Reviewer's report

Title: Falls and fall risk-increasing drugs: A cross-sectional study among elderly patients in primary care

Version: 1 Date: 27 September 2013

Reviewer: Allen Huang

Reviewer's report:

Major revisions:
1. Background section needs to be improved. The authors muddle references from different countries into the text. I think the message is to highlight the problem of drug-related falls in Sweden. They should clearly state this and that the global literature already shows varying evidence. Ref 5 (Canada), Ref 6 (Finland), Ref 7 (US).
2. Background: The authors should clearly state the objectives of their study.
3. Methods: Please supply demographic information so comparisons of the study can be done. What is the population of the province of Skane? What is the age distribution? Denominator of people older than 75-years? What is the multi-dose drug dispensing system? How does it work? Why was it chosen to be studied? Why were both people living in the community and those in nursing homes included? These populations have different falls risks. Please include the PHASE-20 question items, perhaps in an Appendix. Over what time period were the data collected?
4. Methods: the entire description of the randomized control trial background does not seem relevant, since the data used was taken before allocation into the cohorts.
5. Data collection: Please define "mild" falls and "severe" falls. Were the number of FRIDs unique by ATC? If more than one pill size was used to build a desired dose did it count as 2 drugs? (eg. 20mg tab + 10mg tab).
6. Results: Please include the total number studies in the main text. Although n=369 is included in Table 2 it makes it easier to follow if the number is explicitly indicated. A majority lived in nursing homes - it is better to also indicate the percentage (76%) alongside for clarity. The results section is muddled with data coming from different sources. Patients symptoms are from the PHASE-20 questionnaire. Did all 369 patients have complete data from all sources?
7. Discussion: statistical methods chosen do not generate odds ratios, which would be more comparable to other studies. Suggest the authors repeat the analysis separating out community-dwelling patients from those living in nursing homes. Again without describing the denominator population in the methods it is difficult to assess the generalizability of the results. Authors report that antidepressants & anxiolytics were the most frequently used FRIDs but there is no table showing the frequency analysis of all FRIDs in the study.
Minor revisions:
1. Background: para 3, sentence 5: "medications are a SIGNIFICANT risk factor" instead of VITAL. Sentence 6: please fix the English.

**Level of interest:** An article whose findings are important to those with closely related research interests

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

**Statistical review:** Yes, and I have assessed the statistics in my report.

**Declaration of competing interests:**

I declare that I have no competing interests.