Reviewer's report

Title: Epidemiology of Acute Kidney Injury in Hospitalized Pregnant Women in China

Version: 0 Date: 17 Jan 2019

Reviewer: Reviewer 2

Reviewer's report:

PEER REVIEWER ASSESSMENTS:

OBJECTIVE - Full research articles: is there a clear objective that addresses a testable research question(s) (brief or other article types: is there a clear objective)?

Yes - there is a clear objective

DESIGN - Is the current approach (including controls and analysis protocols) appropriate for the objective?

Yes - the approach is appropriate

EXECUTION - Are the experiments and analyses performed with technical rigor to allow confidence in the results?

No - there are minor issues

Statistics - Is the use of statistics in the manuscript appropriate?

Yes - appropriate statistical analyses have been used in the study

INTERPRETATION - Is the current interpretation/discussion of the results reasonable and not overstated?

No - there are minor issues

OVERALL MANUSCRIPT POTENTIAL - Is the current version of this work technically sound? If not, can revisions be made to make the work technically sound?

Probably - with minor revisions
GENERAL COMMENTS: This article reports on the incidence of pregnancy-associated acute kidney injury (AKI) in a large cohort of Chinese women of child-bearing age. Strong points include the importance of the topic and the large sample size. Limitations include the restriction to hospitalized patients and the selection bias (since patients were admitted for some reason), and the retrospective nature.

REQUESTED REVISIONS:

Execution:

- I wonder how the community-acquired AKI worked for those patients with "having multiple creatinine tests on or before the first day of hospitalization"; according to the criteria, patients would require a prior measurement or 48 hours to meet the AKI definition, how can it be established already on the first day without a previous measurement? Please clarify.

- Could the authors elaborate on the 'acute fatty liver' as a major condition associated with AKI? How was this diagnosis established? Is this really an important risk factor, since only a small number of women in the cohort had AFL?

- The fact that age was not a significant risk factor for pregnancy-related AKI is surprising. Could the authors re-analyze their data with age as a continuous variable (it seems as if they currently used a dichotomous variable <35 and <=35 yrs).

- Why were transplanted patients excluded, as they can experience AKI as well?

Interpretation

- The population of this study was restricted to hospitalized patients. As such, I would suggest to make this even more clear e.g. in the Abstract: "This study is aim to determine the effect of pregnancy on the risk of AKI among women of childbearing age…" change to "This study aims to determine the effect of pregnancy on the risk of AKI among hospitalized women of childbearing age…" Similarly in the Conclusion: "The incidence of pregnancy-related AKI is 7.3% in China" change to "The incidence of pregnancy-related AKI is 7.3% among hospitalized women in China".

- In the introduction, AKI incidence during pregnancy of up to 56.9% seems a bit overstated, please consider removing the reference suggesting this as it seems highly unlikely.

- The grammar could be slightly improved, I noticed some typos.
- Please provide costs in US$ as well.

Note: This reviewer report can be downloaded - see attached pdf file.

Please confirm that you have included your review in the ‘Comments to Author’ box?
As a minimum standard, please include a few sentences that outline what you think are the authors’ hypothesis/objectives, their main results, and the conclusions drawn. Your report should constructively instruct authors on how they can strengthen their paper to the point where it may be acceptable for publication, or provide detailed reasons as to why the manuscript does not fulfill our criteria for consideration. Please supply appropriate evidence using examples from the manuscript to substantiate your comments. Please break your comments into two bulleted or numbered sections: major and minor comments.

Please note that we may not be able to use your review if no comments are provided.
Please only upload as attachments annotated versions of manuscripts, graphs, supporting materials or other aspects of your report which cannot be included as text in the ‘Comments to Author’ box.

Yes

Are the methods appropriate and well described to allow independent reproduction of experiments?
Please state in the ‘Comments to Authors’ box below what you think are the strengths and weaknesses of the methods (study design, data collection, and data analysis), and what is required, if anything, to improve the quality of reporting

No

Does the work include the necessary controls?
If not, please explain in the ‘Comments to Author’ box below.

No

Are you able to assess the statistics?

- Are the statistical test(s) used in this study appropriate and well described?

- Is the exact sample size (n) reported for each experimental group/condition (as a number, not a range)?

- Are the description of any error bars and probability values appropriate?
- Are all error bars defined in the corresponding figure legends?

- Has a sample size calculation been included, or a description and rationale about how sample sizes were chosen?

Please can you confirm which of the following statements apply to your statistical assessment of the manuscript (Please include details of what the authors need to address in the ‘Comments to Author’ box):

This question is not applicable to this manuscript

**Are the conclusions drawn adequately supported by the data shown?**
If not, please explain in the ‘Comments to Author’ box below.

No

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

Needs some language corrections before being published

**Should the manuscript be highlighted for promotional activity?**
Articles that are deemed of interest to a broad audience can be promoted in a variety of ways. This could be through email updates, postings on the BioMed Central homepage, social media, blogs and/or press releases. Please indicate in the text box below whether you think this manuscript should be considered for promotional activity, indicating your reasons why (e.g. what is the most newsworthy aspect of the research).

No
Declaration of competing interests

Please complete a declaration of competing interests, considering the following questions:

1. Have you in the past five years received reimbursements, fees, funding, or salary from an organisation that may in any way gain or lose financially from the publication of this manuscript, either now or in the future?

2. Do you hold any stocks or shares in an organisation that may in any way gain or lose financially from the publication of this manuscript, either now or in the future?

3. Do you hold or are you currently applying for any patents relating to the content of the manuscript?

4. Have you received reimbursements, fees, funding, or salary from an organization that holds or has applied for patents relating to the content of the manuscript?

5. Do you have any other financial competing interests?

6. Do you have any non-financial competing interests in relation to this paper?

If you can answer no to all of the above, write 'I declare that I have no competing interests' below. If your reply is yes to any, please give details below.

This reviewer has been recruited by a partner organization, Research Square. Reviewers with declared or apparent competing interests are not utilized for these reviews. This reviewer has agreed to publication of their comments online under a Creative Commons Attribution License attributed to Research Square and was paid a small honorarium for completing the review within a specified timeframe. Honoraria for reviews such as this are paid regardless of the reviewer recommendation.

I agree to the open peer review policy of the journal. I understand that my name will be included on my report to the authors and, if the manuscript is accepted for publication, my named report including any attachments I upload will be posted on the website along with the authors' responses. I agree for my report to be made available under an Open Access Creative Commons CC-BY license (http://creativecommons.org/licenses/by/4.0/). I understand that any comments which I do not wish to be included in my named report can be included as confidential comments to the editors, which will not be published.

I agree to the open peer review policy of the journal.