

## PEER-REVIEW REPORT

**Name of journal:** *World Journal of Stem Cells*

**Manuscript NO:** 82860

**Title:** Modulation of stem cell fate in intestinal homeostasis, injury and repair

**Provenance and peer review:** Invited Manuscript; Externally peer reviewed

**Peer-review model:** Single blind

**Reviewer's code:** 05360676

**Position:** Editorial Board

**Academic degree:** BSc, MSc, PhD

**Professional title:** Professor, Senior Editor

**Reviewer's Country/Territory:** United Kingdom

**Author's Country/Territory:** China

**Manuscript submission date:** 2023-01-14

**Reviewer chosen by:** AI Technique

**Reviewer accepted review:** 2023-01-28 17:22

**Reviewer performed review:** 2023-01-28 20:09

**Review time:** 2 Hours

Scientific quality	<input type="checkbox"/> Grade A: Excellent <input checked="" type="checkbox"/> Grade B: Very good <input type="checkbox"/> Grade C: Good <input type="checkbox"/> Grade D: Fair <input type="checkbox"/> Grade E: Do not publish
Novelty of this manuscript	<input type="checkbox"/> Grade A: Excellent <input checked="" type="checkbox"/> Grade B: Good <input type="checkbox"/> Grade C: Fair <input type="checkbox"/> Grade D: No novelty
Creativity or innovation of this manuscript	<input type="checkbox"/> Grade A: Excellent <input checked="" type="checkbox"/> Grade B: Good <input type="checkbox"/> Grade C: Fair <input type="checkbox"/> Grade D: No creativity or innovation

<b>Scientific significance of the conclusion in this manuscript</b>	<input type="checkbox"/> Grade A: Excellent <input checked="" type="checkbox"/> Grade B: Good <input type="checkbox"/> Grade C: Fair <input type="checkbox"/> Grade D: No scientific significance
<b>Language quality</b>	<input type="checkbox"/> Grade A: Priority publishing <input checked="" type="checkbox"/> Grade B: Minor language polishing <input type="checkbox"/> Grade C: A great deal of language polishing <input type="checkbox"/> Grade D: Rejection
<b>Conclusion</b>	<input type="checkbox"/> Accept (High priority) <input checked="" type="checkbox"/> Accept (General priority) <input type="checkbox"/> Minor revision <input type="checkbox"/> Major revision <input type="checkbox"/> Rejection
<b>Re-review</b>	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<b>Peer-reviewer statements</b>	Peer-Review: <input checked="" type="checkbox"/> Anonymous <input type="checkbox"/> Onymous
	Conflicts-of-Interest: <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

## SPECIFIC COMMENTS TO AUTHORS

The authors state in this review, that they summarize the recent insights into the intrinsic and extrinsic elements involved in the process of intestinal homeostasis, injury and repair, which fine-tune the balance between self-renewal and cell fate specification in intestinal stem cells. Indeed, they provide a comprehensive summary about the current knowledge in this field, and end up with a perspective about currently unsolved questions in the fields, especially with providing an appealing stem cell-based therapeutic approach for intestinal mucosal injury disorders, in the future. The manuscript was well written and should be of wide interests to most researchers or clinicians on stem cells and therapy.

## PEER-REVIEW REPORT

**Name of journal:** *World Journal of Stem Cells*

**Manuscript NO:** 82860

**Title:** Modulation of stem cell fate in intestinal homeostasis, injury and repair

**Provenance and peer review:** Invited Manuscript; Externally peer reviewed

**Peer-review model:** Single blind

**Reviewer's code:** 05611438

**Position:** Peer Reviewer

**Academic degree:** MD

**Professional title:** Doctor

**Reviewer's Country/Territory:** Taiwan

**Author's Country/Territory:** China

**Manuscript submission date:** 2023-01-14

**Reviewer chosen by:** Geng-Long Liu

**Reviewer accepted review:** 2023-03-10 21:52

**Reviewer performed review:** 2023-03-20 15:31

**Review time:** 9 Days and 17 Hours

Scientific quality	<input checked="" type="checkbox"/> Grade A: Excellent <input type="checkbox"/> Grade B: Very good <input type="checkbox"/> Grade C: Good <input type="checkbox"/> Grade D: Fair <input type="checkbox"/> Grade E: Do not publish
Novelty of this manuscript	<input type="checkbox"/> Grade A: Excellent <input checked="" type="checkbox"/> Grade B: Good <input type="checkbox"/> Grade C: Fair <input type="checkbox"/> Grade D: No novelty
Creativity or innovation of this manuscript	<input type="checkbox"/> Grade A: Excellent <input checked="" type="checkbox"/> Grade B: Good <input type="checkbox"/> Grade C: Fair <input type="checkbox"/> Grade D: No creativity or innovation

<b>Scientific significance of the conclusion in this manuscript</b>	<input type="checkbox"/> Grade A: Excellent <input checked="" type="checkbox"/> Grade B: Good <input type="checkbox"/> Grade C: Fair <input type="checkbox"/> Grade D: No scientific significance
<b>Language quality</b>	<input type="checkbox"/> Grade A: Priority publishing <input checked="" type="checkbox"/> Grade B: Minor language polishing <input type="checkbox"/> Grade C: A great deal of language polishing <input type="checkbox"/> Grade D: Rejection
<b>Conclusion</b>	<input type="checkbox"/> Accept (High priority) <input checked="" type="checkbox"/> Accept (General priority) <input type="checkbox"/> Minor revision <input type="checkbox"/> Major revision <input type="checkbox"/> Rejection
<b>Re-review</b>	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<b>Peer-reviewer statements</b>	Peer-Review: <input checked="" type="checkbox"/> Anonymous <input type="checkbox"/> Onymous
	Conflicts-of-Interest: <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

## SPECIFIC COMMENTS TO AUTHORS

The authors of this paper reviewed the signals and mechanisms that control homeostasis and regeneration of the intestinal epithelium. This being the first line of defense against injuries to the intestine. To this end the intestinal stem cells (ISC) which coordinates the renewal and regeneration of different intestinal cell lines was discussed. The authors analyzed signals that the cells of the stem cell niche elaborate. These signals help maintain homeostasis and control the fate of the stem cells. Endogenous and exogenous factors that modulate the fate of ISC were also discussed. The title and abstract reflect the main subject of the manuscript. The discussion was done using precise English and reader-friendly terms. The article is well constructed with logical flow of ideas. Recent references were cited with about 45% of articles published within the last 5 years. This article can be accepted after minor grammatical and typo corrections.