ACElife: Research on the effects of adverse childhood experiences

EU-Promens 7.4.2025 Noora Ellonen



ACElife

Ensure equal opportunities for children with adverse childhood experiences

- To explore the impact of adverse childhood experiences on later life using high quality research designs.
- To provide welfare regions, municipalities and third sector actors effective and efficient tools to work for the safety and well-being of children across different sectors of government.
- Better implementation of child participation and children's rights in general, both in research and in the design of practical services.















ABUSE NEGLECT HOUSEHOLD DYSFUNCTION Mental Illness **Incarcerated Relative** Physical **Physical** Mother treated violently **Emotional Emotional** Substance Abuse Divorce

Centers for Disease Control and Prevention

Robert Wood Johnson Foundation

≥4 ACEs (compared to those, with no ACEs)

- 3-6 x risk for risky sexual behaviour, mental health problems and problems with alcohol.
- 7x risk for substance abuse and violent behaviour.

Mental health problems

- ACEs experiences when related to parents.
- Outcome when related to child

Hughes K, Bellis MA, Hardcastle KA, Sethi D, Butchart A, Mikton C, Jones L, Dunne MP. The effect of multiple adverse childhood experiences on health: a systematic review and meta-analysis. Lancet Public Health. 2017 Aug;2(8):e356-e366. doi: 10.1016/S2468-2667(17)30118-4. Epub 2017 Jul 31. PMID: 29253477





- Changes in health behaviour for example drugs
- Learning by seeing
- (Over)sensitivity to danger / hostile attribution bias
 - Threshold for aggression is getting low, social relationships are rare / selection of social connections.
- Toxic stress
- Changes in actioins of genes
- Epistemic mistrust: an inability to trust others as a source of knowledge about the world

Economic burden of ACEs is huge

- In Europe, annual costs of ACEs are evaluated to be several percents of GDP. (Hughes ym., 2021)
- In USA, costs for health services are evaluated to be 14.1 trillion USD annually. (Peterson ym., 2023)



Health and financial costs of adverse childhood experiences in 28 European countries: a systematic review and meta-analysis







Original Investigation | Public Healt

Economic Burden of Health Conditions Associated With Adverse Childhood Experiences Among US Adults

Cora Peterson, PhD; Maria V. Aslam, PhD; Phyllis H. Niolon, PhD; Sarah Bacon, PhD; Mark A. Bellis, PhD; James A. Mercy, PhD; Curtis Florence, PhD

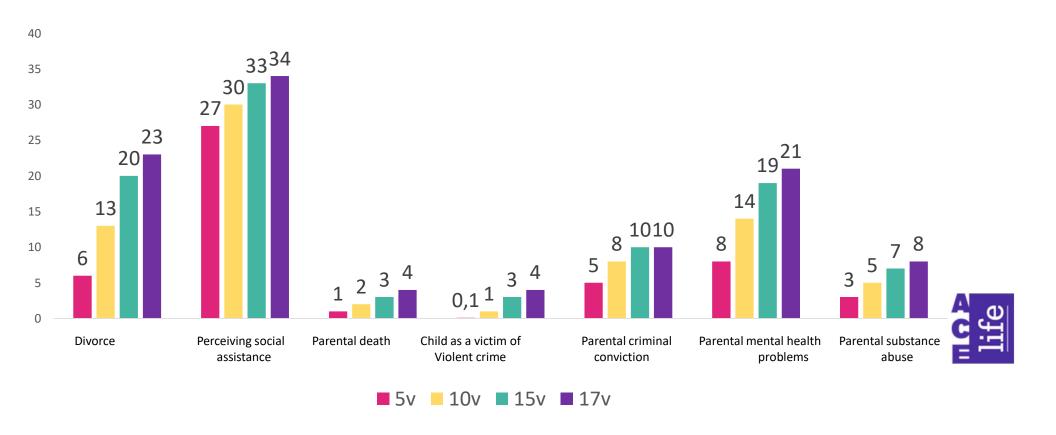
Associations between ACEs and variety of outcomes



Register data

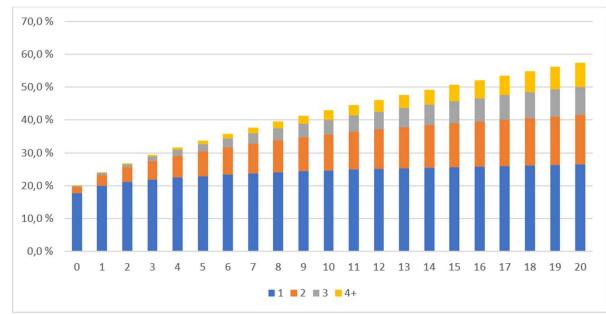
- Multicohort data representing the entire population of children born in Finland between 1987 and 2003 (n = 1,006,028), followed until the end of the year during which they turn 17.
- The dataset included annual sociodemographic information for each child and their biological parents.
- Socioeconomic and criminal history data were derived from administrative registers maintained by Statistics Finland.
- Health-related data were obtained from the Care Register for Health Care, maintained by the Finnish Institute for Health and Welfare and classified according to versions 9 and 10 of the International Classification of Diseases and Causes of Death.
- The data structure was created by linking records from the registers using pseudonymized personal identification numbers

Cumulative percentages of individual ACEs





Cumulation of ACEs (1-4+) according to age



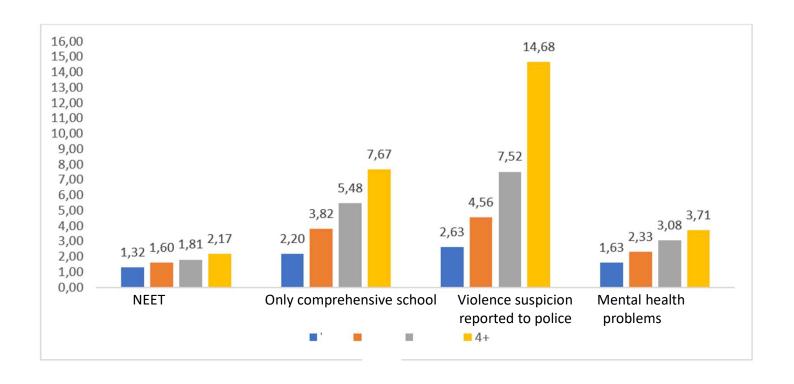
ACEs often seen together

Low socioeconomic position and violence (both; parental conviction of violent crime and child as a victim of violent crime)

Parental mental health problems, parental substanse abuse and parental self harm.

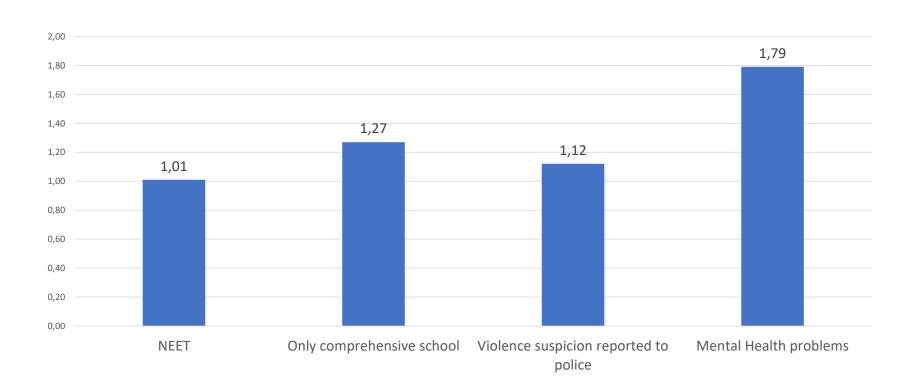


Association between 1-4+ ACEs and different outcomes (ORs)





Association between parental mental health problems and different outcomes (ORs)





Early-life adversities and youth offending patterns (analysis in a process)

- We explain different type of criminal behaviour with individual ACEs and cumulative ACEs.
- Idea is to see, if ACEs predict particular type of criminal behaviour. ->Generalists versus specialists
- ACEs predict all types of criminal behaviour
- Associations between parental mental health problems and different types of crimes are very weak. Association is found only to drug-related offences.



CHILDHOOD VICTIMISATION AND SUBSEQUENT INTERNALIZING AND EXTERNALIZING DISORDERS. A CO-SIBLING STUDY (study in process)



- Childhood physical and sexual victimization are well-known risk factors for a wide range of psychiatric disorders.
- There are several suggestions of what is an actual mechanism between these.
- Previous research has also shown that the association might be partly due to confounding.
- With sibling-models we can test this assumption.
- According to our analysis association between childhood victimization and psychiatric disorders is partly explained by shared characteristics between siblings (genes and/or family environment), but there is also independent effect between victimization and psychiatric disorders.
- Association is stronger in a case of sexual victimization compared to other type of physical victimization.



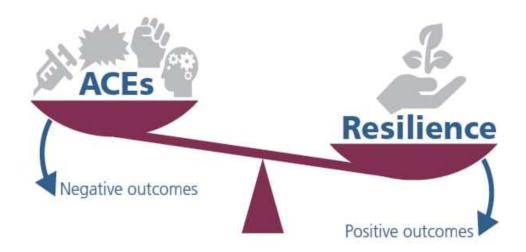
Child Abuse & Neglect

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A systematic review of positive childhood experiences and adult outcomes: Promotive and protective processes for resilience in the context of childhood adversity

Deborah Han ☒, Nathalie Dieujuste ☒, Jenalee R. Doom ☒, Angela J. Narayan 옸 ☒



Adapted from: Center on the Developing Child, Harvard University. See https://developingchild.harvard.edu/science/key-concepts/resilience/



Protective factors

- Supportive relationships
- Sense of mastery
- Ability to solve problems
- Self regulation
- Self-efficacy
- Hope and optimism
- Caring family
- Schools supporting childens participation
- Peer support
- · Sense of belonging







Thank you!

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