Reviewer’s report

Title: Exposure to environmental tobacco smoke based on urinary cotinine levels among Israeli nonsmoking adults: a cross-sectional study of the first Israeli biomonitoring study

Version: 1 Date: 14 October 2013

Reviewer: Emilia Zainal Abidin

Reviewer’s report:

This paper presents results from the Israeli Biomonitoring Study among 250 adults focusing on ETS exposure prior to the implementation of SFL in 2011. Urinary samples were collected among smoking and non-smoking adults along with information from questionnaire (interview-based) using the door-to-door method. The authors analysed urinary cotinine using GC-MS method, a gold-standard robust method. Results were presented in Geometric Means and 2 cut-off points >1 ug/ml and >4 ug/ml. The participants of this study also were requested to complete the 24-hour dietary recall questionnaire. The outcome of this study was expected to be used as a baseline data to support the implementation of SFL in 2012.

This is an important work in the field of tobacco control and smoke-free legislation study. This study is also interesting and unique in terms of the results from participants who smoke water-pipes, which is not common in Asia.

Some points for suggestions to be considered by the authors.

Please make your review as constructive and detailed as possible in your comments so that authors have the opportunity to overcome any serious deficiencies that you find and please also divide your comments into the following categories:

- Discretionary Revisions (which are recommendations for improvement but which the author can choose to ignore)
- Minor Essential Revisions (such as missing labels on figures, or the wrong use of a term, which the author can be trusted to correct)
- Major Compulsory Revisions (which the author must respond to before a decision on publication can be reached)

1. - Minor Essential Revisions

a. Title and Abstract page
   - Background paragraph – the purpose of this study was to examine current levels of ETS among non-smoking Israeli adults – I find this confusing since there were both smoking and non-smoking adults in the results – suggest to rephrase
- Methods paragraph – active smoking characteristics – implying that they are smokers – suggest to rephrase. Were there any questions on ETS exposure hours posed for non-smokers?

b. Background
- 3rd paragraph – 1st sentence add reference.
- 2nd sentence Smoking rates across sex and ethnicity needs to be rephrased, i.e. highest were among Arab males etc.
- 3rd sentence – previous efforts to reduce ETS in public spaces has been only partially successful – please explain further as in discussion it was mentioned that SFL were implemented in 2012
- 6th paragraph – non-smoking Israeli adults – rephrased as the comment for abstract above.

c. Methods – study design, setting and participants
- 1st paragraph – 1st and 2nd sentence needs to be rephrased as the sentence did not mention that this paper/study makes up a part of a larger study clearly. Also aims need to be stated specifically
- 2nd paragraph – eligible population included adults aged 20 to 74 years old. Also explain why is this age group selected.
- 2nd paragraph – within each area, recruitment was done by knocking on doors and interviewing those who met the inclusion criteria…As the homes were selected on a random basis, please mention it here
- …this was documented…suggest to lose this sentence
- Data sources and variables – 1st paragraph - , and were carried out in Hebrew and Arabic..suggest to be deleted
- 2nd sentence we excluded from the non-smokers group 4 individuals with null questionnaire responses for smoking status and 5 participants with creatinine adjusted cotinine concentrations - This is repetitive, is present in results - suggest either place the sentence here or in results, although I would prefer it to be in results.
- Statistical methods – 3rd paragraph – Would suggest that the comparison with the Canadian Human Biomonitoring Study be included in the discussion part instead of in the methods or results (as this result was presented in text not table)

d. Results
- Would be ideal if all three tables were mentioned in text or mentioned in parenthesis (according to journal’s format)
- 5th paragraph – suggest to be placed in discussion

e. Discussion
- 4th paragraph – 2nd sentence consider rephrasing
- 5th paragraph – more tolerance to work ETS – exposure at work
2. - Discretionary Revisions

a. Background

- 5th paragraph – 1st sentence Knowledge, Attitudes and Practices survey – GATS from WHO? Would be ideal if it is explained here

b. Methods – study design, setting and participants

- 3rd paragraph – after this sentence…participation in the study was voluntary …..suggest to be deleted.

- 2nd paragraph – 1st sentence how about recreational smokers?

c. Discussion

- 2nd paragraph – authors might consider including the GM across frequency of smoking in one of the latter paragraph as it might be of interest for others

- 3rd paragraph – in our study all nonsmokers had levels of urinary cotinine above LOD…

- 3rd paragraph . In this study, a moderate correlation….consider replacing with in the and replacing saliva cotinine levels with salivary cotinine levels

**Level of interest:** An article whose findings are important to those with closely related research interests

**Quality of written English:** Acceptable

**Statistical review:** Yes, and I have assessed the statistics in my report.

**Declaration of competing interests:**

I declare that I have no competing interests