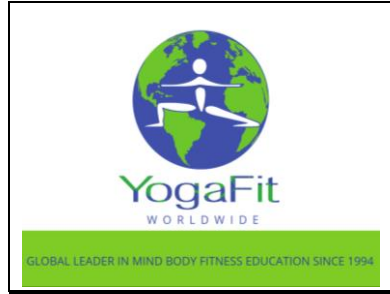
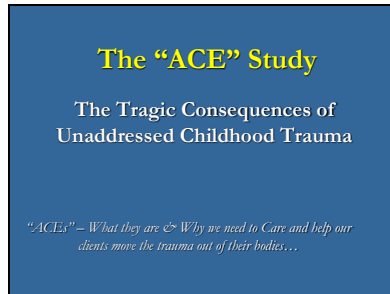


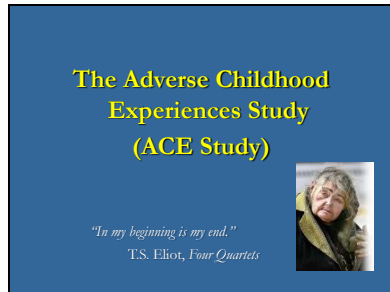
Slide 1




Slide 2



Slide 3



Slide 4




What is the Adverse Childhood Experiences (ACE) Study?

- CDC and Kaiser Permanente Collaboration
- Over decade long. 17,000 people involved.
- Looked at effects of adverse childhood experiences over the lifespan.
- Largest study ever done on this subject.

Slide 5

ACE Study Findings



- Childhood experiences are powerful determinants of who we become as adults

Slide 6

Adverse Childhood Experience ^a ACE: Categories... (Birnito 18)	Impact of Trauma and Health Risk Behaviors to Ease the Pain	Long-Term Consequences of Unaddressed Trauma (ACEs)
Abuse of Child <ul style="list-style-type: none">■ Emotional abuse■ Physical abuse■ Contact Sexual abuse	Neurobiologic Effects of Trauma <ul style="list-style-type: none">■ Disrupted neuro-development■ Difficulty controlling anger/rage■ Hallucinations■ Depression - other MH Disorders■ Panic reactions■ Anxiety■ Multiple (6+) somatic problems■ Sleep problems■ Impaired memory■ Flashbacks■ Dissociation	Disease and Disability <ul style="list-style-type: none">■ Ischemic heart disease■ Cancer■ Chronic lung disease■ Chronic emphysema■ Asthma■ Liver disease■ Skeletal fractures■ Poor self-rated health■ Sexually transmitted disease■ HIV/AIDS
Trauma in Child's Household Environment <ul style="list-style-type: none">■ Alcohol and/or Drug User■ Chronically depressed, emotionally disturbed or suicidal household member■ Mother treated identity■ Imprisoned household member■ Not raised by both biological parents■ Loss of parent - best by death unless suicide - Worst by abandonment	Health Risk Behaviors <ul style="list-style-type: none">■ Smoking■ Severe obesity■ Physical inactivity■ Suicide attempts■ Alcoholism■ Drug use■ 50+ sex partners■ Repetition of original trauma■ Self-harm■ Eating disorders■ Perpetrate interpersonal violence	Serious Social Problems <ul style="list-style-type: none">■ Homelessness■ Prostitution■ Delinquency, violence, criminal■ Inability to sustain employment■ Revictimization, rape, DV, bullying■ Compromised ability to parent■ Negative attributions in self perception and relationships with others■ Altered systems of meaning■ Inter-generational trauma■ Long-term use of multiple human service systems

^aAlvarez reports that ACEs are the "heavy end" of abuse. ¹⁸https://www.acestudy.org

Slide 7

HMO Members in ACE Study


- 80% White, including Hispanic
- 10% Black
- 10% Asian
- About 50% men, 50% women
- 74% had attended college
- 62% age 50 or older

Slide 8

Adverse Childhood Experiences are Common

Of the 17,000 HMO Members:

- 1 in 4 exposed to 2 categories of ACEs
- 1 in 16 was exposed to 4 categories.
- 22% were sexually abused as children.
- 66% of the women experienced abuse, violence or family strife in childhood.
- Women were 50% more likely than men to have experienced 5 or more ACEs



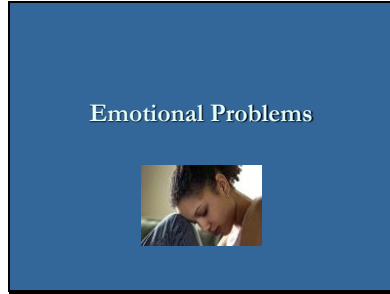
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The higher the ACE Score, the greater the likelihood of :

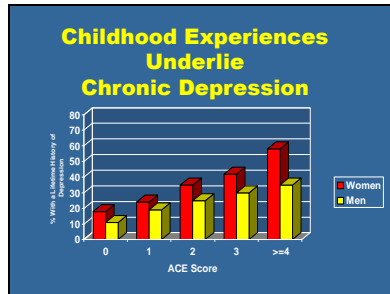
- Severe and persistent emotional problems
- Health risk behaviors
- Serious social problems
- Adult disease and disability
- High health, behavioral health, correctional and social service costs
- Poor life expectancy

For example:

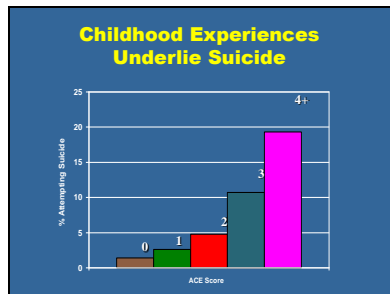
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Slide 13

- 2/3rd (67%) of all suicide attempts
- 64% of adult suicide attempts
- 80% of child/adolescent suicide attempts




Are Attributable to Childhood Adverse Experiences

Women are 3 times as likely as men to attempt suicide over the lifespan.

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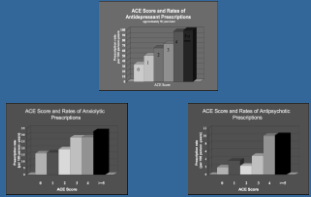
Childhood sexual abuse is strongest most independent risk factor for suicidality

- As many as 42% of girls are sexually abused before age 18
- 79.8% of American Indian Alaskan Native (AIAN) girls experience sexual abuse in early childhood.
- Young AIAN women are over 3 1/2 times more likely to commit suicide than females in the general population

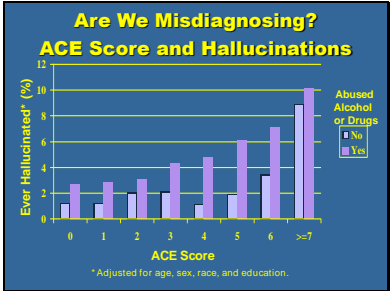


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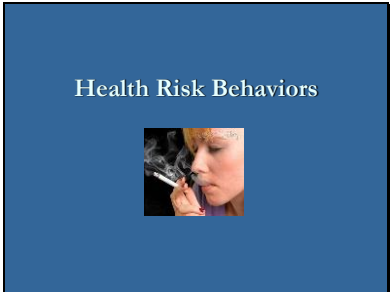
Childhood Experiences Underlie Serious and Persistent Mental Health Problems



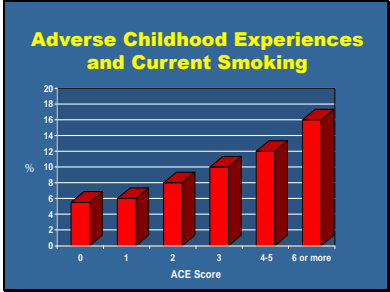
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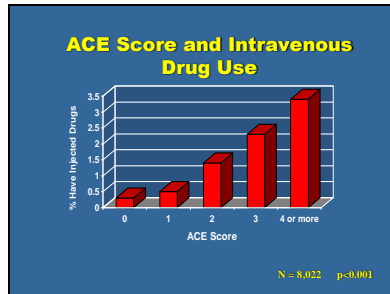
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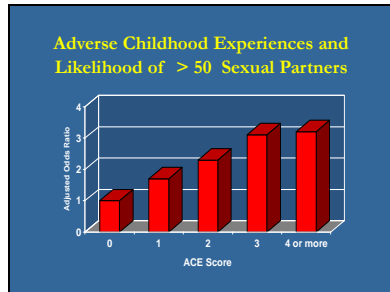
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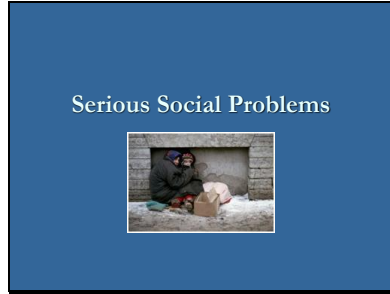
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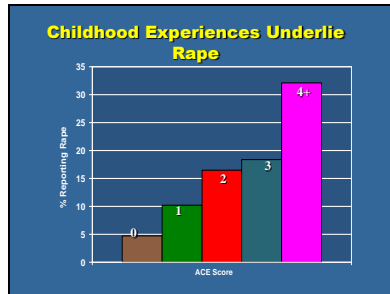
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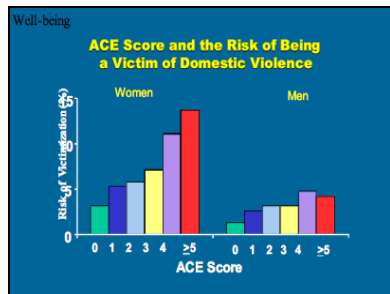
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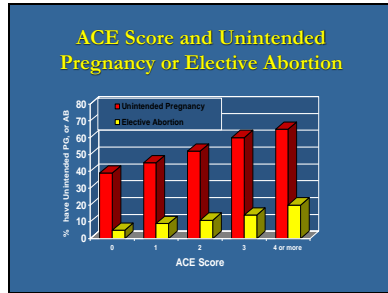
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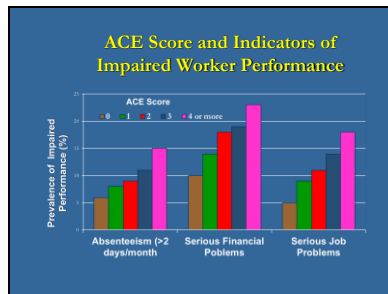
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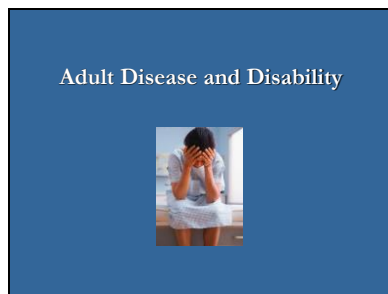
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Slide 27



Slide 28


Higher ACE Score = significant rise in chronic health conditions:

- Sexually Transmitted Disease
- Liver Disease
- COPD
- Ischemic Heart Disease
- Autoimmune Disease
- Lung Cancer

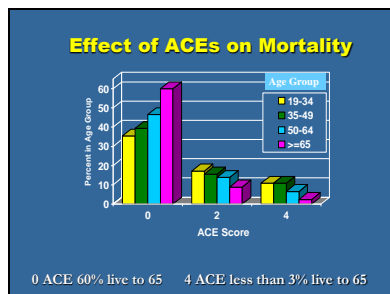


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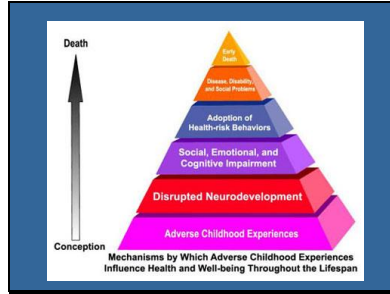
Poor Life Expectancy



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The financial burden to society of childhood abuse and trauma is staggering.

- **Annual Direct Costs:** Hospitalization, Mental Health Care System, Child Welfare Service System and Law Enforcement = \$33,101,302,133.00
- **Annual Indirect Costs:** Special Education, Juvenile Delinquency, Mental Health and Health Care, Adult Criminal Justice System, Lost productivity to Society = \$70,652,715,359.00
- **Total Annual Cost:** \$103,754,017,492.00 (Over \$184 million dollars a day)

Economic Impact Study - September, 2007, Prevent Child Abuse America

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"The solution of adult problems tomorrow depends in large measure upon the way our children grow up today."

Margaret Mead

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Sources

- **ACE Publications:** For comprehensive list see CDC ACE Study website: Publications on Major Findings By Health Outcomes: *This site was updated (March 1, 2010) and links to related articles on all subjects.*
<http://www.cdc.gov/nceed/hip/ACE/outcomes.htm>
- **The Damaging Consequences of Violence and Trauma:** See Trauma-Informed Resources: www.theAnnlInstitute.org
- **Documents and articles on women and trauma:** Presentation Bibliography in preparation. Available upon request: Ann Jennings, ajennings@anninstitute.org

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ACE Study slides are from:

- Robert F. Anda MD at the Center for Disease Control and Prevention (CDC)
- September 2003 Presentation by Vincent Felitti MD "Snowbird Conference" of the Child Trauma Treatment Network of the Intermountain West
- "The Relationship of Adverse Childhood Experiences to Adult Medical Disease, Psychiatric Disorders, and Sexual Behavior: Implications for Healthcare" Book Chapter for "The Hidden Epidemic: The Impact of Early Life Trauma on Health and Disease" Lanius & Vermeten, Ed)

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