Assignment 2: Deep Learning Project

Start Assignment

Due 13 Oct by 23:59 **Points** 50 **Submitting** a file upload **File types** pdf **Available** 6 Sep at 9:00 - 20 Oct at 23:59

Overview

In this assignment, you will design and create an end-to-end deep learning system for a real-world problem. This assignment is designed for you to apply and practice skills of critical analysis and evaluation to circumstances similar to those found in real-world problems. *This is an individual project*.

In this assignment you will:

- Design and Create an end-to-end deep learning system.
- Analyse and Evaluate the output of the algorithms.
- Research into extending techniques that are taught in class.
- Provide an ultimate judgement of the final trained model(s) that you would use in a real-world setting.

This assignment has the following deliverables:

- A report (of no more than 3, plus up to 2 for appendices) critically analysing your approach and ultimate judgement.
- Your Python scripts, Jupyter notebooks, and software used to build your learning system and produce the models and results.

More details and data are available below:

- Assignment 2 specifications (<u>PDF (https://rmit.instructure.com/courses/107388/files/33737104?</u>
 wrap=1) \(\psi \) (https://rmit.instructure.com/courses/107388/files/33737104/download?download_frd=1)
)
- Marking Rubric (<u>PDF (https://rmit.instructure.com/courses/107388/files/30334067?wrap=1)</u> (https://rmit.instructure.com/courses/107388/files/30334067/download?download_frd=1))
- Assignment 2 Questions

Data Sets:

• Subtask 2: <u>Data (https://rmit.instructure.com/courses/107388/files/33737114?wrap=1)</u> ↓ (https://rmit.instructure.com/courses/107388/files/33737114/download?download_frd=1)

Submission Details

Please read this carefully before submission.

You'll need to submit two things:

- Your report, in pdf format
- Your code and other auxiliary files, zipped to a zip file

Canvas does not allow to have multiple file upload per assignment. To get around this, you'll see there are multiple assignment 2 pages.

- 1. This page Where you will submit your report (as a PDF). This runs Turnitin, and will not accept zip files, so please only submit your report here.
- 2. The Code Page where you submit your Jupyter Notebooks, python scripts and all related code files (as a ZIP).

Remember try not to leave it to the last minute to submit your assignment.

Important Dates & Notes

Weight: 50% of the final course mark Specification Released: Week 8

Due Date: 5.00 pm, Friday 13 October 2022 (online submission) **Learning Outcomes**: This assignment contributes to **CLOs**:

(https://rmit.instructure.com/courses/107388/pages/welcome-to-deep-learning-course-information-and-

outline) 1, 2, 3 & 4