Reviewer's report

Title: Pain, not chronic disease, is associated with the recurrence of depressive and anxiety disorders

Version: 1 Date: 5 March 2014

Reviewer: Weng Yee Chin

Reviewer's report:

This is an interesting analysis of a large, 4-year longitudinal cohort study on subjects derived from the general Dutch population, primary care, and various mental health providers. The investigators should be commended on the follow-up duration of the cohort, as there are very few longitudinal studies which are long enough to be able to examine the factors affecting relapse.

- Major Compulsory Revisions
  None

- Minor Essential Revisions
  1. Although the association between the presence of chronic pain and relapse of depression is clearly identified, it is not clear whether the findings show that the sub-threshold depression is mediating the chronic pain or if the chronic pain mediates the depression relapse. The concepts may be easier to comprehend if there was a diagrammatic representation on the associations between pain and relapse found in the analysis.

  2. I also wonder whether there is any effect of treatment and whether use of psychotropic medications or analgesics need to be controlled as potential confounders. A comment should be added about how the use of medication may or may not affect findings.

- Discretionary Revisions
  Best to use 'Chronic Pain Grade' in Table 3 (instead of CPG)

  1. Is the question posed by the authors well defined? Yes – the research question is well identified

  2. Are the methods appropriate and well described? Yes – this was an analysis of a cohort study data using a mediator analysis modelling and regression analysis to identify associations between multi-morbidity, pain and recurrence of anxiety and/ or depression

  3. Are the data sound? Yes- this was a sub-analysis of a larger data set collected for a larger study

  4. Does the manuscript adhere to the relevant standards for reporting and data deposition? Yes
5. Are the discussion and conclusions well balanced and adequately supported by the data? Yes

6. Are limitations of the work clearly stated? – Yes. The sample were a young and reasonably healthy cohort, and the findings may not be applicable to many clinical settings where patients are more likely to be elderly and have more co-morbidity

7. Do the authors clearly acknowledge any work upon which they are building, both published and unpublished? – Yes. This is clearly another output from the NESDA study

8. Do the title and abstract accurately convey what has been found? Yes the title and abstract are consistent with the study’s findings

9. Is the writing acceptable? Yes - the writing is easy to understand

**Level of interest:** An article of importance in its field

**Quality of written English:** Acceptable

**Statistical review:** Yes, but I do not feel adequately qualified to assess the statistics.

**Declaration of competing interests:**

I declare that I have no competing interests