CITS5508 Machine Learning
Semester 1, 2024

Assignment 1

Assessed, worth 15%. Due: 8pm, Friday 12th April 2024

1 Rubric

The assignment questions involve analyzing data. You should present a well-organised report and aim to write concisely.

Please read the assignment instructions carefully when preparing your code and report. The web or the textbook and related GitHub repository provide many example codes (from the Jupyter Notebook files) that you can borrow, but they are not all relevant to what is required in the assignment. For instance: when you are asked to show a confusion matrix or any performance metric, you should not provide a classification report. If the code you used from the web gives you a classification report, you should replace it to output what is asked in the assignment.

Consider these aspects as examples of what can prevent you from earning full marks in a question:

- Plots and figures: Your report should include appropriate and well-presented visualisations that are meaningful to the analysis. All your diagrams/plots should have proper titles, axis labels, values, etc., to help the reader understand what you are plotting. For the confusion matrix, not showing the class names makes the confusion matrix completely useless.

- Application of techniques: Your report should include the correct use of the machine learning techniques and the interpretation of the results obtained from these techniques.

- Presentation of results: Describe the results of your analysis and their interpretations. Software output is not a valid answer. You must format and present your answer appropriately (tables, graphs, important measures, etc.). You should not add irrelevant information when presenting the results. Provide meaningful comparisons.

- Discussion: Based on your results, describe the conclusions of your analysis.

- Overall: Do not report out a long list of numbers if you do not explain what they are and what they mean. Do not generate plots after plots without explaining what they were doing or their purposes. Instead, think about the best way to display/illustrate what has been asked. Pay attention to all details, including the graph labels, presentation quality, and clarity. Answer what is asked in each item.

2 Plagiarism and Penalty on late submissions

See the URL below about late submission of assignments:

https://ipoint.uwa.edu.au/app/answers/detail/a_id/2711/~/consequences-for-late-assignment-submission

Plagiarism: In accordance with University Policy, you certify that all work submitted for this assignment is your own and that all material drawn from other sources has been fully acknowledged.