Reviewer's report

Title: Education level and physical functional limitations among Japanese community residents - gender difference in prognosis from stroke: a cross sectional study

Version: 2 Date: 30 October 2008

Reviewer: Marian Brady

Reviewer's report:

Major Compulsory Revisions

The authors report the analysis of a very large data set to examine the relationship between educational level and functional limitations following stroke amongst a Japanese community based population. While the question posed by the authors is well defined, the question itself does not seem to be a valid one. Even once I was familiar with the full article I was still unclear why the authors felt it was an important question to ask in the first place.

The authors in their review of the literature and work to date on this topic, acknowledge the role of low socioeconomic status and its links to a range of post stroke profiles including severity of stroke, dependency and long term disability. (Incidentally, this group have also been shown to have higher rates of vascular event readmissions and Scottish data also suggests access to specialised stroke care in the form of CT scans, specialist stroke units and physicians differs between socio-economic groups. The same data set also indicates that during intensive rehabilitation, people from deprived areas are less likely to attend for follow-up appointments and six months after the onset of stroke they are more likely to be dead or dependent. Reduced access or compliance with rehabilitation in the community has also been suggested.)

How this relates to time spent in education is never made clear though I assume that the authors are suggesting that time in education is linked to socioeconomic status? The authors need to make this much clearer but even then can they justify use of time in education as a good indictor of socioeconomic status?

Similarly, the methods are well described but suffer from the fundamental problem outlined above. In addition, the numbers reported vary across the text and tables – for example total n is variously reported or adds up as 29135 (Table 4 and pg 3), 29134 (table 2 and page 6) or 29133 (table 3). These numbers should be rechecked and amended appropriately.

Given the main issue highlighted above, the discussion and conclusion need to be similarly adjusted to reflect this issue in relation to time in education and socio-economic status.

Minor Essential Revisions

Some minor typos noted – for example Abstruct rather than Abstract.
Discretionary Revisions

**Level of interest:** An article of limited interest

**Quality of written English:** Needs some language corrections before being published

**Statistical review:** No, the manuscript does not need to be seen by a statistician.

**Declaration of competing interests:**

I declare that I have no competing interests