

PRODROMAL COGNITIVE SIGNS OF DEMENTIA

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- I. Sacuiu S, Sjogren M, Johansson B, Gustafson D and Skoog I. ***Prodromal cognitive signs of dementia in 85-year-olds using four sources of information.*** Neurology (2005);65:1894-1900
- II. Sacuiu S, Gustafson D, Johansson B, Thorvaldsson V, Berg S, Sjogren M, Guo X, Östling S, Skoog I. ***The pattern of cognitive symptoms predicts time to dementia onset.*** Alzheimer's & Dementia: The Journal of the Alzheimer's Association (In press)
- III. Sacuiu S, Gustafson D, Sjogren M, Guo X, Östling S, Johansson B, and Skoog I. ***Secular trends in cognitive performance in relation to prediction of dementia.*** (Submitted)
- IV. Thorvaldsson V, Hofer SM, Berg S, Skoog I, Sacuiu S, Johansson B. ***Onset of terminal decline in cognitive abilities in individuals without dementia.*** Neurology (2008);71:882-887

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RESULTS FROM THE H70 STUDY

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We set out four studies to clarify which are the symptom patterns that predict dementia onset in the short and in the long-term, at different ages and in different birth cohorts, and also to clarify if cognitive decline in late life is related to mortality in the absence of dementia.

In summary, we found that although low performance in memory was necessary to predict dementia, it was not sufficient. Other cognitive domains needed to be affected shortly of dementia onset. Isolated low memory performance predicted dementia only on a longer time frame. In addition, not only Alzheimer's, but also vascular dementia appeared to have a short prodromal stage, with low performance in all four cognitive domains studied. Relying on self-reports or key informants for early detection of dementia excluded a large group of the population at risk. A global pattern of low cognitive performance according to both psychiatric and psychometric examinations predicted short-term development of dementia with a high positive predictive value. However, the sensitivity for dementia was low. Mortality was also related to declining cognitive performance in the absence of dementia.

Furthermore, non-memory cognitive symptoms predicted short-term development of dementia in 70-year-olds born 1901-02, but not in those born 30 years later. Only low memory performance according to the psychiatric examination predicted short-term onset of dementia in the later born cohort.

Our findings are important for understanding the clinical history of the disease and may have implications regarding prediction of dementia in elderly individuals.

Key-words: cognitive function, mild cognitive impairment, prediction of dementia, Alzheimer's disease, vascular dementia, population study, birth cohort trends, terminal decline

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