

## Overview

All students enrolled in the CMPG 323 module will be growing and enhancing skills across different concepts, tools and technology stacks. Due to the nature of CMPG 323, planning will form a crucial part of the module as it will guide all students towards allocation of time to the tasks to be completed throughout the semester. As such, including all work and scoping it accurately will form an important part of the foundation for succeeding in the module.

All students will be expected to display their acquisition of skills in the following areas:

- Agile (Scrum)
- Source Control
- Cloud
- Application Programming Interfaces (APIs)
- Design & Architecture Patterns
- Testing
- Robotic Process Automation (RPA)
- Data Visualisation & Reporting

Sundry skills will also be acquired during the class time associated to the module and as such, those classes should also be added to each student's module semester plan. These skills will be aimed at preparing students for workplace readiness.

Currently, all information is provided through eFundi in the form of a semester plan. The information provided should be broken into more detail so that each student understands what is expected from them for each submission and can more accurately plan how long each requirement should take them to complete.

## Requirements

Functional requirements refer to the functionality that a system must have and how the functions should be performed. Non-functional requirements refer to the aspects of a solution that have an impact on the quality attributes of a system (or platform). These non-functional requirements are deemed as supportive requirements to ensure that the functional requirements are implemented appropriately and according to good software practices.

**Please note:** it will be important for you to keep the ReadME file updated throughout the semester as you will be evaluated on the content of the ReadME file as part of your Portfolio of Evidence (POE).

Feature	Stories	Tasks (to be broken down further)	Priority
GitHub Repository	Create and Configure GitHub Repository	Create a repository named 'CMPG 323 Overview - <add your student number>'	1
		Create the following Milestones: <ul style="list-style-type: none"><li>- Project 1 Submission: Deadline – 12 August</li><li>- Project 2 Submission: Deadline – 5 September</li></ul>	2

		<ul style="list-style-type: none"> <li>- Project 3 Submission: Deadline – 26 September</li> <li>- Project 4 Submission: Deadline – 17 October</li> <li>- Project 5 Submission: Deadline – 31 October</li> <li>- Exam (POE) Submission: No deadline</li> </ul>	
		Create the following Labels: <ul style="list-style-type: none"> <li>- Class</li> <li>- Project</li> <li>- Training</li> <li>- &lt;any other labels you might find relevant&gt;</li> </ul>	2
	Add a ReadME.md file to the repository	In the ReadME.md, address which repositories will be created and used for each project	1
		In the ReadME.md, provide a diagram explaining project and repository context and how they are integrated	3
		In the ReadME.md, explain the branching strategy to be used within each project	3
		In the ReadME.md, explain the use of a .gitignore file within each project	3
		In the ReadME.md, explain the storage of credentials and sensitive information	3
GitHub Project	Create and configure GitHub project	Create a GitHub Kanban project	1
		Link the GitHub repository to the project	2
		Ensure that the project is named appropriately	3
		Ensure that the project has a description adequately describing the project	3
		Add the following columns: <ul style="list-style-type: none"> <li>- Linked Assessment (field type = text)</li> <li>- Due Date (field type = date)</li> <li>- Sprint (field type = single select; add all 8 of the sprints as options with sprint start and end date)</li> <li>- Effort (in Hours) (field type = number)</li> </ul>	2

	Create and populate project views	Create a table view within the project named 'Tabular View' <ul style="list-style-type: none"> <li>- Add Milestone, Label, Linked Pull Request and Repository as fields to the view</li> <li>- Hide the Assignees field</li> </ul>	2
		Create a board view within the project, named 'Status View' <ul style="list-style-type: none"> <li>- Group by Status</li> </ul>	2
		Create a board view within the project, named 'Sprint View' <ul style="list-style-type: none"> <li>- Group by Sprint</li> </ul>	2
		Create a table view within the project, named 'Linked Assessment View' <ul style="list-style-type: none"> <li>- Group by Linked Assessment</li> </ul>	3
		Create an additional customised view that provides you with additional insight into your semester progress	4
		Populate the 'Tabular View board' with the following as tasks: <ul style="list-style-type: none"> <li>- All CMPG 323 classes</li> <li>- All CMPG 323 training time required to upskill and complete projects</li> <li>- All estimated tasks required to complete all CMPG 323 projects</li> <li>- All CMPG 323 project submissions (with deadlines attached to milestones)</li> <li>- All tasks associated to completing the CMPG 323 Portfolio of Evidence (POE)</li> </ul>	1
	Create and configure project charts	Add the following charts to the project: <ul style="list-style-type: none"> <li>- Number of Items by Label</li> <li>- Number of Items by Status</li> <li>- Number of Items by Sprint</li> <li>- Burndown Chart</li> </ul>	2

## Reading Materials

There are multiple aspects of the abovementioned scope that may be covered by

- An example of the board can be found here: <https://github.com/users/JacquiM/projects/16>
- GitHub Repository Documentation: <https://docs.github.com/en/repositories/creating-and-managing-repositories/about-repositories>
- GitHub Project Documentation: <https://docs.github.com/en/issues/trying-out-the-new-projects-experience/about-projects>
- Manage the lifecycle of your projects on GitHub: <https://docs.microsoft.com/en-us/learn/paths/manage-project-lifecycle-github/>
- What is a burndown chart: <https://www.visual-paradigm.com/scrum/scrum-burndown-chart/>
- Introduction to Git: <https://docs.microsoft.com/en-us/learn/modules/intro-to-git/>

## Submission Details

The scope of this project has been issued as an **individual** assignment. Please note that you will need to use GitHub for this project.

**Please Note:** Ensure that your project has been shared with the users **autoruby**, **JacquiM** and **marijkec** so that your project can be marked.

**Submission:** Submit your CMPG 323 Project 1 by providing the relevant information through the [Project 1 Submission Microsoft Form](#).

**Deadline:** 17h00 on 18 August 2022 (please note there are no alternative or late submission dates – if you miss this deadline you will forfeit the opportunity)

### What to submit:

1. Provide the URL to your GitHub Profile
2. Provide the URL to your Overview GitHub Repository
3. Provide the URL to your GitHub Project
4. Do not forget to complete your sprint retrospective:  
<https://forms.office.com/r/aE0b1NmWyM>

## Marking Considerations

Please take note of the following considerations that will form part of the marking and moderation process:

- A rubric will be provided separately
- Failure to upload any of the requirements for submission will result in 0
- Failure to complete this as an individual assignment will result in 0
- Failure to use GitHub will result in 0.