Reviewer's report

Title: Effect of tolvaptan on renal handling of water and sodium, GFR and central hemodynamics in autosomal dominant polycystic kidney disease during inhibition of the nitric oxide system: a randomized, placebo-controlled, double blind, crossover study

Version: 0 Date: 19 Jun 2017

Reviewer: PALLABI PATI

Reviewer's report:

It is a very well organized and well elaborated study, the style of presentation is good but it will be more informative if following suggestions are added into your paper.

1. It was previously described by Blair et al 2015 that Tolvaptan drug was associated with the reduction in the risk of worsening renal function and the risk of worsening kidney pain. As per the article no significant description about the reducing effect of kidney pain is described if this information was added then it will be more informative.

2. It was previously described in Blair et al 2015 that Tolvaptan drug was associated with some common adverse events. The tolvaptan group were related to its aquaretic mechanism of action e.g. polyuria, nocturia, polydipsia and thirst. Tolvaptan was also associated with idiosyncratic elevations of liver enzymes which were reversible on discontinuation of the drug. If some information about the other side effects, usage and the precautionary measures of this drug will be added in this article then it will be more informative.

3. It will be more appreciated if the information about dosage of the drug/body weight/age associated with the staging of the kidney disease and same with placebo will be added which is not there In page 5 line number 18,19.

4. In material methods the NO(nitric oxide) quantification is only based by urine nitrate excretion, was nitric oxide estimated in plasma or this is the only method for the quantification of nitric oxide?
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.

Yes

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:

Acceptable

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