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How Childhood Trauma Directly Affects the Mental Health and Life-long Learning of K-12 Students

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HOW CHILDHOOD TRAUMA DIRECTLY AFFECTS THE MENTAL HEALTH AND LIFE-LONG LEARNING OF K-12 STUDENTS

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Acknowledgements

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Secondly, I would like to say thank you my therapist who has allowed a safe place for me to grow in my personal, professional, relational, and spiritual journey while furthering attending Bethel University for my education. I think it is so important for me to not only grow by furthering my education, but to also grow through talking about my personal trauma and turn that pain into purpose. To my teenage girl self whose life got flipped upside down in a matter of one evening by sexual violence, I pray that you continue to impact others by your empathy, strength, compassion, unconditional love, experiences, and opportunities. To my students, I pray that you are encouraged to lead successful lives even after you may have experienced trauma or hardship. You are beautifully created and there is only one of you on this earth, so make your voice be heard, learn from your mistakes, and allow yourself to feel so you can grow.

Lastly, I would like to thank my mother for always instilling in me that furthering your education, and always being open to learning at any age is the pillar to success. I want to thank my father for showing me that perseverance and faith can pull you through anything.

Abstract

During the time as a federal setting III EBD teacher in a self-contained elementary-aged program, there have been two critical elements in this field that have provided the passion to tackle this topic of effective classroom management strategies for problem behaviors and the environmental factors that may drive those problem behaviors. The topic was chosen this to provide students hope for a successful future, even if the world outside of school is setting them up for failure. As a federal setting III EBD teacher, this researcher saw students struggling in school because environmental factors, such as lack of sleep or homelessness. As this researcher tried to support them in the best ways possible, it was realized that this needed to be a team effort. This led to the second element special education that drove the motivation for the topic, which was the lack of effective strategies that kept students from being successful in general education. As a federal setting III EBD teacher, a question came to mind, "Are students served only in this program because they are homeless, tired, and/or hungry?" Because of these factors, the students struggled to control their emotions and exhibit expected classroom behaviors. It was difficult for them to sit down in their seats, problem solve, or resolve conflicts. The students were always in fight, flight, or freeze mode due to neglect, abuse, or lack of resources obtainable to them outside of school. Then this researcher continued to ask, "Why is there a need to constantly be called to de-escalate situations and provide them with breaks? Is this something that could be addressed by the general education teacher to maximize their time to learn?" These are the questions asked on a daily basis. It probably is that other teachers can relate and find these strategies and understanding of environmental factors helpful to create a higher success rate for our students.

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CHAPTER I: INTRODUCTION

Personal Connection to Topic

The reason the researcher chose this topic is because it not only affects her on a personal level, she also sees the adverse effects of trauma in her classroom. She chose to research childhood trauma, because the topic is highly talked about right now within Responsive Classroom Management, PBIS, and other behavior management programs throughout schools. It is not only talked about, but districts are working towards ways to implement strategies in order to help students dealing with trauma. The researcher currently works in a setting III EBD program for students K-5. She believes our impact can be more substantial in education, when it comes to the healing/recovery for our students living with adverse childhood experiences, but it starts with taking the time to educate ourselves. When the researcher was 16 years old she was a victim of sexual abuse. The negative impacts of this traumatic event have included being diagnosed with depression, PTSD, and anxiety. She had spent most of the years after, very numb. It is hoped that by researching this topic, it will not only be a learning opportunity as a teacher of students who suffer from trauma, but also be a form of some healing.

History of Childhood Trauma

Trauma is becoming more recognized worldwide and is having a large public impact. Most violence against children is mostly hidden or unreported because of fear and stigma. The level of societal acceptance varies worldwide (Norman, p. 2, 2012). Worldwide, two percent to sixty two percent of abuse is reported. Eighty percent of neglect and maltreatment comes from a parental guardian and forty percent of sexual abuse comes from a parental guardian. Only until May of 2009 has the National Center for Chronic Disease Prevention and Health Promotion began to collaborate to build a framework for public surveillance. They have defined adverse

childhood experiences as a global health burden (Anda, Butchart, Felitti, & Brown, p. 93, 2010). Since 2004 sexual abuse has been included in the global burden of disease. The researcher found it fascinating that the WHO and CDC staff got together with people working in public health anywhere from China, Canada, Macedonia, Philippines, Saudi Arabia, South Africa, Switzerland, and Thailand. Their goal was to form a network to better understand ACE's globally through information and provisions.

Abuse by a child's caregiver or other adults has been going on since the beginning of time. Up until the 1800's women were considered property of their husbands and children were the property of their fathers. It was a tradition in the 16th and 17th centuries that children were property of their fathers in the United States. Research shows that child abuse was first captured nationally in the 1870's where an 8 year old orphan named Mary Ellen Wilson was being whipped and beaten at her foster home. There were no organizations or laws protecting children from abuse. At the time there was a law protecting animals from abuse, and attorney's fought hard and argued that laws protecting animals from abuse should not be greater than laws protecting children. This orphan's case did go to court, and the foster mother was sentenced to 1 year in jail. This national outrage of this orphan being abused, that in 1874 the New York Society for the Prevention of Cruelty to Children was formed. In 1962 a journal was published from the American Medical Association which deemed children to be medically diagnosable if there were symptoms of child abuse. By 1972 every single state had mandated reporting laws where professionals such as doctors and teachers were to report if they suspected child abuse to the state child protective services agency. Within 2 years of the mandated reporting laws, there was an act established called Child Abuse Prevention & Treatment Act (CAPTA) which helps to

identify and report child abuse along with providing shelter and resources (Pfohl, p. 310-323, 1997).

What Would Be Considered "Effective" Classroom Management Strategies (in brief)

Throughout the following thesis you will find it to be evident that trauma impacts children. It not only impacts them socially but also emotionally, physically, psychologically, mentally, and their learning. As children transition from being in the womb to toddler age, there are significant risk factors when trauma is present. These risk factors such as brain changes, behavior changes, and health changes can impede on their ability to function in school appropriately. Educators are finding that there is a large need to incorporate social/emotional learning into the academic school day. Not only is this true for special education teachers but also now for general education teachers. There needs to be a shared understanding among all staff in buildings that adverse childhood experiences and how to work with children that suffer from the unimaginable. The concept of teaching the 'whole' child needs to come from the 'whole' school if schools plan to make a difference. Trauma impacts learning, behavior, and relationships at school. The solution to share a common vision of trauma sensitivity in order to be effective (Ristuccia, 2018). Educators can do the following to help increase functioning and decrease recurring memories and thoughts of children who experience trauma (NCTSN, p. 1, 2008):

- First and foremost the child needs to feel safe.
- In order to keep children that have been traumatized safe, is maintain normal routines.
- Set clear limits and classroom rules
- Do not take the behavior personally, and recognize the behavior is a manifestation of the trauma.

- Provide a safe place for the child to talk about their feelings on their terms.
- Visual schedules and pictures
- Time and space
- Try to gain knowledge of history from caregivers in order to best navigate and possible triggers.

Thesis Questions

Given the importance of meeting students needs and knowing the whole child to best serve them, the research question is focused on two questions: How does childhood trauma affect mental health and life-long learning of children? The follow-up question to this thesis question would be: How can educators best serve children that have experienced traumatic events?

CHAPTER II: LITERATURE REVIEW

Overview of Research Process

Research was found by the internet search engines such as google, ERIC, Academic Search Premier, and PsycINFO. Academic peer-reviewed articles were found by searching key keywords such as "Childhood Trauma", "Trauma Sensitive Schools", "Trauma Informed Care", and "Brain Changes with Trauma". Other research was gathered within videos on YouTube, Tedx Talks, and the Life Space Crisis Intervention book.

What is Childhood Trauma?

Childhood trauma is referred to in academic literature as adverse childhood experiences (ACEs). Children could go through a range of experiences that classify as psychological trauma, these might include neglect,[1] abandonment,[1] childhood sexual abuse and physical abuse,[1] parent or sibling is treated violently or there is a parent with a mental illness. These events have profound psychological, physiological, and sociological impacts and can have negative, lasting effects on health and well-being (www.wikipedia.org, 2019). A traumatic experience is one that threatens death or injury to self or others and elicits intense feelings of fear, helplessness, or horror (American Psychiatric Association, p. 2, 2000). Someone could have one traumatic event once over their lifetime, others have ongoing traumatic events. The Child Trauma Academy states "each year in the United States approximately five million children experience some form of a traumatic event. More than two million of these are victims of physical or sexual abuse." Children who are at the most risk for being physically abused are ages 4-7 and 12-15 (NCTSN, p.1, 2007).

Impacts/Short-Term Effects of Childhood Trauma

Trauma someone experiences in their childhood can have a profound impact on their mental, emotional, and physical health. Childhood trauma can also have consequences in our society, schools, and communities. The National Child Traumatic Stress Network states, "some children show signs of stress in the first few weeks after a trauma, but return to their usual state of physical and emotional health. Even children who do not exhibit serious symptoms may experience some degree of emotional distress, which may continue or even deepen over a long period of time. Children who have experienced traumatic events may experience problems that impair their day-to-day functioning. Events can be considered if they happened only once, repeatedly, happened suddenly, someone was intentionally cruel, or the child was unprepared for it (Morin, p.1, 2019). While most experience distress after a traumatic event, others return to their normal functioning state. Some may experience what is called PTSD or Post Traumatic Stress Disorder. Between 3-15% of girls and 1-6% of boys develop PTSD (Morin, p. 2, 2019). Children with PTSD sometimes struggle with re-experiencing the trauma in their minds again and again and try to avoid anything that reminds them of the event. Some may even become hypervigilant and look for warning signs. As children develop trauma creates many opportunities for unfocused responses to stress which can contribute to medical, correctional, social and mental health (Mahajan, p. 1-2, 2018). Childhood trauma can impact the functioning of the child along with other individuals who come in contact with this child.

Some areas trauma can impact are academic performance, inappropriate behavior, and difficulty forming relationships. Trauma has the capacity to interrupt things such as organization, comprehension, memory, the ability to produce work, engagement in learning, and affect classroom tasks (Craig, P. 29-30, 2016). When a child is organizing information it is also

important to remember new information which can pose an issue. As students transition from elementary school to middle school they continue to learn about cause and effect relationships, which is where they are asked to process information which can be hindered by trauma. When looking at a child who is in their younger years such as pre-school/elementary, it is imperative they are increasing their language and communication skills. Trauma can impact their language and communication milestones.

For many children dealing with trauma, the school setting can be a very challenging place to remain calm and regulated. Some of the problems developed after a child deals with trauma is the inability to process social cues, and to convey feelings appropriately. Children suffering from trauma often are misunderstood and educators can become visibly exhausted, which only makes the child feel more unsafe. When a child acts out he/she is externalizing and when a child internalizes it usually is when they withdraw or depressed. This can lead to lost learning time and strained relationships with friends, family, and educators (Craig, P. 31, 2016).

When a child is affected by traumatic stress they are not only going to be insecure about their relationship with adults outside of school but also with school staff and peers. The number one thing children crave is safety, and when children go through a traumatic experience their physical and psychological safety suffers. As mentioned earlier, children can suffer from processing social cues, and along with that their development of age-appropriate social skills is delayed (Craig, p. 29, 2016).

There are increased risks associated with trauma such as social, neuropsychiatric, and physical health problems. Situations that can be traumatic:

- Physical or sexual abuse
- Abandonment or neglect

- The death of a loved one
- Life-Threatening Illness in a caregiver
- Witnessing domestic violence
- Accidents
- Bullying
- Life-Threatening health or medical conditions
- Witnessing or experiencing community violence
- Witnessing police activity
- Close relative incarcerated
- Life-threatening natural disasters
- Acts or threats of terrorism (Craig, 2016)

It is important that adults are alert of both children who act out and the quiet children who don't appear to be engaged (Greeson, p. 94, 2014). Most children who experience trauma will have some change in their behavior and emotional functioning. Sometimes symptoms such as irritability, tiredness, regression, behavior changes, and emotional changes do not show up for many weeks or even months after the traumatic event which can confuse caregivers. In these situations caretakers sometimes do not put the traumatic event and symptoms together (Perry, p.5, 2014). One sign of trauma impacting a child is if they begin to re-enact events through play, drawings, or behavior. They may also try to avoid others and have hyper-reactivity such as anxiety or impulsivity.

More ways educators may see in children with trauma functioning:

- Anxious or fearful for safety
- Worried about violence reoccurring

- Increases in whining, irritability
- Decrease in attention span
- Withdrawal from activity
- Hyperactive or hyperarousal
- Avoiding tasks/assignments
- No feelings about events
- Increase in health complaints (nurse visits)
- Making statements about dying
- Wanting to reenact the event
- Inability to appropriately respond to social cues
- Distrust

(NCTSN, 2008)

Researchers have dug deeper into trauma and expressed these events as adverse childhood experiences or ACE. Sixty-seven percent of our population have experienced one ACE. This means that sixty-seven percent of people in the United States have experienced trauma such as physical abuse, emotional neglect, parental mental illness, sexual abuse, incarceration of parent, parental divorce, and domestic abuse. Twelve percent of the population has experienced 4 or more ACE's. Trauma is more prevalent than ever before. Twenty-six percent of children in America will witness or experience a traumatic event before they turn 4 years old (Burke-Harris, 2015). As we look at the State of Minnesota we are seeing thirty-seven percent of children under the age of 4 years old, experiencing 1 or more traumatic experiences. We may hear differing terms such as desensitized and sensitized. Many times immediately following a traumatic event someone can become sensitized. For example, if a child's parents

divorce, the child went from having a predictable environment and supportive parents which felt safe. Then mom comes in with a new boyfriend, which can generate some more stress beyond the divorce. Mom's boyfriend ends up raising his voice at the child, which sends his stress-response from baseline and rises to a moderate level. Moving forward he starts yelling at the mom and then barking orders at the child. You can become sensitized just from him raising his voice moving forward, and the child's stress-response system could register that tone of voice as threatening. This is when you become "sensitized". Many people have heard the term "desensitized" which can come later after you may have heard that angry tone so much, or when you become an adult and are surrounded by stress. Conventional wisdom could suggest that the boy would be used to it over time and be less affected, but often that is not true. A child has trouble handling even the smallest amounts of stress after that stress-response system has been activated (Perry, p. 5-6, 2016).

The Child Trauma Academy has been working with children who have been abused and neglected for over fifteen years. There was a study done that showed an increase in IQ scores of over 40 points in more than 60 children after being removed from abusive environments and then placed in nurturing and safe homes. In another study two hundred children under the age of 6 were removed from parental care after abuse was present, and 85% of the children demonstrated significant developmental delays.

In a study on adverse childhood experiences indicates that there are more psychosocial problems among those children that were molested as children. Researchers have established that sexual abuse can impact mental health long-term. It also shows that boys who have been sexually abused are more likely to externalize their distress through aggression towards others whereas females typically internalize (Briere & Runtz, p. 312, 1993).

Long Term Effects

A community sample of adolescents aged 11 to 14 years (grades 6 to 8) and their parents from one school board in Southern Ontario were asked to participate in the study. The estimated population base was approximately 5,800 students across 50 schools. It was a quantitative study called Heart Behavioural and Environmental Assessment Team (HBEAT). This study highlights the findings that ACEs have physiological health consequences that begin much earlier than adulthood. The present study also found that individuals that experienced 4 or greater ACEs is associated with increased resting HR, BMI and WC in this community sample of 11–14 year old adolescents. It is evident that the dose–response relationship between ACE accumulation, BMI and WC where BMI and WC continue to rise with greater numbers of ACEs. Early interventions to reduce CVD are recommended in children as early as sixth through eighth grade. It is evident based on the findings in this study, that children experiencing adverse childhood experiences, are much more likely to not only have psychological consequences but also physical consequences (Pretty, O'Leary, Cairney, & Wade, p. 1-2, 2013).

Child maltreatment and other adverse childhood experiences, especially when recent and ongoing, affect adolescent health. Efforts to intervene and prevent adverse childhood exposures should begin early in life but continue throughout childhood and adolescence (Flaherty, 2013).

Bruce Perry, an adolescent psychiatrist and neuroscientist, joined research efforts to determine why some combat veterans developed PTSD (Post Traumatic Stress Disorder) and others who saw combat didn't. When rats were exposed to uncontrolled experiences that exhibited stress early in life suffered lasting changes in their brain chemistry. He then looked at veterans' childhoods and was able to figure out that those who had adverse childhood experiences such as physical or sexual abuse would come out of war more traumatized. He says

that “to nurture healthy children and understand what they need, we first have to help them feel safe and connected and allow them time for reflection” (Perry, p. 5-6, 2016)**.** Another example Bruce Perry provides is if you have two children from the same classroom who experienced a school shooting, they will have very different long-term responses. One could have some bad dreams and maybe anxiety for about 3 months, but be able to return to her baseline. Which means the event not fundamentally change her capacity to self-regulate. The other student could have recurring nightmares, disruptive memories of the event, and extreme anxiety. This is when the change occurs in the amygdala and can cause pathways to be disrupted and the change in the child’s stress response (Perry, p.5-6, 2016).

Researchers believe that there is a strong correlation between adverse childhood experiences detrimental long-term effects such as depression, attempts of suicide, abusing substances, drugs, domestic violence, reduction in physical activity, obesity, sexual promiscuity, and sexually transmitted diseases. These traumatic experiences also predisposes people to develop heart disease, diabetes, stroke, cancer, fractures and diseases of the liver.

Impacts on the Brain

In a study of female college students with self-reported history of CSA or childhood sexual trauma that occurred at different ages, it is found that there have been negative impacts within the brain. MRI scans were done on the female college students who reported sexual trauma, along with a healthy socio-demographic comparable control group. The hippocampal volume was significantly influenced by density of abuse at stages 3–5 and 11–13 years. Corpus callosum was influenced by density of abuse at 9–10 years of age, and the frontal cortex by abuse at 14–16 years of age. There was also a strong tendency for abuse to carry over from one stage to another up until 13 years of age. They found using regression analysis that current

symptoms of depression on the Kellner Symptom Questionnaire were specifically associated with abuse during stage 3–5 years, but with no other stage (Andersen, p. 292-301, 2008).

These children are growing up with trauma in their history, have no control over it, and are being affected by neuropsychological and neurocognitive consequences. Researchers continue to learn about the brain development and the impact on not only growth but learning. The nature of severity and timing of insult can determine what areas of the brain and body will be affected. In a study they found that symptoms of depression were linked with 3-5 year old's being affected by abuse. PTSD symptoms were then associated with those children ages 8-9 years of age. These studies such as the Mississippi Civilian Scale and the Kellner Symptom Questionnaire, provide insight on the sensitive period approach. These adverse effects can not only have an impact immediately following, but for years to follow if untreated.

Psychotic disorder patients reported significantly more childhood abuse than healthy control subjects for all five subscales of the Childhood Trauma Questionnaire. These sub-scales include physical abuse, sexual abuse, emotional abuse, emotional neglect, and physical neglect. Participants included 60 psychotic disorder patients (26 schizophrenia, 17 schizoaffective disorder, 17 bipolar disorder type I with psychotic features) and 26 healthy control subjects.

In demographically matched samples, psychotic disorder patients with childhood sexual abuse had significantly decreased gray matter volume compared to healthy controls. Increased levels of stress hormones have been linked to reductions in brain volume in abused individuals and cortisol levels have been found to correlate with duration of abuse (Sheffield, Williams, Woodward, & Heckers, p. 187-190, 2013).

When brain development is being affected at such a young age the plasticity and ability to bounce back to a normal state is challenging, especially in trauma such as sexual abuse. Gray

matter volume loss was more pronounced when there was a history of sexual abuse in psychotic disorder patients. This was only significant in the cerebellum. Other areas affected frontal, parietal, temporal and occipital lobes. So in addition to the loss of gray matter as a person who is diagnosed with a psychotic disorder, there is additional gray matter loss if there was sexual abuse experienced as well (Sheffield, et al., p. 187-190, 2013).

Experts have been able to see that when a child with a typical equilibrium goes through a traumatic event, he typically can be aware of the change and report it. However, when you have a child that grows up in an environment filled with violence and chaos, this child thinks this state is normal. As the researcher mentioned earlier that once your stress-response system has been impacted, it is more likely, you will have a harder time handling small amounts of stress. When someone is overstressed you no longer have efficient access to your higher brain functions. Bruce Perry states "by the time you're in a state of alarm, significant parts of your cortex – the highest functioning part of your brain – have shut down entirely" (Perry, p. 6, 2016).

The brain can develop and grow so quickly in utero, and also the next two years of life. When a child is in utero they are making a lot of neurons, and actually the majority of neurons were created in the womb. Since the foundation of the brain is mostly formed within the first couple years of life, this tells us something about trauma. If a child experiences trauma in the first two years of their life, they will have significantly more affects as they grow older, because this is when their brain can mold and form normally or adversely. Some may call them "short wires" when looking at an MRI of a person. Some parts of the brain such as the amygdala may be firing too much, which is where our fear response center is housed. This is when you may have heard that are brain goes into "fight, flight, or freeze". In children that have experienced adverse childhood experiences, the state of calm when we are in fear response center, typically

does not occur. The child who experiences trauma typically will go into a state of fight or flight often because their life feels unpredictable, and feels like they are in front of a bear anytime an adult approaches them. In the diagram below you will see the different stages a child goes through (Perry, p. 14, 2014).

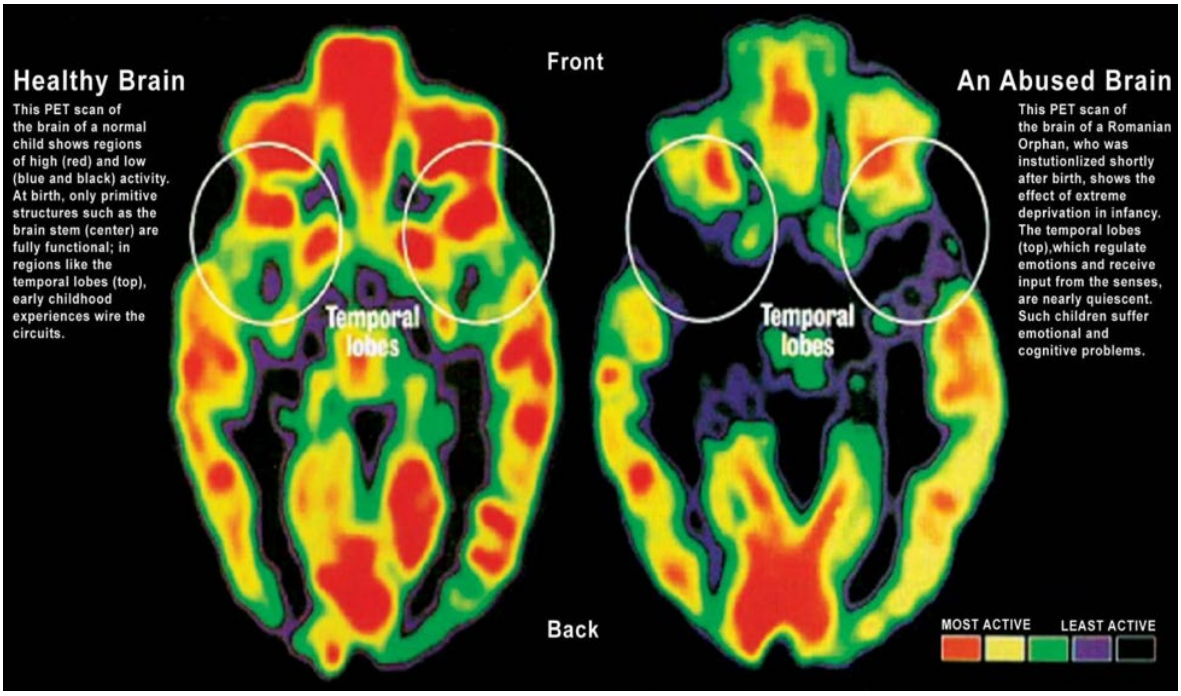
The Traumatized Child and Threat

Adaptive	REST	VIGILANCE	FREEZE	FLIGHT	FIGHT
Response *Hyperarousal*	(Adult Male) REST	VIGILANCE	RESISTANCE	DEFIANCE	AGGRESSION
Continuum Dissociative	(Male Child) REST	AVOIDANCE	*Crying* COMPLIANCE	*Tantrums* DISSOCIATION	FAINTING
Continuum ***Regulating***	(Female Child) **NEOCORTEX**	**CORTEX**	*Robotic/detached* **LIMBIC**	*Fetal Rocking* **MIDBRAIN**	**BRAINSTEM**
Brain Region Cognition	Cortex ABSTRACT	Limbic CONCRETE	Midbrain EMOTIONAL	Brainstem REACTIVE	Autonomic REFLEXIVE
AROUSAL	**CALM**	**ALERT**	**ALARM**	**FEAR**	**TERROR**

Our bodies respond and adapt to changes in nurturing, environment or “nature”, or lack thereof. Our heart rate can increase, muscle tone can change, and our state of arousal can very when children respond to a threat.

In the womb, gene-driven processes play a huge role in changes. By birth, the brain has gotten to a point in development where environmental cues and along with the use of senses play a large role in determining how neurons will differentiate and convey functionality. By the time children get into their adolescent age, most of the changes in the brain are determined now by their experience, not genetics. The things children in their adolescents pick up such as language, beliefs, cultural practices, cognitive and emotional functioning is experience-based. Early-life nurturing is found to be critical and if that doesn’t happen the implications are profound. It will impact the social-emotional learning/functioning, and if nurturing is absent in the first three years, research has shown that it may not be sufficient to overcome. There is mal organization happening in the neural systems. If say a child is adopted at the age of three and provided love and nurturing from that point forward, these positive experiences may not be enough to mediate the social-emotional functioning. There are misfires happening and molecular cues that are supposed to guide development or dysfunction which diminish functional capabilities.

The picture below shows a brain of a normal functioning child on the left hand side, and on the right hand side you see a child that has been traumatized (Linn, 2018).



As you can see from the scan of the child that was neglected and abused, here are the areas of the brain that are shrinking. It goes back to the saying “use it or lose it”. This is due to the lack of sensory experiences during sensitive times.

The right hemisphere of the brain is in charge of forming connections with emotional processing. Within this limbic system there is a responsibility to translate emotional experiences which then guide behavior. The fight/flight/freeze term is when looking at the amygdala which receives a fearful stimulus. This fight/flight/freeze stimulus will be released as a response of a misinterpretation often times in fear, which leads to feelings of being traumatized all over again. In the cerebral cortex, hyperarousal often happens, which can interfere with orbitofrontal cortex. This is a region of the brain that aids in problem solving, learning, and discriminating against different stimuli. Typically you will see this interference when a child suffers from PTSD where there is traumatic imagery active.

Children's brains develop dependent manner that extends to their environment. The brain expects certain interactions based on experiences. The neural pathways then get ready to respond. Children with a history of trauma expect negativity from adults along with judgment or rejection. There are two paths children will go in those response moments which is hypervigilance or shut down mode. Their attention is not on learning at that point, their attention is on survival instead (Craig, p. 30, 2016).

Trauma Informed Schools/Classroom Management Strategies (Revisited)

The questions that many teachers seem to have today is how much does this trauma affects our learning and development, and how can we best support our students? As we look further into adverse childhood experiences there is evidence showing an effect on our health.

This evidence can help educators have insight on the 'whole' child and provide awareness in our classrooms. Dr. Rob Block with the American Academy for Pediatrics reported that "adverse childhood experiences are the single greatest unaddressed public health threat facing our nation"**.** Not only am I looking at how childhood trauma and how it impacts their health but also supports/interventions we can put in place within the classroom. Nadine Burke Harris said, "childhood trauma affects health across a lifetime" it is clear that trauma is affecting our youth in more ways than we can imagine and it is important that adults are leaning in (Burke-Harris, You Tube, 2015).

Many children that seem "oppositional, rebellious, unmotivated, or anti-social" are often misinterpreted and it is the job as educators to help minimize threats and regulate emotions. It is important educators working with children who have suffered trauma understand the hypo-arousal state and willing to help children through their trauma-related body sensations and emotions. Children need help reawakening their curiosity and exploration of surroundings. There

are great ways of coping by developing new connections between their emotions, experiences, and physical reactions.

Children who are exhibiting signs of a pattern of behavior typically can do a diagnostic assessment with their health care provider in order to diagnose any behavioral or psychological syndromes or patterns that occur. There is something called the DSM-5 which is the Diagnostic Manual of Mental Disorders, that can help aid in those diagnosis. As educators we look for patterns in behavior in areas such as social competence in emotional processing, emotion perception, communication, interpretation, and regulation of emotion (Young & Widom, p. 1,369, 2014).

If educators learn the impacts of trauma they are more likely going to be able to understand the whole child, and why there may be difficulty with learning, behavior, and relationships. For educators it is important if you suspect abuse or neglect to ask open-ended questions and don't assume a child is being abused. If the child has a visible injury it is okay to ask the child how they got hurt. If that doesn't work, educators can then follow with open-ended questions and look for inconsistencies. If a child reports there is abuse or neglect in the home, or has marks, it is the job of the educator to be a mandated report and report it to Child Protective Services in their local county. This is done anonymously with the families so there is no repercussions to the educator. For educators it is important to:

- Give children choices. Being there life is filled with chaos, this allows them to have some sense of control some of their day.
- Having structure in place allows the child to feel safe.
- Setting clear rules and limits; however, staying away from the tone and approach being punitive.

- Allow for space for the child to talk about what happened and allow for sharing time within the classroom.
- Give simple answers to questions when a child is escalated or questions traumatic events.
- Be sensitive to things in the environment that could trigger a child such as warning students before you turn the lights off. Some students cannot handle being in the dark, so being prepared with some sort of additional lighting during quiet time or movies or if a child doesn't feel comfortable being alone, be sure to pair him/her up with a buddy.
- Protect a child that has been traumatized from their peers when it comes to curiosity and if peers are asking questions. Curiosity often times can lead to provoking in times of conflict.
- You might need to shorten assignments, allow additional time on tests or assignments, allow permission to leave class to seek additional support if student is feeling overwhelmed, and provide visual schedules/supports to help with knowing what is coming up next**.**

Children that are having a difficult time in terms of learning because of a barrier such as trauma, there are accommodations/modifications schools can provide. Students who consistently have reactions interfering with their functioning can be referred for help, which can lead to being on a 504 plan or eligible for special education services (NCTSN, p. 19, 2007).

The researcher was able to not only attend LSCI (Life Space Crisis Intervention) training over the summer, and was able to see first hand how this impacts children who have experienced trauma. LSCI offers long term and short term benefits to children and sustainability for educators. This training is offered to not only special education teachers but administrators, paraprofessionals, and general education teachers. Think of it as a mediation role between the

child and what life holds for them. This intervention is aided to help student's behavior, reaction to others, and their feelings. LSCI has been a psychological theory based intervention but has expanded to new concepts including cognitive, behavioral, social learning, and developmental (Long, Wood, & Fecser, p. 9-13, 1991).

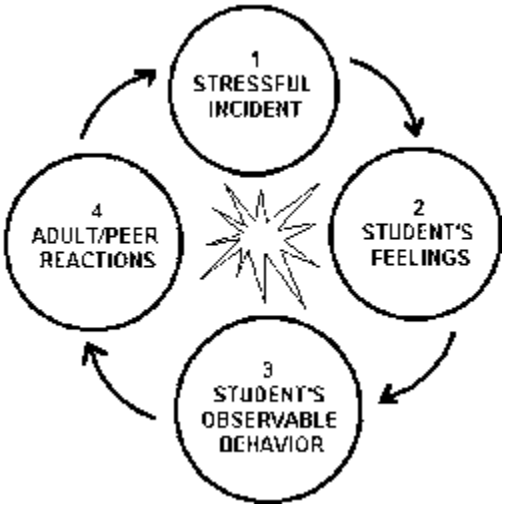
This intervention has six stages that the educator would want to follow which are:

1. De-escalation of the crisis: This is when the student is emotionally sensitive and there will need to be time to drain off the intensity the child is feeling.
2. Timeline: This is when the educator knows the child is calm, and able to give you details of what escalated their emotions or where there may have been a conflict with someone. This is where you would ask many questions, and not give an opinion.
3. Central Issue: This is when you would begin to recognize and understand the incident, feelings, and anxieties and pick an intervention to move forward with.
4. Insight: Pose questions similar to an interview where students can begin to recognize and change their behavior pattern.
5. New Skills: This is where the interventionist/teacher would teach new skills needed to participate or re-enter a learning environment/function.
6. Transfer of Training: This step is where the interventionist/teacher can prepare the student for re-entry of a learning environment, and share what possible things could potentially come up.

Reference needed and pages even if a paraphrase)

The diagram below shows the conflict cycle that can be a beneficial tool for educators to look at when breaking down the conflict with a child who has experienced crisis. It starts with a stressful event/conflict, goes into the student's feelings, transfers into looking at the student's behavior, and then allows for reflection time to see what reactions where happening. This

intervention really helps educators focus on the purpose of behavior versus taking behavior personally. There is always a function of behavior, and this intervention helps with creating behavior intervention plans for children based on their exhibiting behavior patterns.



(Long, p. 25, 1991)

Reclaiming Intervention Strategies (Long, p. 83, 1991)**:**

Red Flag: *Identify the Source of Stress*

Student's Perception: "Everyone is against me and no one understands or cares."

Goal: Identify where the problem really is coming from. This may be a carry over stress from another setting. This is a good intervention to help the student recognize that they are putting their feelings on others which results in alienation from peers. This is a good intervention to get the student to talk about what they are truly feeling and where it's stemming from.

Reality Rub: *Organize Perceptions of Reality*

Student's Perception: "I am being treated unfairly."

Goal: The goal of this intervention is to help the student organize their thinking, and blocked perceptions. This is the type of intervention to be done with student that has intense feelings and their viewpoint is distorted. It is important to help the student look at the situation another way.

Symptom Estrangement: *Confront Unacceptable Behavior*

Student's Perception: "I do what I want even if it hurts others," or "I have to take care of me and I have a reputation to maintain."

Goal: This is the student that typically manipulates situations and does seem to care about hurting other people in the process. it is the job of the interventionist to almost make the student uncomfortable with the conflict and his/her actions. This student gains pleasure from seeing other people suffer, and it is important the educator confronts the unacceptable behavior.

Massaging Numb Values: *Build Values to Strengthen Self-Control*

Student's Perception: "Even when I'm upset and know I need to gain control, I still cannot stop myself."

Goal: This is the type of intervention you will do with a student that will act out of guilt. It is important to bring forward the students good qualities and build their self confidence.

New Tools: *Teach New Social Skills*

Student's Perception: "I want to do the right thing, but it always comes out wrong."

Goal: When students have good intentions but lack appropriate social behaviors, this is where interventionists would teach them new social skills.

Manipulation of Body Boundaries: *Expose Exploitation*

Student's Perception: "It's important to have a friend, even if that friend gets me into trouble."

Goal: Students will be upset with someone else, and typically this is where it is with a friend that does not have their back. In the intervention training they call this a “false friend”. It is important to lay out what a good friend is and does.

LSCI is a great crisis intervention resource for educators and help students eventually gain long-term benefits and goals. Students should increase understanding in relationships and problem-solving behaviors with stress, emotions, and crisis/trauma. It is also an intervention strategy to help educators slow down during crisis, be cognizant of their non-verbal's and body language.

Therapeutic Interventions

It has been found that talk therapy is a form of treatment that can be beneficial to children who have experienced trauma. This modality of treatment can have implications of changing the brain structure. Using psychotherapy has shown to establish new and effective neural pathways in neurobiological studies. It can activate the left prefrontal cortex which changes blood flow and new firing patterns. There is cognitive-behavioral therapy is something that can be done in a group setting or individual, and lasting changes can occur in the limbic pathways for changes in major depression as well as changes in the amygdala dealing with PTSD. This type of therapy focuses on problem-solving and goal setting. With Interpersonal therapy in can focus on the treatment for depression and the cause for depression. It dives into the roles people play and relationships. Research shows changes in metabolic activities and blood flow. There are five stages within this therapy that they focus on which is contact, involvement, intimacy, deterioration, and repair. Another type of therapy is called EMDR which stands for eye movement desensitization and reprocessing. It is a type of psychotherapy treatment that is to help alleviate distress from traumatic memories. It accesses and processes traumatic memories to bring to an adaptive resolution. The first step is that the past events are laid out and processed, then it taps into the circumstances that lead to distress, and lastly it goes over new skills needed for adaptive functioning in the future when faced with external triggers. The EMDR Institute

states that “a study funded by HMO Kaiser Permanente, found that 100% of single-trauma victims and 77% of multiple trauma victims no longer were diagnosed with PTSD after only six 50 minute sessions. 77% of combat veterans were free from PTSD in 12 sessions.” Within the first session the clinician determines which memory to focus in on, and then asks the client to hold different aspects of that event while they use their eyes to track the therapist’s hand or the use of some sort of bilateral stimulation. A Harvard researcher found that there are biological mechanisms in rapid eye movement sleep that associate people being able to process the memory and disturbing feelings (Shapiro, 2019).

When experts see unfocused responses to subsequent stress there is an increase in medical, social, and mental health services (Mahajan, p.851, 2018).

Coping Skills/Mindfulness for Children

We hear so often the word “mindfulness” or “coping skills” used now in education, and there is a reason. More and more children are being affected by trauma, and our stress-response systems are heightened. Let’s be honest there is just more stimuli in our world now. Children are being over stimulated, they are lacking social and emotional skills, and need more nurturing. If you are not calm, it is very hard to calm a child. Researchers have found that rhythm is one of the most powerful ways of relaxing. Children who have not experienced trauma can also benefit from rhythm in order to self-regulate. Something that may aggravate teachers is when a child taps their pencil on their desk or bounces their leg, but it is soothing for a child. It is important to allow movement in the classroom, if you want today’s child to learn. Researchers have recommended chairs that rock, treadmills, or pedal a stationary bike while doing their homework. As we look back in history you may have noticed the military has always taught their soldiers to march in rhythm. This not only teaches them to work together but it also helps them

to learn. The body and mind have been looked at as the same thing. Author Bruce Perry states "your mindset is reflected in your physiology. When you're active and alert, your body chemistry changes." (Perry, p. 14-15, 2014).

It is important to connect with children's emotions and letting children know you enjoy being with them during lessons. When trust grows so do children's neural pathways. Their neural pathways require sustaining attention, and the more the child feels safe and is being mindful their attention span grows. It is important that children are learning how to control their emotions, and this begins with predictable environments. If the learning environment isn't predictable then the child will have a hard time reining in their emotions. When teaching children coping skills and mindfulness the researcher found encouraging students to tap into their internal landscape of images, feelings, thoughts, sensations, and thoughts competing for attention (Craig, p. 32, 2016).

Teachers can remind students their attention has a choice. One thing teachers can do at morning meeting, is to encourage students to pick a goal for the day and along with that make choices that can focus their attention on achieving the goal. This is a great way to have the child look towards a positive intention for the day versus focusing on recurring memories. Also using their imagination and visualizing can also be a mindfulness tool. An example author Susan Craig uses is if a child loves bikes, the teacher can use an awareness wheel image. So on bad days the child he can name his feelings through parts of the bike such as saying "my kindness spoke was rusty or that he needed help preparing his relaxation spoke" (Craig, p. 32, 2016). For this child to use his imagination and visualize his behavior as a wheel that he/she could control and repair can give courage to ask for help.

The National Child Traumatic Stress Network partnered with a company called Green Tree Yoga, and has been providing tools such as yoga to help children who have experienced

trauma. Yoga is a great way to befriend their bodies where they can feel safe. It is also a great way to regulate the arousal systems and has been shown to help rewire the brain for better functioning and learning (Emerson & Hopper, 2011).

Chapter III: Summary and Conclusion

Summary

Childhood trauma is referred to as adverse childhood experiences (ACEs). Children could go through a range of experiences that classify as psychological trauma, these might include neglect,[1] abandonment,[1] childhood sexual abuse and physical abuse,[1] parent or sibling is treated violently or there is a parent with a mental illness. These events have profound psychological, physiological, and sociological impacts and can have negative, lasting effects on health and well-being (www.wikipedia.org, 2019).

The Child Trauma Academy states "each year in the United States approximately five million children experience some form of a traumatic event. More than two million of these are victims of physical or sexual abuse." Children who are at the most risk for being physically abused are ages 4-7 and 12-15 (NCTSN, p. 1, 2007).

Abuse by a child's caregiver or other adults has been going on since the beginning of time. Up until the 1800's women were considered property of their husbands and children were the property of their fathers. In 1962 a journal was published from the American Medical Association which deemed children to be medically diagnosable if there were symptoms of child abuse. By 1972 every single state had mandated reporting laws where professionals such as doctors and teachers were to report if they suspected child abuse to the state child protective services agency (Pfohl, p. 1, 1997).

How does childhood trauma affect mental health and life-long learning of children? Trauma impacts learning, behavior, and relationships at school. Educators are finding that there is a large need to incorporate social/emotional learning into the academic school day. Not only is this true for special education teachers but also now for general education teachers. There needs

to be a shared understanding among all staff in buildings that adverse childhood experiences and how to work with children that suffer from the unimaginable. So how can educators best serve children that have experienced traumatic events? The concept of teaching the 'whole' child needs to come from the 'whole' school if schools plan to make a difference (Ristuccia, 2018).

These children are growing up with trauma in their history, have no control over it, and are being affected by neuropsychological and neurocognitive consequences. Researchers continue to learn about the brain development and the impact on growth and learning. The nature of severity and timing of insult can determine what areas of the brain and body will be affected/changed (Andersen, 2008).

For many children dealing with trauma, the school setting can be a very challenging place to remain calm and regulated. Some of the problems developed after a child deals with trauma is the inability to process social cues, and to convey feelings appropriately. Children suffering from trauma often are misunderstood and educators can become visibly exhausted, which only makes the child feel more unsafe. It is important that when working with children that have experienced trauma, educators are offering choices, time, space, a safe and predictable environment, modifications as needed, and additional resources and supports. There are also additional support outside of schools that can be recommended psych evaluations and mental health support through the county. There are schools that can like my school that provide mental health support one time per week within the school. Within the school there are things like behavior interventions such as LSCI, special education evaluations, modifications, and additional social/emotional support with school counselors/social workers.

Limitations of Research

A limitation of this research was the lack of elaboration of the history of childhood trauma and how schools dealt with children who have experienced trauma in the 1800's and earlier. One consideration was writing more about was the cultural differences and cultural norms when it came to treatment of women and children; however, it wasn't widely talked about and documented, and therefore the focus is more on the effects of trauma and how schools can be best prepared to help.

Implications for Further Research

I would have liked to see more intervention based studies showing data where application in schools has benefitted them. One question I have that did not come up for me during the research process was how many families are seeking outside therapeutic services, or getting diagnostic assessments done to better help the child after traumatic events occur. I am noticing many schools shifting to being trauma informed or trauma sensitive; however, I am not seeing much research being done on how to end the cycle directly with families.

Professional Application

As I have stated earlier I am passionate about tackling this topic of effective classroom management strategies for problem behaviors and the environmental factors that may drive those problem behaviors. I chose this topic to provide my students hope for a successful future, even if the world outside of school is setting them up for failure. It is important to me that guide students through crisis and make them feel safe. As I have stated earlier, five million children are traumatized each year in the United States (NCTSN, p. 1-2, 2007). This number continues to climb, and schools are taking it into their hands to contribute to intervene positively. As I enter

my second year of teaching, I have decided to be proactive and inquire about more professional development outside what the district provides. Within one week of me presenting the desire to learn more about trauma and how I can better serve my students, I was encouraged by my administration to seek out opportunities. I was able to attend the LSCI-Life Space Crisis Intervention week long training this summer, and gained a wealth of knowledge. Not only do I feel comfortable implementing the interventions shared, I also feel recharged and in the right mindset when seeing trauma face to face. By me expressing my feelings to our district Special Education Director on the benefits of this training for myself and how I think this would be so beneficial for our staff to be trained, it now has given me an opportunity to pay it forward. My district has asked me to train our staff come October so we are best prepared to support the 'whole' child. This intervention training can not only be beneficial for educators, but also for students. It creates a space for effective academic learning alongside social/emotional learning. Too often when educators are working with students that have experienced trauma, they are not allowing for the drain off of big emotions. This means we need to provide more time and space for these little ones to process, and that in itself creates a safety net. There needs to be less words, and more adults just being present and listening. Children who have experienced trauma will eventually talk, and it's best to do so when they are calm and when the adult is coming from a non-judgemental place. Trauma impacts the brain, can alter/rewire the brain, and can do lifelong damage of a person's health. The sooner experts can intervene with positive guidance and behavior interventions such as LSCI, the more of an impact we can have on children.

Connecting It All to God

In the Bible, Isaiah 41:10 says, “fear not, for I am with you; be not dismayed, for I am your God; I will strengthen you, I will help you, I will uphold you with my righteous right hand.” This verse really speaks to me when it comes to working with children. Our students need to know we are their safety net, and that even in the worst of times, we will help them. Unwavering support and love is what our divine creator provides us in good times and in bad. Being a teacher within public education I understand there are limitations to where we cannot project our religious beliefs; however, we can provide guidance of hope and faith like our Father does.

Conclusion

Through research and personal experience not only working with children experiencing trauma but also being a someone affected by trauma on a personal level, I will continue to support children who have been affected by trauma by advocating for their needs and health. Trauma can affect changes in your brain wiring, learning, behavior, and relationships. It can take a toll on children emotionally, physically, mentally, and psychologically. There is research proving adverse childhood experiences will have not only short-term effects but also can experience long-term effects if goes untreated such as PTSD, cardiovascular issues, obesity, depression, anxiety, suicide, and pyschological disorders. Educators can have a real impact on children, recognizing the signs of trauma, and intervening early. Something I would love to see being done in all schools is have trauma/crisis training mandatory for all educators. This can include system wide behavior interventions, behavior interventionists district wide, and crisis training.

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