PROJECT REPORT

VOICE GENDER RECOGNITION USING MFCC AND CNN

JOSHUA ARBIE YEDIDYA MINCELUNGAN
20.K1.0019

Faculty of Computer Science
Soegijapranata Catholic University
2024

ABSTRACT (ABSTRACT TITLE)

Audio gender recognition is an interesting play of technology with the biological society. It has lots of advantages in security, healthcare, and social sciences. In recent papers, audio recognition using Convolutional Neural Network (CNN) perform a great performance. Then comes a question is CNN also able to do a voice gender recognition from Mel Frequency Cepstral Coefficients (MFCC) feature extraction. This research will implementing CNN model and MFCC feature extraction on voice gender recognition and do tuning on the parameter to find the best quality. The dataset used in this research was obtained from Kaggle, it contains validated audio files of male's and female's voices. After extracting the MFCC feature, it will be inputted into CNN to learn its pattern. Finally, the model will be tuned and find the best quality.

Keyword: CNN, voice gender recognition, MFCC