SMART PA

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ABSTRACT

In this modern society, security is an important aspect of life. Due to this reason, there are many organizations investing and researching on the methods to enhance security systems. In addition to security, energy saving is also an important aspect as it helps to reduce the cost of operating, reduces energy used and prevents wastage.

This project, Smart PA (Personal Assistant) is the assistant for reduce the user task by helping them. It can apply in this project by control the devices inside the office while the identity of user is identified. It can reduce the task of the user by controlling the devices inside the office. When the user swiped the card at the RFID reader, the reader will receive the ID number from the card. If the card ID number is matching with the ID number that recorded in the PIC microcontroller, the magnetic door will be open for 5 seconds. At the same time, the LCD will display the ID number of the user and the transmitter will send a signal wirelessly to the receiver to open the AC devices inside the office. If the ID number not matching, then the magnetic door will be locked. In addition, the Smart PA revolves around security system and energy saving system. Therefore the Smart PA system can be installed into either an office or house. Either place would require security and also energy saving system to enhance the lifestyle and also the comfort of one. The Smart PA system also helps the user to saves energy. The energy saving is also a smart system as it does not remove the electricity immediately when a user leaves the room, it will count the amount of user in the room from the RFID reader.

The Smart PA system will ensure that anyone who installs the system lives in comfort with the security covered and the automatic wirelessly turn on of the appliances. The project report will include the overview of project, flowchart of program, description of program, explanation of methodology, test and results, illustrations, and etc. The report will be concluded with the results obtained, conclusion and future enhancements.