Adverse Childhood Experiences: The importance of assessing and addressing trauma

Caleb Corwin, PhD
Assistant Professor / Clinical Psychologist
UTGSM – Center of Excellence for Children in State Custody
...but first, self-care
Compassion Fatigue is REAL

13-49% Sprang et al., 2007; Kaeding et al., 2017

Headaches, muscular pain, depression Vladut and Kallay, 2010

Decreased awareness of burnout Barnett et al., 2007

Reduced therapeutic effectiveness Bearse et al., 2013
Self-Care That Works

Evidence supports Prevention

Self-Reflection/Mindfulness

Work-Life Balance

Varied Professional Activities

Fostering Flexibility

**SLEEP HYGIENE**

“I work 12 hours a day. I exercise 7 days a week, I prepare healthy meals at home instead of going out and it's all paying off. I'm finally too tired to care about being perfect!”

Knapp et al., 2017

Knapp et al., 2017

Kilian 2008

Harrison and Westwood, 2009

Miller and Sprang, 2017

Mairs and Mullan, 2015
Write down at least one self-care improvement you can make this week....seriously...do it
Why Are We Talking About This

• CDC-Kaiser Permanente Study
  • >17,000 people asked about adverse childhood experiences (ACEs)

  - Diabetes
  - Heart Disease
  - Stroke
  - Asthma
  - Depression
  - Suicide
  - Mortality (LE-20yrs)

Felliti, et al., 1998
Positive Stress

Short, stressful events like meeting new people or starting the first day of school are healthy for brain development. They prepare the brain and body for stressful situations later in life.

Tolerable Stress

Tragic, unavoidable events like a natural disaster or losing a loved one aren't good for us. But if supportive caregivers are around to buffer the stress response, these events won't do lasting damage to the brain and body.

Toxic Stress

Ongoing, repeated exposure to abuse or neglect is bad for brain development. If no supportive adults are present to help buffer the stress response, stress hormones will damage developing structures in the child's brain. The result is an increased vulnerability to lifelong physical and mental health problems, including addiction.
Adverse Childhood Events (ACEs)

- Parent separation
- Emotional neglect
- Physical neglect
- Physical abuse
- Sexual abuse
- Emotional abuse
- Exposure to domestic violence
- Living with a person that went to prison
- Living with a person with mental illness
- Living with a person with substance use problems
ACEs Impact

- Alcohol, tobacco, and drug use
- Risky sexual behavior
- Mental health concerns
- Teen pregnancy
- Unstable relationships
- Domestic violence
- Lower academic achievement
ACEs

Diabetes
Heart Disease
Stroke
Asthma
Depression
Suicide
Mortality (LE-20yrs)
Neurobiology of Trauma

Hypothalamic-Pituitary-Adrenal Axis (HPA)

• Stress activates axis.
• Peripheral release of epinephrine and cortisol.
• Stimulates multiple areas of body and immune system.
Trauma

• Stress and the tiger
  • Bodies designed to respond to stress
  • Adrenalin and cortisol help us run from tiger or hide
  • Threat of short duration
Cortisol

Infection fighting antibodies

Inflammatory response

HPA axis

Other body systems

Immune system
BUT...when the tiger lives in your home, neighborhood or life
CORTISOL

Toxic stress

Other body systems

Inflammatory response

Immune system

Gene expression (epigenetics)

Infection fighting (antibodies)
Impact of toxic stress on immune system

• Developing system is chronically pressed into action
  • Too much cortisol suppresses immunity, increasing risk of infection
  • Inflammatory response persists after it is no longer needed
Experience Shapes Brain Architecture by Over-Production Followed by Pruning Through Childhood

birth  6 years  14 years
Neurobiology of Trauma

Amygdala

• Amygdala: Input from sensory, memory and attention centers
  • Emotional memory system = The brain’s alarm system
Neurobiology of Trauma

- Interface between cortex and lower brain areas.
- Major role in memory and learning:
  - The brain’s file cabinet or search engine.
  - Functions best in calm.

Hippocampus
Neurobiology of Trauma

• Prefrontal cortex
  • Executive function
    • Impulse control
    • Working memory
  • Cognitive flexibility
Clinical Implications of Trauma

- Traumatized children
  - Amygdala hypertrophy:
    - Alarm turned on – not able to take input from other areas to quiet alarm
  - Hippocampus atrophy
    - Difficulty with learning and memory
  - Frontal cortex
    - Shut down of executive function – impulse control, working memory and cognitive flexibility
Racial Inequity

• 61% vs 41% ACE exposure  
  (Sacks & Murphey, 2018)

• Increased likelihood of multiple ACEs  
  (Kenney & Singh, 2016)

• BIPOC 2x as likely to live in poverty  
  (Kaiser Family Foundation, 2017)

• Additional ACEs associated with discrimination and historical trauma  
  (Pieterse et al., 2012)  
  (Altaha & Kraus, 2017)
Biological Pathways for Historical Trauma

Pathway 1: Individual experience

Trauma or stressor

Changes to epigenome

Genome

Poor mental and physical health

Pathway 2: Intergenerational effects

Poor mental and physical health in offspring

Changes to offspring epigenome

Differences in patterns of parental care

Parental experience of trauma or stressor

Offspring exposure to maternal stress hormones

Conching & Thayer, 2019
What Can We Do With this Information?
Burke et al., 2011
## ACEs and Substance Use

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<th>ACE Score†</th>
<th>N</th>
<th>Ever Had Drug Problem</th>
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Dube et al., 2003
**TRAUMA**
- Feelings of fear, helplessness, uncertainty, vulnerability
- Increased arousal, edginess and agitation
- Avoidance of reminders of trauma
- Irritability, quick to anger
- Feelings of guilt or shame
- Dissociation, feelings of unreality or being "outside of one's body"
- Continually feeling on alert for threat or danger
- Unusually reckless, aggressive or self-destructive behavior

**ADHD**
- Difficulty sustaining attention
  - Struggling to follow instructions
  - Difficulty with organization
  - Fidgeting or squirming
  - Difficulty waiting or taking turns
  - Talking excessively
- Difficulty concentrating and learning in school
  - Easily distracted
  - Often doesn't seem to listen
  - Disorganization
  - Hyperactive
  - Restless
  - Difficulty sleeping
- Losing things necessary for tasks or activities
- Interrupting or intruding upon others

**OVERLAP**
- Difficulty concentrating and learning in school
  - Easily distracted
  - Often doesn't seem to listen
  - Disorganization
  - Hyperactive
  - Restless
  - Difficulty sleeping
- Struggling to follow instructions
  - Difficulty with organization
  - Fidgeting or squirming
  - Difficulty waiting or taking turns
  - Talking excessively
- Losing things necessary for tasks or activities
- Interrupting or intruding upon others

NCTSN, 2016
Screening for **Trauma Exposure**

- **Traumatic Events Screening Inventory for Children (TESI-C)**
  - 15-items; ages 3-18; FREE
  - Ford et al., 2000

- **Trauma Exposure Screening Inventory-Parent Report Revised (TESI-PRR)**
  - 24-items; ages 0-6, FREE
  - Ghosh et al., 2002

- **Pediatric adverse childhood experiences and related life events screener (PEARLS)**
  - 17-items; ages 0-18, FREE
  - Koita, 2018

- **Life Stressor Checklist – for DSM-5 (LEC-5)**
  - 30-items; 18+, FREE
  - Weathers et al., 2013
Neglect is the Most Prevalent Form of Child Maltreatment

- Neglect
- Physical Abuse
- Other
- Sexual Abuse
- Psychological Maltreatment
- Medical Neglect

U.S. Dept. Health and Human Services
Many children experience stressful life events that can affect their health and wellbeing. The results from this questionnaire will assist your child's doctor in assessing their health and determining guidance. Please read the statements below. Count the number of statements that apply to your child and write the total number in the box provided.

Please DO NOT mark or indicate which specific statements apply to your child.

1) Of the statements in Section 1, HOW MANY apply to your child? Write the total number in the box.

Section 1. At any point since your child was born...

- Your child’s parents or guardians were separated or divorced
- Your child lived with a household member who served time in jail or prison
- Your child lived with a household member who was depressed, mentally ill or attempted suicide
- Your child saw or heard household members hurt or threaten to hurt each other
- A household member swore at, insulted, humiliated, or put down your child in a way that scared your child OR a household member acted in a way that made your child afraid that s/he might be physically hurt
- Someone touched your child’s private parts or asked your child to touch their private parts in a sexual way
- More than once, your child went without food, clothing, a place to live, or had no one to protect her/him
- Someone pushed, grabbed, slapped or threw something at your child OR your child was hit so hard that your child was injured or had marks
- Your child lived with someone who had a problem with drinking or using drugs
- Your child often felt unsupported, unloved and/or unprotected
Exposure ≠ Diagnosis
Trauma Assessment

• Goal to determine if specific trauma informed treatment is necessary

  • Assessing for presence of PTSD symptoms
    • Hypervigilance
    • Avoidance
    • Intrusive thoughts, images
    • Re-Experiencing

• This is the beginning of trauma treatment....
Assessing for **Traumatic Stress Reactions**

- **Child & Adolescent Trauma Screen (CATS)**
  - 20-items; ages 7-17; FREE  
  (Sachse et al., 2017)

- **SCARED Brief Assessment of Anxiety and PTSD Symptoms**
  - 4 to 66-items; ages 8-18, FREE  
  (Muris et al., 1998)

- **Trauma Symptom Checklist for Young Children – Short form**
  - 32-items, ages 3-12; $$  
  (Wherry et al., 2013)

- **PTSD Checklist for DSM-5 (PCL-5)**
  - 20-item, ages 18+; FREE  
  (Blevins et al., 2015)
Child and Adolescent Trauma Screen (Sachser et al., 2017)

Mark 0, 1, 2 or 3 for how often the following things have bothered you in the last two weeks:

0 Never / 1 Once in a while / 2 Half the time / 3 Almost always

1. Upsetting thoughts or pictures about what happened that pop into your head. 0 1 2 3
2. Bad dreams reminding you of what happened. 0 1 2 3
3. Feeling as if what happened is happening all over again. 0 1 2 3
4. Feeling very upset when you are reminded of what happened. 0 1 2 3
5. Strong feelings in your body when you are reminded of what happened (sweating, heart beating fast, upset stomach). 0 1 2 3
6. Trying not to think about or talk about what happened. Or to not have feelings about it. 0 1 2 3
7. Staying away from people, places, things, or situations that remind you of what happened. 0 1 2 3
8. Not being able to remember part of what happened. 0 1 2 3
9. Negative thoughts about yourself or others. Thoughts like I won’t have a good life, no one can be trusted, the whole world is unsafe. 0 1 2 3
10. Blaming yourself for what happened, or blaming someone else when it isn’t their fault. 0 1 2 3
11. Bad feelings (afraid, angry, guilty, ashamed) a lot of the time. 0 1 2 3
12. Not wanting to do things you used to do. 0 1 2 3
13. Not feeling close to people. 0 1 2 3
14. Not being able to have good or happy feelings. 0 1 2 3
15. Feeling mad. Having fits of anger and taking it out on others. 0 1 2 3
16. Doing unsafe things. 0 1 2 3
17. Being overly careful or on guard (checking to see who is around you). 0 1 2 3
18. Being jumpy. 0 1 2 3
19. Problems paying attention. 0 1 2 3
20. Trouble falling or staying asleep. 0 1 2 3

Please mark “YES” or “NO” if the problems you marked interfered with:

1. Getting along with others
2. Hobbies/Fun
3. School or work
4. Family relationships
5. General happiness

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**CATS 7-17 Years Score**

- **<15**
  - Normal. Not clinically elevated.
  - **Clinical Tip:** Brief review of results with clients. Validate, normalize and reassure. Provide psychoeducation and coping tips. Convey hope that many children recover naturally and that there are effective treatment available if desired. Offer trauma-specific treatment if interested.

- **15-20**
  - Moderate trauma-related distress.

- **21+**
  - Probable PTSD.
  - **Clinical Tip:** Carefully review results with clients and conduct PTSD diagnostic interview using results. Validate and normalize. Convey hope regarding recovery with effective treatment. Offer TF-CBT or other evidence-based trauma-specific treatment.

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**CATS Caregiver 3-6 Years Score**

- **<12**
  - Normal. Not clinically elevated.
  - **Clinical Tip:** Brief review of results with caregiver. Validate, normalize and reassure regarding trauma and impact. Convey hope that many children recover naturally and that there are effective treatment available if desired. Offer trauma-specific treatment if interested.

- **12-14**
  - Moderate trauma-related distress.

- **15+**
  - Probable PTSD.
  - **Clinical Tip:** Carefully review results with caregiver. Conduct PTSD diagnostic interview using results. Validate and normalize regarding trauma impact. Convey hope regarding recovery with effective treatment. Offer TF-CBT or other evidence-based trauma-specific treatment.

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Total Score
Clinical = 15+
Trauma and Other Stress Related Disorder

Acute Stress Disorder

Post Traumatic Stress Disorder

Initial Diagnosis

Final Diagnosis
Addressing Trauma Symptoms with Evidence Based Practice
Evolution of EBTs

- Case Studies
- Pre-Post Designs
- Randomized Controlled Trials
- Guidelines Defining EBTs
- Manualization of psychotherapy
Implementation Barriers

- Manuals
- Compatibility
- Complexity
- Universal Application
- Unavailability
- Replacement Paradigm
EBT vs. EBP

EBT
• Highly specific
• Manualized
• Two large scale randomized controlled trials (RCTs) conducted by independent investigatory teams working at different research settings

EBP
• “Three legged stool”
  1. Best possible research
  2. Client Characteristics and Preferences
  3. Clinical Expertise

APA, 2006
Spring, 2007
Common Elements
Chorpita, Becker, & Daleiden, 2007

Transdiagnostic Treatments
Weisz et al., 2017

Evidence Based Kernels
Embry & Biglan, 2008
Trauma Focused CBT

Child Parent Psychotherapy

Common Elements

Attachment, Self-Regulation and Competency
Reducing Barriers: Common Elements

• Manual Selection
• Patients outside the box
• Maximizing limited resources
• Modular delivery
Common Elements Approach to Trauma

• Psychoeducation
  • Common PTSD symptoms
  • Treatment Options
• Emotion Regulation
• Imaginal Exposure
• In Vivo Exposure
• Cognitive Processing
• Problem Solving

Dorsey et al., 2017
Psychoeducation

• Education on common reactions
• Understanding and identifying triggers
• Describing treatment and prognosis
Emotion Regulation

• Emotional Identification
  • Learning to connect events to feelings and feelings physiological responses

• Mindfulness Skills
  • Focusing on the present moment, learning to react non-judgmentally to events/thoughts/emotions, gaining awareness, etc.

• Relaxation Skills
  • Breathing exercises, progressive muscle relaxation, etc.
Cognitive Coping

• Thought-feeling connection
• Encourage being a thought detective
  – Do I know for sure?
  – What else might happen?
  – Examining self-blame
• Being your own best friend
  • “What would you tell a friend in this same situation?”
Exposure

- Subjective Units of Distress (SUDs)
- Creating a trauma narrative
  - Writing or recording in detail the traumatic events and determining plan for review
- Repeated review of narrative
  - In session and at home
- In Vivo Exposure of feared/avoided stimuli
Problem Solving

- Teaching approach
  - Identify Problem
  - Brainstorm choices
  - Assess possible outcomes
  - Select best choice

- In-vivo practice

- Plan for response
Alterations for children
Finding the Family

Yasinski et al., 2016
Trauma Narratives
(assuming you have proper training)

**NO**
- No caregiver engagement
  - < 16 years old
- Severe uncontrolled depression
- Possible psychotic symptoms

**YES**
- Engaged and Supportive Caregiver
  - Any age
- >16 and motivated despite lack of caregiver support
  - Low self-harm risk
DO NOT proceed with a narrative without caregiver knowledge or consent
DO prepare the caregiver for the narrative in advance of conjoint session
What to do with No Narrative?

- Psychoeducation
- Validation within context of trauma
- Building coping strategies
- Working to address barriers to narrative
  - Increase caregiver involvement
  - Stabilize other symptoms

Deblinger et al., 2010
“I can see how upset you are that your teacher yelled at you, I wonder how much that reminds of times when your parents used to fight.”

“It makes sense that you are have a hard time talking to older men given the trauma you experienced in the past.”

“I know that changes in routines are hard for you, I wonder if that has been harder because of how many times you have had to move.”
Trauma-Informed Care Takeaway’s

✓ Self-care is critical

✓ Understand that peoples past affects their current behavior

✓ Screen for trauma at intake

✓ Don’t assume psychopathology

✓ You can strategically un-package your evidence based skillset

✓ Psychoeducation is treatment

✓ Trauma treatment works
...and they lived happily ever after.

... hopefully ...