
Use Cases

for

<Nutri-Vision>

Version 1.0 approved

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Revision History

Name	Date	Reason For Changes	Version
Haolun/Nahid	9/2/2024	First Draft	1
Haolun/Nahid	15/2/2024	Second Draft	2
Haolun/Nahid	27/2/2024	Third Draft	3

Use Case ID:	LM1		
Use Case Name:	Log meal		
Created By:	Haolun	Last Updated By:	Haolun
Date Created:	08/02/2024	Date Last Updated:	27/02/2024

Actor:	User
Description:	User wants to know about their meal's nutritional information.
Preconditions:	User must have the app installed on their device. User must have an account tied to the system.
Postconditions:	System brings the user to the Scanner UI.
Priority:	High
Frequency of Use:	High
Flow of Events:	<ol style="list-style-type: none"> 1. User clicks on the log meal button from home page 2. User will be brought to the Scanner UI
Alternative Flows:	LM1-AF-S1 user decides not to log meal: <ol style="list-style-type: none"> 1. User selects back. 2. System brings the user to the homepage.
Exceptions:	The database of the api does not have the calorie/nutritional content of the food input by the user
Includes:	Capture food image, Recapture Image, Identify food
Special Requirements:	Nil
Assumptions:	Nil
Notes and Issues:	Nil

Use Case ID:	CFI1		
Use Case Name:	Capture food image		
Created By:	Haolun	Last Updated By:	Haolun
Date Created:	08/02/2024	Date Last Updated:	26/02/2024

Actor:	User
Description:	User captures a food item image.
Preconditions:	<ol style="list-style-type: none"> 1. User must have a working camera on their device. 2. User must have allowed camera and gallery access permission for the app.
Postconditions:	<ol style="list-style-type: none"> 1. Nutritional information of the scanned food is displayed to the user. 2. Food item is logged in the user's dietary history.
Priority:	High
Frequency of Use:	High
Flow of Events:	<ol style="list-style-type: none"> 1. User selects the option to take a live photo of a food item or upload a photo from their gallery 2. The app processes the image and retrieves the nutritional information from the integrated API. 3. User will be brought to the Nutritional Information UI 4. The app displays the nutritional information to the user. 5. The app records down the nutritional information in the database and readily accessible at the History UI
Alternative Flows:	<p>CF1-AF-S1 user decides to upload image instead of scan:</p> <ol style="list-style-type: none"> 1. System processes the image and retrieves the nutritional information from the integrated API. 2. System displays the nutritional information to the user. <p>CF1-AF-S2 user decides to not to capture Image:</p> <ol style="list-style-type: none"> 1. User selects back. 2. System brings the user to the log meal page.
Exceptions:	If the app cannot recognize the food item, the user will be prompted to enter the food details manually.
Includes:	Recapture food image, Identify food
Special Requirements:	<ol style="list-style-type: none"> 1. Scanning feature must be quick and responsive to ensure a smooth user experience. 2. App must provide clear instructions for what is a good photo to be used for examining calorie content
Assumptions:	Nil
Notes and Issues:	Food might be covered/not seen in the photo, how to calculate the calories of those?

Use Case ID:	RFI1		
Use Case Name:	Recapture food image		
Created By:	Haolun	Last Updated By:	Haolun
Date Created:	08/02/2024	Date Last Updated:	26/02/2024

Actor:	User
Description:	User recaptures the food item image as the image was not clear.
Preconditions:	<ol style="list-style-type: none"> 1. User must have a working camera on their device. 2. Capture food image must happen first.
Postconditions:	<ol style="list-style-type: none"> 1. Nutritional information of the scanned food is displayed to the user. 2. Food item is logged in the user's dietary history.
Priority:	Low
Frequency of Use:	Low
Flow of Events:	<ol style="list-style-type: none"> 1. The user will be prompted to take or upload another photo of the food item. 2. The app processes the image and retrieves the nutritional information from the integrated API. 3. User will be brought to the Nutritional Information UI 4. The app displays the nutritional information to the user. 5. The app records down the nutritional information in the database and is readily accessible at the History UI.
Alternative Flows:	RFI1-AF-S1 user's image is not clear again: <ol style="list-style-type: none"> 1. Repeat RFI1
Exceptions:	If the system cannot recognize the food item, the user will be prompted to enter the food details manually.
Includes:	Identify food
Special Requirements:	<ol style="list-style-type: none"> 1. The scanning feature must be quick and responsive to ensure a smooth user experience. 2. The app must provide clear instructions for what is a good photo to be used for examine calorie content
Assumptions:	Nil
Notes and Issues:	Nil

Use Case ID:	VH1		
Use Case Name:	View History		
Created By:	Muhammad Nahid	Last Updated By:	Muhammad Nahid
Date Created:	08/02/2024	Date Last Updated:	16/02/2024

Actor:	User
Description:	User gets to view his past logged meals and track his dietary progress.
Preconditions:	User must have logged at least one meal prior.
Postconditions:	System will direct the user back to the home page or to the view meal entry page.
Priority:	Medium
Frequency of Use:	High
Flow of Events:	<ol style="list-style-type: none"> 1. User navigates to the view history section on the app. 2. User selects the date range with the default being set to show all history.
Alternative Flows:	<p>VH1-AF-S1 if user has not logged any meals:</p> <ol style="list-style-type: none"> 1. System shows "no meals logged". <p>VH1-AF-S2A if user selects invalid date range:</p> <ol style="list-style-type: none"> 1. System displays string "invalid date range". 2. System sets to default date range showing all history. <p>VH1-AF-S2B if user selects back:</p> <ol style="list-style-type: none"> 1. System brings user back to home page.
Exceptions:	Nil
Includes:	View Meal Entry.
Special Requirements:	Nil
Assumptions:	Users saved past meal logs accurately.
Notes and Issues:	Need to determine if the app will display charts and figures of the user's dietary progress.

Use Case ID:	VME1		
Use Case Name:	View Meal Entry		
Created By:	Muhammad Nahid	Last Updated By:	Muhammad Nahid
Date Created:	08/02/2024	Date Last Updated:	16/02/2024

Actor:	User
Description:	User gets to view a particular meal's nutritional info.
Preconditions:	User must have scanned a food item or clicked on a specific meal entry from view history.
Postconditions:	User will confirm the meal entry or edit meal entry.
Priority:	High
Frequency of Use:	High
Flow of Events:	<ol style="list-style-type: none"> 1. User views his meal information. 2. User determines whether the information displayed is accurate. 3. User selects confirm. 4. System stores users' meal into database. 5. System updates view meal history page. 6. System brings user back to home page.
Alternative Flows:	<p>VME1-AF-S1A if meal information is not correct:</p> <ol style="list-style-type: none"> 1. User selects edit. 2. User is brought to edit meal entry page. <p>VME1-AF-S1B if user decides to select back and was previously from view meal history page:</p> <ol style="list-style-type: none"> 1. User selects back. 2. User is brought to view meal history page. <p>VME1-AF-S1B if user decides to select back and was previously from capture food image page:</p> <ol style="list-style-type: none"> 1. User selects back. 2. User is brought to capture food image page.
Exceptions:	Nil
Includes:	Confirm Meal Entry.
Special Requirements:	Nil
Assumptions:	Nil
Notes and Issues:	Nil

Use Case ID:	EME1		
Use Case Name:	Edit Meal Entry		
Created By:	Muhammad Nahid	Last Updated By:	Muhammad Nahid
Date Created:	08/02/2024	Date Last Updated:	26/02/2024

Actor:	User
Description:	User gets to edit his meal entry to improve the accuracy.
Preconditions:	User must have clicked on edit meal from view meal entry page.
Postconditions:	System will save meal entry upon confirmation.
Priority:	Medium
Frequency of Use:	Medium
Flow of Events:	<ol style="list-style-type: none"> 1. User is asked to input their meal into a search bar. 2. User selects his meal from the list of closest matches. 3. User selects confirm.
Alternative Flows:	<p>EME1-AF-S1 If user decides to select back:</p> <ol style="list-style-type: none"> 1. User selects the "back" button. 2. User is brought to view meal entry page. <p>EME1-AF-S2 If user's meal is not in database:</p> <ol style="list-style-type: none"> 1. The user does not see his meal in the list of options. 2. The user selects "Enter Manually" button 3. The user inputs the name of the meal and it's macros manually, based on his personal estimation. 4. The user selects confirm.
Exceptions:	Nil
Includes:	Confirm Meal Entry.
Special Requirements:	Nil
Assumptions:	Nil
Notes and Issues:	Nil

Use Case ID:	CME1		
Use Case Name:	Confirm Meal Entry		
Created By:	Muhammad Nahid	Last Updated By:	Muhammad Nahid
Date Created:	08/02/2024	Date Last Updated:	16/02/2024

Actor:	User
Description:	User confirms a meal entry after scanning or editing, which then gets updated in the system.
Preconditions:	User must have viewed the meal entry or edited the meal entry prior.
Postconditions:	System will update the database on the user's meal. System will update the view meal history page. System will direct the user back to the home page.
Priority:	High
Frequency of Use:	High
Flow of Events:	<ol style="list-style-type: none"> 1. User selects confirm. 2. System updates the database. 3. System updates view meal history page with new meal entry. 4. User is brought to the home page.
Alternative Flows:	CME1-AF-S1 If user selects back instead of confirm: <ol style="list-style-type: none"> 1. User selects back. 2. User is brought to the edit meal entry page.
Exceptions:	Nil
Includes:	Nil
Special Requirements:	Nil
Assumptions:	Nil
Notes and Issues:	Nil

Use Case ID:	RG1		
Use Case Name:	Registration		
Created By:	Haolun	Last Updated By:	Haolun
Date Created:	08/02/2024	Date Last Updated:	27/02/2024

Actor:	User
Description:	User registers a unique account with username and password.
Preconditions:	<ol style="list-style-type: none"> 1. User must have the app installed. 2. User account must not already exist in the database.
Postconditions:	User is able to log in with their unique username and password.
Priority:	High
Frequency of Use:	Low
Flow of Events:	<ol style="list-style-type: none"> 1. User will register on the login page. 2. User has to register a brand new username 3. User has to register a brand new password. 4. The username and password will be stored in the database. 5. User will be able to login with their username and password
Alternative Flows:	<p>RG1-AF-S1 if user has already registered:</p> <ol style="list-style-type: none"> 1. The user has registered and proceeds to login. <p>RG1-AF-S2 if username already exists (After checking with the database):</p> <ol style="list-style-type: none"> 1. User has to re-enter another username. 2. User has to register a brand new password. 3. The username and password will be stored in the database. 4. User will be able to login with their username and password. <p>RG1-AF-S3 If the password does not meet the requirements:</p> <ol style="list-style-type: none"> 1. System will prompt user about the requirements 2. User has to re-enter a new password. 3. The username and password will be stored in the database. 4. User will be able to login with their username and password
Exceptions:	Nil
Includes:	Set/Edit Personal Information
Special Requirements:	The password must have a minimum of 8 characters, 1 upper case, 1 lower case, 1 numeric character, 1 special symbol.
Assumptions:	Nil
Notes and Issues:	Nil

Use Case ID:	SEPI1		
Use Case Name:	Set/Edit Personal Information		
Created By:	Haolun	Last Updated By:	Haolun
Date Created:	08/02/2024	Date Last Updated:	27/02/2024

Actor:	User
Description:	User is able to set and edit their personal information.
Preconditions:	User must be registered.
Postconditions:	User's personal information will be saved in their profile
Priority:	Medium
Frequency of Use:	Low
Flow of Events:	<ol style="list-style-type: none"> 1. User will be prompted to enter their personal information. 2. User clicks on the edit profile button and input their personal information and clicks save after finishing 3. System will check for the validity of the information and save the user's personal information in the database.
Alternative Flows:	<p>SEPI1-AF-S1 user decided not to enter personal information:</p> <ol style="list-style-type: none"> 1. User press on the skip button. 2. User will be brought to the homepage. <p>SEPI1-AF-S2 user enters invalid personal information:</p> <ol style="list-style-type: none"> 1. User will be prompted to correct the invalid information. 2. Repeat SEPI1-AF-S2 until all information are valid. 3. Valid information will be then saved in the database.
Exceptions:	Nil
Includes:	Nil
Special Requirements:	Nil
Assumptions:	Nil
Notes and Issues:	Nil

Use Case ID:	LG1		
Use Case Name:	Login		
Created By:	Hao Lun	Last Updated By:	Muhammad Nahid
Date Created:	08/02/2024	Date Last Updated:	09/02/2024

Actor:	User
Description:	User is able to login with their username and password
Preconditions:	User must be registered.
Postconditions:	User will have access to all the functionality of the app.
Priority:	High
Frequency of Use:	High
Flow of Events:	<ol style="list-style-type: none"> 1. User will open the app 2. User will enter their username and password 3. System will check against the database if the password is correct. 4. User will be logged in and brought to the homepage.
Alternative Flows:	<p>LG1-AF-S2 if user enters wrong username: System prompts user to re-enter username.</p> <ol style="list-style-type: none"> 1. User will enter their password. 2. User will be brought to the home page. <p>LG1-AF-S3 if user enters wrong password:</p> <ol style="list-style-type: none"> 1. System prompts user to re-enter password 2. User will be brought to homepage
Exceptions:	Nil
Includes:	Nil
Special Requirements:	Nil
Assumptions:	User remembers the username and password.
Notes and Issues:	Nil