Review of: "Enhancing Soil Stabilization in Soft Soils Through The Addition of Sand to Soil-Cement Piles: a Comprehensive Study"

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Potential competing interests: No potential competing interests to declare.

Review Report

The paper titled "Enhancing Soil Stabilisation in Soft Soils Through The Addition of Sand to Soil-Cement Piles: A Comprehensive Study," provides a detailed examination of soil stabilisation procedures. The study's emphasis on adding sand and additives to increase uniaxial compressive strength in both saline and non-saline environments is laudable. However, there are some places in which the manuscript might be improved:

General Comments:

1. **Introduction and Abstract**:

- The abstract should clearly explain main results and their practical applications. Indicate the % increase in compressive strength after adding sand and additives. A more concise introduction that states the study topic and aims clearly after providing a little background would be beneficial.

2. **Challenges and Future Directions**:

- Although the challenges are thoroughly explained, there is a need to emphasise more the real-world consequences and possible uses of addressing these challenges.

3. **Methodology**:

- Extra info is needed on sand type, ECO-CSB and ECO-CSSB additive properties. Furthermore, the reason for selecting certain sand volumes and cement contents should be stated.

4. **Discussion**:

- Compare the study's findings with current literature. Concentrate on particular publications or elements that are consistent or diverge from the findings.
- Address study limitations and uncertainties to give a more thorough analysis.

5. **Conclusion**:

- Provide a clear summary of important results. Reiterate the research's practical implications and prospective applications.
- Emphasise the need for future study and development, identifying suitable areas of inquiry.

The manuscript, with its emphasis on enhancing soil stabilization, has the potential to significantly contribute to the field. Addressing the mentioned recommendations would improve the research's clarity, depth, and overall effect, making it more accessible and applicable to both theoretical concepts and real constructing conditions.