

Weathering, Human Milk Feeding, and the Epigenome: The Implications of Race, Equity, and Prenatal Nutrition and Breastfeeding

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For complete resources to help you dive into the topic of weathering and the epigenome, please visit the following link:

<http://motherjourney.com/bf-and-feminism.html>

Abstract:

Recent research on epigenetics, literally meaning above the gene, has led medical professionals to query about how the environment impacts the developing baby both in utero and throughout its lifetime. The genome is the genetic information inherited from one's parents, but the epigenome is what deciphers the genome for each cell throughout the body. This deciphering process is impacted by an individual's internal and external environment. The external environment can include nutrition, chemicals, toxins, etc. The internal environment would include neuropeptides (emotional molecules) and stress hormones. The environment changes the proteins in the body that help the epigenome translate DNA. This finding has increased awareness of the importance of nutrition on the epigenome. Studies now are finding that the changes in the epigenome can influence not only that individual but can be passed along to future progeny, sometimes multiple generations out. The first nutrition for a human outside the womb is breastmilk, and thus its epigenetic impact is particularly expansive. New research has expanded the field of epigenetics to include breastmilk and how it potentially changes the epigenome to affect the lifelong health of a baby. When one contemplates how the impact of racism and weathering has played into human epigenetic history, the true impact of the need for equity is realized.

Objectives:

- List two specific epigenetic risks of weathering due to racism and social inequity.
- Identify one way that prenatal nutrition can impact long term health of baby through epigenetic actions.
- Identify one way that human milk can impact long-term health of baby through epigenetic actions.

Notes from Presentation:

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