ABSTRACT

Indonesia is a country prone to earthquakes. This phenomenon has existed since the Indonesian territory was crossed by two tectonic plates. In addition, Indonesia is squeezed by two great oceans, the Pacific Ocean and India. Therefore the tsunami posed a serious threat to the coastal areas of the Indonesian archipelago as well. At present Indonesia actually has a sea wave early detection system tool. The tool is called CBT (Cable Based Tsunamimeter) made by BPPT (Badan Pengkajian dan Penerapan Teknologi), the tool uses optical cables that are planted in the sea to transmit data that has been obtained. Unfortunately, the tool takes a very expensive price but maintenance is relatively cheap.

So with that the authors make early detection system tools are expected to provide early warning of disaster-prone areas, this system is called an early warning system in which these devices will be able to read ocean wave data better and more accurately and the price is relatively cheap. The method used in this study is using the KNN method for classification of objects, and can be able to process state data at sea and provide accurate but more simple information and can be seen on an Android mobile device.

Keyword: Sea wave, KNN, Training data, Android