|  | **Student** | | **AKASH SINGH PANWAR** | | **Matriculation Number** | | | **(2330698)** | **Module number** | **CMM536** | | |
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| **Marker(s)** | | Carlos Moreno-García and Rezowan Shuvo | | | |  | **Provisional Grade** (s*ubject to ratification by the Assessment Board*) | | | | **A** |
|  | **GRADE** | | **A** | **B** | **C** | | | **D** | **E** | **F** | | |
|  | **DEFINITION / CRITERIA (WEIGHTING)** | | **EXCELLENT**  Outstanding  Performance | **COMMENDABLE/VERY GOOD**  Meritorious  Performance | **GOOD**  Highly Competent Performance | | | **SATISFACTORY**  Competent  Performance | **BORDERLINE FAIL** | **UNSATISFACTORY**  Fail | | |
|  | **EXPERIMENT 1**  **2 marks** | | Full and correct implementation of the experiment as requested. | Same as A, except for one minor error (e.g., but not limited to, metrics/values explained incorrectly, improvement not adequately explained/justified, reflection slightly unclear). | Same as A, except for one major error (e.g., but not limited to, data loaded incorrectly, issues on the validation splits and/or implementations, metrics calculated incorrectly). | | | More than one error. | The experiment was implemented incorrectly and/or there is an unclear reflection on the experiments which shows that the student has minimal understanding of the code. | No implementation. | | |
|  | **EXPERIMENT 2**  **2 marks** | | Full and correct implementation of the experiment as requested. | Same as A, except for one minor error (e.g. but not limited to, metrics/values explained incorrectly or reflection slightly unclear). | Same as A, except for one major error (e.g. but not limited to, data loaded incorrectly, issues on the testing, metrics calculated incorrectly). | | | More than one error. | The experiment was implemented incorrectly and/or there is an unclear reflection on the experiments which shows that the student has minimal understanding of the code. | No implementation. | | |
|  | **EXPERIMENT 3**  **3 marks** | | Extremely original and interesting proposal close to scientific and professional standards. State-of-the-art methods are used to present an improvement, with students showing full comprehension of machine learning and computer vision. | The improvement is implemented very well; it has many novel elements, but there are minor errors in the understanding or implementation of the techniques. It is clear to the marker that something could be improved with little to no effort. | The improvement is good and sufficient for the problem, showing that the student knows the basic concepts shown in class and can give an extra step to show a competent answer to the problem. | | | The solution uses the basic techniques seen in the lecture with an appropriate implementation but doesn’t offer any novelty. | The solution is not original, and the student demonstrates minimal understanding of the code. | No implementation. | | |
|  | **Report Structure and Presentation**  **1 mark** | | The notebook is presented in a professional manner, with headings, links, and markdown tags. The code is presented neatly. All cells are in the right place and run sequentially with the right numbers in the code cells. All references are appropriately cited. | Same as A, but with a minor issue that the marker can spot. | Same as A, but with a major issue that the marker can spot. | | | The notebook has a basic appearance, but the layout is simple and doesn’t engage the reader. | The notebook is hard to read and confusing for the marker. | The notebook is corrupted or impossible to read/follow. | | |

***Coursework received late, without valid reason, will be regarded as a non-submission (NS) and one of your assessment opportunities will be lost.***

| What were the strengths of my work? |
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| I appreciate how you provided references and compared different models. Your description of findings is clear and informative. Cross-validation is crucial for evaluating model performance robustly, as it reduces the risk of overfitting and provides more reliable estimates of performance.  Regarding GitHub usage, implementing early stopping leads to more efficient training and saves computational resources and time. |

| What could I have improved? (specific to assessment) |
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| For Task 1, I would like to see the data distribution of each fold in 5-fold cross-validation. Additionally, visualizing incorrectly predicted samples would help justify the model's performance.  For Task 2, in output cell 13, I would appreciate more discussion on why the model performs poorly.  For Task 3, addressing model stability can be achieved by generating more data with image augmentation. Moreover, I would like to see more discussion on the layers. Consider adding masked images for better results. |
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| How can I improve my performance in future assessments? |
| Improving visualizations can enhance understanding and presentation of findings.  Addressing the instability of the model, particularly in the 3rd task, is crucial. This instability implies that the model may not generalize well to unseen data or may be sensitive to variations in the training data. By addressing these areas of improvement, the work can become more robust, impactful, and effective. |
| *Please ask your Module Coordinator if you require any further feedback about your assessment.* |