**CMPE 131 Software Engineering**

**Assignment: Testing Plan**

* 1.
  1. Name: User Login
  2. Purpose:
     + Login user’s account and enable user’s further operations.
  3. Preconditions
     + User has registered an account and enter the login page.
  4. Input parameters or manual operations
     + User will have its account and password prepared and input in the text input form.
     + [Optional] User can check the “remember me” checkbox.
     + User will click the Login button to attempt the login.
  5. Expected results
     + Client will expect an HTTP response from backend API in a promise function.
     + Status code of the response will be 200 or 400. If not, throw an error message to the interface.
     + The HTTP response will be expected to include a JSON format return value from the API (result{}, success, errors[], messages[]).
     + If login succeeded, a token will be stored.
  6. Acceptance criteria
     + **Given** account name and password are inputted in the text entry box.
     + **When** I click on the login button.
     + **Then** client will attempt to log in. If it succeeds, the client will store the token and the login status then redirect to the home page. If failed, a message will be displayed.
* 2.
  1. Name: Room Creation
  2. Purpose:
     + Communicate with the backend API, create a room for users to share their contents.
  3. Preconditions
     + User has login and enter the room management page.
  4. Input parameters or manual operations
     + User will provide a room name and an invite code in the text entry form.
     + User will click the create button to create a room.
  5. Expected results
     + Client will be expecting an HTTP response from the backend API in a promise function.
     + Status code of the response will be 200 or 400. If not, throw an error message to the interface.
     + If creation succeeded (Status code 200), the room will be added to the list and displayed, an invitation link will be sent to user’s clipboard. If failed (Status code 400), an error message will be sent to user and displayed.
  6. Acceptance criteria
     + **Given** room name and invite code entered.
     + **When** I click on the create room button.
     + **Then** an HTTP request will be sent to the backend, the backend will attempt to make a room. If succeed, room will be added to client and an invitation link will be sent to user’s clipboard. If failed, an error message will be displayed.
* 3.
  1. Name: Media Upload
  2. Purpose:
     + Communicate with Cloudflare Stream API, store user’s upload media.
  3. Preconditions
     + User has login and entry a room, upload function unlocked.
  4. Input parameters or manual operations
     + User will select a media file from the browser’s file selection dialogue (with format filter of ‘mp4’).
     + [Optional] User can input a name in a text form.
     + User will click the upload button to start uploading.
  5. Expected results
     + Client will be expecting an HTTP response from the API in a promise function.
     + Status code of the response will be 200. If not, throw an error message to the interface.
     + The HTTP response will be expected to include a JSON format return value from the API (result{}, success, errors[], messages[]).
  6. Acceptance criteria
     + **Given** there is a media file prepared and selected.
     + **When** I click on the upload button.
     + **Then** the file will attempt to be upload and return JSON data from API after the upload process.
* 4.
  1. Room Joining
  2. Purpose:
     + Communicate with the backend API, join the user to the specific room so that it can view shared contents in the room.
  3. Preconditions
     + User has logged in and entered the rooms page, also an invitation link has been received from another user.
  4. Input parameters or manual operations
     + User will click on the join new room button.
     + User will input the room id and invite code from the invitation link.
     + User will click the join button to try joining.
  5. Expected results
     + Client will be expecting an HTTP response from the backend API in a promise function.
     + Status code of the response will be 200 or 400. If not, throw an error message to the interface.
     + If joining succeeded (Status code 200), client will receive JSON data of the room and contents will be displayed on the screen. If failed, an error message will be displayed.
  6. Acceptance criteria
     + **Given** room id and invite code entered.
     + **When** I click on the join room button.
     + **Then** an HTTP request will be sent to the backend, the backend will attempt to join user to the room. If succeed user will be joined and room data will be returned and displayed on the client. If failed, an error message will be displayed.
* 5.
  1. Media Streaming
  2. Purpose:
     + Stream media from Cloudflare Stream, let users view media stream together in the same room.
  3. Preconditions
     + User has logged in and entered a room.
  4. Input parameters or manual operations
     + User will click on a media content in the content list of the room.
     + User will click on the play button to start receiving the stream.
  5. Expected results
     + Client will be expecting a media stream from Cloudflare Stream.
     + The player component will parse the stream and display the media.
  6. Acceptance criteria
     + **Given** that I entered a room.
     + **When** I select a media in the content list of the room.
     + **Then** The media will be streamed to my client and ready to play.