The heritability of life-history strategy

The heritability of life history strategy: The k-factor, covitality, and personality

Archival data from the MIDUS survey (Brim et al., 2000), a nationally representative sample, on 309 MZ and 333 DZ twin pairs aged 25-74 years were used to test the psychometrics and behavioral genetics of life history strategy. We organized 253 of the originally administered 2,000 questions into 30 scales measuring life history traits (e.g., quality of family relationships and altruism towards kin), medical symptoms (e.g., thyroid problems), personality traits (e.g., neuroticism, extraversion, conscientiousness), and social background (e.g., financial security). A single higher-order factor, indicating a general life history strategy, composed of three lower-order factors, was replicated. Factor analyses were then performed on the genetic variance-covariance matrices. We found that (a) a single higherorder factor explained the preponderance of the genetic correlations among the scales and (b) this higher-order factor was itself 68 percent heritable and accounted for 82 percent of the genetic variance among the three component lower-order factors.