

# **Walden University ScholarWorks**

Walden Dissertations and Doctoral Studies

Walden Dissertations and Doctoral Studies Collection

1-24-2024

# The Effects of Parent's History of Childhood Maltreatment on Child Maltreatment Behaviors and Relationship Quality

Randi Crabtree Walden University

Follow this and additional works at: https://scholarworks.waldenu.edu/dissertations



Part of the Developmental Psychology Commons

# Walden University

College of Education and Human Sciences

This is to certify that the doctoral dissertation by

Randi Le'anna Crabtree

has been found to be complete and satisfactory in all respects, and that any and all revisions required by the review committee have been made.

Review Committee

Dr. Natalie Costa, Committee Chairperson, Psychology Faculty

Dr. Amanda Rose, Committee Member, Psychology Faculty

Chief Academic Officer and Provost Sue Subocz, Ph.D.

Walden University 2024

# Abstract

# The Effects of Parent's History of Childhood Maltreatment on Child Maltreatment Behaviors and Relationship Quality

by

Randi Le'anna Crabtree

MPHIL, Walden University, 2020

MA, LeTourneau University, 2017

BS, University of Phoenix, 2014

Dissertation Submitted in Partial Fulfillment
of the Requirements for the Degree of
Doctor of Philosophy
Developmental Psychology

Walden University

February 2024

#### **Abstract**

There are several risk factors for an adult using parenting maltreatment behaviors, including low reflective functioning, poor emotional regulation, poverty, stress, poor parent-child relationship quality, and parents' history of childhood maltreatment. In this quantitative study, regression analysis and moderation were used to examine whether parenting maltreatment behaviors were moderated by social support or parent-child relationship quality for parents with childhood maltreatment. Social learning theory and the cycle of abuse theory served as the basis for the study. Archival LONGSCAN data provided by the National Data Archive on Child Abuse and Neglect were analyzed, specifically the demographics, maltreatment reports, the Caregivers History of Loss and Victimization assessment, LONGSCAN Quality of Parent-Child Relationship: Parent Report, and the Duke-UNC Functional Social Support Questionnaire to evaluate the relationship between parents' history of childhood maltreatment, parenting maltreatment behaviors, and if social support or parent-child relationship quality moderated parental maltreatment behaviors. The findings revealed that parents' history of childhood maltreatment, parent-child relationship quality, and social support did not emerge as significant predictors of child maltreating behaviors. Furthermore, moderation analyses indicated that neither parent-child relationship quality nor social support played a significant moderating role in the association between parents' childhood maltreatment and current maltreating behaviors. Findings can be used by Child Protective Services, mental health providers, and policymakers to inform positive social change through intervention and prevention strategies.

# The Effects of Parent's History of Childhood Maltreatment on Child Maltreatment Behaviors and Relationship Quality

by

Randi Le'anna Crabtree

MPHIL, Walden University, 2020
MA, LeTourneau University, 2017
BS, University of Phoenix, 2014

Dissertation Submitted in Partial Fulfillment
of the Requirements for the Degree of
Doctor of Philosophy
Developmental Psychology

Walden University

February 2024

# Dedication

This dissertation is dedicated to all the survivors of childhood maltreatment looking for answers. The answers may not be in here, but it can be a start to helping build healthier communities.

# Acknowledgments

I have many people to thank for getting me to this place and the many experiences I am grateful for. Most importantly, I want to thank my grandmother, Judy Crabtree, for believing in me. I do not believe this would have been possible without your unconditional love and support. Additionally, I am so grateful to my husband and inlaws for showing me what a Hallmark family looks like!

I am forever grateful to my committee, Dr. Costa, for your patience and understanding. Dr. Rose, I sincerely appreciate your support and clear explanations. I have looked up to both of you throughout this process. I am so grateful that you both had the patience and willingness to work beside me while I became the first PhD in my family.

# Table of Contents

Chapter 1: Introduction to the Study	1
Background	3
Problem Statement	5
Purpose	6
Research Questions	6
Theoretical Framework	8
Nature of the Study	8
Definitions	9
Assumptions	10
Scope and Delimitations	10
Limitations	12
Significance of the Study	12
Significance of Theory	12
Significance of Practice	13
Significance to Social Change	13
Summary	14
Chapter 2: Literature Review	15
Literature Search Strategy	16
Theoretical Foundation	16
Social Learning Theory	16
The Cycle of Abuse Theory	18

Literature R	Review	19
Childho	ood Maltreatment	19
Parentin	ng Maltreatment Behaviors	21
Social S	Support	24
Parent-C	Child Relationship Quality	26
Current	Moderator Research	28
Summary		30
Chapter 3: Rese	earch Method	33
Research D	esign and Rationale	33
Methodolog	gy	34
Populati	ion	34
Samplin	ng and Sampling Procedures	35
Instrum	entation and Operationalization of Constructs	38
Data Ar	nalysis Plan	42
Threats to V	Validity	45
Externa	l Validity	45
Internal	Validity	45
Constru	ct Validity	46
Ethical 1	Procedures	46
Summary		47
Chapter 4: Resu	ults	48
Data Collec	etion	48

Results	50
Summary	53
Chapter 5: Discussion, Conclusions, and Recommendations	55
Interpretation of Findings	56
Moderation	58
Implications	59
Limitations of the Study	61
Recommendations	62
Conclusion	63
References	65

#### Chapter 1: Introduction to the Study

Childhood maltreatment typically includes neglectful supervision, failure to protect children from known abusers, physical abuse against the child to cause bodily harm, sexual abuse by the caregiver or other individuals, and psychological/emotional abuse (Child Welfare Information Gateway, 2019). The Centers for Disease Control and Prevention (2019) reported that 1 in 4 children experiences maltreatment, and 1 in 7 children experiences yearly maltreatment. The Child Maltreatment 2018 report estimated 678,000 childhood maltreatment cases in 2018, with 1,770 deaths (US Department of Health & Human Services, 2020). These estimates are likely unrepresentative of children who experience childhood maltreatment due to methodological and data collection issues in previous research.

Most research focuses on risk factors that place a child at increased risk for maltreatment. The cycle of abuse hypothesis indicates that the long-term effect of childhood maltreatment may include maladaptive emotional regulation skills leading to the potential use of violence with others, including future children (CDC, 2019; Fenfang & Godinet, 2014; Flynn et al., 2014; Johnson & James, 2016; Wert et al., 2019). However, the cycle of abuse hypothesis remains debated for understanding the transition of abusive behaviors to new generations (Thornberry et al., 2012). Childhood maltreatment does not guarantee that a child will become a violent or abusive parent (Miller-Perrin & Perrin, 2012). Researchers have also identified other risk factors that increase the chance of maltreating parental behaviors developing, such as poverty, stress, poor emotional regulation, low reflective functioning, poor parent/child attachment, poor

parent-child relationship quality, and parents' history of childhood abuse (Amos & Segal, 2018; Atzl et al., 2019; Borelli et al., 2019; CDC, 2019; Fenfang & Godinet, 2014; Flynn et al., 2014; Johnson & James, 2016; US Department of Health & Human Services, 2016; Wert et al., 2019). However, researchers' primary methods for studying risk factors for childhood maltreatment eventually leading to parental maltreatment behaviors (PMB) have not sufficiently supported the argument for or against the cycle of maltreatment hypothesis (Thornberry et al., 2012).

In exploring childhood maltreatment risk factors, parent-child relationship quality and social support are essential. Relationship quality with parents across the life span can be valuable or harmful in healthy development, impacting self-esteem, aggressive behavior, social competence, internalizing, and externalizing behaviors. Low early childhood parent-child relationship quality can lead to behavioral issues and aggression (Fagan, 2020; Fenerci & DePrince, 2018). Parent-child relationship quality impacts an individual's adjustment across the life span for both maltreated and non-maltreated individuals (Birditt, 2009). Additionally, poorly perceived relationship quality with parents for adult survivors of childhood maltreatment may decrease the social support received in early adulthood transitions to parenting and identity development (Birditt, 2009). Social support is often measured by perceived relationships and environmental factors (Jaffee, 2017). Healthy social support systems have been shown to mitigate the impact of childhood maltreatment on psychosocial development (Jaffee, 2017; Wert et al., 2019; Windom, 2017). Lack of perceived social support, limited access to social support, and isolation from social support avenues are continuously shown as risk factors

for an increased likelihood of maintaining abusive behaviors across generations and initiating abusive behaviors (Dixon et al., 2008). This emphasizes the need to explore the potential moderating effect social support and parent-child relationship quality have on parents' use of maltreating behaviors when controlling for parents' history of childhood maltreatment.

Although there is extensive literature on the risk and protective factors of childhood maltreatment experiences, there is a gap in the literature regarding the impact of parent-child relationship quality in conjunction with social support on the use of maltreating behaviors by parents with personal childhood maltreatment histories.

Understanding the effects of maltreatment on parents' personal childhood abuse history, current parent-child relationship quality, and social support is essential to building more resilient parenting practices. This chapter will explore the study's background, problem statement, purpose, research questions, hypotheses, theoretical frameworks, nature of the study, definitions, assumptions, scope and delimitations, limitations, and significance.

# **Background**

Risk factors associated with exposure to childhood maltreatment include child's age, parents' age (Sidebotham & Heron, 2006), socioeconomic status (Sidebotham & Heron, 2006), parents' education (Sidebotham & Heron, 2006), parents' history of childhood abuse (Abramovaite et al., 2015; Amos & Segal, 2018; Bartlett et al., 2017; Sidebotham & Heron, 2006), domestic violence (Abramovaite et al., 2015), parents' parenting perspective (Sidebotham & Heron, 2006), parents' psychological health (Sidebotham & Heron, 2006), and poor or no social support (CDC, 2019). Research has

provided insight into the developmental risk of repeated maltreatment across the life span, which includes externalizing behavioral problems, internalizing behavioral problems, poor relationship quality, limited emotional regulation skills, limited reflective functioning, poor attachment style, poor mental health, increased risk of experiencing violence in adulthood, and increased risk of perpetrating violence (Fenfang & Godinet, 2014; Flynn et al., 2014; Johnson & James, 2016; Lavi et al., 2019; Li & Godinet, 2013; Johnson & James, 2016; Pasalich et al., 2019). Parents' abuse history significantly impacts parenting practices and perspectives (Pasalich et al., 2019). There are also lower closeness levels between adult children of maltreated parents, impacting later-life relationship quality, closeness, and attachment (Pasalich et al., 2019).

Promotive factors can aid recovery for maltreating parents who were maltreated in childhood (Amos & Segal, 2018; Atzl et al., 2019; Wert et al., 2019). Traumareflective functioning (T-RF) has been identified as a promotive factor that could reduce the risk for childhood sexual abuse (CSA) exposure in multiple generations when T-RF is high in mothers who have experienced CSA (Borelli et al., 2019). This study explores possible promotive factors across abuse types, including parent-child relationships and social support. The literature highlights a link between poor adult attachment, increased child abuse potential, and dysfunctional parenting practices (Lo et al., 2019; Murphy et al., 2014; Rodrigues & Tucker, 2011).

For this study, exploring parent-child relationship quality and social support across longitudinal data can build awareness of the impact relationships might have on parenting behaviors. Additionally, the "cycle of maltreatment" or intergenerational

childhood maltreatment has shown mixed results based on methodological concerns (Abramovaite et al., 2015; Borelli et al., 2019; Fenfang & Godinet, 2014; Lavi et al., 2019; Thornberry et al., 2012), which include unrepresentative and small samples with homogenous characteristics, variability in assessment measures across generations, retrospective self-report measures, low participation and high attrition rates for longitudinal studies, and few controls for confounding variables. There are also concerns about how childhood abuse and neglect are defined across literature and various agencies (Thornberry et al., 2012). In this study, parent-child relationship quality was evaluated to understand better what link might exist between maladaptive parenting, relationship quality, and parents' history of childhood maltreatment. Though relationship quality and attachment are slightly different, attachment articles such as these aid in conceptualizing the close impact relationships might have on child maltreatment behavior transmission to future generations.

#### **Problem Statement**

Around 656,000 victims of child maltreatment were reported in 2019 (US Department of Health & Human Services, 2021). Childhood maltreatment is a traumatic experience that impacts the developing needs of an individual to build healthy social connections, safety, and security provided by the parent-child relationship (Guyon-Harris et al., 2020). Additionally, a lack of positive and healthy social support has increased the risk of PTSD, depression, anxiety, and psychosomatic and physical health issues (Charuvastra & Cloitre, 2008; Daly & Daumeister, 2009). In this study, I evaluated the gap in the literature to address the impact of parent-child relationship quality in

conjunction with social support on the use of maltreatment behaviors by parents who report childhood maltreatment histories.

# **Purpose**

The quantitative analysis was conducted to examine the effects of a parent's childhood maltreatment and current parent-child relationship quality and any relationship between these variables on the parent's current use of maltreatment behaviors. I aimed to test the maltreatment cycle, emphasizing relationship quality, social support, and maltreatment behaviors. The study followed a quantitative design with secondary data analysis of the LONGSCAN study/data using multiple measures (St-Laurent et al., 2019). Current child maltreatment data were collected and coded throughout the study from Child Protective Services (CPS) records and youth-reported abuse measures. Parent-child relationship quality was measured through self-reports of the youth and parents. Social support was obtained through the LONGSCAN Duke-UNC Functional Social Support Questionnaire and Social Provisions Scale.

#### **Research Questions**

- RQ 1: To what extent does parents' history of childhood maltreatment relate to current parental maltreating behaviors?
- $H_01$ : Parents' history of childhood maltreatment is not a significant predictor of current parental maltreating behaviors.
- $H_a$ 1: Parents' history of childhood maltreatment is a significant predictor of current parental maltreating behaviors.

- RQ 2: To what extent does parent-child relationship quality predict parental maltreatment behaviors?
- $H_02$ : Parent-child relationship quality does not significantly predict parental maltreatment behaviors.
- $H_a2$ : Parent-child relationship quality is a significant predictor of parental maltreatment behaviors.
- RQ 3: To what extent does parent-child relationship quality moderate the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors?
- $H_03$ : Parent-child relationship quality does not moderate the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors.
- $H_a$ 3: Parent-child relationship quality does not moderate the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors.
- RQ 4: To what extent does social support predict current parental maltreating behaviors?
- $H_0$ 4: Social support does not directly predict current parental maltreating behaviors.
- $H_a$ 4: Social support is a direct predictor of current parental maltreatment behaviors.
- RQ 5: To what extent does social support moderate the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors?

 $H_05$ : Social support does not moderate the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors.

 $H_a$ 5: Social support moderates the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors.

#### **Theoretical Framework**

This study's theoretical framework includes the cycle of abuse theory and Bandura's social learning theory. The cycle of abuse theory has posited that abuse or violence leads to children becoming abusive or that abused children may become abusive parents due to their childhood experiences (Milaniak, I., & Widom, C. S., 2015). However, limited research has supported this hypothesis on its merit. From the lens of social learning theory, I explored the impact of learned behaviors, attitudes, beliefs, or ideas that could contribute to PMBs' practices in future generations. Social learning theory focuses on acquiring knowledge through one's models in the environment and applying that new knowledge in the individual's life (Bandura A., 1971, 1999, 2019). Social learning theory paired well with the cycle of violence hypothesis in this study to explore how abusive behaviors, ideas, or attitudes might be learned through abusive behavior experiences during childhood.

#### **Nature of the Study**

This study followed a quantitative, non-experimental design to explore the relationships between parents' personal childhood abuse experiences, parent-child relationship quality, use of maltreating parental behaviors, and social support. Archival data analysis was used to evaluate longitudinal data collection for 1,300 children in

families who have been involved with CPS and have a history of parental maltreatment behaviors.

#### **Definitions**

The operational definitions of the terms used in this study are provided in this section.

Parent: The primary caregiver of an individual under 18 years old (Runyan et al., 2014).

Parent-child relationship quality: Parent-child relationship quality as derived from the LONGSCAN Parent-Child Relationship Quality: Parent report is defined as "a primary caregiver's perception of the quality of the relationship with his or her adolescent child and the level of their recent involvement, as well as the caregiver's educational aspirations for the adolescent" (Runyan et al., 2014, p. 52).

Parents' history of childhood maltreatment (CM): Parents experience abuse or neglect that occurred before the age of 18, including physical, emotional, sexual, or negligence (World Health Organization, 2020).

Parental maltreatment behaviors (PMB): Child maltreatment is abuse and neglect for children under 18. It includes all types of physical, emotional, sexual, and negligence, harming the child's health, survival, or development (World Health Organization, 2020).

Social support: Social support is interpersonal relationships, including family, friends, neighbors, religious community, colleagues, caregivers, or support groups. The support can take the form of physical or psychological resources (Runyan et al., 2014).

# **Assumptions**

There are three assumptions of this study. The first assumption was that the data collected for the LONGSCAN study were accurate and complete. This assumption is necessary for the study because the required information and data come from state reports, survey measures, and evaluation reports. Assessment instruments used for this study include the LONGSCAN Caregiver History of Loss and Victimization, LONGSCAN Quality of Parent-Child Relationship, Duke-UNC Functional Social Support Questionnaire (DUFSSQ), State and Child Protective Services administrative records (Runyan et al., 2014). The second assumption was that survey responses and administrative records provided correct and accurate data. Finally, the third assumption was that the participants fully understood the survey questions and could answer appropriately.

# **Scope and Delimitations**

This study focuses on how parents' history of childhood maltreatment, social support, and parent-child relationship quality relate to parental use of maltreatment behaviors. I explored possible interactions of parent-child relationship quality and social support on parents' use of maltreatment behaviors when they also have a history of childhood maltreatment. I used social learning theory and the cycle of abuse theory. Social learning theory informs the development of intergenerational patterns of parental maltreatment behaviors. Bandura (1971) proposed that an individual will have an increased belief that aggression is acceptable when raised in an aggressive social environment. There is an increased risk of CM when a child's parent has a history of CM

(Dixon et al., 2005). Additionally, parents with childhood histories of maltreatment were at a significantly increased risk of using PMBs with their children and transmitting maladaptive parenting to the next generation (Ambramovaite et al., 2015; Finzi-Dottan & Harel, 2014; Pears & Capaldi, 2001). Children of parents with CM histories often have reports of CM (Abramovaite et al., 2015; Amos & Segal, 2018; Bartlett et al., 2017; Sidebotham & Heron, 2006).

Archival data from the LONGSCAN were used for this study. The population of interest was parents with CM histories and their children. The LONGSCAN followed 1,354 eligible children from 0 to 18 years of age. The sample is interviewed face-to-face bi-annually, starting at four years of age. Child Protective Services case narratives and Central Registry records are periodically reviewed with brief, yearly telephone contacts with the caregivers to enhance retention and collect data about service utilization, life events, and child behavior problems. Data were collected from multiple informants to measure outcomes and intervening factors that may link risk status and child development outcomes (Runyan et al., 2014). The LONGSCAN population includes a diverse sample of participants. The nature of this study includes only data from the 12, 14, and 16-year-old data points for parent-child relationship quality. Overall, the study is generalizable to parents and children across the United States exposed to childhood maltreatment. The results of this study will not be generalizable to parents or children without CM histories.

#### Limitations

Multiple limitations of the study and data set have been identified. First, the LONGSCAN data set uses multiple measures that are yet to be evaluated for validity and reliability. The accuracy and completeness of the data set cannot be verified. Possible researcher bias and participant understanding could have an impact on the accuracy of the data set. The respondents' personal bias could have also impacted their willingness to truthfully on survey measures along with the recall limitations of the respondent.

Additionally, the focus on parents with CM limits generalizability to parents without CM histories. The sample for this study is limited to youth data points of 12-, 14-, and 16-year-olds. The sample focus limits the generalizability of results to other child age groups. These limitations reduce the generalizability of study results. The sample is collected from multiple geographic areas, reducing generalizability limitations to the US population.

# Significance of the Study

# Significance of Theory

The study results will provide insight into the cycle of maltreatment hypothesis by understanding the effects of parents' personal childhood maltreatment history, parent-child relationship quality, and social support on parents' current use of maltreating parenting behaviors. There is currently little research investigating the effects of parent-child relationship quality and social support as moderating factors in PMBs. Furthermore, no research has investigated this from the child and parents' perspective. To fill the research gap, I focused on the effect of parents' personal history of childhood

maltreatment, social support, and parent-child relationship quality on current parental maltreatment behaviors using a longitudinal sample of children. Participants included families who have previously or currently been documented for having a history of parental use of maltreatment behaviors. This research can inform potentially reoccurring risk factors in maltreating family histories and the potential of social support and relationship quality to reduce the transmission of parental maltreating behaviors to new generations (see Kong & Martire, 2019).

# **Significance of Practice**

Developmental psychology professionals, treatment providers, intervention program staff, researchers, and parents need a clear understanding of childhood maltreatment's impact on development and the moderating influences of social support and relationship quality. Programmatic development should consider the impact of childhood maltreatment on the healthy development of parents while considering social support networks available to parents. Educators can benefit from understanding their role as a form of social support to children and parents in daily interactions. In practice, this study aids those directly involved in policy and delivery to improve family systems to mitigate the familial risk of passive maladaptive parenting practices to future generations.

# Significance to Social Change

Insights from this study can aid positive social change, education professionals, and mental health professionals in developing increasingly effective PMB interventions for those involved in the Child Protective Services programs. This study may help change

current social expectations of treatment for maltreated parents and service development for long-term recovery for the parent, family, and child. Childhood maltreatment experiences are not limited to a single community, socioeconomic status, or family, making it crucial for this knowledge to be explored in lasting social change through social recognition and advocacy.

#### **Summary**

Children are a significantly vulnerable population in the United States, with an estimated 1 in 7 children experiencing maltreatment yearly (US Department of Health & Human Services, 2019). The consequences of childhood maltreatment include personal, familial, community, and societal implications (World Health Organization, 2020). Of those consequences, this study addresses the role of social support and relationship quality on maltreatment behaviors. The study focused on relationships between childhood maltreatment experiences, parental maltreatment behaviors, and possible moderating influences of social support and parent-child relationship quality, filling the gap in childhood maltreatment literature.

This chapter included the study's background, the problem statement, the purpose of the study, research questions and hypotheses, the theoretical foundation, the nature of the study, definitions, assumptions, scope, delimitations, limitations, and significance.

Chapter 2 will include a literature review, theoretical foundation, summary, and conclusions.

.

# Chapter 2: Literature Review

What is determined as child maltreatment can vary across cultures; however, this study focuses on physical, emotional, sexual, or neglectful childhood maltreatment experiences (CME). Maltreatment experiences have been evaluated from various perspectives to understand long- and short-term risk factors. Childhood maltreatment is a traumatic experience that impacts the developing individual's need to build healthy social connections, safety, and security provided by the parent-child relationship (Guyon-Harris et al., 2020). Childhood maltreatment experiences have inherent risks to future parenting practices, mental health, and abusive/neglectful behaviors. Further research is needed to understand the impact of childhood maltreatment experiences on parental use of maltreatment behaviors, social support, and parent-child relationship quality with offending adult parents of childhood maltreatment experiences.

Although there is extensive literature on the risk and protective factors of childhood maltreatment experiences, there is a gap in the literature regarding the impact of parent-child relationship quality in conjunction with social support on the use of maltreating behaviors by parents with personal childhood maltreatment histories. This chapter begins with exploring social learning theory and the cycle of abuse hypothesis. I will discuss applying the theories to maltreatment behaviors by parents with a history of childhood maltreatment. Childhood developmental risk, parental maltreatment experiences, social support, and parent-child relationship quality literature will then be reviewed. The research methodology used to understand child maltreatment will also be

reviewed. Finally, the information provided in Chapter 2 will be analyzed to inform readers of their application to the overall study.

#### **Literature Search Strategy**

I primarily completed the literature search for this study using the Walden University library, focusing on peer-reviewed resources published since 2000, with primary articles from 2015 or earlier used in the literature review. Additionally, resources were further derived from the citations within each article in the literature search, with dates ranging from 2000. The following databases contributed to my resources: Thoreau, Academic Search Complete, PsycInfo, PsycArticles, PsycTests, SocINDEX, Sage Journals, and EBSCOhost. The subsequent key search yielded relevant research on child maltreatment, intergenerational child abuse, parent-child relationship quality, social support, parent exposure to childhood maltreatment, and the cycle of abuse hypothesis.

Additionally, Google Scholar aided in acquiring new articles from 2017 based on citations from previous sources published before 2015. Each variable was entered into a Google Scholar with articles citing the earlier articles. After reviewing the results, this project selected articles that meet the variable and time restraints for review. The articles with updated research on childhood maltreatment risk, parental maltreatment behaviors, relationship quality, and social support were further reviewed for best fit.

#### **Theoretical Foundation**

#### **Social Learning Theory**

Social cognitive theory informs my research through the lens of learning and modeling maladaptive parenting practices. Bandura (1971, 1999) proposed that learning

occurs on multiple levels of conscious observation, cognitive appraisal, motivation, and reinforcement/punishment elements. Bandura identified a conception-matching process in which the individual builds behavioral knowledge through observation, cognition, and action. Cognitively, a person can be agentic in their environment and affected by observations from models through analysis of behavioral consequences (Bandura, 1999). The individual learns to create reactions or situations that benefit their desired outcome, cognitively assess the possible outcomes of a behavior, and learn which previously modeled behaviors might not benefit them. Thus, a person is likelier to practice successful and supported behaviors they have seen as models to meet their current goal and less likely to practice behaviors with unfavorable or critical outcomes (Bandura, 1999). However, familial or social favor is not considered an active influence on regulation and motivation when the individual does not value the values or the social norm or appraises the consequence as unfavorable (Bandura, 1971).

Social cognitive theory lends to this study in evaluating the development of aggressive behaviors in family and social circles. Based on the theory, aggressive behavioral styles are learned through observation and refined with practice (Bandura, 2019). Those who observe socially acceptable behavior patterns will learn to model the behaviors that support acquiring their valued outcomes developed by the environment and internal processes. Bandura (1971) proposed that an individual will have an increased belief of aggression being acceptable when raised in an aggressive social environment with decreased effectiveness in challenging socially reinforced beliefs. For instance,

where physical force is valued to obtain one's desires, individuals would likely value physical force over verbal compromise.

When applied to parenting behaviors, social support systems, and relationships, social cognitive theory can be used to explain child maltreatment behaviors. When parents use PMBs that are within a socially acceptable factor, the child may learn and model this behavior in the future with others, including their children (Abramovaite et al., 2015). Additionally, the aggressive model set for the child can be cognitively analyzed and symbolized as a method of meeting one's goals and a method of doing so in emotionally challenging situations, similar to the instance of servicing the situation as a threat, such as in the case of parenting for some individuals with childhood maltreatment experiences (Abramovaite et al., 2015; Bandura, 1999).

# The Cycle of Abuse Theory

The cycle of abuse theory or intergenerational transmission (IGM) refers to a pattern of behavior passed from the parent to the child (Widom, C. S., Czaja, S. J., & Dumont, K. A., 2015). This behavior in the current study is termed PMBs or parental maltreatment behaviors. In this situation, the cycle of abuse theory helps explore the transmission of possible PMBs from parents with CM expirees to their children through PMBs. There is an increased risk of CM when a child's parent has a history of CM, indicating the cyclical nature of IGM (Ambramovaite et al., 2015; Dixon et al., 2005; Finzi-Dottan & Harel, 2014; Pears & Capaldi, 2001). However, learning and using abusive behavior is not that simple. Abusive behaviors are not simply practiced like computers but developed based on parental and social cues of acceptable behaviors (Bisin

& Verdier, 2001). Additionally, these abusive behaviors could be reinforced genetically or through observation, such as social cognitive theory (Ambramovaite, 2015). IGM guides inquiry for the impact of CM on the use of PMBs and the potential interaction of relationship quality and social support. When combined with social cognitive theory, IGM works to build a solid line of inquiry.

#### Literature Review

#### Childhood Maltreatment

Nationally, 8.9 of every 1000 children experienced abuse in 2019 (US Department of Health & Human Services, 2021). Of these instances, 74.9 % experience neglect, 17.5 % physical abuse, 9.3% sexual abuse, and 84.5% of these children experience a single abuse type (US Department of Health & Human Services, 2021). The Child Maltreatment Report 2019 noted that 39% of maltreating was by the mother alone, 22.6% by a father acting alone, 21.0% by both parents, and 14.2% were maltreated by a perpetrator who was not the child's parent (US Department of Health & Human Services, 2021).

Potential developmental risks of exposure to maltreatment as a child vary and have been explored for decades by several researchers. One of the risks includes repeated exposure to maltreatment over time. Drake, Jonson-Reid, and Sapokaite (2006) reported a 47% recurrence after 36 months and 62% after 7.5 years of the first report of child abuse in their sample of maltreated children. The 2016 Congressional Report on Child Welfare estimated a range between 8% and 13.1% recurrence of maltreatment within six months, depending on the state (The Children's Bureau, 2019).

Multiple researchers show an increased risk of behavioral problems for children who experience repeated abuse or neglect (Fenfang & Godinet, 2014). Sexual abuse survivors also experience increased internalizing and externalizing behavioral issues (Borelli et al., 2019). Adversity in childhood has been shown to affect mental health and health risk behaviors negatively (Atzl et al., 2019). There is a three times increased risk for MDD patients with CM to attempt suicide, with an increased risk of a lifetime diagnosis of MDD in postpartum women survivors of CM (Goldberg et al., 2019). Adolescent participants with ACE scores also report depressive, anxious, trauma, and externalizing symptomatology across abuse types (Negriff, 2020). There is an association between CM and non-suicidal self-injury risk behaviors (Liu et al., 2018), in addition to increased PTSD risk for adults with CM and early life adversities (Cloitre, 2008). More specifically, sexual and emotional maltreatment survivors are associated with greater depression severity and risk for PTSD than the physical maltreatment type (Vallati, 2020). These findings show that repeated maltreatment has significant long-term mental health concerns (Fenfang & Godinet, 2014).

Beyond clinical mental health and risk behavior, concerns are characteristic differences found throughout the literature for children with CM experiences. Childhood emotional maltreatment has predicted low self-esteem in a college-age population (Badr et al., 2018). Children with CM have inappropriate or rigid effects, reduced self-awareness, trouble regulating emotions, difficulty deescalating after the distress, increased withdrawal, or self-isolating behavior (Sroufe et al., 1983), unlikely to initiate peer interaction (Karrass & Walden, 2005), and interpret others as hostile when they are

not (Suess et al., 1992). Critical periods of development such as adolescence, pregnancy, and early adulthood carry challenges without the added risk from CM experiences. The perinatal period has a critical risk for adverse outcomes for mothers and the children of mothers with CM (Atzl et al., 2019). The wounds of parental CM experiences are grievous to long-term developmental outcomes due to the nature of such experiences coming from the parental figure intended to provide safety and security for the child to develop properly (Chaurvastra & Cloitre, 2008).

#### **Parenting Maltreatment Behaviors**

As previously stated, PMBs include neglect and physical, sexual, and emotional abuse. Risk factors for the use of PMBs include young parental age, single parenthood, a higher number of children, lower income, substance abuse, mental health, history of parental childhood abuse, social isolation, and poor parent-child relationship quality (Amos & Segal, 2018; Atzl et al., 2019; Borelli et al., 2019; Fenfang & Godinet, 2014; Flynn et al., 2014; Johnson & James, 2016; Fortson et al., 2016; US Department of Health & Human Services, 2016; US Department of Health & Human Services, 2019; Wert et al., 2019). Bartlett et al. (2017) found that 54.4% of child participants with a mother who had experienced maltreatment also reported maltreatment.

Understanding the impact of childhood maltreatment on child and adolescent development helps inform instances of parental maltreatment behaviors (PMB) for this study. Pasalich et al. (2019) found that parents' abuse history significantly impacted parenting practices and perspectives. Parents' childhood maltreatment experiences increased parental risk of using maladaptive parenting methods, including unclear

communication, role-reversal, intrusiveness, enmeshment, competition, objectification, and social isolation (Amos & Segal, 2018; Guyon-Harris et al., 2020). Borelli et al. (2019) found that children were more likely to report sexual abuse when their mother experienced childhood sexual abuse with lower reflective functioning. Guyon-Harris et al. (2020) reported some connection between the abuse type experienced by the parent in childhood and parenting deficiency type; childhood sexual abuse was associated with affective communication, and physical neglect was associated with role/boundary confusion. Bartlett et al. (2017) found increased risk across abuse types for parents to have substantiated cases of PMBs when the parent experienced CM, with a 72% increase in the risk of the child also experiencing maltreatment. The experience of CM for both male and female parents shows increased difficulty with effective parenting behaviors and reduced sensitivity to the child's needs and use of abusive behaviors toward their child (Abramovaite et al., 2015; Guyon-Harris et al., 2020).

Additionally, for parents who experienced multiple types of CM, there was an increased risk of PMBs. For example, Guyon-Harris et al. (2020) showed that mothers with substantiated reports of CM had a 44.2% rate of substantiated CM compared to mothers without a report, with 53.5% of the children whose mothers had a report of personal CM, 54.4% were also reported for CM (Bartlett et al., 2017). Of those with PMBs in the Bartlett et al. (2017) study, 64.4% reported neglectful parenting, 27.8% reported multiple maltreatment types, and 84% had reports of neglect. Researchers found a 300% increased risk of multiple PMBs, with the mother being the perpetrator when she had a history of multiple CMs (Bartlett et al., 2017).

Researchers have also compared the transmission of similar PMBs to the child, showing that similar PMBs transmit to the next generation more often than different PMB types (Abramovaite et al., 2015). Kim (2009) found that an identical type transmission of PMB with neglect more often transmits a PMB of neglect to the next generation instead of another maltreatment type, similar to physical abuse transferring to a PMB of physical abuse with one's child. This research aids in the understanding of repeated cycles of maltreatment to one's children after experiences of personal CM. Abramoviate et al. (2015) support that the child not only experiences the CM but develops a parenting model based on the experienced PMB and possibly processes the cues received through their CM experience as appropriate parenting behaviors. Brown (2014) proposed that family conflict and behaviors are part of the family dynamic, and individuals learn to respond to specific roles without intention, increasing the connection between the survivors of CM digesting PMBs as acceptable parenting behaviors in the future. Borelli et al. (2019) report an increased risk for children of mothers with sexual abuse to experience sexual abuse when the mother's reflective functioning is low, which means that in some of these families, the mother may not digest and process her trauma in a manner that increases her ability to reduce the risk for her child being a victim of sexual abuse.

Poor adult attachment styles have been indicated as a risk to PMBs (Lo et al., 2019; Murphy et al., 2014; Rodrigues & Tucker, 2011). Parents with CM scored higher on anxious and avoidant attachment types, lower emotional regulation skills, and perceived parenting as a threat (Harel & Finzi-Dottan, 2018). Abusive and controlling

parenting behaviors were linked to lower levels of emotional regulation and increased perception of parenting as a threat (Harel & Finzi-Dottan, 2018). Harel and Finzi-Dottan (2018) also found that positive and supportive parenting practices decreased the risk of emotional abuse/neglect of PMBs. Murphy et al. (2014) reported that increased ACE scores in the clinical sample were associated with higher increases in respondents being classified U/CC on the Adult Attachment Inventory (AAI) with links to disruptive parenting practices and PMBs potential. Amos and Segal (2018) found additional support that attachment disorganization with emotional withdrawal by the mother in their study predicted increased levels of disrupted communication from the mother to the child. Parental behavior can profoundly influence offspring's emotional behavior (Charuvastra & Cloitre, 2008). Multiple researchers in the last few decades have found that a history of CM can and does at times significantly impact a parent's mental health and reduce healthy emotional regulation, can increase aggression, PMB risk, and parental perception of the child (Atzl et al.,2019; Harel & Finzi-Dottan, 2018). As the literature shows, childhood maltreatment can highly impact healthy attachments, impacting parent-child relationship quality and emotional development. This is concerning in the current study due to relationship quality and social support's role in PMBs.

# **Social Support**

Social support comes from various sources such as friends, family, community, or social service agencies. The phenomenon of one experiencing social support has been shown to protect a person from survival stressors and improve both physical and mental health outcomes. Baumeister and Leary (1995) theorize that a fundamental aspect of

humanity is the need to belong. Doing so through the relationships in one's daily life and deprivation of belonging could create significant distress for the individual. Concerning CM experiences for parents and children, social support frequently comes up in the literature about perceived levels of support and the mental health implications of support quality on CM and PMBs. The lack of healthy social support systems in CM situations increases the risk to the individual for maladaptive interpersonal and psychological development.

Moreover, social support in the CM environment might even buffer the transmission of PMBs to the next generation when PMBs are not socially acceptable or supported (Abramovaite et al., 2015). A child's relationship affects healthy brain development, physical and emotional security, behavioral regulation, and intellect (Fortson et al., 2016). Furthermore, early adversity, such as CM, can limit the individual's ability to socialize in later life and reduce the capacity to engage and reinforce prosocial behaviors with others (Charuvastra & Cloitre, 2008).

Dixon, Browne, & Hamilton-Giachritsis (2009) report higher feelings of isolation for parents who maintained PMBs than those who stopped the transmission of PMBs to their children. Early life relational trauma, such as CM, creates additional difficulty for the individual to develop meaningful relationships and build social support systems (Dixon et al., 2009). Research has found a limitation to the buffering capacity of social support when the family of origin for parents who experienced CM is part of the social support system (Atzl et al., 2019). In some cases of the maintenance of PMBs to the next

generation, unhealthy support and abusive relationships can increase the chances that a parent will engage in the maltreatment of their child (Atzl et al., 2019).

Additionally, social networks and support systems can aid in the reduction of mental health issues or increase mental health issues. For example, Daly Baumeister (2009) reports that social support can increase positive feelings, stability, value, and worthiness. However, a lack of positive and healthy social support has increased the risk of PTSD, depression, anxiety, and psychosomatic and physical health issues (Charuvastra & Cloitre, 2008; Daly & Baumeister, 2009). Researchers found additional support for an interaction between increased depressive symptomology and decreased perception in adolescent familial social support with increased depressive symptomology associated with increased incidents of CM, making it more difficult for the adolescent to receive the social support needed to combat mental illness (Charuvastra & Cloitre, 2008; Daly & Baumeister, 2019; Munzer et al., 2017)

#### **Parent-Child Relationship Quality**

Parent-child relationship quality is impactful to healthy human development.

Relationship quality with one's parents across the life span can be a valuable or harmful factor in healthy development, interacting with self-esteem, aggressive behavior, and social competence, internalizing and externalizing behaviors. Fagan (2020) and (Babcock Fenerci & DePrince, 2018) support findings linking low parent-child relationship quality in early childhood to behavioral issues and aggression. Birditt (2009) reported that parent-child relationship quality influences an individual's adjustment across the life span for both maltreated and non-maltreated individuals. Emotional regulation and

interpersonal skills suffer in parent-child relationships where the parent violates the child's ability to see the parent as a secure base and seek comfort during distress, aiding in lower-quality relationships with others in the future (Charuuvastra & Cloitre, 2008). Guyon-Harris et al. (2020) emphasize the importance of the mother-child bond and indicate that the development of the bond influences later life relationship development skills. The relationship quality between a mother and their child sets the child's brain on a path to interpret relationship dynamics and apply models they have seen work or maladaptive models that provide a path to their relational needs. For instance, Amos and Segal (2018) offer a maladaptive analysis of the relationship model for the functioning of the mother-child relationship when the mother has experienced CM, saying that both parties see each other as a problem to manage instead of a source of connection and support. Unlike the supportive and reflective parent-child relationship, this provides tension and stress related to lower relationship quality and ambivalence (Birditt, 2009).

Poorly perceived relationship quality with parents may decrease the social support received in early adulthood transitions to parenting and identity development (Birditt, 2009). Amos and Segal (2018) report long-term relational difficulties created by unresolved trauma in the child's brain through CM, referred to as terrifying shame without a solution, leading to difficulty receiving or seeking the relational support needed to resolve interpersonal issues. Parents with similar developmental complications after experiencing CM can project this maladaptive regulation and interpersonal model onto their children, reinforcing a cycle of maladaptive parenting behaviors. The inability to reflect upon the maladaptive and chaotic relationship patterns by the parent in their own

life can create difficulty for the parent to evaluate the impact of those relationships on the child's emotional and behavioral development and reinforce the management mindset versus the compassionate, supportive mind-frame found in relationships considered to be healthier (Amos & Segal, 2018).

The lack of resolution in a maladaptive parent-child relationship cycle can impact generations of families without significant changes and understanding of factors keeping the transmission cycle active. Evaluation of parent-child relationship quality will aid a deeper understanding of any potential interaction between CM and PMBs. By identifying the perceived relationship quality, we will ascertain how relationship quality can mitigate the lasting developmental harm in poor-quality parent-child relationships.

#### **Current Moderator Research**

Savage et al. (2019) completed a meta-analysis of 32 studies focused on mothers who experienced childhood maltreatment with toddlers from 0 to 6 years old, with attention given to conceptual and methodological moderators. The authors supported the potential effect of CM on parenting behaviors in the studies reviewed. Furthermore, the parenting behavior with more potent effects for potentially abusive behaviors compared to positive parenting behaviors was supported as a potential moderator (Savage et al., 2019). Furthermore, Pasalich et al. (2019) explored parents' exposure to each type of child abuse as a moderator for the association between intervention conditions and parental sensitivity in separate models. The authors found a significant effect of the PFR treatment for parents with moderate to severe physical abuse experiences with higher parental sensitivity post-intervention. A significant effect was not found for low physical

abuse, sexual abuse, or emotional abuse groups (Pasalich et al., 2019). This study demonstrates support for home-based intervention in CPS involving families of toddlers at higher risk for abusive parenting practices due to parents' exposure to childhood abuse (Pasalich et al., 2019). The authors support prior research showing an increased impact on the parent-child relationship and reduced parental sensitivity in parents with childhood maltreatment.

Further, the study showed a significant post-intervention effect using parents' history of childhood maltreatment type as a moderator. The significant effect of relational sensitivity-based intervention showed improved parental sensitivity to the child's needs, thus improving parent-child relationship quality post-intervention (Pasalich et al., 2019). In addition, Fagan (2020) explored parent-child relationship quality as a potential moderator of aggression in children who experienced maltreatment, finding that relationship quality moderated maltreatment's effect on aggression only in White children. Those who experienced poorer relationships with their mother were more strongly affected by their maltreatment experiences (Fagan, 2020). The study found that individual race and parent-child relationship quality did not moderate aggression in the children who experienced maltreatment (Fagan, 2020). A significant moderating effect was only found in the three-way interaction of maltreatment, relationship quality, and race (Fagan, 2020). These examples of parent-child relationship quality as a moderator in recent studies show further support for evaluating relationship quality and social support as possible moderating factors for the effects of childhood maltreatment (Fagan, 2020).

This study will also look into social support as a potential moderator of childhood maltreatment behaviors for parents who have experienced childhood maltreatment. Schofield et al. (2013) completed a meta-analysis of five studies meeting inclusion criteria, including peer-reviewed journal publication, focusing on intergenerational continuity with prospective, longitudinal data, and tested for moderation effects of social support in the form of safe, stable, nurturing relationships (SSNRs). Schofield et al. (2013) found a possible protective role of social support on intergenerational continuity of child maltreatment in the studies analyzed. The author's findings suggest social support as a potential prevention strategy for interrupting the cycle of maltreatment (Schofield et al., 2013). Kim and Maguire-Jack (2015) explored the implications of social support from the mother's perception of her community, finding a potential moderating role of the mother's perception on her willingness to be involved in her community. Additionally, the authors report that parents with more connection with others are less likely to maltreat their children (Kim & Maguire-Jack, 2015). Limited research has been conducted on the potential moderation role of social support on parental maltreatment behaviors.

# **Summary**

Chapter 2's literature review included childhood maltreatment, parental maltreatment behaviors, social support, and relationship quality. Social cognitive theory and the cycle of abuse hypothesis were presented with their relation to childhood maltreatment behaviors, experiences, social support, and parent-child relationship quality.

I have examined the literature most relevant to parental maltreatment behaviors related to childhood maltreatment experiences, social support, and parent-child relationship quality on the potential transmission of these behaviors to children. I have reviewed literature related to prevalence of child maltreatment and repeated maltreatment (Bartlett et. al, 2017; Drake, Jonson-Reid, and Sapokaite, 2006; The Children's Bureau, 2019; US Department of Health & Human Services, Administration for Children and Families, Administration on Children, Youth and Families, Children's Bureau, 2021), developmental risk to psychosocial functioning (Atzl et al., 2019; Badr et al., 2018; Borelli, et al., 2019; Charuvasta and Cloitre, 2008; Fenfang & Godinet, 2014; Gerke et al. 2018; Goldberg et al. ,2019; Liu et al. 2018; Negriff, 2020; Vallati, 2020) parental maltreatment behaviors (Amos & Segal, 2018; Atzl et al., 2019; Bartlett et al, 2017; Borelli et al., 2019; Brown, 2014; Fenfang & Godinet, 2014; Flynn et al., 2014; Johnson & James, 2016; Fortson, Klevens, Merrick, Gilbert, and Alexander, 2016; Guyon-Harris et al., 2020; Harel and Finzi-Dottan, 2018; Kim, 2009; Lo, Chan & Ip, 2019; Murphy et al., 2014; Pasalich et al., 2019; Rodrigues & Tucker, 2011; US Department of Health & Human Services, 2016; US Department of Health & Human Services, 2019; Wert et al., 2019), social support (Abramovaite et al., 2015; Atzl et al., 2019; Baumeister and Leary, 1995; Charuvastra & Cloitre, 2008; Dixon et al., 2009; Fortsonet et al., 2016; Munzer et al., 2017; Nergiff et al., 2019), and parent-child relationship quality (Amos and Segal, 2018; Babcock et al., 2018; Birditt 2009; Charuuvastra & Cloitre, 2008; Fagan, 2020; Guyon-Harris et al., 2020). The impact of childhood maltreatment on future social and

parenting behavior is a significant concern to children, families, communities, and agencies working with these families.

This study addresses how parents' personal history of childhood maltreatment, social support, and parent-child relationship quality affect current parental maltreatment behaviors. This study will evaluate how childhood maltreatment experiences, social support, and parent-child relationship quality interact with parental maltreatment behaviors. Chapter 3 discusses methodological study design, the LONGSCAN sample and data collection methods, the validity of measures, and ethical considerations.

## Chapter 3: Research Method

This quantitative, non-experimental study was conducted to examine the effects of a parent's childhood maltreatment history, parent-child relationship quality, and social support on parental maltreatment behaviors. For this study, childhood maltreatment is defined as any act or failure to act in a manner that causes physical, emotional, psychological, or sexual harm to a minor child (Child Welfare Information Gateway, 2019). Childhood maltreatment experiences have increased the odds of a parent using maltreatment behaviors (Assink et al., 2018). Social support and parent/child relationship quality were examined as potential moderators between the parents' childhood maltreatment experiences and parental maltreatment behaviors.

This chapter consists of an exploration of the research design and rationale. This section will describe the archival data set, including the study population, sampling methods, and variables. For each variable, measurements and operationalization will be described. Data analyses involving regression models and interactions between variables are also explored. I will also discuss data preparation procedures, potential threats to validity, and ethical considerations.

# **Research Design and Rationale**

The nature of the study is a non-experimental, quantitative analysis of archival, longitudinal data to investigate relationships between the variables. A non-experimental approach is applied due to participation assignment and variable manipulation limitations. There is significant variability in the current literature on childhood maltreatment. Previously, researchers have focused on various designs of cross-sectional,

meta-analysis data, retrospective data, single reporters, highly selected samples, short follow-up periods, and longitudinal data (Christie et al., 2017; Thornberry, 2012).

Additionally, researchers have reportedly varied in their definition and methodology across the history of childhood maltreatment research (Christie et al., 2017; Thornberry, 2012).

In this study, I focused on longitudinal archival research across 20 years to better understand possible relations between social support, parent/child relationship quality, and the past experiences of childhood abuse by current parents. Regression analyses examined the predictive relationship between independent, dependent, and moderation variables. The independent variables are parents' experience of childhood maltreatment, parent/child relationship quality, and social support. The dependent variable is the parents' maltreating behaviors (PMB). Social support was also considered a moderating variable between parent/child relationship quality and the use of PMBs. Parent/child relationship quality was explored as a potential moderator between parents' history of CM and current use of PMB.

# Methodology

### **Population**

The target population includes 1,354 parents of children with reported childhood abuse. The population for the LONGSCAN data includes 1,354 children with reports of childhood maltreatment or risk, their parents, and other caregiver data from five different sites across the United States. The LONGSCAN began in 1991, collecting data on children every two years till adulthood (Runyan et al., 2014). Data collection explored

various areas of the child and caregivers' functioning during assessment periods, including relationship quality, CME and PMB of the parent, and social support (Runyan et al., 2014).

# **Sampling and Sampling Procedures**

The LONGSCAN study drew the sample from five sites across the United States (Runyan et al., 2014). To diversify the sample, the data collection sites include suburban, rural, and urban communities in the East, Midwest, Northwest, Southwest, and South (Runyan et al., 2014). Additionally, the sample ranges in risk level and maltreatment histories. Children were enrolled in the study at four years or younger and evaluated with a standard battery at 4, 6, 8, 12, 14, 16, and 18 years old with face-to-face interviews for both child and caregiver. The study collected data from the child, caregiver, and multiple informants, including caseworkers, school, and other family members. The study includes 1,354 eligible children and their caregivers. Steps were taken to improve participant retention, including yearly follow-ups, social services systems check-ups for updated contact information, and project newsletters. Participants were only considered withdrawn from the study if the child passed away or the caregiver requested to be permanently removed.

Each collection site varies in its sample selection to varying levels of exposure to maltreatment. The East cohort includes 282 children served by pediatric clinics in low-income, inner cities. Two hundred forty-five children from the Midwest cohort include one-third of neighborhood controls, and two-thirds report to CPS, half receiving CPS services and half intervention only. The Northwest cohort includes 254 children 0 to 4

years old who were judged to be at moderate risk after a CPS report of suspected maltreatment. The South cohort includes 243 children labeled high-risk at birth by a state public health tracking system. The Southwest cohort includes 330 maltreated children with a caregiver outside the home. Demographic data on the children include (49%) male, (51%) female, with (55.6%) African American, (25.1%) Caucasian, (11%) Mixed Race, (6.8%) Latino/a, and (1.35%) other race/ethnicities. The sample distribution across sites at the age of 14 includes (20.5%) East, (19.4%) Midwest, (18.3%) South, (22.5%) Southwest and (19.3%) Northwest. (14.58 %). The sample had one or more referrals/substantiations for maltreatment (23.02%), high-risk not reported, and (17.92%) were control participants.

# Power Analysis

Power analysis for multiple regression was completed using Cohen's (1988) recommendations. Using G\*Power 3.1.7.9 (Faul et al., 2020) to determine sample size using an alpha of 0.05, power of 0.95, medium effect size (odds ratio = 2.33), and a two-tailed test. Based on common practice, power and alpha were selected (Cohen, 1988). G\*Power 3.1.7.9 indicates a minimum sample size of 89.

#### Archival Data

As noted, data from LONGSCAN were used for this study. Participants from each of the five sites—East, Midwest, Northwest, Southwest, and South—were enrolled in the study at four years old or younger and followed until 18 years old with varying risk levels and maltreatment history (Runyan et al., 2014). Enrollment in the LONGSCAN study started in July 1991 till the age of 18. Administration spanned from January 2004 through

January 2012. Initial enrollment included children four or younger. The primary caregiver and child were evaluated at ages 4, 6, 8, 12, 14, 16, and 18. The children's teachers contributed additional academic performance and social adjustment data starting at age 6. The children and primary caregiver were interviewed separately at 4, 6, and 8 years old using interviewer administration, brief annual phone contact interviews (visits 7, 9, 10, 11, 13, 15, and 17), computer-assisted face-to-face interviews at age 8, and age 12 up the LONGSCAN utilized the (A-CASI) system to provide the most privacy and uniformity in data collection. Child Protective Services and the Central Registry records were periodically reviewed for maltreatment reports.

The data sets for the LONGSCAN are stored at the National Data Archive on Child Abuse and Neglect (NDACAN) website. NDACAN promotes secondary analysis of child abuse and neglect by providing data sets, documentation, and technical support to researchers (US Department of Health and Human Services, n.d.) and is funded by the Children's Bureau, Administration for Children and Families (ACF), and the US Department of Health and Human Services (HHS). The dataset can be obtained by submitting the terms of the use agreement form. Contact information must be submitted to NDACAN before the data request (US Department of Health and Human Services, n.d.). NDACAN datasets are free to access with NDACAN approval based on dataset restrictions; dataset 170 used for this study is unrestricted (US Department of Health and Human Services, n.d.).

## **Instrumentation and Operationalization of Constructs**

# Parents' History of Childhood Maltreatment

Parents' history of childhood maltreatment includes parents' experiences with maltreatment in childhood. The LONGSCAN study researchers used the LONGSCAN Caregiver History of Loss and Victimization assessment to assess the primary caregiver's history of childhood loss or separation from significant others, physical and sexual abuse, and history of physical and sexual assault in adulthood. (Runyan et al., 2014). The LONGSCAN Caregiver History of Loss and Victimization assessment consists of twenty total items to assess the caregiver's history: (8) loss and separation questions, (2) child and adolescent physical maltreatment questions, (3) childhood sexual abuse questions, (3) adolescent sexual abuse questions, (2) adult physical assault questions, and (2) adult sexual assault questions (Runyan et al., 2014). The assessment was reduced to eight items focused on the caregiver's childhood victimization for focused relevancy to this study. Items were scored as Yes (1) and No (0) responses. The responses to these eight statements were summed to create a total count for childhood victimization, with lower scores indicating lower levels of childhood victimization and higher scores indicating higher instances of victimization in childhood. The LONGSCAN researchers include follow-up data for the type of abuse, relationship to the perpetrator, and degree of disturbance on a 4-point scale of 1 (no at all upsetting) to 4 (very upsetting) (Ruyan et al., 2014). Cronbach's alpha was used to assess the internal consistency of the LONGSCAN caregiver's history of childhood victimization. The analysis yielded a Cronbach's alpha

of 0.86, indicating high internal consistency. This suggests that the items in the scale consistently measure caregivers' history of childhood maltreatment for this study.

The reliability and validity of some project-developed measures have yet to be established (University of North Carolina at Chapel Hill, n.d.). Efforts to address the measure's reliability will include internal consistency testing to establish consistency of participant responses across the items on the Loss and Victimization assessment. I will check predictive validity by seeing if this measure relates to parents' maltreatment behaviors.

## Parenting Maltreatment Behaviors

The parents' use of PMB with their children was collected through a survey and administrative records throughout the LONGSCAN project (Runyan et al., 2014). The sample was selected due to varying levels of maltreatment risk. The measure of maltreatment for this study will include both substantiated and unsubstantiated CPS case reports of maltreatment, including maltreatment types: physical abuse, sexual abuse, neglect, and psychological maltreatment (Runyan et al., 2014). Lifetime CPS history is collected from ongoing CPS and state central registry data review. This assessment is relevant to my study because the data measures child neglect and maltreatment. For child maltreatment behaviors, the M\_SDM dataset was used to obtain a count of total maltreatment substantiations from birth through age 18 with time frame breakdowns beginning at age 2 using the Modified Maltreatment Coding System (MMCS) using a modified version of the definitions developed by Barnett et al. (1991). Substantiations of abuse were counted across data collection points if the corresponding maltreatment type

had a conclusion code of 1 (found/substantiated) or 3 (indicated/suspected) with a possible range from 0-99. Time points were reduced from 11 data points to 9 due to overlap, leaving ages 0-2, 2-4, 4-6, 6-8, 8-10, 10-12, 12-14, 14-16, and 16-18. Time points removed due to overlap included ages 0-4 and 8-12. The remaining data points were summed to create a total substantiated report count for analysis, with higher scores indicating higher substantiated reports of childhood maltreatment behaviors by the caregiver.

Reliability will be addressed through internal consistency of reliability, and predictive validity will be assessed against parents' maltreatment behaviors. Cronbach's alpha was used to assess the internal consistency of the LONGSCAN parental maltreatment behaviors. The analysis yielded a Cronbach's alpha of 0.82, indicating high internal consistency. This suggests that the items in the scale consistently measure caregivers' maltreating behaviors for this study.

### Parent-Child Relationship Quality

The LONGSCAN Quality of Parent-Child Relationship: Parent Report is intended to assess the caregiver's perception of the quality of the relationship and educational aspirations with their adolescent child and obtained at 12-, 14-, and 16-year-old data points (LONGSCAN measures, 2012; Ruyan et al., 2014). The measure assesses the caregiver's perception of the overall relationship quality with their adolescent and shared recent activities with their child (Runyan et al., 2014). These subscales include closeness, understanding, trust, shared decision-making, caring, and getting along (Runyan et al., 2014). Additionally, the caregiver's educational aspirations for the child included

questions about the parents' level of disappointment if the child did not graduate high school and college (Runyan et al., 2014). The 6-item scale includes questions such as "How close do you feel to your child?" and "How often do you feel you understand your child?" Response options range from (1) not at all/never to (5) very much/always (McWey, 2014; Fitzgerald & Ledermann, 2019). The six items created an overall relationship quality score, with higher scores indicating higher relationship quality (Fitzgerald & Ledermann, 2019; McWey, 2014). The items were adapted from the ADD Health Study (Resnick et al., 1997). A Cronbach of 0.88 indicates that internal consistency for the LONGSCAN sample was good (Runyan et al., 2014).

## Social Support

The Duke-UNC Functional Social Support Questionnaire (DUFSSQ) (Broadhead et al., 1988) includes 14 self-administered items ranging from (1) As much as I would like to (5) Much less than I would like. Items include questions like "You get help when you are sick in bed" and "Chances to talk to someone I trust about my personal and family problems."

Test-retest reliability reduced the assessment to 11 items, followed by factor analysis and item remainder analysis, reducing the assessment to 8 items (Broadhead et al., 1988). All items are tallied to a composite score, with a higher score indicating greater social support (Broadhead et al., 1988). Epino et al. (2012) established convergent validity using the Hopkins Symptoms Checklist-15 (HSCL-15) and discriminant validity using the Medical Outcome Study-HIV Health Survey (MOS-HIV). Principal analyses of the HSCL-15 and DUFSSQ indicated the one-factor structure of the scales. All items

were loaded to their respective scales with .3 or higher factor loading (Epino et al., 2012). Reliability was indicated with Cronbach's  $\alpha = 0.91$  (Epino et al., 2012).

### **Data Analysis Plan**

SPSS will be used to determine the best fit of the data to regression assumptions. The quantile-quantile plot will be used to evaluate the sample distribution to determine normality (Pallant, 2016). A scatterplot will evaluate a linear pattern between parents' experiences of CM, parents' use of CMB, relationship quality, and social support. A residual plot will determine homoscedasticity and independence (Pallant, 2016).

### Research Questions and Hypotheses

RQ1: To what extent does parents' history of childhood maltreatment relate to current parental maltreating behaviors?

H01: Parents' history of childhood maltreatment is not a significant predictor of current parental maltreating behaviors.

HA1: Parents' history of childhood maltreatment is a significant predictor of current parental maltreating behaviors.

RQ2: To what extent does parent-child relationship quality predict parental maltreatment behaviors?

H02: Parent-child relationship quality is not a significant predictor of parental maltreatment behaviors.

HA2: Parent-child relationship quality is a significant predictor of parental maltreatment behaviors.

- RQ3: To what extent does parent-child relationship quality moderate the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors?
- H03: Parent-child relationship quality does not moderate the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors.
- HA3: Parent-child relationship quality does not moderate the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors.
- RQ4: To what extent does social support predict current parental maltreating behaviors?
- H04: Social support does not directly predict current parental maltreating behaviors.
- HA4: Social support is a direct predictor of current parental maltreatment behaviors.
- RQ5: To what extent does social support moderate the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors?
- H05: Social support does not moderate the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors.
- HA5: Social support moderates the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors.

### Statistical Analysis

Initial data analysis will start with descriptive statistics to develop an overview of the sample, including the mean, median, mode, standard deviation, variance, minimum and maximum variables, and skewness (Pallant, 2016). Data cleaning will include evaluating the data for missing information and outliers. Outliers create issues with analysis results, thus leading to the need to remove those abnormally far from the mean (Pallant, 2016). Outliers can be tested through scatter plots (Schreiber-Gregory, 2018).

Regression analysis will determine the relationship between parents' history of childhood maltreatment, the quality of parent-child relationships, parental maltreatment behaviors, and social support. Regression analysis will be completed for each variable, and a moderation analysis of parent-child relationship quality and social support will be done to determine any moderation effect these variables may have on parental maltreating behaviors. The analysis will use a p-value of .05 and a confidence interval of 95%. Regression analysis evaluates the relationship between parental maltreatment behaviors and the other variables (Schreiber-Gregory, 2018).

Assumptions of regression analysis are essential to selecting a regression model; violating these assumptions can lead to errors in analysis results and limited reliability (Schreiber-Gregory, 2018). The assumptions are normally distributed, linear relationship, independence, and homoscedasticity. Normality in logistics regression means the test distribution is symmetrically bell-shaped with a mean of 0 and a standard deviation of 1 (Schreiber-Gregory, 2018). For a linear relationship, the independent and dependent variables must be linear. The independence assumption includes that independent variables are not highly correlated, and residuals should be independent (Schreiber-Gregory, 2018). Additionally, homoscedasticity assumes that variance is equal at every point.

### Threats to Validity

### **External Validity**

External validity is the extent to which the results of research or testing can be generalized beyond the sample that generated them (APA Dictionary of Psychology, n.d.)

The population includes individuals with childhood maltreatment experiences. The LONGSCAN sample of parents and children used in this study is a heterogeneous group from various locations, socioeconomic statuses, education, and individual-level issues. The data set is separated among five sites in various settings; thus, the threat to external validity is reduced.

## **Internal Validity**

Internal validity is established by testing findings to determine if differences are likely due to chance and examining the study's design and execution to rule out alternative causes (Slack & Draugalis, 2001). Internal validity helps establish the degree of a relationship between the independent and dependent variables. Threats to internal validity can include testing effects, attrition, maturation, history of effects, and sampling bias (Slack & Draugalis, 2001). One consideration for validity with the LONGSCAN is cross-site analyses, which might be reduced through stand-alone evaluation of each site at the cost of statistical power (Runyan et al., 2014). Repeated measures and site-to-site sample variability are also considered for statistical analysis (Runyan et al., 2014). Additional threats to validity include repeat testing, instrumentation changes, and participants' ability to transfer to non-experimental settings (Runyan et al., 2014).

However, different sites used different testing methods, variables of interest, and sample selection methods. Selection bias is a concern because the sample is selected based on the maltreatment spectrum, resulting in heterogeneous samples (Runyan et al., 2014).

# **Construct Validity**

Construct validity is the degree to which a test or instrument can measure a concept, trait, or other theoretical entity (APA Dictionary of Psychology, n.d.). The LONGSCAN data set allowed participants to change sites if they relocated during the project. When combining multiple sites, it will be imperative to evaluate the main effects of the site on the dependent variables, interactions of the site with other predictors in the model, and collinearity between sites with other predictors (Runyan et al., 2014).

#### **Ethical Procedures**

All project sites and coordination centers in the study obtained approval from local Institutional Review Boards and secured Certificates of Confidentiality from the U.S. Public Health Service to protect data from subpoenas (Runyan, 1998). The Human Subjects Committee oversaw ethical considerations for the project, including protocols for informed consent, data collection processes, enduring child well-being, and subject confidentiality (Runyan, 1998). Participant identity is protected by assigning ID numbers for participants, and all interview dates were changed to the 15th of the month the interview was conducted (Runyan et al., 2014). Secondary and primary identifiers were removed from the data set (Ruyan et al., 2014).

Ethical Procedures include obtaining IRB and NCCAN approval. The LONGSCAN data was kept on a password-protected computer and flash drive. The

electronic devices with data will be kept in a locked filing cabinet when unused. An exploration of SPSS will be conducted for data analysis. Data access is available for three years, and results will be maintained for five years.

# **Summary**

In this non-experimental quantitative study, I will use archival data to assess the difference between parents' history of maltreatment, social support, and parent-child relationship quality in parents' use of maltreatment behaviors. The goal is to predict the impact of parents' childhood maltreatment experiences on parental functioning in a population of at-risk children. The study includes descriptive statistics, a correlational design, and a multiple regression approach.

### Chapter 4: Results

The purpose of this quantitative study was to examine the relationship between parental history of childhood maltreatment, social support, and parent-child relationship quality and their effect on current parental maltreatment behaviors. The study's focus was to identify if parents' history of childhood maltreatment, current social support quality, or relationship quality related to current parental maltreating behaviors. In addition, I sought to identify if social support or relationship quality moderated parental maltreatment behaviors when a parent experiences childhood maltreatment. It was hypothesized that parental history of childhood maltreatment measured with the LONGSCAN Caregiver History of Loss and Victimization assessment predicts current parental maltreatment behaviors evaluated using the CPS and state registry data. In addition, it was hypothesized that social support measured using the Duke-UNC Functional Social Support Questionnaire (DUFSSQ) and relationship quality assessed with the LONGSCAN Quality of Parent-Child Relationship: Parent Report would predict and moderate parental maltreatment behaviors when controlling for parents' history of childhood maltreatment.

#### **Data Collection**

Data was collected following the IRB guidelines and after IRB approval. There were no discrepancies in data collection from the plan presented to the IRB in Chapter 3. Approval to submit the terms of use agreement form to NDACAN was provided on August 26, 2022, and data orders were placed with NDACAN on August 29, 2022. An NDACAN representative provided instructions for data access on August 30, 2022. The

NDACAN representative shared access to the data file on September 2, 2022. Final study approval was received on September 6, 2022.

The LONGSCAN data files were downloaded to a password-protected computer. The NDACAN representative provided the data file using Box.com to securely share access to the LONGSCAN data set with a ten-day access expiration to download the files. The data were prepared for analysis, and new files were created for the necessary variables relevant to this study and merged into a single set using the ID. The final data set was inspected to identify errors, outliers, and missing data. Files with missing data and outliers were removed.

Baseline demographics data for the final sample included 294 youth and their parents who participated throughout the study (Runyan et al., 2014). The sample was reduced to 294 based on subjects' participation in all service measures relevant to the current study and the removal of subjects not meeting these requirements. Frequency statistics were completed for gender, child's age at first CPS referral age, race/ethnicity, and site location. The majority of participants in the study were female (n = 156, 53%), with male participants slightly lower (n = 138, 47%). Youth primary fell in the African American (n = 146, 49.7%) and Caucasian (n = 100, 34%) categories, followed by Hispanic (n = 7, 2.4%), Native American (n = 2, .7%), Mixed Race (n = 38, 212.9%), and other (n = 1, .3%). The average age of the participants was 8.42 years old (SD = 3.33, Min = 4, Max = 18). Child participants in the study were born between 1986 and 1995, and the age at first maltreatment referral ranged from under a year old (n = 75, 25.5%) to 18 (n = 1, .3%).

Furthermore, site location statistics included locations EA (n = 39, 13.3%), MW (n = 70, 23.8%), NW (n = 143, 48.6%), and SO (n = 42, 14.3%). The Southwest site was excluded due to the location not collecting parents' childhood maltreatment history services with participants since caregivers were foster providers with children in foster care. The study's sample is proportional to the larger population of interest regarding age and gender. The participants are followed across childhood to early adulthood for those who experienced confirmed maltreatment. Gender is representative of the larger population of children.

#### Results

I performed a skew, mean, kurtosis, and SD analysis to test the violations of the underlying assumptions. The descriptive characteristics provided are for parents' history of childhood maltreatment, parents' reports of parent-child relationship quality, and caregivers' reports of social support. The parent's history of childhood maltreatment (M = 5.04, SD = 5.04, parent-child relationship quality (M = 43.59, SD = 5.42), social support (M = 39.72, SD = 7.89), and total substantiations of child maltreatment (M = 3.19, SD = 3.66).

A correlation analysis was conducted to explore the relationship between parents' childhood maltreatment, social support, parent-child relationship quality, and current parental maltreating behaviors. Parents' maltreatment history is positively correlated with the total substantiation of parental maltreatment behaviors (r = 0.05, p = .39), but not significantly. This indicates a weak positive association between parents' maltreatment history and the number of parental maltreatment behavior substantiations. Results

indicated a negative correlation with social support (r = -.31, p = .03), indicating that individuals with a history of childhood maltreatment tend to perceive lower social support. Additionally, there was no significant correlation between parents' maltreatment history and parent-child relationship quality (r = -.02, p = .74), suggesting there is no strong linear relationship between these variables. A significant correlation between parent-child relationship quality and parental maltreatment behaviors was not significant (r = .01, p = .82). Suggesting the perceived quality of the parent-child relationship is not strongly associated with child maltreatment behaviors.

Linear regression was conducted to understand the effect of parental history of childhood maltreatment on current maltreating behaviors, parent-child relationship quality on current maltreating behaviors, and social support on current parental maltreating behaviors. A scatterplot of each regression with a superimposed regression line was plotted to assess linearity. Visual inspection of the plot indicated a linear relationship between the variables—residuals, as assessed by a Durbin-Watson statistic of 1.93.

A linear regression analysis was conducted to test the significance of three predictor variables: parents' history of childhood maltreatment, parent-child relationship quality, and social support in predicting childhood maltreatment behaviors. The linear regression established that parents' history of childhood maltreatment is not a significant predictor of child maltreating behaviors, F(1, 292) = .75, p < .39, with an  $R^2$  of .00. Parent-child relationship quality was not found to be a significant predictor of child maltreatment behaviors, F(1, 292) = .05, p < .82, with  $R^2$  of -.00. Additionally, it was

found that social support also was not a significant predictor of child maltreatment behaviors, F (1,292) .00, p < .95, with  $R^2$  of -.00.

To investigate the extent to which parent-child relationship quality moderates the relationship between parents' history of childhood maltreatment and current parental maltreating behaviors, a series of hierarchical regression analyses following guidelines from Baron and Kenny (1986) was computed. Control variables were entered into the first step; the independent variable was entered into the second step of the regression. The moderator variable was then entered into the third step. Lastly, the interaction term was entered into the last step. A significant change in  $R^2$  produced by the interaction term entered in the last step would indicate that the moderator variable influenced the association between the predictor and criterion variables. The outcome variable for the analysis was child maltreatment behavior. The predictor variable evaluated for the analysis was the parents' history of childhood maltreatment. The moderator variable evaluated for the analysis was the parent-child relationship quality.

Child maltreatment behaviors were the dependent variable, and parental history of childhood maltreatment was entered into the first step [ $\beta$ =.05, p = .39), change in  $R^2$  = .00, F change (1, 292) .75 =, p = .39.]. Parent-child relationship quality was entered in the second step [( $\beta$  = -.02, p = .73) change in  $R^2$  = .00, F change (1, 291) = .12, p = .73]. The interaction term (Parental maltreatment behaviors x Parent-child relationship quality) was entered into the third and final step. The interaction term was not significant [( $\beta$  = -.06, p = .30) change in  $R^2$  = .00, F (1, 290) = 1.06, p = .30]. A second analysis was conducted with social support. Parents' history of childhood maltreatment was the dependent

variable, and then parental maltreatment behavior was entered into the first step [( $\beta$  =.05, p =.39) change in  $R^2$  = .003, F change (1, 292) = .75, p = .39]. Social Support was entered in the second step [ $\beta$ = -.13, p = .02) change in  $R^2$  = .02, F change (1, 291) = 5.11, p = .02]. The interaction term (parental maltreatment behaviors x social support) was entered into the third and final step. The interaction term wasn't significant [( $\beta$  = -.03, p = .68 change in  $R^2$  = .00, F change (1, 290) = .17, p = .68].

#### **Summary**

This study aimed to examine five research questions by examining the predictive relationships between parents' history of childhood maltreatment, parental maltreating behaviors, parent-child relationship quality, and social support. Additionally, the study aimed to evaluate if a moderating relationship existed between parent-child relationship quality or social support towards parental maltreating behaviors. Simple linear regressions were conducted to evaluate the relationship between parents' history of childhood maltreatment and parental maltreating behaviors, parents' history of childhood maltreatment and relationship quality, and parental childhood maltreatment history and social support. A series of hierarchical regression analyses were conducted to evaluate the moderating relationship between relationship quality and social support.

Utilizing IBM SPSS software version 28.0.1.0 and a sample size of 294 yielded the following results. For the first research question, to what extent does parents' history of childhood maltreatment relate to current parental maltreating behaviors, there was no significant predictive relationship. Parent-child relationship quality was not found to be a statistically significant predictor of parental maltreatment behaviors. Social support was

not found to be a statistically significant predictor of parental maltreated behaviors.

Neither moderation term was found to significantly moderate the relationship between parental childhood maltreatment and parental maltreatment behaviors, with relationship quality or social support.

A review of data collection processes, data cleaning processes, descriptive statistics, statistical analysis, results, and summarization were provided in this chapter. Chapter 5 will further explore an overview of these findings, interpretations of the findings, limitations of the study, future recommendations, and implications of these results.

### Chapter 5: Discussion, Conclusions, and Recommendations

The purpose of this study was to explore further parental maltreatment experiences and their interaction with parental maltreating behaviors while considering social support and parent-child relationship quality as potential moderators. The impact of parent-child relationship quality in conjunction with social support on the use of maltreating behaviors by parents who report childhood maltreatment histories has not been explored up to this point. Previous research suggests that social support influences mental health symptomology and severity in survivors of trauma with relational and childhood abuse (Dodson & Beck, 2021). However, further exploration is needed into the potential predictive relationship between childhood maltreatment experiences and parental maltreating behaviors with consideration for social support and parent-child relationship quality, which will benefit developmental psychology (Kong & Martire, 2019).

This research study was conducted to explore further the relationship between experiencing childhood maltreatment and maltreating one's children in adulthood with consideration for the potential influence of social support and parent-child relationship quality on maltreating behaviors. Furthermore, the study aimed to fill the gap in the literature associated with the moderating influence of social support or parent-child relationship quality on maltreating behaviors in parents with childhood maltreatment experiences. I hypothesized that the parents' history of childhood maltreatment would influence parental maltreatment behaviors with social support and relationship quality, which moderates the relationship between parental maltreatment behaviors and

experiences. The key findings from this study, however, suggest there is not a significant relationship between parents' experience of childhood maltreatment and maltreating behaviors

# **Interpretation of Findings**

The results of this analysis suggest that parents' history of childhood maltreatment, parent-child relationship quality, or social support do not significantly predict child maltreating behaviors. Additionally, the moderation analyses indicate that neither parent-child relationship quality nor social support significantly moderates the relationship between parents' childhood maltreatment and current parental maltreating behaviors. The correlation analysis results indicate there are no statistically significant correlations between parents' history of childhood maltreatment, parent-child relationship quality, social support, and child maltreatment behaviors. These findings suggest that the linear relationship between the variables is weak or non-existent. Based on these results, findings from previous researchers like Assink et al. (2018) cannot be supported with this data set. Furthermore, the lack of a relationship between parental maltreatment behaviors and parents' childhood maltreatment experiences indicates insufficient evidence for moderation analysis. However, a regression analysis and moderation analysis were performed for further interpretation of the analysis results.

The first regression analysis tested the independent variable parents' childhood maltreatment history ability to predict the dependent variable child maltreatment behaviors. Results indicated there was not a significant relationship between experiencing childhood maltreatment and using maltreatment behaviors with one's children. In

conclusion, based on the analysis results, the study cannot reject the null hypothesis that parents' history of childhood maltreatment does not significantly predict parental maltreatment behaviors. This suggests that other factors or variables beyond parents' maltreatment history may influence the occurrence of maltreatment behaviors. It is essential to consider the study's limitations and explore additional factors that could contribute to understanding parental maltreatment behaviors.

A second regression analysis was conducted to examine the hypothesis that the quality of the parent-child relationship would significantly predict parental maltreatment behaviors. The analysis aimed to determine if the parent-child relationship quality could effectively predict parent maltreatment behaviors, measured by "total substantiations of child maltreatment." The results indicated no statistically significant support for parent-child relationship quality as a predictive factor in parental maltreatment behaviors.

Within the scope of this study, the link between parent-child relationship quality and parental maltreatment behaviors does not indicate a significant level of predictability.

Furthermore, these results do not indicate a significant relationship between parent-child relationship quality and parental maltreatment behaviors. It is still important to explore the implications of a third variable in the form of moderation analysis to determine how parent-child relationship quality might moderate parental maltreating behaviors and parents' history of maltreatment.

The final regression analysis was conducted to examine the relationship between social support and parental maltreatment behaviors. The results showed no significant association between social support and parental maltreating behaviors. The results of the

regression analysis demonstrated that social support is not a statistically significant predictor of parental maltreatment behaviors. Thus, the study failed to reject the null hypothesis that social support would predict parental maltreatment behaviors. It is essential to consider potential factors impacting parental maltreatment behaviors in future research.

#### Moderation

Despite the lack of a significant relationship found in the regression analysis, moderation analysis could spotlight if a relationship exists between parents' history of maltreatment and parental maltreatment behaviors at different levels of social support or parent-child relationship quality. Furthermore, the lack of a significant relationship between relationship quality or social support and parental maltreating behaviors does not rule out a potential moderating effect of either variable. A moderation analysis was conducted to assess the study's fourth hypothesis: Does parent-child relationship quality moderate the relationship between parents' history of maltreatment and their maltreatment behaviors? Previous research found that parent-child relationship quality was only a moderator when including race children who experienced maltreatment (Fagan, 2020). The analysis did not present a significant moderating effect on parentchild relationship quality for the relation between parenting using maltreatment behaviors and their childhood maltreatment histories. Research has indicated increased challenges to the parent-child relationship quality in mothers who had a history of CM (Amos & Segal, 2018). However, these results suggest further investigation is needed to understand better the impact of parents' childhood maltreatment on parental functioning. Future

research might be necessary to understand potential factors or additional variables contributing to the lack of a statistically significant effect.

Although the results suggest that parents' childhood maltreatment experiences do not directly predict child maltreatment behaviors, the negative relationship between social support quality and maltreatment behaviors indicates a potential impact of social support on maltreating behaviors. These findings imply that social support systems can impact parental behaviors and perspectives. With further research, the field of developmental psychology could benefit from further exploration of the impact social support quality has on parenting and maltreatment behaviors. These results highlight that additional factors can provide a mitigating influence on parents engaging in child maltreatment behaviors, regardless of parents' history of childhood maltreatment experiences. Further investigation within the context of the LONGSCAN data should include a deeper exploration of potentially mediating or moderating variables; this can provide deeper insights into the mechanisms underlying the relationships between childhood maltreatment, social support, and subsequent parenting behaviors.

### **Implications**

The negative correlation between social support and parents' history of childhood maltreatment suggests that individuals who have experienced childhood maltreatment tend to perceive lower levels of social support. This emphasizes the need for interventions and support systems focusing on individuals with a history of childhood maltreatment. Strengthening social support networks could serve as a protective factor, helping to mitigate the adverse effects of childhood maltreatment and reduce the

likelihood of engaging in maltreating behaviors. The lack of significant correlations and predictors in the linear regression and moderation analyses implies that the relationship between parents' history of childhood maltreatment and their current parental maltreating behaviors is influenced by multiple factors beyond the variables examined in this study. A complex interplay of individual experiences, environmental factors, and personal characteristics influences parenting behaviors.

The absence of a significant relationship between parent-child relationship quality and child maltreatment behaviors underlines the complexity of the parent-child relationship. In previous research, the quality of parent-child relationships has been shown to impact the development of individuals across their lifespan (Fagan, 2020; Fenerci & DePrince, 2018). This suggests that though the perceived quality of the parent-child relationship might not directly predict maltreatment behaviors, other unmeasured aspects of this relationship might be influential, including but not limited to race, socioeconomic status, previous interventions, and parents' parenting knowledge. Exploring additional dimensions of parent-child interactions could provide a more comprehensive understanding of these dynamics.

The finding that parents' history of childhood maltreatment, parent-child relationship quality, and social support were not significant predictors of child maltreatment behaviors might reflect the intricate nature of these relationships within the LONGSCAN study dataset. These results further emphasize the uniqueness and diversity of factors that might influence child maltreating behaviors outside this study's scope. The academic community needs to consider each factor when analyzing child maltreating

behaviors. The absence of significant moderation effects in both analyses (parent-child relationship quality and social support) suggests that within this study, these variables might not substantially influence the relationship between parents' history of childhood maltreatment and their current parental maltreating behaviors. This could indicate that other variables not included in the analysis could moderate this relationship, warranting further investigation.

In conclusion, this analysis provides valuable insights into the relationships between parents' history of childhood maltreatment, social support, parent-child relationship quality, and child maltreatment behaviors within the LONGSCAN study. Though the findings offer preliminary insights, they also highlight the need for ongoing research and a multidimensional approach to address the complex issues surrounding child maltreatment comprehensively. Future research should consider a broader range of potential factors to understand this intricate relationship better.

# **Limitations of the Study**

The study's limitations and data set include the secondary analysis nature of longitudinal archival data, the accuracy of respondent survey responses, and the study's focus on childhood maltreatment survivors. First, the LONGSCAN data set uses multiple measures that are yet to be evaluated for validity and reliability. Measures for this analysis were provided from multiple sites and data collection points. The accuracy and completeness of the data set cannot be verified. Possible researcher bias and participant understanding could also have an impact on the accuracy of the data set. The

respondents' personal bias could have also impacted their willingness to truthfulness on survey measures along with the recall limitations of the respondent.

Additionally, the focus on parents with CM limits generalizability to parents without CM histories. The sample for this study is limited to youth data points of 12, 14, and 16-year-olds; the surveys for parent-child relationship quality and social support could significantly vary across the life of participants. The sample focus limits the generalizability of results to other child age groups, with this study focusing on children and their parents from enrollment before age two through early adulthood. These limitations reduce the generalizability of study results. The sample is collected from multiple geographic areas, reducing generalizability limitations to the U.S. population and caregivers who may not be biologically related to the child participants.

### Recommendations

Developmental psychology focuses on development across the life span and considers the impact of various factors on health growth and development. Previous research has supported that childhood maltreatment experiences impact various areas of one's life, including relationships, mental health, and help-seeking behaviors (Badr et al., 2018; Flynn, Cicchetti, & Rogosch, 2014). It is recommended that future research focuses on clearly identifying factors reducing health development in these areas of life and work to reduce the use of child maltreating behaviors. This study provides knowledge of developmental psychology that can guide policymakers, individuals working with families and children, and researchers to identify protective factors to increase healthy parental functioning. Furthermore, this study contributes to the understanding of the cycle

of violence and social learning theory to understand development in the context of parental maltreatment history and childhood maltreatment, highlighting a need for early interventions to focus on factors on parental maltreating behaviors outside of parents' history of childhood maltreatment. Furthermore, future research should evaluate the impacts of parent-child relationship quality social support rankings to better understand how these are perceived across cultures. As the United States has a diverse population of individual parenting practices, evaluating these variables in the context of different cultural beliefs about parenting would be beneficial. Future research should also consider the impact gender might have on perceived parent-child relationship quality, social support, and maltreating behaviors.

## Conclusion

The finding is that parent-child relationship quality, the parents' history of childhood maltreatment, parents' use of maltreating behaviors, and social support are essential to the field of developmental psychology. The literature has demonstrated a history of significant impacts on psychological and social functioning for individuals experiencing childhood maltreatment (Kong & Martire, 2019). Findings from this study support the importance of a thorough evaluation of the impact childhood maltreatment has on parenting practices, including a need for further understanding of factors associated with social support and social support utilization of survivors. This study contributes to the ongoing understanding of childhood maltreatment, urging future research to consider intervention and prevention methods focused on effective models addressing key influences of maltreatment behaviors. Future research can use a wider

variety of variables, research design, and diverse populations to build the field of knowledge to mitigate the transmission of abusive behaviors.

## References

- Abramovaite, J., Bandyopadhyay, S., & Dixon, L. (2015). The dynamics of intergenerational family abuse: A focus on child maltreatment and violence and abuse in intimate relationships. *Journal of Interdisciplinary Economics*, 27(2), 160–174. https://doi.org/10.1177/0260107915582254
- Amos, J., & Segal, L. (2018). Disrupting intergenerational maternal maltreatment in middle childhood: Therapeutic objectives and clinical translation. *Frontiers in Psychiatry*, 9, 1–10. https://doi.org/10.3389/fpsyt.2018.00623
- APA Dictionary of Psychology. (n.d.). External validity. American Psychological Association dictionary. https://dictionary.apa.org/external-validity
- Assink, M., Spruit, A., Schuts, M., Lindauer, R., van der Put, C. E., & stams, G. J. (2018). The intergenerational transmission of child maltreatment: A three-level meta-analysis. *Child Abuse & Neglect*, 84, 134–145. https://doi.org/10.1016/j.chiabu
- Atzl, V. M., Grande, L. A., Davis, E. P., & Narayan, A. J. (2019). Perinatal promotive and protective factors for women with histories of childhood abuse and neglect.
  Child Abuse & Neglect, 91, 63–77. https://doi.org/10.1016/j.chiabu.2019.02.008
- Babcock Fenerci, R., & DePrince, A. (2018). Shame and alienation related to child maltreatment: Links to symptoms across generations. *Psychological Trauma: Theory, Research, Practice, and Policy, 10*(4), 419–426.

  https://doi.org/10.1037/tra0000332
- Badr, H. E., Naser, J., Al-Zaabi, A., Al-Saeedi, A., Al-Munefi, K., Al-Houli, S., & Al-

- Rashidi, D. (2018). Childhood maltreatment: A predictor of mental health problems among adolescents and young adults. *Child Abuse & Neglect*, 161–171. https://doi.org/10.1016/j.chiabu.2018.03.011
- Bandura, A. (1971). Social learning theory. General Learning Press.
- Bandura, A. (1999). Social cognitive theory: An agentic perspective. *Asian Journal of Social Psychology*, 21–41. https://doi.org/10.1111/1467-839X.00024
- Bandura, A. (2019). The social learning theory of aggression. In R. A. Falk, & S. S. Kim (Eds.), *The war system: An interdisciplinary approach* (pp. 141–156). Routledge.
- Bartlett, J., Kotake, C., Fauth, R., & Easterbrooks, M. (2017). Intergenerational transmission of child abuse and neglect: Do maltreatment type, perpetrator, and substantiation status matter? *Child Abuse & Neglect*, 63, 84–94. https://doi.org/10.1016/j.chiabu.2016.11.021
- Baumeister, R., & Leary, M. (1995). The need to belong: Desire for interpersonal attachments as fundamental human motivation. *Psychological Bulletin*, *117*(3), 497–529. https://doi.org/10.1037/0033-2909.117.3.497
- Birditt, K. S. (2009). Tensions in the parent and adult child relationship: Links to solidarity and ambivalence. *Psychology and Aging*, *24*(2), 287–295. https://doi.org/10.1037/a0015196
- Bisin, A., & Verdier, T. (2001). The economics of cultural transmission and the dynamics of preferences. *Journal of Economic Theory*, *97*(2), 298–319. https://doi.org/10.1006/jeth.2000.2678
- Borelli, J., Cohen, C., Pettit, C., Normandin, L., Target, M., Fonagy, P., & Ensink, K.

- (2019). Maternal and child sexual abuse history: An intergenerational exploration of children's adjustment and maternal trauma-reflective functioning. *Frontiers in Psychology*, 1–11. https://doi.org/10.3389/fpsyg.2019.01062
- Brown, J. (2014). *Bown family systems theory and practice: Illustration and critique*. http://www.thefsi.com.au/wp-content/uploads/2014/01/Bowen-Family-Systems-Theory-and-Practice\_Illustration-and-Critique.pdf
- Charuvastra, A., & Cloitre, M. (2008). Social bonds and posttraumatic stress disorder.

  \*\*Annual Review of Psychology, 59(2008), 301–328.\*\*

  https://10.1146/annurev.psych.58.110405.085650
- Child Welfare Information Gateway. (2019). What is child abuse and neglect?

  Recognizing the signs and symptoms.

  https://www.childwelfare.gov/pubPDFs/whatiscan.pdf
- Christie, H., Talmon, A., Katharina Schafer, S., De Hann, A., Louison Vang, M., Haag, K., Brown, E. (2017). The transition to parenthood following a history of childhood maltreatment: A review of the literature on prospective and new parents' experiences. *European Journal of Psychotraumatology*, 8, 1–16. https://doi.org/10.1080/20008198.2018.1492834
- Cohen, J. (1988). Statistical power analysis for the behavioral sciences.

  http://www.utstat.toronto.edu/~brunner/oldclass/378f16/readings/CohenPower.pd
  f
- Daly, M., & Baumeister, R. (2009). Social support and mental health. In *Salem Health:*\*Psychology & Mental Health (pp. 1838–1841). Salem Press.

- Dixon, L., Browne, K., & Hamilton-Giachritsis, C. (2009). Patterns of risk and protective factors in the intergenerational cycle of maltreatment. *Journal of Family Violence*, 111-122. https://doi.org/10.1007/s10896-008-9215-2
- Drake, B., Jonson-Reid, M., & Sapokaite, L. (2006). Re-reporting of child maltreatment: does participation in other public sector services moderate the likelihood of a second maltreatment report? *Child abuse & neglect, 11*, 1201-1226. https://doi.org/10.1016/j.chiabu.2006.05.008
- Epino, H. M., Rich, M. L., Kaigamba, F., Hakizamungu, M., Socci, A. R., Bagiruwigize, E., & Franke, M. F. (2012). Reliability and construct validity of three health-related self-report scales in HIV-positive adults in rural Rwanda. *Informa Healthcare*, 1576-83. https://doi.org/10.1080/09540121.2012.661840
- Fagan, A. (2020). Child maltreatment and aggressive behaviors in early adolescence:

  Evidence of moderation by parent/child relationship quality. *Child Maltreatment*,

  25(2), 182-191. https://doi.org/10.1177/1077559519874401
- Faul, F., Erdfelder, E., Lang, A., & Buchner, A. (2007). G\*Power 3: A flexible statistical power analysis program for the social, behavioral, and biomedical sciences.

  \*Behavior Research Methods, 39(2), 175-191.
- Fenerci, R. L., & DePrince, A. P. (2018). Intergenerational transmission of trauma:

  Maternal trauma-related cognitions and toddler symptoms. *Child Maltreatment*,

  23(2), 126-136. https://doi.org/10.1177/1077559517737376
- Fenfang, L., & Godinet, M. (2014). The impact of repeated maltreatment on behavioral trajectories from early childhood to early adolescence. *Child and Youth Services*

- Review, 36, 22-29. https://doi.org/10.1016/j.childyouth.2013.10.014
- Finzi-Dottan, R., & Harel, G. (2014). Parents' potential for child abuse: An intergenerational perspective. *Journal of Family Violence*, 29(4), 397–408. https://doi.org/10.1007/s10896-014-9592-7
- Flynn, M., Cicchetti, D., & Rogosch, F. (2014). The prospective contribution of childhood maltreatment to low self-worth, low relationship quality, and symptomatology across adolescence: A developmental-organizational perspective. *Developmental Psychology*, *50*(9), 2165-2175. https://doi.org/10.1037/a0037162
- Fortson, B. L., Klevens, J., Merrick, M. T., Gilbert, L. K., & Alexander, S. P. (2016).

  \*Preventing child abuse and neglect: A technical package for policy, norm, and programmatic activities. Atlanta: National Center for Injury Prevention and Control, Centers for Disease Control and Prevention.

  https://www.cdc.gov/violenceprevention/pdf/can-prevention-technical-package.pdf
- Goldberg, A. E. (2019). Parental substance use disorder and child abuse: Risk factors for child maltreatment. *Psychiatry, psychology and law, 26*(6), 959-969. https://doi.org/10.1080/13218719.2019.1664277
- Guyon-Harris, K. L., Madigan, S., Bronfman, E., Romero, G., & Huth-Bocks, A. C. (2020). Prenatal identification of risk for later disrupted parenting behavior using latent profiles of childhood maltreatment. *Journal of Interpersonal Violence*, 00(0), 1-24. https://doi-org.ezp.waldenulibrary.org/10.1177/0886260520906175

- Harel, G., & Finzi-Dottan, R. (2018). Childhood maltreatment and its effect on parenting among high-risk parents. *Journal of Child & Family Studies*, *27*(5), 1513-1524. https://doi.org/10.1007/s10826-017-0994-z
- Jaffee, S. (2017). Child maltreatment and risk for psychopathology in childhood and adulthood. *Annual Review of Clinical Psychology*, *13*, 525-551. https://doi.org/10.1146/annurev-clinpsy-032816-045005
- Johnson, J. E., & James, C. (2016). Effects of child abuse and neglect on adult survivors.

  \*Early Child Development and Care, 186(11), 1836-1845. https://www-tandfonline-com.ezp.waldenulibrary.org/doi/pdf/10.1080/03004430.2015.1134522?needAccess=true
- Karrass, J., & Walden, T. (2005). Effects of nurturing and non-nurturing caregiving on child social initiatives: An experimental investigation of emotion mediating social behavior. *Social Development*, 14(4), 685-700. https://doi.org/10.1111/j.1467-9507.2005.00324.x
- Kim, B., & Maguire-Jack, K. (2015). Community interaction and child maltreatment.

  Child Abuse & Neglect, 41, 146-157. https://doi.org/10.1016/j.chiabu.2013.07.020
- Kim, J. (2009). Type-specific intergenerational transmission of neglectful and physically abusive parenting behaviors among young parents. *Children and Youth Services*\*Review, 31(7), 761-767. https://doi.org/10.1002/cbm.708
- Kong, J., & Martire, L. (2019). Parental childhood maltreatment and the later-life relationship with parents. *Psychology and Aging*, *34*(7), 900-911. https://doi.org/

- 10.1037/pag0000388
- Lavi, I., Manor-Binyamini, I., Seibert, E., Katz, L., Ozer, E., & Gross, J. (2019). Broken bonds: A meta-analysis of emotion reactivity and regulation in emotionally maltreating parents. *Child Abuse & Neglect*, 88, 376-388.
  https://doi.org/10.1016/j.chiabu.2018.11.016
- Li, F., & Godinet, M. T. (2014). The impact of repeated maltreatment on behavioral trajectories from early childhood to early adolescence. *Children and Youth Services Review*, *36*, 22-29. https://doi.org/10.1016/j.childyouth.2013.10.014
- Liu, S., Kia-Keating, M., Nylund-Gibson, K., & Barnett, M. (2019). Co-occurring youth profiles of adverse childhood experiences and protective factors: Associations with health, resilience, and racial disparities. *American Journal of Community Psychology*, 1-14. https://doi.org/10.100/ajcp.12387
- Lo, C. K., Chan, K. L., & Ip, P. (2019). Insecure adult attachment and child maltreatment: A meta-analysis. *Trauma, Violence, & Abuse, 20*(5), 706-719. https://doi.org/10.1177/1524838017730579
- McWey, L. M., Claridge, A. M., Wojciak, A. S., & Lettenberger-Klein, C. G. (2015).

  Parent-adolescent relationship quality as an intervening variable on adolescent outcomes among at-risk families: Dyadic Analyses. *Family Relations*, 64(2), 249-262. https://doi.org/10.1111/fare.12111
- Milaniak, I., & Widom, C. S. (2015). Does Child Abuse and Neglect Increase Risk for Perpetration of Violence Inside and Outside the Home? Psychology of violence, 5(3), 246–255. https://doi.org/10.1037/a0037956

- Miller-Perrin, C., & Perrin, R. (2012). History and definitions of child maltreatment. InC. Miller-Perrin, & R. Perrin, *Child Maltreatment: An Introduction* (pp. 1–29).Los Angeles: Sage.
- Munzer, A., Ganser, H. G., & Goldbeck, L. (2017). Social support, negative maltreatment-related cognitions and posttraumatic stress symptoms in children and adolescents. *Child Abuse & Neglect*, *63*, 183-191. https://doi.org/10.1016/j.chiabu.2016.11.015
- Murphy, A., Steele, M., Dube, S. R., Bate, J., Bonuck, K., Meissner, P., . . . Steele, H. (2014). Adverse childhood experiences (ACEs) questionnaire and adult attachment interview (AAI): Implications for parent-child relationships. *Child Abuse & Neglect*, 38(2), 224–233. https://doi.org/10.1016/j.chiabu.2013.09.004
- Negriff, S. (2020). ACEs are not equal: Examining the relative impact of household dysfunction versus childhood maltreatment on mental health in adolescence. 

  Social science & medicine, 245, 1-8.

  https://doi.org/10.1016/j.socscimed.2019.112696
- Pallant, J. (2016). SPSS survival manual: A step-by-step guide to data analysis using IBM SPSS (6th ed.). New York: McGraw Hill Education.
- Pasalich, D., Fleming, C., Spieker, S., Lohr, M., & Oxford, M. (2019). Does parents' own history of child abuse moderate the effectiveness of promoting first relationship intervention in child welfare? *Child Maltreatment*, *24*(1), 56-65. https://doi.org/10.1177/1077559518809217
- Pears, K. C., & Capaldi, D. M. (2001). Intergenerational transmission of abuse: A two-

- generational prospective study of an at-risk sample. *Child abuse & neglect*, 25(11), 1439–1461. https://doi.org/10.1016/s0145-2134(01)00286-1
- Resnick, M., Bearman, P. S., Blum, R., Bauman, K. E., Harris, K. M., Jones, J., . . . Udry, J. R. (1997). Protecting adolescents from harm. Findings from the National Longitudinal Study on Adolescent Health. *Journal of the American Medical Association*, 278(19), 823–832. https://doi.org/10.1001/jama.1997.03550100049038
- Rodriquez, C., & Tucker, M. (2011). Behind the cycle of violence, beyond abuse history:

  A brief report on the association of parental attachment to physical child abuse potential. *Violence and Victims*, 26(2), 246-56.

  https://doi.org/http://dx.doi.org/10.1891/0886-6708.26.2.246
- Runyan, D., H., English, D. J., Kotch, J. B., Litrownik, A., Thompson, R., & Group, T. L. (2014). Longitudinal studies of child abuse and neglect (LONGSCAN) assessments 0-18 [Dataset]. National Data Archive on Child Abuse and Neglect. https://doi.org/10.34681/cxpj-5m96
- Runyan, Dubowitz, H., E., D., Kotch, J., Litrownik, A., Thompson, R., & The LONGSCAN group. (2014). Longitudinal studies of child abuse and neglect (LONGSCAN) assessments 0-18 [Dataset]. *National Data Archive on Child Abuse and Neglect*, 1–83. https://doi.org/10.34681/cxpj-5m96
- Savage, L., Tarabulsy, G., Pearson, J., Collin-Vezina, D., & Gagne, L. (2019). Maternal history of childhood maltreatment and later parenting behavior: A meta-analysis. Development and Psychopathology, 31, 9-21.

- https://doi.org/http//www.doi.org/10.1017/s0954579418001542
- Schofield, T., Lee, R., & Merrick, M. (2013). Safe, stable, nurturing relationships as a moderator of intergenerational continuity of child maltreatment: A meta-analysis.

  \*\*Journal of Adolescent Health, 53(4), S32-S38.\*\*

  https://doi.org/10.1016/j.jadohealth.2013.05.004
- Schreiber-Gregory, D. N. (2018). Logistic and linear regression assumptions: Violation recognition and control.

  https://www.researchgate.net/publication/341354759\_Logistic\_and\_Linear\_Regre
  - ssion\_Assumptions\_Violation\_Recognition\_and\_Control
- Shields, A., & Cicchetti, D. (1998). Reactive aggression among maltreated children: The contributions of attention and emotion dysregulation. *Journal of Clinical Child Psychology*, 27(4), 381-395. https://doi.org/10.1207/s15374424jccp2704\_2
- Sidebotham, P., & Heron, J. (2006). Child maltreatment in the "children of the nineties":

  A cohort study of risk factors. *Child Abuse & Neglect*, 30, 497-522.

  https://doi.org/10.1016/j.chiabu.2005.11.005
- Slack, M. K., & Draugalis, J. R. (2001). Establishing the internal and external validity of experimental studies. *American Journal of Health-System Pharmacists*, *58*(22), 2173-2181. https://doi.org/10.1093/ajhp/58.22.2173
- Sroufe, L. (1983). *Infant-caregiver attachment and patterns of adaption in preschool:*The roots of maladaptation and competence (Vol. 16).
- St-Laurent, D., Dubois-Comtois, K., Milot, T., & Caninotti, M. (2019). Intergenerational continuity/discontinuity of child maltreatment among low-income mother-child

- dyads: The roles of childhood maltreatment characteristics, maternal psychological functioning, and family ecology. *Development and Psychopathology*, 31(1), 189-202. http://doi.org/10.1017/S095457941800161X
- Suess, G., Grossmann, K., & Sroufe, A. (1992). Effects of infant attachment to mother and father on quality of adaptation in preschool: From dyadic to individual organization of self. *International Journal of Behavioral Development*, 15(1), 43-65. https://doi.org/10.1177/016502549201500103
- The Children's Bureau. (2019). *Child welfare outcomes 2016: Report to Congress*.

  Washington D.C.: U.S. Department of Health & Human Services.

  https://www.acf.hhs.gov/sites/default/files/documents/cb/cwo2016.pdf
- Thornberry, T., Knight, K., & Lovegrove, P. (2012). Does maltreatment beget maltreatment? A systematic review of the intergenerational literature. *Trauma, Violence, & Abuse, 13*(3), 135-152. https://doi.org/10.1177/1524838012447697
- U.S. Department of Health & Human Services. (2019). Preventing child abuse & neglect.
  Centers for Disease Control and Prevention:
  https://www.cdc.gov/violenceprevention/pdf/CAN-factsheet.pdf
- U.S. Department of Health & Human Services, Administration for Children and Families, Administration on Children, Youth and Families, Children's Bureau. (2021).
  Child maltreatment 2019.
  - https://www.acf.hhs.gov/sites/default/files/documents/cb/cm2019.pdf
- U.S. Department of Health and Human Services. (n.d.). Longitudinal studies on child abuse and neglect (LONGSCAN) ages 0-18. National Data Archive on Child

- Abuse and Neglect: https://www.ndacan.acf.hhs.gov/datasets/dataset-details.cfm?ID=170
- U.S. Department of Health & Human Services. (2016). Preventing child abuse and neglect: A technical package for policy, norm, and programmatic activities.
- University of North Carolina at Chapel Hill. (n.d.). LONGSCAN: http://longscan.research.unc.edu/
- Vallati, M., Cunningham, S., Mazurka, R., Stewart, J. G., Larocque, C., Milev, R. V., . . .
   Harkness, K. L. (2020). Childhood maltreatment and the clinical characteristics of major depressive disorder in adolescence and adulthood. *Journal of Abnormal Psychology*, 129(5), 469–479. https://doi.org/10.1037/abn0000521
- Wert, M. V., Anreiter, I., Fallon, B. A., & Sokolowski, M. B. (2019). Intergenerational transmission of child abuse and neglect: A transdisciplinary analysis. *Gender and the Genome*, *3*, 1-21. https://doi.org/10.1177/2470289719826101
- Widom, C. (1993). The cycle of violence. *Second National Conference on Violence* 1–19.

  Canberra: Australian Institute of Criminology.
- Widom, C. S., Czaja, S. J., & DuMont, K. A. (2015). Intergenerational transmission of child abuse and neglect: real or detection bias?. Science (New York, N.Y.), 347(6229), 1480–1485. https://doi.org/10.1126/science.1259917
- World Health Organization. (2020, June 8). *Violence against children*. https://www.who.int/news-room/fact-sheets/detail/violence-against-children