Project Report

Title of Project:

nutrifind

Name of the Innovator:

Shirisha Gundu, Vanga Vaishnavi Akshaya Shivaratri

Start Date:

11-02-2026

End Date:

18-02-2026

Day 1: Empathise & Define

Step 1: Understanding the Need

Which problem am I trying to solve?

People want to eat healthy but struggle to understand nutrition labels and adjust serving sizes correctly. There is no simple tool that allows easy food search, serving-based calculation, and comparison in one place.

Who is affected by this problem?

People trying to maintain a healthy diet, gym-goers, students, and individuals managing weight or medical conditions like diabetes are affected because they need accurate and adjustable nutrition information.

How did I find out about this?

Step 2: Problem Statement

Users need an easy way to search food, adjust serving sizes, compare nutrition values, and save healthy options — without navigating complex apps.

Why is this problem important to solve?

Poor food decisions come from lack of clear data.
Small improvements in food awareness lead to:
Better health
Better fitness outcomes
Lower medical risks
Smarter daily choices

Take-home task insights:

From building the Nutrition Info Finder web app, I learned how to design a user-focused application with features like food search, nutrition display, serving size adjustment, and comparison. This project improved my understanding of using React.js for interactive interfaces and Tailwind CSS for styling.

I also gained experience integrating AI through the Gemini API to fetch and calculate nutritional data, and using LocalStorage to save user preferences like favorites. Overall, this project helped me understand real-world web development workflow and the importance of combining AI tools with frontend technologies to create useful applications.

Day 2: Ideate

Step 3: List at least 5 different solutions:

1. Basic nutrition lookup app with search bar

2. Nutrition tracker with calorie calculator

3. -powered Nutrition Info Finder with comparison & suggestions

4. Diet planner based on user goals

5. Healthy food recommendation chatbot

Step 4: My favourite solution:

AI-powered Nutrition Info Finder Web App that allows users to search foods, view nutritional breakdown, adjust serving sizes, compare foods, and save favorites using Gemini API.

Step 5: Why am I choosing this solution?

This solution is practical and impactful because:
People want quick and reliable nutrition information
It helps users make healthier food choices
AI integration makes it smart and interactive
Food comparison feature adds unique value
Easy to use and scalable

Day 3: Prototype & Test

Step 6: What will my solution look like?

The prototype is a React-based web app with:
A search bar to enter food name
Display section styled like a nutrition label (using Tailwind CSS)
Serving size input to dynamically adjust values
Comparison panel for two foods
Favorites section saved using LocalStorage
Gemini API is used to fetch nutrition data, calculate per serving values, compare foods, and suggest healthier alternatives.

What AI tools will I need?

Nutrition data provider
Serving size calculator
Food comparison engine
Healthy alternative recommender

Selected AI tools:

1. Gemini API

2. React.js

3. Tailwind CSS

4. LocalStorage

5. Vite (for project setup)

Step 7: Test - Getting Feedback

Who did I share my solution with?

Shirisha Gundu, Vanga Vaishnavi Akshaya Shivaratri

What works well:

Fast food search
Clean nutrition label UI
Accurate per-serving calculations
Smooth comparison feature
Favorites saving correctly

What needs improvement:

Add loading animation
Improve mobile responsiveness
Add more micronutrient details
Add dark mode
Improve error handling

Day 4: Showcase

Step 8: Final Project Title:

nutrifind

1-Minute Pitch Summary:

Smart Nutrition Info Finder is an AI-powered health web app that helps users instantly check nutritional information of any food item. Users can adjust serving sizes, compare two foods side by side, and save their favorite foods for future reference. The app uses Gemini API to provide accurate nutrition data, calculate values per serving, and even suggest healthier alternatives. Built with React and Tailwind CSS, the app is fast, responsive, and user-friendly. It empowers people to make smarter and healthier food choices.

Step 9: Reflections

What did I enjoy the most?

Integrating AI with real-world health use case
Designing nutrition label UI
Building comparison logic
Seeing dynamic serving calculations work

What was my biggest challenge?

Structuring Gemini API prompts correctly
Handling dynamic serving size recalculations
Managing state in React
Formatting nutrition data consistently

Project Link:

https://github.com/shirishagundu06-gif/nutrifind