Reviewer’s report

Title: Ocular Size and Shape in Lens-Induced Myopization in Young Guinea Pigs

Version: 1 Date: 22 Feb 2019

Reviewer: Jian Li

Reviewer's report:

The present study assessed the relationship of axial elongation and coronal diameters change in guinea pigs during lens-induced myopization. They found that the ocular enlargement occurred mainly in sagittal direction. The manuscript was well organized. However, there are several points need to be clarified before considering for publication:

1. Please specify the calculation for a sample size of 70 animals in this study.
2. In vitro experiments may be not necessary for the measurement of ocular diameters. The authors are recommended to discuss the in vivo methods.

3. The animal model of lens-induced myopization was well established for many years. In the current study, the difference of axial length between experimental group and control group was quite small even it showed a statistical significant (8.96 ± 0.15 mm versus 8.84 ± 0.14 mm; P=0.001). The authors are encouraged to discuss the previous work with the same animal model and compare the experimental outcomes.

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:

Needs some language corrections before being published

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