Purdue University
Sprint 2 Planning Document MonsterChat Application
Wonster Chat Application

## 1. Sprint Overview

For our second sprint we will be mainly focusing on adding more functionality and GUIs which will make our app look more polished and more refined than the prototype from the previous sprint. The three main goals of this sprint are:

1. Implement GUIs for all views for iOS.

2. Implement GUIs for all views for Android.

3. Integrate background Swift code with MCF.

Scrum Master: Rayten Rex

**Scrum Meetings/Time:** MWF at 1:00 pm

**Risks/Challenges:** 

We need to get certain functionalities implemented at a reasonable pace so we have enough time to build on those functionalities to get GUIs implement and have a more complete and polished second version.

## 2. Current Sprint Detail

**User Story:** As a user, I want to be able to change the color setting of the GUI because I want to customize my app experience.

Task Description	Estimated Time	Owner
Create a Settings page with the ability to change the GUI Color. (Android)	2	Cole
Create a Settings page with the ability to change the GUI Font. (iOS)	2	Vishal
Write the color setting to a config file (Android)	2	Andrew
Write the color setting to a config file (Android)	2	Rayten

**Acceptance Criteria:** If this user story is implemented successfully, users will be able to change the color of their GUI.

- On the settings page there is a section for Colors.
- Selecting the color option will bring up a list to select different color schemes.
- Once a Color Scheme is selected the colors for the rest of the GUI will be changed.
- The next time the app is opened, the color scheme will remain.

User Story: As a user, I want to be able to change the font setting of the GUI because I want to

customize my app experience.

Task Description	Estimated Time	Owner
Create a Settings page with the ability to change the GUI Font. (Android)	2	Cole
Create a Settings page with the ability to change the GUI Font. (iOS)	2	Zeyu
Write the font setting to a config file (Android)	2	Andrew
Write the font setting to a config file (iOS)	2	Rayten

**Acceptance Criteria:** If this user story is implemented successfully, users will be able to change the font of their GUI.

#### **Test Case:**

- On the Settings page there is an option to select a font.
- Selecting the font option will bring up a list to select different font settings.
- Once a font is selected the font in the GUI will be set.
- The next time the app is opened, the color scheme will remain.

**User Story:** As a user, I want to be able to change the theme of the GUI because I want to customize my app experience.

Task Description	Estimated Time	Owner
Create a Settings page with the ability to change the GUI Theme. (Android)	4	Cole
Create a Settings page with the ability to change the GUI Theme. (iOS)	4	Vishal

**Acceptance Criteria:** If this user story is implemented successfully, users will be able to change the theme of their GUI.

- On the settings page there is a section for Colors.
- Selecting the color option will bring up a list to select different color schemes.
- Once a Color Scheme is selected the colors for the rest of the GUI will be changed.
- The next time the app is opened, the color scheme will remain.

**User Story:** As a user, I want to be able to change the style setting of the GUI because I want to customize my app experience.

Task Description	Estimated Time	Owner
Create a Settings page with the ability to change the GUI Style. (Android)	4	Cole
Create a Settings page with the ability to change the GUI Style. (iOS)	4	Zeyu
Write the style setting to a config file (Android)	4	Andrew
Write the style setting to a config file (iOS)	4	Rayten
Embel an ability in setting page to upload user's own image as a chat background	4	Zeyu

**Acceptance Criteria:** If this user story is implemented successfully, users will be able to change the style of their GUI.

## **Test Case:**

- On the settings page there is a section for Styles.
- Selecting the style option will bring up a list to select different style settings.
- Once a Style Setting is selected the color, font, and backgrounds for the rest of the GUI will be changed.
- The next time the app is opened, the style will remain.

**User Story:** As a user, I want to be able to change my "in app name" across sessions because it will allow me to remain anonymous.

Task Description	Estimated Time	Owner
Create a Home Page with ability to change the Username. (Android)	4	Cole
Create a Home Page with ability to change the Username. (iOS)	4	Vishal

**Acceptance Criteria:** If this user story is implemented successfully, users will be able to change their name that is displayed when they chat.

- On the Home Page there is a text box with the username.
- The username can be changed here.
  - o If the username is not alphanumeric, a popup indicates that the name must be alphanumeric.
  - o The user cannot go to a chat room with an invalid username.

**User Story:** As a user, I want to be able to able to save my "in app name" across sessions because I do not want to have to type in my name everytime I use the app.

Task Description	Estimated Time	Owner
Write the username to a file (Android)	2	Andrew
Read the username from a file (Android)	2	Andrew
Write the username to a file (iOS)	2	Rayten
Read the username from a file (iOS)	2	Rayten

**Acceptance Criteria:** If this user story is implemented successfully, users will be able to save their usernames across sessions.

- When the app is opened the previous username will be shown.
- The next time the app is opened, the username will remain.

**User Story:** As a user, I want to be able to view my past conversation(s) because I would like to be able to access information that I may have forgotten.

Task Description	Estimated Time	Owner
Write chat messages to a log (Android)	8	Andrew
Read chat messages from a log (Android)	10	Andrew
Create a Log List window to display logged chats. (Android)	4	Cole
Create a Log View window to display logged chats. (Android)	4	Cole
Write chat messages to a log (iOS)	8	Rayten
Read chat messages from a log (iOS)	10	Rayten
Create a Log List window to display logged chats. (iOS)	5	Vishal
Create a Log View window to display logged chats. (iOS)	5	Zeyu
Create a search bar to easily find user's intend conversation among conversations(iOS)	2	Zeyu
Create a button to allow user to stick his most favourite conversation in the top of the logged chats (iOS)	5	Zeyu

**Acceptance Criteria:** If this user story is implemented successfully, users will be able to view their past conversations to see old information they might have forgotten.

- When the user opens the chat logs page, a list of any pre-existing logs will appear.
- When the user clicks on a log in the list, that specific log is opened and displayed to the user.
- Logs are created for each of the chat rooms that the user has been in.

**User Story:** As a user, I want to be able to view chat rooms because I want to know what chat rooms are available to me.

Task Description	Estimated Time	Owner
Retrieve a list of available chat rooms by querying surrounding devices of the chat rooms they are joined to. (Android)	4	Michael
Create a Chat Rooms List window that allows the users to view the available chat rooms (Global always exists). (Android)	4	Cole
Create a Chat Rooms List window that allows the users to view the available chat rooms(Global always exists). (iOS)	4	Zeyu
Create a search bar to find user's wanted chat rooms among available chat rooms(iOS)	3	Zeyu
Display missing number of messages and most recent conversation time beside the chat room name(iOS)	4	Zeyu

**Acceptance Criteria:** If this user story is implemented successfully, users will be able to view the Chat Rooms that are available for them to join.

- There is a chat rooms button on the main page
- When clicked, the user should be able to view all chat rooms within the range (approx. 200 ft.) of the device.

**User Story:** As a user, I want to be able to create and join chat rooms because I want to be able to chat with other users.

Task Description	Estimated Time	Owner
Add a button to Chat Rooms List that allows the user to create a chat room. (Android)	4	Cole
Add a button to Chat Rooms List that allows the user to create Chat Rooms. (iOS)	4	Vishal
Add a button to Chat Rooms List that allows the user to block unwanted Chat Rooms(iOS)	4	Zeyu
Create a search bar to find user's wanted chat rooms among available chat rooms(iOS)	3	Zeyu

**Acceptance Criteria:** If this user story is implemented successfully, users will be able to create and join chat rooms.

# **Test Case 1:**

- A chat room can be clicked on in the list of chat rooms.
- When the room is clicked on, the user is brought into the chat room to join the conversation.

#### **Test Case 2:**

- There is a button to create the new chat room on the page where the chat rooms are listed.
- When the button is clicked, there is a text field where the room name can be entered.
  - o If the room name contains characters that are not letters or numbers, then a popup will inform the user that the values in the field were wrong and reset to the page where the chat rooms are listed
- A new chat room is created, and the user is put into that chat room to start a conversation.

**User Story:** As a developer, I want to be able to log errors because I can use the error logs to figure out why the application failed to work.

Task Description	Estimated Time	Owner
Write error messages to a log (Android)	6	Andrew
Write error messages to a log (iOS)	6	Rayten

**Acceptance Criteria:** If this user story is implemented successfully, developers will be able to view errors and understand what crashed the program.

- When the program has an error, the error will be written to an error log.
- Users will not have direct access to the log, as it will not be displayed in the log list.
  - When connected to a computer with Android Studio, the error will print to the console.

**User Story:** As a user, I would like to be able to enable and disable timestamps because I would like to know when a message is received but also have the option to disable it.

Task Description	Estimated Time	Owner
Create a Settings page with the ability to enable/disable timestamps. (Android)	4	Cole
Create a Settings page with the ability to enable/disable timestamps. (iOS)	4	Zeyu
Write the timestamp setting to a config file (Android)	2	Andrew
Write the timestamp setting to a config file (iOS)	2	Rayten

**Acceptance Criteria:** If this user story is implemented successfully, users will be able to enable and disable timestamps.

### **Test Case:**

- On the Settings page there is an option for Timestamps
- When the option is selected Timestamps will appear in the Chat Rooms and Log.
- The next time the app is opened, the timestamp setting will remain.

**User Story:** As a user, I would like to change timestamps between military and standard time because I want to see the time in different formats to customize my chat experience.

Task Description	Estimated Time	Owner
Create a Settings page with the ability to change the time formatting. (Android)	4	Cole
Create a Settings page with the ability to change the time formatting. (iOS)	4	Vishal
Write the timestamp setting to a config file (Android)	2	Andrew
Write the timestamp setting to a config file (iOS)	2	Rayten

**Acceptance Criteria:** If this user story is implemented successfully, users will be able to customize their timestamps.

- On the Settings page there is an option for 24hr time formatting
- When the option is selected Timestamps (if enabled) will be displayed in 24hr format.
- The next time the app is opened, the timestamp formatting will remain.

**User Story:** As a user, I would like to improve the networking because I do not want to have to deal with any issues that could be caused by poor network management.

Task Description	Estimated Time	Owner
Have each device spawn a new thread upon opening the app to listen for incoming connections. (Android)	6	Michael
Spawn a new thread for each peer that connects to the device.  (Android)	6	Michael
Spawn a new thread for each connection a device sends out. (Android)	6	Michael
Ensure that connections with devices that disconnect are closed. (Android)	6	Michael
Ensure that threads terminate properly and close any streams and connections they may have made. (Android)	6	Michael
Conduct tests to determine delays between messages. (Android)	3	Michael
Conduct tests to determine device range which may vary per device. (Android)	3	Michael
Spawn multiple sessions per chat room. (iOS)	7	Vishal
Try to communicate between two different sessions. (iOS)	7	Vishal
Test to see if a user can belong to two distinct sessions at one time.  (iOS)	4	Vishal

**Acceptance Criteria:** If this user story is implemented successfully, users will be able to communicate with other users without noticing any issues that may arise due to poor networking. **Test Case:** 

NOTE: OS dependent. iOS and Android devices will not be interconnected in this sprint.

- Two or more Android or iOS devices will be able to communicate within their max range (Android: approx. 200 ft., iOS: unknown).
- When a message is sent while one or more devices are in the same chat room, the message will be received by all other devices.

## 3. Remaining Backlog

### **Functional:**

- 1. As a user, I want the ability to create and/or join a private chat room because I want to chat with a specific group of people without others being able to join.
- 2. As a user, I want to be able to view private chat rooms because I want to know what private chat rooms are available to me.
- 3. As a user, I want some kind of filter to minimize spam because I do not want to have my chat experience ruined by other users.
- 4. As a user, I want the ability to block the messages of other users because I do not want my chat experience ruined by other users.
- 5. As a developer, I want to be able to receive feedback from users because I can use the feedback to better the app.
- 6. As a developer, I want a secure method to transfer data because I do not want my users' personal information to be accessed by a third party.
- 7. As a user, I want to be able to send a picture because I want allow other people to see them.
- 8. As a user, I don't want pictures to clog up my chat because I do not want my chat experience to be cluttered by large images.

## **Nonfunctional:**

- 1. As a user, I want to send and receive messages quickly or in about under a second.
- 2. As a user, I want cross-platform communication because I want to be able to chat with users that have a different phone than me.(if time allows)
- 3. As a user, I want the application to run with as little RAM usage as possible.

- 4. As a developer, I want easy updates because I do not want it to be difficult to push updates to the user.
- 5. As a user, I want to be able to use this app without excessive battery strain because I want the app to run a long time without my battery running out.
- 6. As a user, I want my data to be secure in private chat rooms because I do not want a third party accessing my messages or information.
- 7. As a user, I want to be able to use this app on Windows phones.