

UC Riverside

UC Riverside Electronic Theses and Dissertations

Title

Mother and Father Involvement in Adolescents' Academic and Socioemotional Adjustment:
Does Context Matter?

Permalink

<https://escholarship.org/uc/item/2tx901kz>

Author

Delany, Danielle Elizabeth

Publication Date

2021

Peer reviewed|Thesis/dissertation

UNIVERSITY OF CALIFORNIA
RIVERSIDE

Mother and Father Involvement in Adolescents' Academic and Socioemotional
Adjustment: Does Context Matter?

A Dissertation submitted in partial satisfaction
of the requirements for the degree of

Doctor of Philosophy

in

Psychology

by

Danielle Elizabeth Delany

December 2021

Dissertation Committee:

Dr. Cecilia Cheung, Chairperson

Dr. Misaki Natsuaki

Dr. Robert Ream

Copyright by
Danielle Elizabeth Delany
2021

The Dissertation of Danielle Elizabeth Delany is approved:

Committee Chairperson

University of California, Riverside

ABSTRACT OF THE DISSERTATION

Mother and Father Involvement in Adolescents' Academic and Socioemotional Adjustment: Does Context Matter?

by

Danielle Elizabeth Delany

Doctor of Philosophy, Graduate Program in Psychology

University of California, Riverside, December 2021

Dr. Cecilia Cheung, Chairperson

Studies have demonstrated parent involvement as an important predictor of academic achievement, social emotional skill development, and overall psychological adjustment. Much of the previous work on parent involvement has focused on mother involvement, leaving the role of father involvement in adolescents' adjustment understudied. Further, this study was conducted during the COVID-19 global pandemic, which makes it unique in that some parents and adolescents were likely spending a significant amount of time with one another during the stay-at-home orders. Adolescents' perspectives are important as they are a critical part of the family and at a critical transitional stage in which they are becoming independent and making decisions about their future. The goal of this study was to identify whether there are differences in the rates of involvement among mothers and fathers, if involvement is associated with adolescents' school and wellbeing outcomes, and whether mother vs. father involvement has differential implications for adolescents' outcomes. The second goal of the study was

to determine if contextual factors (e.g., parent relationship quality, teacher-adolescent relationships, community belonging, social support) moderate the associations between parent involvement and adolescent adjustment. Adolescents ($N = 116$: mean age = 13.2) reported on their perceived rates of mother and father involvement, and their academic and socioemotional adjustment. Findings demonstrated significant differences in the levels of mother and father involvement, such that mothers were found to have higher rates of involvement than fathers. Although there were differences in the rates of parent involvement among mothers and fathers, the implications of their involvement were similar for adolescents' outcomes. Parent-adolescent relationship quality significantly moderated the association between parenting involvement, both mother and father involvement, and adolescents' socioemotional skills. In a similar vein, community belonging was found to moderate the associations between parent involvement and adolescent academic achievement (e.g., grades). Herein, while parent involvement generally plays a positive role in adolescent outcomes, other contexts, and the social capital gained within them, can reinforce, these contributions to adolescents' academic and socioemotional adjustment.

Table of Contents

| | |
|---|----|
| Introduction..... | 1 |
| Parents' involvement: A Multidimensional Construct..... | 2 |
| Implications of Parent Involvement for Children's Functioning..... | 3 |
| Mother vs. Father Involvement..... | 5 |
| Parent Involvement During Adolescence..... | 7 |
| The Role of Context in Adolescent Development..... | 9 |
| Overview of the Present Study..... | 16 |
| Research Questions..... | 17 |
| Method..... | 18 |
| Participants and Procedure..... | 18 |
| Measures..... | 20 |
| Results..... | 24 |
| Overview of Analyses..... | 24 |
| Mean-level Differences between Mother and Father Involvement..... | 26 |
| Associations between involvement and Adolescents' Outcomes..... | 26 |
| The Moderating Role of Contextual Factors..... | 27 |
| Discussion..... | 29 |
| Rates of Involvement Among Mothers and Fathers..... | 29 |
| Mother and Father Involvement and Adolescents' Outcomes..... | 31 |
| The Moderating Role of Context..... | 32 |
| Theoretical and Practical Implications of the Current Research..... | 36 |
| Limitations and Future Directions..... | 38 |
| Conclusion..... | 40 |
| References..... | 41 |
| Appendices..... | 66 |

List of Tables

| | |
|---|----|
| Table 1: Descriptive Statistics and Correlations Among Parent Involvement and Adolescent Adjustment Outcomes..... | 55 |
| Table 2: Descriptive Statistics and Correlations Among Parent Involvement and Contextual Variables..... | 56 |
| Table 3: Father Involvement Predicting Grades: Moderation by Community Belonging..... | 58 |
| Table 4: Mother Involvement Predicting Grades: Moderation by Community Belonging..... | 60 |
| Table 5: Father Involvement Predicting Socioemotional Skills: Moderation by Father Relationship Quality..... | 62 |
| Table 6: Mother Involvement Predicting Socioemotional Skills: Moderation by Mother Relationship Quality..... | 74 |

List of Figures

| | |
|--|----|
| Figure 1: Guiding conceptual framework depicting adolescents’ interactions with various contextual systems as a moderation between parent involvement and adolescents’ academic and socioemotional adjustment..... | 54 |
| Figure 2: Comparing Mother and Father Rates of Involvement..... | 57 |
| Figure 3: Relationship Between Father Involvement and Adolescent Grades with a Significant Interaction of Community Belonging..... | 59 |
| Figure 4: Relationship Between Mother Involvement and Adolescent Grades with a Significant Interaction of Community Belonging | 61 |
| Figure 5: Relationship Between Father Involvement and Adolescent Socioemotional Skills with a Significant Interaction of Father Relationship Quality..... | 63 |
| Figure 6: Relationship Between Mother Involvement and Adolescent Socioemotional Skills with a Significant Interaction of Mother Relationship | 65 |

Introduction

A plethora of studies have indicated parent involvement as an important predictor of academic achievement and motivation, social emotional skill development, and overall psychological adjustment (Gecas & Schwalbe, 1986; Harris & Goodall, 2008; Jeynes, 2007; Pomerantz, Kim, & Cheung, 2012). The majority of these findings come from research conducted without consideration of contributions from mother and father involvement independently, which leaves out important information about the associations between mother vs. father involvement and these outcomes. In addition, this study was conducted during the global COVID-19 pandemic, where children are learning and developing within a unique context, with major changes in how and where children receive their education. In this circumstance, some parents may be able to be more involved, as they could now be home with their children throughout the day. However, many parents are working from home while also balancing being a teacher to their children, in addition to their regular employment duties. Other challenges, such as having many family members home, which could create difficulty in having a quiet place to engage and learn in virtual school, may also be taking place. The current study examined if there are differences in the rates of mother and father involvement, if this involvement plays a role in adolescents' academic and social-emotional adjustment, and well-being, as well as whether the associations differ across mother and father involvement. This study also explored the role of contextual factors that adolescents interact with across various ecological systems, such as parent relationship quality, community belonging, and

teacher-adolescent relationships, that may moderate the associations between parent involvement and adolescent academic and social-emotional adjustment.

Parents' Involvement: A Multidimensional Construct

Parent involvement is an important part of children's lives, and an abundance of research has been dedicated to understanding the topic. Moreover, parent involvement plays a significant role in children's development from infancy through adolescence (Hayakawa et al., 2013; Froiland et al., 2013; Westerlund et al., 2013). Broadly defined, parent involvement refers to parents' commitment of both tangible resources and behaviors to support children's development (Grolnick & Slowiaczek, 1994). There are many ways that parents can be involved in children's lives. For example, they can help their children with homework, attend school meetings, or take them to sports practice. These activities contribute to children's development, and they do so across three domains—academic adjustment, social-emotional adjustment, and general well-being. Previous research has demonstrated that parent involvement has a direct impact on several domains of adolescents' lives including academic achievement, and personal and social development (Gecas & Schwalbe, 1986; Harris & Goodall, 2008; Jeynes, 2007; Pomerantz, Kim, & Cheung, 2012).

Guiding theoretical frameworks have considered parent involvement as a multidimensional construct. Grolnick and Slowiaczek (1994) provided evidence for a triadic conceptualization of parent involvement, such that parents manifest their involvement in three ways—through their behavior regarding school, through children's perceptions of their personal availability, and by introducing their children to activities

that are cognitively and intellectually stimulating. Their findings further suggested that including multiple indices of involvement, such as involvement in children's schooling and involvement in children's lives in general, is important as parents display their involvement in multiple ways. Building on this work, Epstein (1995) developed a framework of six types of involvement for school and family partnerships, which includes parenting, communicating, volunteering, learning at home, decision making, and collaborating with community. This framework indicates the importance of involvement as a transactional and multidimensional system that strengthens students' outcomes.

Implications of Parent Involvement for Children's Functioning

A number of studies have examined the contribution of parent involvement to adolescents' academic adjustment (Baker & Stevenson, 1986; Fan & Chen, 2001; Fan & Williams, 2010; Henderson & Mapp, 2002; Hill & Tyson, 2009; Jeynes, 2017). Castro and colleagues (2015) conducted a meta-analysis with studies focused on children from kindergarten to secondary schools, and examined the role of parent involvement in children's academic achievement. Findings revealed a positive moderate impact of parent involvement on children's academic achievement, and these findings were strongest when parent expectations for their children were high, communication between parent-child and school activities was maintained, and when parents helped their children to develop regular reading habits. Along with academic achievement, Baker and Stevenson (1986) examined parent involvement in adolescents' schooling and found that involved parents possessed more complex strategies for collaborating with schools and for working with their children to promote academic achievement. Children's interactions

with their parents have also been found to contribute to their competence, motivation, and engagement in academic activities (Grolnick & Slowiaczek, 1994).

Another significant role of parent involvement is in children's development of socioemotional skills. Research indicates that socioemotional skills (e.g., sociability, leadership, and school engagement) are an important determinant of student success (Heckman & Kautz, 2012; OECD, 2015). Previous research has also shed light on the value of socioemotional skills for employment, economic success, and general well-being (Deming, 2017; Gutman & Schoon, 2013; Heckman & Kautz, 2012). Modeling and communicating socioemotional skills when interacting with children is one way that involvement contributes to the development of these skills. Herein, several studies have demonstrated that parent involvement contributes to children having fewer behavioral problems and enhanced social skills (El Nokali, et al., 2010; McWayne et al., 2004; Scheer et al., 2000).

Parent involvement is not only beneficial to children's academic and social-emotional adjustment, but also their general well-being. Involvement provides children with support, and validates their worth by fostering children's emotional functioning, which heightens their positive emotions and dampens negative emotions (Cripps & Zyromski, 2009; Pomerantz et al., 2006). Moreover, previous research demonstrates that parent involvement, both mother and father involvement independently, predicts adolescent well-being (Cripps & Zyromski, 2009). Taken together, parents' involvement benefits more than just children's academic achievement and motivation, but their socioemotional development and general well-being as well. Although there is an

impressive amount of research on the role of parents' involvement in children's development, little research has distinguished the unique contributions between fathers' and mothers' involvement, as well as examined the various ecological contexts in which the child is developing. Studying these associations across such contexts is crucial to explicate whether there are factors that bolster the associations between parent involvement and academic and socioemotional adjustment, and well-being.

Mother vs. Father Involvement

Much of the literature on parent involvement focuses on the role of mother involvement, with a scarcity of studies examining fathers. However, researchers have found an increasing trend in involvement among fathers compared to previous generations (Pleck & Masciadrelli, 2004). Specifically, research has demonstrated the importance of father involvement on a range of child and adolescent socio-behavioral outcomes (Amato & Rivera, 1999; Cookston & Finlay, 2006; Lamb, 2004; Marsiglio et al., 2000, Carlson, 3006). Flouri and Buchanan (2003) conducted a study of 2,722 adolescents and demonstrated that both mother and father involvement contributed significantly to adolescent well-being. Similarly, Flouri and Buchanan (2004) examined the impact of involvement on adolescents' educational attainment and found that both mother and father involvement independently predict adolescent educational attainment.

There are mixed findings on whether there are significant differences in the rates of mother vs. father involvement. For example, Lewis and Lamb (2003) and Giallo and colleagues (2013) found few differences in the amount and type of involvement across mothers and fathers. Lewis and Lamb (2003) summarized research findings that

demonstrated consistency between the interaction styles of mothers and fathers, but differences in the closeness of adolescents with their mothers vs. their fathers—such that adolescents report being closer to mothers compared to fathers. Other research, focusing on children ages 0-4, only observed differences between mother and father involvement activities in daily activities (e.g., cooking, caring for pets) and outdoor play (e.g., walking, swimming), with mothers reporting greater engagement in both of these activities compared to fathers (Giallo et al., 2013). Giallo and colleagues emphasized that these were the only differences found in mother vs. father involvement after accounting for employment (e.g., full- or part-time); there were no differences found between mothers' and fathers' involvement in reading (e.g., read from book, storytelling) and indoor games (e.g., board and card games).

Conversely, Baxter and colleagues (2007), found that fathers spend less time involved in caregiving activities, children's learning, and play compared to mothers. Foster et al. (2016) investigated the home learning environment in early childhood and found that mothers provided greater home learning environment activities compared to fathers. Examining rates of involvement in a typical week, Keown and Palmer (2014) found evidence that mothers had increased rates of involvement with their children during the workdays and fathers tended to have higher rates of involvement on weekend days. In more recent research, Rollè et al. (2019) conducted a systematic review of father involvement in early and middle childhood which also revealed mixed results as to differences in mother vs. father involvement, such that most of the studies reviewed indicated greater engagement and involvement from mothers but that father involvement

had stronger associations with children's outcomes such as cognitive and literacy skills. In sum, the literature highlights the importance of both mother and father involvement in lives of children and adolescents, and more research needs to consider the unique contributions of mother and father involvement. The current study examined differences in the rates of both mother and father involvement and also separately examined their associations with adolescent outcomes to shed light on the differences in their impact on adolescents' academic and socioemotional adjustment and well-being.

Parent Involvement During Adolescence

Adolescence is a critical period of development, where changes are occurring mentally, physically, and psychologically (Santrock, 2004). It is during this developmental epoch that adolescents are striving for both independence from parents and inclusion in social groups (Eccles & Wigfield, 2002; Nagaoka, Farrington, Ehrlich, & Heath, 2015). However, adolescents still need support and structure from parents even though they are turning more towards peers and feel as though they are independent, specifically because research has demonstrated a decline in school engagement among adolescents (Wigfield et al., 2006).

Since the present study was conducted during the COVID-19 pandemic, most children were kept home and likely not interacting with their peers as much as in a typical year, which is important to consider when evaluating parents' involvement in adolescents' lives during this critical time. A surplus of research has highlighted the importance of parent involvement during adolescence (Chao et al., 2009; Castambis, 2001; Choi et al., 2015; Fan & Chen, 2001; Hill & Tyson, 2009). Hill and Tyson (2009)

conducted a meta-analysis examining parent involvement during middle school specifically. Findings demonstrated, that across 50 studies, parent involvement was positively associated with academic achievement. Because adolescents are at a transitional time where they are making decisions about their futures, such as whether to seek employment or continue their education, parent and peer support is important. Consequently, research indicates both parents and peers as being important influences on adolescents' decisions to enroll in advanced classes, on their career decision making, and on their college expectations and attendance (Alliman-Brissett, Turner, & Skovholt, 2004; Berrios-Allison, 2005; Choi et al., 2008; Fletcher & Tienda, 2009; Muller & Ellison, 2001; Simmons, 2008). Taken together, the current study focused on adolescence because of these unique qualities.

Although there have been many studies addressing the benefits of parent involvement during adolescence, some studies have provided evidence for difference in the quality of involvement, or parental behavioral and psychological control (Barber, 1996, 2002; Gray & Steinberg, 1999). Parental behavioral control is defined as the regulation of children's behaviors to be in line with family or social norms, whereas parent psychological control reflects parental behaviors that stifle autonomy and disregard the emotional and psychological needs of children (Barber, 1996, 2002; Schaefer, 1965). Although these parents may appear to have high levels of involvement, the quality of involvement is such that it may be negatively impacting the development of the child. However, although some research has identified a decline in relational functioning between parents and adolescents, other studies have provided evidence for

stability for supportive involvement and declines in behavioral control (Barber et al., 2005). The current study examined parent involvement focusing on involvement behaviors, and not whether the involvement is perceived to be positive or negative by the child.

The Role of Context in Adolescent Development

While research has examined the direct impact of parent involvement on academic achievement, other characteristics of the family, as well as factors outside of the family, can lead involvement to be more or less effective. Bronfenbrenner's ecological systems theory (Bronfenbrenner, 1994) posits that the various contexts that individuals encounter throughout development play a role in their relationships and behaviors. The theory also suggests that changes, disruption, or conflict in one of the systems can disperse throughout the other systems. Thus, understanding adolescent adjustment and well-being, and the role of parent involvement in these matters, must be done by examining a combination of the systems.

For example, previous research demonstrated how the relationship between parent involvement and student performance is contingent on the ecological context, such as the school context, in which this association occurs (McNeal, 2015). This study found that those school contexts that were rich with resources moderated the association between parent involvement and achievement outcomes. Additionally, poverty played a role, in that students experiencing poverty have decreased achievement. Parent involvement helps, however, the social capital lost in poverty makes this context a less effective environment for the associations between parent involvement and student

achievement. The current study examined aspects of the micro (e.g., family, peers, school), exosystem (e.g., neighbors, community) and meso systems (e.g., connections). These systems were selected as they are the most directly impactful to the child and represent the complex social environments adolescents are in as well as how these contexts interact with one another. Specifically, the moderating roles of parent-adolescent relationship, teacher-adolescent relationship, social support, and community belonging, were evaluated.

Another theoretical lens utilized in the current study is social capital theory. Social capital is defined as the social structures or networks, and the resources linked or accrued by these ties with others, which facilitate action (Coleman, 1988; Portes, 2000). This theory identifies social capital as benefitting children's access to education and value development through their connections with others (e.g., family, community). Adolescents have connections with these social ties and incur social capital across various ecological systems. The current study examines social networks—parent-adolescent relationship quality, adolescent-teacher relationship (school context), and community belonging—and the social capital incurred across these ties, as moderators in the association between parent involvement and adolescent adjustment.

Parent-adolescent relationships. An important factor that may moderate the associations between parent involvement and academic achievement and motivation, socioemotional adjustment, and well-being, is the relationship between the adolescent and the parent. A number of studies have demonstrated positive associations between parent-adolescent relationship quality and developmental outcomes, such as lower rates

of distress and depression, higher rates of well-being, and decreased rates of delinquency (Ebber, Infurna, & Luther, 2018; Hair et al., 2008). However, during adolescence, the relationship between child and parent goes through changes, such that adolescents' maturational processes adjust the interactions between the child and the parent. For example, previous research has found there to be more intense conflict, less physical affection, and less time spent with parents during adolescence (Buhrmester & Furman, 1987; Hartup & Laurson, 1991; Larson et al., 1996; Laursen, Coy, & Collins, 1998; McGue et al., 2005). Furthermore, positive parenting, parental warmth, and relationship quality in general, tends to decrease during the adolescent years (Furman & Buhrmester, 1992; Loeber et al., 2000; McGue et al., 2005).

Previous research has also focused on parent-adolescent relationship quality as a moderating variable. For example, Manders and colleagues (2006) found evidence for the moderating role of mother- and father-adolescent relationship quality in the association between personality and internalizing behavior problems. Another study using parent-adolescent relationship quality as a moderator indicated negative parent-adolescent relationship quality or parent-adolescent distress, as strengthening the association between peer pressure and adolescent drug use (Farrell & White, 1998). The current study examined parent-adolescent relationship quality as a moderating variable between parent involvement and adolescent academic achievement and motivation, and socioemotional adjustment, as the way in which children perceive their relationship may have an impact on how they interpret their parents' involvement. It is expected that

parent-adolescent relationship quality will bolster the impact of parent involvement on adolescents' adjustment outcomes.

Sense of community belonging. Belongingness is indicated as a fundamental psychological need, and the experience of belonging and acceptance influences several dimensions of development (Connell & Wellborn, 1991; Deci et al., 1991; Osterman, 2000; Ryan, 1995). A review of research on children's experiences of community belonging found that those who feel that they belong and have a sense of relatedness perceive themselves as being more competent and autonomous, have higher levels of intrinsic motivation, and have more positive attitudes towards school (Osterman, 2000). A sense of community belonging has been demonstrated as an important predictor of adjustment from preschool through high school, with some research indicating middle school as a critical time where children benefit from feeling as though they belong (Osterman, 2000; Goodenow, 1993). Previous research examining belonging as a moderator found that belonging moderated the relationship between perceived stress and life satisfaction, such that feeling like one belongs bolstered life satisfaction and protected against heightened stress. Similarly, research demonstrated neighborhood belonging as a protective factor for adolescents' psychological well-being (Maurizi, 2013). Hence, these findings suggest that a sense of community belonging will strengthen the potential impact of parent involvement on adolescents' adjustment outcomes and/or serve as a protective factor for that those have low rates of parent involvement.

Other Social Relations. Previous research demonstrates the impact of parent involvement on adolescents' academic achievement, social-emotional development, and

well-being (Gecas & Schwalbe, 1986; Harris & Goodall, 2008; Jeynes, 2017). However, there are many entities that can play a role in adolescents' support systems or their social capital. Social support from peers, friends, family and relationships with teachers may contribute to the association between parent involvement and adolescent academic achievement and social-emotional skills. Research indicates that positive teacher-student relationships are associated with lower rates of depression and misconduct, as well as successful school adjustment and other positive school outcomes, such as achievement (Wang, Brinkworth, Eccles, 2013). Research has also found that general social support (e.g., receiving help from someone when one is sick) is predictive of adolescent well-being (Ronen, Hamama, Rosenbaum, & Mishley-Yarlap, 2014) and those with less social support experience poorer mental health (Rigby, 2000). In addition to direct effects, previous research has also found the construct of social support as a moderating variable. For example, attributes of adolescents' social networks and certain qualities of social support received from individuals within those networks, under certain circumstances, can lessen adolescents' experience of stress and in turn result in more positive outcomes (MacNeil et al., 2000). Thus, these supportive relationships may moderate the associations between parent involvement and adolescents' academic and socioemotional adjustment, such that they are expected to augment or create additive effects on the associations between parent involvement and adolescents' academic and socioemotional outcomes.

Beyond the family, peer, and community contexts. The current study was conducted during a major global event—the novel Coronavirus pandemic. The World

Health Organization officially declared the novel Coronavirus (COVID-19) outbreak a global pandemic on March 11, 2020, and shortly after, the United States declared a national emergency (World Health Organization, 2020). State and local governments immediately began to take measures to slow the spread of the virus, such as enforcing social-distancing and masking in public spaces, as well as taking even more serious measures such as mandating stay-at-home orders and lockdowns. Over 90% of the population was under some form of “stay-at-home” guidance by the end of April (Gearan & Sonmez, 2020), and a significant portion of working adults were no longer employed, were placed on leave, or had made arrangements to work from home. In addition, K-12 schools as well as most colleges had to shut-down completely for months, and eventually, many moved to virtual learning.

COVID-19 has had a substantial impact on nearly all individuals, and researchers are still working to understand the extent to which the pandemic context has played a role in adolescent development specifically. Most of the recent research in this area has examined the impact of COVID-19 on adolescent mental health (de Miranda et al., 2020; Deolmi & Pisani, 2020; Gupta & Nebhinani, 2020; Rogers, Ha, & Ockey, 2021; Zhang et al., 2020). Research conducted by Rogers et al., (2021) found that adolescents reported changes in perceived social support, increases in negative affect, and decreases in positive affect. Moreover, adolescents had greater rates of depressive and anxiety symptoms, and loneliness. In line with these findings, Deolmi and Pisani (2020) demonstrated early evidence for greater prevalence of anxiety and depression in children and adolescents, and urged researchers to develop new strategies for psychological

interventions that will reduce the impact of the COVID-19 pandemic on children. Some research has been published since the pandemic focusing on family variables such as household cohesion and conflict and parent-adolescent relationships. For example, Donker and colleagues (2020) found that there were decreases in support, positive parenting, and greater negative interactions between parents and adolescents throughout the onset of the COVID-19 pandemic. Further, research has documented increasing rates of family violence (Zhang, 2020).

The current study was undertaken during the global pandemic, which may have implications on the reported findings. Many day-to-day activities and behaviors have changed for both adolescents and their families during the COVID-19 pandemic. There were high rates of unemployment across the United States, and for families that were able to retain their employment, 13% of parents had to then quit or reduce their hours because of the lack of childcare during the COVID-19 stay-at-home orders (Ladge & Lincoln, 2020). Many families faced this childcare burden, with 11% of the workforce stating an inability to return to work until schools re-opened full time (Dingel, Patterson & Vavra, 2020). However, because of the substantial number of parents that lost employment or were placed on leave due to COVID-19, many parents were able to be home with their children during the collection of this data, and in turn, this may have given way for greater involvement in their children's lives.

Research on parent involvement during the pandemic focuses mostly on parent involvement in children's online learning. For instance, Lawrence and Clement (2021) found that parent involvement had a positive impact on adolescents' commitment to

online learning. Whereas, both Panaoura (2020) and Dong and colleagues (2020) identified significant challenges to parents' involvement in online learning. For example, many families expressed a lack of time and training (Dong et al., 2020) as well as difficulties in children's ability to complete online learning tasks and stay engaged with distance learning programs (Lau & Lee, 2021). Although the current study did not explicitly examine the impact of COVID-19 on parents' involvement or adolescents' outcomes, it is important to understand this overarching context when interpreting the findings reported within this manuscript.

Overview of the Present Study

The current study sought to examine the associations between parent involvement and adolescents' academic achievement and motivation, socioemotional adjustment, and well-being. The guiding conceptual framework demonstrates these associations and depicts adolescents nested within the micro-, meso-, and exo-systems (Figure 1). A cross-sectional design was used in the study, as a preliminary step in understanding mother vs. father involvement in adolescents' academic and socioemotional adjustment and identifying the role of various ecological contexts (e.g., community, teacher relationships, parent relationship quality, social support) that support adolescents' positive adjustment.

The current study utilizes ecological systems theory and social capital theory, both of which focus on the contextualized dimensions of social exchange and human development. Together, these theoretical perspectives provide a useful lens for examining how adolescents navigate education within the interconnected contexts of families, peers, schools, and communities. This study departed from prior work in three important ways.

First, this study was conducted during the global COVID-19 pandemic, which may have implications for parent involvement and adolescent adjustment. Second, the study explored whether there are differences in the rates of involvement among mothers and fathers. Much of the previous literature focuses solely on mother involvement or does not distinguish between mother and father involvement, whereas this study utilized adolescents' reports of both mother and father involvement and examined their impact on adolescent adjustment separately. Due to the previous literature on mother and father involvement and the uniqueness of the context in which data was collected, it is hypothesized that there will be a significant difference in the reported rates of mother and father involvement. Third, beyond examining parent involvement this study assessed the associations between other important contextual factors that may have an impact on adolescents' well-being (e.g., community belonging, parent-adolescent relationships, teacher-student relationships, social support). Extending prior work, it was hypothesized that mother and father parent involvement will positively contribute to adolescents' well-being, both academically and social-emotionally. In addition, it is hypothesized that the relationship between parent involvement and adolescents' academic and socioemotional adjustment will be moderated by factors such as parent-adolescent relationship quality, general social support, teacher-student relationship quality, and community belonging, such that greater levels of these variables will bolster the impact of those with low rates of parent involvement.

Research Questions

1. Are there differences in the rates of involvement among mothers and fathers?

2. Is involvement associated with adolescents' school and wellbeing outcomes?

Does mother vs. father involvement have differential implications for adolescents' outcomes?

3. Do contextual factors (e.g., parent relationship quality, teacher-adolescent relationship, community belonging, social support) moderate the associations between parent involvement and adolescent adjustment?

Method

Participants and Procedure

Participants consisted of adolescents ($N = 116$; 60 female and 56 male; mean age = 13.2) in middle school. Adolescents completed online questionnaires containing questions on general demographic information as well as measures examining parent-child relationship quality, perceived social support, academic and social emotional adjustment, and well-being. The sample size of $N = 116$ was supported by results from a power analysis. Analysis using a statistical power analysis software, *G*Power 3.1* revealed that a total of 109 participants are needed to detect a moderate effect size with 90% power and an alpha value of .05 in a linear regression model with interactions (Faul, Erdfelder, Lang, & Buchner, 2007).

Adolescents were recruited from two schools in Sweetwater School District in Chula Vista, California, a city in the San Diego and Tijuana, Mexico-US border region. The city is the second-largest in the San Diego metropolitan area, and is culturally, economically, and environmentally diverse. In Chula Vista there are a number of adolescents from Hispanic backgrounds and lower levels of socioeconomic status

compared to the United States in general. School district administrators (e.g., research director, principals) were contacted with information about the proposed study and asked if they would allow the researcher permission to conduct a study with families at the schools. The researcher attended virtual class sessions, at each school, to share the study opportunity with students and answer any questions about the study. To participate in the research, adolescents had to submit a completed parent consent form as well as a child participant assent form. The study required a one-time online questionnaire administered by the researcher via Qualtrics. Adolescents were provided personal Qualtrics questionnaire links if parent consent and child assent were completed, and they used these links to complete the questionnaire, which they were able to stop and come back to at any time. The questionnaires were open for two months, after which the personal link would no longer work. The online questionnaire took students approximately a half hour to complete. Participants were informed of their ability to withdraw and/or skip questions at any time without any negative consequences.

All participants' data were included in the following analyses however, the pattern of missing data was analyzed to ensure that the observed findings were not biased by missingness. First, a Missing Value Analysis was conducted in SPSS to examine the percentage of missing data for each study variable. The results revealed there was less than 10% of missing data for the study variables (range 3.4-8.6). Bennett (2001) suggests that missingness of less than 10% is unlikely to result in findings from subsequent statistical analyses being biased. To further understand the pattern of missingness, missing data analysis following Little's (1988) paradigm were conducted. The pattern of

missingness was evaluated using expectation maximization, which relies on a χ^2 test to assess missing completely at random (MCAR). MCAR is important because it demonstrates that the missingness is not related to the observed or to the unobserved data. Thus, the data can be considered a random sample of the total data when MCAR is reached. A nonsignificant χ^2 difference is indicative of MCAR. Results indicated that the data in this study were MCAR, $\chi^2 (75) = 55.21, p = 0.99$. In the event of missing data, pairwise deletion was used for all analyses.

Measures

Demographic information and socioeconomic status. Demographic information was provided by the adolescent, including age, gender, ethnicity, grade level, and socioeconomic status (see Appendix A and B). Socioeconomic status was assessed using a picture of a ladder in which adolescents selected where their family is in comparison to other families in their community (Adler et al., 2000; $M = 6.70, SD = 1.32$).

Parent involvement. Parent involvement was measured using the mean of two different scales that assessed parent involvement. The first parent involvement scale measured adolescents' perceptions of their parents' *general involvement* in their lives ($\alpha = 0.90$; Appendix C). Adolescents responded to 12 items (e.g., "My parent knows a lot about me," "My parent talks to me about my future,") by indicating the extent to which they agreed with each statement for each parent (1 = Strongly disagree to 4 = Strongly agree). The second parent involvement measure assessed a range of parents' involvement practices in adolescents' *learning endeavors* (Appendix, D; Chao, 2000; Cheung &

Pomerantz, 2011; Kerr & Sattin, 2000; Sattin & Kerr, 2000). Adolescents responded to 10 items (e.g., “My parents initiate a conversation with me about how my schoolwork is going,” “My parent tries to get to know the teachers at my school,”) by indicating the extent to which they agreed with each statement (1 = not at all true to 5 = very true) for each parent ($\alpha = 0.88$). The forthcoming analyses were first conducted with general parent involvement and parent involvement in children’s learning as distinct predictors, however, given the strong correlations between the two measures, the mean of all items from each measure were taken as a composite variable one for each parent (mother involvement, $\alpha = 0.93$, and father involvement, $\alpha = 0.95$) with higher numbers reflecting greater levels of parent involvement in children’s learning.

Parent-child relationship quality. Parent-child relationship quality was assessed using 15 items, answered for both mother and father relationship (Appendix E). This measure is adapted from the Network of Relationships Questionnaire (Furman & Buhrmester, 1985). Adolescents were asked to select the bubble under the statement that best described their relationship with their own mother/father. Example items include “How much do you and this parent get annoyed with each other’s behavior” and “How much do you play around and have fun with this parent?” An average of the items was created, with higher values representing greater levels of parent-child relationship quality (mother relationship quality $\alpha = 0.95$, father relationship quality $\alpha = 0.92$).

Teacher-student relationship. This measure was adapted from the Programme for International Student Assessment (Appendix F; PISA, 2012) and examined adolescents’ relationships with their teachers. Adolescents responded to the scale,

consisting of 10 items, by indicating how true the statement is from 0 = not at all true to 4 = very true. Example items include, “I get along well with most teachers.”, and “I feel my teachers give me enough opportunity to decide for myself how to do my schoolwork.” An average of the items was created, with higher values representing greater levels of teacher-student relationship quality ($\alpha = 0.85$).

Social support. The current study adapted the Multidimensional Scale of Perceived Social Support (Zimet, Dahlem, Zimet, & Farley, 1988) to assess adolescents’ perceived social support. The scale contains 12 items about social support such as, “I can talk about my problems with my friends.”, and “There is a special person who is around when I am in need.” Adolescents respond to these items by indicating how they feel about each statement on a scale from 1 = very strongly disagree to 7 = very strongly agree (Appendix G). A composite score was created, with greater scores indicating higher rates of social support ($\alpha = 0.92$).

Perceptions of community belonging. 11 items were utilized to measure adolescents’ perceptions of their community and belonging (Appendix H). Adolescents responded to how much they agree (1 = strongly disagree to 4 = strongly agree) with each statement (e.g., “I feel that I am an important member of my community,” and “I feel safe in my community”). A composite score was created, with higher numbers indicating greater perceived community belonging ($\alpha = 0.73$).

Parent-oriented motivation. To assess adolescents’ parent-oriented motivation in school, items adapted from the Social Approval and Responsibility Scales of Dowson and McInerney’s (2004) Goal Orientation and Learning Strategies Survey (GOALS-S)

were used (Appendix I). Adolescents indicated how true (1 = not at all true to 5 = very true) each of the 12 statements is of them (e.g., “I try to do well because I want my parents’ approval,” and “I try to do well to show my parents that I am being responsible”). All 12 items were combined, with higher numbers indicating greater parent-oriented motivation in school ($\alpha = 0.93$).

Social-emotional skills. To assess adolescents’ social-emotional skills, 32 items from the International Study of City Youth framework (ISCY; Lamb, Jackson & Rumberger, 2015) were used (Appendix J). These items represent several constructs—behavioral engagement (e.g., “Been absent without permission”—reverse scored), belonging (e.g., “I like being at school”), collaboration (e.g., “I work well in groups”), purpose (e.g., “School teaches me valuable skills”), self-efficacy (e.g., “I am confident of doing well in school”), self-control (e.g., “I tend to be lazy”—reverse scored), interest (e.g., “I get a feeling of satisfaction from what I do in class”), and conscientiousness (e.g., “I always try to do my best”). The mean of all items was used to create a general socioemotional skills variable, with higher scores indicating great socioemotional skills ($\alpha = 0.93$). In addition, guided by Pellegrino and Hilton’s (2012) framework, the variables were further broken down into three distinct domains—interpersonal skills ($\alpha = 0.87$), intrapersonal skills ($\alpha = 0.87$), and cognitive engagement ($\alpha = 0.88$).

Well-being. The Subjective Happiness Scale (Lyubomirsky & Lepper, 1999) was utilized to assess adolescents’ happiness (Appendix K). Adolescents respond to 4 items by selecting the point on the scale that is most appropriate in describing themselves. An example item is, “In general, I consider myself: not a very happy person 1-7 a very happy

person. A mean of the items was taken, with higher values representing greater levels of well-being ($\alpha = 0.86$).

Academic achievement. Adolescents were asked to self-report their grades in 4 academic subjects (math, social studies, science, and language arts; Appendix L). The grades were transformed into grade points (A = 4, B = 3, C = 2, D = 1, F = 0) and summed across the academic subjects.

Perceived Academic Competence. This 4-item scale adapted from Wigfield, Eccles, Mac Iver, Reuman, and Midgely (1991) assessed adolescents' perceived competence in 4 academic subjects (math, social studies, science, and language arts). Adolescents rated how well they performed in each subject compared to others by responding from 1 = a lot worse than others to 5 = a lot better than others (Appendix M). An average of these items was created, with greater values representing higher levels of perceived academic competence ($\alpha = 0.80$).

Results

Overview of Analyses

Three sets of analyses were conducted in the current research. First, a paired sample t-test was conducted in order to examine whether there are differences in the rates of parent involvement among mothers and fathers. Second, correlations were examined between mother and father involvement and adolescents' academic and socioemotional adjustment outcomes. The strength of these associations was then compared to determine whether mother vs. father involvement have differential implications for adolescents' outcomes. Third, a series of moderation analyses were tested to understand the contextual

factors contributing to the associations between parent involvement and adolescent adjustment. A model for mother involvement and father involvement were conducted for each moderation (i.e., teacher relationship, social support, community belonging, and parent-relationship quality) predicting each adolescent outcome (grades, perceptions of competence, parent-oriented motivation, well-being, and socioemotional skills), for a total of 20 regression models for each parent. Because several regression models were conducted to examine the moderation of specific contexts on the relationship between mother and father involvement and adolescent academic and socioemotional adjustment, the need for the adjustment of the p-value was considered. Specifically, Bonferonni adjustment was considered, which directly targets Type 1 error. However, Bonferonni adjusts Type 1 error at the expense of Type 2 error such that it severely reduces power to detect an effect (Gelman et al., 2012). Researchers have argued both in favor of and against the use of Bonferonni adjustment method (Moyé, 1998; Ottenbacher, 1998; Perneger, 1998; Rothman, 1990). After review of the literature on Bonferroni adjustment, it was concluded that, because the current research was interested in the exact p values for each individual regression test (Armstrong, 2014), to distinguish differences in moderating contextual factors with specific dependent variables, that Bonferroni adjustment was not appropriate. Descriptive statistics and intercorrelations among all study variables were examined; Table 1 displays correlations, means, and standard deviations among parent involvement and adolescents' adjustment outcomes, and Table 2 displays the correlations, means, and standard deviations among parent involvement and contextual variables.

Mean-Level Differences between Mother and Father Involvement

Differences in mother and father involvement was examined utilizing a paired sample t-test. Results demonstrated a significant difference in the rates of parent involvement among mothers and fathers, such that mothers have higher rates of involvement compared to fathers, $t(106) = 4.86, p < .001$. This was true for both academic (mother involvement, $M = 3.86, SD = 0.83$; father involvement, $M = 3.39, SD = 1.07$) and non-academic involvement (mother involvement, $M = 3.14, SD = 0.55$; father involvement, $M = 2.86, SD = 0.71$). Figure 2 displays the differences between mother and father involvement.

Associations between Parent Involvement and Adolescents' Outcomes

Correlations revealed moderate to strong, positive correlations among mother involvement and adolescents' perceptions of competence, socioemotional skills, and well-being (r 's = 0.24-0.48, p 's < .05). There were not significant correlations between mother involvement and adolescents' grades or reported parent-oriented motivation (r 's = 0.07, p 's > .05). Results demonstrated moderate correlations between father involvement and socioemotional skills and well-being (r 's = 0.23-0.42, p 's < .05). There were no significant correlations among father involvement and grades, perceptions of competence, and parent-oriented motivation (r 's = 0.05-0.10, p 's > .05). To test whether mother vs. father involvement have differential implications for adolescents' outcomes, a z-score was obtained, and the p-value was found to compare the correlations from dependent samples. There were no significant differences found among the strength of

the associations between mother vs. father and adolescents' outcomes (z 's < 1.01 , p 's $> .05$).

The Moderating Role of Contextual Factors

Separate regression analyses for mother involvement and father involvement were conducted to evaluate the moderating roles of context (e.g., parent-adolescent relationship quality, teacher-adolescent relationship, social support, and community belonging) in the associations between parent involvement and adolescent adjustment outcomes demonstrated in Table 2. In each model, adolescents' gender and socioeconomic status were included as statistical controls. Mean-centered predictors were used to create interaction terms. In the first block of the regression model, the main effects of parent involvement (separate models for mother and father involvement) and adolescent outcomes—grades, perceptions of competence, socioemotional skills, parent-oriented motivation, and well-being—were assessed, as well as control variables—gender and socioeconomic status. Next, the 2-way interaction between parent involvement and contextual variables—parent-adolescent relationship quality, teacher-adolescent relationship, social support, and community belonging—were examined.

The resulting pattern of findings indicated only parent adolescent relationship quality and community belonging to be moderating factors in the associations between parent involvement—both mother and father—and adolescent adjustment (β 's < 0.43 , p 's $< .05$). The other contextual variables assessed in the current research – teacher-adolescent relationship quality and social support – did not moderate the associations between parent involvement and adolescent adjustment (β 's < 0.17 , p 's $> .05$).

Community belonging. Findings demonstrated no significant main effect of parent involvement or community belonging on self-reported grades. However, when including community belonging as a moderating variable, there was a significant moderation in the association between father involvement and grades (Table 3; $\beta = 0.24$, $p = .04$). Examination of the interaction plot showed that grades are highest for adolescents with high father involvement and greater community belonging, and lowest for adolescents with low community belonging and low father involvement (see Figure 3). Simple slopes analysis was also tested at one standard deviation above and below the mean. Results demonstrated that only when community involvement is high (one standard deviation above the mean), there is a positive relationship between father involvement and grades ($t = 2.14$, $p = 0.04$). Similarly, there was a trending moderation found for mother parent relationship quality (Table 4; $\beta = 0.22$, $p = 0.06$), such that grades are highest for adolescents with high mother involvement and greater community belonging, and lowest for adolescents with low community belonging and low mother involvement (see Figure 4). Further, simple slopes analysis was tested at one standard deviation above and below the mean. Findings indicate that there is no significant effect of mother involvement and grades, even when community involvement is high, at one standard deviation above the mean ($t = 1.76$, $p = 0.08$).

Parent-adolescent relationship quality. There was no significant main effect found for parent involvement on socioemotional skills (Table 5; $\beta_s < 0.21$, $p_s > .11$). There was a significant main effect of father parent relationship quality and mother relationship quality on adolescent socioemotional skills ($\beta_s > 0.43$, $p_s < .001$). When

parent-adolescent relationship quality was included as a moderating variable, there was a significant moderation in the association between parent involvement, both for mother and father involvement, and adolescent socioemotional skills (Table 6; β s > 0.27, ps < .01). Examination of the interaction plots showed that socioemotional skills are highest for adolescents with involved fathers and mothers and greater parent relationship quality, and socioemotional skills are lowest for adolescents with high father and mother involvement but low parent relationship quality (see Figures 5 and 6). Simple slopes analysis was conducted at one standard deviation above and below the mean. Results indicated that only when parent relationship quality is high, at one standard deviation above the mean, there is a positive relationship between parent involvement and socioemotional skills ($t = 2.45, p < 0.05$).

Similar moderation models were conducted with the each of the three domains of socioemotional skills—interpersonal skills, intrapersonal skills, and cognitive engagement. Results demonstrated parent relationship quality as a significant moderating variable between parent involvement and adolescents' interpersonal skills, intrapersonal skills, and cognitive engagement, and this was found for both mother and father involvement (β s > 0.20, ps < .05). The interaction plots showed the same pattern of results.

Discussion

The current research examined the role of parent involvement amid the COVID-19 pandemic in adolescents' academic achievement, socioemotional skills, and well-being. In addition, the extent to which contextual factors such as community belonging,

and parent-adolescent relationship quality moderated the implications of parent involvement was examined. Results indicated that there were differences between the rates of mothers' and fathers' involvement, but the associations between involvement and adolescents' academic and socioemotional adjustment were comparable among mothers and fathers. There were also moderating effects found for contextual variables—community belonging and parent-adolescent relationship quality—in the associations between parent involvement and adolescent adjustment. In general, stronger associations between parent involvement and adolescent outcomes were found when adolescents felt connected to their community and parents.

Rates of Involvement Among Mothers and Fathers

Based on previous research, it was anticipated that there would be a significant difference between the levels of mother vs. father parent involvement. Consistent with the hypothesis, results suggest that compared to fathers, mothers have higher rates of parent involvement, encompassing both parent involvement in children's learning and parent involvement in children's lives more generally. The literature on mother vs. father involvement has had mixed findings, identifying father's being less involved in specific caretaking activities compared to mothers (Baxter et al., 2007; Foster et al., 2016; Keown & Palmer, 2014). Consistent with the extant literature, the current findings demonstrate that although fathers are reported as being involved, the rates of involvement were significantly higher for mothers compared to fathers. Rates of mother involvement may have been heightened due to the context in which the data was collected, during COVID-19 stay-at-home orders. Many employment industries were hard hit, with unemployment

rates above fourteen percent, which was the highest rate since 1948 (Falk et al., 2021).

Although mothers and fathers may share the responsibility of helping to supervise children and their online learning, industries employing a greater number of female employees (e.g., child care, education, hospitality) had larger employment losses (Kochhar & Bennett, 2021). Thus, the higher rates of involvement seen amongst mothers may be because they were in the home with the child more often than fathers. Policy makers should consider family programs that incorporate flexible work hours and greater paid family leave to make available the time for parents to be more involved. Future work should examine the amount of time that mothers and fathers each spend in the home and whether that has changed due to factors associated with COVID-19, such as lay-offs, safety, school closures, and caregiving duties.

Mother and Father Involvement and Adolescents' Outcomes

Contrary to hypotheses, parent involvement was not associated with all academic and socioemotional adjustment outcomes (grades, perceptions of competence, socioemotional skills, well-being, and parent-oriented motivation). The patterns of results showed that both mother and father involvement were associated with adolescents' socioemotional skills and well-being, and only mother involvement was associated with adolescents' perceptions of competence. In contrast, no associations were found between parent involvement and adolescents' grades or parent-oriented motivation. These findings should be interpreted with the current context in mind, the COVID-19 pandemic. Adolescents were likely spending almost all of their time at home with their parent(s) because of the stay-at-home orders, and as such, may have had a harder time learning at

home and working on academic work with their parents. This highlights the need to understand how the COVID-19 pandemic and stay-at-home orders have played a role in adolescents' academic motivation and achievement in addition to their mental health and well-being. The associations between mother and father involvement and adolescents' academic and socioemotional adjustment were similar. The extant body of research on involvement and adolescents' academic and socioemotional adjustment focuses primarily on mothers. This is an important finding as it highlights the significance of involvement more generally, not just as mothers' involvement, and therefore, future work would benefit from identifying whether involvement from other caregivers is similarly beneficial. In sum, the patterns of findings indicate that although there are differences in the rates of parent involvement among mothers and fathers, the impact of their involvement is similar for adolescents' adjustment.

The Moderating Role of Context

Several contextual factors (e.g., parent relationship quality, teacher-adolescent relationship, community belonging, social support) were examined as moderating variables in the associations between parent involvement and adolescent academic achievement, perceptions of competence, parent-oriented motivation, socioemotional skills, and well-being. Ecological systems theory posits that the various contexts encountered throughout development play a role in an individual's relationships and behaviors (Bronfenbrenner, 1994). The theory also suggests that the experiences incurred across different ecological contexts can create change in one of the systems and in turn, disperse throughout the other systems. Thus, it was expected that contextual variables—

social support, teacher-adolescent relationships, community belonging, and parent relationship quality—would moderate the relations between parent involvement and adolescent academic and socioemotional adjustment.

This hypothesis was only partially supported. Contrary to expectations, teacher-adolescent relationships did not moderate the associations between parent involvement and adolescent adjustment. Previous research focusing on teacher-child relationships has demonstrated positive associations with a number of positive outcomes. For instance, strong and supportive teacher-child relationships allow students to feel safe at school, more competent, have greater peer interactions, and positively impacts psycho-social well-being and academic achievement and motivation (Fredriksen & Rhodes; Hamre & Pianta, 2006). Similarly, social support did not moderate the associations between parent involvement and adolescent academic achievement and socioemotional adjustment. Prior work has also found that social support from peers and family, to have a positive implications for adolescents' adjustment (East, Hess, & Lerner, 1987; Garner & Cutrona, 2004; Levitt et al., 2005). One condition that may explain these findings is that, because of the COVID-19 pandemic, schools were not being conducted in-person, and had not been the entire 2020-2021 academic year. Herein, adolescents may have not fostered relationships with their teachers, peers, or even family (both positively or negatively), as they had been before the stay-at-home orders. For example, adolescents were unable to spend one-on-one time in the same manner as they do in a physical classroom when classes were held in session, and peers and family were not able to have get-togethers as they once did. Further, there were no team sports or extracurricular activities taking

place, or casual drop-ins from family. Thus, it is likely that teacher-adolescent relationships and social support stayed at a baseline that did not reflect what may have been seen in a typical year.

Although teacher-adolescent relationships and social support did not moderate the associations between parent involvement and adolescent academic and socioemotional adjustment, community belonging and parent-adolescent relationship quality did. The interactions showed that grades were highest for adolescents with high father and mother involvement and greater levels of community belonging, and lowest for adolescents with low community belonging and low parent involvement. Feeling like one belongs in the community strengthened the positive impact of parent involvement on adolescents' grades, which is in line with previous research demonstrating that feeling a sense of belonging allows for youth to feel safer, contributes to adolescents' perceptions of competence and achievement, and increases social well-being (Cicognani, Zani & Albanesi, 2012; Colette & Warren, 2017; Pittman & Richmond, 2007). In contrast, if one experiences low rates of community belonging, they may feel the need to focus more of their attention on belonging and social relationships rather than their academic endeavors. Further, parent involvement and community belonging did not directly predict adolescents' grades, which is not in line with previous research (Hill & Tyson; Osterman, 2000). Although initially surprising, this finding may be interpreted using Bronfenbrenner's ecological systems theory, to the extent that experiences are proposed to be incurred across different ecological contexts, the additive effect of involvement and community belonging bolstered adolescents' grades. Future work would benefit from

examining the contrast between the impact of community belonging compared to school belong. Additionally, research should shed light on whether community belonging was of higher importance during COVID-19 than prior to the pandemic, as adolescents and families were spending more time at home and in their communities (e.g., going for walks, waving to neighbors, attending “drive by” parties, grocery shopping) due to stay-at-home orders that were in place during the 2020-2021 academic year.

Another variable found to moderate the associations between parent involvement and adolescent adjustment, specifically socioemotional skills, was parent-adolescent relationship quality. A number of studies have found positive associations between parent-adolescent relationship quality and developmental outcomes, such as lower rates of depression, higher rates of well-being, and greater psychosocial adjustment (Ebber, Infurna, & Luther, 2018; Hair et al., 2008). Though there are positive benefits of parent-adolescent relationships, past literature has identified adolescence as a time where there is intense conflict, less physical affection, and less time is spent with parents (Buhrmester & Furman, 1987; Hartup & Laurson, 1991; Larson et al., 1996; Laursen et al., 1998; McGue et al., 2005). Analyses revealed no direct impact of parent involvement on adolescents’ socioemotional skill development, but there was a direct effect of parent relationship quality (mother and father) on adolescents’ socioemotional skills. Further, results showed that socioemotional skills were highest for adolescents with involved fathers and mothers and greater parent relationship quality, and socioemotional skills were lowest for adolescents with high father and mother involvement but low parent relationship quality. Interestingly, having high parent relationship quality displayed unique importance to

adolescents' socioemotional skills. Although having high parent involvement has been indicated as being beneficial to children's achievement, well-being, and overall adjustment (Gecas & Schwalbe, 1986; Harris & Goodall, 2008; Jeynes, 2007; Pomerantz et al., 2012), research also has found that parent over-involvement may be viewed as controlling, particularly during adolescence when children typically desire more autonomy from parents (Doan et al., 2017; Lareau, 2019). Conversely, if one has a good relationship with their parent, involvement may not be needed, to develop socioemotional skills as adolescents' close bond with parents may be influencing their interpersonal relationships with others and their socioemotional behaviors (e.g., leadership, conscientiousness).

Theoretical and Practical Implications of the Current Research

This study is one of few to distinguish the unique contributions of mother and father involvement simultaneously to adolescents' academic and socioemotional adjustment while also considering influences across various ecological contexts. Findings provide evidence for the importance of involvement, beyond typically acknowledged mother involvement, and in turn, has important implications for future work. While previous research acknowledges the positive impact of mother or combined parent involvement for adolescents' academic achievement and motivation, socioemotional skills, and well-being (Gecas & Schwalbe, 1986; Harris & Goodall, 2008; Jeynes, 2007; Pomerantz et al., 2012), the present study provides evidence for the comparable contributions to adolescents' adjustment among mothers and fathers. As such, these findings highlight that other caregivers in the family, such as grandparents, aunts, and

uncles, may provide similar benefits to adolescents through their involvement. Future research examining others' involvement and adolescents' academic and socioemotional adjustment is needed.

The current study also added to the literature on parent involvement that looks at this construct as multidimensional. Involvement in children's lives generally and in children's learning endeavors were first examined separately, however, patterns in adolescents' adjustment were consistent across the two dimensions. Thus, the dimensions were combined into a single measure to represent involvement. This points to the dimensionality of parent involvement as evidenced in seminal frameworks of parent involvement (Grolnick & Slowiack, 1994; Epstein, 2001), such that parents make contributions to children's development through their behavioral, personal, and intellectual involvement.

Practically, findings from the current research highlight the importance of parent involvement in adolescent development, and the need for programs supporting families to be involved. Recently, the significance of family involvement on children's development has caught the attention of legislatures. For example, President Biden, put forth the American Families Plan in April, 2021 (The White House Briefing Room, 2021), which proposes to invest in families by making child care more affordable, extending paid family leave, and providing tax cuts for families. In addition, Congressman Mark Takano proposed the Thirty-Two Hour Workweek Act, which pilot programs run by governments and businesses suggest would benefit families by supporting better work-life balance, lowering child care expenses, and having more time to be involved with children

(Abbasi, 2021). Policies such as these are critical to ensure that parents have the ability to be involved in their children's lives.

Limitations and Future Directions

Several limitations are warranted in the interpretation of the findings presented in the current investigation. First, all of the measures assessed in the current analyses were self-reported by adolescents. Because adolescents are completing the survey not within the presence of the researcher, there are many different distractions that the adolescent may encounter. For example, the questionnaires were completed by adolescents online, and they could be using their phones, computers, or someone else's device while also participating in other activities such as online shopping, gaming, and instant messaging. Additionally, because this study was conducted during the COVID-19 pandemic, all students were in the virtual school-context, meaning they were not attending class in person. In turn, they may have been experiencing burnout for online activities, and/or extremely lower or higher than typical responses on these self-report measures as the pandemic impacted adolescents' mental health and well-being (de Miranda et al., 2020; Deolmi & Pisani, 2020; Gupta & Nebhinani, 2020; Rogers, Ha, & Ockey, 2021; Zhang et al., 2020). Future research would benefit from examining these interaction models via different informants (e.g., obtain parents' self-reported involvement) and within the typical school context.

Second, the current research utilized a cross-sectional design to provide an initial analysis of the associations between parent-involvement and adolescents' academic and socioemotional adjustment, as well as the contextual interactions. Thus, it is unclear if

parent involvement actually leads adolescents to experience heightened levels of adjustment in this study. A plethora of research has demonstrated longitudinal associations between parent involvement and the adolescent outcome variables tested in current study (Cokston & Finlay, 2006; LeFevre. & Shaw, 2013; Reynolds & Ou, 2004), however, there have been few longitudinal studies focusing on both mothers and fathers. Longitudinal research focusing on both parents could be a valuable avenue for future work.

Third, the sample of adolescents consisted of youth in the city of Chula Vista, California, a city in the San Diego and Tijuana, Mexico border region, and may not be representative of the general population in the United States. In these cities and those surrounding, there are a greater number of adolescents from Hispanic backgrounds and lower levels of socioeconomic status compared to the United States in general. The low levels of socioeconomic status could influence children's academic and socioemotional outcomes (e.g., adolescents from affluent communities may have higher academic achievement and more positive socioemotional outcomes). Similarly, previous research indicates that parents from higher socioeconomic backgrounds have greater rates of involvement (Eagle, 1989; Benner, Boyle, & Sadler, 2016). The current study examined socioeconomic status as a covariate in all models; for about half of the models there was a main effect of socioeconomic status. Future research would benefit from examining the associations between parent involvement and adolescents' academic achievement—considering various ecological contexts as moderating variables—and socioemotional adjustment in a more diverse sample.

Finally, the unique nature of the context in which the data collection took place, during the global COVID-19 pandemic, may play a significant role in the interpretation of the current findings. Even though parent involvement of both mothers and fathers was assessed, it is unclear which parent was available and at home and whether that was the same prior to the pandemic. In addition, the present study did not directly measure the impact of COVID-19 on adolescents themselves or their parents' involvement. Qualitative follow-up with adolescents would be important to distinguish differences in adolescents' lives and their parents' involvement before as well as during the pandemic. Future research would benefit from including questions directly focused on the impact of the COVID-19 pandemic on adolescent's academic and socioemotional adjustment, and the nature of their parents' involvement.

Conclusion

The current research examined the associations between parent involvement and adolescents' academic achievement and motivation, socioemotional adjustment, and well-being. Although the implications of parent involvement for adolescents' functioning are consistent across mothers and fathers, the sheer amount of involvement is different, such that mothers had higher rates of involvement compared to fathers. Notably, other ecological context variables such as community belonging and parent-adolescent relationship quality bolstered the associations between parent-involvement and adolescents' outcomes. Thus, while parent involvement generally plays a positive role in adolescent outcomes, other contexts can reinforce these contributions to adolescents' academic and socioemotional adjustment.

References

- Abbasi, L. (2021, July 27). *Rep. Takano introduces legislation to reduce the standard workweek to 32 hours*. <https://takano.house.gov/newsroom/press-releases/rep-takano-introduces-legislation-to-reduce-the-standard-workweek-to-32-hours>
- Adler, N. E., Epel, E. S., Castellazzo, G., & Ickovics, J. R. (2000). Relationship of subjective and objective social status with psychological and physiological functioning: Preliminary data in healthy, White women. *Health Psychology, 19*(6), 586–592. doi:10.1037/0278-6133.19.6.586
- Alliman-Brisset, A. E., Turner, S. L., & Skovholt, T. M. (2004). Parent support and African American adolescents' career self-efficacy. *Professional School Counseling, 7*, 124–132. doi:10.1037/e345542004-001
- Amato, P.R., & Riviera, F. (1999). Paternal involvement and children's behavior problems. *Journal of Marriage and the Family, 61*, 375–384. doi: 10.2307/353755
- Armstrong, R. A. (2014). When to use the Bonferroni correction. *Ophthalmic and Physiological Optics, 34*(5), 502-508. doi: 10.1111/opo.12131
- Baker, D. P., & Stevenson, D. L. (1986). Mothers' strategies for children's school achievement: Managing the transition to high school. *Sociology of education, 156*-166. doi:10.2307/2112340
- Barber, B. K. (1996). Parental psychological control: Revisiting a neglected construct. *Child development, 67*(6), 3296-3319. doi: 10.2307/1131780
- Barber, B. K. (2002). *Intrusive Parenting: How Psychological Control Affects Children and Adolescents*. Washington, D.C.: American Psychological Association Press.
- Barber, B. K., Maughan, S. L., & Olsen, J. A. (2005). Patterns of parenting across adolescence. *New directions for child and adolescent development, 2005*(108), 5-16. doi: 10.1002/cd.124
- Baxter, J., Gray, M., Alexander, M., Strazdins, L., & Bittman, M. (2007). *Mothers and fathers with young children: Paid employment, caring and wellbeing* (Social Policy Research Paper No. 30). Canberra: Department of Families, Community Services and Indigenous Affairs.
- Benner, A. D., Boyle, A. E., & Sadler, S. (2016). Parental involvement and adolescents' educational success: The roles of prior achievement and socioeconomic status. *Journal of youth and adolescence, 45*(6), 1053-1064. doi:10.1007/s10964-016-0431-4

- Bennett, D. A. (2001). How can I deal with missing data in my study?. *Australian and New Zealand journal of public health*, 25(5), 464-469. doi: 10.1111/j.1467-842X.2001.tb00294.x
- Berrios-Allison, A. C. (2005). Family influences on college students' occupational identity. *Journal of Career Assessment*, 13, 233–247. doi: 10.1177/1069072704270320
- Boston, C., & Warren, S. R. (2017). The Effects of Belonging and Racial Identity on Urban African American High School Students' Achievement. *Journal of Urban Learning, Teaching, and Research*, 13, 26-33. doi:10.4018/978-1-7998-8547-4.ch061
- Bronfenbrenner, U. (1994). Ecological models of human development. *Readings on the development of children*, 2(1), 37-43. doi:10.1037/10518-046
- Buhrmester, D., & Furman, W. (1987). The development of companionship and intimacy. *Child Development*, 58, 1101–1113. doi:10.2307/1130550
- Carlson, M. J. (2006). Family structure, father involvement, and adolescent behavioral outcomes. *Journal of marriage and family*, 68(1), 137-154. doi: 10.1111/j.1741-3737.2006.00239.x
- Castro, M., Expósito-Casas, E., López-Martín, E., Lizasoain, L., Navarro-Asencio, E., & Gaviria, J. L. (2015). Parental involvement on student academic achievement: A meta-analysis. *Educational research review*, 14, 33-46. doi:10.1016/j.edurev.2015.01.002
- Catsambis, S. (2001). Expanding knowledge of parental involvement in children's secondary education: Connections with high school seniors' academic success. *Social Psychology of Education*, 5, 149–177. doi:10.1023/A:1014478001512
- Chao, R. K. , Kanatsu, A., Stanoff, N., Padmawidjaja, I., & Aque, C. (2009). *Diversities in meaning and practice: The parental involvement of Asian immigrants*. In: Hill, N. E., Chao, R. K., (Eds.). *Families, schools, and the adolescent: Connecting research, policy, and practice* (pp. 110–125). Teachers College Press: New York.
- Chao, R. K. (2000). The parenting of immigrant Chinese and European American mothers: Relations between parenting styles, socialization goals, and parental practices. *Journal of Applied Developmental Psychology*, 21, 233–248. doi: 10.1016/S0193-3973(99)00037-4

- Cheung, C. S. (2019). Parents' involvement and adolescents' school adjustment: Teacher–student relationships as a mechanism of change. *School Psychology, 34*(4), 350. doi: 10.1037/spq0000288
- Cheung, C. S. S., & Pomerantz, E. M. (2011). Parents' involvement in children's learning in the United States and China: Implications for children's academic and emotional adjustment. *Child development, 82*(3), 932-950. doi:10.1111/j.1467-8624.2011.01582.x
- Cheung, C. S. S., & Pomerantz, E. M. (2012). Why does parents' involvement enhance children's achievement? The role of parent-oriented motivation. *Journal of Educational Psychology, 104*(3), 820-832. doi: 10.1037/a0027183
- Choi, N., Chang, M., Kim, S., & Reio Jr, T. G. (2015). A structural model of parent involvement with demographic and academic variables. *Psychology in the Schools, 52*(2), 154-167. doi:10.1002/pits.21813
- Christenson, S., & Sheridan, S. M. (Eds.). (2001). *Schools and families: Creating essential connections for learning*. Guilford Press.
- Cicognani, E., Zani, B., & Albanesi, C. (2008). Sense of community in adolescence. *Global Journal of Community Psychology Practice, 3*(4), 118-25.
- Coleman, J. (1988). Social capital in the creation of human capital. *American Journal of Sociology 94*: S95-S120. doi: 10.1086/228943
- Connell, J. P., & Wellborn, J. G. (1991). *Competence, autonomy, and relatedness: A motivational analysis of self-system processes*. In Gunnar, M. R., & Sroufe, L. A. (Eds.), *Self processes and development* (Vol. 23). Hillsdale, N.J.: Lawrence Erlbaum.
- Cookston, J. T., & Finlay, A. K. (2006). Father Involvement and Adolescent Adjustment: Longitudinal Findings from Add Health. *Fathering: A Journal of Theory, Research & Practice about Men as Fathers, 4*(2). doi:10.3149/fth.0402.137
- Cripps, K., & Zyromski, B. (2009). Adolescents' psychological well-being and perceived parental involvement: Implications for parental involvement in middle schools. *Research in Middle Level Education Online, 33*(4), 1-13. doi:10.1080/19404476.2009.11462067
- de Miranda, D. M., da Silva Athanasio, B., de Sena Oliveira, A. C., & Silva, A. C. S. (2020). How is COVID-19 pandemic impacting mental health of children and adolescents?. *International Journal of Disaster Risk Reduction, 101*-845. doi:10.1016/j.ijdr.2020.101845

- Dearing, E., Kreider, H., Simpkins, S., & Weiss, H. B. (2006). Family involvement in school and low-income children's literacy: Longitudinal associations between and within families. *Journal of Educational Psychology*, 98(4), 653. Doi: 10.1037/0022-0663.98.4.653
- Deci, E. L., Vallerand, R. J., Pelletier, L. G., & Ryan, R. M. (1991). Motivation and education: The self-determination perspective. *Educational Psychologist*, 26(3 & 4), 325-346. doi:10.1080/00461520.1991.9653137
- Deming, D. J. (2017). The growing importance of social skills in the labor market. *The Quarterly Journal of Economics*, 132(4), 1593-1640. doi:10.1093/qje/qjx022
- Deolmi, M., & Pisani, F. (2020). Psychological and psychiatric impact of COVID-19 pandemic among children and adolescents. *Acta Bio Medica: Atenei Parmensis*, 91(4). doi:10.23750/abm.v91i4.10870
- Dingel, J. I., Patterson, C., & Vavra, J. (2020). Childcare Obligations Will Constrain Many Workers When Reopening the US Economy. *Political Economy – Development: Health eJournal*, 20-46. doi:10.2139/ssrn.3579711
- Doan, S. N., Tardif, T., Miller, A., Olson, S., Kessler, D., Felt, B., & Wang, L. (2017). Consequences of ‘tiger’parenting: A cross-cultural study of maternal psychological control and children's cortisol stress response. *Developmental Science*, 20(3), e12404. Doi:10.1111/desc.12404
- Dong, C., Cao, S., & Li, H. (2020). Young children’s online learning during COVID-19 pandemic: Chinese parents’ beliefs and attitudes. *Children and youth services review*, 118, 105-440. doi:10.1016/j.childyouth.2020.105440
- Donker, M. H., Mastrotheodoros, S., & Branje, S. (2020). Development of parent-adolescent relationships during the COVID-19 pandemic: The role of stress and coping. *PsyArXiv* (pre-print). doi:10.31234/osf.io/urmt9
- Dowson, M., & McInerney, D. M. (2004). The development and validation of the Goal Orientation and Learning Strategies Survey (GOALS-S). *Educational and psychological measurement*, 64(2), 290-310. doi:10.1177/0013164403251335
- Eagle, E. (1989). *Socioeconomic status, family structure, and parental involvement: The correlates of achievement*. Paper presented at the Annual Meeting of the American Educational Research Association. (ERIC Document Reproduction Service No.: ED 307- 332)

- East, P. L., Hess, L. E., & Lerner, R. M. (1987). Peer social support and adjustment of early adolescent peer groups. *The Journal of Early Adolescence*, 7(2), 153-163. doi:10.1177/0272431687072003
- Ebbert, A. M., Infurna, F. J., & Luthar, S. S. (2019). Mapping developmental changes in perceived parent–adolescent relationship quality throughout middle school and high school. *Development and psychopathology*, 31(4), 1541-1556. doi:10.1017/S0954579418001219
- Eccles, J. S., & Wigfield, A. (2002). Motivational beliefs, values, and goals. *Annual review of psychology*, 53(1), 109-132. doi:10.1146/annurev.psych.53.100901.135153
- 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(3), 988-1005. doi:10.1111/j.1467-8624.2010.01447.x
- Epstein, J. L. (1995). School/family/community partnerships: Caring for the children we share. *Phi Delta Kappan*, 92(3), 81-96. doi:10.1177/003172171009200326
- Epstein, J. L. (2001). *School and family partnerships: Preparing educators and improving schools*. Boulder, CO: Westview.
- Fact Sheet: The American Families Plan*. (2021, April 28). The White House Briefing Room. Retrieved August 14, 2021, from <https://www.whitehouse.gov/briefing-room/statements-releases/2021/04/28/fact-sheet-the-american-families-plan/>
- Falk, Romero, Carter, A., Nicchitta, A., & Nyhof, C. (June, 20221). Unemployment rates during the COVID-19 pandemic. *Congressional Research Service*, R46554, 1-23.
- Fan, W., & Williams, C. M. (2010). The effects of parental involvement on students’ academic self-efficacy, engagement and intrinsic motivation. *Educational Psychology*, 30, 53 – 74. doi:10.1080/01443410903353302
- Fan, X., & Chen, M. (2001). Parental involvement and students’ academic achievement: A meta-analysis. *Educational Psychology Review*, 13(1), 1 – 22. doi:<https://doi.org/10.1023/A:1009048817385>
- Farrell, A. D., & White, K. S. (1998). Peer influences and drug use among urban adolescents: Family structure and parent–adolescent relationship as protective factors. *Journal of consulting and clinical psychology*, 66(2), 248-258. doi: 10.1037/0022-006X.66.2.248

- Fletcher, J., Tienda, M. (2009). High school classmates and college success. *Sociology of Education*, 82(4), 287–314. doi:10.1177/003804070908200401
- Flouri, E., & Buchanan, A. (2003). The role of father involvement and mother involvement in adolescents' psychological well-being. *British Journal of Social Work*, 33(3), 399-406. doi: 10.1093/bjsw/33.3.399
- Flouri, E., & Buchanan, A. (2004). Early father's and mother's involvement and child's later educational outcomes. *British Journal of Educational Psychology*, 74(2), 141–153. <https://doi.org/10.1348/000709904773839806>
- Foster, T. D., Froyen, L. C., Skibbe, L. E., Bowles, R. P., and Decker, K. B. (2016). Fathers' and mothers' home learning environments and children's early academic outcomes. *Reading and Writing*, 29, 1845–1863. doi:10.1007/s11145-016-9655-7
- Fredriksen, K., & Rhodes, J. (2004). The role of teacher relationships in the lives of students. *New directions for youth development*, 4(103), 45-54. doi:10.1002/yd.90
- Friedel, J. M., Cortina, K. S., Turner, J. C., & Midgley, C. (2010). Changes in efficacy beliefs in mathematics across the transition to middle school: Examining the effects of perceived teacher and parent goal emphases. *Journal of Educational Psychology*, 102, 102 – 114. doi:10.1037/a0017590
- Furman W, & Buhrmester D. (1992). Age and sex differences in perceptions of networks of personal relationships. *Child Development*, 63, 103–115. doi: 10.1111/j.1467-8624.1992.tb03599.x.
- Furman, W., & Buhrmester, D. (1985). Children's perceptions of the personal relationships in their social networks. *Developmental Psychology*, 21, 1016–1022. doi:10.1037/0012-1649.21.6.1016
- Gardner, K. A., & Cutrona, C. E. (2004). Social support communication in families. In A. L. Vangelisti (Ed.), *Handbook of family communication* (pp. 495–512). Lawrence Erlbaum Associates Publishers.
- Gearan & Sonmez (2020, April, 28). Covid-19 cases top 1 million in the United States, about a third of known cases worldwide. https://www.washingtonpost.com/politics/covid-19-cases-top-1-million-in-the-united-states-about-a-third-of-known-cases-worldwide/2020/04/28/e5fafd4e-8944-11ea-9dfd-990f9dcc71fc_story.html
- Gecas, V., & Schwalbe, M. L. (1986). Parental behavior and adolescent self-esteem. *Journal of Marriage and the Family*, 37-46. doi:10.2307/352226

- Giallo, R., Treyvaud, K., Cooklin, A., & Wade, C. (2013). Mothers' and fathers' involvement in home activities with their children: Psychosocial factors and the role of parental self-efficacy. *Early Child Development and Care, 183*(3-4), 343-359. doi:0.1080/03004430.2012.711587
- Gray, M. R., & Steinberg, L. (1999). Unpacking authoritative parenting: Reassessing a multidimensional construct. *Journal of Marriage and the Family, 574-587*. doi: 10.2307/353561
- Grolnick, W. S., & Slowiaczek, M. L. (1994). Parents' involvement in children's schooling: A multidimensional conceptualization and motivational model. *Child development, 65*(1), 237-252. doi:10.2307/1131378
- Grusec, J. E., & Goodnow, J. J. (1994). Impact of parental discipline methods on the child's internalization of values: A reconceptualization of current points of view. *Developmental psychology, 30*(1), 4. doi:10.1037/0012-1649.30.1.4
- Gupta, T., & Nebhinani, N. (2020). Impact of COVID-19 pandemic on child and adolescent mental health. *Journal of Indian Association for Child and Adolescent Mental Health, 16*(3), 1-16. doi:10.1016/j.pcad.2020.04.013
- Gutman, L. M., & Schoon, I. (2013). The impact of non-cognitive skills on outcomes for young people. *Education Endowment Foundation, 1-59*.
- Hair, E. C., Moore, K. A., Garrett, S. B., Ling, T., & Cleveland, K. (2008). The continued importance of quality parent-adolescent relationships during late adolescence. *Journal of research on adolescence, 18*(1), 187-200. doi:10.1111/j.1532-7795.2008.00556.x
- Hamre, B. K., & Pianta, R. C. (2006). Student-Teacher Relationships. In G. G. Bear & K. M. Minke (Eds.), *Children's needs III: Development, prevention, and intervention* (pp. 59-71). National Association of School Psychologists.
- Harris, A., & Goodall, J. (2008). Do parents know they matter? Engaging all parents in learning. *Educational research, 50*(3), 277-289. doi:10.1080/00131880802309424
- Hartup W. W., & Laursen, B. (1991). Relationships as developmental contexts. In: Cohen, R., Siegel A. W., (Eds.). *Context and Development* (pp. 253-279). Hillsdale, NJ: Lawrence Erlbaum Associates, Inc.
- Heckman, J. J., & Kautz, T. (2012). Hard evidence on soft skills. *Labour economics, 19*(4), 451-464. doi:10.1016/j.labeco.2012.05.014

- Henderson, A. T., & Mapp, K. L. (2002). A new wave of evidence: The impact of school, family, and community connections on student achievement. *Political Science: Annual Synthesis*, 7-200.
- 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(3), 740. doi:10.1037/a0015362
- Hoover-Dempsey, K. V., Battiato, A. C., Walker, J. M. T., Reed, R. P., DeJong, J. M., & Jones, K. P. (2001). Parental involvement in homework. *Educational Psychology*, 36, 195 – 209. doi:10.1207/S15326985EP3603_5
- Jeynes, W. H. (2017). A meta-analysis: The relationship between parental involvement and Latino student outcomes. *Education and Urban Society*, 49(1), 4-28. doi:10.1177/0013124516630596
- Keown, L. J., and Palmer, M. (2014). Comparisons between paternal and maternal involvement with sons: early to middle childhood. *Early Child Development and Care*, 184, 99–117. doi:10.1080/03004430.2013.773510
- Kerr, M., & Stattin, H. (2000). What parents know, how they know it, and several forms of adolescent adjustment: Further support for a reinterpretation of monitoring. *Developmental Psychology*, 36, 366–380. doi:10.1037//0012-1649.36.3.366
- Kochhar & Bennet (April, 2021). U.S. labor market inches back from the COVID-19 shock, but recovery is far from complete. *Pew Research Center*.
- Lamb, M.E. (1975). Fathers: Forgotten contributors to child development. *Human Development*, 18, 245–266. doi: 10.1159/000271493
- Lamb, S., Jackson, J., and Rumberger, R. (2015). *ISCY Technical Paper: Measuring 21st Century Skills in ISCY*. Technical Report. Victoria University, Centre for International Research on Educational Systems, Melbourne, Victoria.
- Lareau, A. (2019). Parent involvement in schooling: A dissenting view. In *School, family and community interaction* (pp. 61-73). Routledge.
- Larson, R. W., Richards, M. H., Moneta, G., Holmbeck, G., Duckett, E. (1996). Changes in adolescents' daily interactions with their families from ages 10 to 18: Disengagement and transformation. *Developmental Psychology*, 32, 744–754. doi:10.1037/0012-1649.32.4.744.

- Lau, E. Y. H., & Lee, K. (2020). Parents' views on young children's distance learning and screen time during COVID-19 class suspension in Hong Kong. *Early Education and Development*, 1-18. doi:10.1080/10409289.2020.1843925
- Laursen, B., Coy, K. C., Collins, W. A. (1998). Reconsidering changes in parent-child conflict across adolescence: A meta-analysis. *Child Development*, 69, 817-832. doi:10.1111/j.1467-8624.1998.tb06245.x.
- Lawrence, K. C., & Fakuade, O. V. (2021). Parental involvement, learning participation and online learning commitment of adolescent learners during the COVID-19 lockdown. *Research in Learning Technology*, 29-42. doi:10.25304/rlt.v29.2544
- LeFevre, A. L., & Shaw, T. V. (2012). Latino parent involvement and school success: Longitudinal effects of formal and informal support. *Education and Urban Society*, 44(6), 707-723. doi:10.1177/0013124511406719
- Levitt, M. J., Levitt, J., Bustos, G. L., Crooks, N. A., Santos, J. D., Telan, P., ... & Milevsky, A. (2005). Patterns of social support in the middle childhood to early adolescent transition: Implications for adjustment. *Social development*, 14(3), 398-420. doi:10.1111/j.1467-9507.2005.00308.x
- Lewis, C., & Lamb, M. (2003). Fathers' influences on children's development: The evidence from two-parent families. *European Journal of Psychology of Education*, 18, 211-228. doi:10.1007/BF03173485
- Little, R. J. A. (1988). A test of missing completely at random for multivariate data with missing values. *Journal of the American Statistical Association*, 83, 1198-1202. <http://dx.doi.org/10.1080/01621459.1988.10478722>
- Loeber, R., Drinkwater, M., Yanming, Y., Anderson, S. J., Schmidt, L. C., Crawford, A. (2000). Stability of family interaction from ages 6-18. *Journal of Abnormal Child Psychology*, 28, 353-369. doi:10.1023/A:1005169026208.
- Lyubomirsky, S., & Lepper, H. S. (1999). A measure of subjective happiness: Preliminary reliability and construct validation. *Social indicators research*, 46(2), 137-155. doi:10.1023/A:1006824100041
- MacNeil, G., Stewart, J. C., & Kaufman, A. V. (2000). Social support as a potential moderator of adolescent delinquent behaviors. *Child and Adolescent Social Work Journal*, 17(5), 361-379. doi: 10.1023/A:1007555014397
- Manders, W. A., Scholte, R. H., Janssens, J. M., & De Bruyn, E. E. (2006). Adolescent personality, problem behaviour and the quality of the parent-adolescent relationship. *European Journal of Personality: Published for the European*

Association of Personality Psychology, 20(3), 237-254. doi:
doi.org/10.1002/per.574

Marsiglio, W. (1991). Paternal engagement activities with minor children. *Journal of Marriage and the Family*, 53, 973–986.

Maurizi, L. K., Ceballo, R., Epstein-Ngo, Q., & Cortina, K. S. (2013). Does neighborhood belonging matter? Examining school and neighborhood belonging as protective factors for Latino adolescents. *American Journal of Orthopsychiatry*, 83(2-3), 323. doi: 10.1111/ajop.12017

McGue, M., Elkins, I., Walden, B., Iacono, W. G. (2005). Perceptions of the parent-adolescent relationship: A longitudinal investigation. *Developmental Psychology*, 41, 971–984. doi:10.1037/0012-1649.41.6.971.

McNeal, R. B. (2015). Parent involvement and student performance: The influence of school context. *Educational Research for Policy and Practice*, 14(2), 153-167. doi:10.1080/10852352.2010.486297

McWayne, C., Hampton, V., Fantuzzo, J., Cohen, H. L., & Sekino, Y. (2004). A multivariate examination of parent involvement and the social and academic competencies of urban kindergarten children. *Psychology in the Schools*, 41(3), 363-377. doi:10.1002/pits.10163

Moyé, L. A. (1998). P-value interpretation and alpha allocation in clinical trials. *Annals of Epidemiology*, 8(6), 351-357. doi: 10.1016/S1047-2797(98)00003-9

Muller, C., & Ellison, C. G. (2001). Religious involvement, social capital, and adolescents' academic progress: Evidence from the National Education Longitudinal Study of 1988. *Sociological Focus*, 34(2), 155-183. doi:10.1080/00380237.2001.10571189

Nagaoka, J., Farrington, C. A., Ehrlich, S. B., & Heath, R. D. (2015). *Foundations for young adult success. A developmental framework*. Chicago, IL: University of Chicago Consortium on Chicago School Research. Retrieved from <http://www.wallacefoundation.org/knowledge-center/after-school/key-research/Documents/Foundations-for-Young-Adult-Success.pdf>

Organisation for Economic Co-Operation and Development (2015). PISA technical report. Scaling procedures and construct validation of context questionnaire data [PDF file]. Retrieved from <https://www.oecd.org/pisa/sitedocument/PISA-2015-Technical-Report-Chapter-16-Procedures-and-Construct-Validation-of-Context-Questionnaire-Data.pdf>

- Osterman, K. F. (2000). Students' need for belonging in the school community. *Review of educational research*, 70(3), 323-367. doi:10.3102/00346543070003323
- Ottenbacher, K. J. (1998). Quantitative evaluation of multiplicity in epidemiology and public health research. *American Journal of Epidemiology*, 147(7), 615-619. doi: 10.1093/oxfordjournals.aje.a009501
- Panaoura, R. (2021). Parental Involvement in Children's Mathematics Learning Before and During the Period of the COVID-19. *Social Education Research*, 65-74. doi:10.37256/ser.212021547
- Pellegrino, J.W. and Hilton, M.L. (Eds.) (2012). Education for Life and Work: Developing Transferable Knowledge and Skills in the 21st Century. National Research Council. Washington, D.C., The National Academies Press.
- Perneger, T. V. (1998). What's wrong with Bonferroni adjustments. *Bmj*, 316(7139), 1236-1238. doi: 10.1136/bmj.316.7139.1236
- Pittman, L. D., & Richmond, A. (2007). Academic and psychological functioning in late adolescence: The importance of school belonging. *The Journal of Experimental Education*, 75(4), 270-290. doi:10.3200/JEXE.75.4.270-292
- Pleck, J., & Masciadrelli, B. (2004). Paternal involvement by U.S. residential fathers. In M. Lamb (Ed.), *The role of the father in child development* (4th ed., pp. 222–271). New York: Wiley.
- Pomerantz, E. M. , Kim, E. M. , & Cheung, C. S. (2012). Parents' involvement in children's learning. In K. R. Harris , S. Graham , T. C. Urdan , S. Graham , J. M. Royer , & M. Zeidner (Eds.), *APA educational psychology handbook* (pp. 417-440). Washington, DC: American Psychological Association.
- Pomerantz, E. M., Kim, E. M., & Cheung, C. S.-S. (2012). Parents' involvement in children's learning. In K. R. Harris, S. Graham, T. Urdan, S. Graham, J. M. Royer, & M. Zeidner (Eds.), *APA handbooks in psychology®. APA educational psychology handbook, Vol. 2. Individual differences and cultural and contextual factors* (p. 417–440). American Psychological Association.
- Pomerantz, E. M., Ng, F. F. Y., & Wang, Q. (2006). Mothers' mastery-oriented involvement in children's homework: Implications for the well-being of children with negative perceptions of competence. *Journal of Educational Psychology*, 98(1), 99-111. doi:10.1037/0022-0663.98.1.99
- Portes, A. (1998). Social capital: Its origins and applications in modern sociology. *Annual review of sociology*, 24(1), 1-24. doi: 10.1146/annurev.soc.24.1.1

- Reynolds, A. J., & Ou, S. R. (2004). Alterable predictors of child well-being in the Chicago longitudinal study. *Children and Youth Services Review*, 26(1), 1-14. doi:10.1016/j.chilyouth.2003.11.005
- Rigby, K. E. N. (2000). Effects of peer victimization in schools and perceived social support on adolescent well-being. *Journal of adolescence*, 23(1), 57-68. doi:10.1006/jado.1999.0289
- Rogers, A. A., Ha, T., & Ockey, S. (2021). Adolescents' perceived socio-emotional impact of COVID-19 and implications for mental health: results from a US-based mixed-methods study. *Journal of Adolescent Health*, 68(1), 43-52. doi:10.1016/j.jadohealth.2020.09.039
- Rollè, L., Gullotta, G., Trombetta, T., Curti, L., Gerino, E., Brustia, P., & Caldarera, A. M. (2019). Father involvement and cognitive development in early and middle childhood: a systematic review. *Frontiers in Psychology*, 10, 2405. doi:10.3389/fpsyg.2019.02405
- Ronen, T., Hamama, L., Rosenbaum, M., & MishelyYarlap, A. (2014). Subjective well-being in adolescence: The role of self-control, social support, age, gender, and familiar crisis. *Journal of Happiness Studies*, 15, 1–24. doi: 10.1007/s10902-014-9585-5
- Rothman, K. J. (1990). No adjustments are needed for multiple comparisons. *Epidemiology*, 43-46. doi: 10.1097/00001648-199001000-00010
- Ryan, R. M. (1995). Psychological needs and the facilitation of integrative processes. *Journal of Personality*, 63(3), 397-427. doi:10.1111/j.1467-6494.1995.tb00501.x.
- Santrock, J. W. (2004). Life-span development (9th ed.). New York: McGraw-Hill.
- Schaefer, E. S. (1965). Children's reports of parental behavior: An inventory. *Child development*, 413-424. doi: 10.2307/1126465
- Scheer, S. D., Borden, L. M., & Donnermeyer, J. F. (2000). The relationship between family factors and adolescent substance use in rural, suburban, and urban settings. *Journal of child and family studies*, 9(1), 105-115. doi:10.1023/A:1009467817313
- Simmons, A. N. (2008). A reliable sounding board: Parent involvement in students' academic and career decision making. *NACADA Journal*, 28(2), 33-43. doi:10.12930/0271-9517-28.2.33

- Stattin, H., & Kerr, M. (2000). Parental monitoring: A reinterpretation. *Child Development, 71*, 1072–1085. doi:10.1111/1467-8624.00210.
- Wang, M. T., Brinkworth, M., & Eccles, J. (2013). Moderating effects of teacher–student relationship in adolescent trajectories of emotional and behavioral adjustment. *Developmental psychology, 49*(4), 690. doi:10.1037/a0027916
- Westerlund, H., Gustafsson, P. E., Theorell, T., Janlert, U., & Hammarström, A. (2013). Parental academic involvement in adolescence, academic achievement over the life course and allostatic load in middle age: a prospective population-based cohort study. *J Epidemiol Community Health, 67*(6), 508–513. doi: 10.1136/jech-2012-202052
- Wigfield, A., Eccles, J. S., Mac Iver, D., Reuman, D. A., & Midgley, C. (1991). Transitions during early adolescence: Changes in children's domain-specific self-perceptions and general self-esteem across the transition to junior high school. *Developmental psychology, 27*(4), 552. doi:10.1037/0012-1649.27.4.552
- Wigfield, A., Eccles, J. S., Schiefele, U., Roeser, R. W., & Davis-Kean, P. (2006). Development of achievement motivation. In N. Eisenberg (Ed.), *Handbook of child psychology: Vol. 3. Social, emotional, and personality development* (6th ed., pp. 933–1002). Hoboken, NJ: Wiley.
- World Health Organization. (2020, June, 29). *WHO timeline - COVID-19*. <https://www.who.int/news-room/detail/27-04-2020-who-timeline---covid-19>
- Zhang, C., Ye, M., Fu, Y., Yang, M., Luo, F., Yuan, J., & Tao, Q. (2020). The psychological impact of the COVID-19 pandemic on teenagers in China. *Journal of Adolescent Health, 67*(6), 747–755. doi:10.1016/j.jadohealth.2020.08.026
- Zhang, H. (2020). The influence of the ongoing COVID-19 pandemic on family violence in China. *Journal of family violence, 1*-11. doi:10.1007/s10896-020-00196-8
- Zimet, G. D., Dahlem, N. W., Zimet, S. G., & Farley, G. K. (1988). The multidimensional scale of perceived social support. *Journal of personality assessment, 52*(1), 30–41. doi:10.1207/s15327752jpa5201_2

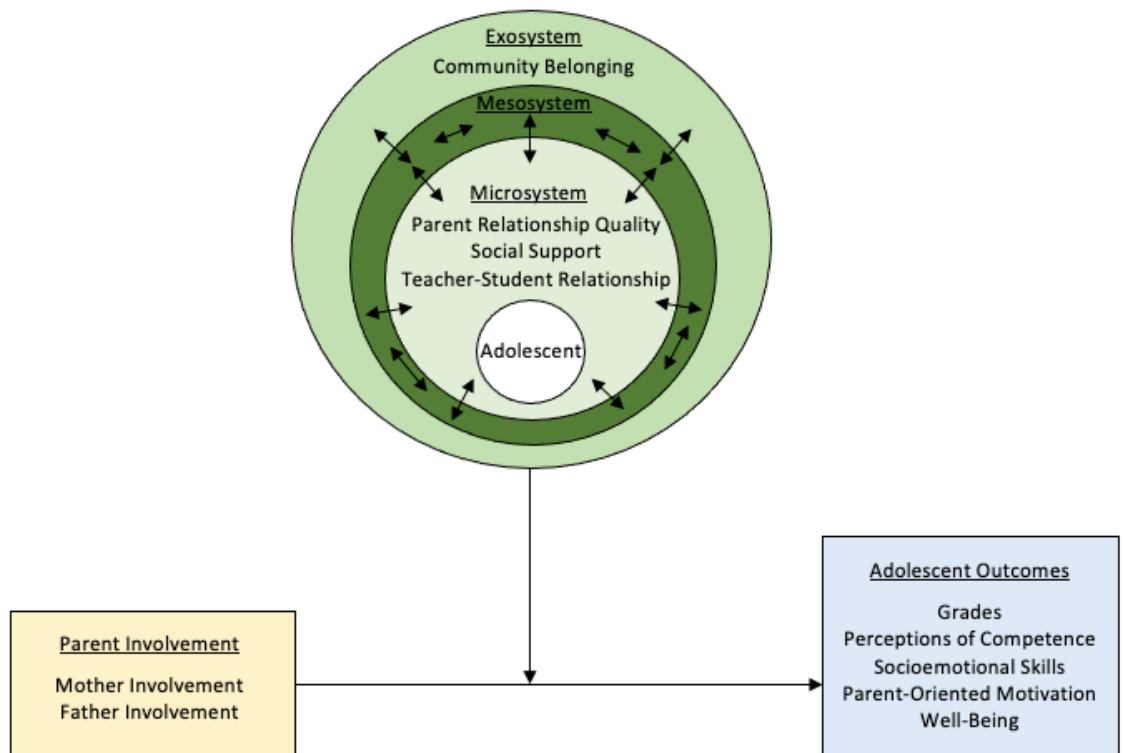


Figure 1. Guiding conceptual framework depicting adolescents’ interactions with various contextual systems as moderators between parent involvement and adolescents’ academic and socioemotional adjustment.

Table 1

Descriptive Statistics and Correlations Among Parent Involvement and Adolescent Adjustment Outcomes

| | Mother Involvement | Father Involvement | Grades | Perceived Competence | Socioemotional Skills | Well- Being | Parent-Oriented Motivation | |
|----------------------------|-----------------------|-----------------------|--------|-------------------------|--------------------------|----------------|-------------------------------|------|
| Mother Involvement | -- | | | | | | | |
| Father Involvement | .48** | -- | | | | | | |
| Grades | 0.07 | 0.06 | -- | | | | | |
| Perceived Competence | .24* | 0.10 | .47** | -- | | | | |
| Socioemotional Skills | .46** | .42** | .29** | .43** | -- | | | |
| Well-Being | .36** | .23* | 0.15 | .41** | .54** | -- | | |
| Parent-Oriented Motivation | 0.07 | 0.05 | 0.11 | 0.16 | .21* | -0.09 | -- | |
| | <i>M</i> | 3.47 | 3.10 | 3.33 | 4.60 | 3.00 | 4.61 | 3.72 |
| | <i>SD</i> | 0.64 | 0.83 | 0.74 | 1.29 | 0.43 | 1.39 | 0.98 |

Note. * $p < .05$, ** $p < .01$

Table 2
Descriptive Statistics and Correlations Among Parent Involvement and Contextual Variables

| | Mother Involvement | Father Involvement | Mother Relationship Quality | Father Relationship Quality | Teacher Relationship | Social Support | Community Belonging | |
|-----------------------------|--------------------|--------------------|-----------------------------|-----------------------------|----------------------|----------------|---------------------|------|
| Mother Involvement | -- | | | | | | | |
| Father Involvement | .48** | -- | | | | | | |
| Mother Relationship Quality | .69** | .45** | -- | | | | | |
| Father Relationship Quality | .37** | .78** | .55** | -- | | | | |
| Teacher-Relationship | .28** | .33** | .42** | .45** | -- | | | |
| Social Support | .29** | .33** | .50** | .46** | .36** | -- | | |
| Community Belonging | .43** | .42** | .41** | .43** | .33** | .30** | -- | |
| | <i>M</i> | 4.47 | 3.10 | 3.72 | 3.61 | 3.70 | 3.15 | 2.64 |
| | <i>SD</i> | 0.64 | 0.83 | 0.84 | 0.89 | 0.70 | 0.83 | 0.40 |

Note. * $p < .05$, ** $p < .01$

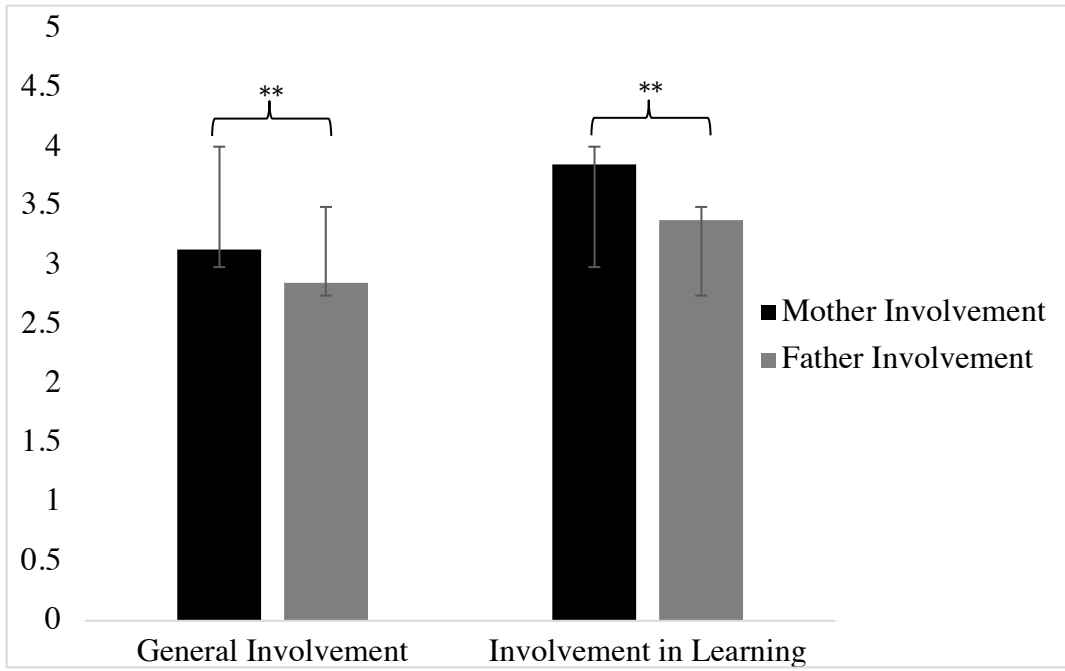


Figure 2. Comparing mother and father rates of involvement. $**p < .001$; error bar indicates 1 standard error of measurement.

Table 3

Father Involvement Predicting Grades: Moderation by Community Belonging

| | β | t | p |
|--|---------|-------|-------|
| Step 1: | | | |
| Socioeconomic Status | 0.18 | 1.71 | 0.09 |
| Gender | -0.07 | -0.07 | 0.52 |
| Father Involvement | 0.06 | 0.54 | 0.59 |
| Community Belonging | -0.004 | -0.03 | 0.98 |
| Step 2: | | | |
| Father Involvement x Community Belonging | 0.24 | 1.14 | 0.04* |

Note. * $p < .05$, ** $p < .01$

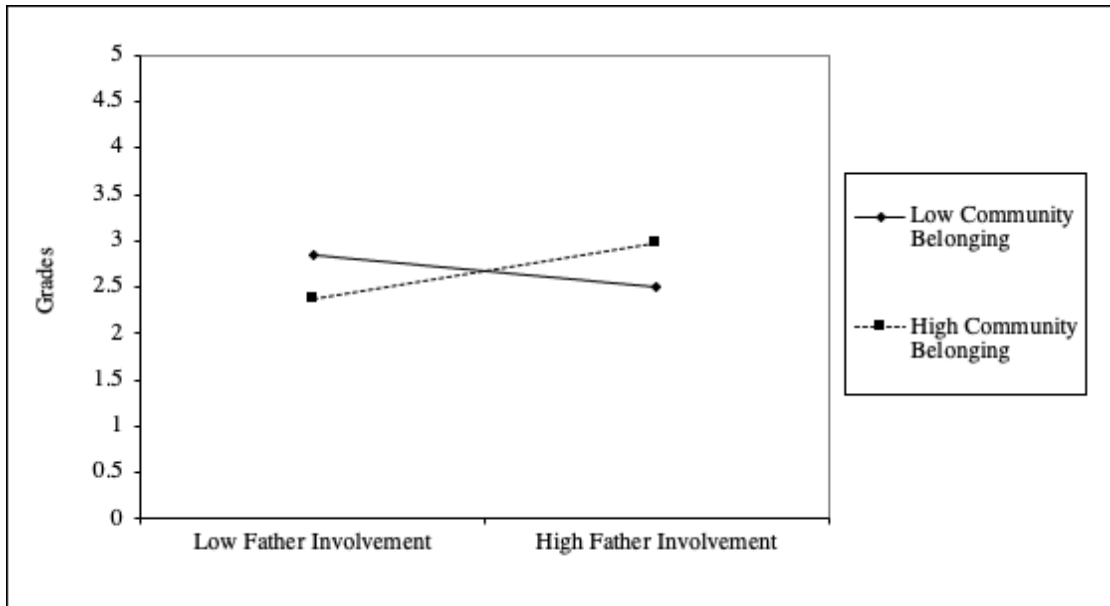


Figure 3. Relationship between father involvement and adolescent grades with a significant interaction of community belonging.

Table 4

Mother Involvement Predicting Grades: Moderation by Community Belonging

| | β | t | p |
|--|---------|-------|------|
| Step 1: | | | |
| Socioeconomic Status | 0.19 | 1.75 | 0.08 |
| Gender | -0.05 | -0.05 | 0.65 |
| Mother Involvement | 0.05 | 0.41 | 0.69 |
| Community Belonging | 0.02 | 0.15 | 0.88 |
| Step 2: | | | |
| Mother Involvement x Community Belonging | 0.22 | 1.94 | 0.06 |

Note. * $p < .05$, ** $p < .01$

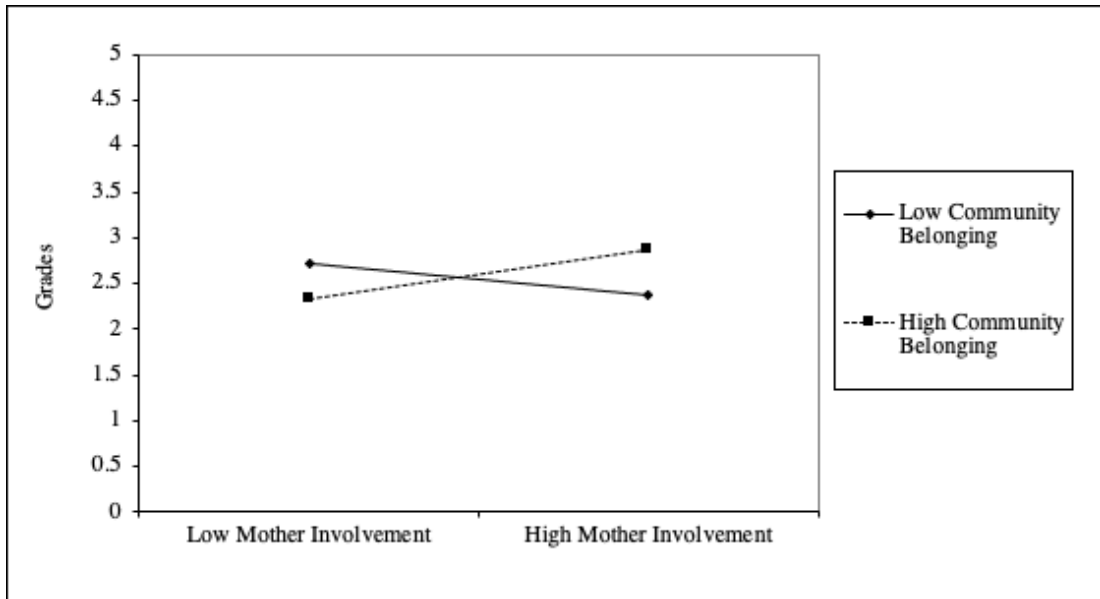


Figure 4. Relationship between mother involvement and adolescent grades with trending significant interaction of community belonging.

Table 5
Father Involvement Predicting Socioemotional: Moderation by Father Relationship Quality

| | β | t | p |
|--|---------|-------|---------|
| Step 1: | | | |
| Socioeconomic Status | 0.15 | 1.82 | 0.07 |
| Gender | -0.08 | -0.96 | 0.34 |
| Mother Involvement | 0.21 | 1.64 | 0.10 |
| Community Belonging | 0.43 | 2.24 | 0.001** |
| Step 2: | | | |
| Father Involvement x Community Belonging | 0.34 | 2.83 | <.001** |

Note. * $p < .05$, ** $p < .01$

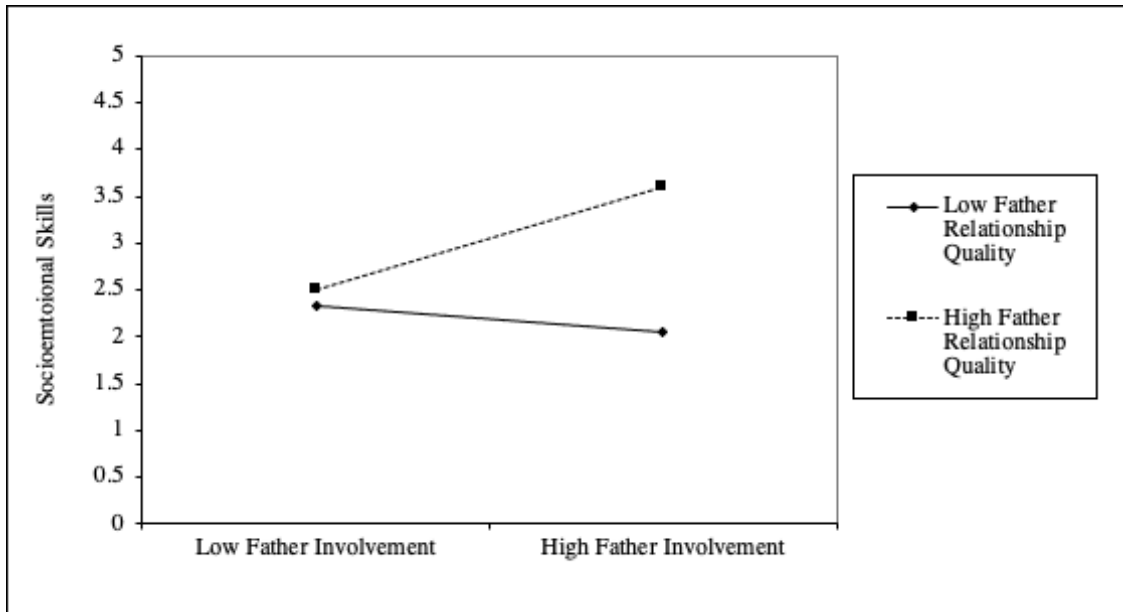


Figure 5. Relationship between father involvement and adolescent socioemotional skills with significant interaction of father relationship quality.

Table 6

Mother Involvement Predicting Socioemotional Skills: Moderation by Mother Relationship Quality

| | β | t | p |
|--|---------|------|---------|
| Step 1: | | | |
| Socioeconomic Status | 0.08 | 0.91 | 0.37 |
| Gender | 0.04 | 0.47 | 0.64 |
| Mother Involvement | 0.15 | 1.36 | 0.18 |
| Community Belonging | 0.48 | 4.43 | <.001** |
| Step 2: | | | |
| Mother Involvement x Community Belonging | 0.27 | 3.25 | 0.002** |

Note. * $p < .05$, ** $p < .01$

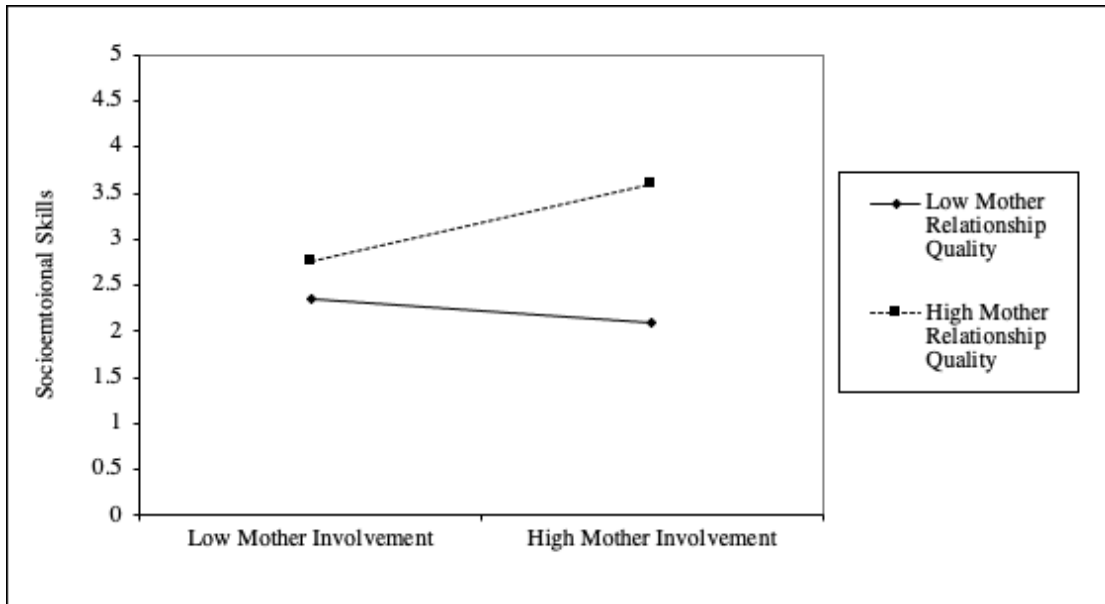


Figure 6. Relationship between mother involvement and adolescent socioemotional skills with significant interaction of mother relationship quality.

Appendix A. Demographic Information

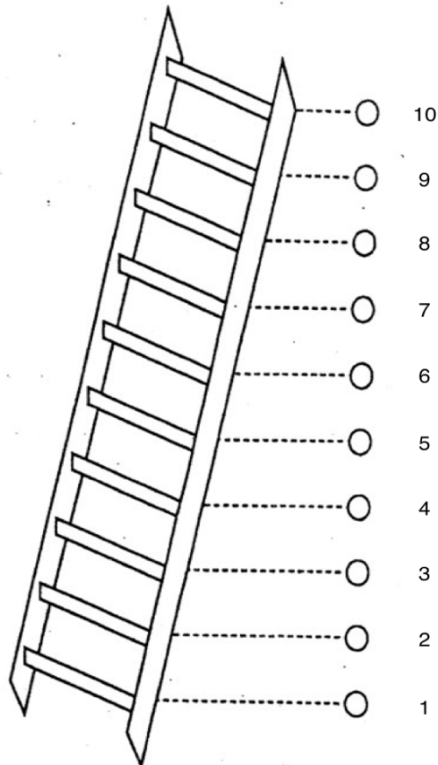
| | |
|---|--|
| 1. What is your gender? | <input type="radio"/> Female <input type="radio"/> Male <input type="radio"/> Other (please specify): _____ |
| 2. What is your age? | Years _____ |
| 9. What is your mother's highest level of education? | <input type="radio"/> Some high school <input type="radio"/> High school diploma or GED <input type="radio"/> Some college <input type="radio"/> Associates degree <input type="radio"/> Bachelors degree <input type="radio"/> Masters degree <input type="radio"/> Doctoral degree <input type="radio"/> Other (please specify): _____ |
| 10. What is your father's highest level of education? | <input type="radio"/> Some high school <input type="radio"/> High school diploma or GED <input type="radio"/> Some college <input type="radio"/> Associates degree <input type="radio"/> Bachelors degree <input type="radio"/> Masters degree <input type="radio"/> Doctoral degree <input type="radio"/> Other (please specify): _____ |

Appendix B. Socioeconomic Status

A. Family SES

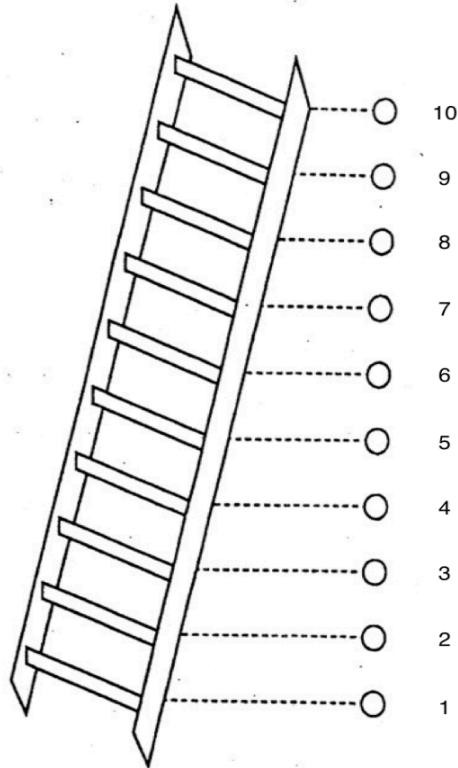
Imagine this ladder pictures how the United States society is set up. At the top of the ladder are the people who are best off – they have the most money, the highest amount of schooling, and the jobs that bring the most respect. At the bottom are people who are worst off – they have the least money, little or no education, no job or jobs that no one wants or respects. Now think about your family. Please tell us where you think your family would be on this ladder.

Shade in the circle that best represents where your family would be on this ladder.



B. School Standing

Now assume that the ladder is a way of picturing your school. At the top of the ladder are the people in your school with the most respect, the highest grades, and the highest standing. At the bottom are the people who no one respects, no one wants to hang around with, and have the worst grades. Now think about yourself. Please tell us where you think you would be on this ladder. **Shade in the circle that best represents where you would be on this ladder.**



Appendix C. Parent Involvement

| | Strongly disagree | Disagree | Agree | Strongly agree |
|---|-----------------------|-----------------------|-----------------------|-----------------------|
| <hr/> | | | | |
| 1. My parent keeps track of my daily schedule. | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |
| <hr/> | | | | |
| 2. My parent talks to me about current events. | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |
| <hr/> | | | | |
| 3. My parent calls me frequently just to check in and see what I am up to. | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |
| <hr/> | | | | |
| 4. My parent makes sure that I have some money For lunch at school or going out with friends. | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |
| <hr/> | | | | |
| 5. My parent talks to me about my feelings. | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |
| <hr/> | | | | |
| 6. My parent sends me texts throughout the day just to talk. | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |
| <hr/> | | | | |
| 7. My parent wants to know about my day. | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |
| <hr/> | | | | |

| | | | | |
|--|-----------------------|-----------------------|-----------------------|-----------------------|
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |
| 8. My parent takes me to concerts/plays. | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |
| 9. My parent asks me questions about my friends. | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |
| 10. My parent does activities with me such as play a game, practice sports, arts and crafts. | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |
| 11. My parent talks to me about my future. | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |
| 12. My parent talks to me about important issues. | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | |

Appendix D. Parent Involvement in Children's Learning

| | Not at all true | A little bit true | Kind of true | Pretty true | Very true |
|---|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
| 1. My parent tries to get to know the teachers at my school | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 2. My parent knows how I am doing in school | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 3. My parent talks to me about things related to what I am studying in school | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 4. My parent asks me to tell them what happens in school | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 5. My parent helps me with my homework when I ask | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | | | | | |

| | | | | | |
|--|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
| 6. My parent goes to parent-teacher conferences | | | | | |
| Mother | | | | | |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 7. My parent spends time with me on things related to my schoolwork | | | | | |
| Mother | | | | | |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 8. My parent checks my homework when I ask | | | | | |
| Mother | | | | | |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 9. My parent purchases extra workbooks or outside materials related to school for me | | | | | |
| Mother | | | | | |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 10. My parent initiates a conversation with me about how my schoolwork is going | | | | | |
| Mother | | | | | |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |

Appendix E. Parent Relationship Quality

Answer the following questions about your mother and father. Sometimes the answers for different people may be the same but sometimes they may be different.

| | Little or None | Somewhat | Very Much | Extremely Much | The Most |
|--|-----------------------|-----------------------|----------------------------------|-----------------------|-----------------------|
| 1. How much free time do you spend with this parent? | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 2. How much do you and this parent get upset with or mad at each other? | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input checked="" type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input checked="" type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 3. How much does this parent teach you how to do things that you don't know? | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 4. How much do you and this parent get on each other's nerves? | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |

| | | | | | |
|---|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
| 5. How much do you talk about everything with this parent? | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 6. How much does this parent like or love you? | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 7. How much does this parent treat you like you're admired and respected? | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 8. How much do you play around and have fun with this parent? | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| | | | | | |

| | | | | | |
|---|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
| 9. How much do you and this parent disagree or quarrel? | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 10. How much does this parent help you figure out or fix things? | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 11. How much do you share your secrets and private feelings with this parent? | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 12. How much does this parent treat you like you're good at many things? | | | | | |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |

13. How much do you go places
and do enjoyable things with
this parent?

| | | | | | |
|--------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
| | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | | | | | |

14. How much do you and this
parent hassle or nag one
another?

| | | | | | |
|--------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
| Mother | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Father | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |

Appendix F. Teacher-Student Relationship

| | Not at all true | A little bit true | Kind of true | Pretty true | Very true |
|--|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
| 1. I get along well with most teachers | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 2. Most teachers are interested in my well-being. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 3. Most of my teachers really listen to what I have to say. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 4. If I need extra help, I will receive it from my teachers. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 5. Most of my teachers treat me fairly. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 6. I feel that my teachers are too strict. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 7. When I am with my teachers, I feel free to be myself. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 8. I feel that my teachers do not encourage me to express myself. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 9. I feel my teachers give me enough opportunity to decide for myself how to do my schoolwork. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 10. I feel like I am free to decide for myself how to study. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |

Appendix G. Social Support

Instructions: We are interested in how you feel about the following statements. Read each statement carefully. Indicate how you feel about each statement.

| | Strongly disagree | Disagree | Agree | Strongly agree |
|---|-----------------------|-----------------------|-----------------------|-----------------------|
| 1. There is a special person who is around when I am in need. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 2. There is a special person with whom I can share my joys and sorrows. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 3. My family really tries to help me. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 4. I get the emotional help and support I need from my family. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 5. I have a special person who is a real source of comfort to me. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 6. My friends really try to help me. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 7. I can count on my friends when things go wrong. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 8. I can talk about my problems with my family. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 9. I have friends with whom I can share my joys and sorrows. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 10. There is a special person in my life who cares about my feelings. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 11. My family is willing to help me make decisions. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 12. I can talk about my problems with my friends. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |

Appendix H. Community Belonging

| | Strongly disagree | Disagree | Agree | Strongly agree |
|---|-----------------------|-----------------------|-----------------------|-----------------------|
| 1. I feel safe in my neighborhood. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 2. I have a lot of friends in my neighborhood. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 3. My community helps each other out. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 4. My neighbors are there for me if I need help. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 5. I feel like I belong in my community. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 6. My family fits in well with others in the neighborhood. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 7. I am different from those in my community. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 8. My family participates in community activities. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 9. My family is does not fit in well with others in the community. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 10. I don't see people like me in the neighborhood or working in the stores around my home. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 11. My family helps others in the community. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 12. I don't feel safe in my neighborhood because I am different. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |

Appendix I. Parent Oriented Motivation

Why I Try to do Well

| | Not at all true | A little bit true | Kind of true | Pretty true | Very true |
|---|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
| 1. To show my parents that I am being responsible. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 2. To please my parents. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 3. Because I want my parents' approval. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 4. So that I can get praise from my parents. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 5. So that my parents like me. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 6. Because I want my parents to think I am a good kid. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 7. Because my parents expect it of me. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 8. So that my parents will be proud of me. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 9. So that I don't disappoint my parents. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 10. To meet my parents' expectations of me. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 11. Because it's my obligation to my parents. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 12. To let my parents know that I am a responsible kid. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |

Appendix J. Social Emotional Skills

| | Strongly disagree | Disagree | Agree | Strongly agree |
|--|-----------------------|-----------------------|-----------------------|-----------------------|
| 1. Working hard in school matters for success in the workforce | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 2. What we learn in class is necessary for success in the future | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 3. School teaches me valuable skills | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 4. I have skipped a class without permission | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 5. I have been absent from school for a day without permission | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 6. I have been in trouble with a teacher because of my behavior | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 7. I have arrived late at school | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 8. In class, I try to work as hard as possible | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 9. In class, I put in my best effort | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 10. In class, I keep working even if the material is difficult | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 11. School is often a waste of time | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 12. I get a feeling of satisfaction from what I do in class | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 13. I have a high level of interest in school work | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |

| | | | | |
|--|-----------------------|-----------------------|-----------------------|-----------------------|
| 14. I find most school work boring | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 15. I always try to do my best | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 16. I always get work in on time | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 17. I persevere with a job until it is done | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 18. I am a hard working student | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 19. I feel safe at school | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 20. I will leave this school with good memories | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 21. I am happy with life at school | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 22. I like being at school | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 23. Right now I see myself as being pretty successful as a student | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 24. I can think of many ways to reach my current goals | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 25. There are lots of ways around any problem that I am facing now | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 26. I am confident of doing well in school | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 27. I understand how others are feeling | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 28. I get along well with others | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 29. I work well in groups | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 30. I treat others fairly | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 31. I take time to help others | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| 32. I am good at leading others | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |

Appendix K. Well-Being

For each of the following statements and/or questions, please circle the point on the scale that you feel is most appropriate in describing you.

1. In general, I consider myself:
not a very happy person 1 2 3 4 5 6 7 a very happy person

2. Compared with most of my peers, I consider myself:
less happy 1 2 3 4 5 6 7 more happy

3. Some people are generally very happy. They enjoy life regardless of what is going on, getting the most out of everything. To what extent does this characterization describe you?
not at all 1 2 3 4 5 6 7 a great deal

4. Some people are generally not very happy. Although they are not depressed, they never seem as happy as they might be. To what extent does this characterization describe you?
not at all 1 2 3 4 5 6 7 a great deal

Appendix L. Academic Achievement

1. Please put down the letter grade you earned in your most recent Language Arts exam

2. Please put down the letter grade you earned in your most recent Math exam _____

3. Please put down the letter grade you earned in your most recent Social Studies exam

4. Please put down the letter grade you earned in your most recent Science exam _____

| | A lot worse than other | A little worse than others | Same as other | A little better than others | A lot better than others |
|----------------|-------------------------------|-----------------------------------|----------------------|------------------------------------|---------------------------------|
| Language Arts | | | | | |
| Math | | | | | |
| Social Studies | | | | | |
| Science | | | | | |

Appendix M. Academic Self-Competence

| | |
|---|--|
| <p>1. How good at Language Arts are you?</p> | <p> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> Not at All Good Somewhat Good Very Good </p> |
| <p>2. If you were to rank all of the students in your class from the worst to the best in Language Arts, where would you put yourself?</p> | <p> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> At the Bottom In the Middle At the Top </p> |

| | |
|--|--|
| <p>1. How good at Math are you?</p> | <p> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> Not at All Good Somewhat Good Very Good </p> |
| <p>2. If you were to rank all of the students in your class from the worst to the best in Math, where would you put yourself?</p> | <p> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> At the Bottom In the Middle At the Top </p> |

| | |
|---|--|
| <p>1. How good at Science are you?</p> | <p> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> Not at All Good Somewhat Good Very Good </p> |
| <p>2. If you were to rank all of the students in your class from the worst to the best in Science, where would you put yourself?</p> | <p> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> At the Bottom In the Middle At the Top </p> |

