

## Book Review

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# Are Alzheimer's Disease and Aging Evolutionary?

The Origin of Everything, by D.B. Kelley, 345 p, ISBN 978-0-9854625-1-2

<http://www.universalselection.com/Origin-of-Everything.html>

What does evolution have to do with Alzheimer's disease? Prevailing views of Alzheimer's disease and aging are that post-reproductive life is on autopilot, genes having already moved on to the next generation. So half our life is then directed by genes of youth, in keeping with the common, but incorrect, view that people lived only half as long just a century ago. So are aging and Alzheimer's disease left to chance?

Kelley's book brings these concepts to the natural world in all scales—atoms to chemicals, mountains to galaxies—by demonstrating that the properties Darwin observed for life's evolution transform the natural world to a more stable state due to survival of the fittest systems, or the preservation of stable phenomena, biological and non-biological. Fundamentally, the entire natural world is in competition between various forms, and evolution works to retain those that are most stable at any given point. Existence is a

balance between staying where you are and potential for transformation. Absolute stability blocks transformation and leads to its own failure to adapt. This dynamic supports the spectrum of life forms from differentiated euryakotes to individual molecules. Could aging then be the change we experience as we balance stability and adaptation, and could lifespan *per se* be the result? Indeed, altering lifespan in either direction would require a transformation of stability and adaptability. In our own species, increasing lifespan would increase human population if generation time was maintained, transforming population dynamics. The same can be said for atoms, molecules, large-scale systems, and more. Kelley's thesis embraces the changes of aging as creating greater stability, and raises the possibility of lifespan and age-related decrement as being actively selected, and for aging, senescence, and death, as integral to the processes.

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