

CHAPTER FIVE

CONCLUSION AND RECOMMENDATION

5.1 Conclusion

The single-phase transformer trainer was successfully designed and constructed, meeting the specified aim and objectives. The single-phase transformer trainer enables experiments such as transformation ratio test, open circuit test to measure core losses, short circuit test to measure copper losses, and load tests to evaluate efficiency and voltage regulation of the single-phase transformer. Finally, the project demonstrates the importance of transformers in electrical power systems and provides a valuable learning tool for students.

5.2 Recommendation

Future projects could focus on designing and constructing three-phase transformer trainers or transformers with different ratings and specifications by incorporating additional features such as temperature monitoring, overcurrent protection, and digital displays for easier data collection.

In addition, future projects could also explore designing transformers with different ratings, configurations, or materials to expand the scope of experimentation and learning. Moreover, integrating the trainer with data acquisition systems or simulation software could provide more comprehensive insights into transformer performance and behavior.

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