

Project Design Phase-II

Solution Requirements (Functional & Non-functional)

Date	14/10/2022
Team ID	PNT2022TMID47422
Project Name	Project – Nutrition Assistant Application
Maximum Marks	4 Marks

Project description:

This project is aimed at developing a desktop-based application named Nutrition Assistant Application for estimates food attributes such as ingredients and nutritional value by classifying the input images of food. The Nutrition Assistant Application refers to the system and processes to help the user to analyse the intake of food with the involvement of a Technology system. This system can be used to store the details of the user's health, classifying the food image to know the nutritional value, update the status of their health condition based on the information provided, and generate health reports. The Nutrition Assistant Application is important to control their daily calorie intake by eating healthier foods, which is the most basic method to avoid obesity. Without proper diet control, and this is reflective of the risks to people's health. A good Nutrition Assistant Application will alert the users when it is time to avoid. This project aims at building a web App that automatically estimates food attributes such as ingredients and nutritional value by classifying the input image of food.

Scope:

- **Maintains good health:** The application can help in guiding them on how to remain healthy and how to take good nutrition. The application will help them without personally going to the doctor. Promote better nutrition in the community by educating about better diet and nutrition.
- **Functional limitation:** The user to be specific can't access the web or admin module, whereas the administrator has all the rights to modify and manage the contents such as news, tips, etc .
- **Improve Usability:** In the part of user's just the internet connection is enough in order to access the news, updates and other contents provided by the admin regarding their health condition.
- **Health conscious:** This will provide convenience to persons/users who wants to learn about nutrition and other related health topics by just using the Nutrition Assistant Application.

Purpose:

The users continue to demand to know the nutritional value that is in their food. The users learn about the effect of different foods on human health. Evidently, the ultimate aim of this application is to provide the ways in which one can lead a healthy life by maintaining his/her diet. The user can access the nutritional information by taking a photo of the food, uploading a photo from the gallery, or by entering manually.

Nutrition is more than just obtaining nutrients and calories from food. It's more than just eating the healthy stuff. It's more than just following the most recent fad diet. Nutrition, the food we eat and the way we eat it, is an integral part of life. Nutrition is an experience. It evokes memories, helps us celebrate good times, and is there for us in times of grief. I believe the purpose of nutrition is to nourish the body and soul. The Nutrition Assistant Application helps the users to eat nutritional rich food which yield to lead a healthy life.

Functional Requirements:

Following are the functional requirements of the proposed solution.

FR No.	Functional Requirement (Epic)	Sub Requirement (Story / Sub-Task)
FR-1	User Registration	Registration through Form Registration through Gmail And set a unique Password.
FR-2	User Login	User can login to the Application page whom already registered the registration.
FR-3	User Request	The user sends the request to the server to know about the food nutrition value and calories
FR-4	Server Response	The server sends the response to the user sent requested, that to display the nutrition value of the user sent image.
FR-5	User activity	The user will check the BMI value through the BMI calculator and then get the proper diet plan.
FR-6	User -> Server Server -> User (User interaction with the application)	First the user will send the request, (they took a picture and upload it to the page) then the server responds the user sent request (the server notify the picture and upload the nutrition value of the given picture).

Non-functional Requirements:

Following are the non-functional requirements of the proposed solution.

FR No.	Non-Functional Requirement	Description
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NFR-1	Usability	The user will use the application through the internet. There is a diet plan for individual BMI valued person. So, that was effective to the user.
NFR-2	Security	We maintain the normal secured protocol for the security systems. To prevent the user information's.
NFR-3	Reliability	Its so reliable to the users because the information we are providing on the web application is totally taken the nutrition consultant and some top references of the nutrition value pages.
NFR-4	Performance	The performance of the application depends upon the network and internet level of high. And it's performed when the server systems on.
NFR-5	Availability	Its available to every people who has smart phones, laptops and tablets with the good internet service. Its nor has any premium plans so its available for every user.
NFR-6	Scalability	Its all about the server system side and we are providing a service for a short scale of users. This application will run how long the server systems were going through.