ABSTRACT

The human voice is one of characteristics that distinguish human beings from one another. Spectrum of some voice, amplitude, and frequency are some characteristics that can be referenced in distinguishing the human voice. In circumstances when a person is not in place, but with a voice heard though not shown directly from the person speaking, the sound of that person can explain the identity of the person. By storing the voice of the people as a database first, then it can be individual-based voice recognition systems. To facilitate this process of recognition is required an appropriate and precise method that can display the results based on the introduction of the characteristics of the human voice.

Implementation of voice recognition methods of individual classification uses Neural Networks Learning Vector Quantization (LVQ-ANN) that can detect the sound of some people in realtime and display name. In implementing this system mounted microphone to record some voice of people. The voice is taking the feature of amplitude, frequency, energy, and zero crossing. Some data of feature extraction are downsampled.

In this system, the implementation can identify individuals with the accuracy of 63,33 % and the results can be displayed with a maximum delay of 4-6 seconds. Inaccuracy identification is caused by inappropriate feature extraction method, the significant changes from the data used as training data, and the different positions of individuals with the trained position.

Keyword : Signal Voice, Delay, Learning Vector Quantization, Realtime, and Identification