Response to reviewers

Dear editor and reviewers,

We highly appreciate the editor's invitation to accept the appropriate revision of our previous manuscript with a Manuscript NO.: 82627 of the World Journal of Stem Cells.

We highly appreciate all comments and suggestions from the editor and reviewers. We believe that you can help us to improve our manuscript and our understanding of the research in the related field. We duly considered all the comments and suggestions. We made appropriate corrections and amendments accordingly. We also made a careful reading of the manuscript to identify and correct several inconsistencies. We submitted our revised manuscript, in which the changes that we made are in red font color. A list of our responses to the comments of the reviewers is shown below.

Reviewer #1:

Scientific Quality: Grade C (Good)

Language Quality: Grade B (Minor language polishing)

Conclusion: Minor revision

Specific Comments to Authors: Overall it's a good mini review on BAF complex subunits and its role in neural stem/progenitor cells and related neural developmental disorders. Several comments listed below, mostly related to organizations of the review articles.

1. The title of the article could be more meaningful, if changing to "The role of BAF complex subunits in neural stem/progenitor cells and related neural developmental disorders".

Response,

We deeply appreciate the comments from the reviewer.

The title has been revised as "The role of brahma-related gene 1/brahma-associated factor subunits in neural stem/progenitor cells and related neural developmental disorders" accordingly.

2. Symbol and nomenclature: there should be a table of symbol and nomenclature in the order of appearance, including the terms spelled out and definitions. As for now, BAF in title and abstract appears confusing without full terms, the same with BRG1/BRM first appeared in the introduction, without spelling out.

Response,

We deeply appreciate the good suggestions from the reviewer.

We agree with the reviewer that there should be a table of symbol and nomenclature in the order of appearance, including the terms spelled out and definitions. BAF and BRG1/BRM should be spelled out in the first appearance. All abbreviations used were defined in a supplementary table S1.

3. In line 11, the sentence "NSPCs can be isolated" has some grammar issues. It should add "The fact that" in front of NSPC to make the first part of the sentence a noun.

Response,

We deeply appreciate this good suggestion from the reviewer.

We added "The fact that" in front of NSPCs accordingly in the revised manuscript.

4. In Introduction, the last sentence of second paragraph listed all 30 subunits. I's not necessary. The 30 subunits could either be referenced, or grouped based on modules put in a table.

Response,

We deeply appreciate this good suggestion from the reviewer.

The 30 subunits were just referenced.

5. The section "BAF COMPLEX SUBUNITS IN NSPCs" can be re-organized in order of importance, instead of by BAF number. The least studied BAFs could be omitted, e.g. BAF47 and BAF55A. In addition, the titles of sub-sections (the subunits) should be differentiated from the title of the section. It could be done by shifting in tab. As is now, they are parallel to the section title, making reading content uneasy. *Response*,

We deeply appreciate the good suggestions from the reviewer.

The section "BAF COMPLEX SUBUNITS IN NSPCs" was revised as "BAF COMPLEX SUBUNITS and THEIR MAIN CHARACTERISTICS IN NSPCs" and re-organized in order of importance and the least studied BAFs, e.g. BAF47 and BAF55A, were put at the end part of the section. The titles of sub-sections were thus differentiated from the title of the section.

Reviewer #2:

Scientific Quality: Grade C (Good)

Language Quality: Grade B (Minor language polishing)

Conclusion: Minor revision

Specific Comments to Authors: The manuscript entitled "Role of BAF complex subunits in neural stem/progenitor cells" by Naiyu Ke et al. deals with a very interesting and current topic. Even if some minor revisions have to be made, the manuscript deserves to be accepted.

Minor revisions:

• There are numerous typos and spacing errors throughout the manuscript.

Response,

We deeply appreciate the commens from the reviewer.

The numerous typos and spacing errors throughout the manuscript were corrected by a language editing company AJE.

• Some bibliographic entries are missing: for example, on page 12, it states "Recent human exome sequencing and genome-wide association studies have shown that..." Specify which studies. Also in other places, insert the appropriate references.

Response,

We deeply appreciate the comment from the reviewer.

More appropriate references were provided in the revised manuscript, including the reference for "Recently, human whole-exome sequencing and genome-wide association studies have shown that mutations in BAF complex subunits are associated with neurodevelopmental diseases such as CSS, NCBS, KSS and ASD[89-92]."

• The abstract is too concise and the objectives of the manuscript should be explained more clearly.

In any case, the manuscript provides a good contribution to the knowledge on the role of BAF complex in regulating the balance between self-renewal and differentiation of neural stem/progenitor cells and on its relationship with some neurodevelopmental pathologies.

Response,

We deeply appreciate this good suggestion from the reviewer.

The abstract was revised accordingly.