

Intro

Assignment uses jupyter notebook with `python=3.7.0` and `opencv-python=3.4.2.17`. `main.py` uses functions present `old_helper.py` that contains the implementations of some custom functions.

Usage:

The python file `main.py` contains the Questions with the corresponding parts. Run it and the image results would be stored in the folder `results` automatically.

Assumptions:

- I have used number of octaves to be equal to `4`.
- I have used number of scales to be equal to `5`.
- I have used the initial sigma = `1`.
- I have used the factor `k` for calculating the different sigmas to be $= \sqrt[2]{2}$.

Results:

For the results look at the folder named `results` to have a look at the files generated. The file names are such that they correspond to the octave and the scale they are from.

Also the `dicriptors` I got are saved as a numpy array file in `results`.