ABSTRACT

Every human being has a different type of voice. The type of voice is various types of sound that are classified according to the frequency of sound produced. There are 6 types of human sounds, namely for tenor, baritone, and bass, soprano, mezosopran and alto. When compared with the voice of adult men and women, the children's voice area has changing conditions. In children the range of sound they have can still change, this condition is due to the sound-forming organs that are still developing. Thus, research will be carried out for the final project by identifying the voices of children and classifying the sounds into types of human voice based on frequency using the Fast Fourier Transform method. which can change signals from the time domain to the frequency domain. by using the FFT method, the computational rate of the fourier transformation calculation can be increased. Where the voices of children will be recorded by saying the basic tone of sound, then the sound recording results will be processed using MATLAB R2015b software using the Fast Fourier Transform method to see the frequency produced by the child's voice then classified by the type of sound.

Keywords: *human voice; sound type; children; FFT; Matlab.*