

Abstract

The earthquake is one of the natural disasters that often occurs in Indonesia. Earthquakes result in emergencies due to vibrations of shifting earth plates. In an emergency, anticipation is needed to reduce the number of victims of the disaster. Mainly in multi-story buildings that require time to evacuate victims. Evacuation is tailored to what is most likely to be done by earthquake victims in the multi-story building. In this final project, a system is built to provide evacuation decisions in multi-story buildings using an accelerometer that reads points from the x and y axes. In evacuation decision making, a fuzzy logic method is used which will decide based on the value of the Richter scale. The results of the previous process will be displayed on the LCD screen which is assumed to be located on each floor of a multi-story building.

Keywords: Earthquake, evacuation, fuzzy logic, accelerometer