

User Story:: Before and After Run

(pink-highlighted points are failure points, green-highlighted points are references to other user stories)

As a logged-in user who is about to go for a run/start a workout, I want to be able to...

Generate a Spotify playlist that will match my historical heart rate data on my previous workouts, using data from my FitBit/Apple Watch.

The playlist should be generated based on my Spotify listening history (ie, play songs from genres/artists I enjoy) and/or based on the form I filled out in which I input my genre preferences [see Initial Use story].

The playlist should also be generated based on the type of workout I'm doing.

I should be able to enter an estimated time for my planned workout, in order for the playlist to be tailored to my running time.

There should be a clear button that says 'generate playlist' after I've put in the data.

The songs that the app generates should be queued up for me on Spotify.

If there's not enough historical data (I don't have at least 1 runs/workouts logged on my health app), the app should display a message saying something like "Not enough historical data! Log 1 workout to use the app."

If I only have between 1 and 5 workouts logged, show a warning message letting me know that limited data might give me a less accurate playlist.

After my run, input feedback on how well the playlist functioned.

Whether I enjoyed the songs?

Songs I enjoyed and would like to save to my library.

If I hated songs or artists, designate those songs/artists to never be shown to me again.

After my run, I want the option to save the playlist to my Spotify library and share it with other users.

Option to save the playlist to Spotify.

Option to share my playlist with friends [see Friends story]: format something like "Jessica went on a run today! Here's what she was listening to..."

User Story:: Friends

Friends - once logged on through Spotify or Fitbit, I want to have a plethora of friendship features to use. On the app, I can see what my friends are doing on the side bar. I can choose to click on their profile picture to extend more information about what they have done over the past few days. I can see what workouts they finished and what public playlists they made.

I should be able to see some of their public playlists and what workouts they have finished. It is a good way for me to be inspired by what my other friends or users are doing on the app. One main feature is to be able to share their playlists created by this web app with other users. However, I would want this information to stay private if I choose to do so, because privacy is, first and foremost, important. I want to feel comfortable sharing my playlists when I choose to do so, rather than being forced to share it. Sometimes it might create a playlist that I am not particularly fond of sharing.

Some criteria:

When logging in, have an option for me to import all my friends from my spotify or fitbit app if they are also using the app.

My account is full of created playlists and I have the ability to share these with other users if I choose to do so

I should be able to visually see the friends that I am connected to and be able to see if they are using my playlists for their own workouts

Playlists should not be able to be modified unless the user chooses to have a collaborative playlist with another user

User Story:: User

User Login:

As a potential user,
I want to securely register by creating the account and password,
So that I can show that I'd like to use this feature and allow the system to access my data securely.

Acceptance criteria:

The account is registered in Spotify

As a registered user,
I want to be able to use my account and password to login
So that the system can authenticate me and I can trust it.

Acceptance criteria:

Password matches the account

As a registered/logged-in user,
I want to be able to change my password,
So that I can keep it secure.

Acceptance criteria:

Enter the old password correct

As a registered user,
I want to be able to request new password if I forgot it
So that I can always find a way to get my account and data back.

As a logged-in user,
I want to be able to login to
Just HealthKit
Just FitBit
Both,
So that I can allow access to those data and use feature [see Initial Use User Story]

User Story:: Visualization

Use Case Name: User History's Visualization

Primary Actor: Spotify, Healthkit, & Fitbit

Secondary Actors: User Dashboard & Database System

The user's history of the past week will be transformed into data visualizations. For the application to provide an output of the visualization, the user must be logged in. The data visualization will display information like total running distance, total workout duration, number of times worked out, calories burned, songs that were played during high-intense workouts, and other key metrics that relate music with fitness. The data visualization will rely on tables, charts, graphs, and lists to display the quantitative data and provide the information on the dashboard.

The user's visualization for the past week will automatically be updated and shown to the history every Sunday midnight. The user has the option of turning off the visualization dashboard in user settings. To display the user's visualization, the user must have worked out at least 2 times for 30 minutes each in the past week so enough information can be collected.

Every Sunday midnight, the dashboard in our web application will be updated to display the user's new data. This will only take place if the user has worked out 2 times for 30 minutes each. The user can then view the past week's visualization or any prior week's visualization by accessing the visualization dashboard. Songs that the user has listened to in the past week and important fitness metrics will be linked. For instance, one specific visualization will include the genre of music or music artists that were linked to calories burned – showing the user in what area did they work out most intensely. Patterns and long-term visualizations will be constantly updated and analyzed on the dashboard to allow the user to track their workouts and the effect of music selected by our application.

If the user has not worked out in terms of the preconditions, then no visualizations will be provided for that week. The visualization dashboard will not display any visualizations for that past week with a pop-up saying "No Visualization For This Week". Users can still see their past week's fitness information and musics listened to – however there will no data visualizations to provide analysis.

After displaying the visualization, the past week's data will be shown on the top of the data visualization. The user will have the option of selecting the visualization icon to open a new tab that provides in-depth information about past user fitness history.

User Story:: Initial Use

CS 411 - User Story - Initial Use

First, the user is informed of the application's core functionality: it uses the workout data of the user, analyzes it, and then creates playlists that match the user's heart rate/cadence over the course of their average workout. Below this information, the user sees the option to log in to start using the application.

After the user has successfully logged in [see User Login Story], the application collects the user's workout history from his/her/their iWatch and/or FitBit data and then presents these workout data points to the user as a list, together with the notification that the user can choose to either include all of his/her/their workouts in the analysis or to select only a subset of them. The user can then click a "Select all" button or click on the individual workouts to include them in the desired subset. After this selection has been completed to the user's desire, the user has to submit his/her/their selection by clicking a "Submit" button. If the "Submit" button is clicked but the selection does not include a single workout, the user will be shown an error message with the notification that at least one workout needs to be selected. The user will then be returned to the workout selection page.

The user will then be presented with several options: the user can choose to have his/her/their workout playlists to be created based on

the user's already existing playlists from his/her/their Spotify account (with an additional option of only including songs that are actually in these playlists or of also including songs that are similar to the ones in the playlists provided). If this option is chosen, the user will be presented with a list of his/her/their playlists. The user will be notified that either all of the playlists can be used in the creation of the recommended workout playlists or that the user can select a subset of them. The user again has the option to click a "Select all" button or to click on individual playlists to add them to the desired subset.

the user's preferred genres. If this option is chosen, the user will be presented with a list of popular genres. From this list, the user can select a desired subset by clicking on the individual genres.

the user's preferred artists. If this option is chosen, the user can search for desired artists and add them to a list.

After the selection process has been completed, the user will again have to submit his/her/their selection by clicking a "Submit" button. If the "Submit" button is clicked but the selection does not include a single playlist/genre/artist, the user will be shown an error message with the notification that at least one playlist/genre/artist needs to be selected. The user will then be returned to the previously chosen selection page.

After all the necessary data from the user has been gathered, the user will be redirected to the home page of the application [see Before Workout User Story].