

PATHWAYS TO PROGRESS: MOVING TOWARD A HEALING-CENTERED STATE

West Virginia ACEs Workgroup Report



Introduction

According to the Centers for Disease Control and Prevention (CDC), National Center for Injury Prevention and Control, Division of Violence Prevention, Adverse Childhood Experiences (ACEs) are potentially traumatic events that occur in childhood (ages 0-17 years). ACEs are categorized into three groups: abuse, neglect, and household challenges. Each category is further divided into the ensuing subcategories.

Abuse

- Emotional abuse
- Physical abuse
- Sexual abuse

Neglect

- Emotional neglect
- Physical neglect

Household Challenges

- Mother treated violently
- Substance abuse in the household
- Mental illness in the household
- Parental separation or divorce
- Incarcerated household member

These negative experiences can affect a child's educational, emotional and behavioral development, which can result in long-term health problems.

Sponsored by Delegates Ellington, Estep-Burton, Lavender-Bowe, Lovejoy, Pushkin, Pyles, Rohrbach, Rowan, Staggers, and Zukoff, House Bill 4773 passed the West Virginia Legislature on March 4, 2020, with the charge of creating an ACEs workgroup built of expert members of various professions to study the impact of ACEs on the people of West Virginia. This workgroup required members to examine the root causes and varied influences of ACEs, and develop recommendations to foster resilience and enhance protective factors.

Led by Dr. Ayne Amjad, Commissioner of the West Virginia Department of Health and Human Resources, Bureau for Public Health and State Health Officer, and in partnership with the West Virginia School of Osteopathic Medicine, the workgroup endeavored to bring awareness to the commonality of ACEs and their lasting effects, including, but not limited to, health issues, social determinants, the negative impact of educational and job opportunities and living with toxic stress. Fortunately, ACEs are not inevitable. With this report, it is expected that a pathway to progress is created to facilitate West Virginia's transition towards becoming a more healing-centered state.

Background

In 1998, the results of the CDC and Kaiser Permanente Adverse Childhood Experiences Study were first published. Over 17,000 members of Kaiser Permanente, a Southern California Health Maintenance Organization, completed confidential surveys regarding their childhood experiences and current health status and behaviors. The study concluded that ACEs are common across all populations, with nearly two-thirds of study participants having reported at least one ACE, and more than one in five having reported three or more ACEs. The total sum of the different categories of ACEs reported by the participants, i.e., ACE score, directly correlated with the prevalence and risk for smoking, severe obesity, physical inactivity, depressed mood, and suicide attempts. In other words, as the number of ACEs increases so does the risk for negative outcomes.¹



High levels of stress in childhood, whether acute or chronic, can affect the developing brain with stress hormones that can alter brain development. The parts of the brain that are responsive to threat may be overdeveloped; meanwhile, the parts of the brain that are needed for learning and healthy interaction can be underdeveloped. The result is poor mental and emotional health.

Likewise, childhood adversity and poor physical health are also linked. Cardiovascular disease, hypertension,

diabetes, asthma, lung disease, liver disease, and obesity are more prevalent in adults who experience early childhood stressors. Many of the health risks are associated with coping behaviors. For example, an individual may self-medicate with drugs and alcohol to manage emotional pain or anxiety. According to the CDC, ACEs are associated with numerous risk factors, chronic disease, and health outcomes. Early experiences have a broad and profound impact on an individual's development and subsequent emotional, cognitive, social and biological functioning.

The CDC reports that 61% of adults surveyed across 25 states reported they had experienced at least one type of ACE before age 18, and nearly one in six reported they had experienced four or more types of ACEs. Moreover, the relationship between ACEs and health outcomes persists with a higher number of adverse childhood exposures being associated with a higher number of risk factors for leading causes of death in adults. A 2017 study² found that adults with four or more ACEs, compared with adults with none, were associated with a number of adverse health outcomes including:

- Drug abuse and interpersonal and self-directed violence (very strong associations).
- Sexual risk-taking behaviors, poor mental health and alcohol abuse (strong associations).
- Smoking, heavy alcohol use, poor self-rated health, cancer, heart disease and respiratory disease (moderate associations).

² Hughes, K., et al. (2017). The effect of multiple adverse childhood experiences on health: a systematic review and meta-analysis. *The Lancet Public Health*, 2(8), e356-e366.

¹ Prevention, Violence. About the CDC-Kaiser ACE Study. Available online: https://www.cdc.gov/violenceprevention/aces/about.html (accessed on 07 June 2022).

• Physical inactivity, overweight or obesity and diabetes (weak or modest associations).

Each of these adverse health outcomes are major issues within West Virginia, particularly as the State continues to combat the rising opioid epidemic and obesity issues that burden residents. As West Virginia becomes a healing-centered state, preventative ACEs guidelines should be implemented to protect children and equip adults suffering from the toxic stress that comes from lifelong abuse.

ACEs in West Virginia

Data from the following sources were examined to better understand the impact of ACEs on the people of West Virginia.

- National Child Abuse and Neglect Data System
- Youth Risk Behavior Surveillance System
- National Survey of Children's Health
- Behavioral Risk Factor Surveillance System

The National Child Abuse and Neglect Data System (NCANDS) is a federally sponsored effort that collects and analyzes annual data on child abuse and neglect. The data are submitted voluntarily to Children's Bureau in the Administration on Children, Youth and Families, the Administration for Children and Families within the U.S. Department of Health and Human Services by the 50 states, the District of Columbia, and the Commonwealth of Puerto Rico.

In some states, reports of maltreatment may be assigned to differential or alternative response.³ Cases receiving this response often include early determinations that the children have a low or moderate risk of maltreatment. A determination of maltreatment is not made, and a perpetrator is not determined. Nationwide, approximately 14% of screened in allegations (called referrals) of abuse and neglect receive a differential or alternative response. West Virginia does not have an alternative response program. Consequently, all screened in referrals to Child Protective Services (CPS) receive an investigation. Table 1 below represents the West Virginia and national rates per 1,000 children who received an investigation or alternative response. For the past five years of available data, West Virginia's rate is nearly triple the national rate.

³ The provision of a response other than an investigation that determines if a child or family needs services.

Table 1. Children Who Received an Investigation or Alternative Response, 2016–2020							
	2016 Rate	2017 Rate	2018 Rate	2019 Rate	2020 Rate		
State	per 1,000						
	Children	Children	Children	Children	Children		
West Virginia ⁴	140.1	141.7	143.2	148.4	137.9		
Nation	46.7	47.1	47.8	47.2	42.9		

Source: U.S. Department of Health & Human Services, Administration for Children and Families, Administration on Children, Youth and Families, Children's Bureau. (2022). Child Maltreatment 2020. Available from https://www.acf.hhs.gov/cb/data-research/child-maltreatment.

A referral may be either screened in or screened out. An allegation of child maltreatment that meets the state's standards for acceptance is screened in and receives an investigation or alternative response⁵ from CPS. Referrals that do not meet agency criteria are screened out or diverted from CPS to other community agencies. As noted in Table 2, West Virginia's screened-in referral percentage rate is above the national average.

Table 2. Screened-In and Screened-Out Referrals, 2020							
State	Screened-In Referrals (Reports)	Screened-Out Referrals	Total Referrals	Screened-In Referrals Percent	Screened-Out Referrals Percent		
West Virginia	24,104	13,591	37,695	63.9	36.1		
Nation	2,120,316	1,522,916	3,643,232	54.2	45.8		

Source: U.S. Department of Health & Human Services, Administration for Children and Families, Administration on Children, Youth and Families, Children's Bureau. (2022). Child Maltreatment 2020. Available from https://www.acf.hhs.gov/cb/data-research/child-maltreatment.

The number of victims represents a unique count of victims with a disposition of substantiated or indicated. Table 3 covers a five-year span with West Virginia seeing an increase in child victims for three years, with a decrease in the fourth and fifth years. Nonetheless, the last three years indicate that the rates of child victims per 1,000 children in West Virginia are more than double the national rates.

Research indicates that although parental stressors may have increased during the COVID-19 pandemic, child maltreatment rates declined thus signifying notable lessons for prevention.⁶

⁴ By far, West Virginia had the highest rate in the country each.

⁵ To reiterate, West Virginia does not have an alternative response program.

⁶ Sege, R., & Stephens, A. (2022). Child physical abuse did not increase during the pandemic. *JAMA Pediatrics*, 176(4), 338-340.

Table 3. Child Victims, 2016–2020							
State	2016 Rate	2017 Rate	2018 Rate	2019 Rate	2020 Rate		
	per 1,000						
	Children	Children	Children	Children	Children		
West Virginia	15.9	17.2	19.0	18.7	17.2		
Nation	9.1	9.1	9.2	8.9	8.4		

Source: U.S. Department of Health & Human Services, Administration for Children and Families, Administration on Children, Youth and Families, Children's Bureau. (2022). Child Maltreatment 2020. Available from https://www.acf.hhs.gov/cb/data-research/child-maltreatment.

The CDC created the Youth Risk Behaviors Surveillance System (YRBSS) to examine health behaviors and experiences among students across the country. The primary data source for the YRBSS is the Youth Risk Behavior Survey that is biannually administered to a nationally representative sample of high school students in public and private schools in the United States.

One of the categories of health-related behaviors monitored by the YRBSS is behaviors contributing to unintentional injuries and violence. As evidenced by Figure 1 below, the percentage of West Virginia students who report electronic bullying is higher than the national average but has been decreasing since 2015.

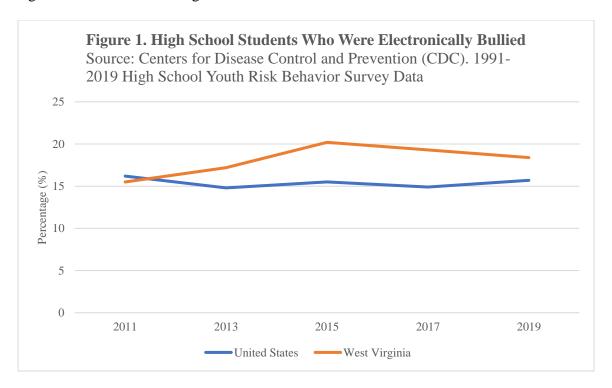
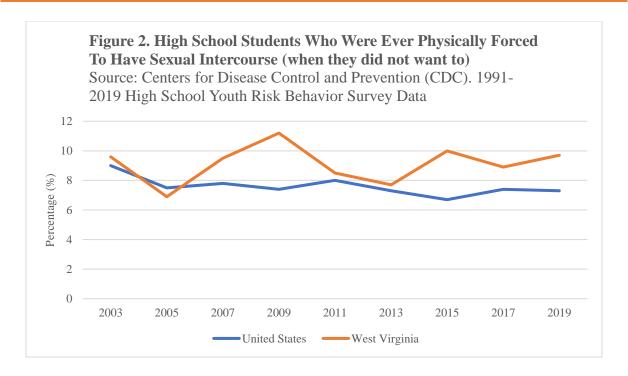
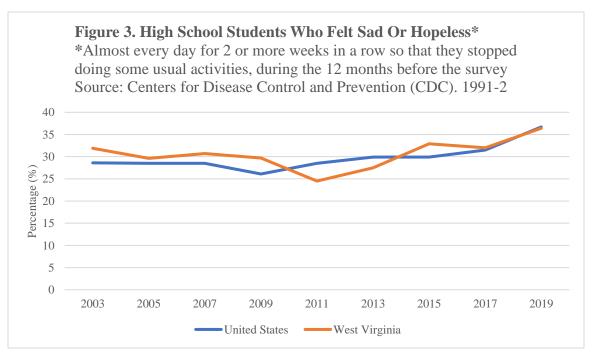


Figure 2 shows that the percentage of West Virginia students who report being physically forced to have sexual intercourse happens more often than the national average.



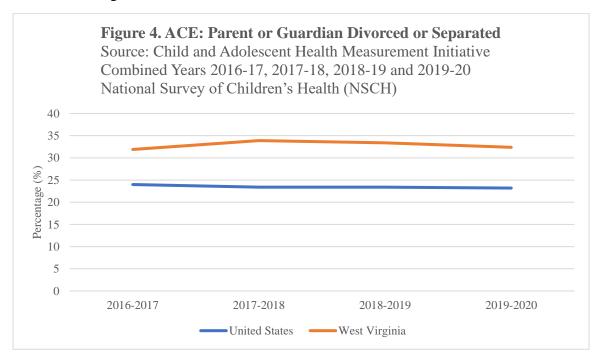
The percentage of West Virginia students who report feeling sad or helpless is comparable to the national average, as represented in Figure 3 below.



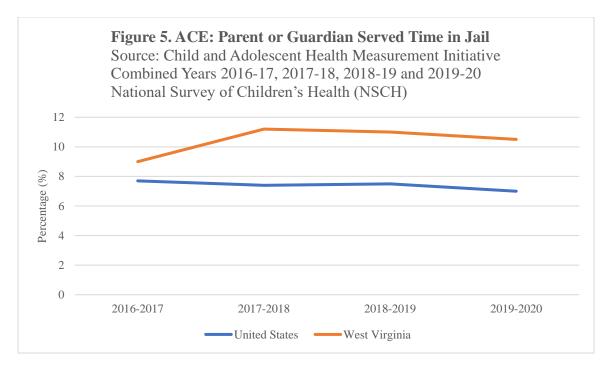
The Maternal and Child Health Bureau at the federal Health Resources and Services Administration in partnership with Census Bureau, National Center for Health Statistics at the CDC, Child and Adolescent Health Measurement Initiative, and a National Technical Expert Panel administers the National Survey of Children's Health (NSCH). The NSCH samples non-institutionalized children, ages 0-17, in the United States, and is weighted to be representative of United States population.

The NSCH also looked at trends over time in each of the sub-component areas of the ACEs score. As evidenced by the ensuing Figures 4-10 and Figure 12, West Virginia has remained relatively consistent over time with higher rates of ACEs than other states.

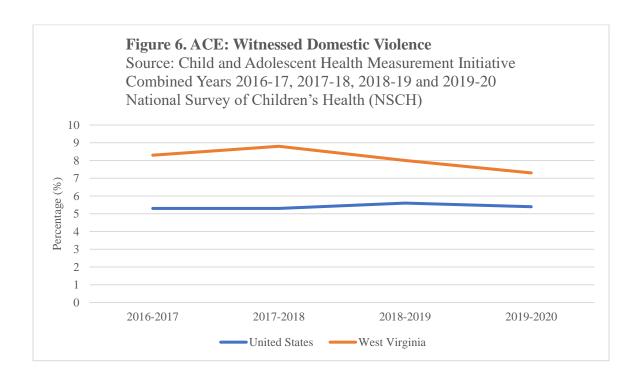
Figure 4 below shows the most prevalent ACE, parent or guardian divorced or separated. For each of the combined years, West Virginia had the highest percentage of affirmative responses for this ACE among all States and the District of Columbia.



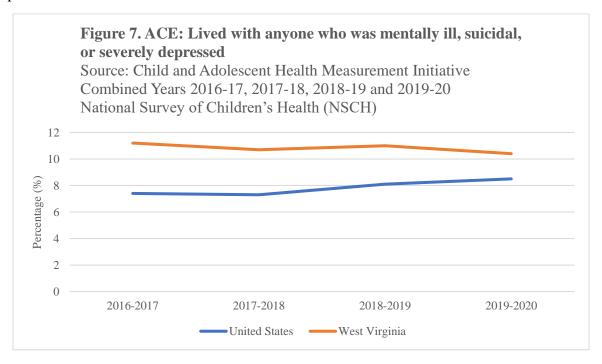
As indicated by Figure 5, the percentage of West Virginian children who have parents or guardians that served time in jail is higher than the national average. For each of the combined years, West Virginia ranked in the top 10 states and the District of Columbia having affirmative responses for this ACE.



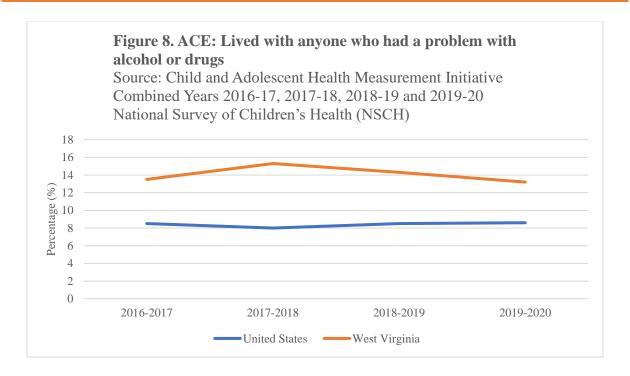
As indicated by Figure 6 below, the percentage of West Virginian children who witnessed domestic violence is higher than the national average. For each of the combined years, West Virginia ranked in the top 10 states and the District of Columbia having affirmative responses for this ACE.



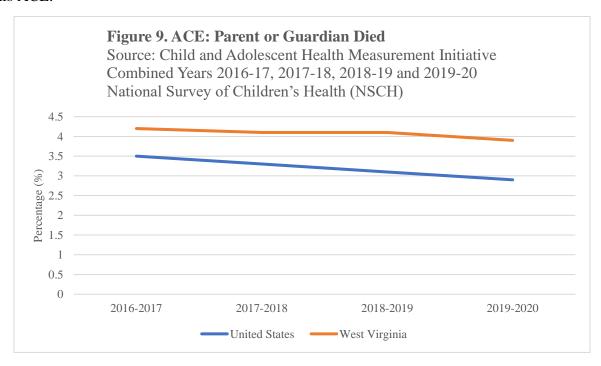
As indicated by Figure 7 below, the percentage of West Virginia children who lived with anyone mentally ill, suicidal, or severely depressed is higher than the national average. For combined years 2016-2017 and 2017-2018, West Virginia ranked in the top 10 states and the District of Columbia having affirmative responses for this ACE. For combined years 2018-2019 and 2019-2020, West Virginia ranked in the top 20 states and the District of Columbia having affirmative responses for this ACE.



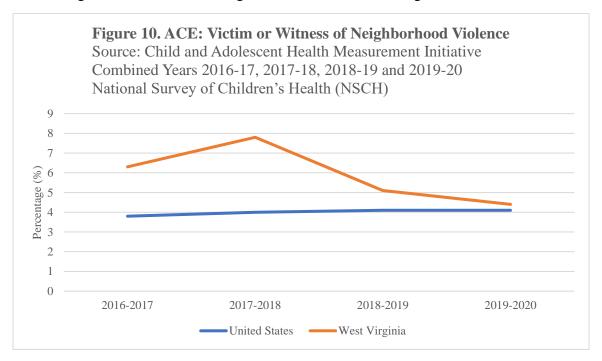
As indicated by Figure 8, the percentage of West Virginia children who lived with anyone who had a problem with alcohol or drugs is higher than the national average. For the combined years 2016-2017, 2017-2018 and 2018-2019, West Virginia ranked in the top five states and the District of Columbia having affirmative responses for this ACE. For combined years 2019-2020, West Virginia ranked in the top 10 states and the District of Columbia having affirmative responses for this ACE.



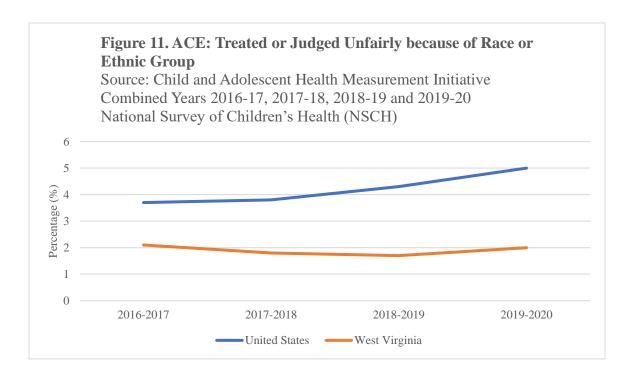
As represented by Figure 9 below, the percentage of West Virginia children who experience the death of a parent or guardian is higher than the national average. For combined years 2016-2017 and 2017-2018, West Virginia ranked in the top 15 states and the District of Columbia having affirmative responses for this ACE. For combined years 2018-2019 and 2019-2020, West Virginia ranked in the top 10 states and the District of Columbia having affirmative responses for this ACE.



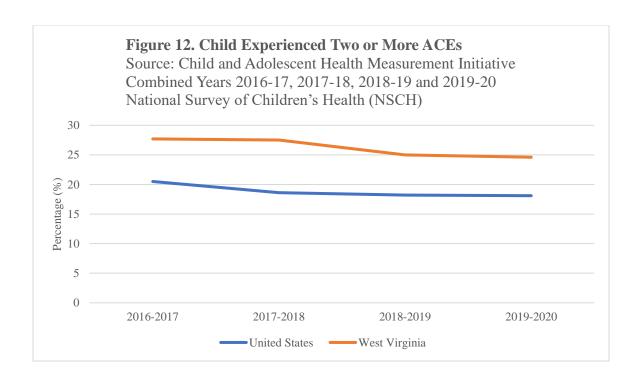
As represented by Figure 10 below, the percentage of West Virginia children who are a victim or witness of neighborhood violence is higher than the national average.



As represented by Figure 11 below, the percentage of West Virginia children who were treated or judged unfairly because of race or ethnic group was significantly below the national average.



As represented by Figure 12 below, the percentage of West Virginia children who experienced two or more is higher than the national average. Recognized as the state with the 2nd highest percentage with 2 or more ACEs in 2016- 2017 and 2017-2018, West Virginia had improved to being the 7th by 2018-2019. West Virginia fell back to 5th place for 2019-2020. For the combined years 2016-2017 and 2017-2018, West Virginia ranked in the top five states and the District of Columbia for children experiencing two or more ACEs. For combined years 2018-2019 and 2019-2020, West Virginia ranked in the top 10 states and the District of Columbia for children experiencing two or more ACEs.



The Behavioral Risk Factor Surveillance System (BRFSS) is a national system of health-related telephone surveys, funded by the CDC. These surveys gather statewide data on health-related behaviors, chronic diseases, and use of preventive services.⁷

As represented in the table below, West Virginia adults cope with a high level of adverse childhood experiences.

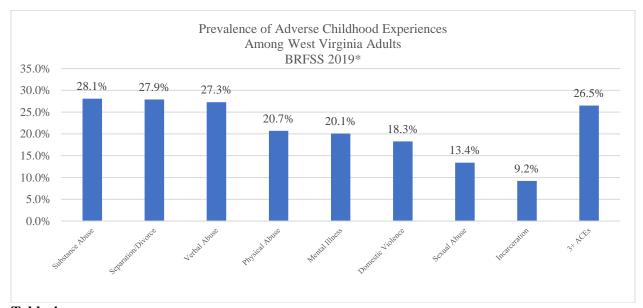


Table 4*The West Virginia Health Statistics Center is the CDC partner agency for the BRFSS.

15

⁷ Centers for Disease Control and Prevention (CDC). *BRFSS*. https://www.cdc.gov/brfss/index.html. May 4, 2022. Accessed June 9, 2022.

Toxic Stress

The statistics addressed previously represent experiences that can negatively affect a child and their development. The long-term effects of ACEs include health issues such as obesity and mental health issues and struggles with various aspects of adulthood (holding a job and unstable relationships), but toxic stress is a component of ACEs.⁸

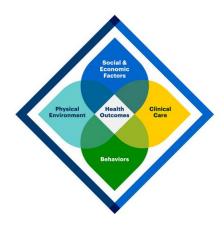
According to Harvard University, "toxic stress occurs when a child experiences strong, frequent and/or prolonged adversity, without adequate adult support." This requires the stress response system to prolong activation and disrupt the development of the brain architecture and other organ systems, which leads to an increase in the risk for stress-related diseases and cognitive impairment into adulthood. This can last a lifetime. The National Scientific Council on the Developing Child coined the term "toxic stress" in the early 2000s to describe the stress response systems' effect on the development of a child's brain, immune system, metabolic regulatory system and cardiovascular system. It is noted that when children experience community ACEs, in addition to ACEs at home, the stress response cannot distinguish environments, only threats, and goes on high alert.⁹

One of the best ways to treat toxic stress is to find a trusted adult to foster a relationship with the child, such as a caregiver. Physical activity, therapy, and spending time in nature are three additional noted techniques to help children overcome the trauma of toxic stress.¹⁰

Current Efforts to Study ACEs

According to America's Health Report Rankings model, there are four drivers or determinants of health: "social and economic factors, physical environment, clinical care and behaviors all of which influence the fifth model category, health outcomes. The model reflects those determinants of health that directly influence health outcomes."

The initial ACE Study concluded that individuals who experienced a higher number of ACEs were more likely to experience more mental and physical health problems.



⁸ Fast Facts: Preventing Childhood Adverse Experiences. CDC, https://www.cdc.gov/violenceprevention/aces/, (Accessed June 2, 2022).

⁹ Fast Facts: Preventing Childhood Adverse Experiences. CDC, https://www.cdc.gov/violenceprevention/aces/, (Accessed June 2, 2022).

¹⁰ ACEs and Toxic Stress: Frequently Asked Questions, Harvard University Center on the Developing Child, https://developingchild.harvard.edu/resources/aces-and-toxic-stress-frequently-asked-questions/, (Accessed June 2, 2022).

¹¹ Executive Brief Annual Report 2021, America's Health Rankings, https://assets.americashealthrankings.org, (Accessed April 9, 2022).

Individuals with four or more ACEs were found to be substantially more likely to have serious health concerns. The West Virginia ACES Coalition analysis of West Virginia data also indicates a substantial increased likelihood of poor health outcomes linked with higher numbers of ACEs. One of the most urgent reasons to address ACEs is the link between opioid addiction and early childhood adversity.¹²

A 2016 study found that individuals who reported five or more ACEs were three times more likely to misuse prescription pain medication and 5 times more likely to engage in injection drug use. Another study found that over 80% of the patients seeking treatment for opioid addiction had at least one form of childhood trauma. A 2010 study concluded that a male child with six or more ACEs is 46 times more likely to become an intravenous drug user as an adult than a male child with zero ACEs. ¹³



Resilience (BCR) Model. Academic Pediatrics. 17 (2017) pp. S86-S93. DOI information: 10.1016/j.acap.2016.12.011

¹² Stumbling Blocks or Stepping Stones, Findings on Adverse Childhood Experiences (ACEs) in West Virginia. West Virginia ACEs Coalition, http://www.wvaces.org, (Accessed April 9, 2022).

¹³ ACEs and Toxic Stress: Frequently Asked Questions, Harvard University Center on the Developing Child, https://developingchild.harvard.edu/resources/aces-and-toxic-stress-frequently-asked-questions/, (Accessed June 2, 2022).

Mitigating Programs/Policies Already in Place



There are ongoing efforts within the state to prevent and mitigate the harms of ACEs. Various policies and training opportunities have been established within the West Virginia Department of Education (WVDE) regarding the licensure of professionals and trauma-informed training. It is now mandatory to report child abuse and use trauma-informed and social-emotional best practices. WVDE is also receiving national and state funded initiatives to continue supporting children's mental health and resiliency. Moving forward,

WVDE will continue to provide more trainings on resiliency, while looking for creative ways to address shortages, expand current initiatives, promote self-care, and continue to identify caring adults to mentor students.

The Office of Children, Youth, and Families in DHHR's Bureau for Behavioral Health is working on the Strategic Prevention Framework, which uses three tiers of prevention supports: universal, selective and indicative, and requires all strategies to be proven and effective before implementing, as well as creating the West Virginia Prevention Strategic Plan and the West Virginia Expanded School Mental Health Strategic Plan.

The West Virginia Home Visitation Program, a component of DHHR's Bureau for Public Health's Office of Maternal, Child and Family Health, includes several evidenced-based models, including:

- Parents As Teachers
- Healthy Families America
- Early Head Start
- The West Virginia Home Visitation Program also administers the State's Medicaid Home Visitation Program, Right From the Start (RFTS). targeting high risk, pregnant women and infants up to one year for medical case management to ensure linkage to services. Moreover, the Neuroscience, Epigenetics, ACEs, and Resilience (NEAR) toolkit is used in Home Visitation Programs as a strategy for engaging parents in discussing and using the ACEs questionnaire in a safe, respectful, and effective way for both the home visitor and family.

Prevention Strategies

The CDC specified six strategies to prevent adverse childhood experiences and mitigate adversities already experienced. These strategies focus on creating positive family and community norms that allow children to grow up in safe and stable environments. In order to maximize outcomes, a multi-generational approach is used to benefit both children and the adults responsible for creating the environment in which they live. These strategies are designed to work together to provide a comprehensive framework for building resiliency and creating positive outcomes.¹⁴



1. Strengthen Economic Supports to Families

The CDC recommends strengthening household financial security and developing family-friendly work policies. Encouragement for West Virginia Pathways to strengthening economic support to families may look like:

- Expanding awareness about free tax preparation programs through Volunteer Income Tax Assistance (VITA) and Mountain Heart West Virginia to assist families in receiving refunds and early payout of refunds.
- Promoting and offering tax breaks and incentives to businesses that provide childcare to employees onsite.
- Continuing to study the multigenerational effects of poverty and the impact on creating different social norms within families and communities, including existing or new programs that mitigate ACEs and address the impact of children in the foster care system.
- Economically incentivizing parents for making healthy choices for their children and families, including well child visits, and regular medical visits.
- Supporting policy changes that provide income or child tax credits for working families.
- Expanding access to programs that teach family life skills such as, Strengthening
 Families, Nurturing Parent, Good News Mountaineer Garage (transportation assistance),
 and self-sufficiency programs, such as the Supplemental Nutrition Assistance Program
 that allows families to buy their own seeds and edible plants and promote the use of
 Family Resource Networks.
- Engaging local community agencies, faith-based initiatives, and local programs to provide supports, and skill, and education assistance to families to lift families out of poverty:
 - o Providing accessible job training to youth.
 - Providing accessible high school equivalency training and testing (some communities have no local access to these programs).
 - Expanding existing and new programs to stop the cycle of teen pregnancy such as Mission WV's THINK program. Lowering teen pregnancy rates increases participation in skilled job training and education.

¹⁴ Preventing Adverse Childhood Experiences: Leveraging the Best Available Evidence, Center for Disease Control and Prevention (2019), National Center for Injury Prevention and Control, https://www.cdc.gov/violenceprevention/pdf/preventingACES.pdf, (Accessed April 9, 2022).

- Exploring evidence-based successful programs across the state with demonstrated results and impact and expand model programs.
- Developing family centered practices that lift people up and encourage participation in economic, social, and medical programs.
- Supporting policies that strengthen household financial security (e.g., tax credits, childcare subsidies, other forms of temporary assistance, and livable wages).
- Enacting Paid Family Medical Leave.
 - Research suggests that paid maternity leave may be protective against intimate partner violence (IPV), which is another ACE exposure. 15

2. Promote Social Norms that Protect Against Violence and Adversity

The CDC recommends public education campaigns, legislative approaches to reduce corporal punishment, bystander approaches, and men and boys as allies in prevention. West Virginia Pathways suggestions to promote social norms that protect against violence and adversity suggestions are to:



- Develop a statewide comprehensive evidence-based educational campaign to reframe ACEs as a public health issue, increase public and community involvement and reduce stigma for those seeking help.
 - Encourage and provide support to those with high ACEs scores to share relatable, personal stories.
 - Establish book clubs that promote reading and understanding about ACEs and Positive Childhood Experiences (PCEs).
 - Incorporate social emotional learning and create safe spaces to learn and communicate about ACEs.
- Develop a common language and framework for discussing ACEs and how to best articulate trauma-informed principles.
- Develop and implement community-based training to increase trauma awareness and resources.
- Expand upon non-violence campaigns that address domestic violence.
- Establish relationship building programs to build confidence with children who have experienced ACEs.
- Explore policy changes to reduce corporal punishment approaches.



3. Ensure a Strong Start for Children

The CDC recommends early childhood home visitation, highquality childcare, and preschool enrichment with family engagement. Recommendations for West Virginia Pathway to ensure a strong start for children includes:

¹⁵ Gartland, D., Hemphill, S. A., Hegarty, K., & Brown, S. J. (2011). Intimate partner violence during pregnancy and the first year postpartum in an Australian pregnancy cohort study. *Maternal and Child Health Journal*, 15(5), 570-578.

- Maximizing investments in evidence-based home visitation programs to assure a
 universal system of availability for families, including Medicaid reimbursement for
 referral and outreach services; continuing to increase awareness and support to reduce
 stigma and fear of voluntary participation.
- Expanding screening of ACEs early by piloting a hospital-based program at birth or at the first newborn visit to gain knowledge and connect families to support programs, including in-home family education.
 - Identifying appropriate standardized screening tools to be tested before implementation and ensuring that providers can refer to identified needs of the screening.
 - Selecting an evidence-based screening tool and train clinical staff. Exploring
 integration of a tool with Birth Score and ways hospital systems can redesign
 sections of the medical record to capture social determinants of health.
- Developing a multi-faceted care coordination approach to connect existing children and family service providers to seamlessly engage with families, including a billing infrastructure to support care team interaction with each other and with patients within provider offices. This would explore how programs can integrate with Women, Infants and Children program as another partner in linking families to care and support.
- Supporting and assisting families in finding high quality childcare and preschool enrichment programs which are staffed by trained providers.
- Children experiencing difficulties are rarely asked what would help them. Focus on the
 voice and perspective of children to gather useful information regarding strategies to
 prevent ACEs from happening in the first place, as well as strategies to mitigate the
 harms of ACEs; collaborating with Federally Qualified Health Centers, community
 health care clinics, DHHR's Women, Infants, and Children program and other
 community partners to identify children and align them with a care team.



4. Teach Skills to Help Parents and Youths Handle Stress, Manage Emotions, and Tackle Everyday Challenges

The CDC recommends social-emotional, safe dating and healthy relationship skill programs, and parenting skills and family relationship approaches. Ideas for West Virginia Pathways to teach skills to help parents and youths handle

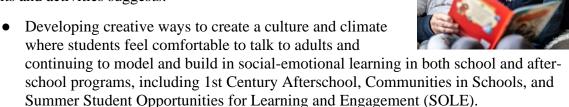
stress, manage emotions, and tackle everyday challenges are to:

• Continue to build, expand, and implement with fidelity trauma-informed, evidence-based best practice policies, universal social skill building programs, and curricula across school systems such as: yoga and mindfulness-based interventions, social and emotional skill development, safe dating, and healthy relationship skills, bullying prevention programs, positive parenting programs, and teacher well-being modules.

- Partner with WVDE to expand home visitation programming to strengthen parent, family and caregiver resilience and knowledge in Pre-K and childcare settings.
- Expand access to after-school programs as a critical system of support for children and youth and to help reduce economic stressors for parents when they are at work or looking for work.
- Identify and promote existing prenatal and birthing resource programs to enhance the skills of first-time parents and develop recommendations to enhance access.
- Coordinate trauma-informed care and skill development training opportunities across multiple settings and systems to improve responses to children and families.

5. Connect Youth to Caring Adults and Activities

With the CDC recommendations of mentoring and after-school programs, West Virginia Pathways to connect youth to caring adults and activities suggests:



- Expanding both formal and informal mentoring opportunities to connect youth with caring adults and role models including teachers, coaches, community, and natural volunteers, and connecting them to extracurricular opportunities of interest, including sports, arts, science, and technology.
- Developing stronger partnerships with the faith-based community to create cultures of support for children and families, and to reduce barriers such as transportation to participate in community activities and build upon and continue to create safe virtual spaces.
- Creating a shared vision for a statewide response to ACEs and a call to action to West Virginians and expand support and awareness of training programs such as Connections Matter - TEAM for West Virginia Children.
- Exploring partnerships with universities and community and technical colleges to formalize and build a larger mentoring pool of caring adults to match with children and youth.
- Celebrating and highlighting successful mentoring and leadership development programs such as Girl Scouts, Boy Scouts, Common Ground, and Big Brothers Big Sisters that connect youth to positive role models and activities.



6. Intervene to Lessen Immediate and Long-Term Harms

The CDC recommends enhanced primary care, victim-centered services, treatment to lessen the harms of ACEs, treatment to prevent problem behavior and future involvement in violence, and family-centered treatment for substance use disorders. With this, West Virginia Pathways to intervene to lessen immediate and long-term harms by:

- Supporting integrated primary and behavioral health care models across settings to prevent and mitigate ACE exposures through screenings, therapeutic treatments, and intervention supports, including telehealth.
- Coordinating a family warmline service to connect adults and youth with a trained individual to deescalate situations and provide crisis intervention supports when law enforcement is not available and linking families to essential community resources through programs such as West Virginia 211.
- Continuing to build upon and replicate positive response strategies such as Handle with Care to help traumatized children heal and thrive.
- Connecting at-promise children to early childcare education programs to establish safe, supported environments to help children thrive and to connect families with resources.



Recommendations Moving Forward

With the desire to be a trauma-informed, healingcentered state where children and families thrive, West Virginians must collaborate on projects that bring awareness to the prevention of ACEs.

Goals:

- 1. The top recommendation is that a workgroup continues to meet, study and refine findings specific to the residents of West Virginia and finalize recommendations for action. In order to build resiliency, it is essential to fully comprehend where West Virginia, as a state, stands with experiencing ACEs and the impact they are having on our communities.
- 2. An expansion of a dedicated, state-level position to explore revenue sources and implement ACEs recommendations must be considered.

Partnerships:

Because partnerships are of dire importance, we recommend the following.

1. Supporting ongoing, academic research to provide valuable insight and opportunities to reach and educate families on the impact of ACEs.

- 2. Providing training to those who work closely with children and families to allow a greater number of individuals access to life-altering education, equipping them on how to handle situations that cause toxic stress or are harmful.
- 3. Educating and engaging with community partners, such as the West Virginia ACEs Coalition, faith-based centers and other community organizations.

By addressing the stigma of ACEs and emphasizing resiliency, West Virginia can highlight success stories and programs, which will engage other families and allow them the chance at healing; thus, providing happier and healthier lives for generations to come.

Workgroup Contributors:

Dr. Ayne Amjad, Commissioner/State Health Officer, DHHR's Bureau for Public Health Susan Richards, Director of Training, DHHR's Bureau for Social Services

Dr. James Lewis, Chief of Child Behavior/Development, Marshall University Joan C. Edwards School of Medicine

Dr. Art Rubin, Associate Dean for Predoctoral Education, West Virginia School of Osteopathic Medicine

Jill Upson, Executive Director, West Virginia Herbert Henderson Office of Minority Affairs Jim Jeffries, Director, DHHR's Office of Maternal, Child and Family Health

John Kennedy, West Virginia Primary Care Association, School-Based Health and Behavioral Health Coordinator

Robin Darnell, Physician, Valley Health Systems, Inc.

Angie Hamilton, Pressley Ridge

Tracy King, FMRS

Richard Royse, Crittenton Services

Jim McKay, State Coordinator, Prevent Child Abuse West Virginia

Kathy Szafran, Executive Director, Mountain Health Promise

Rich Sutphin, Executive Director, West Virginia Rural Health Association

Lauren Swager, Child and Adolescent Psychiatrist, West Virginia Chapter of the American Academy of Pediatrics

Dr. Patricia Lally, Physician, Rainelle Medical Center

Dr. Howard Lafferty, Physician, West Virginia Academy of Family Physicians

Jennifer Lilly, Nurse, West Virginia Association of School Nurses

Marissa Sanders, Director, West Virginia Foster, Adoptive and Kinship Network

Nikki Tennis, Director, DHHR's Bureau for Behavioral Health

Andrea Darr, Director, West Virginia Center for Children's Justice

Kelly Mordecki, Coordinator, West Virginia Department of Education Office of Student Support and Well-Being

Drema Hill, Vice President for Community Engagement and Development, West Virginia School of Osteopathic Medicine

Pamela Woodman-Kaehler, Foster Care Ombudsman

Dr. Dave Didden, DHHR's Physician Director for the Office of Maternal, Child and Family Health

Resources Shared by Workgroup Members

Child Abuse Prevention Month Resource Guide:

https://www.childwelfare.gov/topics/preventing/preventionmonth/resources/resource-guide/

Children's Trust Fund Alliance Book Club: https://ctfalliance.org/partnering-with-parents/book-club/

Foster Club: https://www.fosterclub.com/

Generations United: www.gu.org

Investigating racial differences in clusters of adverse childhood experiences. Maguire-Jack, K., Lanier, P., & Lombardi, B. (2020). American Journal of Orthopsychiatry, 90(1), 106. Available at: https://www.researchgate.net/profile/Paul-Lanier/publication/331427301 Investigating Racial Differences in Clusters of Adverse Childhood Experiences/links/5c7e76a8299bf1268d3a82f1/Investigating-Racial-Differences-in-Clusters-of-Adverse-Childhood-Experiences.pdf

NEAR Evaluation Process Report for First Cohort: https://teamwv.org/wp-content/uploads/2019/04/ACEs NEAR FULL Impact-Evaluation-Report.pdf

NEAR (Neuroscience, Epigenetics, ACES, and Resilience) toolkit: https://www.startearly.org/where-we-work/washington/nearathome/

Positive childhood experiences and adult mental and relational health in a statewide sample: Associations across adverse childhood experiences levels. Bethell, C., Jones, J., Gombojav, N., Linkenbach, J., & Sege, R. (2019). Journal of the American Medical Association (JAMA) Pediatrics, 173(11), e193007-e193007. Available at: https://jamanetwork.com/journals/jamapediatrics/fullarticle/2749336

Positive Community Norms WV Parent Survey Key Findings Report, TEAM for WV Children: https://teamwv.org/wp-content/uploads/2019/03/WVFamilySurveyStatewide2013FINAL.pdf

Responding to ACEs with HOPE: health outcomes from positive experiences. Positive Childhood Experiences in HOPE Framework, Sege, R. D., & Browne, C. H. (2017). Academic Pediatrics, 17(7), S79-S85. https://www.academicpedsjnl.net/article/S1876-2859(17)30107-9/fulltext

Surgeon General Report: https://www.hhs.gov/about/news/2021/12/07/us-surgeon-general-issues-advisory-on-youth-mental-health-crisis-further-exposed-by-covid-19-pandemic.html

The West Virginia Substance Use Response Plan: https://dhhr.wv.gov/office-of-drug-control-policy/news/Documents/FINAL%20-%20West%20Virginia%202020_2022%20Council%20Substance%20Use%20Plan_January%20_20%2c%202020%20%28as%20filed%29.pdf

References

- CDC, HRSA and Trust for America's Health, 2019-2020
- CDC WONDER, Multiple Cause of Death Files, 2019
- CDC, Behavioral Risk Factor Surveillance System, 2020
- CDC, Fast Facts: Preventing Adverse Childhood Experiences, 2022
- U.S. Department of Housing and Urban Development, Comprehensive Housing Affordability Strategy, 2014-2018
- U.S. Census Bureau, American Community Survey, 2019

- Federal Bureau of Investigation, Uniform Crime Reporting Program, 2019
- U.S. Census Bureau, American Community Survey, 2015-2019
- U.S. HHS, Centers for Medicare & Medicaid Services, Office of Minority Health, Mapping Medicare Disparities Tool, 2019
- Center for Climate and Energy Solutions, 2020
- U.S. Bureau of Labor Statistics, Census of Fatal Occupational Injuries, 2017-2019
- U.S. Environmental Protection Agency, 2018-2020
- CDC, National Center for HIV/AIDS, Viral Hepatitis, STD, and TB Prevention Atlas, 2019
- U.S. HHS, Centers for Medicare & Medicaid Services, National Plan and Provider Enumeration System, September 2021
- CDC WONDER, Multiple Cause of Death Files, 2017-2019
- U.S. Energy Information Administration, State Energy Data System, 2019
- America's Health Rankings composite measure, 2021
- Denver Health and Hospital Authority, RADARS® System Survey of Non-Medical Use of Prescription Drugs Program, 2021
- CDC, Behavioral Risk Factor Surveillance System, 2019
- CDC, Water Fluoridation Reporting System, 2018
- CDC WONDER Online Database, Single-Race Population Estimates, 2020
- U.S. Department of Agriculture, Economic Research Service, 2019
- U.S. Census Bureau, Current Population Survey, Voting and Registration Supplement, 2018/2020
- U.S. Census Bureau, Current Population Survey, Volunteering and Civic Life Supplement, 2019
- Environmental Protection Agency, Enforcement and Compliance History Online, Safe Drinking Water Information System, 2021
- American Nonsmokers' Rights Foundation, 2021
- Environmental Protection Agency, Toxic Release Inventory National Analysis, 2019
- U.S. Department of Agriculture, Household Food Security in the United States Report, 2018-2020
- CDC WONDER, Natality Public Use Files, 2019
- U.S. Department of Education, National Center for Education Statistics, Common Core of Data, 2018-2019 School Year
- CDC, National Immunization Survey-Child (Birth Cohort), 2017-2018
- CDC, National Immunization Survey-Teen, 2020
- U.S. Department of Education, National Center for Education Statistics, National Assessment of Educational Progress, 2019
- National Survey of Children's Health, U.S. Department of Health and Human Services, Health Resources and Services Administration (HRSA), Maternal and Child Health Bureau (MCHB), 2019-2020
- CDC, Preventing Adverse Childhood Experiences (ACEs): Leveraging the Best Available Evidence, 2019
- America's Health Rankings, Annual Report 2021, americashealthrankings.org

• *ACEs and Toxic Stress: Frequently Asked Questions*, Harvard University Center on the Developing Child, https://developingchild.harvard.edu/resources/aces-and-toxic-stress-frequently-asked-questions/, (accessed June 2, 2022).