



The Impact Of Psychosocial Adversity In Childhood On Adult Attachment Styles: A Correlational Study

Riddhika Jaiswal* and Dr. Kiran Srivastava**

* Postgraduate Student, Department of Psychology, Chandigarh University, Punjab

**Associate Professor, Head of Department, Department of Psychology, Chandigarh University,
Punjab

Abstract: This research delves into the connection between adverse psychosocial experiences during childhood and the attachment styles that individuals develop as adults within a group of 200 participants. The study, employing a correlational research approach, delves into how adverse early-life incidents are linked to the emergence of secure, preoccupied, dismissive, and fearful patterns of attachment later in life. The participants, divided equally by gender, were selected using a parametric snowball sampling technique. Data gathering utilized two main tools: the Childhood Adverse Experiences Questionnaire (CAQ) and the Attachment Style Questionnaire (ASQ). The CAQ, comprising 30 items, scrutinizes different aspects of childhood adversity such as psychosocial challenges, familial difficulties, and emotional abuse. On the other hand, the ASQ assesses secure, preoccupied, dismissive, and fearful attachment styles through a 24-item Likert scale. The results demonstrate noteworthy correlations between childhood psychosocial adversity and adult attachment styles. Particularly, psychosocial adversity exhibited a robust positive association with preoccupied attachment ($r = .478, p < .01$) and fearful attachment ($r = .564, p < .01$), indicating that higher levels of early adversity are linked to a greater likelihood of adopting these insecure attachment patterns. Moreover, significant relationships were identified between psychosocial adversity and both dismissive attachment ($r = .333, p < .01$) and secure attachment ($r = .191, p < .01$), although the latter displayed a negative trend. The outcomes emphasize the significant influence of childhood psychosocial adversity on the development of adult attachment styles. Greater exposure to adverse situations during childhood correlates with an increased probability of forming insecure attachment styles like preoccupied and fearful attachments, which can result in notable difficulties in emotional regulation and relationship dynamics in adulthood. The study accentuates the necessity for early interventions designed to alleviate the consequences of childhood adversity and foster healthier attachment outcomes.

Keywords: childhood adversity, attachment styles, preoccupied attachment, dismissive attachment, fearful attachment, secure attachment, psychological impact.

Introduction:

Psychologists have long been fascinated by how adult attachment styles develop, and a wealth of research has shown how early experiences have a major impact on relational dynamics that persist throughout life (Bowlby, 1980; Ainsworth, 1989). The idea of childhood psychosocial adversity, which includes a range of adverse events such as emotional neglect, physical abuse, unstable families, and exposure to violence, is fundamental to this discussion. According to Bretherton (2013), The challenges individuals face are believed to significantly influence the development of their attachment style, potentially leading to dysfunctional relationship patterns in adulthood. Elevated levels of psychosocial difficulties have been associated with the emergence of insecure attachment styles characterized by relational avoidance and anxiety (Mikulincer & Shaver, 2010). Furthermore, longitudinal studies have indicated that early interventions could mitigate some of these adverse effects and promote more positive attachment styles (Raby et al., 2017). Therefore, understanding the intricate connection between adult attachment patterns and childhood challenges is crucial for devising therapeutic approaches that foster secure and adaptable relational behaviors.

Background

According to attachment theory, which was developed by Mary Ainsworth and others after John Bowlby, the caliber of early connections in which one provides care for another lays the groundwork for subsequent patterns of relationships. According to Bowlby, reliable and caring caregiving is usually the precursor of stable attachment, which is defined by relationships based on trust and safety. On the other hand, inconsistent, abusive, or neglectful caregiving contexts are frequently the source of insecure attachment styles, such as preoccupied, dismissive, and terrified attachments (Ainsworth et al., 2015).

Numerous research studies investigating the lasting impacts of attachment styles on various life outcomes, such as mental well-being, the quality of relationships, and resilience in challenging situations, have been shaped by this theoretical framework (Mikulincer & Shaver, 2019). Insecure attachment patterns are commonly linked with negative childhood experiences (ACEs), which encompass maltreatment, neglect, and dysfunctional family environments. These ACEs have been shown to worsen difficulties in regulating emotions, navigating interpersonal connections, and overall psychological health (Felitti et al., 1998; Van der Kolk, 2014).

Theoretical Foundations and Impact of ACEs on Attachment

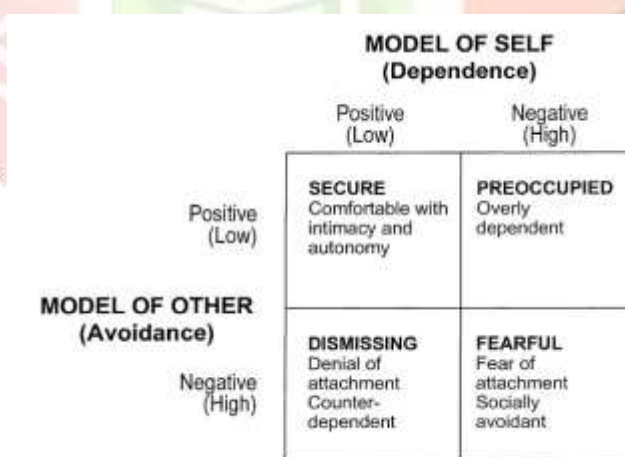


Figure 1.1: Four-category Model of Adult Attachment (Bartholomew & Horowitz, 1991).

The concept of attachment provides a comprehensive framework for understanding how an individual's early interactions with their primary caregivers impact their emotional and social development. Bowlby (1980) emphasized the importance of a secure foundation, suggesting that secure attachment forms when caregivers consistently respond to their infants' needs. Ainsworth's research on the "Strange Situation" categorized attachment styles into four types: disorganized (fearful), avoidant (dismissive), anxious-ambivalent (preoccupied), and secure, based on observed behaviors in response to caregiver presence or absence (Ainsworth et al., 2015).

Subsequent studies have revealed a strong correlation between Adverse Childhood Experiences (ACEs) and insecure attachment patterns, which can result in various negative outcomes such as emotional

instability, mental health issues, and difficulties in relationships (Anda et al., 2006; Van der Kolk, 2015). According to Cyr et al. (2010), children exposed to significant levels of adversity are significantly more prone to developing insecure attachment patterns that contribute to dysfunctional relationship behaviors persisting into adulthood.

Psychosocial Adversity and Specific Attachment Styles

Studies show that distinct forms of psychosocial adversity experienced throughout childhood are linked to particular insecure attachment patterns. Unmet emotional needs and a lack of stability in early caregiving situations are frequently associated with preoccupied attachment, which is characterized by increased anxiety in relationships (Pietromonaco & Powers, 2020). On the other hand, neglect or emotional unavailability from caregivers frequently results in dismissive attachment, which is characterized by emotional distance and an unwillingness to rely on others (Raby et al., 2017). Fearful attachment is linked to severe abuse or neglect (Mikulincer & Shaver, 2010; Van der Kolk, 2014). Fearful attachment is typically the outcome of traumatic experiences that damage a child's feeling of safety and trust.



Figure 1.2: The ACEs Pyramid by Felitti et al. (1998): The method by which Adverse Childhood Experiences affect health and well-being throughout life

Mechanisms Linking Adversity to Attachment

Psychosocial hardship affects attachment in a variety of intricate and multidimensional ways. Stress and trauma's effects on emotional control and cognitive function are one important mechanism. A child's capacity to control their emotions and form sound relationship schemas can be hampered by ongoing hardship, which can result in insecure attachment styles (Cassidy & Shaver, 2010). According to neurobiological studies, long-term stress can change the amygdala and prefrontal cortex, two brain regions linked to emotion and attachment, which can exacerbate the negative consequences of early adversity on the formation of attachment (Teicher & Samson, 2016).

The influence of caregiver behavior in reducing the negative effects of adversity on attachment has also been investigated in recent research. Even in situations of severe adversity, stable attachment may be fostered by supportive treatments that improve caregiver responsiveness and emotional availability. This suggests possible avenues for reducing the long-term impacts of ACEs on attachment (Fearon et al., 2017).

Rationale and Significance

It is crucial to comprehend the connection between adult attachment types and childhood psychosocial adversity for a number of reasons. It sheds light on the processes by which negative early experiences affect later-life relationship dynamics and psychological health. This knowledge can help target and change maladaptive attachment practices in therapies meant to mitigate the long-term impacts of childhood trauma. Moreover, by clarifying the intricate relationship between early experiences and adult psychological functioning, it advances the larger area of developmental psychology (Mikulincer & Shaver, 2010). This study's objective is to explore the relationship between childhood psychosocial adversity and adult attachment patterns in light of the frequency of childhood adversity and its extensive effects..

Purpose of the Study

The association between challenging experiences during childhood and the ways adults form attachments is a crucial area of interest in the fields of developmental and clinical psychology. This investigation is focused on examining how various negative childhood encounters impact the development of specific attachment styles in adulthood across a diverse group of individuals. By studying the connections between different forms of childhood adversity and attachment styles like preoccupied, dismissive, and fearful, the aim is to enhance our understanding of how early adversity influences adult relational behaviors and mental well-being in the long term. The findings from this study could potentially guide interventions aimed at addressing and alleviating the enduring effects of childhood adversities on adult attachment and overall quality of life. The goal of this research is to deepen our comprehension of how adverse childhood experiences impact adult relational functioning by exploring the links between different childhood adversities and specific attachment patterns.

Methodology

Sample

This study used a correlational design with 200 participants who were split equally between males and females. Utilizing parametric snowball sampling procedures, the data was collected.

Tools

Childhood Adverse Experiences Questionnaire (CAQ)

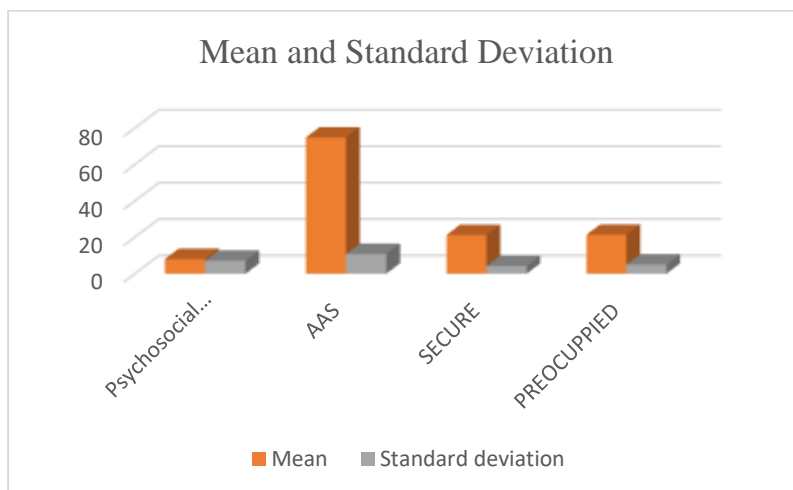
The Childhood Adverse Experiences Questionnaire (CAQ) created by Moradi and Bankar (2018) consists of 30 items, which were initially compiled from various sources and then improved with the help of expert feedback. Participants use a five-point Likert scale (ranging from 0 to 4), where higher scores indicate a stronger perception of adverse childhood experiences. Through exploratory factor analysis, a total of 13 factors were identified, encompassing Psycho-Social Adversities, Threat and Deprivation, Violence against Mother, Familial Challenges, School-Related Adversities, neglect and Discord, Violence and Sexual Assault Controlling Behavior and Confinement, Assault and Theft, Accidents and Emotional Mistreatment, Family Mental Health Issues, Feelings of Rejection, and Physical Abuse.

Attachment Styles Questionnaire (ASQ)

The Attachment Style Questionnaire (ASQ) authored by Van Oudenhoven, Hofstra, and Bakker in 2003 evaluates four attachment styles: secure, dismissive, preoccupied, and fearful. These styles, which include a total of 24 components, have their roots in the theoretical frameworks put forward by Bowlby (1980) and Bartholomew and Horowitz (1991). Five items indicate dismissal, seven indicate preoccupation, and five indicate dread. These metrics are used to assess secure attachment. When compared to earlier instruments, the ASQ's Cronbach's alpha values (Secure: 0.75, Preoccupied: 0.80, Dismissive: 0.62, Fearful: 0.79) demonstrate improved internal consistency. There are no completion times and a 5-point Likert scale is used for scoring. The major attachment type is determined by the total scores for each subscale; higher scores indicate dominating tendencies. Both direct and reflected questions are included in the items within each subscale. Interestingly, items 1, 8 (mirrored), 10, 14, 15, 18, and 22 make up the secure subscale.

Result

With an emphasis on the effects of early-life adversities on attachment patterns, this study attempts to understand the relationship between preoccupied attachment style and adverse childhood experiences (ACEs). Participants in the research have acknowledged varied degrees of adverse childhood experiences (ACEs); some exhibit preoccupied attachment patterns. The specific goal is to find out if a larger propensity for a preoccupied attachment style is correlated with more ACEs. Examining thoroughly, the study seeks to elucidate the intricate connection between early childhood adversities and patterns of attachment, enhancing our comprehension of the psychological impacts of events in the early stages of life.

Table 1.1: Mean and standard deviation differences of all the variables

Variables	N statistics	Mean	Standard deviation
Psychosocial adversity	200	8.125	7.163676288
Adult Attachment style	200	74.82	10.829
SECURE	200	21.26	4.226
PREOCCUPIED	200	21.42	5.004
DISMISSIVE	200	16.33	3.716
FEARFUL	200	16.14	3.984

A sample of 200 individuals was included in Table 1.1, and information on different attachment types and psychosocial adversity was gathered. Psychosocial adversity had a mean score of 8.13 (SD = 7.16). The mean score on the Adult Attachment Scale (AAS) was 74.82 (SD = 10.83). The mean scores for the different attachment types were as follows: the mean for secure attachment was 21.26 (SD = 4.23), the mean for preoccupied attachment was 21.42 (SD = 5.00), the mean for dismissive attachment was 16.33 (SD = 3.72), and the mean for scared attachment was 16.14 (SD = 3.98). These findings offer a thorough picture of the sample's attachment types and psychosocial adversity distribution and variability.

Table 1.2 Correlation table showing inter correlation between selected independent variables and the dependent variable (N 200)

Variables	PSA	AAS	Secure attachment	Preoccupied attachment	Dismissive attachment	Fearful attachment
Psychosocial adversity	1					
Adult Attachment style	.145*	1				
Secure attachment	.191*	.131	1			
Preoccupied attachment	.478*	.280	.160*	1		
Dismissive attachment	.333*	.090	.235**	.097	1	
Fearful attachment	.564*	-.608**	.017	.370**	.378**	1

Data were obtained on psychosocial adversity (PSA) and different attachment types from a sample of 200 individuals, as shown in Table 1.2. 8.13 (SD = 7.16) was the average PSA score. 74.82 (SD = 10.83) was the mean score on the Adult Attachment Scale (AAS). The score of the mean for the four attachment types are as follows: 21.26 (SD = 4.23) for secure attachment, 21.42 (SD = 5.00) for preoccupied attachment, 16.33 (SD = 3.72) for dismissive attachment, and 16.14 (SD = 3.98) for scared attachment. A correlation study found a number of attachment patterns and PSA to have significant connections. AAS ($r = .145$, $p < .05$), secure attachment ($r = .191$, $p < .01$), preoccupied attachment ($r = .478$, $p < .01$), dismissive attachment ($r = .333$, $p < .01$), and fearful attachment ($r = .564$, $p < .01$) were all substantially positively linked with PSA. Furthermore, AAS demonstrated a positive trend with preoccupied attachment ($r = .280$) and dismissive attachment ($r = .090$) and a significant negative correlation with terrified attachment ($r = -.608$, $p < .01$).

These results highlight the intricate associations between psychosocial adversity in childhood and adult attachment styles, emphasizing the complexity of the relationships and the varying degrees to which different attachment styles are affected by early-life adversities.

Discussion:

The present study aimed to explore the relationship between childhood psychosocial adversity and adult attachment styles, hypothesizing that higher levels of adverse experiences would be associated with insecure attachment patterns in adulthood. The findings provide compelling evidence supporting this hypothesis, revealing significant correlations between psychosocial adversity and various attachment styles.

Psychosocial Adversity and Preoccupied Attachment

There was substantial evidence to support the idea that preoccupied attachment patterns and higher psychosocial adversity would be positively associated. Preoccupied attachment and bad childhood experiences were shown to be significantly positively correlated ($r = .478$, $p < .01$), suggesting that those who experienced more early adversity are more likely to grow up to be anxious, preoccupied attachment types. These results align with other research that indicates increased anxiety and reliance in relationships as a result of emotional neglect, unstable families, and irregular caregiving (Pietromonaco & Powers, 2020). The

relevance of early caregiving contexts in creating anxiety and relationship reliance later in life is highlighted by the substantial link between psychosocial hardship and preoccupied attachment (Dagan et al., 2020).

These results are further supported by recent research, which emphasizes the part that inconsistent caregiving and emotional maltreatment in childhood play in the formation of preoccupied attachment patterns. For instance, Raby et al. (2017) found that those with greater degrees of anxiety and obsession in their adult relationships were those who were emotionally neglected as children. The results of the present research align with the idea that early emotional challenges have lasting implications on dependence and concerns about relationships.

Psychosocial Adversity and Dismissive Attachment

Psychosocial adversity and dismissive attachment have an association ($r = .333, p < .01$) that implies that adversity in childhood is linked to increased emotional avoidance and distance in adult relationships. This result is consistent with previous research showing that dismissive attachment styles frequently arise as a defensive reaction to emotional neglect or caregivers' lack of availability; in these situations, people learn to repress their emotions and keep a safe emotional distance from one another in order to shield themselves from more harm (Raby et al., 2017).

According to Simpson and Belsky's (2022) evolutionary theory of attachment, avoidant behaviors might be adaptive reactions in situations when being emotionally attached to someone could increase the chance of rejection or injury. The significant correlation found in this study aligns with these theoretical perspectives, illustrating how adverse childhood environments can foster emotional self-reliance and relational distancing as protective mechanisms.

Psychosocial Adversity and Fearful Attachment

There is a substantial positive relationship ($r = .564, p < .01$) between experiencing psychosocial adversity and developing a fearful attachment style. This indicates that individuals exposed to significant early adversity are more prone to adopting fearful attachment patterns characterized by profound distrust and a fear of rejection within relationships. This finding aligns with previous research linking severe childhood abuse and neglect to the emergence of fearful attachment behaviors, where individuals struggle to form close and trusting relationships due to past traumatic experiences and unpredictable interpersonal dynamics (Mikulincer & Shaver, 2010).

These results have been reinforced by more recent research, which shows that having many adversity experiences—such as child maltreatment and dysfunctional households—raises the likelihood of developing frightened attachment types. According to Alexander, P.C. (2009), for example, significant childhood trauma increases the likelihood of fearful attachment patterns, which are characterized by excessive anxiety and connection avoidance. According to Van der Kolk (2014), these findings demonstrate the significant influence of traumatic early experiences on relationship functioning and emphasize the necessity of trauma-informed therapies that deal with the underlying causes of frightened attachment in childhood adversity.

Mechanisms Linking Adversity to Attachment

The results of the study also shed insight on the intricate processes by which psychosocial hardship affects attachment. The effect of long-term stress and trauma on relationship schemas and emotional regulation is one well-known route. Early trauma might cause insecure attachment patterns in children by interfering with their capacity to control their emotions and create healthy relationship models (Cassidy & Shaver, 2010). This is further supported by neurobiological research, which shows that long-term stress can change the amygdala and prefrontal cortex—two brain areas linked to emotion and attachment—thereby aggravating the negative effects of early adversity on the formation of attachment (Teicher & Samson, 2016).

The influence of caregiver behavior in mitigating the negative effects of adversity on attachment is also highlighted by recent research. Research has demonstrated that even in the face of severe hardship, stable attachment may be fostered through supportive treatments meant to increase caregiver responsiveness and emotional availability (Fearon et al., 2017). According to Dozier et al. (2008) and (2017), this shows that focused interventions aimed at enhancing early caregiving contexts may be able to lessen the long-term consequences of childhood adversity on attachment patterns, leading to better relationship outcomes as adults.

Implications for Interventions

The results of this study have important ramifications for treatments meant to lessen the negative impact of adversity in childhood on attachment. Programs for early intervention that concentrate on improving emotional support and caregiver sensitivity are essential for developing stable attachment and acting as a buffer against the damaging effects of traumatic events. It is crucial to address the underlying reasons of insecure attachment patterns since therapeutic techniques, such as trauma-informed care and attachment-based therapy, have been demonstrated to enhance relationship outcomes for people with histories of childhood adversity (Schoore & Schoore, 2008).

The study also emphasizes the necessity of all-encompassing support networks, such as community-based treatments, parental support programs, and mental health services, to address the complex effects of childhood trauma. These therapies can lessen the long-term impact of traumatic childhood events on adult attachment patterns and general psychological well-being by encouraging resilience and healthy relationship development.

Gaps in the Literature and Future Directions

Even with the strong results, there are a few holes in the literature that need to be filled. Notably, little is known about the precise mechanisms by which various forms of early trauma affect attachment patterns. Subsequent investigations ought to endeavor to demarcate these pathways by scrutinizing the discrete consequences of diverse types of adversity on the development of attachment, as well as the possible moderating influences of attributes like temperament, resilience, and social support.

Moreover, longitudinal research following individuals from early infancy to maturity is required to gain a deeper understanding of the attachment's developmental paths in the face of adversity. Such studies would shed important light on the long-term effects of early trauma on attachment and guide the creation of focused therapies to promote positive relationship functioning throughout life.

References

- Ainsworth, M. D. S., Blehar, M. C., Waters, E., & Wall, S. N. (2015). *Patterns of attachment: A psychological study of the strange situation*. Psychology press.
- Ainsworth, M. S. (1989). Attachments beyond infancy. *American psychologist*, 44(4), 709.
- Ainsworth. *Developmental Psychology*, 28(5), 759-775.
- Alexander, P. C. (2009). Childhood trauma, attachment, and abuse by multiple partners. *Psychological trauma: Theory, research, practice, and policy*, 1(1), 78.
- Anda, R. F., Felitti, V. J., Bremner, J. D., Walker, J. D., Whitfield, C. H., Perry, B. D., ... & Giles, W. H. (2006). The enduring effects of abuse and related adverse experiences in childhood: A convergence of evidence from neurobiology and epidemiology. *European archives of psychiatry and clinical neuroscience*, 256, 174-186.
- Bartholomew, K., & Horowitz, L. M. (1991). Attachment styles among young adults: a test of a four-category model. *Journal of personality and social psychology*, 61(2), 226.
- Bowlby, J. (1980). *Attachment and loss*. Vol. III. *Loss: Sadness and depression*. Hogarth.
- Bretherton, I. (2013). The origins of attachment theory: John Bowlby and Mary Ainsworth. In *Attachment theory* (pp. 45-84). Routledge.
- Cassidy, J., & Shaver, P. R. (Eds.). (1999). *Handbook of attachment: Theory, research, and clinical applications*. Rough Guides.
- Cyr, C., Euser, E. M., Bakermans-Kranenburg, M. J., & Van Ijzendoorn, M. H. (2010). Attachment security and disorganization in maltreating and high-risk families: A series of meta-analyses. *Development and psychopathology*, 22(1), 87-108.

- Cyr, C., Euser, E. M., Bakermans-Kranenburg, M. J., & Van IJzendoorn, M. (2020). Attachment security and disorganization in maltreating and high-risk families: a series of meta-analyses. *Devenir*, 32(4), 237-285.
- Dagan, O., Facompré, C. R., Nivison, M. D., Roisman, G. I., & Bernard, K. (2020). Preoccupied and dismissing attachment representations are differentially associated with anxiety in adolescence and adulthood: A meta-analysis. *Clinical Psychological Science*, 8(4), 614-640.
- Dagan, O., Fearon, P., Schuengel, C., Verhage, M., Roisman, G. I., Bernard, K., ... & Bakermans-Kranenburg, M. (2020). An individual participant data (IPD) meta-analysis on the attachment network to multiple caregivers.
- Dozier, M., Bernard, K., Roben, C. K., Steele, H., & Steele, M. (2017). Attachment and biobehavioral catch-up. *Handbook of attachment-based interventions*, 27-49.
- Dozier, M., Peloso, E., Lewis, E., Laurenceau, J. P., & Levine, S. (2008). Effects of an attachment-based intervention on the cortisol production of infants and toddlers in foster care. *Development and psychopathology*, 20(3), 845-859.
- Fearon, R. P., & Roisman, G. I. (2017). Attachment theory: progress and future directions. *Current opinion in psychology*, 15, 131-136.
- Fearon, R. P., Bakermans-Kranenburg, M. J., Van IJzendoorn, M. H., Lapsley, A. M., & Roisman, G. I. (2010). The significance of insecure attachment and disorganization in the development of children's externalizing behavior: a meta-analytic study. *Child development*, 81(2), 435-456.
- Felitti, V. J., Anda, R. F., Nordenberg, D., Williamson, D. F., Spitz, A. M., Edwards, V., & Marks, J. S. (1998). Relationship of childhood abuse and household dysfunction to many of the leading causes of death in adults: The Adverse Childhood Experiences (ACE) Study. *American journal of preventive medicine*, 14(4), 245-258.
- Felitti, V. J., Anda, R. F., Nordenberg, D., Williamson, D. F., Spitz, A. M., Edwards, V., ... & Marks, J. S. (2019). Relationship of childhood abuse and household dysfunction to many of the leading causes of death in adults: The adverse childhood experiences (ACE) study. *American journal of preventive medicine*.
- Groh, A. M., Fearon, R. P., Bakermans-Kranenburg, M. J., Van IJzendoorn, M. H., Steele, R. D., & Roisman, G. I. (2014). The significance of attachment security for children's social competence with peers: A meta-analytic study. *Attachment & human development*, 16(2), 103-136.
- Mikulincer, M., & Shaver, P. R. (2010). *Attachment in adulthood: Structure, dynamics, and change*. Guilford Publications.
- Moradi, F., & Bankar, N. B. (2018). Childhood Adverse Experiences Questionnaire-Initial Scale Development and Validation. *International Journal of Indian Psychology*, Volume 6, Issue 2,(No. 5), 6, 86.
- Overall, N. C., Pietromonaco, P. R., & Simpson, J. A. (2022). Buffering and spillover of adult attachment insecurity in couple and family relationships. *Nature Reviews Psychology*, 1(2), 101-111.
- Raby, K. L., Yarger, H. A., Lind, T., Fraley, R. C., Leerkes, E., & Dozier, M. (2017). Attachment states of mind among internationally adoptive and foster parents. *Development and Psychopathology*, 29(2), 365-378.
- Schore, J. R., & Schore, A. N. (2008). Modern attachment theory: The central role of affect regulation in development and treatment. *Clinical social work journal*, 36(1), 9-20.
- Simpson, J. A., & Belsky, J. (2008). Attachment theory within a modern evolutionary framework. *Handbook of attachment: Theory, research, and clinical applications*, 2, 131-157.
- Teicher, M. H., & Samson, J. A. (2016). Annual research review: enduring neurobiological effects of childhood abuse and neglect. *Journal of child psychology and psychiatry*, 57(3), 241-266.

- Van der Kolk, B. (2014). *The body keeps the score: Brain, mind, and body in the healing of trauma*. New York, 3.
- Van Oudenhoven, J. P. L. M., & Hofstra, J. (2005). *De Hechtingsstijlijst (HSL): Handleiding [The Attachment Styles Questionnaire (ASQ): Manual]*. Unpublished manuscript, University of Groningen, the Netherlands. Electronic version: http://www.intercultureelcontact.nl/pdf/handleiding_hechtingsstijlijst.pdf
- Van Oudenhoven, J. P., Hofstra, J., & Bakker, W. (2003). Ontwikkeling en evaluatie van de Hechtingstijlvragenlijst (HSL). *Nederlands Tijdschrift voor de Psychologie*, 58, 95-102.
- Van Oudenhoven, J. P., & Hofstra, J. (2006). Personal reactions to 'strange' situations: Attachment styles and acculturation attitudes of immigrants and majority members. *International Journal of Intercultural Relations*, 30(6), 783-798..

