Reviewer’s report

Title: Islet transplantation improved penile tissue fibrosis in a rat model of type 1 diabetes

Version: 1  Date: 12 Mar 2018

Reviewer: Ana Carolina Santos de Souza Galvão

Reviewer’s report:

It was asked to authors in the first review if twelve weeks was enough time to induce advantage-stage DMED in the rats since experiments using APO were conducted after the islet transplantation or insulin administration to evaluate the erectile function in the rats but the same were not used before the treatments in order to confirm the establishment of advantage-stage DMED. The authors affirmed that "a large number" of references have mentioned that diabetic rats showed advantage-stage DMED at 12 weeks but cite only one work (Cellek) in their response. Despite the existence of some other possible works showing the effect within de 12 weeks I consider experiments using APO before islet transplantation an essential internal control of the experiment which could reinforce the successful induction of DMED before treatment. However, since it seems difficult to add this data to the present work I could suggest the authors to mentioned the references where this methodology was used before.

In relation to the need of a broad discussion about the factors that could contribute to the reversion of DMED after islet transplantation, besides blood glucose normalization, the authors answer just repeat the information present in the first version of the work about the possible participation of c-peptide. Thus, the discussion remains the same and nothing more was added to improve this topic. In my opinion, it is important discuss more appropriately and show more details about these results.

Finally, the authors presented some information about islet transplantation and peripheral resistance in type 2 diabetes answering a question asked in the revision. It is clear that authors agree with me that the results of the present study could address type 2 diabetes models but it is not totally sure and there is need for the development of a similar work in diabetes type 2 models. Thus, I suggest authors a minor alteration in the title of the work highlighting the use of a type 1 diabetic model ("Islet transplantation improved penile tissue fibrosis in A RAT MODEL OF TYPE 1 DIABETES")

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:

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