

Epigenetics: A Novel Reason for Perpetual Kindness

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Most of us recognize that kindness goes a long way, but did you know that kindness may affect us on a genetic level? Research is providing evidence that a variety of circumstances such as sleep, exercise, diet, toxins and stressors can affect the expression of our genes.

Epigenetics is a relatively new science that describes how our genes are expressed without changing the sequence of our DNA. Epigenetic modification in genes occurs by a process known as methylation, and is shown to be related to various illnesses including cancer. Cutting edge science is now looking at the role epigenetics plays in mental illness. Studies are indicating that mental health issues are not inherited based on mendelian genetic, like the color of our eyes. For example, studies of identical twins indicate if one twin develops depression, the other twin may not.

Consider our genes analogous to sheet music. The notes are DNA, but how the music is interpreted and played by the musician is epigenetics-turning methylation on and off. Trauma including physical, sexual and emotional assault, bullying, poverty, neglect, illness, natural disasters, accidents,

parental death and divorce can influence how our genes are expressed. Likewise, positive experiences such as a nurturing childhood influence our genes in a healthy way.

Recent studies are indicating that undesirable epigenetic changes can be inherited, implying that experiences of previous generations can affect children born in the current generation as well as their descendants. Childhood trauma particularly affects long term outcome for a variety of adult illness as the developing brain, rather than the adult brain, appears to be most sensitive to epigenetic changes.

Hence, epigenetic science is providing evidence that our human experiences, especially those of our children, play a future role in genetic makeup. As such, we have the power to lessen human suffering and illness in each other's lives by perpetuating kindness. In turn, hurtful, abusive behavior inflicted on others has the potential to be long lasting, even into the next generation. In society, human interaction based on love, warmth, and respect is morally and spiritually encouraged, but now scientific evidence exist that our future genes and healthy existence depends on us to being more "humane" to each other.