



**SDI Review Form 1.6**

Journal Name:	<b><u>Journal of Advances in Biology &amp; Biotechnology</u></b>
Manuscript Number:	<b>Ms_JABB_46165</b>
Title of the Manuscript:	<b>Acute and subacute toxicity of the aqueous aerial parts extract of Oxalis barrelieri (Oxalidaceae)</b>
Type of the Article	

**General guideline for Peer Review process:**

This journal's peer review policy states that **NO** manuscript should be rejected only on the basis of '**lack of Novelty**', provided the manuscript is scientifically robust and technically sound. To know the complete guideline for Peer Review process, reviewers are requested to visit this link:

(<http://www.sciencedomain.org/page.php?id=sdi-general-editorial-policy#Peer-Review-Guideline>)



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**PART 1: Review Comments**

	Reviewer's comment	Author's comment (if agreed with reviewer, correct the manuscript and highlight that part in the manuscript. It is mandatory that authors should write his/her feedback here)
<b>Compulsory</b> REVISION comments	<p>The manuscript requires major corrections as follows:</p> <ol style="list-style-type: none"> <li>1. Abstract. What is the meaning of possible toxic effect? In my opinion, it's not necessary to mention the word "possible effect", just directly "toxic effects"</li> <li>2. Introduction. There are a lot informations which cited from one reference (Page 1 Line 32-48). The authors should add more references at this paragraph.</li> <li>3. Introduction. What is the urgency to perform this research? The authors should elaborate the research gap.</li> <li>4. What is the reference or guideline to prepare the extract?</li> <li>5. Line 70-71. Why did the authors use different animal type (mice and rat)?</li> <li>6. The acute toxicity method is quite confusing. "...extract was administered with a single dose, then the same dose were reported 48 hours later on 3 additional animals..." Why did the author repeat the dose administration? Why did the author use 3 additional animals while performing the 14 days observation?</li> <li>7. Is there any intensive observation at the first 24 h after extract administration?</li> <li>8. Line 90. Six group consist of...?</li> <li>9. Line 94-95. The sentences need to be paraphrased.</li> <li>10. Line 176-178. The ALT and AST levels increased two weeks after discontinuation. The authors should explain this phenomenon.</li> <li>11. Figure 2. The color of letter is not consistent, some are black colour and some are white colour.</li> <li>12. Figure 2. It seems there is also enlargement of the glomerular chamber at F, but the authors don't mention about this. Please re-confirm</li> <li>13. Line 241. The authors should double check the statement.</li> <li>14. The discussion is quite lengthy but lack of the supporting information to explain the result. i.e Why the extract possesses moderate toxicity? What is the mechanism? How do the authors categorized the toxicity level? What is the chemical content contribute to the toxic effect?</li> <li>15. The discussion is not in line with the result. i.e Line 254. It is mentioned that the the extract doesn't change liver function, but at the result section (Table 7, it is written that the AST level increased significantly at satellite group.</li> <li>16. Conclusion. Line 313. The statement is not in line with discussion and result. It is</li> </ol>	<ol style="list-style-type: none"> <li>1. Good observation, correction made in the manuscript</li> <li>2. Three authors have been added in this part</li> <li>3. The urgency of this toxicity study is that Oxalis barrelieri is used in traditional medicine by the populations, some authors have shown that this plant has anti diarrhea and anti hyperglycemic effects. In addition, the work in progress in our laboratory shows that Oxalis barrelieri has other pharmacological effects. It is therefore important to evaluate the toxic effects of this plant to ensure the safety of patients who consume this plant.</li> <li>4. In traditional medicine, Oxalis barrelieri is prepared as a decoction for the treatment of various pathologies. Other authors such as Fokam et al, 2015 also report it.</li> </ol> <p>5. Mice and rats were used for the following reasons:</p> <ul style="list-style-type: none"> <li>- The mice are used in acute toxicity for two reasons: they are mammals whose use is authorized by both the WHO and the OECD in the pharmacological and toxicology tests. In addition, these animals are small (low mass), which avoids the use of large amounts of extract in acute toxicity tests that uses high doses of extract. This avoids the destruction of many plants (ecological importance).</li> <li>- Rats are used in subacute toxicity for two reasons: they are mammals, the use of which is authorized by both WHO and OECD in pharmacological and toxicology tests. In addition, in this study the growth of animals was evaluated. It was necessary to use young animals to appreciate their growth. This had to be very difficult with young mice because the feeding tube would destroy their s</li> </ul> <ol style="list-style-type: none"> <li>6. The three animals we add confirm the result. This is a requirement of OECD Guidelines No. 423, 2001 and 425, 2008. The sequential process, allows to reduce the number of animals used per stage.</li> <li>7. There was intense observation during the first 24 hours after administration of the extract.</li> <li>8. The different groups are specified in lines 91 - 95.</li> <li>9. Good observation, this has been corrected in the text.</li> <li>10. ASAT has increased, not ALAT. This has been corrected in the discussion.</li> <li>11. Good observation, it is corrected in the text.</li> <li>12. Yes, that's right. it's corrected in the text.</li> <li>13. Correction made in the text.</li> <li>14. Correction made in the text.</li> <li>15. Thanks for the observation but the ASAT is the only parameter that has varied. This correction is made in the text.</li> <li>16. Thank you for the observation but we are talking about the function and not the structure even if these things are related. This correction is made in the text.</li> </ol>



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	written that the dose of 400 mg/kg BW doesn't change kidney function, but in discussion (Line 305) it mentioned that the dose of induce kidney damage.	
<b>Minor</b> REVISION comments		
<b>Optional/General</b> comments		

**PART 2:**

	<b>Reviewer's comment</b>	<b>Author's comment</b> <i>(if agreed with reviewer, correct the manuscript and highlight that part in the manuscript. It is mandatory that authors should write his/her feedback here)</i>
<b>Are there ethical issues in this manuscript?</b>	<i>(If yes, Kindly please write down the ethical issues here in details)</i>	