

Studyhub – on going project documentation

DECO3500 – Social Mobile Computing



October 27, 2017

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Research Phase

The benefits of group work in an educational setting are well established. Educational professionals see working as a large or small team as one of the best, if not the best way to learn.1 Countless studies have shown the benefits of working and learning as a group.

Working with fellow students within a cohort is a very effective way for students to further their learning. Discussing the course material and working together is the best way that users can improve their understanding of the topic at hand. Working with fellow students allows students to: break complex tasks into parts and steps, pool knowledge and skills, share diverse perspectives, tackle more complex problems than they could on their own and develop stronger communication skills.2

## User Research

We conducted a series of interviews and surveys in order to receive useful user feedback. Being university students ourselves, we were fortunate enough to have many friends that were are our target audience and could be used for our research purposes.

**Link to the Survey:** <https://docs.google.com/forms/d/e/1FAIpQLSdiKTDAX38rbtVxc8j9dFwI61RIBFyVFWnrUyP-vGeUcPAgLg/viewform>

**Link to the Responses:**<https://drive.google.com/file/d/0B94otuxunxRrRVFHUW1McFA3bjA/view?usp=sharing>

**Summary of responses:**

Out of all responses, 61% of the respondents currently use Facebook to interact and collaborate with other students in their courses. All respondents agree that communication is easy using Facebook Messenger due to its push notifications so that peers are alerted and can reply quickly. Many dislike messenger and find it difficult to collaborate with peers as it lacks appropriate file sharing. Other recommendations include: a screen sharing function, automatic group forming for teams and a way to browse attached files without going through chat dialogues.

Detailed responses are in the Research folder.

**Task Allocation:**

Survey creation – Bob

Survey distribution – Everyone

## Requirements

Based on the evidence we have collected it is clear that there is a gap between users requirements in terms of group and class collaboration and a easy to use and viable application that allows them to do so. The benefits of working as a group are well established and based on our user research it is clear that the current methods of group collaboration do not sufficiently meet students’ requirements.

We have decided to develop a mobile based application that allows users to work with a small group or the entire class. Users can chat to their entire class or, if they are after help in more specific areas, chat rooms dedicated to topics such as practicals, tutorials or past exams.

StudyHub will also provide access to many different external resources in one place such as: github, Google drive (for the group section) as well as past exams and lectures. StudyHub is a project designed to solve numerous common problems that students encounter every semester such as:

* Not knowing anyone in the course, making it awkward when it comes to forming groups.
* Scattered resources – Apart from Blackboard, there are many other sites with useful resources for students to utilize during revision periods. However, students need to create many accounts to access such resources.
* Ability to store passwords and account details for external resources.

There are two major features of StudyHub and they are:

* A centralised place for resources – where students can access all useful resources from the app instead of opening multiple tabs trying to find the resources they need.
* A communication/collaboration platform where students can view all students that are enrolled in the same course and form groups beforehand and make group work and group communication much more efficient.

Construction of project is limited due to time constraints so the group decided to mainly focus on the communication/collaboration feature of the app.

## Prototype Design Phase

**Design Process:**

After summarising the feedback we have received from surveys, we created a prototype online. Link to prototype: <https://app.atomic.io/d/82zyEp7cE2Sg>

The prototype was designed on a mobile platform which included both features but mainly focused on the communication/collaboration functionalities.

We included a feature where students can view all students that are enrolled in the course and can form groups on a separate page on the app. Students can also message their practical or tutorial session groups and receive immediate responses in case they have missed anything. This is faster than sending emails to individual students as a tutor or lecturer because some students may have the same questions in mind. Answering questions in a group chat is more efficient.

Students can also open files on the app but some lengthy documents can be hard to read due to the small screen sizes of mobile phones. We aimed to keep the layout neat and user friendly.

**Task Allocation:**

Prototype design and creation – Everyone

Prototype review and testing – Everyone

## User Testing Phase

Goal:

Feedback:

Task Allocation:

## Design Re-adjustment Phase

Goal:

Process:

Task Allocation:

## Construction Phase

Goal:

Process:

Task Allocation:

References

<https://www.cmu.edu/teaching/designteach/design/instructionalstrategies/groupprojects/benefits.html>

<https://cft.vanderbilt.edu/guides-sub-pages/setting-up-and-facilitating-group-work-using-cooperative-learning-groups-effectively/>

<https://www.sheffield.ac.uk/lets/toolkit/teaching/largegroup>

<https://teaching.unsw.edu.au/sites/default/files/upload-files/large_group_ideas.pdf>