Waterfall Model Documents For Speedfood

Document 1- Business case document

➢ **Why is this project initiated?**

- This project is initiated in order to help customers to find restaurants online using the app, order their best dishes and have them delivered at their doorstep.

- This project is initiated to provide convenience and comfort to the customers, as there is increasing work pressure it becomes easy for the customer who is working to just scroll down through various food options available in the app and order food which will save their time, nuclear family system is also increasing and if both the partners are working and don't have time to cook then it becomes easy for them to order food online, easy access to internet and increased smart phones user will also get benefitted from speedfood as using their smartphone and internet they can order their favorite food hassle free with few clicks. Also if someone is not well and is not able to cook food then he/she can order food online using this app rather than starving.

- Nowadays everyone is having a busy schedule whether it is urban areas or rural. But talking specifically about the urban areas and deeply about the big cities, people out there are so busy in their life that they don't get enough time to have their meals properly. These days' women are no less than men, in any field.

- So, in big cities even wives are working women, therefore mostly the small families manage to have their food ordered from somewhere, as they lack time. Not only is this the case, if we talk about the children in the modern era, they like only fast food or something from the outside. But they ignore eating homemade meals.

- So, the food ordering system these days has one of the fastest-growing markets, though being a new idea. In this project, we have developed something like the same to learn from and serve the nation in a much better way possible. Nowadays, people are more regular to dine-in at the restaurant for their meals.

- The online food ordering system provides convenience for the customers that are nothing special but the general busy people of the society. It overcomes the demerits of the manual hotel or mess system and the old-fashioned queuing system. This system enhances the ready-made foods that people.

- Therefore, this system enhances the speed of getting food on a person's plate and the quality and manner of taking the order from the customer. It provides a better communication platform. The user's details are stored using electronic media. The online food ordering system provides the menu online and the customers can easily place the order by just clicking the mouse or by touching a button on their smartphones.

- Also, with the food ordering system online, people can easily track their orders, and the admin can maintain the customer's database and advance the food delivery system. This food ordering system allows the user to select the desired food items from a list of available menu items provided by the local hotel or restaurant.

- The user can place orders for the food items of their like from the list. The payment can be made online or pay-on-delivery system. The user's details are maintained confidentially because it maintains a separate account for each user. An id and password are provided for each user.

➢ **What are the current problems?**

- In the present scenario, people have to physically visit the hotels or restaurants for eating food and have to make payments through cash mode most of the time due to unawareness of advanced technologies at certain places. In this method time as well as physical work is required, among which time is something that no one has in ample amount.

- The traditional food ordering procedure is not efficient enough for hotels and restaurants, as they have to deal with the crowd, in their restaurant. The old methods can be classified into categories which are paper grounded and verbal grounded. For paper-based work, the waiter comes and pens down foods that customers order and pass the food list containing paper to the chefs or cooks in the kitchen for further process.

- From the owner's point of view maintaining data records and the accounts in the physical file are cumbersome and tedious work to do. And also, it is full of risk as anyone can access it and modify the data.

➢ **With this project how many problems could be solved?**

- It overcomes the demerits of the manual hotel or mess system and the old-fashioned queuing system. This system enhances the speed of getting food on a person's plate and the quality and manner of taking the order from the customer. It provides a better communication platform to the customer with the restaurant.
- It solves the problem of managing customer details by storing the details of customer in database which is more secure and easy to handle
- The online food ordering system provides the menu online and the customers can easily place the order by just clicking the mouse or by touching a button on their smartphones.

➢ **What are the resources required?**

People – project team members required for this project is as follows:
- 1 Senior Full Stack Developer,1 Junior Web Developer
- 1 Senior Frontend Developer,1 Junior Frontend developer
- 1 Tester

- 1 Project Lead

Time – implementation within 1yr.

Module	Components	Completion Days
Module 1	Includes: 1. UI design of entire web site on all devices 2. UI verification	3months
Module 2	Includes: 1. Android Application Development 2. Functionalities achievement	6months
Module 3	Includes: 1. Testing 2. Test deployment 3. UAT 4. Bug fixing 5. Final deployment	3months

Budget – hardware, software, training and services not to exceed Rs.80,000
Other – third party software evaluation, site visits, Dataquest reports – not to exceed   Rs.50,000

➢ How much organizational change is required to adopt this technology?

- New staff should be hired such SEO, Graphics designer and some developers
- New software's will be required
- Training should be conducted to create awareness of new technologies that will be used for the project
- New systems will be required for new staff

➢ Time frame to recover ROI?

- The timeframe that will be required to recover return on investment will be minimum 2yrs.

➢ How to identify Stakeholders?

- To identify the stakeholders RACI Matrix will be used.
- RACI stands for responsible, accountable, consulted, and informed.

Document 2: BA Strategy

The BA approach strategy includes:

- **Stakeholder Analysis:** it is done to find the stakeholders in the project. We use RASCI (Responsible, Accountable, Supporting, Consulted, and Informed) matrix here to identify the roles and responsibilities of stakeholder. With this we can find the key stakeholders.

- **Gathering the requirements by using elicitation techniques which includes:** Document Analysis, Observation, Interview, Focus groups, Survey, Questionnaire, Reverse Engineering, Workshops, JAD, Prototyping, Brainstorming, Use case Specs**. In this project we will be using Brainstorming, Document Analysis and** survey/questionnaire technique to dig out the requirements from the stakeholders.

- Once the Requirements are gathered, the requirements are sorted to remove the redundancy. Then the requirements are prioritized for queuing the requirements for development process, here we use MoSCoW technique to prioritize the requirements. MoSCoW stand for Must, Should, Could, Would:
  M-Must have the requirements to meet the business needs.
  S-Should have this requirement if possible, but project success does not rely on it.
  C-Could have this requirement if it does not affect anything else in the project.
  W-Would like to have this requirement later, but it won't be delivered this time.

- Next step is validating the requirements using FURPS which is an acronym representing a model for classifying software quality attributes (Functional & Non-functional requirements):
  Functionality: Features set, Capability, Generality, Security
  Usability: Human Factors, Aesthetics, Consistency, Documentation
  Reliability: Frequency/severity of failure, Recoverability, Predictability, Accuracy, Mean time to failure.
  Performance: Speed, Efficiency, Resource consumption, Throughput, Response time
  Supportability:Testability,Extensibility,Adaptability,Maintainability,Compatibility,Configurability ,Serviceability,installability,Localizability,Portability

- With all this the BA creates BRD and then takes the signup (confirmation) from the clients on all the documents, diagrams, SDLC stages from responsible Stakeholder. Signoff is the process of taking confirmation of client that they have agreed upon the requirements.

- Communication is one of the pillars in the process of project completion and helps in explaining the tasks and responsibilities to different stakeholders, BA's use different techniques to communicate the requirements like presentations, seminars, workshops, data models, graphs, and images.

- BA is responsible for handling change requests, whenever a change request comes from the client, The BA will analyse this change request. Initially he performs Feasibility Study to accept the change and then the Impact Analysis to measure change to project and finally Effort estimation to implement the change in the project.

- BA updates the progress of the project to stakeholders by sending the weekly status report, using online tools like Microsoft teams which provides regular progress within the project, meeting with the stakeholders to share the overall progress of project.
- Next BA prepares Client for UAT, BA plans and organizes Training sessions for end users, Takes signoff from client on client project Acceptance form.

Document 3- Functional Specifications

Project name	Speedfood Android Application
Customer name	David Meyer
Project Version	0.1
Project Sponsor	Asha Dhadi
Project Manager	Rahul Shetty
Project Initiation date	10th August 2022

Functional Requirement specifications:

Req ID	Req Name	Req Description	Priority
FR0001	Login	All the users(customer, Restaurants, Delivery Boy, Admin, Regional Admin and business owner) should be able to login to speedfood app to do desired functions of their choice	10

FR0002	Register	All the users(customer, Restaurants, Delivery Boy, Admin and business owner) should be able to Register to speedfood app to get logged in to the app	10
FR0003	Search and view restaurant	Customer should be able to search and view the restaurant so that they can place their order in speedfood app	9
FR0004	View restaurant's menu	Customer should be able to view restaurant's menu so that they can select the desired food and place order	9
FR0005	Place order	Customer should be able to place order in the speedfood app	8
FR0006	Make payment	Customer should be able to make payment by using various payment modes once the order is placed	8
FR0007	Track order	Customer should be able to track order once the order is placed	6
FR0008	Cancel order	Customer should be	8

		able to cancel order	
FR0009	Feedback and Rating	Customer should be able to give feedback and rating for the orders they have received	5
FR00010	View orders	Delivery boy should be able to view the orders that are to be delivered	7
FR00011	Select and accept orders	Delivery boy should be able to select and accept order	8
FR00012	View Feedback	Delivery boy should be able to view the feedback given by the customers	4
FR00013	View orders	Restaurant owner should be able to view the orders received	8
FR00014	Delivery boy verification	Restaurant owner should be able to do the delivery boy verification	8
FR00015	View Payments received by the customers	Restaurant owner should be able to view the payments received by the customers	8
FR00016	View Feedback from the customer	Restaurant owner should be able to view the feedback of the	4

		customers	
FR00017	View Revenue Generated	Restaurant owner should be able to view the revenue generated through speedfood	5
FR00018	Manage issues	Admin should be able to manage issues	7
FR00019	Manage customer feedback	Admin should be able to Manage customer feedback	4
FR00020	Approval and rejection of privileges restaurants, delivery boy and regional admin	Admin should be able to Approve and reject the privileges on restaurants, delivery boy and regional admin	9
FR00021	View Reports	Business owner should be able to view the reports	2
FR00022	Update payments for delivery boys and restaurants	Business owner should be able to update the payments for delivery boys and restaurants	8
FR00023	View Customer Feedback	Regional Admin should be able to view the customer feedback for the regional restaurants	3
FR00024	View Regional revenue	Regional Admin should be able to view the regional revenue	8

		generated by the regional restaurants	
FR00025	View issues and refunds of the regional restaurants	Regional Admin should be able to view the issues and refunds of the regional restaurants	8
FR00026	View payments made to the regional restaurants	Regional Admin should be able to view the payments made to the regional restaurants	7
FR00027	Logout	All the users should be logout successfully once they are done with their desired activity	8
NFR0001	The system should Responsive	The system developed should be Mobile-Friendly	9
NFR0002	Page Loading Time	Each Page should load within 2 seconds time	9
NFR0003	Minimum steps to purchase product	The checkout process should be as quick as possible, with minimum steps	5
NFR0004	The system should be secure	The System should be secured using SSl certificate and data privacy policy, as there are monetary transactions involved in the system	10

NFR0005	Password Generation	The system may not grant access until the user creates a strong password	8
NFR0006	Easy to use Interface	The system's interface has to be user-friendly and easy to use	7
NFR0007	Delivery Tracker	System Should have a delivery tracker to track the order of user	8

Document 4- Requirement Traceability Matrix

Req ID	Req Name	Req Description	Design	D1	T1	D2	T2	UAT
FR0001	Login	All the users(customer, Restaurants, Delivery Boy, Admin, Regional Admin and business owner) should be able to login to speedfood app to do desired functions of their choice	Yes	Yes	Yes	Yes	Yes	Yes
FR0002	Register	All the users(customer, Restaurants, Delivery Boy, Admin and business owner) should be able to Register to speedfood app to get logged in to the app	Yes	Yes	Yes	Yes	Yes	Yes
FR0003	Search and view restaurant	Customer should be able to search and view the restaurant so that they can place their order in speedfood app	Yes	Yes	Yes	Yes	Yes	No

FR0004	View restaurant's menu	Customer should be able to view restaurant's menu so that they can select the desired food and place order	Yes	Yes	Yes	Yes	Yes	No
FR0005	Place order	Customer should be able to place order in the speedfood app	Yes	Yes	Yes	Yes	Yes	No
FR0006	Make payment	Customer should be able to make payment by using various payment modes once the order is placed	Yes	Yes	Yes	No	No	No
FR0007	Track order	Customer should be able to track order once the order is placed	Yes	Yes	Yes	No	No	No
FR0008	Cancel order	Customer should be able to cancel order	Yes	No	No	No	No	No
FR0009	Feedback and Rating	Customer should be able to give feedback and rating for the orders they have received	Yes	Yes	No	Yes	No	No
FR00010	View orders	Delivery boy should be able to view the orders that are to be delivered	No	No	No	No	No	No
FR00011	Select and accept orders	Delivery boy should be able to select and accept order	Yes	Yes	No	Yes	No	No
FR00012	View Feedback	Delivery boy should be able to view the feedback given by the customers	Yes	Yes	No	Yes	No	No
FR00013	View orders	Restaurant owner should be able to view the orders received	Yes	No	No	No	No	No
FR00014	Delivery boy verification	Restaurant owner should be able to do the delivery boy verification	Yes	No	No	No	No	No
FR00015	View Payments received by the customers	Restaurant owner should be able to view the payments received by the customers	Yes	Yes	No	Yes	No	No

FR00016	View Feedback from the customer	Restaurant owner should be able to view the feedback of the customers	Yes	No	No	No	No	No
FR00017	View Revenue Generated	Restaurant owner should be able to view the revenue generated through speedfood	Yes	Yes	Yes	Yes	No	No
FR00018	Manage issues	Admin should be able to manage issues	Yes	Yes	Yes	No	No	No
FR00019	Manage customer feedback	Admin should be able to Manage customer feedback	Yes	Yes	Yes	No	No	No
FR00020	Approval and rejection of privileges restaurants, delivery boy and regional admin	Admin should be able to Approve and reject the privileges on restaurants, delivery boy and regional admin	Yes	Yes	Yes	Yes	Yes	No
FR00021	View Reports	Business owner should be able to view the reports	Yes	Yes	Yes	Yes	No	No
FR00022	Update payments for delivery boys and restaurants	Business owner should be able to update the payments for delivery boys and restaurants	Yes	Yes	Yes	No	No	No
FR00023	View Customer Feedback	Regional Admin should be able to view the customer feedback for the regional restaurants	Yes	Yes	Yes	No	No	No
FR00024	View Regional revenue	Regional Admin should be able to view the regional revenue generated by the regional restaurants	Yes	Yes	No	No	No	No
FR00025	View issues and refunds of the regional restaurants	Regional Admin should be able to view the issues and refunds of the regional restaurants	Yes	Yes	No	No	No	No

FR00026	View payments made to the regional restaurants	Regional Admin should be able to view the payments made to the regional restaurants	Yes	Yes	No	No	No	No
FR00027	Logout	All the users should be logout successfully once they are done with their desired activity	Yes	Yes	No	No	No	No
NFR0001	The system should Responsive	The system developed should be Mobile-Friendly	Yes	Yes	Yes	Yes	Yes	No
NFR0002	Page Loading Time	Each Page should load within 2 seconds time	Yes	Yes	Yes	Yes	Yes	No
NFR0003	Minimum steps to purchase product	The checkout process should be as quick as possible, with minimum steps	Yes	Yes	Yes	Yes	Yes	No
NFR0004	The system should be secure	The System should be secured using SSl certificate and data privacy policy, as there are monetary transactions involved in the system	Yes	Yes	Yes	Yes	Yes	No
NFR0005	Password Generation	The system may not grant access until the user creates a strong password	Yes	Yes	Yes	Yes	Yes	No
NFR0006	Easy to use Interface	The system's interface has to be user-friendly and easy to use	Yes	Yes	Yes	Yes	Yes	No
NFR0007	Delivery Tracker	System Should have a delivery tracker to track the order of user	Yes	Yes	Yes	No	No	No

Business Requirement Document

BRD

Nikita Shinde

8/24/2022

Project Name: Speedfood (Food Ordering Application)

Project ID: SF0001

Version ID: 0.1

Author: Nikita Shinde

Contents

1. Document Revisions

Date	Version Number	Document Changes
15/08/2022	0.1	Initial Draft
18/08/2022	0.1	Functional requirements Document
20/08/2022	0.1	RTM

2. Approvals

Role	Name	Title	Signature	Date
Project Sponsor	Asha Dhadi			25/08/22
Business Owner	David Meyer			25/08/22
Project Manager	Rahul Shetty			25/08/22
System Architect	Mehul Rana			25/08/22
Development Lead	Neha Challa			25/08/22
User Experience Lead	Manish Sogam			25/08/22
Quality Lead	Tej Sharma			25/08/22
Content Lead	Twinkle Rana			25/08/22

3. RACI Chart for This Document

The RACI chart identifies the persons who need to be contacted whenever changes are made to this document. RACI stands for responsible, accountable, consulted, and informed. These are the main codes that appear in a RACI chart, used here to describe the roles played by team members and stakeholders in the production of the BRD. They are adapted from charts used to assign roles and responsibilities during a project.(RACI Can be made for IT side[Project stakeholder] as mentioned above, apart from that Can also Be made for Client side[Business Stakeholder]).

The following describes the full list of codes used in the table:

Codes Used in RACI Chart

*	Authorize	Has ultimate signing authority for any changes to the document.
R	Responsible	Responsible for creating this document.
A	Accountable	Accountable for accuracy of this document (for example, the project manager)
S	Supports	Provides supporting services in the production of this document

C   Consulted   Provides input (such as an interviewee).

I   Informed   Must be informed of any changes.

RACI Chart:

Name	Position	*	R	A	S	C	I
Asha Dhadi	Project Sponsor				S		
David Meyer	Business Owner		R				
Rahul Shetty	Project Manager			A			
Mehul Rana	System Architect					C	I
Neha Challa	Development Lead					C	I
Manish Sogam	User Experience Lead					C	I
Tej Sharma	Quality Lead					C	I
Twinkle Rana	Content Lead					C	I
XYZ	Customer				S		I
XYZ	Restaurant owner				S	C	I
XYZ	Admin			A		C	
XYZ	Regional Admin			A		C	
XYZ	Delivery Boy				S		I

4. Introduction

4.1.   Business Goals

The main purpose of Speedfood is to provide customers for a way to place an order at a restaurant over the internet. And provide Restaurants a platform to increase their business and reduce the labour costs.

4.2.   Business Objectives

- To provide an IT solution for Speedfood (Food ordering Application)
- To achieve the business goals
- To integrate with restaurant partners and provide an optimal online food ordering experience to the customers.
- To provide a platform for all local restaurants to showcase their menu and increase their revenue by reducing the labour cost.
- Develop Easy to use application to satisfy the needs of the customer

4.3. Business Rules

- System should allow only valid customers to order food
- Only administrator should be able to reject or approve the privileges.
- Only Restaurant owner can make changes to the menu of the restaurant.
- Organization should have permission from state or central ministry and should have the required licenses.
- Only Business owner should be able to update the payments for delivery boys and restaurants

4.4. Background

In the present scenario, people have to physically visit the hotels or restaurants for eating food and have to make payments through cash mode most of the time due to unawareness of advanced technologies at certain places. In this method time as well as physical work is required, also traditional food ordering procedure is not efficient enough for hotels and restaurants, as they have to deal with the crowd, in their restaurant. The old methods can be classified into categories which are paper grounded and verbal grounded. For paper-based work, the waiter comes and pens down foods that customers order and pass the food list containing paper to the chefs or cooks in the kitchen for further process. Proposed system overcomes the demerits of the manual hotel or mess system and the old-fashioned queuing system. This system enhances the speed of getting food on a person's plate and the quality and manner of taking the order from the customer. It provides a better communication platform to the customer with the restaurant. It solves the problem of managing customer details by storing the details of customer in database which is more secure and easy to handle. The online food ordering system provides the menu online and the customers can easily place the order by just clicking the mouse or by touching a button on their smartphones.

4.5. Project Objective

To provide an IT solution for Speedfood (Food ordering Application):

- To integrate with restaurant partners and provide an optimal online food ordering experience to the customers.
- To provide a platform for all local restaurants to showcase their menu and increase their revenue by reducing the labor cost.
- Develop Easy to use application to satisfy the needs of the customer

4.6. Project Scope

- The proposed system Speedfood is online food ordering and delivery app – a platform which simplifies the food ordering process for the customer.
- The system presents an interactive and up to date menu with all available options in an easy to use manner
- Customer can choose one or more items to place their order which will land in their cart. Customer can view all their order details in the cart before checking out.
- At the end the customer gets the confirmation of order through sms or email
- Increase in disposable income, increasing work pressure, nuclear family system, easy access

to internet, and increased smart phones etc. are some of the influencing factors that are growing the online food delivery market in India.

- As people are constantly looking for ease and convenience in today's fast moving world, getting quality food at your doorstep within 30 minutes using an app is nothing less than a luxury that a person can receive after a hectic day at work rather than the restaurant dine-in option which becomes tiring for many people in terms of traveling, managing the table vacancy, and more.

- Speedfood will aim to increase the revenue of local restaurants and provide them a platform to increase their business and reduce their labor cost. It will also provide employment to delivery boys.

4.6.1. In Scope Functionality

- Customer can order food from different restaurants available in speedfood
- Customer can Add the selected food in the cart or wish list
- Customer can make payment using COD, Wallet, Credit Card, Coupons and UPI
- Customer can track their Orders and provide feedback
- Restaurant owner can check the revenue, orders received and modify the menu.

4.6.2. Out Scope Functionality

- Customer can order online groceries from speedfood
- Restaurant owner can order online restaurant supplies (like Burger Supplies, Pizza Supplies, Restaurant Accessories, Premium Delivery Bags for Food Delivery.

5. Assumptions

- All the resources required for the project will be available.
- All relevant stakeholders will provide inputs as and when required.
- All team members have all the required skills.
- All equipment's required for the project will be in good condition.
- All the requirements of the stakeholders will be covered in the project.
- Additional security for the application to protect confidential customer data.
- Internet access to the system must be 24/7 or else the application will not work.
- Customer can gain access to the system by using computer or mobile
- Allows multiple numbers of concurrent users to access at a particular time.

6. Constraints

- The project should be completed within the time provided
- Complete the project with the resources available, no other resources can be outsourced
- The design of the application should be completed within 3months.
- The coding part should be completed within 6months
- The Testing of the application should be completed within 3months

- The project budget should not exceed beyond 80,000
- Data base should store huge volume of customer's details and Restaurants details.

7. Risks

A *risk* is something that could affect the success or failure of a project. Analyse risks regularly as the project progresses. While you may not be able to avoid every risk, you can limit each risk's impact on the project by preparing for it beforehand. For each risk, you'll note the likelihood of its occurrence, the cost to the project if it does occur, and the strategy for handling the risk. Strategies include the following:

- **Avoid:** Do something to eliminate the risk.

- **Mitigate:** Do something to reduce damage if risk materializes.

- **Transfer:** Pass the risk up or out to another entity.

- **Accept:** Do nothing about the risk. Accept the consequences.

Technological Risks

There are no high end technologies used in this project so there is no technological risk associated with it.

Skills Risks

There is no skill risks associated with this project because user can access and work on system if they have working experience on computer.

Political Risks

This subsection of "Risk Analysis" identifies political forces that could derail or affect the project. Example, Change of the ruling government, change in the policies, and wars between the countries may affect the smooth flow of the project.

Business Risks

Cancelling the project not only incur loss in terms of cost and time already dedicated towards it up till cancelation point and cannot improve the quality of service provided to customers.

Requirements Risks

This subsection of "Risk Analysis" describes the risk that you have not correctly described the requirements. Example, improper requirement gathering and constantly changing requirements

Other Risks

- Lack of project planning which will lead to scope creep.
- Lack of Skilled Staff to develop the application
- Lack of Budget allocated to the project

- Frequently changing requirements
- Loss of Key Staff
- Lack of training to the employees
- Lack of communication between stakeholders
- Changing Market patterns and customer preferences
- Competitor with more attractive features

8. Business Process Overview

A business process model is a collection of activities to produce a specific output. Which consists of a goal, specific inputs and outputs, uses certain resources and has certain activities which are performed in certain order, which gives some end value to the customer. The customers can be internal or external.

1. **Goal of Speedfood:**

   The main purpose of Speedfood is to provide customers for a way to place an order at a restaurant over the internet. And provide Restaurants a platform to increase their business and reduce the labour costs.

2. **Inputs Required for Online Agriculture Products Store:**

   Account details & Login details of customer, Food item required by customer, Payment options, shipping address and Restaurant owners account & login details to add, delete and update the Menu and view the feedback and revenue generated.

3. **Resources Required are as follows:**

   Laptop, Mobile phone or Desktop, Speedfood Application, internet connectivity.

4. **Outputs Produced are as follows:**

   Food ordered, Bill of the ordered food.

5. **Set of Activities involved are as follows:**

   Login details-> Server-> Validate-> Search food or restaurant-> list of food and restaurants-> Select Food to be ordered-> Add to Cart-> Checkout-> Enter address and contact-> Enter Payment details-> Order confirmed-> order shipped-> Order delivery-> Order received by customer-> Feedback by customer.

6. **Value Created:**

   Customer satisfaction and Availability of desired food item from the local restaurant.

8.1.   Legacy System (AS-IS)

- In the present scenario, people have to physically visit the hotels or restaurants for eating food and have to make payments through cash mode most of the time due to unawareness of advanced technologies at certain places. In this method time as well as physical work is required, among which time is something that no one has in ample amount.

- The traditional food ordering procedure is not efficient enough for hotels and restaurants, as they have to deal with the crowd, in their restaurant. The old methods can be classified into categories which are paper grounded and verbal grounded. For paper-based work, the waiter comes and pens down foods that customers order and pass the food list containing paper to the chefs or cooks in the kitchen for further process.

- From the owner's point of view maintaining data records and the accounts in the physical file are cumbersome and tedious work to do. And also, it is full of risk as anyone can access it and modify the data.

8.2. Proposed Recommendations (TO-BE)

- Proposed system overcomes the demerits of the manual hotel or mess system and the old-fashioned queuing system. This system enhances the speed of getting food on a person's plate and the quality and manner of taking the order from the customer. It provides a better communication platform to the customer with the restaurant.
- It solves the problem of managing customer details by storing the details of customer in database which is more secure and easy to handle
- The online food ordering system provides the menu online and the customers can easily place the order by just clicking the mouse or by touching a button on their smartphones.

9. Business Requirements

Sr.no	Business requirement	Functionality	Priority
1	System home page should display the search button, to search restaurants and menu	Customer interface	High
2	System should display login and signup button on the homepage	Customer interface	High
3	System should capture personal details of the new customer to generate unique username and password	Database functionality	High
4	Existing customer should be able to use username and password for future transactions	Customer interface	High
5	Existing customer can update personal details	Customer interface	High
6	Existing customer can view their order details	Customer interface	High

7	Customer must be able to pay by cash, card, wallet, UPI and net banking	Customer interface	High
8	Customer should be able to access system using computer, mobile, tablet	System functionality	Medium
9	System should be able to track the order of the customer	System functionality	High
10	Administrator can grant or reject the privileges to different users	Admin functionality	High
11	Regional Admin should be able to view the revenue, customer feedbacks and refunds for the regional restaurants	Regional Admin functionality	High
12	Business owner should be able to view the reports of restaurants, make payments to delivery boys and the restaurants	Business owner functionality	High
13	Restaurant owner should be able to view orders received, the revenue generated and the feedbacks from the customers	Restaurant owner Functionality	Medium
14	Restaurant owner should be able to do the delivery boy verification	Restaurant owner Functionality	High
15	Delivery Boy should be able to view and select the orders to be delivered to the customer and view the feedback received form the customer	Delivery Boy Functionality	High

10. Appendices

10.1. List of Acronym & Glossary of Terms

UI-User Interface

UAT-User Acceptance Testing

SEO-Search Engine Optimization

ROI-Return On Investment

RACI-Responsible Accountable Consulted Informed

BA- Business Analyst

MoSCoW- Must Should Could Would

FURPS-Functionality Usability Reliability Performance Supportability

BRD-Business Requirement Document

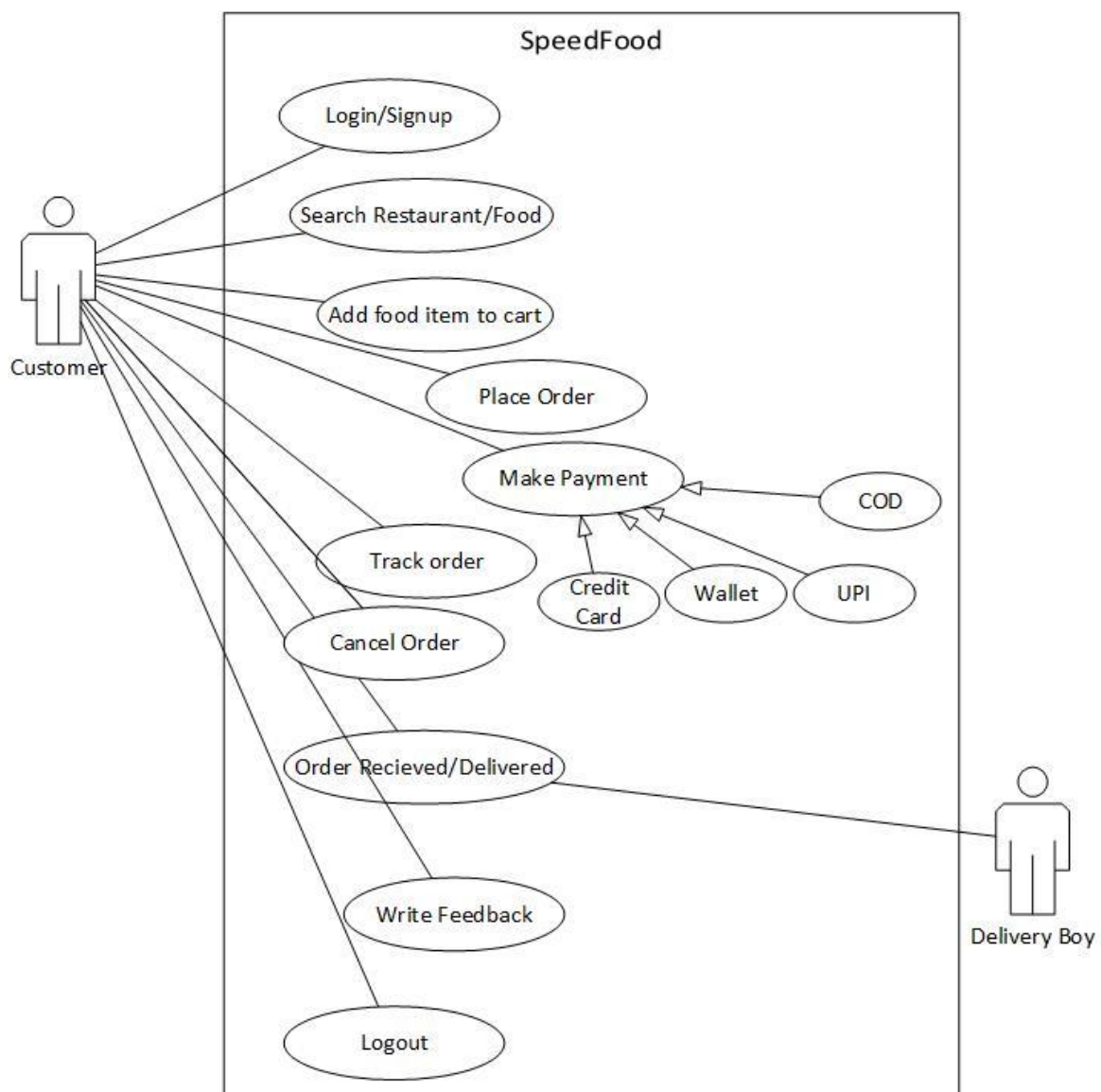SDLC-Software Development Lifecycle

RTM-Requirement Traceability Matrix
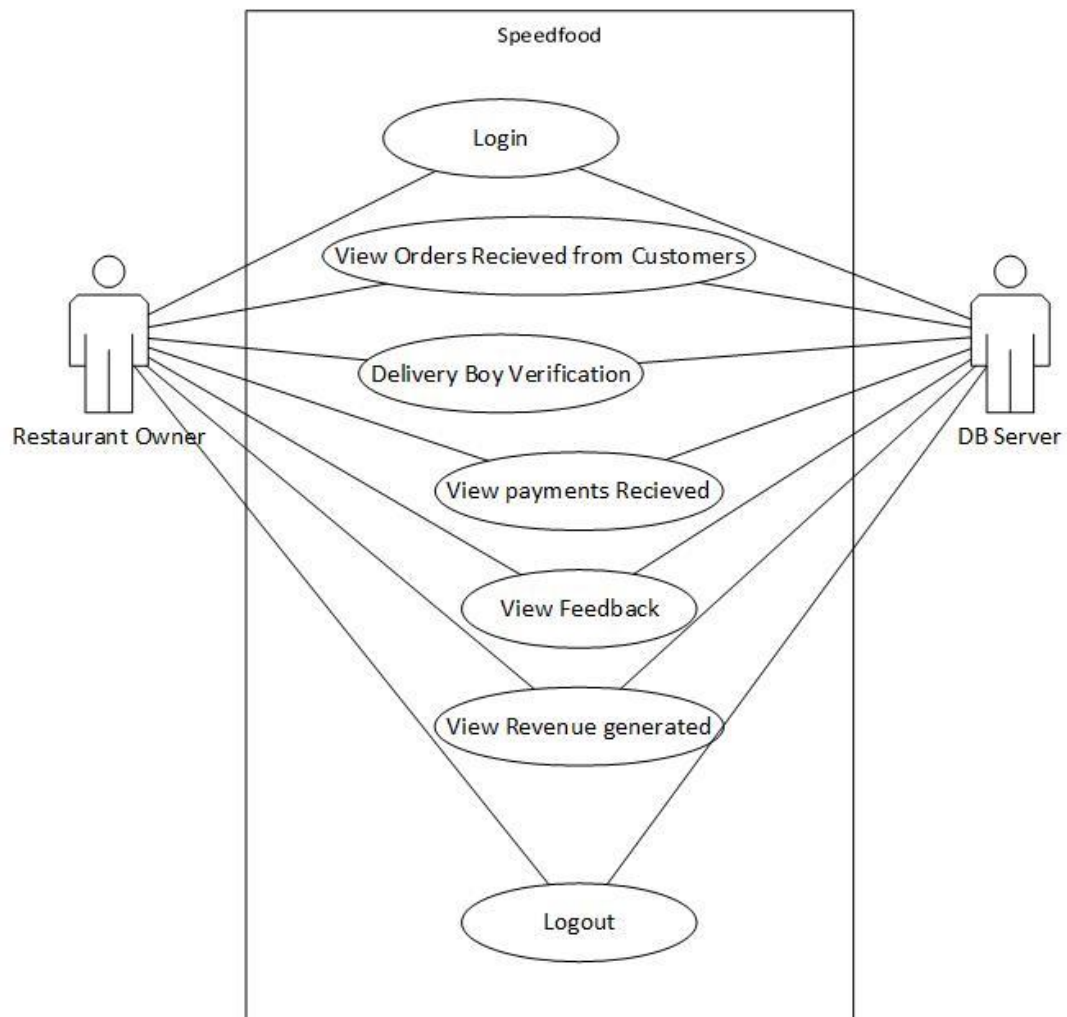
JAD-Joint Application Development

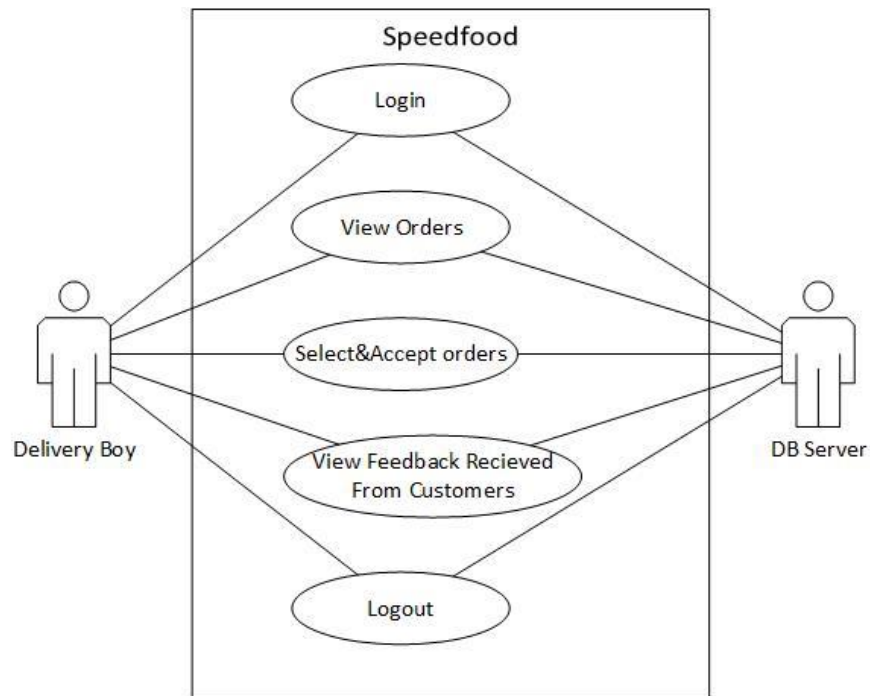## 10.2.   Related Documents

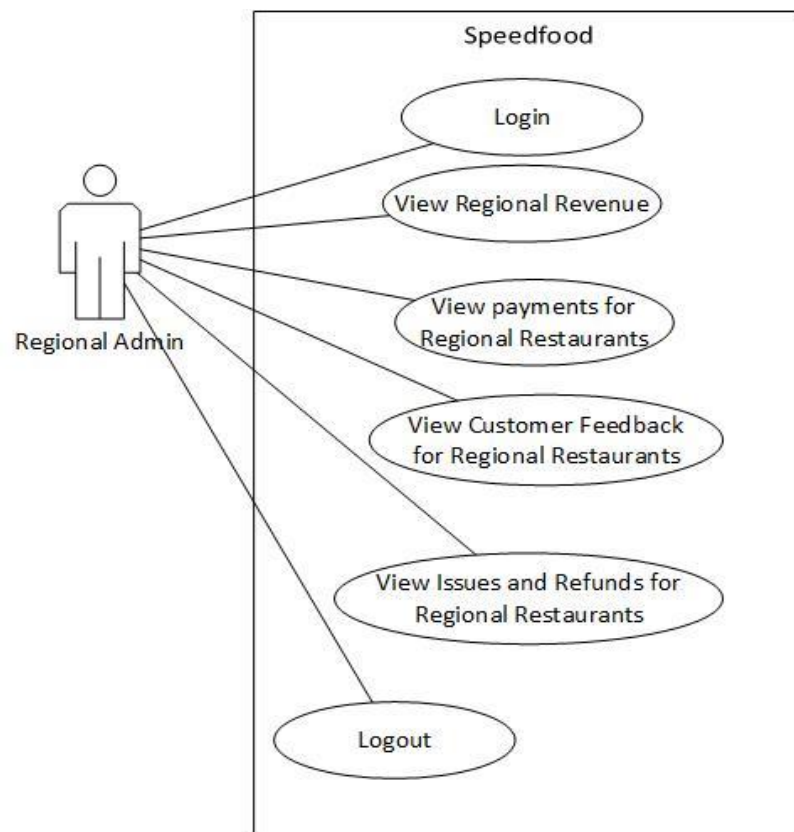**Actor Specific Use case Diagrams:**

▪ **Use case Diagram For Customer**
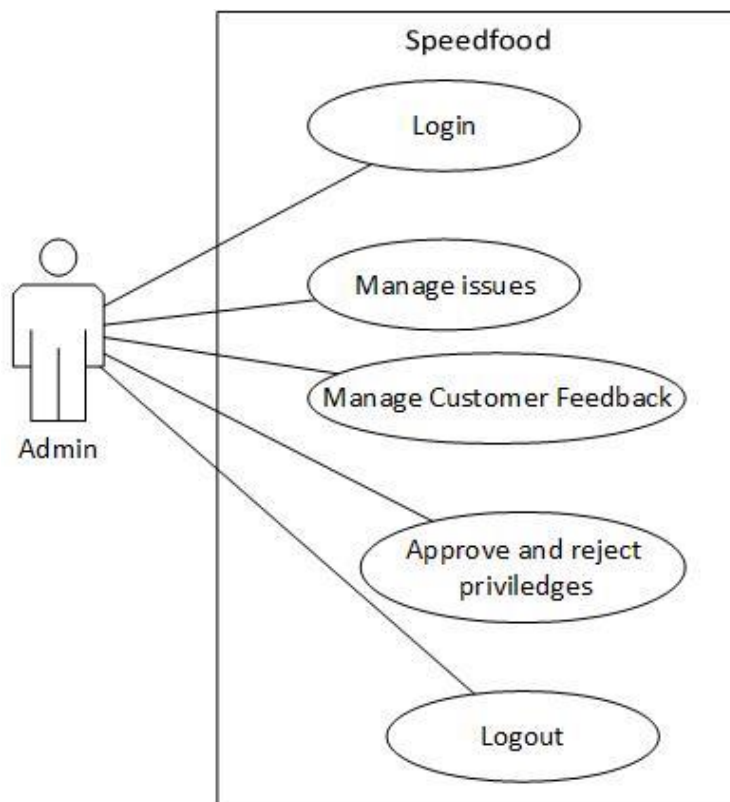
- **Use Case Diagram For Restaurant Owner**

- **Use case Diagram For Deliver Boy**

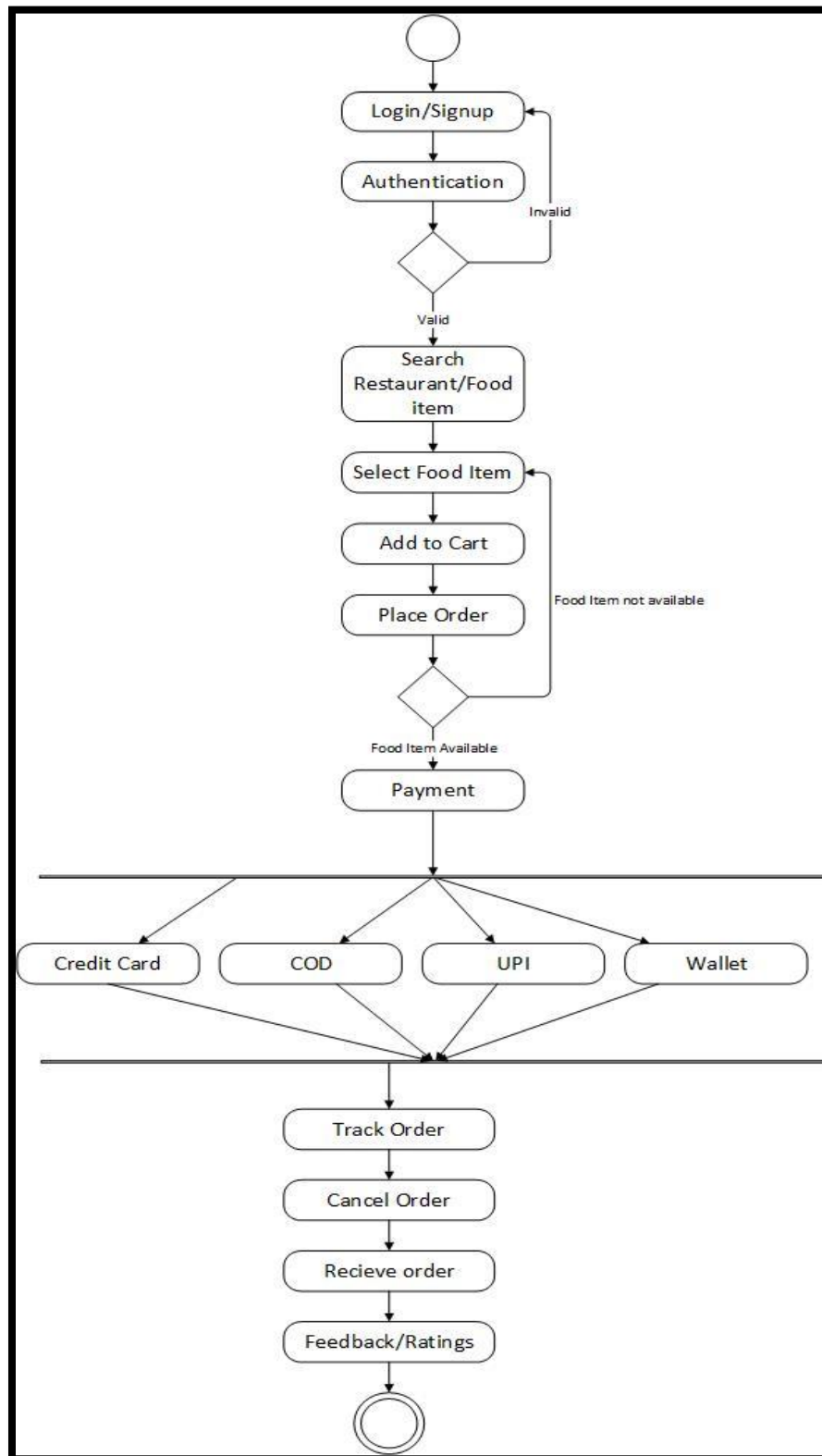- **Use case diagram for Regional Admin**

- **Use case Diagram For Admin**

- **Use case diagram for Business owner**
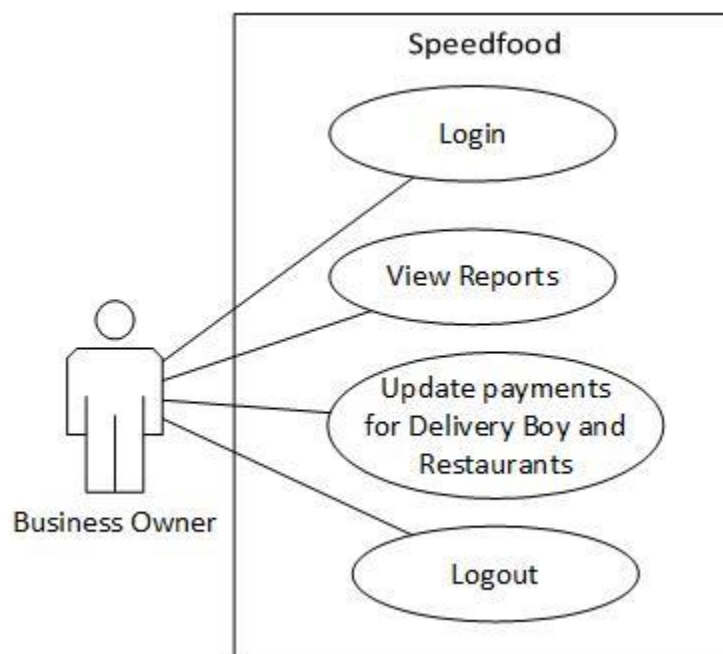
Activity Diagram:

Document 6- Use case specification document

Use case ID	1
Use case Name	Signup
Actor	New Customer
Use case Description	Allows the new user of the system to signup
Pre-Conditions	New User should have an Email-Id
Post-Conditions	Users signup to perform the respective function in the system
Basic Flow	1. The use case begins when the new user visits the app, Click on signup button to register himself 2. User enters his email Id and creates new password and registers himself 3.User logins to the system by entering email-id and password 4.User performs the desired actions in the app and logout 5. Use case ends successfully
Alternative Flow	The Entered E-mail id is incorrect and the password is not in correct format, the user can re-enter the email-id and create new password or terminate the use case
Exceptional Flow	The Entered email-id is invalid and the password cannot be created, the system shows error message to the user and the user is redirected to the Signup page
Key-Scenarios	The system is unable to validate the Email Id
Special Requirements	1. user should have an email id 2.Password should contain at least one uppercase, lower case letter, number and symbol

Use case ID	2
Use case Name	Login
Actor	Customer, Delivery boy, Admin, Regional Admin, Business Owner, Restaurant Owner
Use case Description	Allows the users of the system to Login
Pre-Conditions	The user must have a user account
Post-Conditions	Users Login to perform different activities in the system
Basic Flow	1. The use case begins when the user visits the website, Click on login button 2. User enters his email Id and password 3.User logins to the system by entering email-id and password 4.User performs the desired actions in the website and logout 5. Use case ends successfully
Alternative Flow	The Entered E-mail id and password is incorrect ,the user can re-enter the email-id and password or terminate the use case
Exceptional Flow	The Entered email-id and password is invalid, the system shows error message to the user and the user is redirected to the login page
Key-Scenarios	The system is unable to authenticate the user

Special Requirements	1. The user should be a registered user 2.The user should have username and password

Use case ID	3
Use case Name	Search Food/Restaurant
Actor	Customer
Use case Description	Allows Customers to search the food and restaurants available
Pre-Conditions	None
Post-Conditions	Customers can view the searched Restaurant/Food
Basic Flow	1. If a registered user performs this use case, the use case begins when the user logs into the system and enters username and password 2.If entered username and password is valid then user logs into the system 3.If user logs into the system successfully then he will be able to Search the Restaurant and food he wants to order by entering the Food/Restaurant name in the search tab available on the homepage.
Alternative Flow	Entered username or password is invalid. The user can re-enter username and password and search the Food/Restaurant or terminate the use case
Exceptional Flow	The Entered email-id and password is invalid, the system shows error message to the user and the user is redirected to the login page.
Key-Scenarios	The system is unable to authenticate the user
Special Requirements	1. The user should have username and password 2. The user should have internet connectivity

Use case ID	4
Use case Name	Add food to cart
Actor	Customer
Use case Description	Allows Customers to Add the searched food item to cart
Pre-Conditions	The customer should have login id
Post-Conditions	Customers can add the searched food item to the cart
Basic Flow	1. If a registered user performs this use case, the use case begins when the user logs into the system and enters username and password 2.If entered username and password is valid then user logs into the system 3.If user logs into the system successfully then he will be able to add the searched food item to the cart by clicking the Add button available on the searched food item.
Alternative Flow	Entered username or password is invalid. The user can re-enter username and password and add the searched food item to the cart or terminate the use case
Exceptional Flow	The Entered email-id and password is invalid, the system shows error message to the user and the user is redirected to the login page.

Key-Scenarios	The system is unable to authenticate the user
Special Requirements	1. The user should have username and password 2. The user should have internet connectivity

Use case ID	5
Use case Name	Place Order
Actor	Customer
Use case Description	Allows Customers to place order for the food item added to cart
Pre-Conditions	The customer should have login id
Post-Conditions	Customers can place order for the food item added to cart
Basic Flow	1. If a registered user performs this use case, the use case begins when the user logs into the system and enters username and password 2.If entered username and password is valid then user logs into the system 3.If user logs into the system successfully then he will be able to place order by clicking on place order button
Alternative Flow	Entered username or password is invalid. The user can re-enter username and password and then place order or terminate the use case
Exceptional Flow	The Entered email-id and password is invalid, the system shows error message to the user and the user is redirected to the login page.
Key-Scenarios	The system is unable to authenticate the user
Special Requirements	1. The user should have username and password 2. The user should have internet connectivity

Use case ID	6
Use case Name	Make Payment
Actor	Customer
Use case Description	Allows customers to do the payments by selecting various options available
Pre-Conditions	The customer must have a user account
Post-Conditions	Customers can make payment using COD/Credit/Debit card/UPI/wallet payment modes
Basic Flow	1. If a registered user performs this use case, the use case begins when the user logs into the system and enters username and password 2.If entered username and password is valid then user logs into the system 3.If user logs into the system successfully then he will be able to Search the food item he wants to order by entering the food item name in the search tab available on the homepage. 4. the user views the food item details and add the food item to cart 5.Then the user views the cart enters the shipping details and proceeds to payment by using various payment modes available
Alternative Flow	Entered username or password is invalid. The user can re-enter username and password and then place order by following the steps mentioned in the basic flow or terminate the use case

Exceptional Flow	The Entered email-id and password is invalid, the system shows error message to the user and the user is redirected to the login page.
Key-Scenarios	1.The system is unable to authenticate the user 2.The system is unable to accept payments
Special Requirements	1. The user should have username and password 2. The user should have internet connectivity

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Use case ID	7
Use case Name	Track Order
Actor	Customer
Use case Description	Allows customers to Track the order
Pre-Conditions	The customer must have a user account
Post-Conditions	Customers can Track the order placed by them
Basic Flow	1. If a registered user performs this use case ,the use case begins when the user logs into the system and enters username and password 2.If entered username and password is valid then user logs into the system 3.If user logs into the system successfully then he will be able to view orders placed 4.Then the user will be able to track the order on click of track order button
Alternative Flow	Entered username or password is invalid. The user can re-enter username and password and track the order following the steps mentioned in basic flow or terminate the use case
Exceptional Flow	The Entered email-id and password is invalid, the system shows error message to the user and the user is redirected to the login page.
Key-Scenarios	The system is unable to authenticate the user
Special Requirements	1. The user should have username and password 2. The user should have internet connectivity

Use case ID	8
Use case Name	Cancel Order
Actor	Customer
Use case Description	Allows customers to Cancel the order
Pre-Conditions	The customer must have a user account
Post-Conditions	Customers can Cancel the order placed by them
Basic Flow	1. If a registered user performs this use case, the use case begins when the user logs into the system and enters username and password 2.If entered username and password is valid then user logs into the system 3.If user logs into the system successfully then he will be able to view orders placed 4.Then the user will be able to cancel the order on click of Cancel order button
Alternative Flow	Entered username or password is invalid. The user can re-enter username and password and track the order following the steps mentioned in basic flow or terminate the use case
Exceptional Flow	The Entered email-id and password is invalid, the system shows error message to the user and the user is redirected to the login page.

Key-Scenarios	The system is unable to authenticate the user
Special Requirements	1. The user should have username and password 2. The user should have internet connectivity

Use case ID	9
Use case Name	Feedback
Actor	Customer
Use case Description	Allows customers to give feedback for the order received
Pre-Conditions	The customer must have a user account
Post-Conditions	Customers can give feedback for the order received
Basic Flow	1. If a registered user performs this use case, the use case begins when the user logs into the system and enters username and password 2.If entered username and password is valid then user logs into the system 3.If user logs into the system successfully then he will be able to give feedback for the order received
Alternative Flow	Entered username or password is invalid. The user can re-enter username and password and give feedback for the order received following the steps mentioned in basic flow or terminate the use case
Exceptional Flow	The Entered email-id and password is invalid, the system shows error message to the user and the user is redirected to the login page.
Key-Scenarios	The system is unable to authenticate the user
Special Requirements	1. The user should have username and password 2. The user should have internet connectivity

Use case ID	10
Use case Name	Logout
Actor	Customer
Use case Description	Allows customers to logout from the application
Pre-Conditions	The customer must have a user account
Post-Conditions	Customers can logout from the application
Basic Flow	1. If a registered user performs this use case, the use case begins when the user logs into the system and enters username and password 2.If entered username and password is valid then user logs into the system 3.If user logs into the system successfully then he will perform desired activity in the application and then if he wishes to logout from the application then he can click on the account button on homepage, on click of account the drop down will appear which has the logout option on click of logout option the user gets logged out of the application
Alternative Flow	Entered username or password is invalid. The user can re-enter username and password and perform the desired activity and then logout following the steps in basic flow or terminate the use case

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Exceptional Flow	The Entered email-id and password is invalid, the system shows error message to the user and the user is redirected to the login page.
Key-Scenarios	The system is unable to logout the user
Special Requirements	1. The user should have username and password 2. The user should have internet connectivity

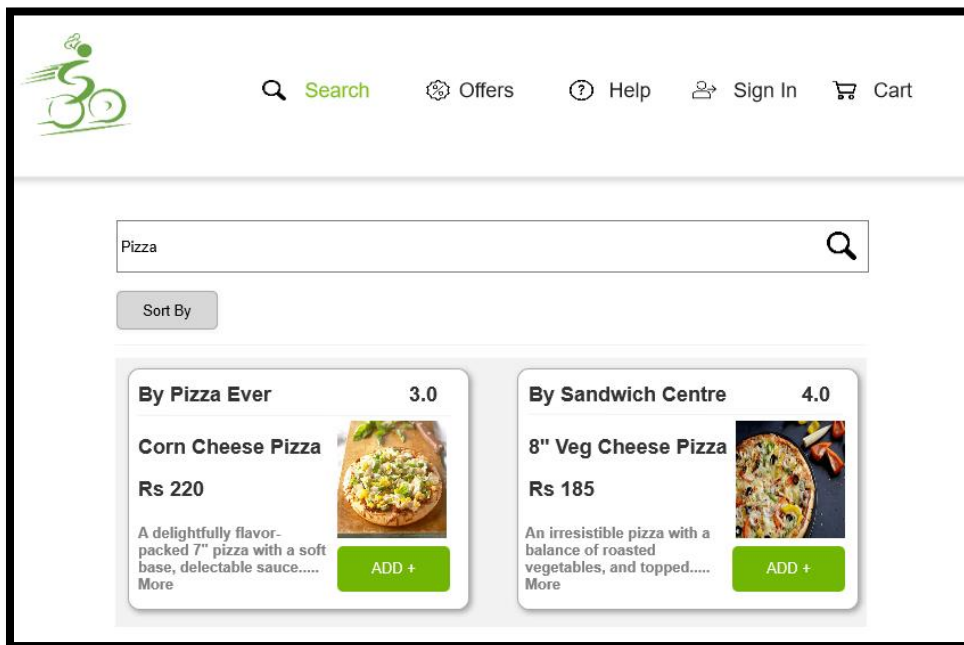# Document7- Screens and pages
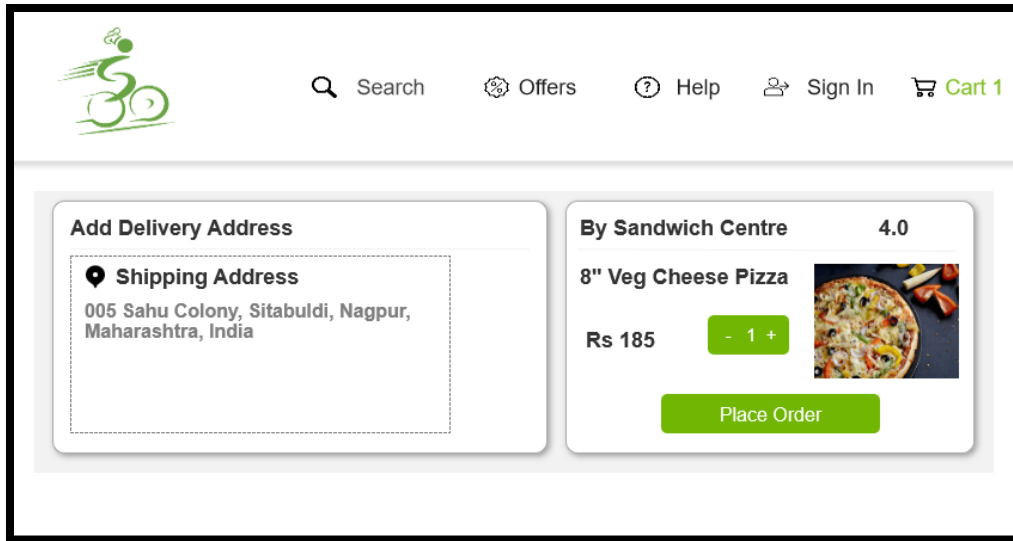
Homepage Design:
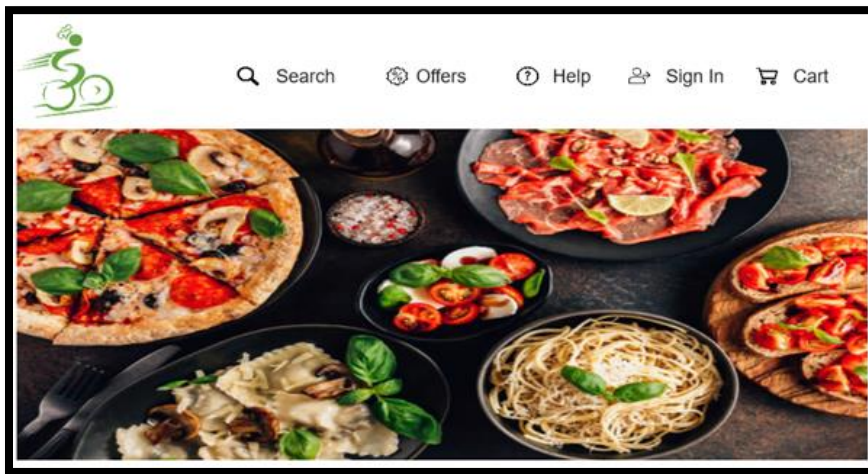
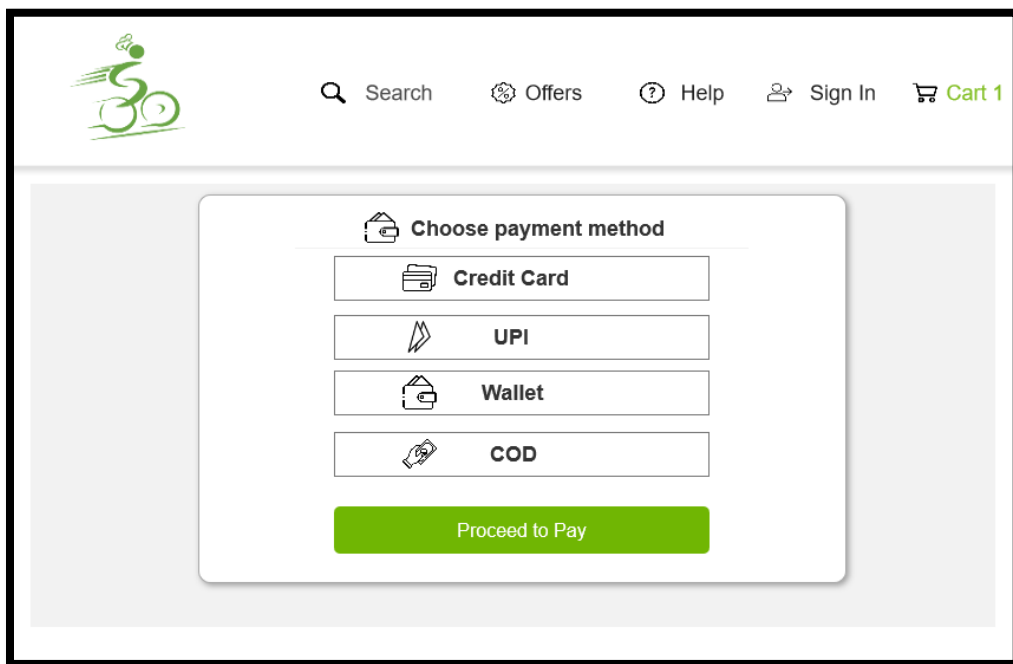## Login Page:

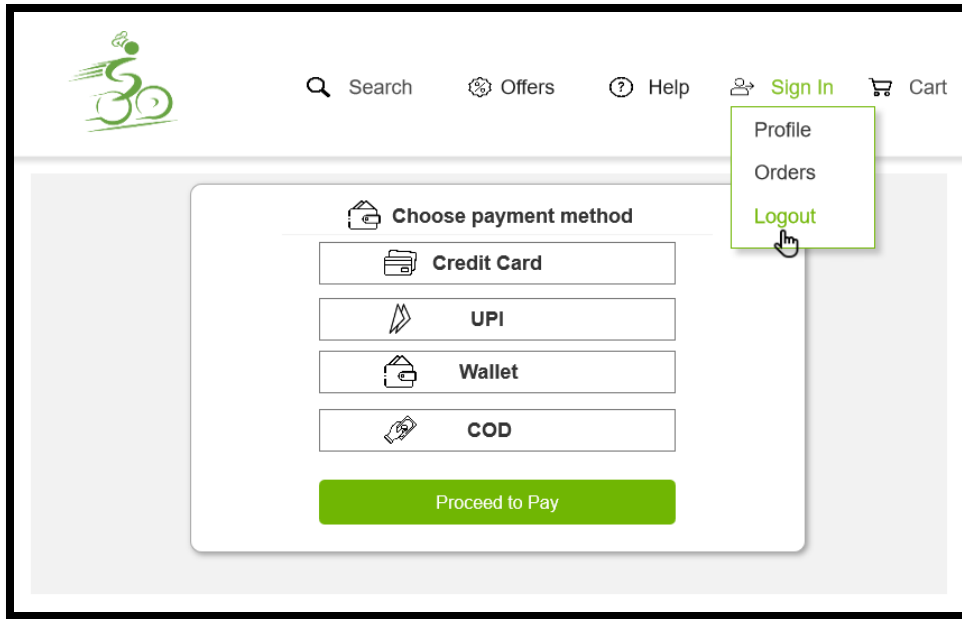**Search Page:**
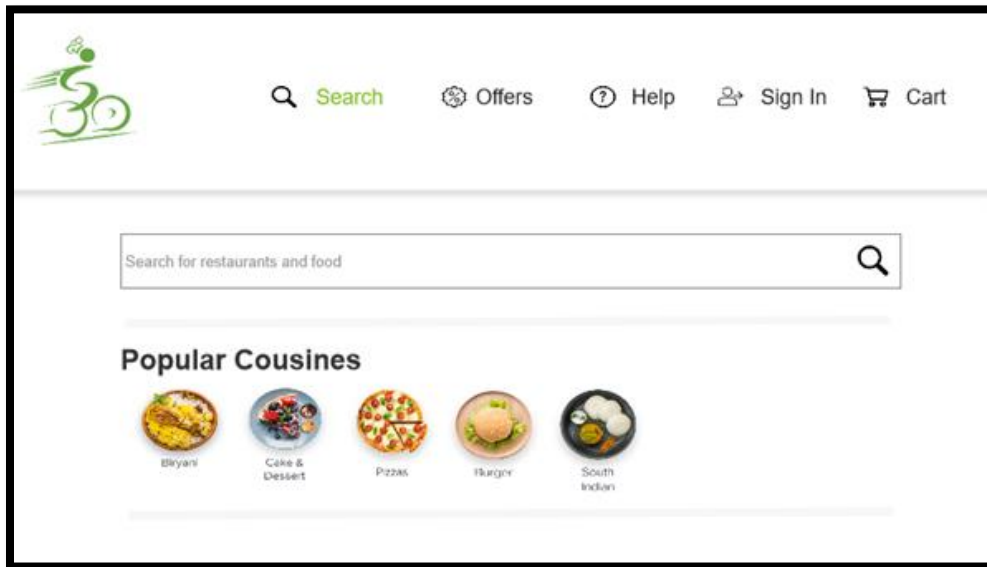
Add to Cart Page:

Payments Page:

Logout Page Design:

Document 8- Tools-Visio and Axure

1. **MS Visio**
   - MS Visio is a software used for drawing a variety of diagrams, We can draw UML diagrams using MS Visio Software like Use case diagram and Activity Diagram
   - It can be used in a variety of settings to create professional looking diagrams. Visio can produce slick, useful diagram of all types and this can provide the professional look you want for the documentation.
   - Visio includes a huge library of shapes used in drawing various diagrams
   - It is used in business analysis, to draw DFD's, UML diagrams etc.

2. **Balsamic and Axure**
   - Axure is a UX design tool used for creating wireframes and Prototypes, it allows you to use adaptive views which is great for designing and development.
   - Axure is a very robust prototyping tool that has the ability to add realistic interactions
   - Axure has numerous features and formats available for wireframes and prototypes
   - Axure is a dynamic tool, it has drag and drop elements
   - You can craft interactive HTML mock-ups for both websites and apps, view your design on browser
   - Balsamic is a static tool, It is used for creating Wireframes and prototypes
   - Balsamic is easy to use interface, you can easily rearrange and resize elements using a drag and drop function.
   - We can develop low fidelity wireframes focussed on functionality using Balsamic
   -

- We can develop a rough sketch of website or app to be developed using Balsamic

Document 9- BA experience

My experience as BA in following phases:

1. **Requirement gathering:**
   - To gather requirements, I used Document Analysis, Brainstorming and Survey/Questionnaire techniques.
   - Client was not available for some period of time during this phase. So as a BA I need to source out point of contacts from his side and get the information asap.
   - I validate the requirements using FURPS technique
   - There are many requirements which are duplicated or repeated. We need to remove them immediately by sorting them.
   - Prototyping is used to give more specific requirements

2. **Requirement Analysis:**
   - We need to draw UML diagrams to visually describe the requirements
   - Activity diagrams also used to describe the process flow
   - Communicate the diagrams to team. Some team members might not agree with them and might make changes. As a BA we need to consider the points and make modifications
   - Prepare BRS and SRS

3. **Design:**
   - From the use case diagrams, we prepare test cases
   - Communicate with client on design and solution documents
   - Write negative test cases as well along with positive test cases.
   - Do not miss a single test case. It might have huge impact on project development in later stages
   - Prepare test data for testing
   - Update RTM. This is just as we need to make sure that all the requirements are met

4. **Development:**
   - Organized JAD sessions
   - Clarifying queries of tech team during coding
   - There might be some team members who doesn't agree with the concept or who doesn't cooperate during JAD sessions. As a BA I handled the situation gently and had one on one

discussion with them. Explained how their actions are going to affect the project. Setup healthy environment within the team.

- Referred diagrams to code the Unit
- Conduct regular meetings with technical team and client which is challenging. Some team members might not be available for the meeting. Recording the session and providing that to missed one and having one to one discussion later with that missed person is all I need to do

5. **Testing:**
    - Prepare test cases from use cases
    - Perform high level testing
    - Test data is requested by BA from client
    - Updated RTM
    - Take signoff from client
    - Prepare client for UAT

6. **Deployment:**
    - Forwarded RTM to client which should be attached to project closure document
    - Coordinates to complete and share end user manuals
    - Plans and organizes training sessions
    - Make sure all the candidates attend the meeting