Reviewer's report

Title: The Effect of Educational Intervention Program on Promoting Preventive Behaviors of Urinary Tract Infection in girls: A Randomized Controlled Trial

Version: 0 Date: 24 Dec 2019

Reviewer: Hyunmi Kang

Reviewer's report:

This is a very interesting, well carried out study on the effect of intervention in promoting changes in behaviors of mothers that are related to a higher risk of UTI, in order to ultimately prevent urinary tract infections in their daughters. The primary endpoint of this randomized controlled trial was to see whether the impact of Theory Planned Behavior (TPB) based education was effective in changing the behaviors of mothers over the mothers who received routine education.

Minor Revisions needed:

1. Abstract line 12: change girl to daughter

2. Abstract line 18: "included50 participants" -&gt; "included 50 participants"

3. Abstract line 23: "posttest"-&gt;post-test (needs changes in the manuscript as well). Or, change pre-test to pretest.

4. Abstract line 33: )p&lt;0/001) -&gt; p=0.001

5. Methods (Study Design): line 17 to 19: "The criteria for entering the study were mothers....child dose not have an UTI". This statement is not clear. I do not understand what this means.
6. Methods (Statistical methods): SPSS 23 (SPSS, Inc., Chicago IL) or in the format the journal requires.

7. Results: The study design included children below 2 years old, but the average age is in years. Do the authors mean months? i.e. 13.6 +/- 6.5 months?

8. Needs overall English proofreading before being published

Major Revisions:

1. Although this is a very interesting and well carried out study, I believe more evidence is needed in order to show that TPB will be effective in actually preventing UTI in this subpopulation. Because, with the method used in this study and data results, all this study shows is that TPB can change behaviors of the mothers, but beyond that, it lacks direct correlation to TPB preventing UTI.

2. Although there was a control group in this study, I believe it would have been better to compare the behaviors before and after in the 1) TPB (intervention group), 2) routine education group (or control group as the authors have categorized), and 3) no intervention whatsoever group (this should actually be the control group).

3. Some of the conclusion drawn from the results of this study needs some changes or further explanation.

   - In the Discussions line 52 and on, the authors conclude that the results of the study showed that educational intervention significantly increased the impact of prevention of UTI. However, this is not what this study showed. This study showed that educational intervention was effective in changing the behaviours associated with a higher risk for UTI. However, whether changing the behaviours of mothers will directly have clinical effect in preventing UTI needs further study.

   - A follow up study of the patients to see whether UTI will be prevented through TPB should be proven in another study. This needs to be clarified in the limitations section.
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.

No

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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