neglectful families. *Child Development*, 65, 754-770. <https://doi.org/10.2307/1131416>
- U.S. Department of Health and Human Services, Substance Abuse and Mental Health Services Administration, Center for Behavioral Health Statistics and Quality. (2019). National Survey on Drug Use and Health 2018 (NSDUH-2018-DS0001). Retrieved from <https://www.datafiles.samhsa.gov/>
- Walters, G. D. (2013). Delinquency, parental involvement, early adult criminality, and sex: Evidence of moderated mediation. *Journal of Adolescence*, 36, 777-785. <https://doi.org/10.1016/j.adolescence.2013.03.011>
- Wampler, R.S. & Downs, A.B. (2010). Parent and peer attachment in minority males at high risk for delinquency. *Clinical Social Work Journal*, 38, 107-119 <https://doi.org/10.1007/s10615-009-0239-8>
- Watson, J. B. (1928). Against the threat of mother love. *The children's culture reader*, 470-475. New York, United States : New York University press.
- Wheelock, D., & Uggen, C. (2006). Race, poverty and punishment: The impact of criminal sanctions on racial, ethnic, and socioeconomic inequality. *Ann Arbor, MI: National Poverty Center*.
- Willoughby, T., & Hamza, C. A. (2011). A longitudinal examination of the bidirectional associations among perceived parenting behaviors, adolescent disclosure and problem behavior across the high school years. *Journal of Youth and Adolescence*, 40, 463-478. <https://doi.org/10.1007/s10964-010-9567-9>
- Yazdani, S., & Daryei, G. (2016). Parenting styles and psychosocial adjustment of gifted and normal adolescents. *Pacific Science Review B: Humanities and Social Sciences*, 2, 100-105. <https://doi.org/10.1016/j.psr.2016.09.019>
- Yoder, J. R., Brisson, D., & Lopez, A. (2016). Moving beyond fatherhood involvement: The association between father-child relationship quality and youth delinquency trajectories. *Family Relations*, 65, 462-476. <https://doi.org/10.1111/fare.12197>

Reçu le 17 avril 2020

Révision reçue le 1 mars 2021

Accepté le 15 mars 2021 ■

Appendix

Table 1

Sample Demographics by Sex and Age

| Age (Years) | <i>n</i> (%) | Male (%) | Female (%) |
|-------------|---------------|-------------|-------------|
| 12 | 2032 (15.3) | 1083 (53.3) | 949 (46.7) |
| 13 | 2263 (17.0) | 1146 (50.6) | 1117 (49.4) |
| 14 | 2233 (16.8) | 1124 (50.3) | 1109 (49.7) |
| 15 | 2215 (16.7) | 1133 (51.0) | 1082 (49.0) |
| 16 | 2321 (17.5) | 1187 (51.1) | 1134 (48.9) |
| 17 | 2223 (16.7) | 1113 (50.0) | 1110 (50.0) |
| Total | 13287 (100.0) | 6786 (51.0) | 6501 (49.0) |

Table 2

Mean Parental Involvement by Delinquency Outcomes

| Outcomes | Independent Samples <i>T</i> -Test ^a | | | | | | | <i>t</i> | <i>p</i> |
|-----------------------|---|-----------|----------|----------|-----------|----------|-------|----------|----------|
| | Yes | | | No | | | | | |
| | <i>M</i> | <i>SD</i> | <i>n</i> | <i>M</i> | <i>SD</i> | <i>n</i> | | | |
| Arrested | 5.90 | 2.14 | 421 | 6.66 | 1.86 | 12778 | -7.18 | <.001** | |
| Detained ^b | 6.33 | 2.13 | 74 | 6.64 | 1.87 | 13040 | -1.25 | .217 | |
| Parole | 5.93 | 2.47 | 56 | 6.64 | 1.87 | 13134 | -2.15 | .036 | |
| Probation | 6.14 | 2.14 | 200 | 6.65 | 1.87 | 12955 | -3.32 | .001* | |
| | Independent Samples <i>T</i> -Test for Justice-Involved | | | | | | | | |
| | Yes | | | No | | | | | |
| Parole | 5.93 | 2.47 | 56 | 5.89 | 2.10 | 360 | .135 | .893 | |
| Probation | 6.14 | 2.14 | 200 | 5.65 | 2.12 | 218 | 2.32 | .020 | |

^a Equal variances not assumed.

^b Stayed overnight in jail/juvenile detention center.

^c Justice-involved = yes to arrested; equal variances assumed.

* $p < .005$. ** $p < .001$

PARENTAL INVOLVEMENT AND JUVENILE DELINQUENCY

Table 3

Simple Effects of Factorial ANOVA in Parental Involvement by Race and Arrests

| Arrested | Yes | | | No | | | F | p |
|--------------------------------|------|------|-----|------|------|------|-------|---------|
| | M | SD | n | M | SD | n | | |
| NonHisp White | 5.60 | 2.15 | 169 | 6.67 | 1.84 | 6736 | 55.26 | < .001* |
| NonHisp Black/African American | 6.29 | 1.92 | 99 | 6.78 | 1.83 | 1688 | 6.67 | .010 |
| Hispanic | 6.22 | 2.12 | 116 | 6.62 | 1.94 | 2889 | 4.71 | .030 |
| Other | 5.29 | 2.44 | 39 | 6.59 | 1.84 | 1505 | 18.63 | < .001* |

Note. Other included: Non-Hispanic Native American/Native Alaskan, Non-Hispanic Native Hawaiian/Other Pacific Islander, Non-Hispanic Asian, and Non-Hispanic Multiracial. * $p < .001$

Parental Involvement Items

1. Have you talked with your parents about the dangers of tobacco and alcohol?
2. During the past 12 months, how often did your parents check if your homework is done?
3. During the past 12 months, how often did your parents provide help with your homework when you needed it?
4. During the past 12 months, how often did your parents make you do chores around the house?
5. During the past 12 months, how often did your parents limit the amount of time you watched TV?
6. During the past 12 months, how often did your parents limit the amount of time you went out with friends on school nights?
7. During the past 12 months, how often did your parents let you know when you'd done a good job?
8. During the past 12 months, how often did your parents tell you they were proud of you for something you had done?
9. During the past 12 months, how many times have you argued or had a fight with at least one of your parents?