


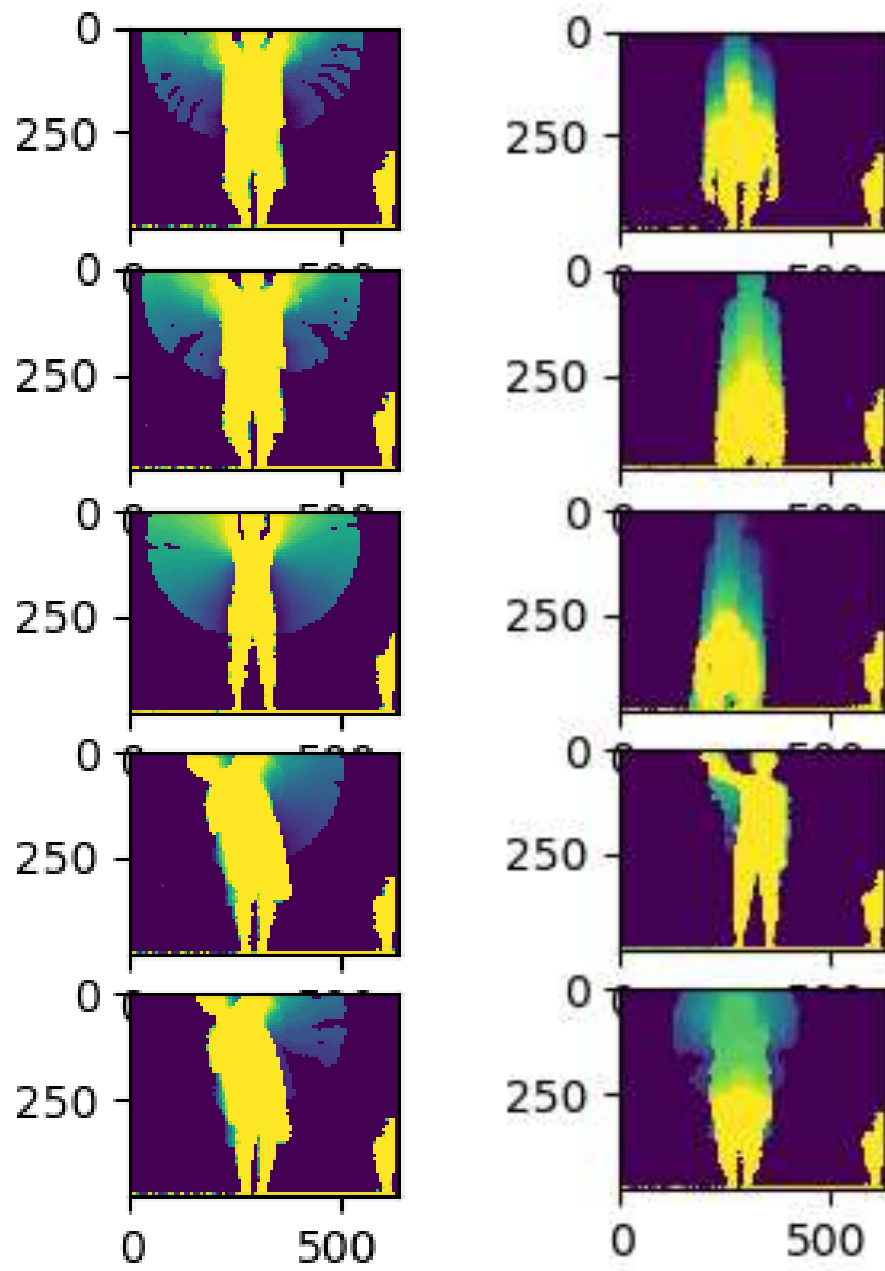


# PS5

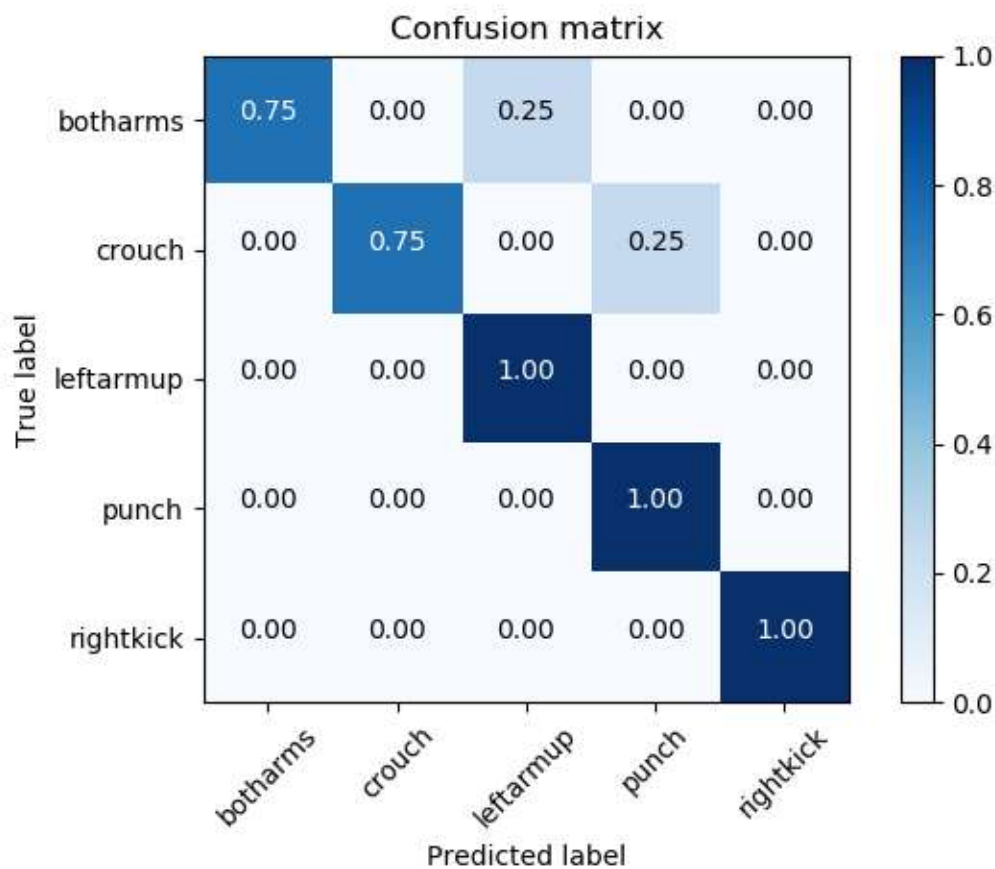
## MHI Generation

Both Arms	Left Arm Up	Kick
		

## 4-NN on Hu Vectors



## Classification Performance



The 2 errors that the classifier made during leave-one-out cross validation were when classifying both arms up and crouch. When looking at the specific misclassified images, it makes sense as to why we see these as mis labels. Both arms up and left arm up have certain cases that look similar in the MHI, and the crouch movement that was misclassified was an instance where the subject's arms were moving around on the way down. Due to such a small number of data, and the fact we are using 1-nearest neighbor to classify the images, we are bound to find error during classification, especially when there is 'noise' injected into the image through extra/non-consistent movement.