

ABSTRACT

One indicator on the disruption of the vocal cords is hoarseness. Thesis research has been done in the form of making Android applications for early detection the condition of hoarseness. Beginning with the voice recording through a microphone on a *tablet*. Then recording the sound signal is processed using FFT method. The output from the first application has value *jitter*, *shimmer*, HNR, and the condition of the vocal cords (healthy or sick). While the output from the second application has the real-time spectrogram display with a certain frequency and amplitude. Measurement of the sound signal is done using Matlab and Android. The results obtained from Matlab compared with the results from Android that produce the difference between an average value of Matlab and Android.

Keywords: Vocal cords, Hoarseness, Android, FFT, Matlab