Reviewer’s report

Title: Protocol for a Systematic Review of Prognostic Models for Recurrent Events in Chronic Conditions

Version: 0 Date: 21 Oct 2019

Reviewer: Joie Ensor

Reviewer's report:

This protocol summarises the authors proposed methodology for a review of existing methods for prognostic modelling of recurrent events. Best practice for systematic reviews is followed, with appropriate checklists, quality appraisal tools and guidelines to be used. The search strategy seems suitable, though I am not an expert. I wonder if the authors might consult an information specialist regarding their search strategy, and if they have considered the use of prognosis filters (e.g. Geersing). Further, are there other terms that may have been used to describe recurrent event studies, for example the authors refer to chronic conditions throughout (though I realise this may explode the number of hits).

My only other query is the value in the secondary objective. The current wording suggests that models identified will be evaluated in terms of their performance and how accurately the model predicts recurrence of disease. This seems relevant perhaps for specific conditions where a model may be used, but does not allow for a comparison of recurrent event models with standard survival methods, which is perhaps of more interest methodologically. This may be a misunderstanding due to wording. Quantitative synthesis is not considered, but I believe this is justified given the potential heterogeneity in results (models from various conditions for example).

I think this is a timely and valuable systematic review, and look forward to the results!

Level of interest

Please indicate how interesting you found the manuscript:

An article of importance in its field
Quality of written English
Please indicate the quality of language in the manuscript:

Acceptable

Declaration of competing interests
Please complete a declaration of competing interests, considering the following questions:

1. Have you in the past five years received reimbursements, fees, funding, or salary from an organisation that may in any way gain or lose financially from the publication of this manuscript, either now or in the future?

2. Do you hold any stocks or shares in an organisation that may in any way gain or lose financially from the publication of this manuscript, either now or in the future?

3. Do you hold or are you currently applying for any patents relating to the content of the manuscript?

4. Have you received reimbursements, fees, funding, or salary from an organization that holds or has applied for patents relating to the content of the manuscript?

5. Do you have any other financial competing interests?

6. Do you have any non-financial competing interests in relation to this paper?

If you can answer no to all of the above, write 'I declare that I have no competing interests' below. If your reply is yes to any, please give details below.

I declare that I have no competing interests

I agree to the open peer review policy of the journal. I understand that my name will be included on my report to the authors and, if the manuscript is accepted for publication, my named report including any attachments I upload will be posted on the website along with the authors' responses. I agree for my report to be made available under an Open Access Creative Commons CC-BY license (http://creativecommons.org/licenses/by/4.0/). I understand that any comments which I do not wish to be included in my named report can be included as confidential comments to the editors, which will not be published.

I agree to the open peer review policy of the journal