|  |  |  |  |
| --- | --- | --- | --- |
| **Module Title** Computer Science Activity Led Learning Project 1 | **Ind/Group** OCTJAN | **Cohort** Semester 1 | **Module Code** 4006CEM |
| **Coursework Title (e.g. CWK1)**  + Component Por – Project Contribution  + Component Viv – Python Viva  + Component Cw – Project Showcase | | | **Hand out date** 1st Oct 2018 (Week 1) |
| **Lecturer** Dr Simon Billings | | | **Due date** 30th Nov 2018 (Week 9) |
| **Estimated Time:**  + Groupwork 54 Hours  + Assessment 6 Hours  **Word Limit:** Guidelines Only | **Coursework type:**  + Por – Portfolio Demonstration  + Viv – Viva Voce  + Cw – Portfolio | | **% of Module Mark**  + Por – Weight 33.33%  + Viv – Weight 33.33%  + Cw – Weight 33.33% |
| **Submission Arrangement Online via CUMoodle – File types and Method of Recording:** PDF/DOC  **Mark and Feedback:** Formative feedback will be available during tutorial sessions. Summative feedback will be provided during the viva, with marks and supplementary comments available three weeks after the vivas. | | | |

|  |
| --- |
| **Module Learning Outcomes Assessed:**  **B1: COMPUTATION THINKING:** develop and understand algorithms to solve problems; measure and optimise algorithm complexity; appreciate the limits of what may be done algorithmically in reasonable time or at all.  **B2: PROGRAMMING:**  create working solutions to a variety of computational and real world problems using multiple programming languages chosen as appropriate for the task.  **B3: ARCHITECTURE:** understand the underlying architecture that supports the modern computer, including traditional compilers and operating systems, but also the modern infrastructure of the internet and mobile applications.  **B6: PROFESSIONAL PRACTICE**:  understand professional practices of the modern IT industry which include those technical (e.g. version control / automated testing) but also social, ethical & legal responsibilities.  **B7: TRANSFERABLE SKILLS:**  apply a wide variety of degree level transferable skills including time management, team working, written and verbal presentation to both experts and non-experts, and critical reflection on own and others work.  **B8: ADVANCED WORK:** apply the above to advanced topics selected according to the interests of individual students. |

**Group Project**  
As part of a group, you will conduct a software development project on a topic provided by your tutor using the skills you have developed through your program of study.

1. **Project Contribution (Por) [ 5 × 20 = 100 Marks | Weight 33.33% ] See Marking Rubric**  
   While the project is undertaken with a group, your contribution will be assessed individually. You will have regular opportunities to demonstrate your individual work, along with the tools and processes you are using, during your timetabled sessions. Your final mark will be the total of your five best marks from different weeks.
2. **Python Viva (Viv)** **[ 100 Marks | Weight 33.33% ] See Marking Rubric**  
   At the conclusion of your project you will submit a link to your final prototype and a document containing all the programming code you personally wrote for the project (make sure to include all your code, even if it wasn’t integrated into the project, and to highlight and reference any code not written by you). You will then be invited to give a demonstration of your project and answer questions to demonstrate your understanding of the programming code you submitted.
3. **Project Showcase (Cw)** **[ 100 Marks | Weight 33.33% ] See Marking Rubric**  
   As an individual, create an online portfolio to display your university work and personal projects to potential employers and populate it with work showcasing this project (Guideline: 1000 Words). You may create your online portfolio using tools of your choice, though we recommend [linkedin](http://www.linkedin.com) as it is popular with recruiters. If you are considering using an online tool, take the time to review their policies on personal data and make an informed decision. If you decide to use traditional software or online tools vetted by the university, you will not be disadvantaged in the assessment.

The entry showcasing your project should include: a brief introduction to the project and your final prototype; a summary of your contribution to the project and the skills you have developed; and a brief conclusion which reflects on and evaluates the project. Make sure to spend time refining your showcase, giving particular consideration to the presentation and the use of images – which need to be high impact to justify the space they occupy. You must include the project that you worked on as part of this module, but should also consider adding previous work and personal projects which show off the best of your abilities.

|  |
| --- |
| **Notes:**   * You are expected to use the [CUHarvard](https://curve.coventry.ac.uk/open/file/bdfb947c-9d43-48d3-8ec8-f511682e1dd1/1/The%20CU%20Guide%20to%20Referencing%20in%20Harvard%20Style.pdf) referencing format. For support and advice contact [The Centre for Academic Writing](http://www.coventry.ac.uk/study-at-coventry/student-support/academic-support/centre-for-academic-writing/?theme=main) (CAW). * Please notify your registry course support team and module leader for disability support. * Any student requiring an extension or deferral should follow the [university process for deferrals and extensions](https://share.coventry.ac.uk/students/Registry/Pages/Deferrals-and-Extension.aspx). * The University cannot take responsibility for any coursework lost or corrupted on disks, laptops or personal computer. Students should therefore regularly back-up any work and are advised to save it on the University system. * If there are technical or performance issues that prevent students submitting coursework through the online coursework submission system on the day of a coursework deadline, an appropriate extension to the coursework submission deadline will be agreed. This extension will normally be 24 hours or the next working day if the deadline falls on a Friday or over the weekend period. This will be communicated via email and as a CUMoodle announcement. |

**MARKING RUBRICS**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **MARKS** | **PROJECT CONTRIBUTION (Por) [ 5 × 20 Marks | Weight 33.33% ]** |  | **PYTHON VIVA (Viv) [ 100 Marks | Weight 33.33% ]** |  | **PROJECT SHOWCASE (Cw) [100 Marks | Weight 33.33% ]** | **GRADE** |
| **20** | Exceptional – As below, but the work considerably exceeds the level of study, comparable with strong second or third year students. |  | As below, but you: implement complex algorithms or data structures using abstract datatypes; execute complex manipulations of external data (API/DB); or gracefully handle errors in network communication. Demonstrate multiple elements for higher marks. |  | An engaging account of the project, demonstrating excellence with several skills, and identifying useful lessons through reflection and evaluation. | **First**  **≥70** |
| **15** | Strong – You’re making a considerable contribution to the group, pushing yourself to learn new skills and master existing ones. |  | As below, but you: utilise common algorithms and libraries, and perform simple dynamic operations on external data (API/DB). |  | A readable account of the project, demonstrating competence with several skills, and identifying useful lessons through reflection and evaluation. | **Upper Second**  **60-69** |
| **10** | Average – You’re making a reasonable contribution to the group, working within your comfort zone but learning little new. |  | You can create new code to solve problems. Your code is broken into sensible functions which make competent use of variables, loops, and conditionals. |  | A readable account of the project, demonstrating competence with several skills. The account is primarily reflective, focusing on what happened. | **Lower Second**  **50-59** |
| **5** | Weak – Your contribution to the group is limited, as is your progress. The quality or quantity is below what is expected. |  | You can adapt existing code to solve new problems. Your code is broken into functions with basic use of variables, loops, and conditionals. |  | A readable account of the project, demonstrating modest ability with at least one skill. The account is primarily reflective, focusing on what happened. | **Third**  **40-49** |
| **0** | None – You’re making no meaningful contribution to the group and have little to nothing to show. |  | You can make simple changes to existing code, but this is insufficient to solve new problems. You have not demonstrated programming fundamentals. |  | An incomplete or crude account of the project, that typically demonstrates at least one skill relevant to the program of study. | **Fail**  **<40** |
| **Late** | 0 |  | 0 |  | 0 | **Late** |

*These rubrics are intended only as a guide for academics and students. They should not be viewed as a checklist. The inclusion of the elements presented does not necessarily mean that the work has been completed to a high standard. Conversely, marks may be awarded for elements not in the rubric where the work is deemed meritorious. If in doubt consult the module leader.*