

Homework 4

Due: 2021-11-10 (Wed.) 8pm

Introduction

In this assignment, you will explore how to use a pretrained model on ImageNet to implement Style Transfer.

- Explore various applications of image gradients, and implement techniques for image style transfer.

- **Setup**

- **Start IPython**

- you should start the IPython notebook from the `homework_4` directory, with the `jupyter notebook` command.

- **Experiments**

There are `### START CODE HERE` / `### END CODE HERE` tags denoting the start and end of code sections you should fill out. Take care to not delete or modify these tags, or your assignment may not be properly graded.

- **Q1: Style Transfer (50 points)**

- In the Jupyter notebooks `StyleTransfer-PyTorch.ipynb` you will learn how to create images with the content of one image but the style of another.

- **See the code file for details.**

- **Submission**

You need to accomplish the following files:

- 1) **Convolutional Neural Networks**

- `StyleTransfer-PyTorch.ipynb`

- 2) **Report**

- Please convert your experiment report to PDF format.
- You just need to upload all your code and report and do not upload datasets.