

# NUTRITION ASSISTANT APPLICATION

## PROBLEM STATEMENT

Due to the ignorance of healthy food habits, obesity rates are increasing at an alarming speed, and this is reflective of the risks to people's health. People need to control their daily calorie intake by eating healthier foods, which is the most basic method to avoid obesity. However, although food packaging comes with nutrition (and calorie) labels, it's still not very convenient for people to refer to App-based nutrient dashboard systems which can analyze real-time images of a meal and analyze it for nutritional content which can be very handy and improves the dietary habits, and therefore, helps in maintaining a healthy lifestyle.

The main objective of this project is to building a web App that automatically estimates food attributes such as ingredients and nutritional value by classifying the input image of food.

### **PROBLEM STATEMENTS:**

#### **1. Who are all affected by this issue?**

- People from all age group who are all careless about their health due to their busy schedule and high calorie diet.
- This leads to an unhealthy lifestyle because of their eating habits.
- Thus leads to many health issues like obesity, heart attack, diabetics and rise in cholesterol level.

#### **2. What are the boundaries of the problem?**

- Based on the information collected from the user, if the user is diagnosed with diabetes/Heart attack/obesity then the application provides information about diet.
- The application sets some boundaries on the user's food habits to maintain their diet and improve their condition.
- The boundaries are set on the age group of people like elder persons who have some problems with digestion so they will be provided with that information.

### **3.What is the issue?**

- Peoples are struggling to find if the packed food is good for their health or not having conflict with themselves.
- They don't know about the ingredients used in that dish and calories present in them.
- To help them to solve this problem they can take a clear picture of the food and know what are nutrients are present in that food or search for the food recipes which are suitable for them.

### **4.When does the issue occur?**

- When people want to try western culture food habits which are not suitable for our country.
- This issue will occur when people eat unhealthy food like packed or fast food because they are busy with their work and they are not giving importance to their health and food habits.
- Some people like food lovers who want to taste different dishes without knowing its effect, this leads to obesity and other health problems.

### **5.Where does the issue occur?**

- Mostly this issue occurs in developed and developing countries.
- Packed or fast food is convenient and time saving for the people who work in the IT industry.
- Slowly the intake of this food will cause to increase in insulin and cholesterol level which causes diabetes and heart attack.

### **6.Why is it important that we fix the problem?**

- This application is used to control the serious health issues before it becomes fatal.
- It helps users to improve their health and switch to a healthy lifestyle.
- For knowing what are all the ingredients present in the food and their calories present in the food they are consuming is suitable for their body condition.
- It reduces the risk of heart disease, stroke, obesity and any other health problems.
- By maintaining the balanced diet people can also boost their mood and gain more energy.

