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FINAL REPORT :

CLAP SWITCH FOR SMARTHOME

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ABSTRACT

Clap switch is a switch which can switch on/off my electrical circuit by the sound of the clap. This design is made to make people life more easy especially for an elderly or mobility-impaired person. It is also can reduce electric shock cause by the switch (they use wet hand to turn ON or OFF the lamp). People also do not need to run or waste the time just for to turn ON or OFF the lamp. They can save energy and time with this design.The basic idea of clap switch is that the electric microphone picks up the sound of your claps, coughs, and the sound of that book knocked off the table, it produces a small electrical signal which is amplified by the succeeding transistor stage. This circuit is constructed using basic electronic components like resistors, transistors, relay, transformer, capacitors. The primary application involves as elderly or mobility-impaired person. It is generally used for a light, television, radio, or similar electronic device that the person will want to turn ON or OFF from bed. The major disadvantage is that, it is generally cumbersome to have to clap one`s hands to turn something ON or OFF and it`s generally seen as simpler for most use cases to use a traditional light switch.

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CHAPTER 1

INTRODUCTION

1.1 Background of Study

Clap switch is a device that is simply operated by sound. If we clap, the lamp turns on and to switch it off clap again. The condenser microphone picks up the sound of your claps and the sound for that book knocked off the table. It produces a small electrical signal which is amplified by the succeeding transistor stage. For example, the switch will turn 'ON' the device through a clap sound. This is a miracle for handicap person.

Nowadays, many people feel lazy to ON the switch manually. When we use this clap switch, we do not have to run to the switch and turn it 'ON'. We just need to clap and the device will automatically 'ON'. It is very simple.

Furthermore, we regularly heard many cases of electric shock because they turn on the switch by using a wet hand .So we design this clap switch to avoid any of this dangerous matter from happening again.