2

# Sprint 2 Planning Document

CS 307 - Software Engineering - Team 23

Alex Aralis, Patricia Chun, Jeremy Lehman, Zach Perry

# **Table of Contents**

<u>Table of Contents</u>	1
Sprint Overview	4
Summary	4
Risks and Challenges	4
Sprint Details	5
User Story #1*	5
<u>Tasks</u>	5
Acceptance Criteria:	5
User Story #2*	6
<u>Tasks</u>	6
Acceptance Criteria:	6
User Story #3*	7
<u>Tasks</u>	7
Acceptance Criteria:	7
User Story #4	8
<u>Tasks</u>	8
Acceptance Criteria:	8
<u>User Story #5</u>	9
<u>Tasks</u>	9
Acceptance Criteria:	9
User Story #6*	10
<u>Tasks</u>	10
Acceptance Criteria:	10

User Story #7	10
<u>Tasks</u>	10
Acceptance Criteria:	10
<u>User Story #8</u>	11
<u>Tasks</u>	11
Acceptance Criteria:	11
User Story #9	12
<u>Tasks</u>	12
Acceptance Criteria:	12
User Story #10	13
<u>Tasks</u>	13
Acceptance Criteria:	13
User Story #11	14
<u>Tasks</u>	14
Acceptance Criteria:	14
User Story #12	15
<u>Tasks</u>	15
Acceptance Criteria:	15
Remaining Backlog	16
Functional Requirements	16
Profile Features	16
<u>Codeversation Features</u>	16
Snippet Block Features	16
Server Features	16
Anonymous Features	17

	External Integration Features	17
No	on-Functional Requirements	17
	Response Time	17
	Scalability	17
	<u>Usability</u>	17
	Security	18

# **Sprint Overview**

## Summary

For our second sprint, we hope to have a deliverable that will be representative of something that could be in production. We want to deploy to a production server.

## Risks and Challenges

For this sprint, we will have to make up the stories we did not complete last sprint. This means we may have to some extra work, and some of the stories are dependent on other stories being finished first. This means we will have to stay focused, and make sure we are doing the work on time throughout the sprint. Also, we need to make sure we have a deliverable we can easily extend at the beginning of the next sprint, since we may have to present midway throught the sprint to the class.

Scrum Master: Jeremy Lehman

Meeting Schedule: Tuesdays and Thursdays at 3:00PM, Daily at 3PM via Slack

# **Sprint Details**

## User Story #1\*

As a user, I would like to log in to save my information and post history.

#### **Tasks**

Task#	Task Description	Estimated Time	Owner	Finished
1	Create database	4 hours	Patricia	Х
2	Create backend server	6 hours	Alex	Х
3	Implement account creation	6 hours	Alex	Х
4	Implement post saving	3 hours	Patricia	
5	Implement login screen	6 hours	Jeremy/Zach	Х
6	Implement post history screen	6 hours	Jeremy/Zach	Х
7	Implement backend handling authentication	6 hours	Alex	Х
8	Implement storage of posts on backend	3 hours	Patricia	
9	Implement user accounts on backend	4 hours	Alex	Х

- Given that the backend to create users is created successfully, when a request to create an account is made then the user's account will be added to the database given that the email has not been taken and the password is strong.
- Given that an account has been successfully created, when the user selects "Create new post" they should be taken to create new post screen
- Given that a user has successfully created an account, when a user attempts to login then they will be successfully authenticated
- Give that user has successfully created an account and are logged in, when they select "post history" then they will be directed to the post history page

As a user, I would like to be able to see the output of my code updated live.

### Tasks

Task#	Task Description	Estimated Time	Owner
1	Make post request to compiler microservice.	3 hours	Alex
2	Run compiled JS on client side.	5 hours	Alex
3	Create output component to display results.	4 hours	Alex
4	Detect when output has been invalidated.	4 hours	Alex

- Given that microservice has been successfully integrated, when a user compiled run the code, they will be able to see the output if the code runs, or the error messages if the code fails to compile.
- Given that a compiled JS snippet is received from the compiler microservice, when the
  code does not produce a result within 1s, indicate that the code does not execute and
  halt the execution thread.

As a user, I would like to post programming-related questions.

### Tasks

Task #	Task Description	Estimated Time	Owner
1	Create code snippet form component	6 hours	Jeremy
2	Create title component	2 hours	Zach
3	Implement snippet storage in database	2 hours	Patricia
4	Implement create new post screen	4 hours	Zach
5	Implement addition of new post to database	2 hours	Patricia
6	Implement create new post on backend	4 hours	Patricia

- Given a user has filled in the code snippet form correctly, when they click submit, they will be redirected to the post and it will be submitted properly to the database
- Given a user has incorrectly filled out the snippet form, when they click submit, then an error message will appear with error messages

As a user, I would like to see and make comments about the snippet.

### Tasks

Task#	Task Description	Estimated Time	Owner
1	Create comment component	2 hours	Zach
2	Create comment list component	2 hours	Zach
3	Implement comment storage in database	4 hours	Patricia
4	Add comment component to Post component	2 hours	Zach
5	Create comment creation component	2 hours	Zach
6	Implement comment creation in backend	4 hours	Patricia

- Given a user fills out the comment form, when they click submit, then comment will appear on the post and be submitted to the database
- Given that the comment functionality has been implemented correctly, when a user is on a post, then user is able to see existing comments about snippet.

As a user, I would like to see nested comments on a snippet.

### Tasks

Task#	Task Description	Estimated Time	Owner
1	Implement threaded comments in database	4 hours	Patricia
2	Implement threaded comments in post	2 hours	Zach

- Given the that a user comments on a previous comments, a user will see nested comments be able to read the comments organized with code commits.
- Given that user views a post, when there are nested comments, then the comments will be rendered appropriately

As a user, I would like to share my question via a web link.

### Tasks

Task #	Task Description	Estimated Time	Owner
1	Make code snippet component.	6 hours	Jeremy
2	Create Codeversation route.	1 hours	Jeremy
3	Create Codeversation component.	3 hours	Jeremy

### Acceptance Criteria:

- Given a user has a link to a post, when they go to aforementioned link, they will be directed to the proper post
- Given a user has a link they would like to share, when they share the link, then the receiver of the link will be able to navigate to their post

## User Story #7

As a user, I would like to delete my post

#### Tasks

Task #	Task Description	Estimated Time	Owner
1	Create delete route/implement in db	1 hour	Patricia
2	Create a delete button on posts in user history	3 hours	Zach

### Acceptance Criteria:

• Given a user wants to delete a post, when they click the delete button on the post in their history, then the post will be deleted

As a user, I would like to select a comment or snippet as a solution

### Tasks

Task#	Task Description	Estimated Time	Owner
1	Create solution field in database for comments	1 hour	Alex
2	Create button for solution selection	3 hours	Alex
3	Create way to differentiate original poster from viewer	3 hours	Alex
4	Allow user to change solutions	3 hours	Alex

- Given a user wants to select a solution, when they select the solution button, it will bring the comment to the top and annotate it with a checkmark
- Given a user wants to select a different solution, when they select the new solution, it will change out the previous solution for the new one

As a user, I would like to see things that other users have posted

### Tasks

Task #	Task Description	Estimated Time	Owner
1	Create post link component for front page	2 hour	Jeremy
2	Create front page container	5 hours	Jeremy
3	Allow user to navigate to codeversation from front page	3 hours	Jeremy

- Given a user sees a post they want to see on the front page, when they click a post, it will direct them to the appropriate post
- Given a user wants to see public posts, when they go to the front page, they see current recent posts

As a user, I would like to have a specific username when I post my question.

### Tasks

Task #	Task Description	Estimated Time	Owner
1	Associate users with the posts that they make in the schema.	2 hours	Alex
2	Display username on components that have owners (codeversations, snippet blocks, comments)	4 hours	Alex
3	Have names link to user profiles.	4 hours	Alex

- Given a user wants to post a question, when they post question, their username will appear as the poster
- Given a user wants to view a question, when they view it, they see the posters username
- Given a user wants to see the poster's profile, when they click on the posters name, they will be directed to their profile

As a user, I would like to be able to modify my profile settings

### Tasks

Task#	Task Description	Estimated Time	Owner
1	Create profile component	6 hours	Alex
2	Create update user route	2 hours	Zach
3	Create option button on header	3 hours	Jeremy
4	Create option to change password	2 hours	Jeremy
5	Create option to change email	2 hours	Jeremy

- Given a user would like to modify their current profile, when they select the option button, they will be directed to the profile settings page
- Given a user wants to change their settings, when they change their settings and submit, the data will be persisted to the database.

As a user, I would like to be able to view another user's profile

### Tasks

Task#	Task Description	Estimated Time	Owner
1	Differentiate profile component when viewed by the owner vs another person	3 hours	Jeremy
2	Hide personal info from other users	2 hours	Jeremy

- Given a user would like to view their profile, when they look at their own profile, they will be able to see private settings, as well as edit the profile
- Given a user would like to view another profile, when they view another person's profile, they can only see public information like name, public posts

<sup>\*</sup>This story was carried over from the previous sprint

# Remaining Backlog

### **Functional Requirements**

#### **Profile Features**

- 1. As a user, I would like to have onboarding for the app.
- 2. As a user, I would like to save other user's posts and comments.
- 3. As a user, I would like to block other users.
- 4. As a user, I would like to change the theme.

#### Codeversation Features

- 5. As a user, I would like to create snippets based on other snippets.
- 6. As a user, I would like to have private Codeveration.
- 7. As a user, I would like there to be specific moderators.
- 8. As a user, I would like to see things that other users have posted.

### **Snippet Block Features**

- 9. As a user, I would like to flag comments and posts for inappropriate content.
- 10. As a user, I would like to tag my post.
- 11. As a user, I would like to see other posts related to mine.

#### Server Features

12. As a user, I would like to get email updates. (if time allows)

### Anonymous Features

13. As a user, I would like to anonymously browse posts and comments.

### **External Integration Features**

- 1. As a user, I would like to be able to reference threads on Stack Overflow. (if time allows)
- 2. As a user, I would like to be able to import code from github. (if time allows)
- 3. As a user, I would like to create an account through github.
- 4. As a user, I would like to create an account through google.

### Non-Functional Requirements

### Response Time

- 1. Must be run on an Isomorphic server (server side rendering).
- 2. Page must be loaded in 60 seconds, or the page will time-out.
- 3. As a user, I would like compilation to have low response times.

### Scalability

- 4. Must be deployed on production server.
- 5. Must be able to service at least 100 simultaneous users.

### Usability

- 6. Must be able to be used on Android. (if time allows)
- 7. Must be able to be used on iOS. (if time allows)
- 8. Must be able to be used in a web browser.
- 9. Must be mobile compatible.

### Security

- 10. Users can view posts and comments, but can not post or comment themselves until they have logged in.
- 11. New users should have a semi random Captcha to prevent spamming.
- 12. Users should have a security question and answer to recover their password.