## Find a new feature by trial and error

Date: 2015.10.22

Tags:

Made by: Asutosh SATAPATHY

Goal: To find a new feature which is suitable for the application by trial and error.

## **Procedure:**

We have a lot of information being extracted from the libraries 'scikit-images and mahotas'

At this point, I have observed that it is very difficult to get an increase in the efficiency. Getting 40% efficiency is very easy. It can be easily done by the rescaled pixels and the geometric properties of the images.

But moving forward, getting each level of efficiency is getting harder. I don't have expertise in image recognition. Hence, one of the strategies at this point is Brute force Trial and Error.

This strategy can be applied as I have already reduced the test data set to 4000 instead of initial 30,000 images.

## Results:

This trial and error method took 5 hours in all. But I was able to identify three more crucial features

- 1. Zernike Moments
- 2. Harallic Features
- 3. Parameter Free Threshold Adjacency Statistics

 $elabid: 20151024\hbox{-}fb84b1ce3d5b04439972b8246fb03dee6cb84dfc \\$ 

link: https://localhost:443/elabftw/experiments.php?mode=view&id=12