"**NIRAVARI: A parsimonious bio-decisional model for assessing the sustainability and vulnerability of rainfed or groundwater irrigated farming systems in Indian agriculture**"

Major recommendations

1. The state of the research field should be reviewed and key publications cited. There are only 23 citations. Among them, 7 references were published over 10 years ago. The analysis is rather weak. There are no statistics. The research gap should be revealed. This section has to be improved.
2. The purpose of the article is not clear. The authors should mention the main aim of the paper. Otherwise, it is difficult to assess the results and conclusions of the article.
3. The novelty of the paper is questionable. It is necessary to emphasize the novelty of the study and its main ideas.

Minor recommendations

1. The Abstract Section: This section must summarize the article's main findings. In my opinion, the authors should add more details.
2. Line 72: "[23] is an interesting attempt, …..". The wording, for example, "O'Keeffe et al. [23] presented an interesting attempt ….." is better.
3. Lines 92-93: "https://mtropics.obs-92 mip.fr/)" It is better to use a title of website.
4. Please Explain what the term "jeminu" means.
5. Line 157: Why did authors used sublevel "Irrigation model at the jeminu level"?
6. Line 160: "… developed in Bergez et al. (2001)." The authors should use unified links.
7. As to formulas, the authors should follow the instructions for authors.
8. Figure 5: There are 8 points in a legend. It is difficult to understand Figure 5. This figure should be improved.
9. Lines 203-216: The authors should correct these paragraphs.
10. Table 1: The authors should correct the table 1. It is necessary to explain the following: 1/(1+2+3); 2/(1+2+3); 3/(1+2+3).
11. Line 253: What does Sc0 stand for?
12. Some references are too old: 33, 34, and 36.