A social learning approach to the examination of the temporal directionality between parenting behavior and early adolescents' affect.

Shelby M. Burton

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A SOCIAL LEARNING APPROACH TO THE EXAMINATION OF THE TEMPORAL DIRECTIONALITY BETWEEN PARENTING BEHAVIOR AND EARLY ADOLESCENTS’ AFFECT

By

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B.S. Northern Arizona University, 2015
M.Ed., University of Louisville, 2018

A Dissertation Submitted to the Faculty of the College of Education and Human Development of the University of Louisville in Partial Fulfillment of the Requirements for the Degree of

Doctor of Philosophy in Counseling and Personnel Services

Counseling Psychology
Department of Counseling & Human Development
University of Louisville
Louisville, KY

August 2021
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DEDICATION

for the angels who live above and within

“i carry your heart(i carry it in my heart)”

e. e. cummings

Paul G. Kurian

April 9, 1940 – November 8, 2016

Todd L. Burton

April 27, 1962 – July 10, 2017
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for being there for me when the rain starts to pour;
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Raegan & Tori, for showing me a love greater than
all the moons and the stars and the galaxies;
Mom, for being amazing just the way you are;
Ryan, for whom my entire career is dedicated;
And to Eric, for being my miracle.
ABSTRACT

A SOCIAL LEARNING APPROACH TO THE EXAMINATION OF THE TEMPORAL DIRECTIONALITY BETWEEN PARENTING BEHAVIOR AND EARLY ADOLESCENTS’ AFFECT

Shelby M. Burton

August 4, 2021

This study contributes to current literature by being the first to longitudinally examine the relation between early adolescents’ negative and positive affect and specific parenting behaviors. The five parenting behaviors examined in the current study are rooted within the social learning theory constructs of effective discipline (i.e., corporal punishment, inconsistent discipline), positive involvement (i.e., parental involvement), monitoring (i.e., poor monitoring and supervision), and social skills encouragement (i.e., positive parenting). Two research questions were addressed: (1) how are parenting behaviors at baseline associated with early adolescent-reported NA and PA at a later timepoint, and (2) how are early adolescents’ NA and PA at baseline associated with reports of parenting behaviors at a later timepoint? A representative sample of 331 early adolescents (\(M\) age at baseline = 12.62, \(SD = 0.99\); 48.3% female; 76.1% European American, 11.2% African American, 1.8% Latina/o, 1.8% Asian/Pacific Islander, .9% Native American/Alaska Native, 7.9% other race/ethnicity) were recruited from public and private middle schools across urban and rural areas. Early adolescents completed the Positive and Negative Affect Scale for Children and the Alabama Parenting
Questionnaire. After conducting seven multiple regressions, (a) PA and parental involvement were positively and bidirectionally related, (b) PA at baseline was positively and unidirectionally related with positive parenting at a later timepoint, (c) PA and adverse parenting behaviors (i.e., corporal punishment, inconsistent discipline, and poor monitoring and supervision) were not related, and (d) NA and parenting behaviors were not related. The findings were consistent with the claim that not all parent-child interactions are created equally. However, where previous literature found negative parent-child interactions (i.e., adverse parenting behavior in relation to externalizing behavior) to be particularly damaging, the current study found positive parent-child interactions (i.e., parental involvement and positive parenting in relation to PA) to be particularly helpful. Clinicians should intentionally promote parental involvement in parent-focused interventions while targeting an increase in positive affect in early adolescent-focused interventions like individual therapy.
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CHAPTER I
INTRODUCTION

There are powerful forces continually shaping the development of youth, though such forces may appear commonplace at first glance. From the somber rain on the walk to school resulting in wet discomfort for the remainder of the day to the simplicity of a mother’s warm, consoling greeting upon returning from school that afternoon, such routine transactions we share with each other and our environment may in fact be powerfully influential in terms of how we feel and make sense of the world. Perhaps this is why Social Learning Theory (SLT)—a framework which postulates that learning and development are a product of the transactions that are infinitely occurring (Bandura, 1965)—is being used to explain how parenting behavior is linked with child variables (Patterson, 1982). According to Social Learning Theory (SLT), transactions consist of punishments, rewards, and modeling between the self, those who surround the individual, and the contextual factors one is embedded in (Bandura, 1965; Forgatch & Martinez, 1999; Patterson, 1982). For a theoretical model illustrating these components, see Figure 1.

Originally based in Patterson’s (1982) coercion theory, SLT of parenting (SLT-P) explains how negative parent-child interactions are related to negative child variables (see Figure 1). It is therefore no surprise that parenting behavior has been associated with psychosocial maladjustment (Rueth et al., 2017), externalizing behavior (e.g., aggression, recklessness, substance use; Hentges et al., 2018), and internalizing problems (e.g.,
anxiety, depressive symptoms; for review, see McClelland et al., 2013; Rueth et al., 2017). Further, SLT-P suggests that positive behavior is similarly maintained in response to the anticipation of rewards, causing a child to execute or inhibit behavior accordingly (Bandura, 1965), and that such positive parent-child interactions are related to positive child variables (Castro-Schilo et al., 2013; Gewirtz & Gliske, 2016; Nelis et al., 2018). According to SLT-P, these positive interactions are particularly important for a child’s healthy development (Reid et al., 2002), begging the question: *How can parents behave so as to increase positive parent-child interactions and decrease negative coercive ones?*

In addition to parent-child interactions, SLT-P emphasizes contextualization (Forgatch & Martinez, 1999; Patterson, 1982). In other words, environment plays a noteworthy role in transactional interactions and therefore development, and such contextual factors may show themselves in the emergence of societal themes. For example, a critical pattern is occurring in the United States, theoretically slated to impact parent-child interactions. According to reports by the National Institute of Mental Health (NIMH, 2017a, 2017b), there is an alarming increase in the prevalence of depression—one internalizing problem—which simultaneously appears to be affecting younger and younger populations (Bufferd et al., 2012; Egger & Angold, 2006; Luby et al., 2009; Maughan et al., 2013). Thus, perhaps the true question is not simply how parents can behave so as to increase positive parent-child interactions and decrease negative coercive ones, but how to do so *in considering the context of a child’s development* (e.g., *emergence of internalizing problems within increasingly younger ages*).

**A Holistic View of Mental Health Variables**
In considering this phenomenon within the context of one’s developmental period, as children approach early adolescence, they undergo extensive biological (e.g., hormones, puberty), cognitive (e.g., problem-solving, abstract thinking), and social-affective (e.g., interpersonal skills, emotional regulation) changes (Cole et al., 2008; Crone & Dahl, 2012). Such changes make them increasingly more susceptible to harmful internalizing problems, such as depressive and anxiety symptoms. In fact, the NIMH (2017a, 2017b) reports that 31.4% of 13- and 14-year-olds were diagnosed with an anxiety disorder in their lifetime, and that 5.0% of 12-year-olds, 9.4% of 13-year-olds, and 12.7% of 14-year-olds endured a major depressive episode within the last 12 months. Regarding depressive symptoms, it should be further noted that, among prevalence for all adolescents between 12 and 17 years of age, the most significant increase has consistently occurred between 12 and 13 years of age, when the percentage of adolescents with depressive symptoms nearly doubles (NIMH, 2017b). NIMH (2017a, 2017b) additionally reported that 70% of adolescents with depressive symptoms and 8% of adolescents with anxiety symptoms reported severe impairment (e.g., significant deficiency in at least one area of functioning), with impairment present in terms of academic (for review, see Suldo et al., 2013), interpersonal, and intrapersonal functioning (Boulard et al., 2012).

Considering the importance of context, the relationship between parenting behavior and internalizing problems—specifically those that occur in the developmental period of early adolescence—undoubtedly ranks as a health topic demanding our attention.

As mental health researchers, it is subsequently imperative to acknowledge the equal emphasis placed on positive variables such as well-being, as on negative ones like internalizing problems (Newland, 2015). In fact, the World Health Organization (WHO,
2014) defines health as “complete physical, mental, and social well-being” rather than simply the “absence of disease.” Within early adolescence, well-being has proven to be an essential part of mental health, as evidenced by associations between well-being and variables such as emotional intelligence (for meta-analysis, see Sánchez-Álvarez et al., 2016), emotional self-control (Wills et al., 2016), optimism (Oberle et al., 2010), self-compassion (for meta-analysis, see Marsh et al., 2018), and self-esteem (Nelis & Bukowski, 2019). Further, each of these variables associated with well-being have served as preventive or protective factors against development of internalizing problems (Babore et al., 2016; Chu et al., 2018; Stough et al., 2018; Thomson et al., 2015) and should therefore be equally placed alongside internalizing problems at the forefront of mental health research. Conveniently, there is much literature to support the relationship between parent-child interactions and well-being (Castro-Schilo et al., 2013; Gewirtz & Gliske, 2016; Nelis et al., 2018), a fundamental association that will be further investigated in this literature review.

The aforementioned findings support the need to more holistically examine relationships, particularly between parenting behavior and early adolescent variables like internalizing problems and well-being. One way to measure both constructs is by examining affect, as both depressive and anxiety symptoms founded within internalizing problems are oft measured by negative affect (Clark & Watson, 1991) and, likewise, as well-being is oft measured via positive affect (Diener, 1999). Therefore, due to recent findings that show prevalence rates of one internalizing problem, depressive symptoms, quadrupling between preschool and early adolescence (Egger & Angold, 2006; NIMH, 2017a, 2017b), the current study will address the relationship between adolescent-
reported parenting behavior and early adolescents’ negative affect (NA) and positive affect (PA). Additionally, though studies have linked parenting behavior to early adolescent measures of NA (Burton et al., 2018; Davenport et al., 2011; Johnson & Greenberg, 2013; Kim et al., 2003; Latzman et al., 2009; Nelis et al., 2018; Oldehinkel et al., 2006; Schwartz et al., 2017; Turner & Finkelhor, 1996; Wang & Kenny, 2014b; Wang et al., 2019; Yap et al., 2014) and PA (Burton et al., 2018; Latzman et al., 2009; Nelis et al., 2018; for summary of literature review, see Figure 2), few studies have evaluated the temporal directionality between adolescent-reported parenting behavior and such early adolescent variables. As per the transactional nature of SLT-P (see Figure 1), one could argue that parent-child interactions not only impact child’s negative (e.g., internalizing problems) and positive (e.g., well-being) affect, but that child affect also elicits certain parenting behavior (Garthe et al., 2015; Kim et al., 2003; Nelis et al., 2018; Reitz et al., 2006; Wang & Kenny, 2014b; for theoretical model of study variables, see Figure 3). With regard to the example provided at the beginning of this paper which highlighted the simplicity of an event—like rainfall—on subsequent parent-child interactions, is there any reason not to believe that a parent is just as likely to respond to a child’s discomfort (e.g., from wet clothes caused by rain) with extra warmth and affection as a child is likely to feel comforted by her parent’s expression of concern? In fact, Burke et al. (2008) propose that there may be a greater influence of child variables on parenting behavior than of parenting behavior on child variables. Perhaps then the question posed earlier is not only how parents can behave to increase positive parent-child interactions and decrease negative ones, but, importantly, how do children contribute to parents’ behavior?
**Parenting Behavior**

There are five overarching positive parenting behaviors rooted in SLT-P and they include effective discipline, monitoring, positive involvement, problem solving, and skills encouragement (Donovick & Rodriguez, 2008; Patterson, 1982). Effective discipline refers to age-appropriate, proportional, and consistent consequences in response to rules which are clearly communicated (Donovick & Rodriguez, 2008). Monitoring is related to mutual knowledge regarding where parent and child are and when they are expected to return home, as well as elements more salient to a child’s whereabouts such as what the child is doing and with whom (Donovick & Rodriguez, 2008). Positive involvement is associated with quality time spent together doing enjoyable activities and providing positive attention (Donovick & Rodriguez, 2008). Problem solving is based on a parent’s ability to communicate and effectively resolve familial conflict such as negotiation of rules and consequences (Donovick & Rodriguez, 2008). Skills encouragement signifies parental use of positive reinforcement in response to a child’s positive behavior (Donovick & Rodriguez, 2008). SLT-P and the corresponding parenting behavior listed above serve as the premise for the widely used parenting behavior instrument, the Alabama Parenting Questionnaire (APQ; Frick, 1991; Shelton et al., 1996). As such, the APQ concentrates on the more specific constructs of parenting behavior including corporal punishment (i.e., SLT-P’s “effective discipline”), inconsistent discipline (i.e., SLT-P’s “effective discipline”), parental involvement, poor monitoring and supervision, and positive parenting (i.e., SLT-P’s “skills encouragement;” Frick, 1991).
In the following literature review, each of these will be further examined as they pertain to adolescents’ internalizing problems (i.e., depressive and anxiety symptoms), well-being, and negative and positive affect (for theoretical model of study variables, refer back to Figure 2). Under the notions of SLT-P (Forgatch & Martinez, 1999; Patterson, 1982), it is expected that all three theoretical elements of parenting behavior (parent), early adolescent affect (child), and early adolescent development (context) influence each other. That said, such influences may occur in varying degrees, indicating that not all parent-child interactions are created equal (Reid et al., 2002). In fact, Reid et al. (2002) argue that negative parent-child interactions are particularly salient for both parent and child. Thus, theoretically speaking, it may be that some parent-child interactions are significant while others are not though the specifics of these are not entirely clear, which is where empirical evidence can be especially enlightening. See Figure 3 for a summary of the literature review, which both highlights common patterns and demonstrates gaps in literature. Importantly, attention will be paid only to those studies using an early adolescent sample, most of which utilize adolescent-reported measures (Burton et al., 2018; Johnson & Greenberg, 2013; Kim et al., 2003; Latzman et al., 2009; Nelis et al., 2018; Oldehinkel et al., 2006; Turner & Finkelhor, 1996; Wang et al., 2019; Yap et al., 2014).

**Predicted Associations of Parenting Behavior on Early Adolescent Variables**

**Corporal Punishment**

Theoretically derived from the SLT-P construct of “effective discipline” (Patterson, 1982), corporal punishment involves the use of physical pain as a tool to punish children or adolescents for what is deemed as bad behavior (Frick, 1991).
Common examples of corporal punishment include slapping, spanking, or hitting with objects (Frick, 1991). In accordance with Turner and Finkelhor’s (1996) cross-sectional findings that early adolescents ages 10 through 16 who experienced physical punishment once or more per month were three times more likely to develop internalizing problems than those who were not exposed to corporal punishment, it is no surprise that corporal punishment has since been discussed in legal literature as either a precursor to or evidence of child abuse and neglect (Gershoff & Petinsky, 2007). Further, Kim et al. (2003) found a positive relation between internalizing problems and the combined dimension of “harsh-inconsistent discipline,” fusing both corporal punishment and inconsistent discipline, in their longitudinal study of early adolescents ages 10 to 12. Subsequently, according to Wang and Kenny’s (2014b) longitudinal study, age 12 early adolescents reported more internalizing problems in response to previous parental corporal punishment. Particularly relevant, one recent study consisting of early adolescents ages 11 to 14 may substantiate this pattern (Burton et al., 2018). In their study, corporal punishment was positively related to NA and not related at all to PA, though this study was cross-sectional, and the temporal directionality remains ambiguous (Burton et al., 2018). Thus, in relation to corporal punishment, there is a particular dearth of research in terms of not only its association with PA but in its temporal directionality. 

**Inconsistent Discipline**

Also rooted in the SLT-P construct of “effective discipline” (Patterson, 1982), inconsistent discipline occurs when a parent gives a punishment and fails to follow through, when he/she opts against discipline because it seems too difficult, or when punishment for an unwanted behavior varies each time according to mood of the parent
(Frick, 1991). In accordance with this point, as was mentioned in the previous subsection, Kim et al. (2003) found in their longitudinal study of early adolescents ages 10 to 12 a positive relation between internalizing problems and the combined dimension of “harsh-inconsistent discipline;” however, more research is needed to clarify the relationship between internalizing problems and corporal punishment and inconsistent discipline separately. A cross-sectional study which combined two constructs—“effective discipline” and “monitoring”—into General Child Management (GCM) illustrated a positive relationship between poor GCM and early adolescents’ (M age = 11.3) internalizing problems (Johnson & Greenberg, 2013). Once again, more research is needed to clarify the distinct constructs within GCM, thereby determining the relationship between NA and inconsistent discipline parceled out from the effects of poor monitoring and supervision. Similarly, Burton et al. (2018) reported in their cross-sectional study a positive relation between inconsistent discipline and early adolescents’ NA. In contrast, one cross-sectional study of early adolescents ages 10 to 13 conducted by Gaertner, Fite, and Colder (2010) did not find a significant relation between inconsistent discipline and internalizing problems. Perhaps Gaertner et al.’s (2010) findings contrast with the other studies as they intentionally recruited an oversampling of children with externalizing behavior as determined by use of a disruptive behavior disorder screener, in comparison to the other studies (Burton et al., 2018; Johnson & Greenberg, 2013; Kim et al., 2003) which use a community sample. In relation to well-being, Burton et al. (2018) found no relation between inconsistent discipline and PA. It needs to be pointed out that each of these studies either combines constructs (Johnson & Greenberg, 2013; Kim et al., 2003) or is cross-sectional (Burton et al., 2018; Gaertner et
al., 2010; Johnson & Greenberg, 2013) and therefore does not allow for conclusions about specific parenting behavior and their temporal directionality with affect, especially in terms of PA as there is only one study (Burton et al., 2018).

**Parental Involvement**

Founded in the SLT-P construct of “positive involvement” (Patterson, 1982), parental involvement is displayed when parent and child play an active role in each other’s lives, whether it is via physical presence or by consistent communication (Frick, 1991). Among early adolescents ages 10 to 15, cross-sectional empirical literature has shown mixed associations between parental involvement and NA (Burton et al., 2018) and internalizing problems (Gaertner et al., 2010; Wang et al., 2019). Although two of these three studies found a negative relation between parental involvement and measures of internalizing problems (Burton et al., 2018; Wang et al., 2019), one study reported a positive relationship (Gaertner et al., 2010). Once again, Gaertner et al.’s (2010) findings may contrast with the others due to their oversampling of children with externalizing behavior as determined by use of a disruptive behavior disorder screener, who the authors hypothesize may have an increased need for autonomy which parental involvement may threaten. Whereas, the other studies (Burton et al., 2018; Wang et al., 2019) use a nonclinical sample. Both of the latter studies also found positive associations between parental involvement and measures of PA (Burton et al., 2018; Wang et al., 2019). Again, the temporal directionality of these relationships remains unclear.

**Poor Monitoring & Supervision**

Parental monitoring and supervision is grounded in the SLT-P construct of “monitoring” (Patterson, 1982) and stresses careful regulation of adult supervision
including mutual knowledge of parents’ and children’s whereabouts (Frick, 1991). For example, a parent who practices poor monitoring and supervision may not know where his or her child is, despite it being past curfew (Frick, 1991). Alternatively, a child may not know where his parent is, despite it being after work hours when the parent said he or she would be home (Frick, 1991). Johnson and Greenberg (2013) conducted a cross-sectional study of early adolescents ($M$ age = 11.3) and GCM, which measures the fusion of both “effective discipline” and “monitoring.” They found that poor GCM, which in part consists of poor monitoring and supervision, was positively linked to internalizing problems; however, more research is necessary to filter out findings which pertain strictly to poor monitoring and supervision (Johnson & Greenberg, 2013). In accordance, Gaertner et al. (2010) found a positive relation between poor monitoring and supervision and internalizing problems. Burton and her colleagues (2018) similarly reported a positive relation between poor monitoring and supervision and early adolescents’ NA. However, they found no relation between poor monitoring and supervision and PA. As both studies are cross-sectional (Burton et al., 2018; Johnson & Greenberg, 2013), and there is only one study examining poor monitoring and supervision and PA, a longitudinal investigation of such associations is imperative.

**Positive Parenting**

Based in the SLT-P construct of “social skills encouragement ” (Patterson, 1982) and according to Frick (1991), positive parenting is described as affectionate and supportive with an emphasis on praising a child when it is earned. Someone who practices positive parenting may compliment his or her child for completing chores, while a parent who demonstrates low positive parenting may facilitate hostile
interactions, focus only on consequences, and exercise blame and harsh criticism (Frick, 1991). An array of empirical research on the connection between positive parenting and early adolescent variables exists. For example, Schwartz et al. (2017) engaged in observational assessment of parenting behavior with adolescents at three time points (ages 12, 15, and 18 years). They found that parental verbal aggression, such as scornful commentary, anger, and argumentativeness, in response to their child’s performance on a problem-solving task was associated with greater risk for internalizing problems (Schwartz et al., 2017). Additionally, Wang and Kenny (2014a) found a positive relation between harsh verbal discipline and internalizing problems in a cross-sectional study of early adolescents between ages 13 and 14. Similarly, in their cross-sectional study of early adolescents ages 10 to 12, Oldehinkel et al. (2006) found that more parental rejection—encompassed by decreased positive parenting such as discouragement and antagonism—was associated with more internalizing problems. Interestingly, they did not find an association between parental emotional warmth—synonymous with increased positive parenting—and internalizing problems (Oldehinkel et al., 2006). Gaertner and colleagues (2010) similarly did not find a relationship between positive parenting and internalizing problems. Perhaps, in terms of mental health, this indicates that lack of positive parenting may be more of a risk factor than the presence of positive parenting is a protective one. In contrast, other studies have reported a negative association between positive parenting and early adolescents’ NA (Burton et al., 2018) and internalizing problems (Nelis et al., 2018; Wang et al., 2019), with only one of those being longitudinal (Nelis et al., 2018).
Of the parenting behavior evaluated in the current literature review, positive parenting is the most highly investigated in terms of its relationship with early adolescent variables (Burton et al., 2018; Nelis et al., 2018; Oldehinkel et al., 2006; Schwartz et al., 2017; Wang & Kenny, 2014a, 2014b). Accordingly, positive parenting also has the most support for associations with early adolescents’ increased PA (Burton et al., 2018; Nelis et al., 2018; Wang et al., 2019). However, only one of these is longitudinal (Nelis et al., 2018), finding positive associations between baseline positive parenting measures and later PA, and so more literature is needed to better understand the temporal directionality of this association and its subsequent implications.

**Predicted Associations of Early Adolescent Variables on Parenting Behavior**

As was discussed earlier, the transactional nature of SLT-P implies that parent-child interactions not only impact early adolescent NA and PA, but that such variables also elicit certain parenting behavior (Garthe et al., 2015; Kim et al., 2003; Nelis et al., 2018; Reitz et al., 2006; Wang & Kenny, 2014b). Based on Burke and colleagues’ (2008) postulation that there is a greater influence of child variables on parenting behavior than of parenting behavior on child variables, the following literature review aims to help answer the previously posed question: *How do children also contribute to parent-child interactions?* Note that this section contains many gaps, lending continued support for the need to longitudinally explore such associations within an early adolescent sample. Refer back to Figure 3 for a summary of the literature review, which both highlights common patterns and demonstrates gaps in literature.

**Negative Variables**
Longitudinal studies demonstrate positive associations between measures of early adolescent internalizing problems as a predictor and later parenting behavior such as corporal punishment (Kim et al., 2003; Wang & Kenny, 2014b), inconsistent discipline (Kim et al., 2003), and poor monitoring and supervision (Garthe et al., 2015). In particular, Wang and Kenny’s (2014b) longitudinal study provided support that age 12 early adolescents’ internalizing problems predicted increased parental corporal punishment at age 14. In Kim and colleagues’ (2003) study, in comparison to those who did not report internalizing problems, those individuals reporting internalizing problems in late childhood ($M$ age = 10.5) later reported an increase in parental “harsh-inconsistent discipline” during early adolescence ($M$ age = 12.3). Of particular note, the operational definition of “harsh-inconsistent discipline” as presented in the study suggests a fusion between both corporal punishment and inconsistent discipline, including being yelled at, locked out of the house, spanked, or hit (Kim et al., 2003). Thus, the current study will cast clarity on how each of these parenting behaviors (i.e., corporal punishment and inconsistent discipline) is uniquely temporally related with each dimension of affect. Furthermore, Garthe et al.’s (2015) investigation of fifth ($M = 10.72$) and eighth ($M = 13.67$) grade students demonstrated that early adolescents’ internalizing problems during the first wave of data collection predicted poorer monitoring and supervision at later time points. In contrast to the aforementioned longitudinal findings, one cross-sectional study investigated early male adolescents’ ($M$ age = 13.64) NA as a predictor of the APQ parenting scales (Latzman et al., 2009). Latzman and his colleagues (2009) found that early male adolescents’ NA positively predicted the parenting behaviors of inconsistent
discipline and poor monitoring and supervision but did not indicate a relationship with corporal punishment.

There are also longitudinal studies demonstrating negative associations between early adolescent NA and internalizing problems with later parenting behavior such as parental involvement (Reitz et al., 2006) and positive parenting (Kim et al., 2003; Nelis et al., 2018). For instance, Reitz et al. (2006) conducted a longitudinal study utilizing a large sample of early adolescents ages 13 and 14. They found a negative relation between early adolescents’ internalizing behavior and parental involvement (Reitz et al., 2006). Moreover, in early adolescents ages 11 to 14, Nelis et al. (2018) longitudinally evaluated the temporal directionality between positive parenting behavior, as defined by high parental enhancing (e.g., encouragement) and low parental dampening (e.g., discouragement), and internalizing problems. The authors found that baseline internalizing problems was negatively related with later positive parenting (Nelis et al., 2018). Kim and colleagues (2003) similarly found that increases in internalizing problems were negatively related with parental warmth. Cross-sectional studies found that early adolescents’ NA was negatively related to parental involvement (Latzman et al., 2003), though mixed findings exist regarding the link between NA and positive parenting, with one study demonstrating a negative relationship (Davenport et al., 2011) and another study finding no relationship at all (Latzman et al., 2009).

**Positive Variables**

Very few studies explored the effect of early adolescent PA or well-being on parenting behavior. Nevertheless, the already above-mentioned cross-sectional study using a sample of early adolescent males (M age = 13.64) did just that (Latzman et al.,
Latzman and his colleagues (2009) did not find a relationship between early adolescent males’ PA and corporal punishment, inconsistent discipline, or poor monitoring and supervision. Those same individuals’ PA positively predicted parental involvement and positive parenting. It is important to note that these findings are restricted to males, however, and so a more gender-inclusive sample is necessary. The only longitudinal study identified found that baseline PA of early adolescents ages 11 to 14 was positively related with later positive parenting (Nelis et al., 2018), but this sample only evaluates one of the five parenting behaviors being evaluated in the present study and so much more information is needed.

The Current Study

Despite there being a strong foundation of social learning theoretical knowledge (Bandura, 1965; Forgatch & Martinez, 1999; Patterson, 1982) and empirical research regarding parenting behavior in relation to measures of NA (Burton et al., 2018; Davenport et al., 2011; Johnson & Greenberg, 2013; Kim et al., 2003; Latzman et al., 2009; Nelis et al., 2018; Oldehinkel et al., 2006; Schwartz et al., 2017; Turner & Finkelhor, 1996; Wang & Kenny, 2014b; Wang et al., 2019; Yap et al., 2014) and PA (Burton et al., 2018; Latzman et al., 2009; Nelis et al., 2018; for summary of literature review, see Figure 3), significant gaps remain apparent. Specifically, most of the studies have been cross-sectional (Burton et al., 2018; Davenport et al., 2011; Johnson & Greenberg, 2013; Latzman et al., 2009; Oldehinkel et al., 2006; Turner & Finkelhor, 1996; Wang et al., 2019; Yap et al., 2014), and those that are longitudinal either do not include measures of PA (Kim et al., 2003; Schwartz et al., 2017; Wang & Kenny, 2014b), combine multiple parenting behaviors into one construct (Johnson & Greenberg, 2013;
Kim et al., 2003), or only focus on the construct of positive parenting (Nelis et al., 2018). Thus, in summation, the goal of the present study is to contribute to current literature by being the first to longitudinally examine the relation between early adolescents’ negative and positive affect and the specific parenting behaviors of and within effective discipline (i.e., corporal punishment, inconsistent discipline), positive involvement (i.e., parental involvement), monitoring (i.e., poor monitoring and supervision), and social skills encouragement (i.e., positive parenting).

There are therefore two general research questions: (1) How are parenting behaviors (e.g., corporal punishment, inconsistent discipline, parental involvement, poor monitoring and supervision, and positive parenting) associated with later early adolescent negative and positive affect? And, (2) how is early adolescent negative and positive affect associated with later parenting behaviors (e.g., corporal punishment, inconsistent discipline, parental involvement, poor monitoring and supervision, and positive parenting)? To investigate these questions, early adolescents reported on measures of parenting behavior and affect at two time-points. Based on the literature review and bearing in mind that not all parent-child interactions are created equally and therefore may vary in terms of their significance or lack thereof (Reid et al., 2002), the following hypotheses are conceptually illustrated in Figure 4. Hypotheses regarding the first research question are as follows:

a) Baseline measures of adolescent-reported corporal punishment, inconsistent discipline, and poor monitoring and supervision will be positively associated with early adolescent NA at the second timepoint, while baseline measures of adolescent-
reported parental involvement and positive parenting will be negatively associated with early adolescent NA at the second timepoint.

b) Baseline measures of adolescent-reported corporal punishment, inconsistent discipline, and poor monitoring and supervision will not be associated with early adolescent PA at the second time point, while baseline measures of adolescent-reported parental involvement and positive parenting will be positively associated with early adolescent PA at the second timepoint.

Hypotheses to the second research question are as follows:

a) Baseline early adolescent NA will be positively associated with adolescent-reported corporal punishment, inconsistent discipline, and poor monitoring and supervision at the second timepoint, while baseline early adolescent PA will not be associated with adolescent-reported corporal punishment, inconsistent discipline, and poor monitoring and supervision at the second timepoint.

Baseline early adolescent NA will be negatively associated with adolescent-reported parental involvement and positive parenting at the second timepoint, while baseline early adolescent PA will be positively associated with adolescent-reported parental involvement and positive parenting at the second timepoint.
CHAPTER II

METHOD

Participants

Altogether, 331 early adolescents were recruited from three public and two private Catholic/parochial middle schools located in three school districts in a Southern state. Four schools were located in urban areas while one public school was located in a rural area. After inviting 707 students to participate, 350 were granted parent permission and provided assent (participation rate: 47.38%), though 6 were excluded due to missing data and 13 outliers were removed producing a sample size of 331. Of the total sample of 331 participants, 65.3% (n = 216) participated in both Waves 1 and 2. An examination of demographic differences to determine whether the data was missing at random or not is provided in the preliminary analyses of the results section. There were no exclusion criteria or incentives for participation. Of the participating adolescents, 51.7% identified as male and 48.3% identified as female. The mean age of all participating adolescents was 12.62 (SD = 0.99) at baseline, with 34.4% in 6th grade, 25.7% in 7th grade, and 39.9% in 8th grade. Moreover, the reported race/ethnicities in this sample were as follows: 76.1% European American, 11.2% African American, 1.8% Latina/o, 1.8% Asian/Pacific Islander, .9% Native American/Alaska Native, and 7.9% other race/ethnicity. Of particular note, this sample is representative of the state of Kentucky according to the most recent report by the U.S. Census Bureau (2018).
Procedure

After the Institutional Review Boards of the university and the participating school districts approved the study, principals from the middle schools in those districts were invited via email to participate ($N = 115$). In the schools that decided to participate ($N = 5$), parental permission slips were disbursed to students 2 to 3 weeks prior to data collection. Only adolescents with parental permission to partake in data collection were invited to complete the questionnaires. During both Waves 1 and 2 (mean time between Waves 1 and 2: 8.2 weeks), students completed the questionnaires during regular class time and researchers were available to answer students’ questions. This data collection method is akin to majority of the studies presented in the literature review in terms of adolescent-reported parenting behaviors (Burton et al., 2018; Johnson & Greenberg, 2013; Kim et al., 2003; Latzman et al., 2009; Nelis et al., 2018; Oldehinkel et al., 2006; Turner & Finkelhor, 1996; Wang et al., 2019; Yap et al., 2014) and of self-reported measures of internalizing problems (Burton et al., 2018; Davenport et al., 2011; Johnson & Greenberg, 2013; Latzman et al., 2009; Nelis et al., 2018; Oldehinkel et al., 2006; Schwartz et al., 2017; Turner & Finkelhor, 1996; Wang & Kenny, 2014b; Wang et al., 2019; Yap et al., 2014).

Instruments

**Alabama Parenting Questionnaire (APQ)**

The Alabama Parenting Questionnaire (APQ) uses 42 child-reported items to measure parenting behavior (Frick, 1991). Based on Frick’s (1991) five-factor structure, the APQ includes five subscales, including: Corporal Punishment (3 items, e.g. “Your parents slap you when you have done something wrong”), Inconsistent Discipline (6
items, e.g. “Your parent threatens to punish you and then does not do it”), Parental Involvement (10 items, e.g. “You play games or do other things with your parent”), Poor Monitoring and Supervision (10 items, e.g. “You fail to leave a note or let your parent know where you are going”), and Positive Parenting (6 items, e.g. “Your parent tells you that you are doing a good job”). Additionally, the APQ has seven extra items measuring disciplinary strategies different from corporal punishment, which are included as distractors to buffer against the negative connotation corporal punishment may have. Those items were not included in the analyses. Early adolescents rated the parenting behavior of the guardian who they say they spend the most amount of time with (e.g. (foster or step)dad, (foster or step)mom, grandfather, grandmother, or other caretaker) on a five-point scale (1 = “never” to 5 = “always”). To calculate a score for each subscale, the item scores were summed for each parenting behavior type.

Additionally, there is multi-informant evidence that adolescent-reported parenting behavior is significantly correlated with parent-reported parenting behavior, thus indicating that adolescents typically report parenting behavior with accuracy (Barry et al., 2008; for review, see Morsbach & Prinz, 2006). In particular, in a sample of 98 parent-child dyads, Barry et al. (2008) demonstrated a statistically significant correlation between parent- and adolescent-reported positive parenting ($r = .44; p < .001$) and parent- and adolescent-reported negative parenting ($r = .32; p < .01$), reporting that—despite their small sample—their effect size was small to moderate. Furthermore, Essau, Sasagawa, and Frick (2006) explain that adolescent-reported parenting behavior in fact protects against socially desirable responses on behalf of the parent. Authors have repeatedly found that the APQ demonstrates good convergent and divergent validity in
that the subscales are appropriately associated with measures of aggressive (i.e., The NIMH Diagnostic Interview Schedule for Children – Version 2.3, Version 4), delinquent (i.e., Self-Report of Delinquency Scale), and internalizing (i.e., Behavior Assessment System for Children) behavior (Essau et al., 2006; Frick et al., 1999). In children older than 9, Frick and his colleagues (1999) also support the APQ’s validity based on intercorrelations and item-total correlations across assessment modalities (e.g., over the phone, pen and paper) and similarity of age trends across the different modalities. In relation to reliability, a recent study utilizing adolescent responses on the APQ in a same-age sample reported Cronbach’s alphas of .83 for Corporal Punishment, .67 for Inconsistent Discipline, .84 for Parental Involvement, .77 for Poor Monitoring and Supervision, and .83 for Positive Parenting (Burton et al., 2018). According to best practices, all subscales are considered acceptable to good with the exception of Inconsistent Discipline which is questionable (Fabrigar et al., 1999; Henson & Roberts, 2006). The APQ subscales’ internal reliability within the given sample are presented in Table 1. All internal consistencies were considered adequate (α > 0.7), so no subscales were subject for removal from the analyses.

**Positive and Negative Affect Schedule for Children (PANAS-C)**

To measure positive and negative affect in the participating adolescents, the 30-item Positive and Negative Affect Schedule for Children (PANAS-C; Laurent et al., 1999) was used. Among adolescents, the PANAS-C has repeatedly yielded a two-factor structure comprised of the Negative Affect (15 items, e.g. “ashamed,” “upset,” and “guilty”) and Positive Affect (15 items; e.g. “joyful,” “energetic,” and “lively”) subscales (Laurent et al., 1999; Lonigan et al., 1999). In relation to the extent that they have felt an
emotion over the past week, those completing the survey self-reported responses via a Likert style five-point scale (from 1 = “very slightly or not at all” to 5 = “extremely”). To calculate the scores for the Positive Affect and Negative Affect subscales, the 15 items from each subscale were summed.

In reviews of the PANAS-C among adolescents, researchers have found adequate convergent and discriminant validity between other self-report depressive (i.e., Beck Depression Inventory, Children’s Depression Inventory) and anxiety (i.e., Revised Children’s Manifest Anxiety Scale, State-Trait Anxiety Inventory for Children) symptom measures (Laurent et al., 1999; Lonigan et al., 1999). During scale development of the PANAS-C, the researchers found internal consistencies of .90 for Positive Affect and .94 for Negative Affect, later finding .89 and .92 respectively in a replication study (Laurent et al., 1999). According to best practice (Fabrigar et al., 1999; Henson & Roberts, 2006), these internal consistencies are considered good. The PANAS-C subscales’ internal reliability and test-retest reliability within the given sample are reported in Table 1. As all internal consistencies were considered adequate ($\alpha > 0.7$), no subscales were subject for removal from the analyses.

**Analytic Plan**

To begin, preliminary analyses were conducted to check initial limitations and basic assumptions among the independent and dependent variables. Then, measures of central tendencies and correlations between each of the study variables at both waves were examined. Internal consistencies of the APQ subscales and PANAS-C subscales at both waves were assessed through use of Cronbach’s alpha coefficients. Then, given that
all assumptions have been met, seven multiple regression analyses were calculated using SPSS 27.

Based on the literature review, the first general question that was posed is how baseline adolescent-reported parenting behavior (as measured by APQ Corporal Punishment, Inconsistent Discipline, Parental Involvement, Poor Monitoring and Supervision, and Positive Parenting) is associated with later early adolescent affect (as measured by PANAS-C Negative Affect and Positive Affect). To answer this question, two multiple linear regressions were necessary. In the first, the five APQ scale scores at Wave 1 were input as the independent variables with PANAS-C Negative Affect scale scores at Wave 2 as the dependent variable. In the second, the five APQ scale scores at Wave 1 were input as the independent variables with PANAS-C Positive Affect scale scores at Wave 2 as the dependent variable. In both of these questions, respective dependent variables at Wave 1 (e.g., PANAS-C Negative or Positive Affect scale scores) were controlled for. Further, in these two multiple regression analyses, Bonferroni correction was used to protect against inflation of family alpha levels. In particular, alongside the evaluation of $R^2$ and $\beta$, the alpha level was adjusted to .025 per linear regression (.05/2).

Based on the literature review, the second general question that was posed is how baseline early adolescent affect (as measured by PANAS-C Negative Affect and Positive Affect scale scores) is associated with later adolescent-reported parenting behavior (as measured by APQ Corporal Punishment, Inconsistent Discipline, Parental Involvement, Poor Monitoring and Supervision, and Positive Parenting). To answer this question, five multiple linear regressions were necessary. First, the two PANAS-C scale scores at Wave
1 were input as the independent variables with APQ Corporal Punishment scale scores at Wave 2 as the dependent variable. Second, the two PANAS-C scale scores at Wave 1 were input as the independent variables with APQ Inconsistent Discipline scale scores at Wave 2 as the dependent variable. Third, the two PANAS-C scale scores at Wave 1 were input as the independent variables with APQ Parental Involvement scale scores at Wave 2 as the dependent variable. Fourth, the two PANAS-C scale scores at Wave 1 were input as the independent variables with APQ Poor Monitoring and Supervision scale scores at Wave 2 as the dependent variable. Fifth, the two PANAS-C scale scores at Wave 1 were input as the independent variables with APQ Positive Parenting scale scores at Wave 2 as the dependent variable. In each of these questions, analyses will control for the respective dependent variables at Wave 1 (e.g., APQ Corporal Punishment, Inconsistent Discipline, Parental Involvement, Poor Monitoring and Supervision, or Positive Parenting).

Moreover, in these five multiple regressions, Bonferroni correction was used to protect against inflation of family alpha levels. Specifically, alongside the evaluation of $R^2$ and $\beta$, the alpha level was adjusted to .01 per linear regression (.05/5
CHAPTER III

RESULTS

Preliminary analyses were conducted to check initial limitations and basic assumptions among the independent and dependent variables. Measures of central tendencies, internal consistencies of the APQ and PANAS-C subscales, and correlations between each of the study variables at both waves were examined. Then, seven multiple regression analyses were calculated using SPSS 27.

Preliminary Analyses

In order to avoid Type I and Type II error rates, best practices were followed in handling limitations due to missing data, defined as those cases missing more than 50% of item-level responses on each scale (Osborne, 2013). In particular, 6 cases were excluded because participants missed 22 or more items on the APQ and/or 16 or more items on the PANAS-C. In line with Osborne’s (2013) recommendations, 13 outliers were identified visually via boxplot and removed accordingly.

Further, as data collection occurred at two time points, attrition rates (i.e., those who participated in only one wave of data collection) were examined. Of the total sample of 331 participants, 65.3% (n = 216) participated in both Waves 1 and 2. Of the 304 students who were present at school to complete Wave 1 baseline data collection, 73.4% (n = 223) were also present for Wave 2, meaning that 26.6% (n = 88) of participants in Wave 1 were absent from or changed schools when Wave 2 follow-up data collection occurred. Of the 243 students who were present at school to complete Wave 2 follow-up
data collection, 88.9% (n = 216) were previously present for Wave 1, meaning that 11.1% (n = 27) of participants in Wave 2 were absent from or changed schools since Wave 1 baseline data collection occurred.

Based on the recommendations set forth by Osborne (2013), to determine whether the data were missing at random or not, two dummy variables were created to represent (1) missing data from Wave 1 and (2) missing data from Wave 2. Then, t-tests were conducted to examine whether there were demographic differences between individuals who participated in both Wave 1 and 2 of the study (or, the “non-missing group”) versus those who only participated in either Wave 1 or Wave 2 of the study (or, the “missing group”). In comparison to those who were surveyed at both time points, those who only participated at Wave 1 were demographically similar in terms of sex (t(302) = 6.11, p = 0.542), ethnicity (t(195) = 1.13, p = .26), and grade level (t(302) = 1.32, p = .189), but differed in terms of school representation (i.e., how many students attended each of the five schools; t(227) = 4.45, p < .001). In comparison to those who were surveyed at both time points, those who only participated at Wave 2 were demographically similar in terms of grade level (t(35) = -0.38, p = .709) and school representation (t(241) = -0.33, p = .740), but differed in terms of sex (t(36) = 3.09, p = .004) and ethnicity (t(240) = -2.16, p = .032).

Following this, t-tests were conducted to test whether there was a difference between the non-missing group versus the missing group in terms of mean APQ and PANAS scores. In comparison to those who were surveyed at both time points, those who only participated at Wave 1 reported similar degrees of APQ Corporal Punishment (t(137.24) = -1.51, p = .134), Inconsistent Discipline (t(302) = -0.7, p = .946), Parental
Involvement ($t(302) = 0.69, p = .490$), Poor Monitoring and Supervision ($t(302) = -0.31, p = .755$), and Positive Parenting ($t(302) = 1.79, p = .075$) scale scores, as well as PANAS-C Positive Affect scale scores ($t(302) = 0.70, p = .482$). Those who only participated at Wave 1 differed from those who participated in both waves in terms of endorsing higher PANAS-C Negative Affect scale scores ($t(131.25) = -2.24, p = .03$).

In comparison to those who were surveyed at both time points, those who only participated at Wave 2 reported similar degrees of APQ Inconsistent Discipline ($t(241) = -1.14, p = .254$), Parental Involvement ($t(241) = 1.29, p = .200$), and Positive Parenting ($t(241) = 1.77, p = .078$) scale scores, as well as PANAS-C Negative ($t(241) = -1.07, p = .285$) and Positive Affect scale scores ($t(241) = 1.24, p = .215$). Those who only participated at Wave 2 differed from those who participated in both waves in terms of endorsing higher APQ Corporal Punishment ($t(28.16) = -2.68, p = .012$) and Poor Monitoring and Supervision ($t(241) = -2.33, p = .021$) scale scores.

As the data appear to be missing not at random, so as not to lose such critical data, ten imputations were estimated via multiple imputations conducted through SPSS 27 to generate missing responses. Rather than conducting five iterations of multiple imputation, which is standard, the number of iterations was increased under recommendations that increasing to ten iterations leads to more stabilized findings (Rubin, 1987; Wang & Johnson, 2019). Moreover, because SPSS 27 only pools imputed data for the $\beta$-coefficient, best practices were followed such that the $F$-value and total variance were calculated by averaging each of the ten iterations of the imputed findings (Allison, 2000). All ten iterations of the imputed $F$-value and total variance can be located in Appendix A.

**Basic Assumptions**
**Independence.** Intraclass correlations (ICC) were calculated to determine whether there was an effect of the clustering variable on the outcome variables (Garson, 2019). The effect of the level 2 clustering variable (i.e., school) proved nonsignificant via the ICCs (see Table 1), suggesting that multilevel modeling was not necessary. Moreover, some students may have been nested within families (e.g., siblings). As the data collection was done to anonymously protect the identities, this information was not provided, which could be a limitation. Nevertheless, based on the finding that all Durbin-Watson statistics fall between 1 and 2 (Osborne, 2013), there is reasonable belief that responses maintain independence of each other.

**Linearity.** Based on examination of the data via scatterplot, there appears to be a linear relationship between the independent and dependent variables (e.g., parenting behaviors and early adolescent affect). Therefore, the assumption of linearity has been reasonably met.

**Normality.** Initial examination of skew values, histogram plots, and Kolmogorov-Smirnov (K-S) and Shapiro-Wilk (S-W) tests suggested that scores were not normally distributed (Osborne, 2013). The APQ Poor Monitoring and Supervision, APQ Inconsistent Discipline, APQ Corporal Punishment, and PANAS-C Negative Affect scores at Waves 1 and 2 were positively skewed, while the APQ Parental Involvement, APQ Positive Parenting, and PANAS-C Positive Affect scores at Waves 1 and 2 were negatively skewed. Both K-S and S-W inferential tests of normality were significant across measures, subscales, and waves of data collection. As the sample was not initially normally distributed, data were Box Cox transformed. In particular, three versions of the data set were compared: (1) imputed data without Box Cox transformations, (2) data
which were imputed first then Box Cox transformed, and (3) data which were Box-Cox transformed first then imputed. After comparing all three versions of the data set, there were no differences in the findings and so the least manipulated version of the data was used.

**Multicollinearity.** Pearson correlation coefficients between variables are not too highly correlated \((p < 0.8; \text{Berry} \ & \text{Feldman, 1985})\), as is presented in the correlation matrix (see Table 3). Based on recommendations by Nathans et al. (2012), the VIFs are well below 10 and tolerance statistics are above 0.2. Based on these results, the assumption that data do not show problematic multicollinearity has been met.

**Homoscedasticity.** Using scatterplots to evaluate residuals versus predicted values, there does not appear to be a clear pattern within the distribution. Thus, the assumption that data show homoscedasticity has been met.

**Central Tendencies, Internal Consistencies, and Correlations**

Measures of central tendencies and internal consistencies for all scales at both waves are reported in Table 2. All internal consistencies were considered adequate \(\alpha > 0.7\), so no subscales were subject for removal from the analyses. Moreover, correlations between all scales in both waves are reported in Table 3. Within Wave 1, there were (a) positive correlations between PANAS-C Negative Affect and APQ Corporal Punishment and Inconsistent Discipline scale scores, (b) a negative correlation between PANAS-C Negative Affect and APQ Positive Parenting scale scores, and (c) positive correlations between PANAS-C Positive Affect and APQ Parental Involvement and Positive Parenting scale scores. Within Wave 2, there were (a) positive correlations between PANAS-C Negative Affect and APQ Corporal Punishment and Poor Monitoring and
Supervision scale scores, (b) a negative correlation between PANAS-C Negative Affect and APQ Parental Involvement and Positive Parenting scale scores, (c) a positive correlation between PANAS-C Positive Affect and APQ Parental Involvement and Positive Parenting scale scores, and (d) a negative correlation between PANAS-C Positive Affect and APQ Poor Monitoring and Supervision scale scores. Between waves, notable findings include (a) a positive correlation between APQ Inconsistent Discipline at Wave 1 and PANAS-C Negative Affect scale scores at Wave 2, (b) positive correlations between APQ Parental Involvement and Positive Parenting scale scores at Wave 1 and PANAS-C Positive Affect scale scores at Wave 2, and (c) positive correlations between PANAS-C Positive Affect scale scores at Wave 1 and APQ Parental Involvement and Positive Parenting scale scores at Wave 2.

Test of Research Questions

In order to examine the research questions, statistical findings conducted via multiple regressions are presented in Tables 4, 5, and 6. In particular, the $F$-value and total variance ($R^2$) explained by affect or parenting behaviors at wave 2 by parenting behaviors or affect at wave 1, respectively, is presented in Table 4. Further, more specific data identifying which statistically significant relationships exist between individual affect and parenting behaviors are provided in Tables 5 and 6.

Research Question #1: How are Parenting Behaviors Associated with Later Early Adolescent Negative and Positive Affect?

Negative Affect. The proposed hypotheses stated that APQ Corporal Punishment, Inconsistent Discipline, and Poor Monitoring and Supervision scale scores at Wave 1 would be positively associated with PANAS-C Negative Affect scale scores at Wave 2,
while reports of APQ Parental Involvement and Positive Parenting scale scores at Wave 1 would be negatively associated with PANAS-C Negative Affect scale scores at Wave 2. Contrary to the hypotheses, after Bonferroni adjusting the alpha level to .025 per regression (.05/2), there were no statistically significant associations between APQ parenting behavior scale scores at Wave 1 and PANAS-C Negative Affect scale scores at Wave 2 ($F(5, 325) = 3.30, p = .05$) with only 5% of the total variance in PANAS-C Negative Affect scale scores at Wave 2 explained by all five APQ parenting behavior scale scores at Wave 1.

**Positive Affect.** The proposed hypotheses stated that APQ Corporal Punishment, Inconsistent Discipline, and Poor Monitoring and Supervision scale scores at Wave 1 would not be associated with PANAS-C Positive Affect scale scores at Wave 2, while reports of APQ Parental Involvement and Positive Parenting scale scores at Wave 1 would be positively associated with PANAS-C Positive Affect scale scores at Wave 2. After Bonferroni adjusting the alpha level to .025 per regression (.05/2), there was a statistically significant association between the APQ parenting behavior scale scores at Wave 1 and PANAS-C Positive Affect scale scores at Wave 2 ($F(5, 325) = 12.40, p < .001$) with 16% of the total variance in PANAS-C Positive Affect scale scores at Wave 2 explained by all five APQ parenting behavior scale scores at Wave 1. As was proposed, APQ Parental Involvement scale scores at Wave 1 were positively associated with PANAS-C Positive Affect scale scores at Wave 2 ($p < .01$). As was also proposed, there were no significant associations between APQ Corporal Punishment ($p = .20$), Inconsistent Discipline ($p = .34$), and Poor Monitoring and Supervision ($p = .41$) scale scores at Wave 1 and PANAS-C Positive Affect scale scores at Wave 2. However, in
contrast to the hypotheses, there was not a significant association between APQ Positive Parenting scale scores at Wave 1 and PANAS-C Positive Affect scale scores at Wave 2 ($p = .59$).

Research Question #2: How is Early Adolescent Negative and Positive Affect Associated with Later Parenting Behaviors?

Corporal Punishment, Inconsistent Discipline, and Poor Monitoring and Supervision. The proposed hypotheses stated that PANAS-C Negative Affect scale scores at Wave 1 would be positively associated with APQ Corporal Punishment, Inconsistent Discipline, and Poor Monitoring and Supervision scale scores at Wave 2, while PANAS-C Positive Affect scale scores at Wave 1 would not be associated with APQ Corporal Punishment, Inconsistent Discipline, and Poor Monitoring and Supervision scale scores at Wave 2. Both in line and in contrast with these hypotheses, after Bonferroni adjusting alpha level to .01 per regression (.05/5), there were no significant associations between PANAS-C affect scale scores at Wave 1 and APQ Corporal Punishment ($F(2, 328) = 4.59, p = .09$), Inconsistent Discipline ($F(2, 328) = 4.67, p = .08$), and Poor Monitoring and Supervision ($F(5, 328) = 3.38, p = .24$) scale scores at Wave 2. In particular, only 3% of the total variance in APQ Corporal Punishment and APQ Inconsistent Discipline scale scores at Wave 2 were explained by the PANAS-C affect scale scores at Wave 1, and only 2% of the total variance in APQ Poor Monitoring and Supervision scale scores at Wave 2 were explained by the PANAS-C affect scale scores at Wave 1.

Parental Involvement and Positive Parenting. The proposed hypotheses stated that PANAS-C Negative Affect scale scores at Wave 1 would be negatively associated
with APQ Parental Involvement and Positive Parenting scale scores at Wave 2, while PANAS-C Positive Affect scale scores at Wave 1 would be positively associated with APQ Parental Involvement and Positive Parenting scale scores at Wave 2. After Bonferroni adjusting alpha level to .01 per regression (.05/5), there were statistically significant associations between the PANAS-C affect scale scores at Wave 1 and APQ Parental Involvement ($F(2, 328) = 36.19, p < .001$) and Positive Parenting ($F(2, 328) = 33.02, p < .001$) scale scores at Wave 2. In particular, 18% of the total variance in APQ Parental Involvement scale scores at Wave 2 was explained by the PANAS-C affect scale scores at Wave 1, and 17% of the total variance in APQ Positive Parenting scale scores at Wave 2 were explained by the PANAS-C affect scale scores at Wave 1. As proposed, PANAS-C Positive Affect scale scores at Wave 1 were positively associated with APQ Parental Involvement ($p < .001$) and APQ Positive Parenting ($p < .001$) scale scores at Wave 2. In contrast to the hypotheses, there were no significant associations between PANAS-C Negative Affect scale scores at Wave 1 and APQ Parental Involvement ($p = .97$) nor Positive Parenting ($p = .47$) scale scores at Wave 2.
CHAPTER IV  
DISCUSSION

Although there is a strong foundation based in the SLT-P (Bandura, 1965; Forgatch & Martinez, 1999; Patterson, 1982) and empirical research regarding parenting behavior in relation to measures of NA (Burton et al., 2018; Davenport et al., 2011; Johnson & Greenberg, 2013; Kim et al., 2003; Latzman et al., 2009; Nelis et al., 2018; Oldehinkel et al., 2006; Schwartz et al., 2017; Turner & Finkelhor, 1996; Wang & Kenny, 2014b; Wang et al., 2019; Yap et al., 2014) and PA (Burton et al., 2018; Latzman et al., 2009; Nelis et al., 2018), significant gaps remain apparent. This study contributes to current literature by being the first to longitudinally examine the potentially bidirectional relations between early adolescents’ negative and positive affect and specific parenting behaviors through the developmental lens of the SLT-P (Bandura, 1965; Forgatch & Martinez, 1999; Patterson, 1982).

Perhaps, the core finding of the current study is the emphasis on positive affect and its relationship with helpful parenting behaviors like parental involvement and positive parenting in stark contrast to the lack of associations between negative affect and parenting behavior altogether. Specifically, consistent with previous literature (Bandura, 1985; Burton et al., 2018; Latzman et al., 2009; Patterson, 1982; Wang et al., 2019) and the proposed hypotheses, there was a positive and bidirectional relationship between PA and parental involvement. This should come as no surprise since, according to the SLT-P, Patterson (1982) suggested that positive behavior is maintained in response to the
anticipation of rewards, causing a child—or an adult—to execute or inhibit behavior accordingly. Because PA is defined as “joyful,” “interested,” and “lively,” it is therefore logical that parents may want to be more involved with children who embody these qualities, thereby rewarding their PA. It is equally logical that children are inherently rewarded by quality time spent with their parent and respond with joy, interest, and enthusiasm. Thus, clinicians leading parent-focused interventions like the Triple P Positive Parenting Program (Sanders et al., 2014) or parenting psychoeducation groups should intentionally promote parental involvement, as this might create a positive and self-reinforcing cycle between parents and child.

Also consistent with previous literature (Latzman et al., 2009; Nelis et al., 2018) and the proposed hypothesis, there was a positive relationship between PA at baseline and positive parenting at a later timepoint. In contrast with the hypothesis, the association is unidirectional rather than bidirectional, as positive parenting at baseline PA at a later timepoint. This finding lends support to Burke and colleagues’ (2008) proposal that child affect may in fact have more impact on parenting behavior than the other way around. If this is true, it would be clinically beneficial to focus on early adolescent-focused interventions—such as individual therapy—with the intention of increasing PA. Targeting early adolescents’ PA, thereby increasing positive parenting behaviors, is important considering that positive parenting behavior is positively associated with academic achievement (Waters et al., 2019) and negatively associated with adverse social, emotional, and behavioral outcomes in adolescents (i.e., poor interpersonal relationships, poor emotional intelligence, and increased internalizing and externalizing behavior; Sanders et al., 2014).
Once again in line with previous literature (Burton et al., 2018; Latzman et al., 2009) and the proposed hypotheses, PA explained only small portions of the variance in later corporal punishment, inconsistent discipline, and poor monitoring and supervision and these relations were not significant. While this is consistent with previous albeit limited research (Burton et al., 2018; Latzman et al., 2009), this study’s findings have notable implications considering that longitudinal conclusions can now be drawn. Moreover, the findings are theoretically consistent with Reid et al.’s (2002) claim that not all parent-child interactions are created equal, and that some may be more salient than others. Given their associations with deleterious outcomes like externalizing behavior (Reid et al., 2002) and sexual risk-taking (Dittus et al., 2015), clinical interventions should continue to replace corporal punishment with alternative disciplinary methods and increase the consistency and quality of discipline, monitoring, and supervision. However, if the intention is purely to increase positive parent-child interactions, one behavior clinicians should concentrate their efforts on promoting is parental involvement and/or specifically targeting PA in early adolescent-focused interventions.

In contrast with the proposed hypotheses, there were no relationships between NA and any of the five parenting behaviors posing the question, why is PA associated with parenting behavior while NA is not? One possible explanation is that NA and PA are two fundamentally different constructs rather than two opposite sides of the same spectrum. In fact, Clark and Watson (1991) theorized in their tripartite model that patterns of NA and PA, along with physiological hyperarousal, are indicative of certain internalizing behavior like depression and anxiety. Where depression is conceptualized as the combination of high levels of NA and low levels of PA, anxiety is conceptualized as the
combination of high levels of NA and physiological hyperarousal regardless of one’s level of PA (Clark & Watson, 1991). In other words, for example, low PA does not equate to high NA but instead to anhedonia, the inability to feel pleasure—a concept that NA does not appear to measure at all. It is therefore unsurprising that other researchers have found relationships between their study variables, such as teaching behavior (Barnard et al., 2017; Cauley, 2018) and peer social experiences (Martin & Huebner, 2007; Suldo et al., 2015), with one measure of affect and not the other.

Moreover, as the first study to examine the temporal directionality of these variables, the context of these relationships may be more complex than the current study—which contextually focuses on the early adolescent developmental period—captures. Although the investigation of parenting behavior and affect within the context of early adolescence is regarded as a strength of the study, there are infinite factors to consider, some of which future researchers may want to include. For example, one longitudinal study found that the impact of corporal punishment on youth outcomes varied within the context of other parenting behaviors in accordance with Baumrind’s (1971) theoretical parenting typologies (Simons et al., 2013). The authors explicated that corporal punishment continues to be used with a majority of Americans, so they sought to determine the impact of corporal punishment within parenting styles based on the amount of warmth and control exercised (Simons et al., 2013). While the authors discourage corporal punishment for a wealth of reasons, they found that parents who exercised high warmth and control (i.e., an authoritative parenting style) and also used corporal punishment did not predict child’s depressive symptoms any more than those with an authoritative parenting style who did not use corporal punishment (Simons et al., 2013).
In contrast, they found that children of parents who exercised low warmth and high control (i.e., an authoritarian parenting style) and used corporal punishment reported the highest levels of depressive symptoms, including when compared to authoritarian parents who did not use corporal punishment (Simons et al., 2013). However, this study was only conducted with African American youth ranging in age ($M = 10.5$ at wave 1, 12.5 at wave 2, 15 at wave 3; Simons et al., 2013). Perhaps, the current study’s examination of the relationship between corporal punishment and affect was too simplistic. Future studies should combine the strengths of both the current study and of Simons et al.’s (2013) to investigate the context of corporal punishment within a constellation of interacting, mediating, or moderating parenting behaviors in relation to early adolescents’ affect in a more generalizable sample.

Reflecting on the current study’s findings, future studies may also want to consider contextual factors accounting for the lack of associations between inconsistent discipline and NA. As was initially outlined, literature examining this relationship appears to be particularly limited. Studies either collapsed the construct of inconsistent discipline into an overarching category, such as “harsh-inconsistent discipline” (Kim et al., 2003) or “General Child Management” (Johnson & Greenberg, 2013), or the studies were cross-sectional (Burton et al., 2018; Gaertner et al., 2010) and thus did not examine the temporal directionality. Notably, there is an extant literature base suggesting a positive relationship between inconsistent discipline and externalizing behaviors in children and adolescents (Duncombe et al., 2012; Gryczkowski et al., 2010; Stanger et al., 2004). Perhaps, this relationship may shed a light on why there is no significant link with internalizing problems (i.e., NA), such that in comparison externalizing behavior
may simply evoke more opportunities for discipline—consistently or otherwise. Moreover, Dunncombe et al. (2012) postulated that parents’ discipline may become increasingly less consistent as a result of attempting different methods to respond to externalizing behavior. Considering that internalizing problems do not typically require disciplinary intervention, it is logical that these variables are not significantly related. The literature highlighted a need for more nuanced research dissecting constructs that include—but do not explicitly focus on—inconsistent discipline. Indeed, the current study fulfilled this major gap, and future studies should continue parceling out overarching constructs of discipline as they more specifically relate to other contextual factors.

Further, in regard to poor monitoring and supervision, a study conducted by the Census Bureau (2021) found that 23% of U.S. children live in a single-parent, most often single-mother, household. Poverty rates for single-mother families are five times higher than married-couple families, a statistic further explained by the wage gap that mothers earn $0.75 for every father’s $1 (National Women’s Law Center, 2021). This means that not only are children in a single-mother family often facing lack of monitoring and supervision entirely from one parent, but their second parent may be working longer days, sometimes even working a second job, thus decreasing the time spent at home providing supervision to their kids—and this does not account for the personal time that a single-parent may need to recover from working such radical hours. Looking at the relationship through this lens, early adolescents in single-mother households who are exposed to less monitoring and supervision may be more forgiving and therefore less affectively impacted. In fact, Burton et al. (2018) found that perceived benefits of
parentification, a family systems process that occurs when children take on parental roles such as in the case of less supervision within a single-parent household, mediated the relationship between NA and poor monitoring and supervision. This is only one of infinite contextual hypotheses, which future studies may want to consider.

Lastly, Oldehinkel et al. (2006) is one of few studies that also did not find significant associations between warm parenting behaviors (i.e., parental involvement, positive parenting) and internalizing problems, like NA. Given the developmentally appropriate, increasing importance placed on peers in the transition from late childhood to early adolescence, the authors investigated the role of friendship as a moderator within parent-child interactions (Oldehinkel et al., 2006). They determined that positive parenting behaviors and internalizing problems were unrelated when friendship quality was high, but negatively related when friendship quality was low, indicating that friendship quality may in fact serve as a buffer (Oldehinkel et al., 2006). Indeed, social development is an integral consideration when identifying contextual factors, so it is recommended that future studies recognize the impact of early adolescents’ increasingly complex support system and how it may or may not impact their affect and/or response to their parents’ behaviors.

**Strengths and Limitations**

Given the tendency to lump early adolescents within the overarching categories of either children or adolescents and given the remarkable cognitive development occurring within these crucial years (Cole et al., 2008), a major strength of this study is its focus on an early adolescent population. Considering that the prevalence of depressive episodes between 12 and 13 years of age nearly doubles and that nearly one-third of 13- and 14-
year-olds have been diagnosed with an anxiety disorder (NIMH, 2017b), it is especially
integral that the study evaluated such internalizing problems within the developmental
context of early adolescence. Moreover, in an effort to promote overall health as the
World Health Organization (2014) defines it, this study places equal emphasis on positive
variables as on negative ones.

Another strength of the current study is its longitudinal design, as it is one of the
first to contribute to knowledge regarding the directionality of these five particular
parenting behaviors and affect within early adolescence. In consideration of teens’
aforementioned remarkable development occurring across biological, cognitive, and
social-affective domains (Cole et al., 2008; Crone & Dahl, 2012), and given that reports
of anxiety and depressive symptoms continue to increase within adolescence (NIMH,
2017a, 2017b), researchers should apply the same longitudinal design to investigate the
association between parenting behavior and affect specifically in late adolescence.

In terms of the sample, this study was inclusive in its recruitment process,
including public and private Catholic/parochial schools in both urban and rural areas.
According to the U.S. Department of Education’s National Center for Education
Statistics (NCES; 2019), based on attendance at public versus private and urban versus
rural schools, students differ demographically in terms of race and ethnicity, two-parent
versus nontraditional households, guardians’ education level, fluency of speaking
English, level of exposure to community violence, and socioeconomic status. These are
all integral factors to consider when determining the generalizability of the sample and
therefore of the findings. Thus, one suggestion for future researchers is to continue
including diverse geographic demographics in their sample.
First, regarding limitations, approximately three-fourths of the sample identified as European American, with all other racial/ethnic groups making up the remainder. Though the sample was equally represented in terms of biological sex, future research should employ a more diverse racial/ethnic sample that better represents the population to encourage even greater generalizability of the findings.

Second, the study’s longitudinal design was characterized by high, nonrandom attrition with 65.3% of the total sample participating in both waves of data collection. Of the students who participated in Wave 1 baseline data collection, 73.4% were also present for Wave 2, while 88.9% of the students who participated in Wave 2 follow-up data collection were previously present for Wave 1. In comparison to those who were surveyed at both time points, those who only participated at Wave 1 differed in terms of which schools they attended, while those who only participated at Wave 2 differed in terms of sex and ethnicity. Once again, in comparison to those who were surveyed at both time points, those who only participated at Wave 1 differed in that they endorsed more negative affect, while those who only participated at Wave 2 differed in that they endorsed more corporal punishment and poor monitoring and supervision parenting behaviors. Adolescents who have unstable housing situations, often characterized by changing schools, are also more likely to experience mental health concerns (Smith et al., 2017). Thus, it is imperative to pay consideration to how attrition is impacting the generalizability of the findings.

Third, students may have been nested within families (e.g., siblings), but the data collection process was conducted such that participants’ identities were protected and so this information was not collected and therefore effects nested within families were not
examined. Fourth, because this data relied on student self-report, the participants’ judgment may have been impacted by perceptions of their parents’ behaviors, potentially leading to an overestimation of the relationships between affect and parenting behavior. Therefore, researchers may want to include a parent-report or external observations in future studies (Douglas, 2009). Fifth, although the Cronbach’s alphas were above .70 across all measures and subscales which is considered acceptable, attenuation could be a limitation thereby making the ability to find effects more difficult.

**Conclusions**

In summation, the purposes of the current study were to identify associations between parenting behavior and early adolescents’ affect, to gain clarity about the directionality of such associations, and ultimately to improve early adolescents’ overall health in line with the World Health Organization’s (2014) definition—“complete physical, mental, and social well-being”—rather than simply aiming for the “absence of disease.” The findings were consistent with Reid et al.’s (2002) theoretical claim that not all parent-child interactions are created equally, as evidenced by unique associations (e.g., directionality, statistical significance, explained variance) between each parenting behavior and early adolescents’ negative and positive affect. However, where Reid et al. (2002) found negative parent-child interactions (i.e., adverse parenting behavior in relation to externalizing behavior) to be particularly damaging, the current study found positive parent-child interactions (i.e., parental involvement and positive parenting in relation to PA) to be particularly helpful. Specifically, parental involvement and early adolescents’ PA are positively and bidirectionally related, whereas early adolescents’ PA is positively and unidirectionally related with later positive parenting behavior. As a
result, clinicians should intentionally promote parental involvement in parent-focused interventions while targeting an increase in PA in early adolescent-focused interventions like individual therapy. Finally, as the current study’s findings are consistent with the SLT-P’s transactional relationships between the self (i.e., the child), parent (i.e., parenting behavior), and context (i.e., early adolescence; Bandura, 1965; Forgatch & Martinez, 1999; Patterson, 1982), future studies should explore other contextual factors, such as how certain parenting behaviors interact or how perceived benefits of parentification and quality of social support mediate or moderate associations.
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Table 1

*Intraclass Correlations (Subject = School)*

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*Note. N at wave 1 = 304, N at wave 2 = 243, Intraclass Correlation = ICC, Poor Mon. & Supervision = Poor Monitoring & Supervision.*
Table 2

Central Tendencies and Internal Consistencies of the Data

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*Note.* Poor Mon. & Supervision = Poor Monitoring & Supervision.
Table 3

Correlations for the Imputed Data of the Alabama Parenting Questionnaire (APQ) and Positive and Negative Affect Scale for Children (PANAS-C)

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<th>PP W1</th>
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<td></td>
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<tr>
<td>PP W2</td>
<td>-.19*</td>
<td>-.13</td>
<td>.59**</td>
<td>-.19*</td>
<td>.71**</td>
<td>-.10</td>
<td>.40**</td>
<td>-.12</td>
<td>-.11</td>
<td>.72**</td>
<td>-.20*</td>
<td></td>
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</tr>
<tr>
<td>NA W2</td>
<td>.09</td>
<td>.15*</td>
<td>-.10</td>
<td>.06</td>
<td>-.09</td>
<td>.46***</td>
<td>-.11</td>
<td>.25***</td>
<td>.06</td>
<td>-.17*</td>
<td>.19*</td>
<td>-.17*</td>
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</tr>
<tr>
<td>PA W2</td>
<td>.03</td>
<td>.04</td>
<td>.37***</td>
<td>-.08</td>
<td>.30***</td>
<td>-.11</td>
<td>.66***</td>
<td>-.06</td>
<td>.03</td>
<td>.55***</td>
<td>-.16*</td>
<td>.46***</td>
<td>-.24**</td>
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</tbody>
</table>
Note. PI = Parental Involvement, PP = Positive Parenting, PMS = Poor Monitoring & Supervision, ID = Inconsistent Discipline, CP = Corporal Punishment, PA = Positive Affect, NA = Negative Affect; W1 = Wave 1, W2 = Wave 2, *p < .05; **p < .01; ***p < .001.
Table 4

*Analyses of Variance Predicting Affect and Parenting Behavior*

<table>
<thead>
<tr>
<th>Predicting PANAS-C Affect at Wave 2</th>
<th>$F$</th>
<th>$R^2$</th>
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<tbody>
<tr>
<td>Corporal Punishment at Wave 1</td>
<td>4.59</td>
<td>0.03</td>
</tr>
<tr>
<td>Inconsistent Discipline at Wave 1</td>
<td>4.67</td>
<td>0.03</td>
</tr>
<tr>
<td>Parental Involvement at Wave 1</td>
<td>36.19*</td>
<td>0.18</td>
</tr>
<tr>
<td>Poor Mon. &amp; Supervision at Wave 1</td>
<td>3.38</td>
<td>0.02</td>
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<tr>
<td>Positive Parenting at Wave 1</td>
<td>33.02*</td>
<td>0.17</td>
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</table>

Predicting APQ Parenting Behavior at Wave 2

<table>
<thead>
<tr>
<th></th>
<th>$F$</th>
<th>$R^2$</th>
</tr>
</thead>
<tbody>
<tr>
<td>Negative Affect at Wave 1</td>
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<td>0.05</td>
</tr>
<tr>
<td>Positive Affect at Wave 1</td>
<td>12.40*</td>
<td>0.16</td>
</tr>
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</table>

*Note.* Poor Mon. & Supervision = Poor Monitoring & Supervision, *$p < .001$. 
Table 5

Unstandardized $\beta$-Coefficients and Standard Errors of Regressions of Parenting Behavior at Wave 1 Predicting Affect at Wave 2

<table>
<thead>
<tr>
<th></th>
<th>Negative Affect</th>
<th>Positive Affect</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>$\beta$</td>
<td>$SE$</td>
</tr>
<tr>
<td>Corporal Punishment</td>
<td>0.50</td>
<td>0.49</td>
</tr>
<tr>
<td>Inconsistent Discipline</td>
<td>0.46</td>
<td>0.23</td>
</tr>
<tr>
<td>Parental Involvement</td>
<td>-0.12</td>
<td>0.15</td>
</tr>
<tr>
<td>Poor Mon. &amp; Supervision</td>
<td>-0.10</td>
<td>0.15</td>
</tr>
<tr>
<td>Positive Parenting</td>
<td>-0.01</td>
<td>0.24</td>
</tr>
</tbody>
</table>

Note. Poor Mon. & Supervision = Poor Monitoring & Supervision, *$p < .001$. 
Table 6

Unstandardized \( \beta \)-Coefficients and Standard Errors of Regressions of Affect at Wave 1 Predicting Parenting Behavior at Wave 2

<table>
<thead>
<tr>
<th></th>
<th>Corporal Punishment</th>
<th>Inconsistent Discipline</th>
<th>Parental Involvement</th>
<th>Poor Mon. &amp; Supervision</th>
<th>Positive Parenting</th>
</tr>
</thead>
<tbody>
<tr>
<td>( \beta )</td>
<td>( SE )</td>
<td>( \beta )</td>
<td>( SE )</td>
<td>( \beta )</td>
<td>( SE )</td>
</tr>
<tr>
<td>Negative Affect</td>
<td>0.03</td>
<td>0.02</td>
<td>0.07</td>
<td>0.04</td>
<td>0.00</td>
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<tr>
<td>Positive Affect</td>
<td>0.01</td>
<td>0.01</td>
<td>-0.01</td>
<td>0.03</td>
<td>0.26*</td>
</tr>
</tbody>
</table>

Note. Poor Mon. & Supervision = Poor Monitoring & Supervision, \( *p < .001 \).
Figure 1

Theoretical Model of Social Learning Theory of Parenting (Patterson, 1982)
Figure 2

*Review of Parenting Behavior and Early Adolescent Negative Affect (or, Internalizing Behavior) and Positive Affect (or, Well-Being)*

<table>
<thead>
<tr>
<th>Predictor →</th>
<th>Outcome</th>
<th>Corporal Punishment</th>
<th>Inconsistent Discipline</th>
<th>Parental Involvement</th>
<th>Poor Monitoring &amp; Supervision</th>
<th>Positive Parenting</th>
</tr>
</thead>
</table>
| Parenting Behavior | Internalizing Behavior | (+) Burton et al., 2018  
(+) Kim et al., 2003  
(+) Turner & Finkelhor, 1996  
(+) Wang & Kenny, 2014b | (+) Burton et al., 2018  
(x) Gaertner et al., 2010  
(+) Johnson & Greenberg, 2013  
(+) Kim et al., 2003 | (+) Burton et al., 2018  
(+) Gaertner et al., 2010  
(+) Wang et al., 2019 | (+) Burton et al., 2018  
(+) Gaertner et al., 2010  
(+) Johnson & Greenberg, 2013 | (-) Burton et al., 2018  
(x) Gaertner et al., 2010  
(+) NELIS et al., 2018  
(x) Oldhinkel et al., 2006  
(-) Schwartz et al., 2017  
(-) Wang & Kenny, 2014a  
(-) Wang et al., 2019 |
| | Well-Being | (x) Burton et al., 2018  
(x) Burton et al., 2018  
(+) Wang et al., 2019  
(x) Burton et al., 2018 | (x) Burton et al., 2018  
(+) Burton et al., 2018  
(+) Wang et al., 2019  
(x) Burton et al., 2018 | (x) Burton et al., 2018  
(+) Burton et al., 2018  
(+) NELIS et al., 2018  
(+) Wang et al., 2019 |
| Internalizing Behavior | Parenting Behavior | (+) Kim et al., 2003  
(x) Latzman et al., 2009  
(+*) Wang & Kenny, 2014b | (+) Kim et al., 2003  
(+*) Latzman et al., 2009 | (-) Latzman et al., 2009  
(-) Reitz et al., 2006 | (+) Garthe et al., 2015  
(x) Latzman et al., 2009 | (-) Davenport et al., 2011  
(-) Kim et al., 2003  
(x) Latzman et al., 2009  
(-) NELIS et al., 2018 |
| Well-Being | (x) Latzman et al., 2009  
(x) Latzman et al., 2009  
(+*) Latzman et al., 2009  
(x) Latzman et al., 2009 | (x) Latzman et al., 2009  
(+*) Latzman et al., 2009  
(x) Latzman et al., 2009 | (x) Latzman et al., 2009  
(+*) Latzman et al., 2009  
(+*) NELIS et al., 2018 |

*Note.* NA = Negative Affect; PA = Positive Affect; (+) = positive association; (-) = negative association; (x) = no association; Bold = longitudinal study
Figure 3

*Theoretical Model of Study Variables Within the Social Learning Theory of Parenting (Patterson, 1982)*
Figure 4

_Hypothetical Model of Study Variables_

\[\text{Note. Two-way arrow = bidirectional association; Solid gray line = no association; (+) = positive association; (−) = negative association.}\]
## APPENDIX

### Multiple Imputed Values Predicting Affect and Parenting Behavior

<table>
<thead>
<tr>
<th></th>
<th>Negative Affect</th>
<th>Positive Affect</th>
<th>Corporal Punishment</th>
<th>Inconsistent Discipline</th>
<th>Parental Involvement</th>
<th>Poor Mon. &amp; Supervision</th>
<th>Positive Parenting</th>
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<tbody>
<tr>
<td></td>
<td>$R^2$</td>
<td>$F$</td>
<td>$R^2$</td>
<td>$F$</td>
<td>$R^2$</td>
<td>$F$</td>
<td>$R^2$</td>
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<td><strong>Orig.</strong></td>
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<td>.15</td>
<td>7.44***</td>
<td>.01</td>
<td>1.52</td>
<td>.05</td>
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<tr>
<td>1</td>
<td>.02</td>
<td>1.40</td>
<td>.16</td>
<td>12.17***</td>
<td>.02</td>
<td>3.06*</td>
<td>.01</td>
</tr>
<tr>
<td>2</td>
<td>.07</td>
<td>4.90***</td>
<td>.14</td>
<td>10.53***</td>
<td>.02</td>
<td>3.25*</td>
<td>.02</td>
</tr>
<tr>
<td>3</td>
<td>.06</td>
<td>4.06***</td>
<td>.15</td>
<td>11.65***</td>
<td>.06</td>
<td>10.60***</td>
<td>.04</td>
</tr>
<tr>
<td>4</td>
<td>.04</td>
<td>2.42*</td>
<td>.18</td>
<td>13.84***</td>
<td>.02</td>
<td>3.84*</td>
<td>.03</td>
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<tr>
<td>5</td>
<td>.08</td>
<td>5.59***</td>
<td>.13</td>
<td>9.43***</td>
<td>.01</td>
<td>0.96</td>
<td>.00</td>
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<tr>
<td>6</td>
<td>.05</td>
<td>3.67**</td>
<td>.15</td>
<td>11.13***</td>
<td>.03</td>
<td>4.47*</td>
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<td>7</td>
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<td>.17</td>
<td>13.15***</td>
<td>.05</td>
<td>8.22***</td>
<td>.04</td>
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<tr>
<td>8</td>
<td>.04</td>
<td>2.75*</td>
<td>.19</td>
<td>14.83***</td>
<td>.02</td>
<td>3.74*</td>
<td>.06</td>
</tr>
<tr>
<td>9</td>
<td>.04</td>
<td>2.87*</td>
<td>.16</td>
<td>12.67***</td>
<td>.04</td>
<td>6.24**</td>
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<tr>
<td>10</td>
<td>.05</td>
<td>3.68**</td>
<td>.18</td>
<td>14.65***</td>
<td>.05</td>
<td>1.45</td>
<td>.02</td>
</tr>
</tbody>
</table>

Note. Orig. = Original data set. Poor Mon. & Supervision = Poor Monitoring & Supervision. *$p < .05$; **$p < .01$; ***$p < .001$
CURRICULUM VITA

Shelby M. Burton
Louisville, KY
smburt05@louisville.edu

EDUCATION

Doctor of Philosophy in Counseling Psychology (Ph.D.)  Aug. 2021
Master of Education in Counseling Psychology (M.Ed.)  Aug. 2018
University of Louisville

Bachelor of Science in Psychological Sciences (B.S.)  May 2015
Northern Arizona University, Summa Cum Laude
Minor in Criminal Justice

CLINICAL EXPERIENCE

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Psychiatric Residential Treatment Facility Intern
APA-Accredited Pre-Doctoral Internship, Erie, PA
Training Director: Laura Amoscato, Ph.D.

University of Louisville, Louisville, KY
Supervisor: Eva Markham, Ed.D.

Uspiritus Residential Facility  Sept. 2018 – May 2019
Bellewood & Brooklawn Campus, Louisville, KY
Supervisor: David Finke, Ph.D.

The Autism Center  Jun. 2018 – Aug. 2018
University of Louisville, Louisville, KY
Supervisor: Lillian Cooksey, Psy.D.

Weisskopf Child Evaluation Center  Jun. 2017– May 2018
University of Louisville, Louisville, KY
Supervisor: Eva Markham, Ed.D.
### TEACHING EXPERIENCE

<table>
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<tr>
<th>Course</th>
<th>Role</th>
<th>Period</th>
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<td><strong>Human Development</strong></td>
<td>Instructor on Record</td>
<td>Jul. 2017 – Jul. 2018</td>
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<td><strong>Differential Diagnosis</strong></td>
<td>Teaching Assistant</td>
<td>Jan. 2017 – May 2017</td>
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<td>University of Louisville, Louisville, KY</td>
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<td>Supervisor: Katy Hopkins, Ph.D.</td>
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### PUBLICATIONS


### MANUSCRIPTS IN PREPARATION & UNDER REVIEW

- **Burton, S. M.**, & Pössel, P. (in preparation) A social learning approach to the
examination of temporal directionality between parenting behavior and early adolescents’ affect.

Burton, S. M., & Pössel, P. (in preparation). The middle school blues: Examining the temporal directionality between teaching behavior and student affect in early adolescence

CONFERENCE AND PROFESSIONAL PRESENTATIONS


Burton, S. M., Pössel, P, & Hooper, L.M. (2018). Parenting and the middle school “blues:” Where are we now and where are we going? Presentation presented at Kentucky Psychological Association Conference, Richmond, KY.


perceived autonomy support as they relate to student outcomes. *Poster presented at the Northern Arizona University Research Symposium*, Flagstaff, AZ.

**OTHER PUBLICATIONS**


**PUBLIC EDUCATION**

**Gender-Affirming Care & Reality Therapy**
Uspiritus Residential Facility, Group Supervision Guest Speaker

**NAMI’s Step Forward for Mental Health – Public Education Tabling**
Kentucky Psychological Foundation, Lead Organizer

**KPA Legislative Action Day**
Kentucky Psychological Association, Participant

**Mental Health Awareness Week**
Kentucky Psychological Foundation, Lead Organizer

**National Depression Screening Day**
Kentucky Psychological Foundation, Lead Organizer

**Dissemination of Research**
“U of L with Mark Hebert,” Radio Broadcast Presenter

**Walking for Women**
Society for the Psychology of Women, Lead Organizer

**We Are Here Movement**
Society for the Psychology of Women, Organizer
MEMBERSHIPS

**Doctoral Student Search Committee**
Student Interviewer
Jan. 2018

Doctoral Student Search Coordinator
Jan. 2017

**Kentucky Psychological Association & Foundation**
Public Education Committee Member

**Society for the Psychology of Women (Division 35)**
Campus Representative

HONORS AND AWARDS

**Hager 1st Place Award for Research**
Kentucky Psychological Association
Apr. 2017

**Provost’s Excellence Award**
Northern Arizona University
Apr. 2015

**Outstanding Psychological Sciences Student**
Northern Arizona University
Apr. 2015

**Hooper Undergraduate Research Award Recipient**
Northern Arizona University
Apr. 2014

**Best Overall Research Project**
Northern Arizona University
Dec. 2013

TRAININGS COMPLETED

**Trauma-Focused Cognitive-Behavioral Therapy**
Online Training Course
Jul. 2021

**Childhood Trauma**
Monthly Seminar Series

**Family Therapy**
Monthly Seminar Series

**Parent Child Interaction Therapy**
Monthly Seminar Series