Reviewer’s report

Title: Exploring laypeople’s epistemic beliefs about medicine - a factor-analytic survey study

Version: 1 Date: 18 March 2012

Reviewer: Rohit Ramaswamy

Reviewer’s report:

The paper is an important and relevant contribution to helping doctors understand how to communicate better with patients. My primary comment is that because it is a paper submitted to a public health journal, the authors need to explain some of the concepts in more detail that may not be immediately clear to public health professionals. Here are my specific comments:

1) The second paragraph on page 4 where the authors discuss the "apprehension structure" of epistemic beliefs - elaboration on what exactly this means would be helpful.

2) Page 5 last para "exemplarily study" is not correct English

3) It would be helpful to describe the study on the top of page 6 in more detail. How were less advanced, moderate and more advanced epistemic understanding defined and measured?

4) On page 8, where the authors describe the selection of some dimensions from EBAPS, it would be helpful to have greater elaboration on what dimensions they selected and why. Similarly, some additional description of the Global Certainty Scale is needed. This overall section that discusses the creation of the items requires more explanation. Why did the authors select these?

5) Data on demographics and other sub-group characteristics were collected but no analysis is reported. Were there any differences?

5) On page 13, when the authors talk about the fact that EBAM dimensions are similar to those of other instruments, some elaboration would be useful. Are there some significant differences that are of interest in EBAM? Are there factors that other instruments have that EBAM does not? Ultimately, the objective of the instrument is to help doctors communicate with their patients. Understanding how medicine-related epistemic beliefs is different from other discipline specific beliefs would be useful.

6) The conclusion section repeats some of what was presented in the background. I think this section would be stronger if the authors discussed how this instrument might be used by doctors and public health professionals and what additional research would be needed to make it usable. For example, the authors mentioned earlier the correlation between the level of advancement of
epistemic understanding and epistemic beliefs - how would this apply to the medical discipline? What additional analysis would make this instrument a practical tool for the medical profession?

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

**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