

CS408

Fitness Tracker Pro

Product Backlog

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Product Backlog

Problem Statement:

Fitness enthusiasts usually keep their exercise journals every day, but it is hard to record and generate a vivid visualization of the work they achieved. They also want to know about their exercise patterns as well as sport suggestions. A “Fitness Tracker Pro” application can be created to satisfy all these needs.

Background Information:

Workout journal could help bodybuilders to achieve better goal and find their exercise pattern. Keeping note during exercise is popular in gym, but traditional way of making journal cannot help us track training trend. Also, we could find some excellent template to help people make their journal, but most of them are not user-friendly and require some acknowledge in fitness area. We aim to provide a professional application to solve the two problems. Users can not only save and have a general view of their exercise amount, but also exchange data with other people. Our program can help people do exercise in a fun and effective way.

Environment:

We are going to use Java as our primary language and Eclipse as develop platform.

For the server side, we will use a dedicated MySQL server.

For the client side, we will use a package named JavaFX for GUI, and JDBC for database connection.

Also, we will create a program launcher for Windows so that our user can run our program by simply double clicking.

Functional Requirements:

Backlog ID	Functional Requirements	Hour
1	As a user, I would like to select one from default plans as my personal plan when I first time enter the application.	10
2	As a user, I would like to create an account to share my fitness plan or history of exercise amount.	7
3	I would like to have option of logging in or registering account	6
4	As a user, I would like to have five tabs for home page: "home",	7

	"personal plan", "charts", "interactive", "wishlist", and switch between those tabs.	
5	As a user, I would like to see today's plan and a vivid chart showing actual amount of my exercise when I enter the application.	12
6	As a user in "personal plan" tab, I would like to create a new plan.	8
7	As a user in "personal plan" tab, I would like to edit my own plan by dragging activity into/out of the existing plan.	10
8	As a user in "personal plan" tab, I would like to add new activities into the existing activity list.	6
9	As a user in "personal plan" tab, I would like to share my own plan.	9
10	As a user in "charts" tab, I would like to see a chart with information of exercise amount (both planned and actual) with different time scale, such as week, month, year.	10
11	As a user in "charts" tab, I would like to see a chart with information of exercise amount (both planned and actual) with different exercise type.	7
12	As a user in "charts" tab, I would like to have an option to make my history of training amount public or private (need user log into account).	6
13	As a user in "interactive" tab, I would like to add other shared plans to my wishlist.	6
14	As a user in "interactive" tab, I would like to have a wishlist to save liked plans.	5
15	As a user in "interactive" tab, I would like to leave comment or rate other shared plans.	10
16	As a user in "interactive" tab, I would like to replace existing plans by liked plans from the wishlist in the "wishlist" tab.	10
17	As a user in "interactive" tab, I would like to compare my actual exercise amount with that of my friend in chart by entering the username of my friend in the "compare" side tab.	7
18	As a user, I would like to enter my actual amount of exercise.	4

19	As a user, I would like add activity into today's workout amount in the "home" tab.	4
	Total:	144

Will do if time allows:

As a user, I would like to find people with similar plan.

As a user, I would like see related video about training based on personal plan.

As a user, I would like to be shown a recommended video base on my personal plan to guide me to do exercise.

NonFunctional Requirements:

This program will be programmed in Java. We will use JavaFX library to write GUI.

This program is supposed to run smoothly on any computers which is as powerful as a modern entry-level laptop.

We have a dedicated MySQL server. All the clients can connect to this server to fetch shared training plans.

Our server is capable of handling at least one hundred concurrent requests spontaneously.

This program should provide friendly error messages without unexpected crashing.

Use Cases:

Backlog ID: 1

User Story: As a user, I would like to select one from default plans as my personal plan when I first time enter the application.

Name: Choose default plan

Actor action	System responses
1. User enter the application the first time.	2. Pop up a dialog with two buttons ("Fat Burn" and "Muscle Building") letting user choose a type of default exercise as their current plan.
3. Choose one type of default exercise plan by clicking corresponded button.	4. Dialog disappear.
	5. Enter into the "home" tab. Show today's plan based on the default exercise plan selected by the user.

Backlog ID: 2

User Story: As a user, I would like to create an account to share my fitness plan or history of exercise amount.

Name: Create account

Actor action	System responses
1. Click "Signup" button on the up-right corner of the application.	2. Sign up dialog appears
3. Fill username, password and password confirmation.	
4. Click "Finish" button	5. Sign up dialog disappears
	6. Show username on the up-right corner (substitute the "Signup" button) and the "Login" button become a "Logout" button.

Backlog ID: 3

User Story: I would like to have option of logging in account

Name: Log into account

Actor action	System responses
1. Click "Login" button on the up-right corner of the application.	2. Login dialog appears
3. Type username and password	
4. Click "Submit" button	5. Login dialog disappears
	6. Show username on the up-right corner (substitute the "Signup" button) and the "Login" button become a "Logout" button.

Backlog ID: 4

User Story: As a user, I would like to have five tabs for home page: "home", "personal plan", "charts", "interactive", "wishlist", and switch between those tabs.

Name: Switch tabs

Actor action	System responses
1. Click different tabs	2. Jump to the corresponding pages

Backlog ID: 5

User Story: As a user, I would like to see today's plan and a vivid chart showing actual amount of my exercise when I enter the application.

Name: home page display

Actor action	System responses
1. Open the application	2. Show today's exercise plan and the exercise amount chart on the "home" tab.

Backlog ID: 6

User Story: As a user in "personal plan" tab, I would like to create a new plan.

Name: Create plan

Actor action	System responses
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1. Click "Personal plan" tab	2. Jump to the "personal plan" page
3. Click "Clear" button near the plan	4. Current plan become blank (Old activities are removed from current plan)

Backlog ID: 7

User Story: As a user in "personal plan" tab, I would like to edit my own plan by dragging activity into/out of the existing plan.

Name: Edit plan

Actor Action	System responses
1. Click "personal plan" tab.	2. Jump to the "personal plan" page.
3. Click "edit" button near the exercise plan.	4. All the activities in the activity's list are enabled to drag, and the "edit" button becomes "finish" button.
5. Drag activity into the plan table .	6. Popup a dialog letting user enter the quantity or time of the activity when user drag the activity into the table.
7. Input the quantity/time of the activity can confirm it by clicking a button.	8. The activity shows up in the table in the day that user drags into.
9. Drag an activity out of the plan table.	10. Popup a dialog with two buttons ("Confirm" and "Cancel") asking whether user confirm this delete operation.
11. Click "Confirm" button.	12. Activity is removed from the plan table.

Backlog ID: 8

User Story:As a user in "personal plan" tab, I would like to add new activities into the existing activity list.

Name: Edit activity list

Actor action	System responses
1. Click "Add activity" button	2. Pops up a dialog

3. Fill activity name and select how that the activity will be measured(based on time length or quantity)	
4. Confirm information	5. Add activity dialog disappears, and added activity shows up in the list

Backlog ID: 9

User Story: As a user in “personal plan” tab, I would like to share my own plan.

Name: Share personal plan

Actor Action	System responses
1. Click “share” button near the plan table	2. Pop up a share dialog to confirm share
3. Confirm it	4. Share dialog disappears, user’s plan is shared with other users.

Backlog ID: 10

User Story: As a user in “charts” tab, I would like to see a chart with information of exercise amount (both planned and actual) with different time scale, such as week, month, year.

Name: Change time scale of chart

Actor Action	System responses
1. Choose “week” option as time scale.	2. Switch and display chart using data within a week.
3. Choose “month” option as time scale.	4. Switch and display chart using data within a month.
5. Choose “year” option as time scale.	6. Switch and display chart using data within a year.

Backlog ID: 11

User Story: As a user in “charts” tab, I would like to see a chart with information of exercise amount (both planned and actual) with different exercise type.

Name: View exercise graph based on exercise type

Actor Action	System responses
1. Choose exercise type from activities list	2. Display corresponding training exercise graph

Backlog ID: 12

User Story: As a user in “charts” tab, I would like to have an option to make my history of training amount public or private (need user log into account).

Name: Share personal training history

Actor Action	System responses
1. Click on “public” checkbox near the chart.	2. If user is not logged in, pop up login dialog; Otherwise, checkbox is checked (Other user can compete with user if the public option is checked).

Backlog ID: 13

User Story: As a user in “interactive” tab, I would like to add other shared plans to my wishlist.

Name: Add plan into wishlist

Actor Action	System responses
1. Click on “save” button near the plan that user want to add into the wishlist.	2. “Save” button become gray and the whole plan is added into user’s wishlist.

Backlog ID: 14

User Story: As a user in “wishlist” tab, I would like to view all saved plans.

Name: View wishlist

Actor Action	System responses
1. Click “wishlist” tab	2. Display all the plans that saved previously

Backlog ID: 15

User Story: As a user in “interactive” tab, I would like to leave comment or rate other shared plans.

Name: Rate and comment on shared plan

Actor Action	System responses
1. Click on “rate it” button	2. Show rating dialog for rate and comment input
3. Choose rate score and enter comments	
4. Click “submit” button	5. Rating dialog disappears

Backlog ID:16

User Story: As a user in “interactive” tab, I would like to replace existing plans by liked plans from the wishlist in the “wishlist” side tab.

Name: Replace current plan with saved plan

Actor Action	System responses
1. Click on “wishlist” tab.	2. Display “wishlist” page with plan liked.
3. Click on “replace” button of the plan want to use.	4. Popup a Dialog with “confirm” and “cancel” buttons to let user confirm the operation.
5. Click “confirm” button.	6. “Replace” button become gray and the user’s exercise plan replaced by the chosen plan in the wishlist.

Backlog ID: 17

User Story: As a user in “interactive” tab, I would like to compare my actual exercise amount with that of my friend in chart by entering the username of my friend in the “compare” side tab.

Name: Compare with another user

Actor Action	System responses
1. Input username of the person you want to compare with in the search box and hit “Enter”	2. Popup a graph comparing two users’ exercise amount history if the username exist and that user is willing to be compared

	(checked the “public” checkbox). Otherwise, display error message.
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Backlog ID: 18

User Story: As a user, I would like to enter my actual amount of exercise.

Name: Enter real training data

Actor Action	System responses
1. Input amount into textbox	2. Display the amount user input

Backlog ID: 19

User Story: As a user, I would like add activity into today’s workout amount in the “home” tab.

Name: Add new activity into today’s workout amount

Actor Action	System responses
1. Select an activity in the drop down box, input amount into textbox and click “add activity” button.	2. Display the activity name