Semester 1, 2024 Tutorial 4

COMP/ENGN 4528/6528: Computer Vision

Question 1

PyTorch installation

- 1. PyTorch will be used throughout Tutorial 4 and Assignment 2. Installing PyTorch can be complicated, depending on your operating system, graphic cards, etc. PyTorch supports GPU acceleration (CUDA for NVIDIA, ROCm for AMD and Metal for Apple silicon chips). Your options for installation are listed below.
 - (a) (Personal GPU) If you have access to GPU resources, we suggest you install the corresponding GPU version of PyTorch.
 - (b) (Personal CPU) You can install the CPU version of PyTorch. However, when training wide or deep neural networks, it would take a long time.
 - (c) (Google Colab) Google Colab provides free access to decent GPU resources (NVIDIA T4), and can significantly boost your the training speeds.
 - (d) (Backup) If none of the above work for you, and you have asked your tutors for help, we have a backup option via the School's compute cluster. However, it is much more difficult to use and configure than Google Colab, so it is not recommended.
- 2. If you have any problem installing PyTorch, please feel free to ask your tutor for help!

Question 2

PyTorch introduction

1. Complete the coding questions in COMP4528_lab4_code.ipynb.