Reviewer’s report

Title: Implementation of a large-scale simulation-based cardiovascular clinical examination course for undergraduate medical students – a pilot study

Version: 0 Date: 01 Jul 2019

Reviewer: Daisuke Son

Reviewer's report:

Thank you for submitting an interesting study. This is a research implementing and evaluating large-scale simulation-based cardiovascular semiology course without control.

Please consider revising the points below.

(Major points)

1. In background section, research question is not clear. If it's only "large-scale implementations were seldom reported", why such large-scale simulation is difficult to implement? What factors are barriers? Large-scale simulation platform is hardly available? Mannequin quality? The effectiveness is hampered easily with big-size group? Student-teacher interaction?

2. Kirkpatrick level 1 (satisfaction) evaluation is usually not acceptable with high-quality original research. Why authors did not conduct level 2 assessment? Please explain it. If it's only level 1 evaluation, learning effect of this course is not validated. I recommend to add "---: a pilot study" at the end of the title.

3. In background (Page 5, Line 109), how many mannequins were used? We assume 16 mannequins for 16 simulation rooms. If authors replaced all mannequins next year, it must be very expensive. How these costs were covered?

4. In discussion (Page 11, Line 249), authors assume the high satisfaction was largely due to student-education interaction in a small-group. Please provide evidence for that (from the score or from description from the questionnaire). And how about that previously (bed-side teaching semiology)? Was it also small-group teaching?
(Minor Points)

1. "Semiology course" is not understandable in English-speaking countries. "Diagnostics course" would be appropriate and easy to understand.

2. Page 5, Line 95, "1h15" is "1h15m"?

3. Please provide reference number of ethical approval (Declarations section, Page 14).

Are the methods appropriate and well described?
If not, please specify what is required in your comments to the authors.

Yes

Does the work include the necessary controls?
If not, please specify which controls are required in your comments to the authors.

No

Are the conclusions drawn adequately supported by the data shown?
If not, please explain in your comments to the authors.

Yes

Are you able to assess any statistics in the manuscript or would you recommend an additional statistical review?
If an additional statistical review is recommended, please specify what aspects require further assessment in your comments to the editors.

I am able to assess the statistics

Quality of written English
Please indicate the quality of language in the manuscript:

Needs some language corrections before being published

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