

SW Engineering CSC648/848 Summer 2022

College Essentials

Team 4

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[Section I] Executive Summary

College is a strange place where students come and can get completely lost because of how different it can be from their previous lives. This new large pond offers many advantages for students who want to further their educational goals. We as software engineers want to make the college experience simpler and possibly cheaper. We are designing a website that has three major uses: selling peer to peer, looking for work opportunities, and enhancing the social aspect of college.

College textbooks can be extremely overpriced, and the worst part is that students will likely only use their books for a semester. When the semester is over they have two options; sell the books back to the school for a much lower price than they initially bought for, or keep the textbook but never use them again. The first aspect of our website College Essentials is to completely change those two options and create a major opportunity for students. Peer to peer selling of textbooks and other items is a key function of our application. This will allow students to bid or buy books from other students who overpaid for textbooks from the school, creating a cycle allowing students to resell their books with little loss.

The next major application of our service is to provide postings for jobs or research opportunities to students. This can allow students to get their names on important research for their field of choice early on in their careers, in order to help get a better job once they graduate. The second advantage is that those who post now have a wider range of applicants and are able to choose the best candidate for their needs.

Finally we have the social aspect of college, where we are giving the users a way to communicate with each other through a forum board. This allows postings for meetings such as study groups for classes and creating new clubs. This will get the word out far better than grass root operations for these groups.

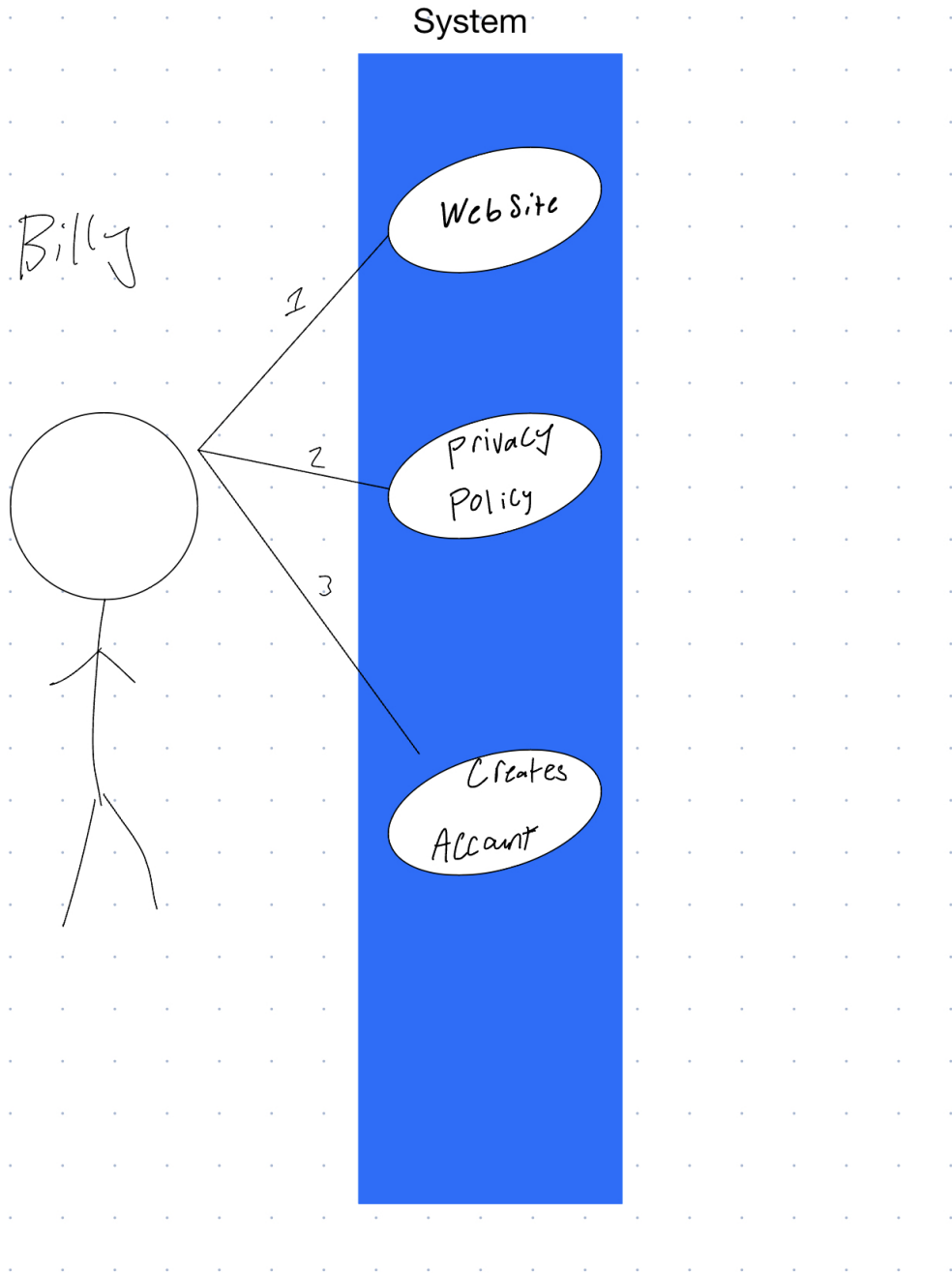
[Section II] Main Use Cases

1:[Use Case] Reading the privacy policy

[Actor] Billy

[Description] Billy is a freshman in college who just heard about this new forum website from some of his peers in class and wants to sign up. Billy is a very aware and conscious person who always makes sure to read the privacy policies before signing up with a website. Billy makes his way over the College Essentials website and after looking at the general home page and understanding what the website would offer since the home page gives a basic layout and for ear-to-mouth talks with some peers he decides to create a profile. Right before creating a profile, Billy decides to read the Privacy Policies for College Essentials.

College Essentials will be open and honest with the consumers of their products and will tell the users what it uses the data they input into the website for. It shows the users how we protect the data they input into the website to give them ease of mind. The ability for us as College Essentials is to be transparent with the users and all aspects of the products we provide.

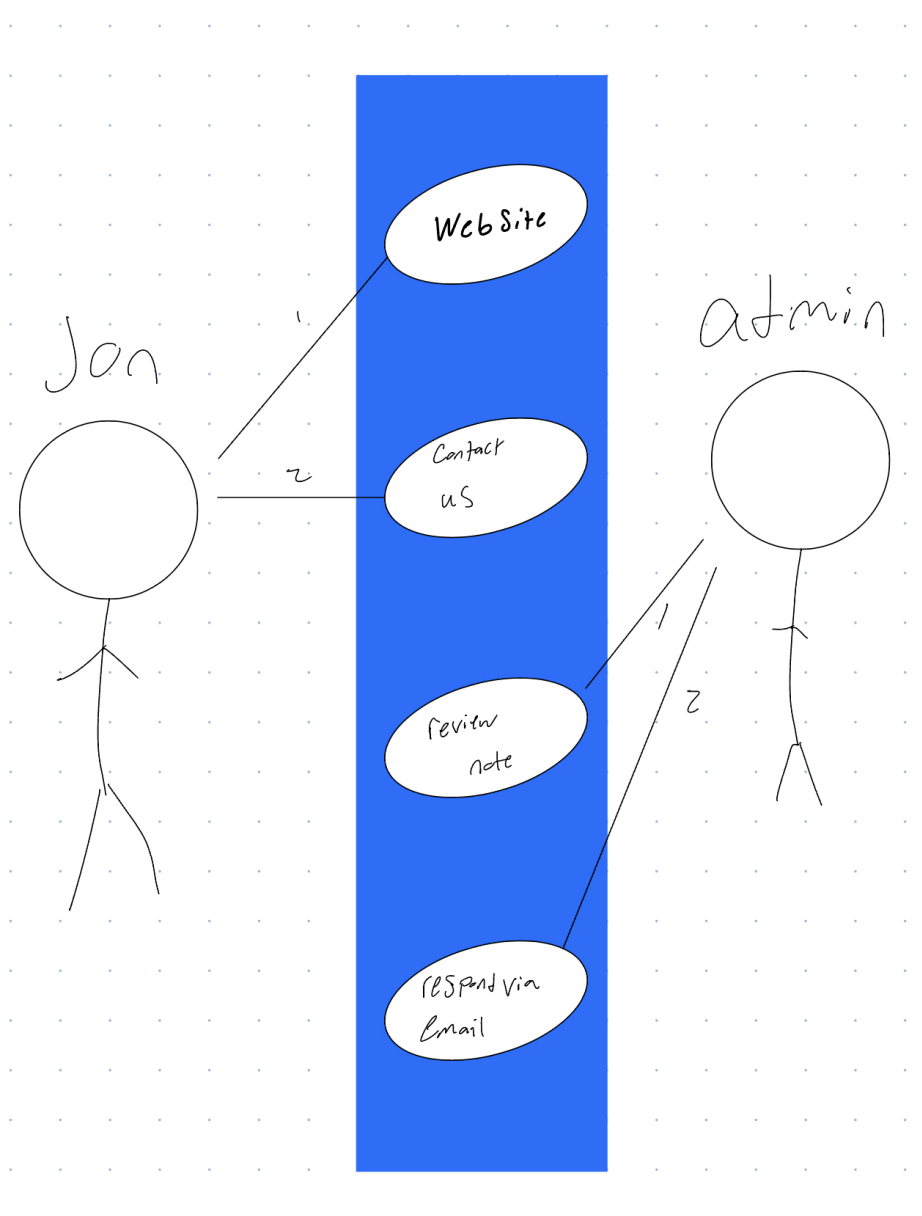


2: [Use Case] Using the contact us

[Actor] Jon

[Description] Jon is a freshman at SFSU and is also a computer engineering major who is very ahead of the curve and is trying to look everywhere for a coding internship. Jon really loves the use of the forum function on College Essentials from getting study groups together to buying some items off of the marketplace. Jon decides to reach out to the College Essentials personality via the contact us function on the footer of the website. Jon is reaching out to see if they are willing to teach him some pointers and to see if Jon can get an internship. Jon goes to the footer of the website and clicks on the Contact Us link, after that Jon fills out the form.

College Essentials has the option to contact the team at any time for criticism or help. We want to build a community that builds off of itself. Allowing the ability to contact the College essentials team gives the user comfortability while being on the platform.



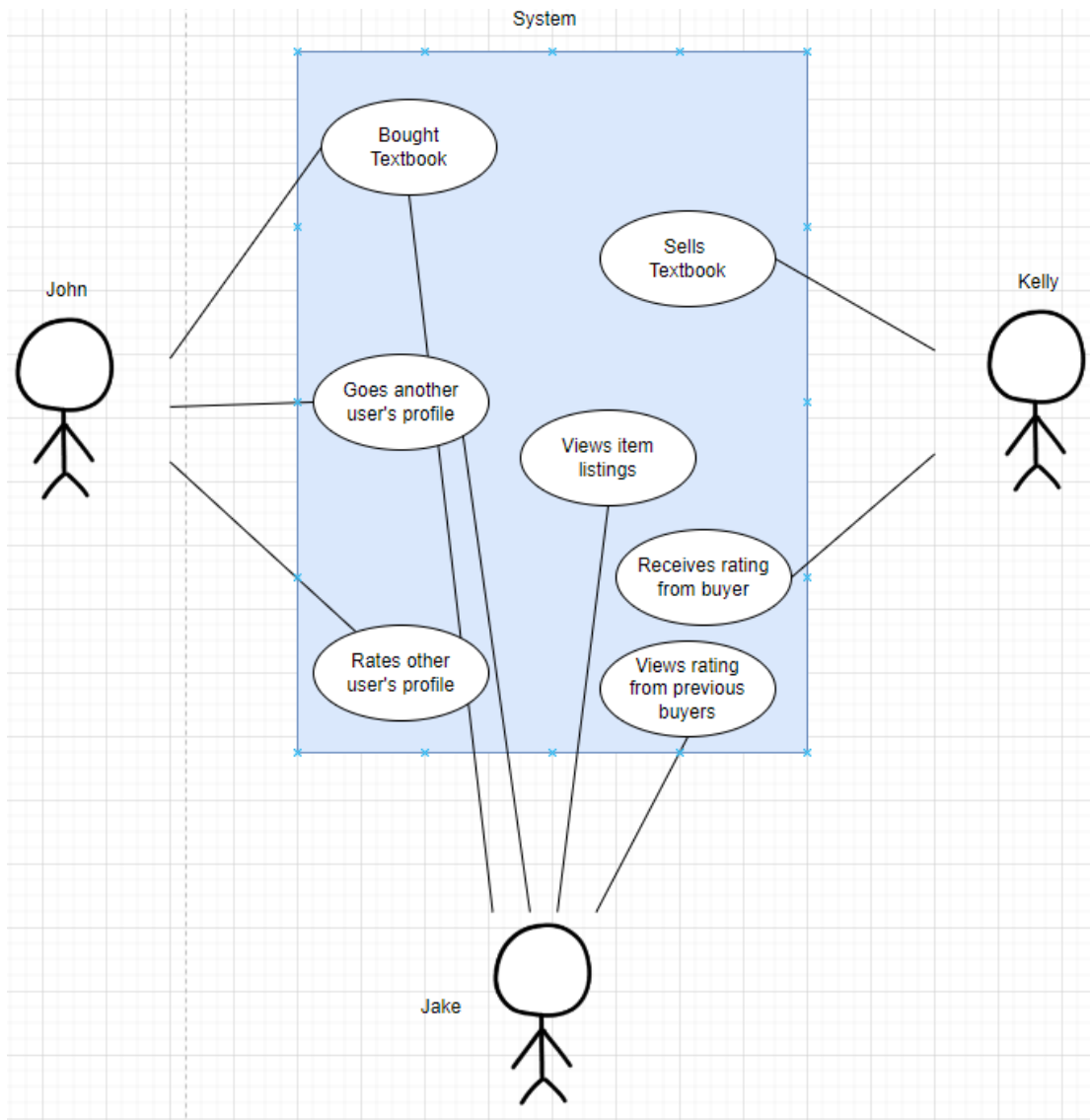
3: [Use Case] Reviewing another user

[Actor] John, Kelly, Jake

[Description] John is a freshman in college. He had been very satisfied with his textbook that he had just bought from another student, Kelly, from College Essentials. The textbook looked new inside, and out. There also didn't seem to be any graffiti or damage found within the book as well. Since

John was so happy with the condition of the textbook he had purchased, he decided to leave a review on Kelly's profile detailing the textbook's condition and how smoothly the transaction went. A few days later, Jake sees another one of Kelly's textbooks up for sale in the marketplace. He is skeptical of Kelly at first, so he goes to Kelly's profile to see if there are any ratings. Much to Jake's delight, he finds that John loved his textbook that he purchased from Kelly a few days ago. This review is enough for Jake to think that Kelly is credible, and he buys that textbook moments later.

Through College Essentials, John can leave a review on the seller's profile to detail their transaction. This is not only beneficial to sellers like Kelly, but to other future buyers from Kelly as well. By leaving a review, future buyers from Kelly know that she conducts smooth transactions and that she is reputable/trustworthy as a seller.



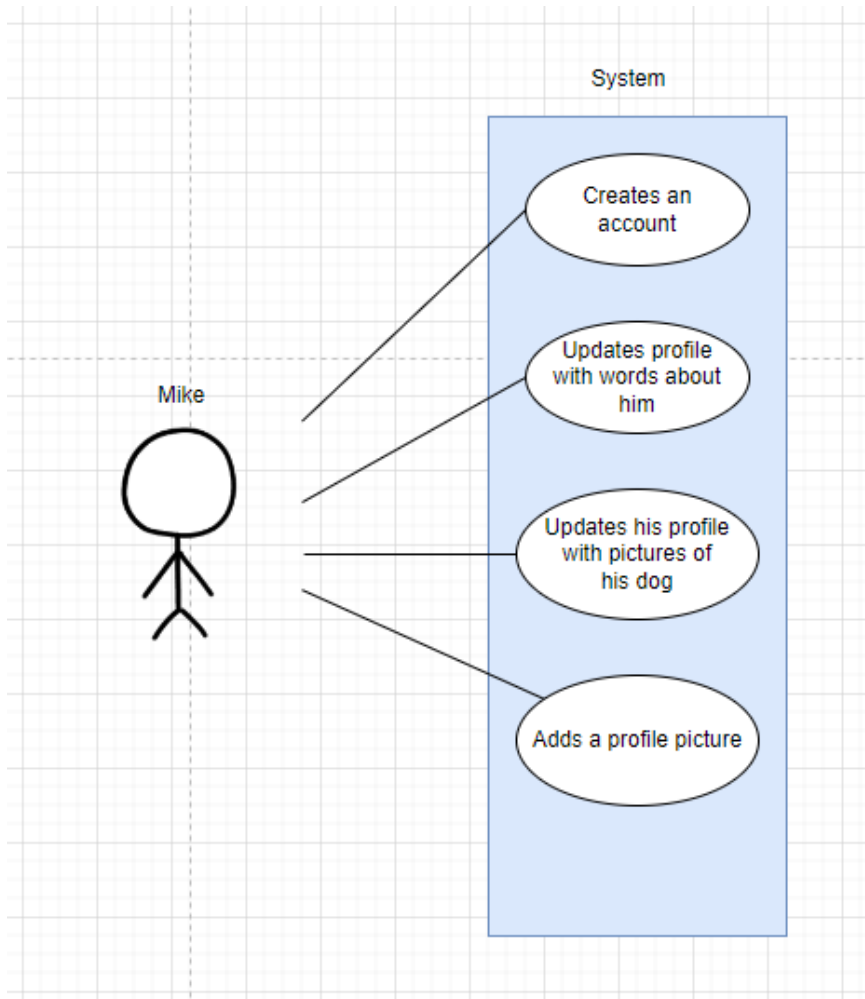
4: [Use Case] Users creating an account and updating their profile

[Actor] Mike

[Description] Mike just ended his first semester of college and has no use for that semester's textbooks. He decided to sell it back to the school to make some of the money back, but the school offered him ten percent of the original cost of the book. Mike then signs up for College Essentials in order to post a listing on the marketplace stating he wants to sell his books. Before posting an advertisement, Mike decides to update his bare profile on College

Essentials in order to establish a greater sense of credibility. The last thing Mike would want is for potential buyers to think he is a scammer. In his profile, he writes some information about himself, including his passions in life as well as his social media accounts. Mike follows it up by adding some pictures of him and his dog to his bio, as well as putting a picture of himself as his profile picture.

Our website would allow everyday users to easily create an account and post their items, whether it be a textbook or a desk they aren't using anymore. Unlike other websites, College Essentials allows everyday users to create and edit their profiles to create a sense of individuality as well as establish some credibility. For potential buyers, getting to know the seller will be a great first step in the door to buying something.



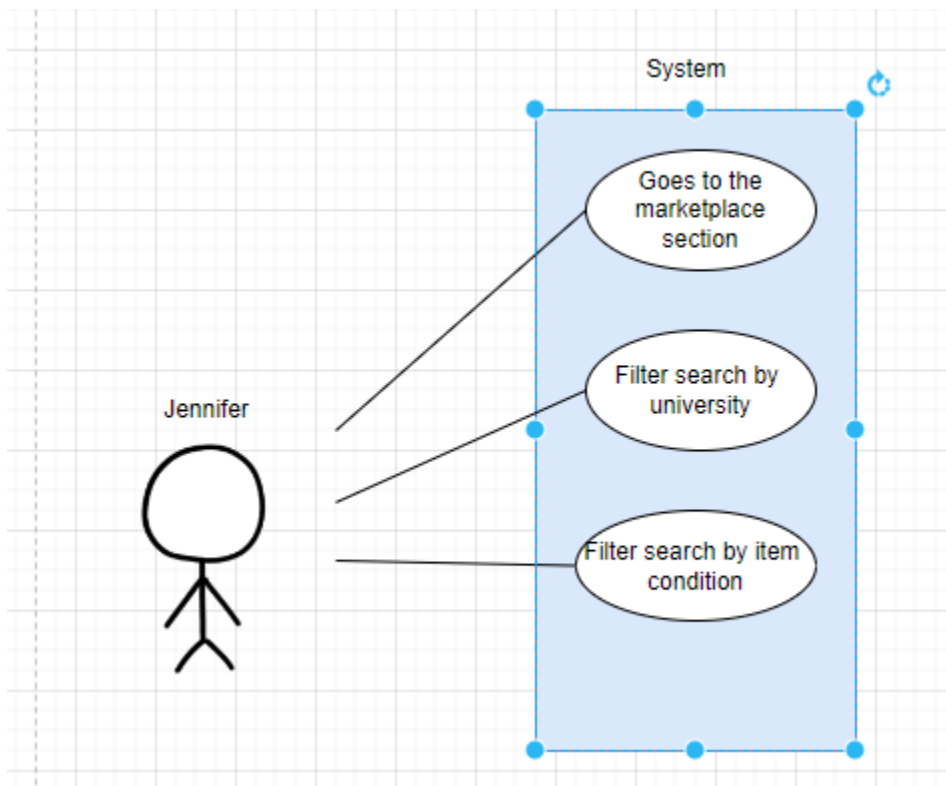
5: [Use Case] Searching for listings based on different filters

[Actor] Jennifer

[Description] Jennifer is a junior in college about to transfer to a four year university. Jennifer needs to buy textbooks for her new classes, so she goes to her community college bookstore to look for the textbooks that she needs. Unfortunately, her community college doesn't offer any courses that use those textbooks. Jennifer doesn't want to buy a new condition textbook for a class that she would be taking once, so she wants to find someone at her new school that has a used copy of the textbook. However, she lives in a different city than her new college, so she wouldn't be able to go to the bookstore to

buy a textbook before the semester starts. Jennifer decides to go to College Essentials's marketplace, where she is able to filter her search based on various universities as well as the condition of the textbook she needs.

Because her local community college doesn't offer the textbooks she needs, our website would allow her to search different colleges in different cities to find someone who is selling those textbooks. If she wants to find the textbook from a closer city, she can search from schools that are closer to her. If she wants to find the textbook from her new school, she would be able to search from that school directly.

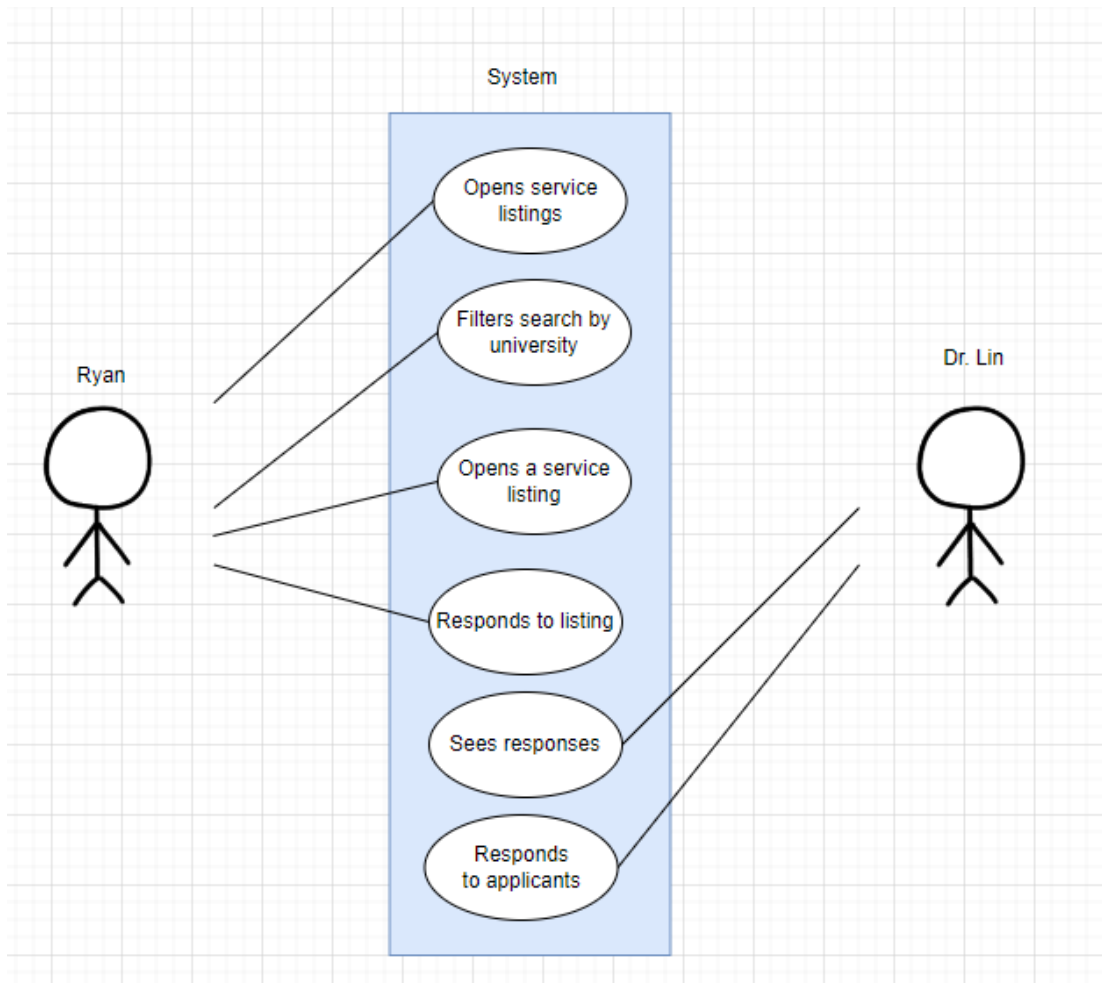


6: [Use Case] Users can limit their searches to only people from their own institute

[Actor] Ryan, Dr. Lin

[Description] Ryan is looking for a possible opportunity to work under a professor at his college. Ryan has a poor experience with other websites, struggling to find opportunities for his university amongst the thousands of results that show for many other universities. However with College Essentials, he notices a menu that can easily return results from a specific institution. He therefore enables the filter and gets new results that are all from his college that he is attending. He was able to find a post from one of his favorite professors and applied. After a few days, Dr. Lin opens his messages and sees the various responses sent to him about his posting.

College Essentials will enable everyday users like Ryan to easily filter among many search results for services that are related to his university. Not only is this beneficial for Ryan, but it is also beneficial for professors of that university to get the help that they need and deserve. In short, College Essentials will make it much easier for everyday users to get the results they need, as well as making it faster for services/jobs to be potentially filled.

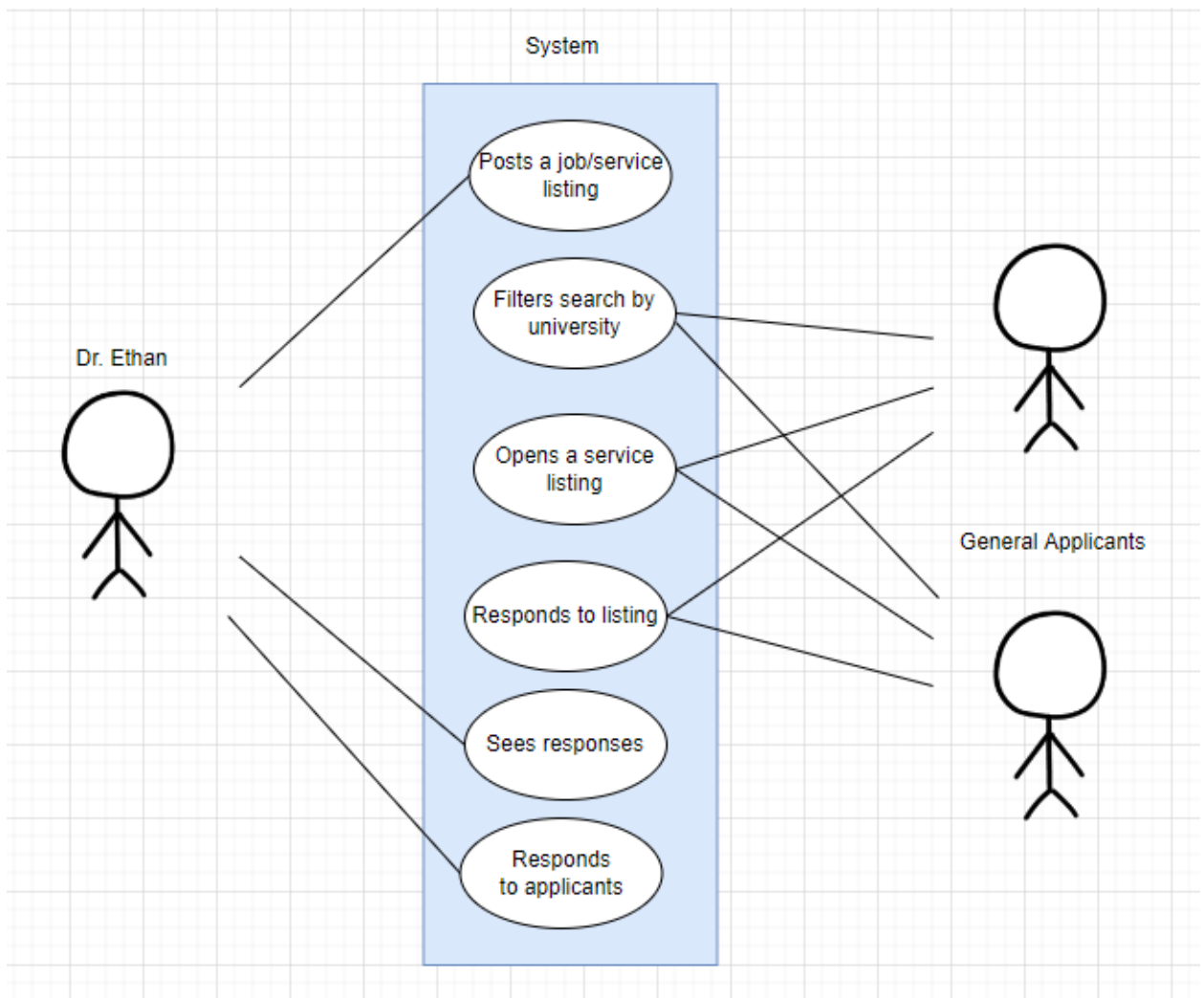


7:[Use Case] University staff can use it as a place to look for teacher assistants or research assistants

[Actor] Dr. Ethan

[Description] Dr. Ethan is a professor at San Francisco State University who teaches biology. He comes up with a brilliant idea and needs a few students to help him bring his idea to life. He decides to go on College Essentials and posts a job offer for students who are willing to help him with his experiments. Students from all over the college reply to his advertisement for seeking help and he is able to choose the best-qualified student to hire.

College Essentials will make it easier for Dr. Ethan to seek help for his upcoming research project. For any professor like Dr. Ethan, finding time out of his day away from holding lectures and grading work is already difficult as is. With our website, we can help users like Dr. Ethan reduce the time spent on seeking volunteers/students, and allow him to focus more of his time and efforts on figuring out how to conduct his research project.

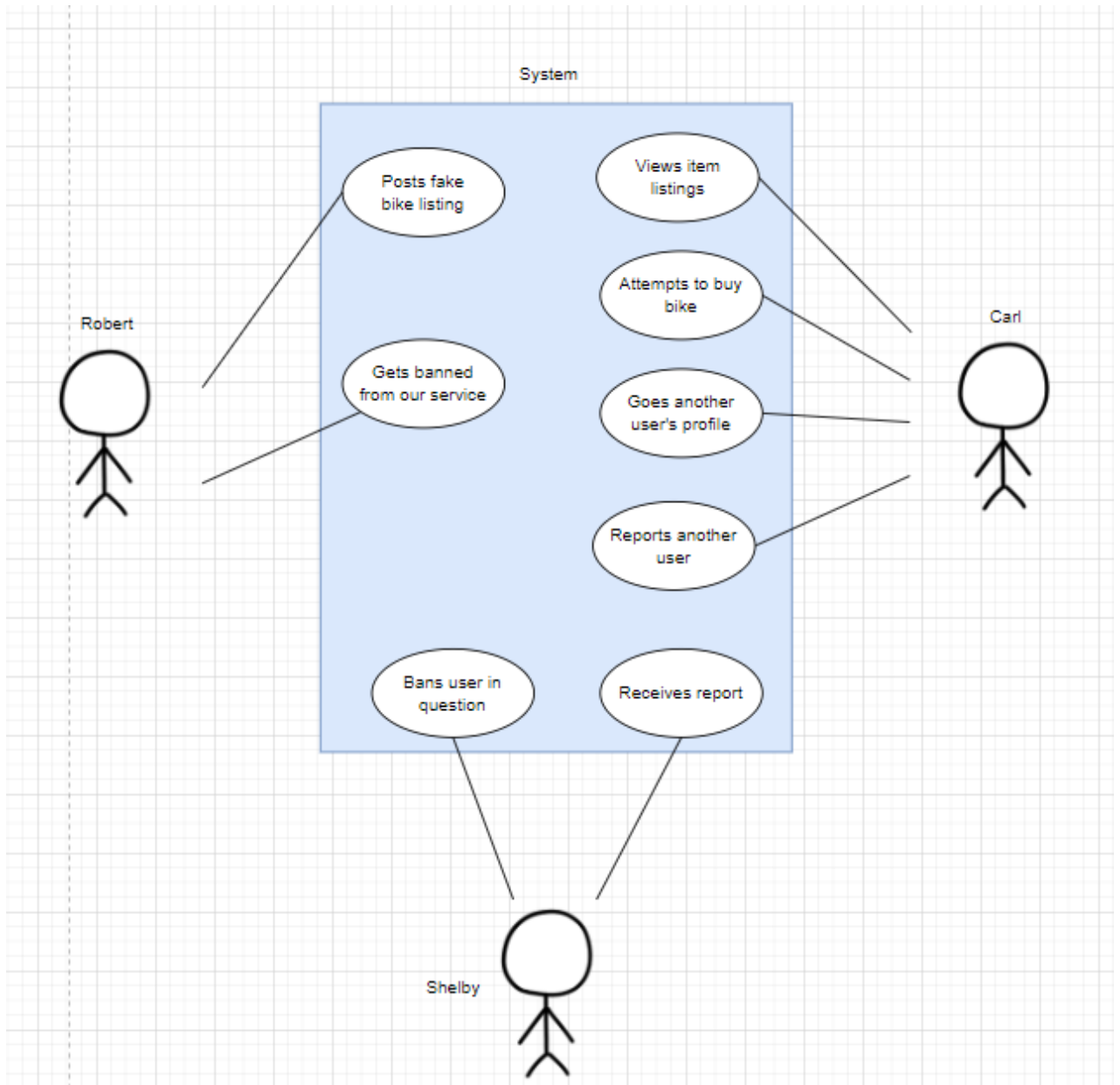


8:[Use Case] Reporting a Scammer

[Actor] Robert, Carl, Shelby

[Description] Robert is a scammer who is looking for some college students to scam. He posts an advertisement for a brand new bike for much cheaper than the average selling price. Shortly after, Carl decides to meet Robert, only to have his (Carl's) money taken without the bike he (Carl) was promised. Before Robert can scam someone else, Carl decides to report Robert. Shelby, an admin at College Essentials, sees Carl's report, including proof about the scam, and promptly bans Robert before he can commit more scams.

College Essentials will ensure that transactions and services offered are genuine. People like Robert are detrimental in terms of the reputation of College Essentials, and most importantly, the everyday users like Carl. The ability to report other users can ensure that everyday users can have the easiest and best experience possible when buying items, selling items, or exploring various services offered.



9:[Use Case] Buying a ad

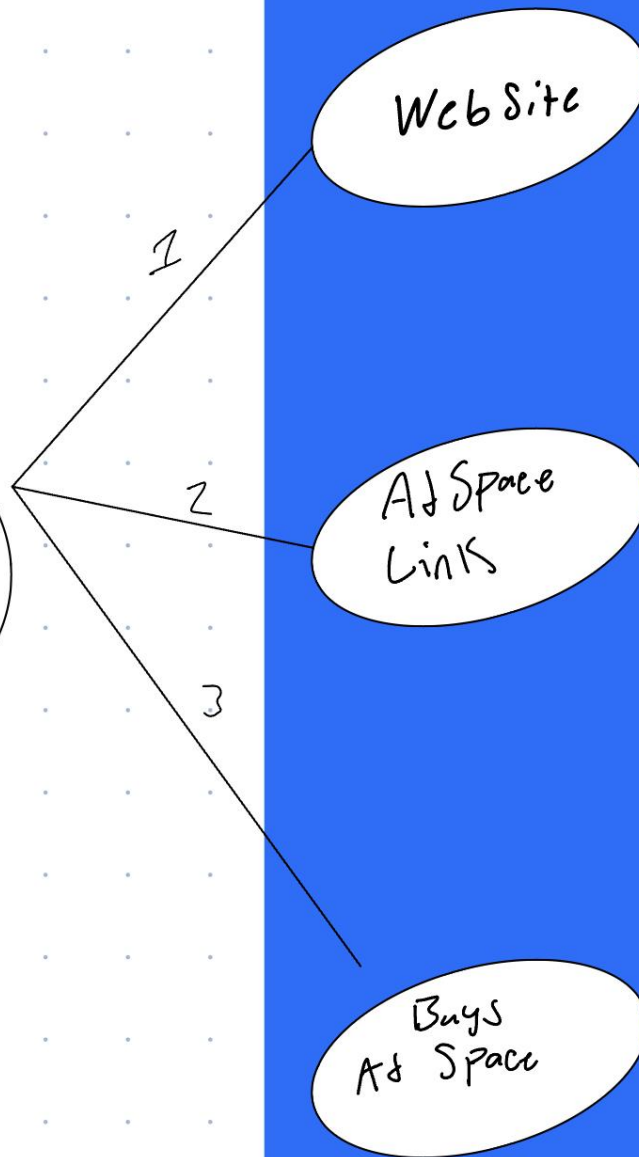
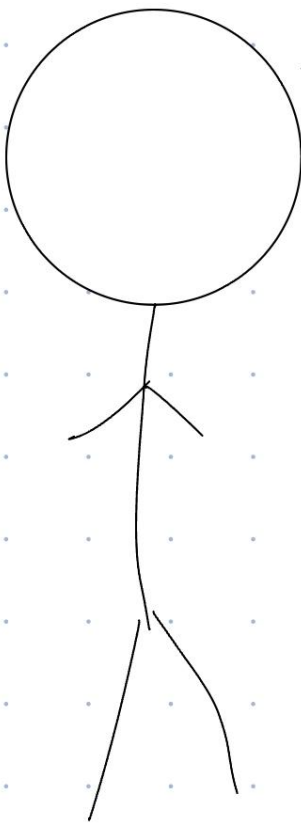
[Actor] Bill

[Description] Bill is a senior at sfsu. He has been making Youtube videos since he was a freshman. After joining College Essentials he had found out about our service for buying student Ad space. After going over the concept of buying an ad space on a college website. Bill finally went to our website and navigated to the footer of the page and found the link for Ad space. After clicking on the link bill is taken to a new page where the website gives Bill the information and form to fill out of the Ad on the website.

College Essentials can give the users the ability to buy Ads in order to advertise what the student wants within our confines and rules. The platform gives the users a platform to advertise what they want from the ease of accessing the website. When applying for Ad space the user can choose the type of demographic to advertise to.

System

Bill

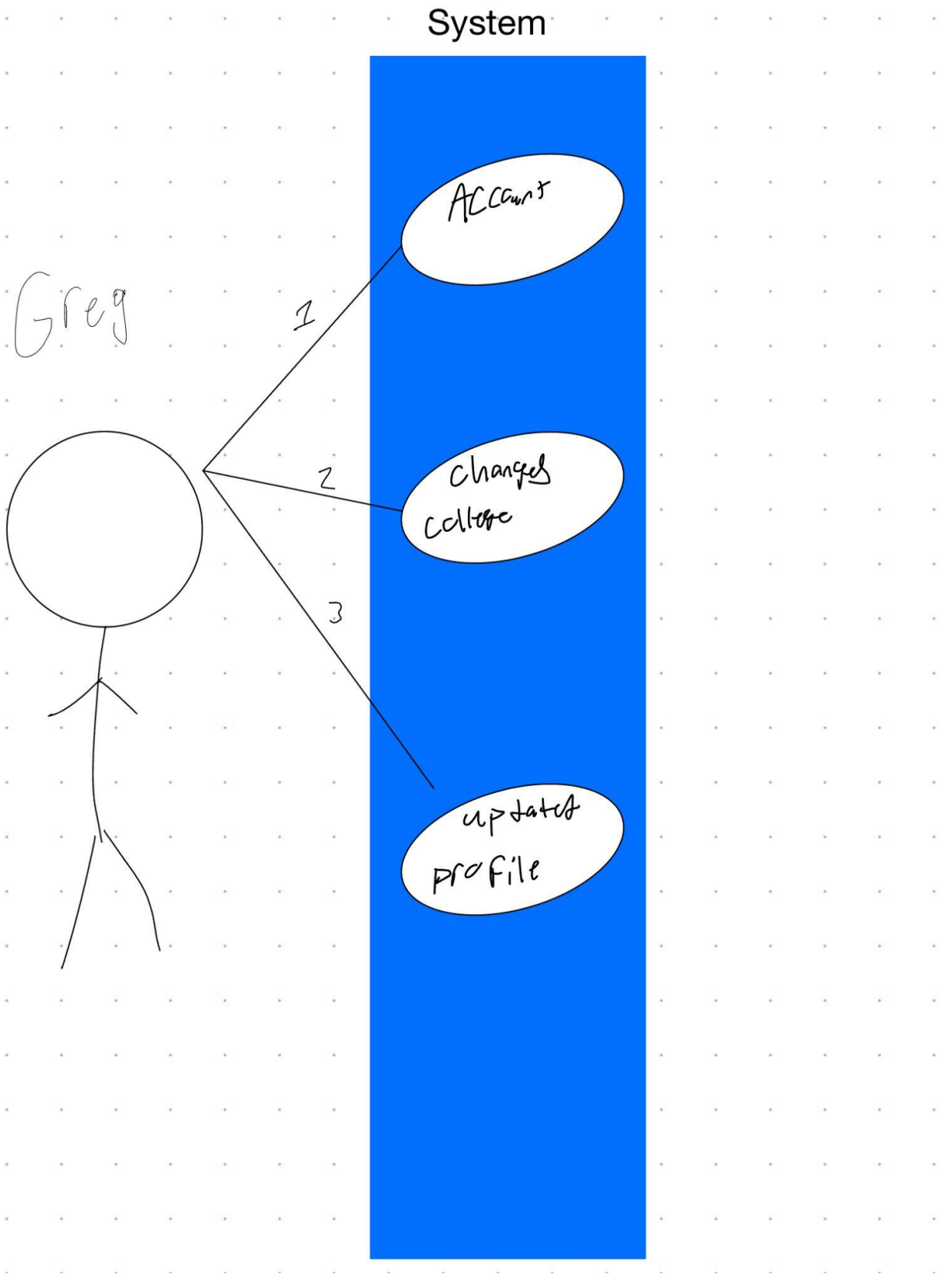


10:[Use Case] Changing college

[Actor] Greg

[Description] Greg is transferring colleges and wants to change his account from SFSU to UCLA. He would log in to the account and after logging in then he would edit his profile and change his college. The ability to change the college on your profile will let other users know what college you are going to. Greg is excited to go to his new college.

College Essentials has the ability to change your college on your profile. College Essentials profiles have the college in their profile so when looking at someone's profile you can tell where someone is.



[Section III] List of Main Data Items and Entities

Name	Definition	Usage
General User	A person who is not signed in or does not have an account with College Essentials.	A general user can do basic functions on College Essentials, including scrolling through forums and the marketplace. They are not allowed to do actions like make comments on these posts.
Registered User	A person who has signed up to use College Essentials.	Registered users will have user information such as: username and school.
Moderator	A person who moderates content on the website.	Moderators will be allowed to moderate forum content, such as deleting posts.
Guest	This is a user who is unregistered or not logged in who is able to view all posts but not reply.	Guests will be ghosts within the site, they are able to search and look but not interact.
User Registration	This is the section that would allow users to register.	Users would need to register with a username, password, school, and school email.
Private Message	Direct messages between two different parties.	Allows two different people to communicate privately.
Forum Post	This is where users are able to post miscellaneous forms that don't fit within the other categories.	These forms are not within the categories already such as people to go to games with or even making friends with similar interests

Marketplace	A place for users to post what products they are trying to sell.	Users will be able to post the products that they are trying to sell, which would include their own prices, and how the product would be delivered.
Service Listings	A place for users to post if they need or provide services.	This is the link to the information on the job or item. This also provides the ability to privately message the service provider.
User Rating	In order to fight against fraud we have user ratings where other users are able to grade the service provider.	This will be a rating out of 5 and an optional description report.
Payment System	This will be a system for collecting online payments for College Essentials.	The payment system would use an API to collect listing fees and online transaction payments.

[Section IV] Initial List of Functional Requirements

1. General User

- a. A general user shall be able to register their own unique account(s) with a unique username.
- b. A general user shall be able to register their own unique account(s) with a password.
- c. A general user shall be able to browse forum posts.
- d. A general user shall be able to browse items on the marketplace.
- e. A general user shall be able to browse service listings.
- f. A general user shall be able to search for their needed service.
- g. A general user can search by categories in the marketplace.
- h. A general user can search by college institution in the service listing section.
- i. A general user can search by item condition in the marketplace.
- j. A general user shall accept our terms of conditions.
- k. A general user shall be able to submit their own ads to be promoted on our website.

2. Registered User

- a. A registered user shall be able to log in using their username.
- b. A registered user shall be able to log in using their email.
- c. A registered user shall be able to review another user.
- d. A registered user shall be able to create their own profile with text.
- e. A registered user shall be able to create their own profile with pictures.

- f. A registered user shall be able to edit their own profile with text.
- g. A registered user shall be able to edit their own profile with pictures.
- h. A registered user shall be able to post a picture as their profile picture.
- i. A registered user shall be able to post a service listing.
- j. A registered user shall be able to list items for sale in the marketplace.
- k. A registered user shall be able to post on the forums.
- l. A registered user shall be able to edit a forum post.
- m. A registered user shall be able to edit their service listing.
- n. A registered user shall be able to edit their sales listing.
- o. A registered user shall be able to log out.
- p. A registered user shall be able to email other registered users.
- q. A registered user shall be able to pay with different online payment methods.
- r. A registered user shall be able to opt in to pay in cash in person through email
- s. A registered user shall be able to report another user.
- t. A registered user shall be able to block another user.

3. Admin

- a. An admin shall be able to review reports.
- b. An admin shall be able to ban registered users.
- c. An admin shall be able to unban registered users.
- d. An admin shall be able to delete forum posts of other users.
- e. An admin shall be able to remove service listings from the website.
- f. An admin shall be able to remove marketplace listings from the website

4. Forum Listing

- a. A Forum listing shall have a title.
- b. A Forum listing post shall have characters in its content body.
- c. A Forum listing post shall have basic information like time posted.
- d. A Forum listing post shall be able to have its content body edited.
- e. A Forum listing post shall be able to have its title edited.
- f. A Forum listing post shall have optional tags that categorize the post.
- g. A Forum listing post shall be able to be unlisted.

5. Service Listing

- a. A service listing shall have a title.
- b. A service listing post shall have characters in its content body.
- c. A service listing post shall have basic information like time posted.
- d. A service listing post shall be able to have its content body edited.
- e. A service listing post shall be able to have its title edited.
- f. A service listing post shall be able to be unlisted.
- g. A service listing post shall be able to have filters based on location, and type of service.
- h. A service listing post shall have optional tags that categorize the post.

6. Receipt

- a. A receipt shall have the product bought.
- b. A receipt shall have the price of the product bought.
- c. A receipt shall have the time of the transaction.
- d. A receipt shall have the email of the user involved.
- e. A receipt shall have the method of contacting the seller via email.

- f. A receipt shall have the method of contacting the seller via phone number.

7. Shopping Cart

- a. A shopping cart shall remember what has been stored within.
- b. A shopping cart shall remember how many of one entity have been stored within.
- c. A shopping cart shall allow users to edit products within.
- d. A shopping cart shall allow for check out.
- e. A shopping cart shall give descriptions of products stored within.

8. Navigation Bar

- a. A navigation bar shall have a section for users selling their products
- b. A navigation bar shall have a section for teachers look for student assistants
- c. A navigation bar shall have a section for the student forums
- d. A navigation bar shall have a section for the about us page

9. User Ratings

- a. A rating shall be rate a profile on a scale of 1 to 5
- b. Ratings shall be visible on a registered user's profile.
- c. Ratings shall be visible on a registered user's marketplace listing.
- d. Ratings shall be visible on a registered user's service listing.
- e. Ratings shall be able to be posted by registered users.

10. Marketplace Listing (Buy/Sell Listing)

- a. A marketplace listing shall have a title.
- b. A marketplace listing shall have a description.

- c. A marketplace listing shall have a photo (or many).
- d. A marketplace listing shall have a price.
- e. A marketplace listing shall have no expiration date.
- f. A marketplace listing shall have a set price.
- g. A marketplace listing shall be able to be unlisted.
- h. A marketplace listing shall have filters to categorize.
- i. A marketplace listing shall have optional tags such as condition and type of listing.

11.Messages

- a. A message shall have characters in its content body.
- b. A message shall have a timestamp.
- c. A message shall have a status (sent/received/read).

[Section V] List of Non-Functional Requirements

1. Functionality

- a. The website shall use the tools and frameworks that the group has agreed on and approved by the CTO.
- b. The website shall use Amazon Web Services for deployment.
- c. The website shall be user friendly and simple.
- d. The website shall be easy to navigate for everyone.
- e. The website shall be available for students and professors at any school.

2. Security

- a. The user shall need a username/email and password to be able to post and respond to posts on the website.
- b. The user shall need an account in order to interact with posts.
- c. User registration shall only be available to those with emails.
- d. The user shall need a registered account in order to write reviews for other users.
- e. Admins shall be able to access all aspects of the websites.
- f. Admins shall be able to moderate the website.

3. Privacy

- a. The user shall agree to a terms of service agreement in order to access our services.
- b. Passwords and other personal information shall be kept hidden.
- c. Users shall be authenticated through username and password.
- d. Users shall only be able to sign up if they have an email.

- e. User information shall be only accessible to the user.
- f. Payments shall be collected through an API.

4. Performance

- a. The website shall be up at all times.
- b. The website shall make it easy to post listings.
- c. The website shall make it easy to see other users ratings.
- d. The website shall make it easy to delete old listings.
- e. The website shall make it easy to allow the user to go through payment system

5. System Requirements

- a. The website shall work on version 1 to 98 of Mozilla Firefox.
- b. The website shall work on version 1 to 99 of Google Chrome.
- c. The website shall work on version 1 to 99 of Microsoft Edge.
- d. The website shall work on version 1.0 to 15.2 of Safari.
- e. The website shall work on version 2.0 83 of Opera.

6. Marketing

- a. The website shall be viewable for both guests and users.
- b. The website shall have its own logo.
- c. The website shall be easy to navigate for any user.
- d. The website shall be seen as a familiar alternative for other online marketplaces.
- e. The website shall be seen as friendly for students and faculty of any school.

- f. The website shall be not directly linked with any specific school.

7. Content

- a. The website shall allow users to search posts by categories.
- b. The website shall allow users to search by object name.
- c. The website shall allow users to search by listing name.
- d. The website shall allow users to leave reviews on other users.
- e. The website shall allow users to see the reviews of other users.
- f. The website shall have a section for miscellaneous postings.

8. Scalability

- a. The website shall be able to handle a large number of users from any school.
- b. The website shall have enough categories to sort through the growing number of posts.
- c. The website shall be able to accommodate larger amounts of listings.
- d. The website shall be able to accommodate large amounts of user reviews.
- e. The website shall be able to accommodate large amounts of forum posts.

9. Capability

- a. The website shall be able to provide data requested by the user.
- b. The website shall allow posts to be uploaded in a timely manner.
- c. The website shall be able to moderate content within a timely manner.
- d. The website shall be able to recover from failures in a timely manner.

- e. The website shall be able to communicate directly and effectively with their users.
- f. The website shall clean up old content within timely manners.

10. Look and Feel

- a. The website shall have readable fonts.
- b. The website shall have a simple layout.
- c. The website shall be easy to navigate.
- d. The website shall load quickly.
- e. The website shall differentiate between different types of listings through service listings and marketplace listings.
- f. The website shall differentiate between listings and miscellaneous forum postings.
- g. The website shall visibly show the ratings of other users on their profile and listings.

11. Coding Standards

- a. The code shall be organized and understandable.
- b. The code shall have proper working functions.
- c. The code shall use git to be pushed and pulled from.
- d. The code shall use a framework.
- e. The code shall use a uniform style.

12. Availability

- a. The website shall always be available for users.
- b. The website shall generate error messages when errors occur.
- c. The website shall refresh when it fails to load.

- d. The website shall allow postings to be available whenever for users.
- e. The website shall be available to view for unregistered users.

13. Fault Tolerance

- a. The website shall refresh requests for products if request for purchasing fails.
- b. The website shall re-attempt to access the database for listings if querying fails.
- c. The website shall refresh access requests if users' internet fails.
- d. The website shall notify users and allow user's to retry if payment fails.
- e. The website shall notify users if accessing the database fails.

14. Storage

- a. The website shall store usernames in the database.
- b. The website shall store passwords in the database.
- c. The website shall store schools in the database.
- d. The website shall store the user's listings in the database.
- e. The website shall store user's ratings in the database.

[Section VI] Competitive Analysis

Competitive Analysis	Craigslist	Reddit	RamNation	SFSU Bookstore	Facebook MarketPlace	College Essentials
Reputable	X	X	✓	✓	X	✓
URL	https://sfbay.craigslist.org/	https://www.reddit.com/	https://coloradostate.sportswar.com/	https://www.bkstr.com/sanfranciscostatestore/home	https://www.facebook.com/marketplace/	
Target Audience	Anyone in a particular area.	Anyone on a particular forum.	Mainly Colorado State University Students.	San Francisco State University Students.	Anyone in a particular area.	Students who are currently enrolled in a college.
Forums	✓	✓	✓	X	X	✓
Product Listings	✓	✓	✓	✓	✓	✓
Service listings	✓	X	X	X	X	✓
User Listings	✓	✓	X	X	✓	✓
Direct Messaging	X	✓	X	X	✓	✓
User Reviews	X	X	X	X	X	✓
Geographic Preferences	X	X	X	X	✓	✓

Features Implemented:

Not Implemented: -

Implemented: +

Better Implemented: ++

Features	Craigslist	Reddit	RamNation	SFSU Bookstore	Facebook MarketPlace	College Essentials
Auction	-	-	-	-	-	+
Store Listings	-	-	+	+	-	+
User Marketplace Listings	+	-	-	-	+	+
Service Listings	-	-	-	-	-	+
Payment Options	+	-	+	+	+	+
Search Bar	+	+	+	+	+	++
User Reviews	+	-	-	-	-	++
Geographic Preferences	+	-	-	-	-	++

1. [Craigslist] <https://sfbay.craigslist.org/>

- Taking into account the years Craigslist has behind its belt (26 years), it has gained a reputation as a trustworthy source for finding things you might need or like. However, one of its cons is the amount of

services it provides. Craigslist has been a website created by the people for the people with the amount of things you can do with the site it is very easy to get lost and with its outdated UI its pull isn't for the average college student. Craigslist offers services from looking for communities through forums to finding jobs. The reach of Craigslist is that it is truly accessible for everyone but because of how big the platform is, there isn't any regulation for posts. As for how Craigslist makes money, Craigslist uses posting fees as well as charging companies to have Craigslist promote their listings (mainly in jobs forums). Despite the amount of advertising for the website it stands in the top 20% of websites in the U.S with its main user base being 78% based in the U.S. College Essentials shall have a more updated UI, as well as having more regulation for what is posted. Because we will have a user rating system, users can feel safer knowing that they will be able to see which sellers are trustworthy or not.

2. [Reddit] <https://www.reddit.com/>

- Reddit has been one of the most common forum websites we see among college students. Reddit has been active for roughly 16 years with this Reddit has built up a cult following with forms from very peculiar niche groups to general communities. When compared to College Essentials, Reddit is a more non conventional competitor. When on Reddit you have to go into it knowing exactly what you are looking for so you can find the correct forum. Reddit themselves doesn't directly offer any ways to purchase things, however many smaller communities have their own systems in place that would allow them to buy, sell, and trade products. These communities do all

their purchases within private messages, so Reddit has no accountability for any of the transactions that involve users. College Essentials will be directly involved with moderating listings and thus will have a more reliable and trustworthy service than Reddit. We shall be able to show how trustworthy a seller would be, as well as allowing users to easily search for the products that they might want.

3. **[RamNation] <https://coloradostate.sportswar.com/>**

- RamNation is the closest concept of a website to our idea for College Essentials. Some of RamNation's most notable functions are its marketplace and forum boards for posting messages. The down side for the website are the main UI and its target audience. The target audience for RamNation is that it is marketed towards Colorado State students. It narrows down its own audience by focusing mainly on those who are fans of Colorado State sports. It is not a very user friendly website based on the front end of the website being very clunky and outdated. The concept of the website seems to work very well within its niche of its community. One of the features that seemed very interesting is that RamNation builds community strength through its ability to submit a 'class note'. This feature is only for alumni and it works as a shout out that gets published on the website as well as the Colorado State Magazine. College Essentials will aim to do a similar thing by building a community. However, we aim to target the entire college student population in general, regardless of what school that people attend. College Essentials will be more focused on the marketplace aspect, without alienating our target audience.

4. **[SFSU Bookstore] <https://www.bkstr.com/sanfranciscostatestore/home>**

- The SFSU bookstore is one of our main competitors we are trying to compare to when adding implementations and add usability to College Essentials. The SFSU bookstore is only a market place used to sell school supplies, SFSU orientated products and other miscellaneous products. There are no forum posts or any way to contact anyone on the SFSU bookstore website. SFSU bookstore is purely an online and in-person store front. College Essentials in comparison shall reimplement the online store aspect by allowing users to buy and sell products directly to other users, while adding more usability in how the marketplace itself functions. Users shall be able to resell their second hand products at prices of their choices, as well as interact with other users through direct messaging and user reviews. We shall also add more usability through variations in what is allowed to be listed as well as having different sections for forum posts for users to interact with one another.

5. **[Facebook Market] <https://www.facebook.com/marketplace/>**

- Facebook Marketplace functions similarly to Craigslist. It is centered around user interactions, with very little third party interactions, and therefore more likely that there is no liability for any scams that occur. This portion of the social media platform is more often than not considered as afterthought. Listed items are barely curated in any shape or form, so there can be fake listings which could lead to possible scams. Some of the features that it provides are, a location of the seller, details on the seller, price of the item, the condition of the item, and when the seller joined Facebook. However, the user details seems to be lacking since it provides little to no detail on the user

besides the info on their profile page; ie. when they joined facebook and where they live. There is a lack of a reviewer functionality such as the ability to validate the authenticity of the seller. The only way to check a review on someone is to do it through the facebook application on your phone, which is not available on pc. Some features are clearly missing from Facebook Marketplace for unknown reasons such as verified sellers and scam protection. It is more often than not a waste of time, and people are cautioned to use at your own risk. Comparatively we want to strive for a smaller audience with a more trustworthy system. A smaller audience curates a more professional environment, especially since it can be run by either students or teachers. We also want to minimize the amount of risk that users take so that they feel more comfortable returning to College Essentials again.

[Section VII] High-level System Architecture and Technologies Used

Server Host:	Corretto 11 running on 64bit Amazon Linux 2/3.2.15
Operating System:	Windows
Server Database:	MySQL
Web Server:	NGINX 1.12.2
Server-Side Language	Java
Web Framework:	Vaadin
IDE:	Visual Studio Code
Web Analytics:	Google Analytics
SSL Cert:	AWS Certificate Manager
SASS:	3.5.5

[Section VIII] Checklist

	Task	Status	Additional Comments
1.	Team found a time slot to meet outside of the class	DONE ✓	
2.	Github master chosen	DONE ✓	Our team had some hiccups after our initial Github master left, however new Github master has already been appointed
3.	Team decided and agreed together on the using the listed SW tools and deployment server	DONE ✓	
4.	Team ready and able to use the chosen back and front end frameworks and those who need to learn are working on learning and practicing	ON TRACK	Deemed on track since the project will require consistent learning about back and front end frameworks for consistent development
5.	Team lead ensured that all team members read the final M1 and agree/understand it before submission	DONE ✓	
6.	Github is organized as discussed in class (e.g. master branch, development branch, folder for milestone documents, etc.)	DONE ✓	

[Section IX] List of Team Contributions

Name	Contributions	Complaints
Ryan Murphy	Worked on Section: 1, 2, 3, 4, 5, 6, 7, 8 and 9. Helped set up the framework/website and about us page. Also helped with AWS set up.	
Duncan Forniss	Worked on Section: 1,2,3,4,5,6,7,8.	
Darren Wong	Worked on section: 2, 3, 4, 5, 6, 7 and 8. Worked on Framework/website and database.	
Brendan Leong	Worked on section: 2,3,4,5,6,7,8. Helped with framework/website setup.	
Justin Wong	Worked on section: 1, 2,3,4,5,6,7,8. Helped with AWS set up, framework/website and database.	