



How Toxic Stress Affects Brain Development in Homeless Children

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Experiencing homelessness during childhood greatly increases the risk of experiencing adverse childhood experiences (ACEs). For instance, 68.1% of adults who experienced homelessness reported encountering four or more ACEs, compared to 16.3% among adults who hadn't experience homelessness during childhood (Radcliffe et al. 811). Homeless children are at a greater risk for experiencing or witnessing a number of ACEs, such as domestic and verbal abuse, as well as physical and sexual violence. Additionally, experiencing ACEs increases adult health risks, such as cancer and early mortality, and also predicts the presence of mental illnesses such as depression, anxiety, and, in some extreme cases, PTSD (National Scientific Council on the Developing Child, 2014). Experiencing ACEs is also a predictor for homelessness later in life.

By the time a child turns 3 about 85% of their brain has already finished developing. In order for their brains to develop healthily, children require attentive and nurturing parents, a stable home environment, and access to good food and medical care. Children who experience trauma, such as homelessness, during this critical period of development poses a great risk to the child's neurological development. When an individual

experiences trauma, it activates a neurobiological response that serves to protect the person from danger (Carrion and Wong, 23). Although this response is meant to serve as a survival mechanism, chronic stress can trigger this neurobiological response to the point that it can lead to neural dysfunction which can ultimately hinder brain development (Carrion and Wong, 23).

Toxic stress occurs as a result of enduring and extreme stress and causes the stress response to be overactive. Particularly in children whose brains are still developing, chronic stress can cause the neurological stress response to become dysfunctional. In other words, the response becomes hypersensitive and difficult to deactivate once triggered (National Scientific Council on the Developing Child, 2014). During early childhood, the brain relies on interaction with the external world to facilitate learning and development. The brain is increasingly sensitive to experiences at this time, and exposure to trauma during this stage can permanently alter the way the brain functions for the rest of the individual's life. For example, when the neural response to emotions such as fear and anxiety is overproduced during a time of critical development as a result of constant stress, this causes the brain to overproduce neural connections in these regions. At the same time, the brain underproduces connections in the regions that control reasoning and behavioral control (National Scientific Council on the Developing Child, 2014).

As a result of the dysfunction of the stress response, the individual becomes more likely to sense or overestimate danger, even in situations when there may be none. At the same time, they are less equipped to deal with their stress productively because of the underdevelopment of reasoning and coping skills (National Scientific Council on the Developing Child, 2014). Therefore, many children who experience toxic stress will go on to develop mental disorders, such as anxiety, depression, substance abuse, and PTSD as a result of their trauma. Many of them also suffer physical illnesses as a result of their anxieties, such as cardiovascular disease, high blood pressure, diabetes, and strokes.

Works Cited

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