



# Online FOOD Ordering System - Project Proposal Format

Bachelors of computer application (Tribhuvan Vishwavidalaya)



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**Tribhuvan University**  
**Faculties of Humanities and Social Sciences**

**ONLINE FOOD ORDERING SYSTEM**  
**A PROJECT PROPOSAL**

**Submitted to**  
**Department of Computer Application**  
**Danfe College**  
**Sinamangal, Kathmandu**

*In partial fulfillment of the requirements for the Bachelors in Computer Application*

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# INTRODUCTION

An online food ordering system is a portal where customers can order their favorite dish from best restaurants available. It links customers and restaurants directly as a medium to connect them. Many famous restaurants exist who are not registered on popular food ordering websites but customer would still like to order food from those places. Some restaurants cannot afford to pay extra for the entire ambience. It provides them with the platform to expand their food business.

Not all restaurants provide their customers to order from their very own website, and some don't even have the websites. Our website will also be deployed to various restaurants website via which customers can order food. For those restaurants who do not have their own website like different small and local food business, can register themselves to get our service. And hence, customers can order food from varieties of restaurants, be it popular or local restaurants, bakery or cafe. So, the system designed in this project will enable customers go online and place order for their food. Due to the great increase in the awareness of internet and the technologies associated with it, several opportunities are coming up on the web. So many businesses and companies now venture into their business with ease because of the internet. One of such business that the internet introduced is an online food ordering system. In today's age of fast food and take out, many restaurants have chosen to focus on quick preparation and speedy delivery of orders rather than offering a rich dining experience. Until recently, most of this delivery orders were placed over the phone, but there are many disadvantages to this system.

The main goal is to maintain the restaurant's functions in an effective and accurate manner and also it is reducing the use of manual entries. This software helps food orders to maintain day to day records in system. It is keeping a proper record of the database. I propose an online ordering system originally designed for use in any food delivery industry. The main advantage of this system is that it greatly simplifies the ordering process for both the customer and the restaurant. The system also greatly lightens the load on the restaurants end, as the entire process of taking orders is automated. This allows the restaurant employees to quickly go through the orders as they are placed and produce the necessary items with minimal delay and confusion. The greatest advantage of this system is its flexibility.

## **PROBLEM STATEMENT**

The challenges encountered by the existing system serve as a major drawback to the realization of efficiency and customer satisfaction. The experience of ordering in most restaurants is not pleasant for the customers. Customers will have to make long queues before placing their orders especially during peak hours and then the ordering staff will record customer orders. Having placed their order, the customer must then wait near the counter until their order is ready for collection. The other problem in the food service industry is that restaurants are not realizing the efficiencies that would result from better application of technology in their daily operations.

Food business is a very competitive business and one way to stand out from competitors is through improving the business process where business process automation can assist business improvement. The other problem with the current system is that the customers are not able to see the ingredients of the meals before they place their order and also, they only have to pay for an order online. Food can be ordered through the internet and payment made without going to the restaurant or the food vendor. So, there is need for a wide range of publicity and enabling direct order, processing and delivering of food through online system. For this system, there will be a system administrator who will have the rights to enter the menu with current prevailing prices.

## OBJECTIVES

The main objective of this project is to develop an application which gives provision to the restaurant owners to flourish their business by uploading menus at no cost and will invariably lead to higher customer retention and acquisition rates. The objective of this system is

- to develop a web-based food ordering system that provide ordering platform to the customers.,
- to keep record of all the information of food, customer, order, and restaurant.

# METHODOLOGY

## a. Requirement Identification

As this year has been so difficult for the human world, due to the pandemic we were not able to use the primary sources of requirement identification. But we have used some of the secondary sources in order to meet the requirements of our project.

### i. Study of Existing System

The existing system refers to the system that is currently being followed by the food deliveries. Presently all the functionalities are done manually. If customer wants to order an item, he should visit the restaurant, order food items, pay for the items and get the food items slip. Then he should go to the food counter to get the food taking the bill. Then only he can get the food. This makes the person quite difficult and tedious since they must stay in the queue. The main disadvantage is time consuming and it makes difficult for the manager to know the customer's past history. So to avoid these limitations and make the system working more accurately it needs to be computerized.

### Problems of Existing System

- While taking the orders of the customers, sometimes mistakes might be made.
- There is lack of understanding between the customers and restaurant employees.
- It is time consuming for the customers to wait for their order until it is ready to be served.
- The process of taking orders from the customer is very tedious that makes impossible to deliver goods on time.
- The record keeping system is poor which might cause loss of vital records of the past and cannot protect files from unauthorized access.
- It is difficult for Managers to supervise all the sides of restaurants like kitchen, floor and customer simultaneously.

### Advantages of Proposed System

To overcome the restrictions of the above system, Online Food Ordering System is proposed which has the following advantages:

- People can successfully order the food using the proposed system.
- There will be a lesser requirement of staff at the back counter.

- The system will help in reduction of labor cost involved and also reduces the space required to set up restaurants in the restricted area.
- All the records of the current and ex-staffs will be stored in the database.
- As it is an automated system it is less probable to make any mistakes.
- The customers can avoid the long queues at the counter, with a reasonable speed of execution and maximum throughput.

## ii. Requirement Collection

In order to develop the proposed system first requirement analysis is done considering past researchers and existing systems. Required data is gathered by study of manuals. Then the system is implemented. A theme for the app will be selected ideas of the group members. Then each member is requested to complete their allocated task. Finally, the system is integrated. Once the goal was set, requirement collection process began to get information about the online food ordering system history and past works on this domain. Following methods have been used for requirement collection:

- **Literary Analysis**  
Literatures have been reviewed and critically analyzed to find what kind of works have been suggested in past. These works helped in finding the shortcomings of past solutions and defining the aim and objectives of the project.
- **Observation**  
Number of restaurant websites have been reviewed to find the current trend in developing web application for restaurants. Along with this, typical restaurant ordering system has been reviewed to get an insight of online order processing system.
- **Study of manuals**  
Manuals and report based on online food ordering system were obtained and studied and a lot of information concerning the system to be produced was obtained.
- **Brainstorming**  
Brainstorming has been used for the creative and idea generation by the team members. The requirements for the system somewhat collected from the brainstorming method as well.



## **b. Feasibility Study**

The analysis of feasibility has concluded that the project is feasible with respect to time and cost. The technology used to develop are almost Open Source, therefore less cost for implementation and maintenance will be involved.

### **i. Technical**

The system can be implemented in various technologies which are presently available as well as in all technologies which will be implemented in future.

- **Hardware Requirement**

Processor: 800MHz Intel Pentium III or equivalent or new

Disk space: 50MB or more

RAM: 128MB or more

- **Software Requirement**

Operating System: Windows (7 or more)

Web Browser: IE 10 or above, Mozilla FF and above or Google Chrome

XAMPP, MySQL

- **Programming Language: HTML, CSS, PHP, MySQL**

### **ii. Operational**

Operational feasibility is all about how well the system solves problem and takes advantage of identified opportunities during scope definition of the system.

- The project feasible to operate.
- The current mode of operation provides adequate throughput and response time.
- The proposed system will really benefit the organization and the current work practices and procedures adequate to support the new system.
- The current mode of operation makes maximum use of available resources, including people, time, and flow of forms.

### **iii. Economic**

This aims to determine the positive economic benefits to the organization that the proposed system will provide. The system is economically feasible to be implemented because it is a web-based application.

- The system is cost effective.
- The system benefits outweigh costs.

## c. High Level System Design

### i. System Flowchart

The system flowchart of online food ordering system is shown as follows:

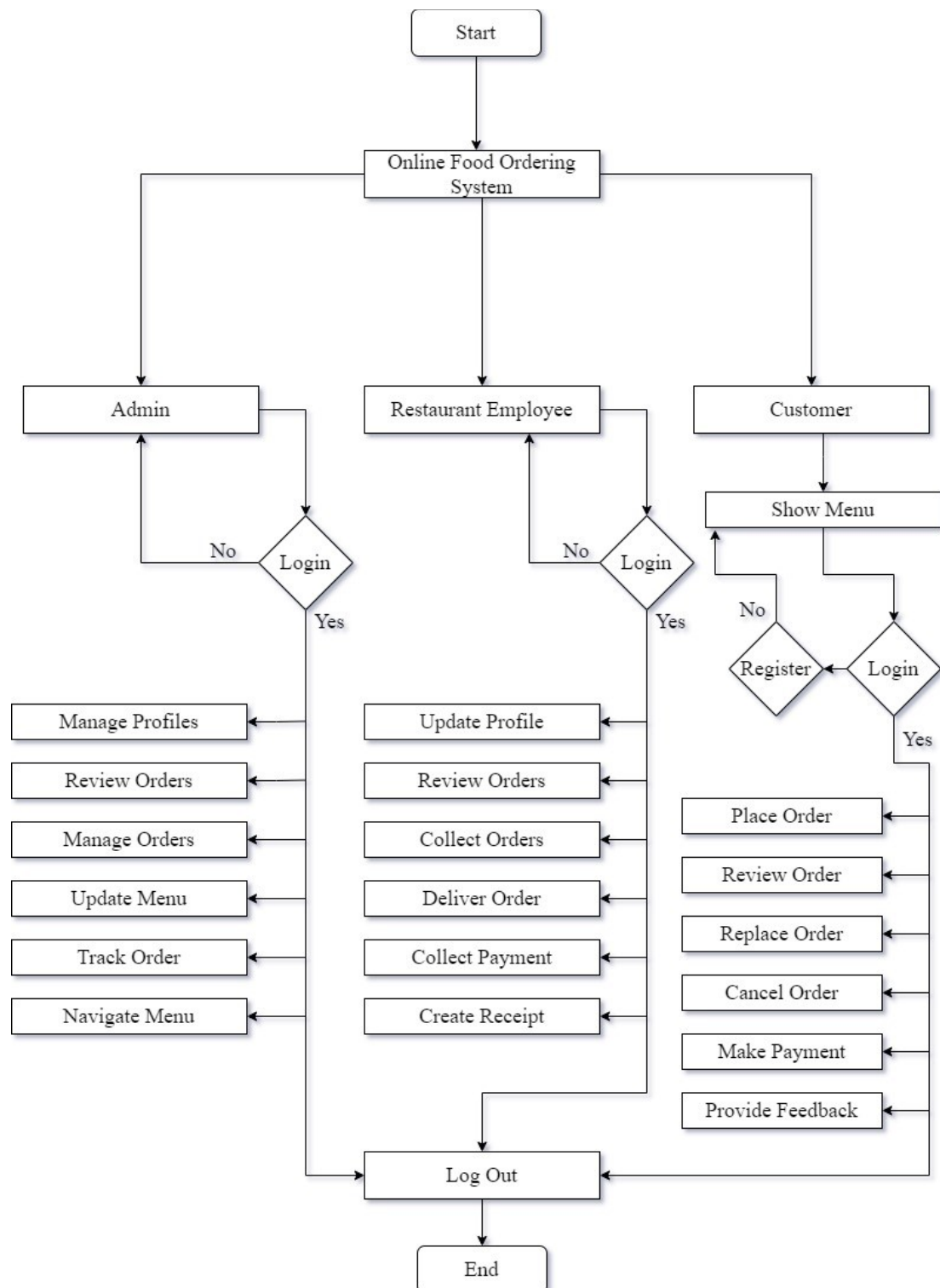
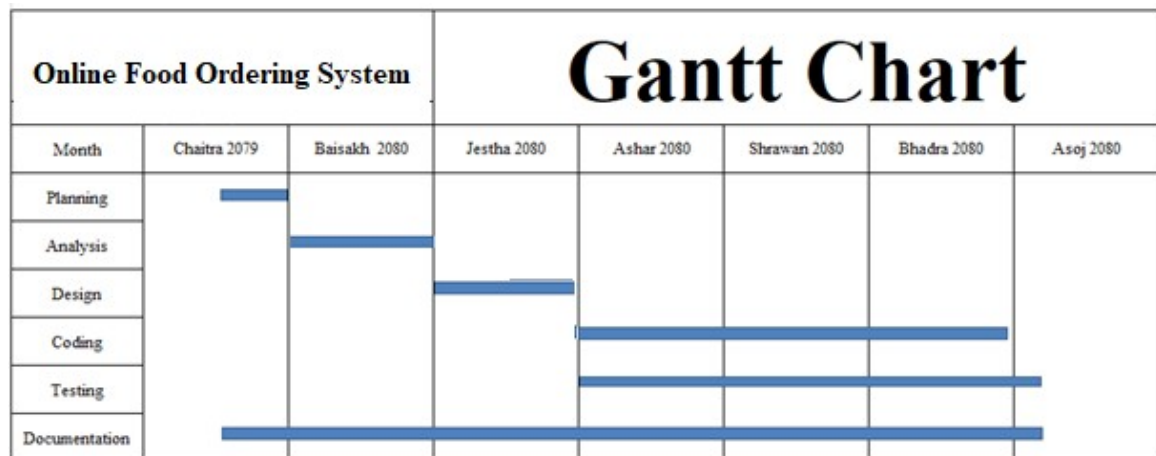


Figure 1: System Flowchart of Online Food Ordering System

## GANTT CHART



We are planning to start our project from third week of chaitra, 2079. Planning phase will go till end of the chaitra. From Baishak first week requirement gathering and analysis of our project will take place. Toward the completion of this phase we will focus on data modeling where we become clear about the entities, attributes, key attributes, cardinality and overall process of our system. After data modeling, we will focus on process modeling by creating DFDs and their levels. Then, we enter into the design phase i.e. designing Graphical User Interface (GUI) starting immediately in the first week of Jestha. In the later phase of design, we will create database of our system. We will be working on front end design and back end design till the end of the Jestha month.

Immediately after the design phase we will start coding the system from first week of Asadh month. This phase may take 3 months to get completed. Parallely, we will perform the testing of our codes and integrated components from first week of Asadh month and keep testing our system even system is completed. Therefore, testing will go till first week of Ashoj month. Since documentation is crucial part of our system we will be documenting from the beginning of our project i.e. from third week of chaitra. But a standard documentation will be prepared only after final test of our system has been concluded.

## **EXPECTED OUTCOME**

After the completion of the project we expect the subsequent outputs which can minimize the issues likewise as solve the prevailing problem.

- **Enhanced Customer Convenience:** Customers can easily browse menus, place orders, and make payments from the comfort of their homes using smartphones or computers.
- **Order Customization:** Customers can easily customize their orders, adding or removing specific food items, based on their preferences/restrictions.
- **Feedback and Reviews:** Customers can leave reviews and feedback easily, providing restaurants with insights into their strengths and areas for improvement.

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