ABSTRACT

One of the AI models in the field of Computer Vision is CNN (Convolutional Neural Network), CNN is an AI model that can detect an image, examples of its use are object classification in images or object detection in images. Therefore, we created an Android-based application, with the aim of detecting faces on a KTM, in order to find out who the KTM belongs to. Initially, the real problem was with face detection, so when someone needs to be identified, this CNN model will be very helpful, because the identification process is getting easier. So, we created a face detection application to make face recognition easier. However, because the data collection process was quite difficult, so we only used facial images from KTM for the dataset used. From this problem, it has been quite helpful for the identification process. The CNN model needs to be trained so that the model can recognize faces from the dataset. However, it is possible that the detection is wrong enough to lead to wrong identification. So, it needs further development. The results of the training model are exported to TF-Lite format and used to be included in Android Studio, for making the application.

Keyword : *CNN, AI, Training, Computer Vision, Application, Object Detection.*