

Reviewer's report

Title: Age at disability onset and self-reported health status

Version: 2 **Date:** 12 September 2007

Reviewer: Denis Evans

Reviewer's report:

In the revision, responses to the points raised in the original review are of mixed quality. Four concerns were raised, two major and two minor.

The first major problem was "That the manuscript is fundamentally concerned with the onset of disability is strongly emphasized throughout the manuscript from the Title to the Abstract and throughout the text. A major challenge in addressing this concept, however, is that the data available are not longitudinal, but cross-sectional....."

This problem is acknowledged, but not adequately addressed. The manuscript continues to express the tone of a longitudinal analysis in all sections. The Discussion Section does not mention the severe limitations on the quality of inferences that can be made from these data. The degree of confidence expressed in the findings is much too strong for the design used and data available. An overly confident tone risks severely misleading your readers. Terms and expressions appropriate to a longitudinal, not a cross-sectional, analysis should be removed from all sections of a paper and the Discussion Section should prominently (in the first paragraph, perhaps) explicitly and clearly acknowledge the limitations of these data in addressing the issues of interest in the manuscript. I do not think the use of the phrase "retrospective cohort" clarifies these issues.

The second major problem was: "The way in which the onset of disability is conceptualized and then inferred from cross-sectional data needs to be addressed much more directly, the measures for doing so need to be specified clearly, and the validity of these measures defended. Otherwise, the concept of onset of disability should be deleted from the manuscript, which would result in a fundamental change in the issues it addresses and its meaning."

The measure of disability onset is now adequately specified. Its validity is not well defended, but overall I think the response to this issue is satisfactory.

The first minor problem was briefly describing "participation in random-digit-dialing" that was used to recruit the study subjects. The added sentences about random digit dialing have nothing to do with participation. It would be useful to supply this information about participation or clearly state that participation cannot be estimated and discuss the consequent limitations to study findings prominently in the Discussion Section.

The second minor problem about the heading of Table 2 is adequately addressed in the revision.