Contribution of Familial Longevity to Living to 100

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Abstract

One of the most glaring deficiencies in the current assessment of mortality risk is the lack of information
concerning the impact of familial longevity. In this work, we update estimates of sibling relative risk of
living to extreme ages using data from more than 1,700 sibships, and we begin to examine the trend for
heritability for different birth-year cohorts. We also build a network model that can be used to compute
the increased chance for exceptional longevity of a subject, conditional on his family history of longevity.
The network includes familial longevity from three generations and can be used to understand the effects
of paternal and maternal longevity on an individual's chance to live to an extreme age.