

DESIGN OF DC-DC CONVERTER KIT FOR
UNDERGRADUATE LABORATORY EXPERIMENT

MOHD RAZALI BIN HAFIZAH

FACULTY OF ELECTRICAL ENGINEERING
UNIVERSITY TEKNOLOGI MARA
MALAYSIA

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ABSTRACT

This project deals with the implementation of DC chopper trainer kit. A careful and detail design procedure of the chopper will be documented. Computer simulation will be used extensively to ascertain the workability of the design circuit. Finally, the trainer will be constructed and tested. The trainer can be used for undergraduate laboratory experiment purposes to help student get to know more about chopper by providing a selectable component layout for several of inductor, capacitor and resistor values. Eventually, student will be able to feel and see the concept of chopper. The duty ratio and frequency can be adjusted and rearranged. The value of active components can be compared to the result between the calculation and the simulation.

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