Alaska Association of School Boards

April 1, 2017
Juneau, Alaska
Trauma

“Sometimes adults say, 'They're too young to understand.' However, young children are affected by traumatic events, even though they may not understand what happened.”

1 out of every 4 children attending school has been exposed to a traumatic event.
ACEs Primer
Paper Tigers & Resilience Trailer
Situations that can be traumatic for Students

• Physical or sexual abuse
• Abandonment, betrayal of trust, or neglect
• The death or loss of a loved one
• Life-threatening illness in a caregiver
• Witnessing domestic violence
• Automobile accidents or other serious accidents
• Bullying

• Witnessing or experiencing community violence (e.g., shootings, stabbings, robbery, or fighting at home, in the neighborhood, or at school)
• Having a close relative incarcerated
• Living in chronically chaotic environments in which housing and financial resources are not consistently available
Wired Up – Wired Down

[Diagram showing neuronal activity at different stages: At a Child's Birth, at 7 Years Old, at 15 Years of Age]
What is Stress

• The set of changes in the body and the brain that are set into motion when there are overwhelming threats to physical or psychological well-being.

• When we are threatened the body activates physiological responses including increases in heart rate, blood pressure, and production of stress hormones such as cortisol.

(From Neurons to Neighborhoods, National Research Council and Institute of Medicine, 2000)
Brain process under typical conditions

Observe → Input → Interpret → Process → Evaluate Options → Plan → Act

Courtesy of Josh Arvidson with funding from Alaska Division of Behavioral Health
Alarm system
“Express Route”

Observe → Interpret

React (Fight - Flight - Freeze)

Act

DANGER

Process

Evaluate Options

Plan

Courtesy of Josh Arvidson with funding from Alaska Division of Behavioral Health
With repeated stress, the Alarm System “Express Route” becomes the main road.
How do students present in the classroom?

- Quiet
- Withdrawn
- Tries to be invisible
- Requires constant support
- Frequent angry outbursts

Unfortunately these behaviors can be misinterpreted
Intense reactions to reminders of their traumatic event:

• Thinking others are violating their personal space, i.e., “What are you looking at?”
• Blowing up when being corrected or told what to do by an authority figure
• Fighting when criticized or teased by others
• Resisting transition and/or change

![Bar chart showing top reasons for expulsion or suspension]

- Profanity/Obscenity: 908 incidents
- Dangerous Actions: 100 incidents
- Attendance related: Truancy, skipping class, tardy: 1059 incidents
- Bullying/Harassment: 1791 incidents
- Fighting: 1843 incidents
- Disruptive Behavior: 2659 incidents
- Insubordination/Willful Disobedience: 6378 incidents

# of incidents resulting in expulsion or suspension
What are Alaska’s Adverse Childhood Experiences?

**Abuse**
1. Physical
2. Sexual
3. Verbal/Emotional

**Household Dysfunction**
4. Mental Illness in the Household
5. Substance Abuse in the Household
6. Witnessing Domestic Violence
7. Separation/Divorce
8. Household Member in Prison
Percentage of Alaskan Adults by Three Levels of ACE Scores If They have a Specific ACE Present

Adverse Childhood Experiences

- Physical Abuse
- Sexual Abuse
- Emotional Abuse
- Household Mental Illness
- Household Substance Abuse
- Witnessed Domestic Violence
- Separation or Divorce
- Incarcerated Family Member
- Physical Neglect
- Emotional Neglect

Source: 2014 & 2015 Alaska BRFSS, Section of Chronic Disease Prevention and Health Promotion, Alaska Division of Public Health, Graphic by Alaska Mental Health Board Staff
Percentage of Alaskan Adults who Report Graduating from College or Not Graduating from High School by ACE Score

Source: Alaska data from the 2013 Alaska Behavioral Risk Factor Surveillance System, Alaska Department of Health and Social Services, Division of Public Health, Section of Chronic Disease Prevention and Health Promotion
ADVERSE CHILDHOOD EXPERIENCES
ALASKA AND THE U.S.
National Survey of Children’s Health 2011/2012

(1) socioeconomic hardship,
(2) divorce/separation of parent,
(3) death of parent,
(4) parent served time in jail,
(5) witness to domestic violence,
(6) victim of neighborhood violence,
(7) lived with someone who was mentally ill or suicidal,
(8) lived with someone with alcohol/drug problem,
(9) treated or judged unfairly due to race/ethnicity.

Does Not Include Physical, Sexual and Emotional Abuse.
ACE Scores for Alaska and the U.S.

ACE Scores for Alaska’s Population from Birth to Age 17

Links with Educational Measures for Alaskan Children

- Absences
- Calls Home
- Repeating a Grade
- Having an IEP
- More
Adverse Experiences and Mental Health Measures
Traumatized children may experience physical and emotional distress.

- Physical symptoms like headaches and stomachaches
- Poor control of emotions
- Inconsistent academic performance
- Unpredictable and/or impulsive behavior
- Over or under-reacting to bells, physical contact, doors slamming, sirens, lighting, sudden movements
The comparison between Alaska and the U.S. does not necessarily indicate a statistically different level of outcome between the two populations but is displayed to show the similarity between the two samples.

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Adverse Experiences and School Related Measures
What can be done at school to help a traumatized child?

• Maintain usual routines
• Increase the level of support and encouragement
• Behavior – set firm limits for inappropriate behaviors - rather than punitive consequences
• Provide a safe place for students to go

FACT
Trauma can impact school performance.

• Lower GPA
• Higher rate of school absences
• Increased drop-out
• More suspensions and expulsions
• Decreased reading ability
*The comparison between Alaska and the U.S. does not necessarily indicate a statistically different level of outcome between the two populations but is displayed to show the similarity between the two samples.

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Population Attributable Fraction

Growing Up
By age 17 Alaskan young people on average have 1.3 ACEs they have acquired.

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At what age do you think that they are half-way to their total ACEs?

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At what age do you think that they are half-way to their total ACEs?

Age 3

EARLY CHILDHOOD DEVELOPMENT IS A SMART INVESTMENT

The earlier the investment, the greater the return

Source: James Heckman, Nobel Laureate in Economics
Chronic exposure to traumatic events, especially during a child’s early years, can:

- Adversely affect attention, memory, and cognition
- Reduce a child’s ability to focus, organize, and process information
- Interfere with effective problem solving and/or planning
- Result in overwhelming feelings of frustration and anxiety
Protective Factors
What Alaskan High School Students Report
What Parents Report
What Our Schools Report
Academic Achievement

Self Reported Grades and Students’ Perception of Their Teachers
Caring and Encouraging Them
Grades of Alaskan High School Students by How they Answered the Question: Do teachers really care about you and encourage you?

<table>
<thead>
<tr>
<th>Grades</th>
<th>Mostly A's</th>
<th>Mostly B's</th>
<th>Mostly C's</th>
<th>Mostly D's</th>
<th>Mostly F's</th>
</tr>
</thead>
<tbody>
<tr>
<td>Teachers Care</td>
<td>71.5%</td>
<td>62.4%</td>
<td>56.7%</td>
<td>46.1%</td>
<td>46.6%</td>
</tr>
<tr>
<td>Not Sure</td>
<td>19.6%</td>
<td>25.1%</td>
<td>28.3%</td>
<td>33.3%</td>
<td>24.0%</td>
</tr>
<tr>
<td>Teachers Don't Care</td>
<td>8.8%</td>
<td>12.5%</td>
<td>15.0%</td>
<td>20.6%</td>
<td>29.3%</td>
</tr>
</tbody>
</table>

Source: State of Alaska Department of Health and Social Services, Division of Public Health, Chronic Disease & Health Promotion. *Youth Risk Behavior Survey [YRBS] 2011 & 2013 data, [http://dhss.alaska.gov/dph/Chronic/Pages/yrbs/yrbs.aspx](http://dhss.alaska.gov/dph/Chronic/Pages/yrbs/yrbs.aspx).* These results are from 13,333 Alaska High School Students responses to the YRBS.
An Alaskan High School Classroom Filled with Students who Think That Their Teachers Don’t Care

Estimated Grade Point Average – 2.72

An Alaskan High School Classroom Filled with Students who Think That Their Teachers Care

Estimated Grade Point Average – 3.10

Mental Health

Students Who Considered Suicide in The Previous Year by Whether They Perceive They Matter in Their Community
Alaska High School Students who Considered Suicide by How they Answered the Question:
Do you feel like you matter to people in your community?

<table>
<thead>
<tr>
<th>Percentage</th>
<th>Considered Suicide in the Past 12 Months</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>33.5% Matter</td>
</tr>
<tr>
<td></td>
<td>33.2% Not Sure</td>
</tr>
<tr>
<td></td>
<td>33.3% Don't Matter</td>
</tr>
<tr>
<td>No</td>
<td>57.1% Matter</td>
</tr>
<tr>
<td></td>
<td>30.3% Not Sure</td>
</tr>
<tr>
<td></td>
<td>12.6% Don't Matter</td>
</tr>
</tbody>
</table>

Source: State of Alaska Department of Health and Social Services, Division of Public Health, Chronic Disease & Health Promotion. Youth Risk Behavior Survey (YRBS) 2011 & 2013 data, http://dhss.alaska.gov/dph/Chronic/Pages/yrbs/yrbs.aspx. These results are from 13,256 Alaska High School Students responses to the YRBS. This slide was prepared by the Alaska Mental Health Board and Advisory Board on Alcoholism and Drug Abuse.
An Alaskan High School Classroom Filled with Students Who Think They Matter in Their Community

11% Considered Suicide in a Year

An Alaskan High School Classroom Filled with Students Who Don’t Think They Matter in Their Community

35% Considered Suicide in a Year

Source: State of Alaska Department of Health and Social Services, Division of Public Health, Chronic Disease & Health Promotion. Youth Risk Behavior Survey (YRBS) 2011 & 2013 data, [http://dhss.alaska.gov/dph/Chronic/Pages/yrbs/yrbs.aspx](http://dhss.alaska.gov/dph/Chronic/Pages/yrbs/yrbs.aspx)
Substance Abuse

Past Month Drinking by Perception of Whether Students Think They Matter to Their Communities
Current Alcohol Use of Alaskan High School Students by How they Answered the Question:
Do you feel like you matter to people in your community?

Number of Days in the Past 30 When Alcohol was Consumed

<table>
<thead>
<tr>
<th>Days</th>
<th>Matter</th>
<th>Not sure</th>
<th>Doesn't Matter</th>
</tr>
</thead>
<tbody>
<tr>
<td>0 days</td>
<td>55.8%</td>
<td>30.5%</td>
<td>13.7%</td>
</tr>
<tr>
<td>1 to 2 days</td>
<td>50.6%</td>
<td>30.2%</td>
<td>19.3%</td>
</tr>
<tr>
<td>3 to 5 days</td>
<td>47.9%</td>
<td>32.0%</td>
<td>20.2%</td>
</tr>
<tr>
<td>6 or more</td>
<td>44.2%</td>
<td>31.2%</td>
<td>24.6%</td>
</tr>
</tbody>
</table>

Source: State of Alaska Department of Health and Social Services, Division of Public Health, Chronic Disease & Health Promotion. Youth Risk Behavior Survey [YRBS] 2011 & 2013 data, http://dhss.alaska.gov/dph/Chronic/Pages/yrbs/yrbs.aspx. These results are from 12,107 Alaska High School Students responses to the YRBS. This slide was prepared by the Alaska Mental Health Board and Advisory Board on Alcoholism and Drug Abuse.
An Alaskan High School Classroom Filled with Students Who **Do** Think They Matter in Their Community

73% Didn’t Drink - 27% Did Drink

**Source:** State of Alaska Department of Health and Social Services, Division of Public Health, Chronic Disease & Health Promotion. *Youth Risk Behavior Survey (YRBS) 2011 & 2013 data,* [http://dhss.alaska.gov/dph/Chronic/Pages/yrbs/yrbs.aspx](http://dhss.alaska.gov/dph/Chronic/Pages/yrbs/yrbs.aspx)
An Alaskan High School Classroom Filled with Students Who Don’t Think They Matter in Their Community

60% Didn’t Drink - 40% Did Drink

Substance Abuse

Past Month Marijuana Use by Zero or Three or More Days per Week of Supervised After School Activities
Current Marijuana Use of Alaskan High School Students by How they Answered the Question:
How Many Days Per Week of Afterschool Activities Do You Attend?

Number of Times in the Past 30 Days When Marijuana was Used

<table>
<thead>
<tr>
<th>0 times</th>
<th>1 or 2 times</th>
<th>3 to 9 times</th>
<th>10 or more times</th>
</tr>
</thead>
<tbody>
<tr>
<td>43.4%</td>
<td>48.5%</td>
<td>58.8%</td>
<td>64.9%</td>
</tr>
<tr>
<td>13.3%</td>
<td>13.4%</td>
<td>9.4%</td>
<td>17.2%</td>
</tr>
<tr>
<td>24.2%</td>
<td>24.4%</td>
<td>21.1%</td>
<td>9.6%</td>
</tr>
<tr>
<td>19.2%</td>
<td>13.7%</td>
<td>10.8%</td>
<td>8.3%</td>
</tr>
<tr>
<td>0.0%</td>
<td>10.0%</td>
<td>20.0%</td>
<td>30.0%</td>
</tr>
<tr>
<td>100.0%</td>
<td>90.0%</td>
<td>80.0%</td>
<td>70.0%</td>
</tr>
<tr>
<td>60.0%</td>
<td>50.0%</td>
<td>40.0%</td>
<td>30.0%</td>
</tr>
<tr>
<td>20.0%</td>
<td>10.0%</td>
<td>0.0%</td>
<td>0.0%</td>
</tr>
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An Alaskan High School Classroom Filled with Students Who Participated in **Zero** Days of Supervised After School Activities

Marijuana Use in The Past Month

**Source:** State of Alaska Department of Health and Social Services, Division of Public Health, Chronic Disease & Health Promotion. *Youth Risk Behavior Survey (YRBS) 2011 & 2013 data,* [http://dhss.alaska.gov/dph/Chronic/Pages/yrbs/yrbs.aspx](http://dhss.alaska.gov/dph/Chronic/Pages/yrbs/yrbs.aspx).
An Alaskan High School Classroom Filled with Students Who Participated in Three or More Days of Supervised After School Activities

Marijuana Use in The Past Month

Self Regulation

1. Finishes tasks and follows through on commitments
2. Stays calm and in control when facing a challenge
3. Shows interest and curiosity in learning new things

Average Number of Home Contacts Made by Schools in the Previous Year by ACEs and Self-Regulation Skills

Percentage of Students with an IEP by ACES and Self-Regultion Scores

You can help a child who has been traumatized.

• Follow your school’s reporting procedures if you suspect abuse

• Work with the child’s caregiver(s) to share and address school problems

• Refer to community resources when a child shows signs of being unable to cope with traumatic stress

• Share Trauma Facts for Educators with other teachers and school personnel
There are students in your school who have experienced trauma.

Preschool
Ricky & Alexa

Elementary
Amy & John

Middle School
Joy & Trent

High School
Nicole & Daniel

What do these students have in common?
DEED eLearning
NEW -- Upcoming modules

Multi-Tiered Systems Framework
Trauma Informed Schools

- Overcoming ACEs in Alaskan Schools: Childhood Trauma and Its Impact on Learning

https://education.alaska.gov/ELearning/
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dhss.alaska.gov/abada/ace-ak/Pages/default.aspx
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