Review of: "Assessing students' attitudes and perceptions towards statistical literacy in a university system in a developing African country"

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Potential competing interests: No potential competing interests to declare.

In this manuscript, the author investigates the attitudes and perceptions of students towards statistics education at Chinhoyi University of Technology (CUT) in Zimbabwe. The study used the Students' Attitude towards Statistics (SATS) instrument to assess the attitudes of 185 students from different disciplines towards statistics education by analyzing two main issues, i.e., the students' attitudes towards statistics education at CUT, and the factors affecting statistics education at the institution. Descriptive, factor reduction, and multiple regression techniques were used to analyze the data and identify critical covariates and relationships between variables. The study found that factors such as the perceived difficulty and numerical complexity of statistics, low self-efficacy and self-perception in statistics, and varying cognitive capabilities of students contribute to fear, stress, anxiety, and antipathy towards statistics. Inadequate supporting conditions, such as a lack of modern ICT infrastructure and a conducive teaching and learning environment, were identified as barriers to performance in statistics education. Despite these challenges, students still recognized the importance of statistics for their future professions and were willing to put in effort if motivated. The study recommended a paradigm shift in the teaching and learning of statistics, emphasizing collaborative learning, the use of electronic learning and assessment, and smaller class sizes to provide individualized attention to weaker students. Overall, the manuscript remains very descriptive. However, there are a few points which can be considered to improve it further. See questions below:

Q. In section “3.1. Demography of the respondents,” the reported number for ‘the level of formal education reached by the respondents’ is incomplete. What is the status of the rest 56 respondents?

Q. Table 7 should be Table 2 to appear in order as it is appearing in the text.

Q. It would be interesting to see the relationship between the theoretical understanding of statistics and its practical understanding like... How about the students who enjoyed the course in class but found it hard to implement in their research work at the MPhil/PhD level to understand the “Attitude of students towards statistics”?

Q. In section 3.2.6, the age group considered for the study can be mentioned in the text.

Q. In section 3.3, it would be interesting to see the relation of these n=88 respondents, who considered CUT to provide an opportunity for learning statistics, with their respective “interest in statistics” and their ‘statistics cognitive competence’.

This will help to rule out that the one who finds statistics interesting finds everything is right with policies and facilities available, even when it is not.