

ABSTRACT

Every year, almost every region in Indonesia is affected by flood, seeing flood disaster that happened in every area in Indonesia, hence need to make a flood hazard notification system, in order to urge people to come flood in their respective area. In the midst of rapid technological development with the presence of mobile communication technology devices such as mobile phones are almost owned by everyone and the support of internet technology, then the need for information will be very quickly communicated.

Many systems have been used to overcome the problem of flooding. The Android based flood monitoring system uses the Arduino uno system that is used as a server in flood monitoring applications. This detection system consists of *hardware* and *software*. In the *hardware* section, Arduino uno will be installed with an ultrasonic sensor for data read and data transmission. In the *software* section, an Android-based flood monitoring application will be created.

Based on the results of the research can be concluded that the application of flood monitoring can work well in accordance with the expected level of accuracy of readings made by ultrasonic sensors is of 60% to 100% depending on the measured surface.

Keyword: Android, Arduino, Bluetooth, auto-detection Sensor