Project plan

Date	**:**	**Date**
Version	**:**	**Version**
State	**:**	**State**
Author	**:**	**Author**

FH University of Applied Sciences TECHNIKUM WIEN

Fontys University of Applied Sciences

Version history

Version	Date	Author(s)	Changes	State
1	14 September 2021	Neyko Neykov, Kristian Kolev	Basic structure and information	Incomplete
2	22 September 2021	Katrin Tarneva	Improving layout, adding bulletpoints 1.4,3,4,5. Improving bulletpoint 2.	Work in progress

Distribution

Version	Date	Receivers

Contents

1.Project assignment

1.1 Description

The project was made in collaboration with the students from Fontys and the students from the FH Technikum Wien. The gathered team decided to develop the application “Students4Students” which is aimed to assist students with finding restaurants, bars, etc. In this project we will focus on the current situation with the students and why they need this solution and functionalities of the application. In this document the goal of the project will be introduced together with the deliverables and the non-deliverables. Since we will be working in sprints, this version of the project plan will touch upon every sprint.

1.2 Project goal

When students go abroad to study, they want to know what the best places to eat, drink or just hang out are. That is something very important for students since the best rated places may not be the best option for them since the available platforms that are currently on the market provide the opportunity for everybody to rate and comment on all the available spots that are on the map which is not suitable for everyone especially students. This is where Students4Students comes in. Our goal as an independent software development team is to create an application that will help students around the world, that will improve their experience wherever they are. The application that we are developing will be accessible to everybody to look at briefly but only the students will be able create an account and contribute to the community with commenting and rating places.

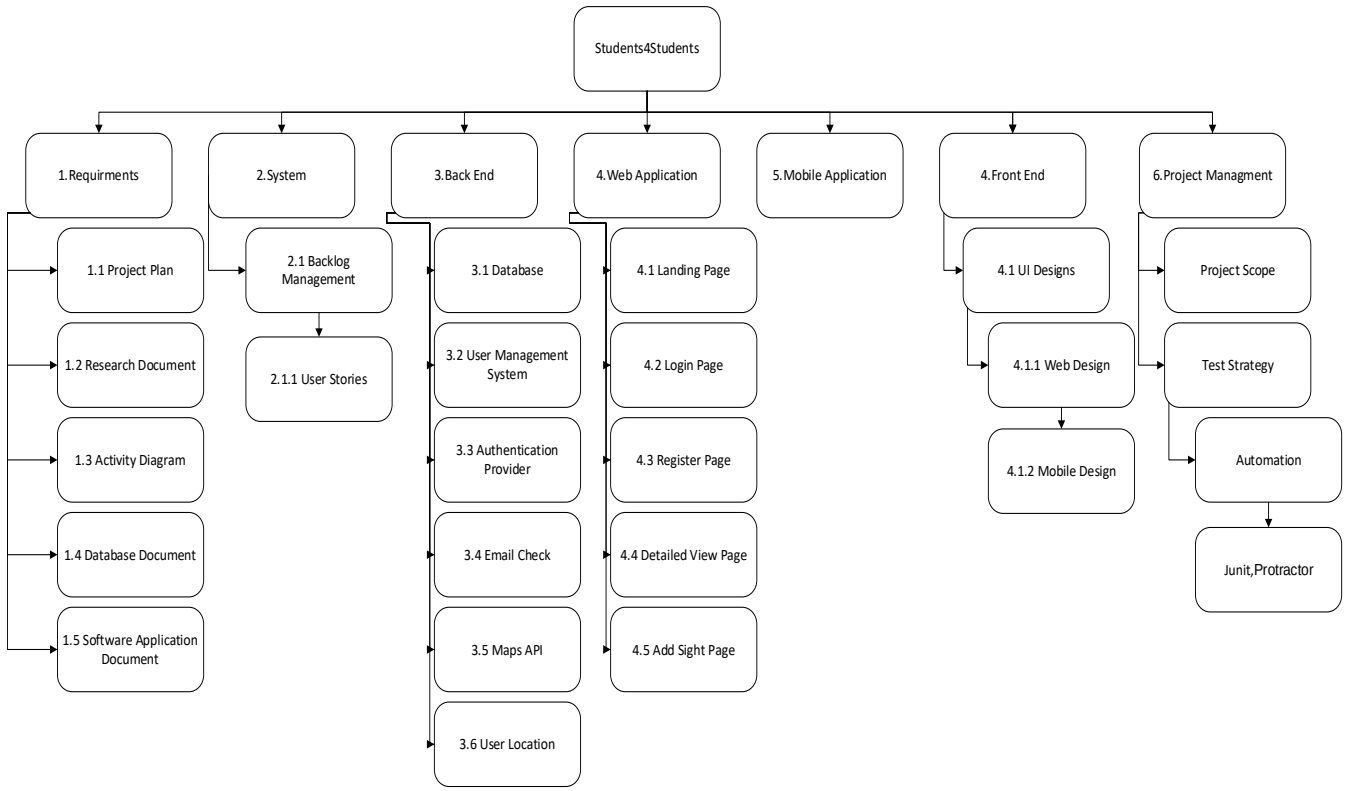
1.3 Scope and preconditions

Inside scope:	**Outside scope:**
1	1
2	2

1.4 Strategy

The approach that we have for this project is to use the agile framework SCRUM. The reason why the SCRUM methodology will outperform the other frameworks of working is because we will have a daily/weekly stand-up (meetings with the whole team) that will help us improve our work. After every sprint there will be a retrospect of the sprint where we will discuss what we did and what we can improve. SCRUM will allow us to prioritise the tasks better user our backlog maintained and approved by our Product Owner, adapt to any changes that may occur during the development.

1.5 End Products



2. Project organisation

2.1 Stakeholders and team members

Name	Role and function	Availability
Katrin Tarneva (k.tarneva@student.fontys.nl)	Development team	Tuesday, Saturday, Sunday
Neyko Neykov (n.neykov@student.fontys.nl)	Development team	Tuesday, Saturday, Sunday
Petar Paprov (p.parpov@student.fontys.nl)	Development team	Tuesday, Saturday, Sunday
Kristian Kolev (k.kolev@student.fontys.nl)	Development team	Tuesday, Saturday, Sunday
Michael Fahrafellner (wi19b067@technikum-	Project Owner	Saturday, Sunday

wien.at)		
Konstantin Kormesser (wi19b058@technikum-wien.at)	SCRUM Master(group)	Saturday, Sunday
Alexander Feiertag (wi19b054@technikum-wien.at)	Development team	Saturday, Sunday

2.2 Communication

In this project the team members are from two different countries. The students from Austria arrived in the Netherlands for two days so we can meet them and begin working on the project. We settled on an idea and tools. After those two days everything will be moved online. The main application of communication that we have established Discord. In Discord we will be having a meeting every week on Tuesday, the meetings will become more frequent when we are close to a deadline. We also use Discord to chat via text to give a more frequent feedback. Our teacher has access to the Discord server to join us for the meetings on Tuesday. The student form the Fontys side will have an onsite meeting every week (Wednesday) to give an overall update with the progress that we've made as a group. We will follow an organised schedule for meeting with each other and our teachers for feedback. Of course, that schedule may differ if any of the team members are busy. For the final sprint the students from Fontys will travel to Austria to present the final version of the project there.

3.Activities and time plan

3.1 Phases of the project

The main phases are based as follows:

- Brainstorming
  -Create project vision.
  -Form a Scrum Team.
  -Assign Scrum Master and Product Owner.
  -Creating a Prioritized Product Backlog for each sprint.
  -Conduct Release Planning.

- Plan and Estimation
  -Creation of User Stories.
  -Appointing tasks.
  -Tasks Estimation.
  -Adapt the Sprint Backlog based on reviews.

- Implementation
  -Creation of Deliverables and Non- Deliverables.
  -Conduct Daily/Weekly Stand-ups.
  -Backlog refinement(grooming) Product owner reviews the backlog.

- Review
  -Scrum of Scrums – high-level updates.
  -Demonstrations and Validations of a Sprint.
  -End of Sprint meeting/discussion (Retrospect Sprint).

- Release
  -Ship the Deliverables.
  -End of project meeting/discussion (Retrospect Project).

3.2 Time plan and milestones

Phasing	Start date	End date	Deliverables
Sprint A	13.09.2021	06.10.2021	Documentation, Application in progress
Sprint B	07.10.2021	05.11.2021	
Sprint C	06.11.2021	04.11.2021	
Sprint D	05.11.2021	24.11.2021	
Sprint E	25.11.2021	15.12.2021	

4. Testing strategy and configuration management

4.1 Testing strategy

One of our chosen options is CI/CD in GitHub.
We will make use Continuous Integration (CI) to merge more frequently with less to no errors. We will also use Continuous Delivery (CD) to lessen the workload and to make the testing, building automatic so that our software delivery is more efficient and rapid.

4.2 Test environment and required resources

We will be using different tools for both front-end testing and back-end testing.
Front-end testing will be done with the tool Protractor and for the back end we will use Junit.
Protractor was picked for our project because its specifically made for Angular apps.
We picked Junit as a tool because it’s a testing framework specifically for Java.

The tools we will be using we have to manually download. One of the testing environments will also be the CI/CD in GitHub as mentioned previously.

4.3 Configuration management

We made our project repository in GitHub and there we have an already planned strategy for branching and merging. Our main project branch will be the Master branch. For everyone to be able to work at the same time we will be making different branches for every task. This strategy will give us less conflicts between the code we upload daily. After tasks are done, we will merge the finished work in our master branch. We will use Continuous Delivery for the automated software release, this will make the software delivery more efficient and rapid.

5. Finances and risk

5.1 Project budget

Our team doesn't have requirements for hardware funding, the only thing that may be needed to be funded is if we want to release the Web Application permanently on the Internet. The funding will go for the hosting.

5.2 Risk and mitigation

Risk	Prevention activities	Mitigation activities
1 Inaccurate Estimations	We did plan and discuss every task, we estimated the time for each task together.	• Prioritizing tasks. • When we did the time estimation of each task, we included the research time.
2 Poor Quality Code	After completing a task, a teammate will check the code and its readability.	• Code reviews. • Clear coding standards. • Following SCRUM.
3 Poor Productivity	Planning and discussing every task, remembering we are humans and not robots in order to set realistic expectations for productivity.	• Setting achievable time frames. • Having a sustainable pace during the project.