

Health Care System

02160 Agile OO Software Development

Project Plan

Group name: KAPJAK

Group members:

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Agile Framework

The Lean development framework will be used for this project. More specifically, making a framework for the code which will allow us to split the individual tasks while ensuring that the individual components function together is the start. It is necessary since always being able to work together is not realistic. Communications through Slack to avoid overlapping work will be conducted frequently, it can also ensure members learn from each others experiences. Slack will be useful in maintaining consistent communication and organisation despite conflicting schedules outside of class. The lean agile framework suits better due to busy schedules outside of class for each member, thus members are able to work alone at home and come together each week.

In order implement the lean agile framework, taking time to plan out the project (user stories, class diagrams, etc) are necessary in the beginning, so each member can work on their own portions straight away.

A plan to implement a Kanban strategy for keeping track of members' tasks will ensure individual task responsibility be as explicit as possible as well as collective progress. Trello is to be used for organising tasks among members.

Plan for backlog management

The plan is to manage backlog by keeping user stories in a prioritised list in Trello. Furthermore, all tasks to be completed on the project will also be managed using Trello by creating different boards.

Using Trello, we will be able to keep track of what is being worked on by the different mem-

bers, and they will need to log their progress on there as well. As the project goes on, the team members should also ensure that only relevant items remain on the backlog. So if a user story is no longer relevant, it will be removed to avoid creating an unnecessarily large backlog.

Task planning activities

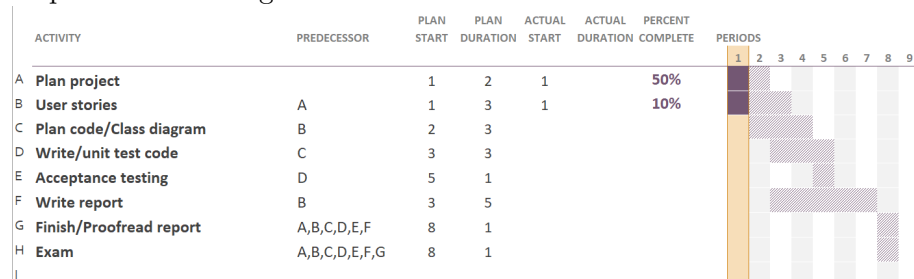
We will check in every Wednesday during the exercise session to regroup and review our past week's progress. We will also use this time to talk over what the next steps are and how we will divide up our tasks for the following week. Tasks can be taken on by individuals if they find it particularly interesting or specific to their skills, but any tasks that are unclaimed will be assigned to group members who do not already have a substantial workload for the project for that week.

Definition of done

The user stories will be considered satisfied and accepted when all requirements are met and when relevant tests are passed. It is important that completed tasks have no errors or mistakes which could cause problems later in the project, so all tasks need to be tested and approved by group members before it can be marked as officially done. More specifically, any completed work should be proofread and verified by another team member before being considered done to ensure that an individual's work is understandable and high quality. This also serves to help familiarise everyone with all aspects of the project.

Estimation and scheduling practices

We will use a Gantt chart to visualise our overall plan and progress for the project week by week. The Gantt chart offers a comprehensive view of key steps in the project and which parts are dependant on others. Each week, we will also take a more focused approach to planning by utilising the Trello platform. Trello allows us to assign tasks to individuals or sub-teams and offers helpful task tracking.



Test strategy

Unit testing:

We will employ unit testing to test all methods individually while writing them. Afterwards, a second group member will also need to verify the test for it to be considered complete.

Acceptance testing:

When all methods and classes have been written, we will use acceptance testing to check that the overall code works and satisfies the individual user stories. For the overall acceptance testing to be considered done, all group members will need to agree that the final products satisfies the requirements and the user stories.

Improvement practices

Take time each week to discuss not only the code itself, but the overall progress with the project and how the use of the agile framework is going. Peer-reviewing completed sections of code to look for potential errors or areas for improvement will be conducted. This also encourages better readability of code. Furthermore, since it is so important to minimise waste in the Lean development framework, having an approval process for completed code will help to identify where waste could be occurring in the project.

Agile mindset

To our group, an agile mindset is represented by an emphasis on planning and efficiency in a team to maximise results and quality. In the context of this project, it is important to be dedicated to the established plan and expectations. The agile mindset by being as deliberate as possible will be presented with the planning/organisation rather than just diving right into coding. It is understood that this assignment will unquestionably be easier and higher quality with proper organisation.

Team plan

What we want to achieve: With this project, it is hoped to deliver on the objective of the project as well as work collaboratively in a way which not only solidifies our objected oriented programming skills, but also the overall project and teamwork skills.

Plan for meetings: At this early stage of the project, it is decided to establish that the group would meet on Wednesdays after the lectures in the lecture room. At some points it may need to coordinate meetings outside of class, but Wednesdays will probably be sufficient for the time being.

Expectations for team members:

- Show up on Wednesdays or notify the group in case of absence and be proactive about catching up on missed information/planning.
- Communication is vital to the group's success. It is important to let people know if you have issues. Don't keep them to yourself towards any deadlines.
- It is expected that all code is commented (at least some functional parts) so that code can be shared and interpreted between group members.
- When writing code stick to the Google Java style guide so that the code is more standardised across all contributors.

If a team member is slacking: If the group feels that someone is not doing enough work, that individual will be assigned more work going forward to even out the load. Specifications of each work will be presented the final project report, which will reflect all workloadst will be reflected there.

Tools:

- Slack: communicate and decide who works on which tasks
- Trello: Create board for user stories(Backlog) and one to break the project into smaller tasks and keep track of them.