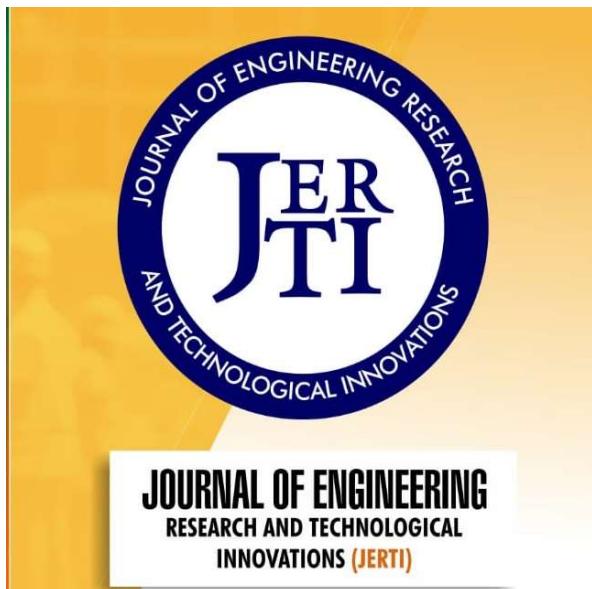




JERTI VOLUME 1 SERIES 1

ISSN 3093-0863



**A Publication of the Faculty of Engineering, Kwara State  
University, Malete, Nigeria**

## Editorial

### Volume 1 Issue 1

The Journal of Engineering Research and Technological Innovations (JERTI) is pleased to present Volume 1, Issue 1, marking the formal commencement of the journal as a scholarly platform dedicated to the dissemination of high-quality research across diverse fields of engineering. This inaugural issue reflects the journal's commitment to promoting research that addresses practical challenges, advances technological development, and contributes meaningfully to engineering knowledge, particularly within developing economies.

This first issue contains four peer-reviewed articles, drawn from two broad sections of the journal. Two papers fall under Agricultural, Bioresources, Biomedical and Food Engineering, while the remaining two are within Computer, Telecommunications, Software, Electrical and Electronics Engineering. Collectively, these contributions demonstrate the interdisciplinary nature of modern engineering research and the relevance of engineering solutions to societal needs.

The first two papers focus on optimization in agricultural engineering systems. One study investigates the performance optimization of an improved cassava mash sifting machine using a General Full Factorial Design, revealing how operational parameters significantly influence sifting efficiency. The second paper applies a similar experimental design approach to optimize tractor fuel usage during ridging operations, offering valuable insights for improving energy efficiency in mechanized agriculture. Both studies provide statistically robust frameworks that support data-driven decision-making in agricultural field operations.

The third paper addresses wireless communication systems, presenting the design and comparative analysis of circular and rectangular 3.5 GHz patch antennas for modern wireless applications. Using low-cost materials and simulation tools, the study demonstrates strong impedance matching and enhanced performance, contributing to ongoing efforts to improve antenna design for emerging communication technologies.

The fourth paper explores cyberbullying detection through the application of GloVe feature extraction and Linear Discriminant Analysis, evaluated across multiple machine learning classifiers. The findings highlight the effectiveness of combining linguistic embeddings with dimensionality reduction techniques to improve classification accuracy, underscoring the role of artificial intelligence in addressing contemporary social and technological challenges.

The Editorial Board acknowledges the efforts of the authors, reviewers, and section editors whose contributions have made this maiden issue possible. It is our expectation that the articles published in this issue will stimulate further research, foster innovation, and support the practical application of engineering knowledge. JERTI looks forward to continued engagement with researchers, practitioners, and policymakers in future issues.

**Samson Olalekan Odeyemi**

*Managing Editor*

*Journal of Engineering Research and Technological Innovations (JERTI)*



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