Reviewer’s report

Title: A youth-led social marketing intervention to encourage healthy lifestyles, the EYTO (European Youth Tackling Obesity) project: A cluster randomised controlled trial in Catalonia, Spain.

Version: 3 Date: 14 May 2015
Reviewer: Andrew Springer

Reviewer’s report:

This paper “…describes the “Som la Pera” intervention Spanish study that is part of the EYTO [European Youth Tackling Obesity] project.” Overall, the authors have been very responsive to my previous critiques, and the paper continues to be enhanced. Strengths of the paper include an innovative approach for involving youth in obesity prevention via social marketing as well as a thoughtful approach for applying social marketing criteria to youth-led obesity intervention. These strengths notwithstanding, I continue to have concerns with the paper in its current form. Among my main concerns is the writing style and flow of the paper, which is difficult to follow at times, as well as the issues noted below:

Major & Minor Revisions:

1. P. 6, lines 139-142: The authors cite only two examples of factors that may influence healthy eating (availability, quality and pricing) and physical activity (access to sports grounds and green spaces). These factors are limited in terms of the broader body of evidence on interventions aimed at preventing childhood obesity and increasing healthy eating and physical activity. Furthermore, both studies cited appear to be based on cross-sectional analyses, thus precluding inferences about causality. I recommend that the authors conduct a more thorough review of successful intervention strategies for preventing obesity or promoting physical activity and healthy eating, given the numerous review papers that have been conducted on these topics.

2. P. 7, line 152: “In recent work…” please cite what work authors are referring to.

3. P. 7, line 173. I recommend inserting “For example”, to connect the “some studies” sentence with the subsequent sentence on the evidence.

4. P. 8: “The…EYTO project looks to contribute integrative descriptions of interventions to tackle obesity…” it would appear that the authors' goal is more than just describing interventions, but testing intervention strategies around social marketing. Furthermore, it is not clear what “integrative” means in this context. I recommend fine-tuning.

5. The aim of the paper is not presented until the methods section on p.9. I recommend moving the study aim/purpose statement of the paper to prior to the methods, in the last paragraph of the introduction.

6. P. 9: the specific study design of the “Som la pera” intervention is not explicitly stated in this section.
7. Pp10-11: The authors describe five phases of the project, which are a mixture of intervention and evaluation content. On p.12, the authors continue to describe the intervention, and then on pp.13 & 14, the primary and secondary outcomes of the study are described along with the statistical analysis plan. I recommend beginning with a clearly described intervention approach, and then following with the evaluation approach. For the evaluation, I would also recommend reducing the text on the statistical analyses, measures, etc. as that information is more pertinent for the main outcomes paper. For this paper, I recommend that the focus be clearly on the intervention description, the theory behind the intervention, the empirical evidence that supports the intervention and/or points out the gap in evidence.

8. P.10: As cited in my previous review, I am still not clear why physicians led the implementation of the study, including recruitment, and why they were in charge of “…designing, performing, and evaluating the self-reported behavior aspects of the study”? Were these physicians trained in behavioral science or program planning or evaluation? This seems analogous to stating that behavioral scientists oversaw heart surgery.

9. P.11: Similarly, the authors state that nutritionists also led the high-school recruitment (in addition to the physicians?) and that they “…contribute to evaluating the primary and secondary outcomes through the questionnaire.” This section is still not clear to me. Did the nutritionists do a literature review and identify the self-administered behavioral measures? Or did they conduct anthropometric measures of students? Further clarity is needed.

10. P.11: “Publicists and journalists were responsible for the communication training of the 5 ACCs. They led the global communication campaign of the “Som la Pera” Spanish intervention. This is confusing to this reviewer. My understanding was that the youth led the intervention. Did these professionals, then, help disseminate the messages that the youth developed? Also, why did they lead a global communication campaign if the focus was on two Spanish intervention schools?

11. P.15: The discussion still merits further fine-tuning. As an example, the study purpose is repeated twice (at the beginning of the discussion and in the third paragraph).

Edits
• p.4, line 84. I recommend separating these two sentences. E.g. “This paper describes…”
• p.4, line 87: “In Spain, the research team decided perform[ed]…”
• p.4, lin 92: “…(ACCs) [insert comma], …”
• p.12: “The ACCs chose” (past tense)
• p.13: “….intervention and assessment [are] presented in Table 4’.

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: No, the manuscript does not need to be seen by a statistician.

Declaration of competing interests:

'I declare that I have no competing interests'