

Aging and Alzheimer's Disease: Intriguing Findings from the Nun Study

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Nun Study web page

Complete abstracts of all publications from the Nun Study, and other information about the study can be found at the Nun Study web page: www.nunstudy.org

Synopsis of Presentation

This presentation will focus on recent findings from the Nun Study, a longitudinal study on aging and Alzheimer's disease in 678 Catholic sisters. These participants were 75 to 102 years old at the beginning of the study in 1990. These sisters have the same reproductive and marital histories; have similar social activities and support; did not smoke, or drink excessive amounts of alcoholic beverages; and have similar occupations, income, and socioeconomic status. While it may be difficult to generalize from this unique population of Catholic sisters, many factors that confound most epidemiologic studies have been eliminated or minimized.

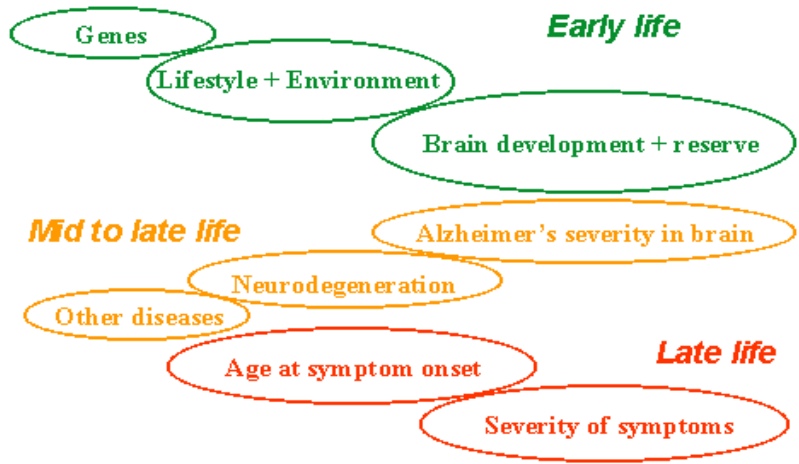
There are three basic sources of information available in the Nun Study. First, convent archives provide a wealth of information about potential early, mid, and late life risk factors for Alzheimer's disease and other disabling conditions. Second, annual exams of each participant document changes in their mental and physical function during the last years of their lives. Finally, because each of the sisters agreed to brain donation at death, the information garnered from the convent archives and annual exams are compared to the structure and pathology of the brain.

Overall, the Nun Study provides a unique model or view of aging and disease. So far the study's findings suggest that Alzheimer's is a consequence of a long chain of events spanning the life course. For example, early life autobiographies from the convent archives have been used to show a strong relationship between low linguistic ability in early life and a high risk of Alzheimer's disease in late life (Snowdon DA, et al. *Journal of the American Medical Association*, 275(7):528-532, 1996). Other findings from the Nun Study suggest that late life events, like stroke, can increase the risk of Alzheimer's disease and increase the severity of its symptoms (Snowdon DA, et al. *Journal of the American Medical Association*, 277(10):813-817, 1997).

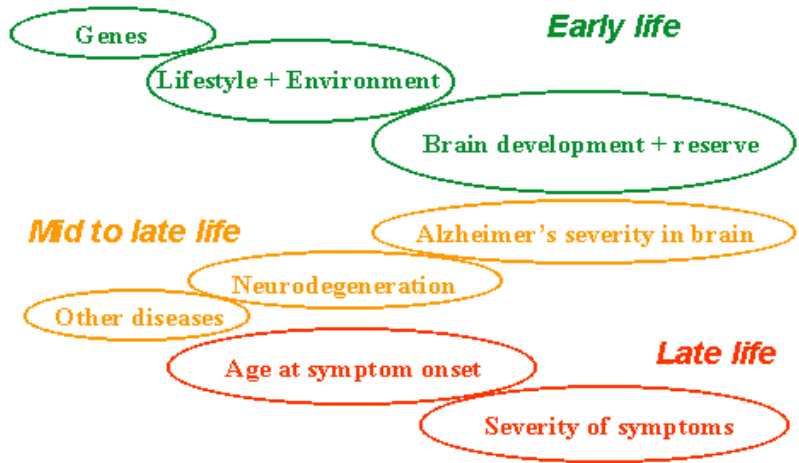
Objectives of Presentation

Upon completion of this presentation, participants will be able to:

1. Discuss how disease and disability is a consequence of a long chain of events, and how both can be reduced by focusing intervention programs on malleable links in the chain.
2. Describe how early life factors, like brain and language development in adolescence, may play an important role in determining a person's susceptibility to Alzheimer's.
3. List how late life events, like stroke, can increase the risk of Alzheimer's and the severity of its symptoms.



A chain of events leads to disability and death



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