



Addis Ababa Institute of Technology  
Center of Information Technology and  
Scientific Computing  
Department of Software Engineering  
Online Food Ordering and Delivery System  
Software Requirements Specification

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## Document Approval

The following Software Requirements Specification has been accepted and approved by the following:

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## **ACRONYMS**

**CSS3:** The third version of Cascading Stylesheet

**HTML5:** The fifth version of the Hypertext Markup Language

## DECLARATION

We declare that this written submission represents our ideas in our own words and where others' ideas or words have been included. We have adequately cited and referenced the original sources. We also declare that we have adhered to all principles of academic honesty and integrity and have not misrepresented or fabricated or falsified any idea/data/fact/source in our submission. We understand that any violation of the above will be cause for disciplinary action by the Institute and can also evoke penal action from the sources which have thus not been properly cited or from whom proper permission has not been taken when needed.

**Team seVen     April, 2018**

## 1. Introduction

### 1.1. Purpose

This document provides you a detailed description of the functionalities of the food ordering and delivery system. This document will cover each of the system's envisioned features, as well as offer a preliminary glimpse of the software application's User Interface (UI). The document will also cover hardware, software, and various other technical dependencies.

### 1.2. Scope

This system is aimed at providing people with an online food ordering and delivery system and it is supposed to be deployed for people living in Addis Ababa and hotels which can provide a food of good quality with a certain agreement. This system enables the users to:

- ❖ Order custom meals
- ❖ Have a visual confirmation that the order was placed correctly
- ❖ Know food ingredients before ordering

It also:

- ❖ Eliminates paper work and increase level of accuracy
- ❖ Increases speed of service, sales volume and customer satisfaction
- ❖ Secures data. Data are well protected for personal use.
- ❖ Ensures data accuracy during order placement process
- ❖ Minimizes manual data entry
- ❖ Increases efficiency since data processing is very fast
- ❖ Is user friendly and gives interactive interface with provision for customer to view menus and have a visual confirmation that the order was place correctly.
- ❖ Minimizes time requirement during the order placement process
- ❖ Greatly simplifies the ordering process for both customer and hotels.

## 1.3. Overview

The first section of this document clearly pronounces the general description of the project in it including the product perspectives, product functions, user characteristics, general constraints, and assumptions and dependencies of the product.

The second section of this document provides a clear and concise description of the specific requirements which encompasses external interface requirements with subsections (user interface, hardware interface, software and communications interface), functional requirements, use cases, nonfunctional requirements and other sections will be discussed thoroughly.

The last section describes the change management process which is a section identifying changes to be conducted when there is a slight change in the requirements. It also mentions the references and appendices.

## 2. General Perspective

### 2.1. Product Perspective

Online food ordering process is a process of food delivery or takeout from a local restaurant or hotels through a website or an app.

Deliveraddis is one of online food ordering website in Ethiopia that allows people to sign in and order food according to their preferences. Once the customers signed in, the system allows the customers to see restaurants by nearby services and views all restaurants that are working with the system.

eDeliveryApp found in 2015 is the only online food ordering system built with mobile-first approach. It has website, android and iOS. Built for food industry, it can also be used for businesses that do local delivery shop. The system can be used for single restaurant or a Multi-restaurant commission based business with complete delivery tracking and driver management.

Even though most of the resources are available the system we are designing will have additional features like nearby service and the option to cancel an order placed mistakenly or incorrectly.



## **2.2. Product Functions**

Once the system is up and running it will be used by three types of users. But this doesn't mean that one group is only limited to its own type. These are Administrators, Hotel Managers, and Customers.

Firstly, the system gives privilege to the administrators to allow customers and hotel managers to have an account by which they can log in and use the system. They will also have the power to address any faults happening in the system and receive complaints on creating or logging in. Finally, they can also add and remove any group of members.

Secondly, the system has the functionality of countenancing the Hotel managers to add food, remove food, update the portfolio of a certain type of food and receive complaints about a food.

Thirdly, the customer accesses the website or downloads the application he/she will be required to log in if she has an account or has to sign up if not. Afterwards he/she view a list of hotels and restaurants along with their menus showing in detail the services that each individual hotels provide in a very striking manner. Then he/she will pick the hotel and choose what he/she will have. Then the customer will pass the order and will be asked to fill out the necessary information including food and delivery fee through online banking system of choice and the location including street name and home address where they want the food to be delivered once their done with the fees.

In addition, the customer will be notified of the time it will take to receive his/her order from his/her choice of hotel. If the customer is not satisfied with the time it takes for the deliver their will be a time limit to cancel or change the order.

Furthermore, if the customer is in a great hurry the system has a special feature called nearby service which allows you to enter your geographical location and shows you nearby hotels along with their menus from which you can order meal of your choice.

Finally, the customer will receive a notification and a digital confirmation receipt on their account.

## **2.3. User Characteristics**

There are three types of users that interact with the system.

## **Customers (ordinary users):**

These users use the system for viewing and ordering foods. They will be able to search for hotels and foods of their preference, order and use the delivery system. The users must be familiar with the basics of how to operate a computer. The users will be granted access to the list of foods to choose from and a nearby service provided they need it.

## **Administrators:**

This Admins use the system for administering. They will be granted privilege to add, remove and manage the existing hotels. The admins must be familiar with advanced skill of using a computer.

## **Hotel Managers:**

The hotel managers use the system for updating their hotels status. They will be granted privileges of adding, removing foods and updating prices whenever they change

## **Coordinator:**

Receives the incoming orders.

## **2.4. General Constraints**

**Regulatory policies:** The food items to be delivered must satisfy the food policy in the country; this might decrease the amount of food items to be delivered.

**Interface to other applications:** The system is highly dependent on online Transaction systems like mobile birr or bank systems.

**Reliability requirements:** the system cannot be available after 3:00A.M (local time) Due to transportation and safety issues. There must be internet connection for the website to run so the reliability of the system depends on the availability of Internet in the county.

## **2.5 Assumptions and Dependencies**

The basic assumption for this product is that the people who use this system has to have a basic knowledge of using a website. And have the ability to use the website with small online training session.

The system is also highly dependent on Internet and Online money transaction systems.

### 3. Specific Requirements

#### 3.1. External Interface Requirements

##### 3.1.1. User Interface Flow Diagram

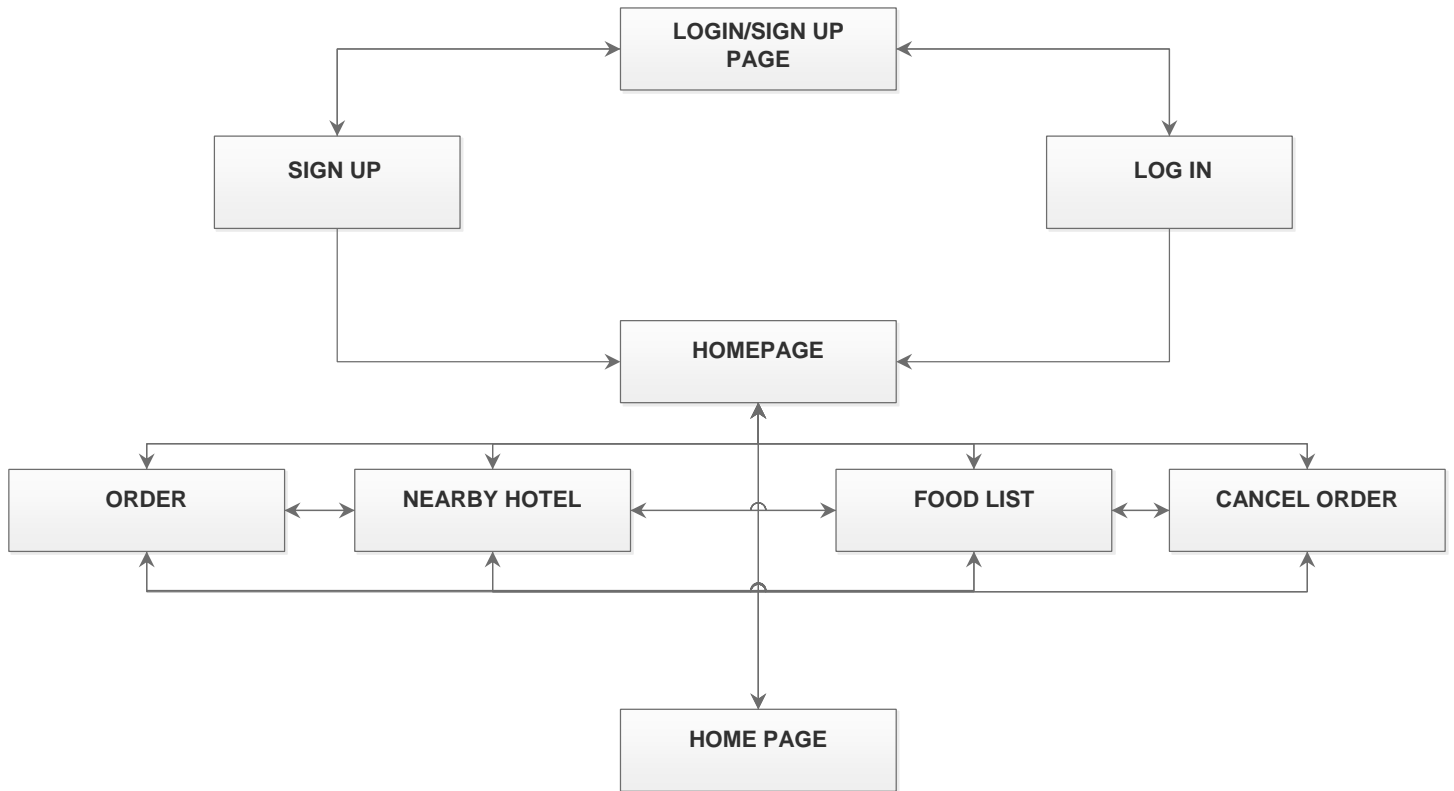


Figure 1 User Interface Flow Diagram

### 3.1.2. User Interfaces

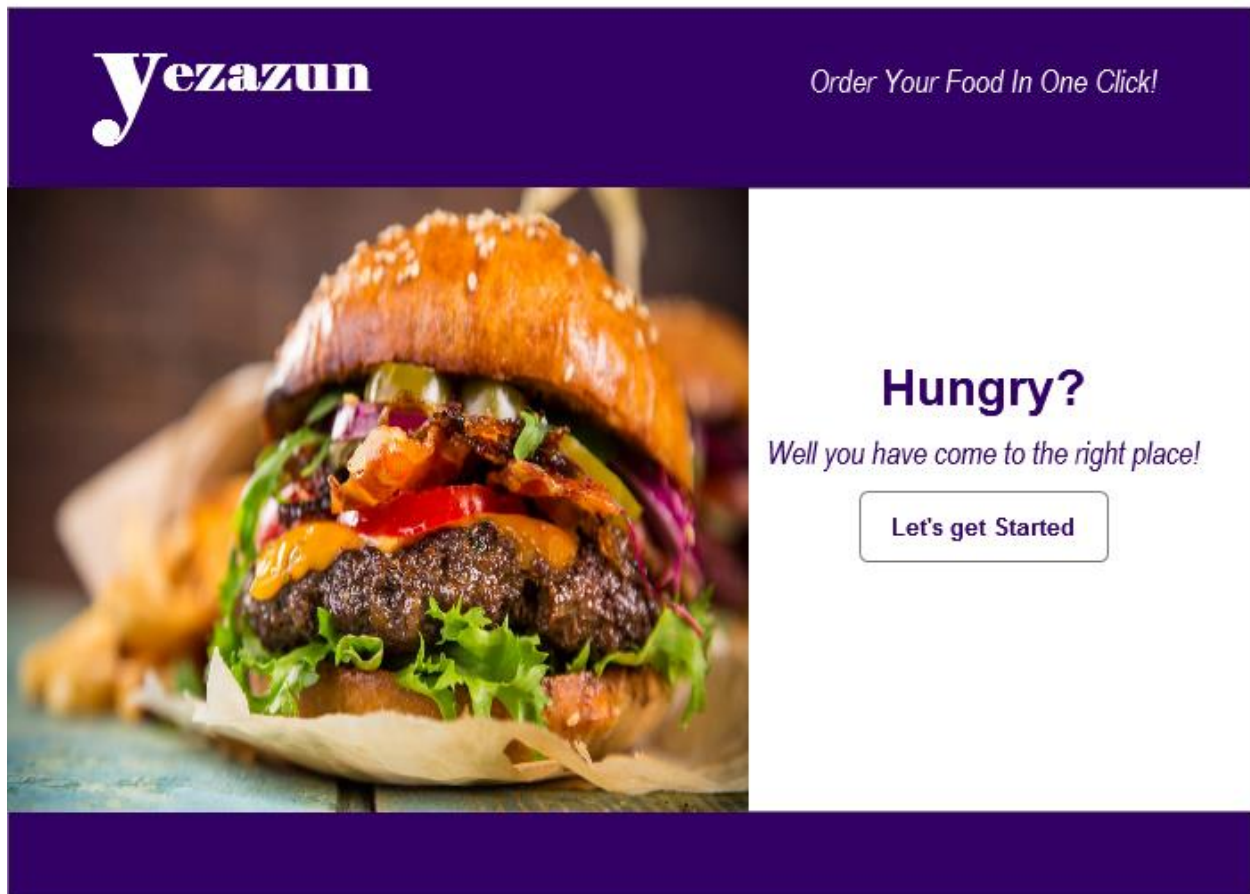




Figure 2 Yezazun Homepage



Order Your Food In One Click!



First Name

Last Name

User Name


Password


Email

User Type

☐ Male ☐ Female

Figure 3 Yezazun Sign up Page

*Order Your Food In One Click!*



User Name

Password

[Sign Up](#)

[forgot password?](#)

Doesn't have account? [Sign Up](#)

Figure 4 Yezazun Login Page

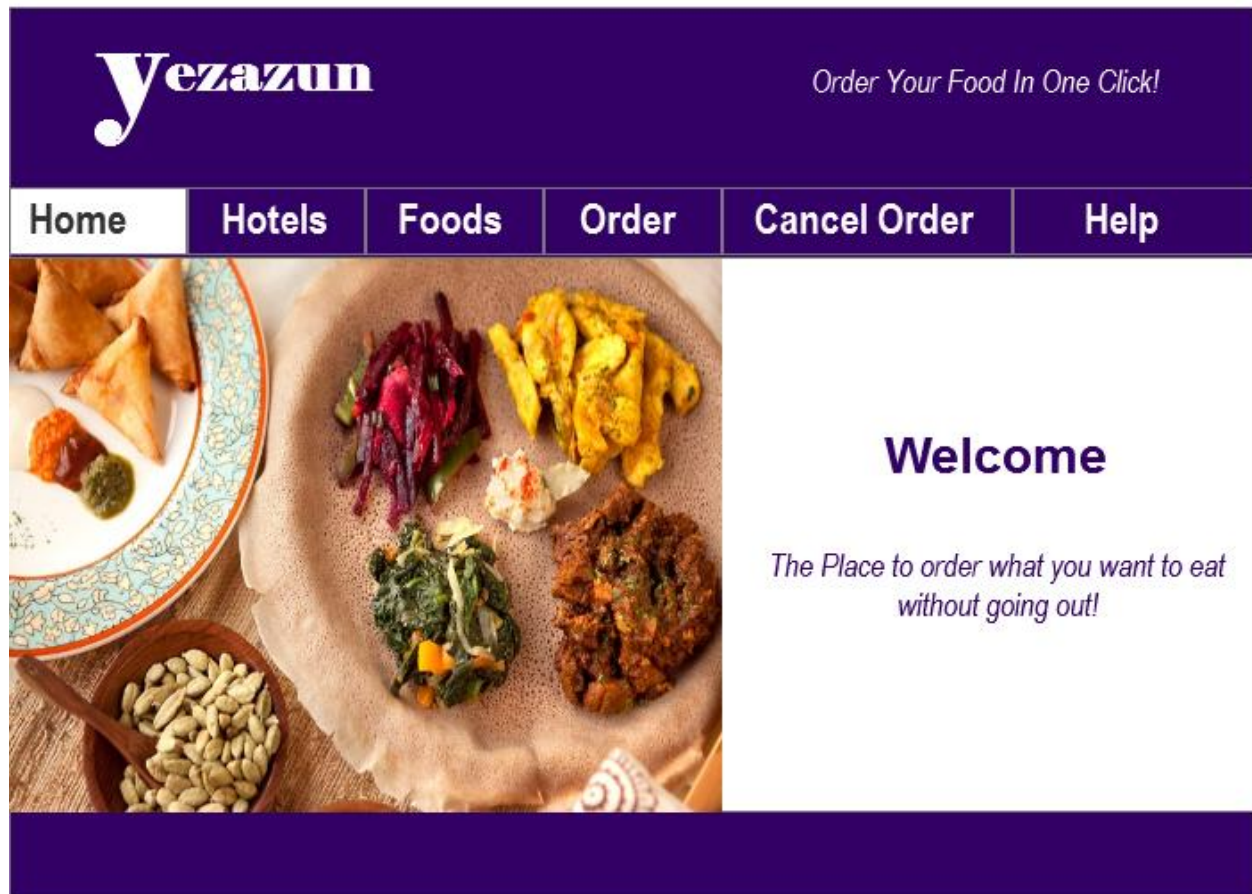


Figure 5 Yezazun Customer Homepage



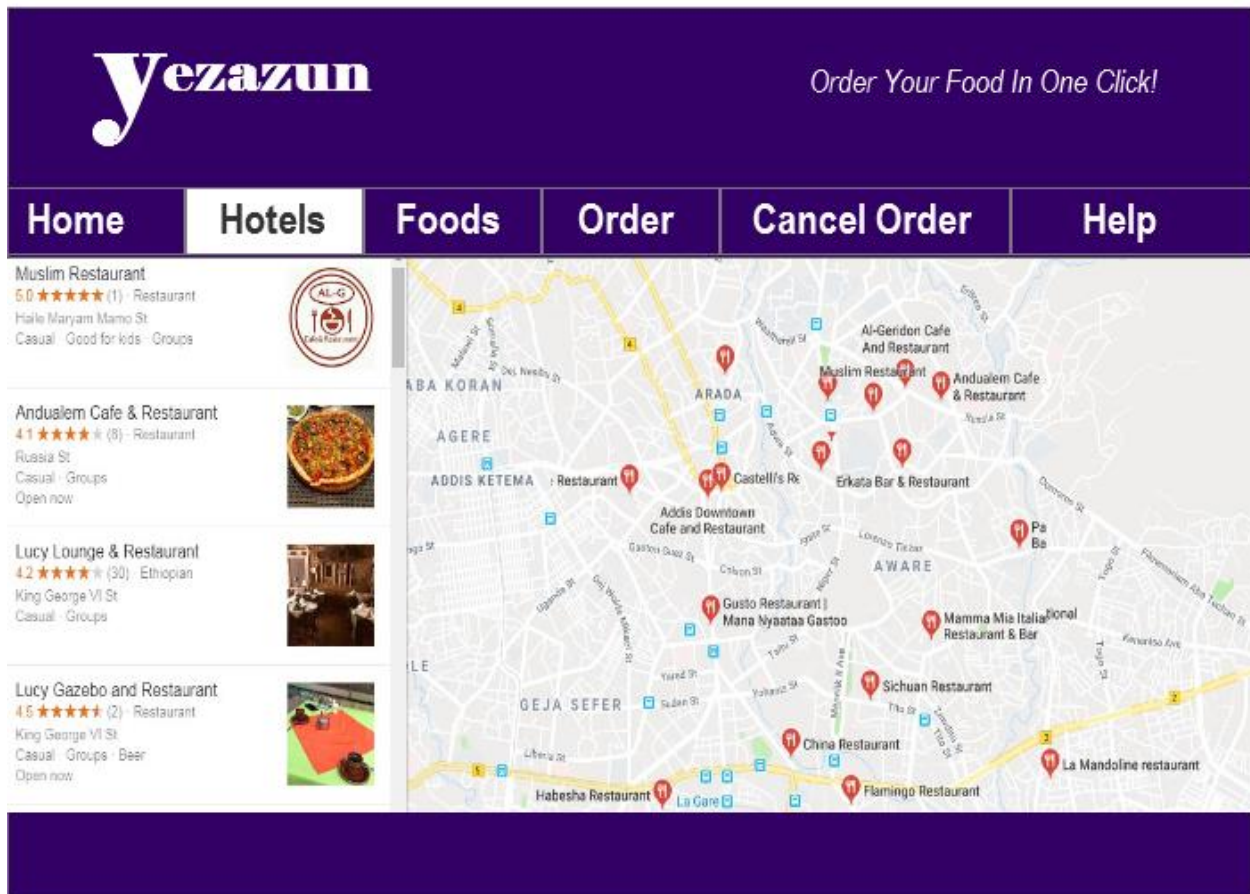


Figure 6 Yezazun Customer Hotel List Webpage





Figure 7 Customer Food List webpage

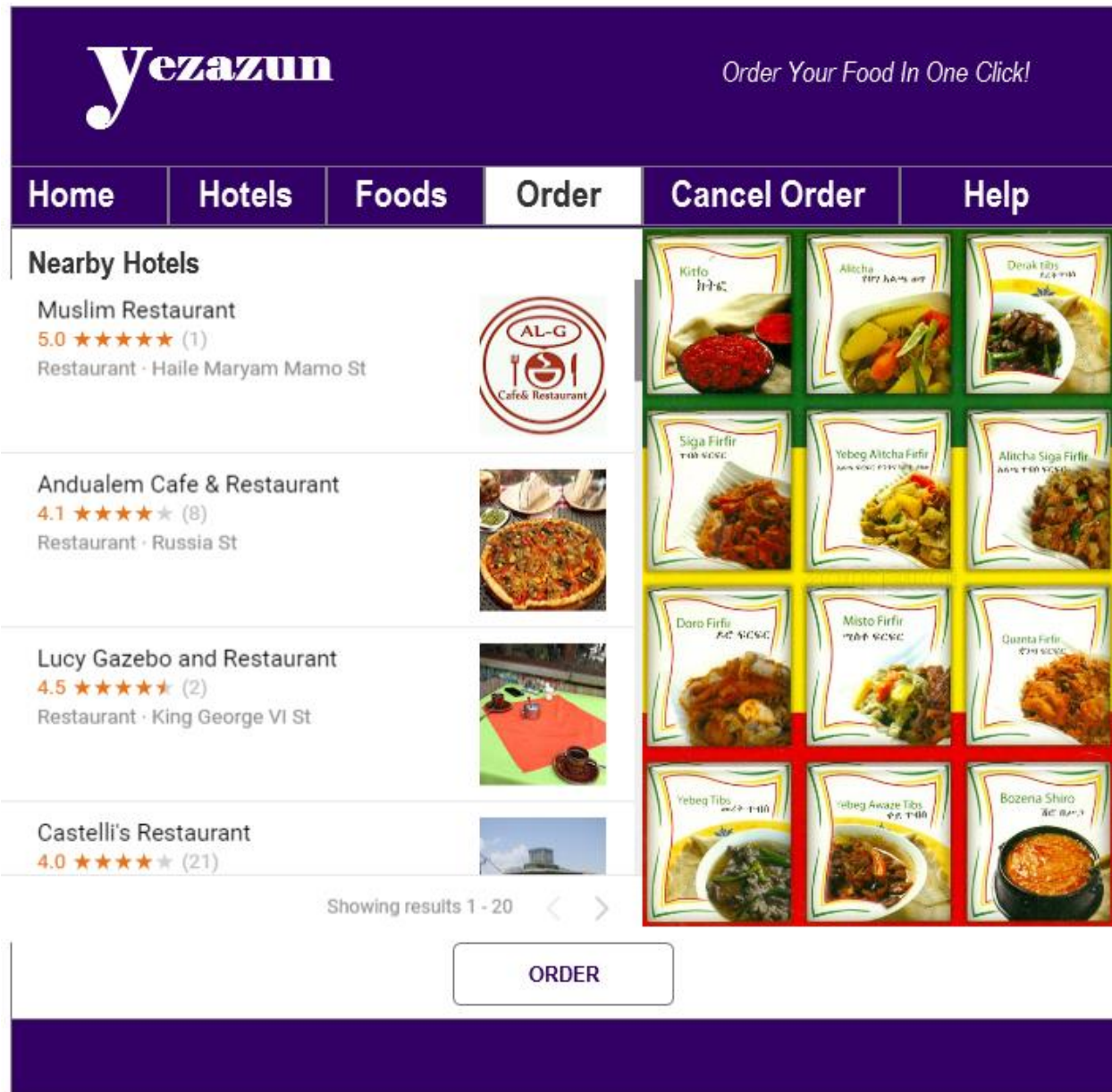


Figure 8 Customer Food Ordering Page

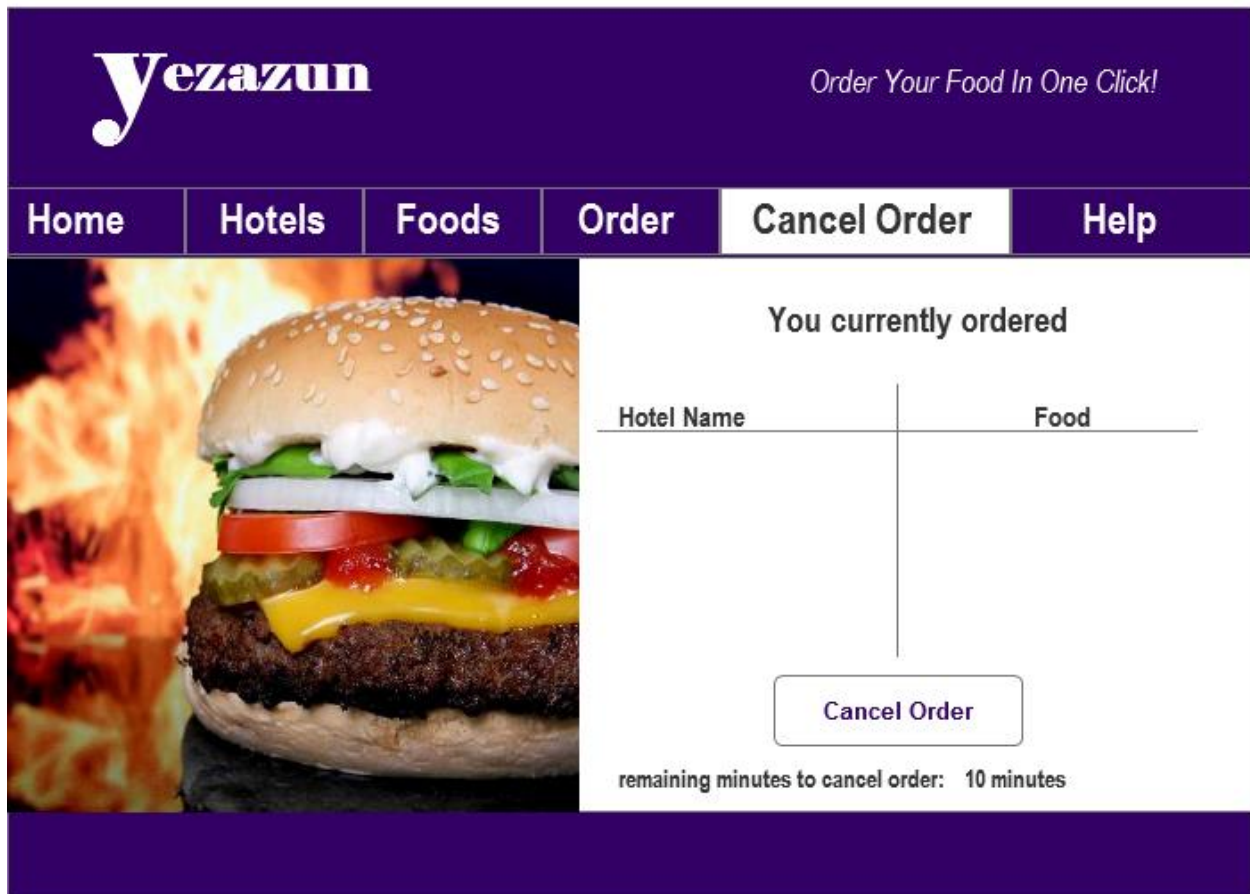


Figure 9 Customer Order Canceling Page



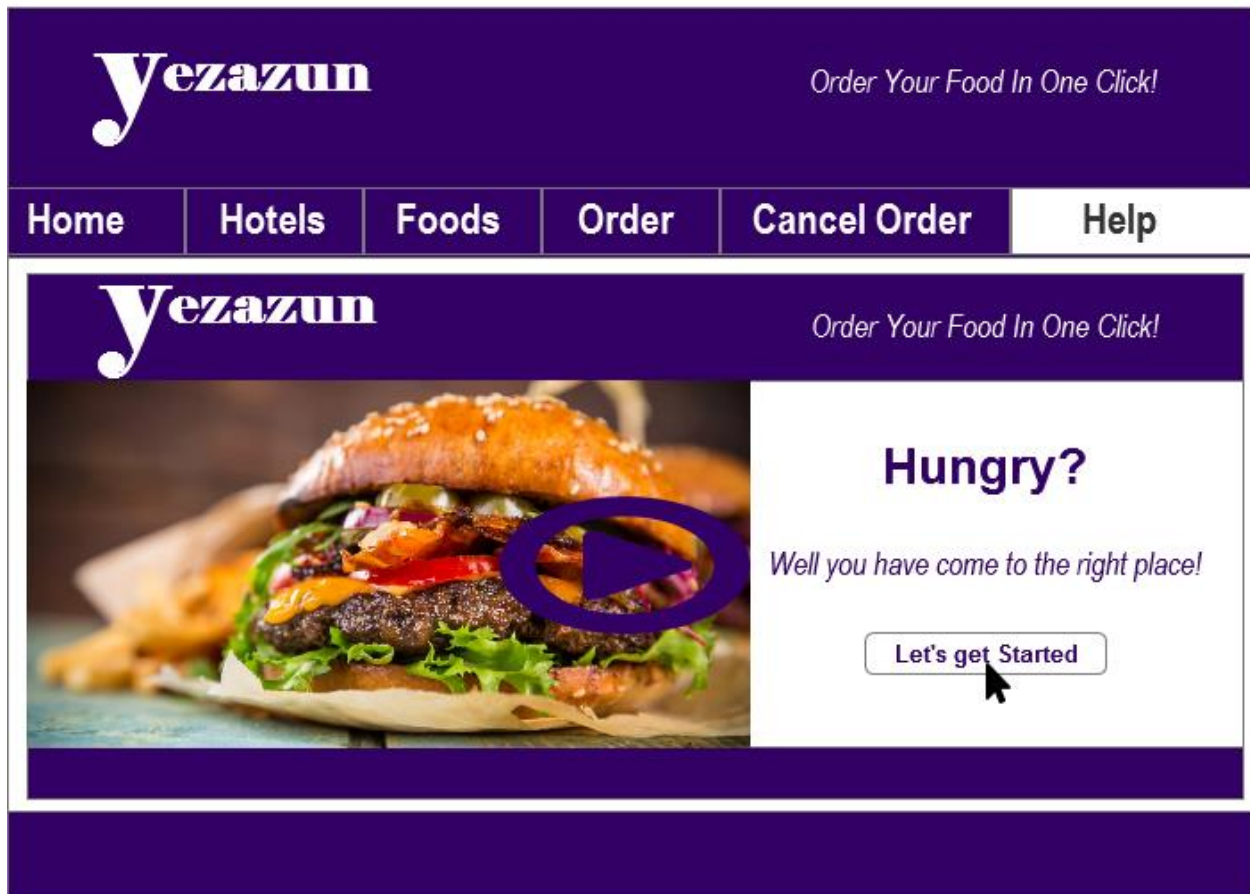



Figure 10 Customer Help Page



Order Your Food In One Click!

Hotels

Coordinator

Member

Hotel Name	Hotel Adress	Hotel Manager

Edit

Add

Delete

Figure 11 Admin Hotel Management Page

**yezazun**

*Order Your Food In One Click!*

**Hotels**

**Coordinator**

**Member**

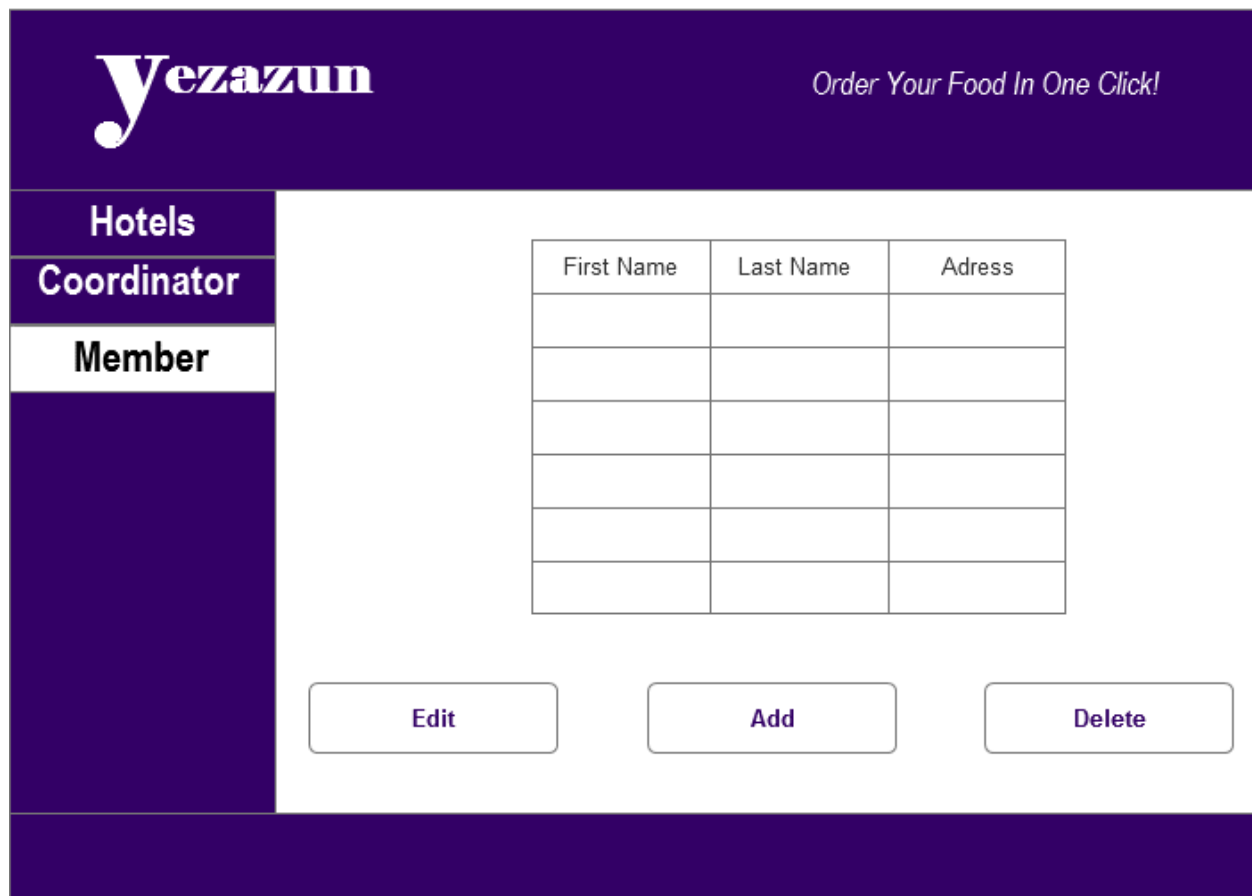
Coordinator Name	Adress	Phone number

Edit

Add

Delete

Figure 12 Admin Coordinator Management page



The screenshot displays the 'Admin Member Management Page' for the 'yezazun' system. The header is dark blue with the 'yezazun' logo on the left and the tagline 'Order Your Food In One Click!' on the right. A left sidebar contains three menu items: 'Hotels', 'Coordinator', and 'Member', with 'Member' currently selected and highlighted in white. The main content area is white and features a table with three columns: 'First Name', 'Last Name', and 'Adress'. The table contains seven empty rows for data entry. Below the table are three buttons: 'Edit', 'Add', and 'Delete', each in a white box with a blue border. The footer is a solid dark blue bar.


First Name	Last Name	Adress

**Edit**

**Add**

**Delete**

*Figure 13 Admin Member Management Page*



*Order Your Food In One Click!*

Hotel Name	Customer Name	Customer Address	Food Name	Quantity	Time

Clear List

Figure 14 Coordinator Order Assisting Page



Food Name	Food Price	Quantities Available (/day)	Serving Time	Food Description

Figure 15 Hotel Managers Food Menu Management Page

### 3.1.3. Hardware Interfaces

The main and most basic hardware interfaces(components) needed for the smooth flow of the system include:

- ❖ A fully functional computing device; desktops, laptops, or android phone that can display the interfaces of the website.
- ❖ A device with sufficient storage capability.

### 3.1.3 Software Interfaces

The Online Food Ordering And Delivery System is both web based and Functions on Android phones so its reliant on the specifications of device being used to access the system. This includes the browser that supports HTML5 and CSS3.

### 3.1.4 Communications Interfaces

For Communication purpose the system will use the standard HTTP provided by the internet.

## 3.2 Functional Requirements

### 3.2.1 FR:01 Sign Up

Table 1 Functional Requirement 01

ID	FR:01
NAME	Sign Up
INTRODUCTION	System permits the user to sign up
INPUT	Sign up information Name, Username, Password
DESCRIPTION	The system allows customers to have an account by filling in the name ,username ,password.
OUTPUT	Sign up successfully conducted and the system redirects the customer to the login platform
ERROR HANDLING	Display The cause of the errors
REFERENCE	UC-05

### 3.2.2 FR:02 Log In

Table 2 Functional Requirement 02

ID	FR:02
NAME	Log in
INTRODUCTION	System permits the user to log in
INPUT	Log in up information Username, Password
DESCRIPTION	The system allows customers to use the services provided.
OUTPUT	Log in successfully conducted and the system takes the customer to the home page.
ERROR HANDLING	Display cause of the errors
REFERENCE	<i>UC-04</i>

**3.2.3 FR:03 Order***Table 3 Functional Requirement 03*

<b>ID</b>	<b>FR:03</b>
<b>NAME</b>	Order
<b>INTRODUCTION</b>	System permits the user to order a meal of his preference
<b>INPUT</b>	Hotel name, Food name,
<b>DESCRIPTION</b>	The system allows customers to view the available hotels and the list of foods they provide and orders the food he/she desires.
<b>OUTPUT</b>	Order successfully conducted and the system enquires from the customer whether its picked up or delivered.
<b>ERROR HANDLING</b>	Display the cause of the errors in understandable term
<b>REFERENCE</b>	<i>UC-01</i>

### 3.2.4 FR:04 Receive Order

Table 4 Functional Requirement 04

ID	FR:04
NAME	Receive Order
INTRODUCTION	System permits the Coordinator to receive an order.
INPUT	
DESCRIPTION	The system allows coordinator to receive an order at the desk to pass on to the hotel.
OUTPUT	Order received successfully.
ERROR HANDLING	Display Errors in familiar terms
REFERENCE	UC-16

### 3.2.5 FR:05 View Food List

Table 5 Functional Requirement 05

ID	FR:05

<b>NAME</b>	View Food List
<b>INTRODUCTION</b>	The System permits the user to observe at the foods served at specific hotels.
<b>INPUT</b>	Food category name, food name.
<b>DESCRIPTION</b>	The system allows customers to look at the foods and extra services that each hotel provides along with some important information's.
<b>OUTPUT</b>	View successfully conducted helps the customer to know what he wants in detail.
<b>ERROR HANDLING</b>	Display Error in familiar terms
<b>REFERENCE</b>	<i>UC-02</i>

**3.2.6 FR:06 Give Feedback***Table 6 Functional Requirement 06*

ID	FR:06
NAME	Give feedback
INTRODUCTION	System provides a platform on which the customers can rate and leave a comment.
INPUT	Name, Username, Password
DESCRIPTION	The system provides a platform where customers can review foods and rate it in accordance to their satisfaction and give comment on it. And it will store each comment on a database in agreement to the foods name for other customers to see.
OUTPUT	Feedback successfully given
ERROR HANDLING	Display Errors in familiar terms
REFERENCE	<i>UC-06</i>

**3.2.7 FR:07 Cancel Order***Table 7 Functional Requirement 07*

<b>ID</b>	<b>FR:07</b>
<b>NAME</b>	Cancel Order
<b>INTRODUCTION</b>	System permits the user to cancel an ordered food.
<b>INPUT</b>	Food Name
<b>DESCRIPTION</b>	The system allows the customer to cancel an order he just placed.
<b>OUTPUT</b>	Cancellation successfully and enquires from the customer whether he/she wants to order another or leave.
<b>ERROR HANDLING</b>	Display Errors in a familiar terms
<b>REFERENCE</b>	<i>UC-07</i>

**3.2.8 FR:08 Food Management***Table 8 Functional Requirement 08*

<b>ID</b>	<b>FR:08</b>
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<b>NAME</b>	Food Management
<b>INTRODUCTION</b>	System permits the management of food items.
<b>INPUT</b>	Food category, food name
<b>DESCRIPTION</b>	The system allows food management alternatives like Addition of food, removal of foods and some modifications on the existing food by the authorized personal(hotel managers) .
<b>OUTPUT</b>	Successfully added, removed and modified.
<b>ERROR HANDLING</b>	Display Errors in a familiar terms
<b>REFERENCE</b>	<i>UC-13</i>

### 3.2.9 FR:09 Manage Customers

*Table 9 Functional Requirement 09*

<b>ID</b>	<b>FR:09</b>
<b>NAME</b>	Manage Customers
<b>INTRODUCTION</b>	System permits an authorized to manage customers
<b>INPUT</b>	Name, Username
<b>DESCRIPTION</b>	The system grants the Authorized personal (Administrators) the

	power to add or remove customers.
<b>OUTPUT</b>	Addition or removal successful
<b>ERROR HANDLING</b>	Display Errors in a familiar terms
<b>REFERENCE</b>	<i>UC-12</i>

### 3.2.10 FR:10 Nearby Service

*Table 10 Functional Requirement 10*

ID	FR:10
<b>NAME</b>	Nearby Service
<b>INTRODUCTION</b>	System shall grant the user to use a nearby system.
<b>INPUT</b>	Location
<b>DESCRIPTION</b>	The system grants the customers to perceive hotels nearby and services provided.
<b>OUTPUT</b>	The customer views and gets served by hotels nearby
<b>ERROR HANDLING</b>	Display Errors in a familiar terms
<b>REFERENCE</b>	<i>UC-08</i>

### 3.3. Use Cases

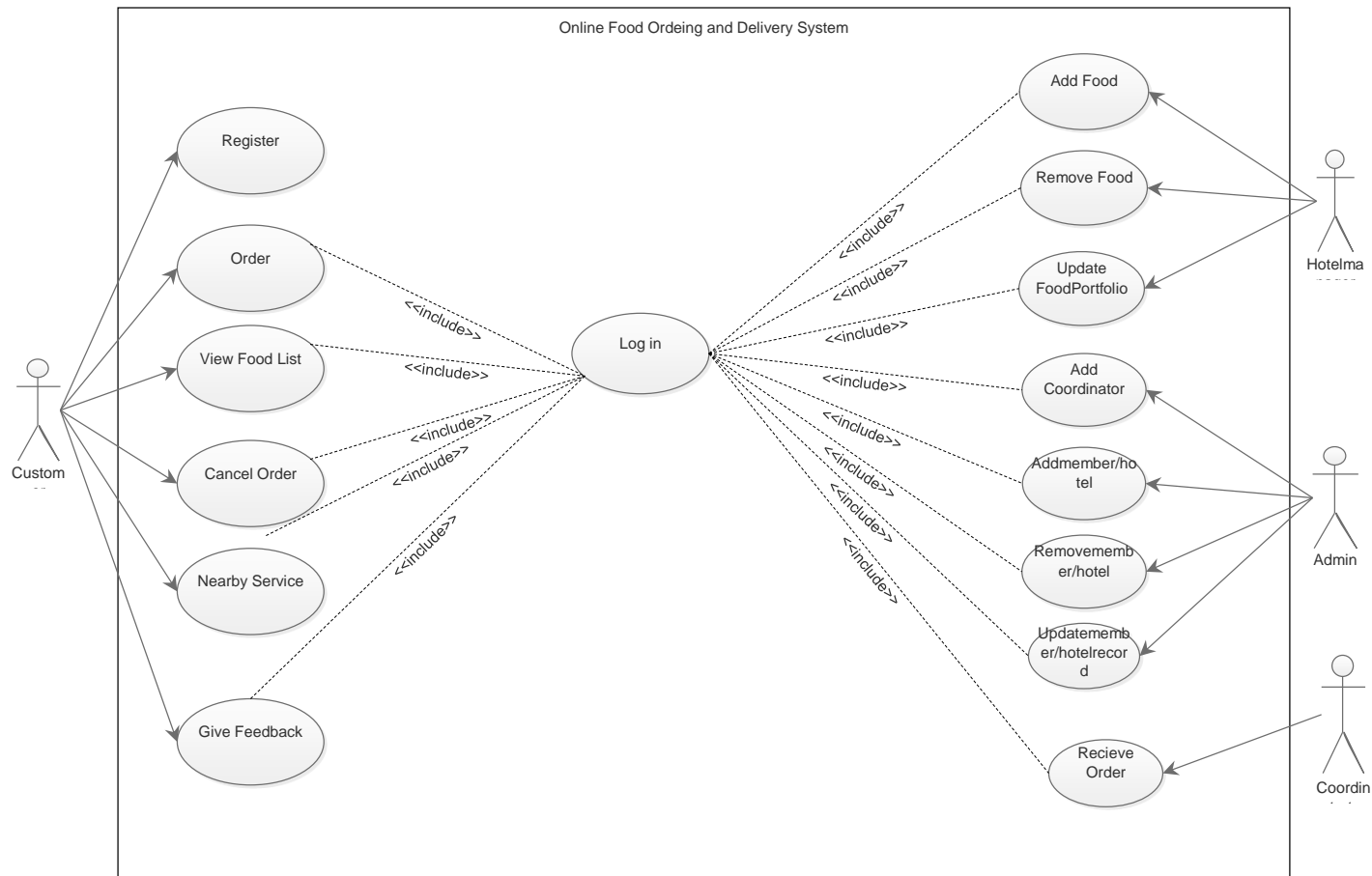


Figure 16 Use Case

### 3.3.1 UC-01: Order

**Use case name:** Order

**Goal:** The customer wants to order a meal from the online food ordering and delivery system

**Primary Actor:** Customer

**Level:** User

**Precondition:** The user must be logged in.

**Post condition:** The meal of choice must be provided by the hotels.

**Failure:** The system fails to allow the user to order food.

**Trigger:** The user is hungry and needs food.

#### Main Success Scenario

1. The user selects the order option.
2. The system pops up the ordering panel.
3. The system displays list of hotels.
4. The system shows list of foods.
5. The user chooses a meal of his preference.
6. The system reveals information (ingredients) related to the selected food
7. The user orders the food of his preference.
8. The user chooses the food to be delivered.
8. The system confirms the delivery.

#### Extension

7.a The hotel is not serving the preferred food at the time.

7.a.1 the system presents the user with an option of choosing another food.

### 3.3.2 UC-02: View Food List

**Use case name:** View Food List

**Goal:** The customer wishes to observe the list of foods provided by system.

**Primary Actor:** Customer

**Precondition:** The user must be at the welcome page.

**Post condition:** The system must provide the list of hotels along with the service they provide.

**Failure:** The system fails to allow the user view the system's service.

**Trigger:** The user is interested in seeing the service provided. .

**Main Success Scenario**

1. The user is presented with login/signup page
2. The user logs in or signs up.
3. The user chooses the view option.
4. The system shows list of foods and list of services provided by the hotels.

**Extension**

- 2.a The System doesn't allow the user to view the food items.
  - 2.a.1 The system enquires the user to try again.

**3.3.3 UC-03: Deliver**

**Use case name:** Deliver

**Goal:** deliver a meal from the online food ordering and delivery system

**Primary Actor:** Customer

**Precondition:** The user must be logged in, ordered a meal.

**Post condition:** The meal of choice must be provided by the hotels.

**Failure:** The system fails to allow the user to order

**Trigger:** The user is unable to have his order picked up or get it himself.

**Main Success Scenario**

1. The user performs use case-01.
2. The system pops up the delivery panel.
3. The system displays the necessary information to filled .
4. The system shows list of foods.
5. The user chooses a meal of his preference.

**Extension**

- 7.a The hotel is not serving the preferred food at the time.
  - 7.a.1 the system presents the user with an option of choosing another food.

### 3.3.4 UC-04: Log In

**Use case name:** Log In

**Goal:** The Customer desires to sign into his/her account.

**Primary Actors:** Customer, Administrator , Hotel manager

**Precondition:** The actor must be registered into the database.

**Post condition:** The system gives access to the actor by their level.

**Failure:** The system fails to give access to the actor.

**Trigger:** The actor needs to log in.

#### **Main Success Scenario**

1. The system requests that the actor enters his/her name and password
2. The actor enters his/her username and password
3. The system verifies the entered username and password.
4. The system logs the actor in.

#### **Extension**

3.a Wrong username or password entered

3.a.1 The system inculcates the actor to try again

### 3.3.5 UC-05: Sign Up

**Use case name:** Sign Up

**Goal:** The customer wishes to sign up to have an account.

**Primary Actors:** Customer, Administrator , Hotel manager

**Precondition:** The actor must be on the welcome page.

**Post condition:** The system allows the actor to sign up.

**Failure:** The system denies the actor to sign up.

**Trigger:** The actor desires to use the system.

#### **Main Success Scenario**

1. The actor selects the sign up option.

2. The system provides the actor with information's to fill.
3. The actor fills the required information
4. The system verifies the information's provided by the actor.

**Extension**

- 3.a Field cannot be empty
- 3.a.1 The system inculcates the actor to try again

**3.3.6 UC-06: Give Feedback**

**Use case name:** Give feedback

**Goal:** The customer wishes to give feedback.

**Primary Actor:** Customer

**Precondition:** The customer must be logged in.

**Post condition:** The system shall permit the customer to give feedback.

**Failure:** The system denies the customer to give feedback.

**Trigger:** The customer wishes to give feedback.

**Main Success Scenario**

1. Actor selects the change password option
2. The system prompt the current password and the new password
3. The actor enters both his/her current and new password
4. The system request the actor to re-enter the new password
5. The system matches the password
6. The system alerts the actor that his work is successful.

**Extension**

- 5.a The re-entered password doesn't match with the earlier password
- 5.a.1 The system notifies the actor to re-enter his/her new password again.

**3.3.7 UC-07: Cancel Order**

**Use case name:** Cancel Order

**Goal:** The customer to cancel an order that has been placed with in the agreed time.

**Primary Actor:** Customer

**Precondition:** The customer must be logged in.

**Post condition:** The system shall permit the customer to cancel his/her order .

**Failure:** The system denies the customer to cancel his/her order..

**Trigger:** The customer needs to cancel an order he just placed.

**Main Success Scenario**

1. The actor selects the cancel order option.
2. The system checks for the time limit to cancel order.
3. The customer cancels the order

**Extension**

2.a The time limit is over do.

2.a.1 The system notifies the customer that the time limit for cancelling an order has passed.

### **3.3.8 UC-08: Nearby Service**

**Use case name:** Nearby Service

**Goal:** The customer wishes to get a nearby service for food ordering and delivery.

**Primary Actor:** Customer

**Precondition:** The customer must be logged in and has allowed location.

**Post condition:** The system shall permit the customer to receive nearby service .

**Failure:** The system denies the customer to receive nearby service..

**Trigger:** The customer needs to use a nearby service.

**Main Success Scenario**

1. Actor selects the nearby service option.
2. The system prompts the user to allow location on his phone.
3. The system then tracks the customers phone to get his location
- 4.The system the prevails the nearest hotels from which a customer can be served.

**Extension**

2.a The time limit is over do.

2.a.1 The system notifies the customer that the time limit for cancelling an order has passed.



### 3.3.9 UC-09: Add Food

**Use case name:** Add Food

**Goal:** The Hotel Manager wishes to introduce a new food to the menu.

**Primary Actor:** Hotel manager

**Precondition:** The hotel manager must be logged in.

**Post condition:** The system shall permit the Hotel manager to add a new food .

**Failure:** The system denies the Hotel manager to add a new food.

**Trigger:** The Hotel manager desires to add a new food.

#### **Main Success Scenario**

1. The hotel managers selects the add food option
2. The system prompts the user to enter to enter all specification of the new food.
3. The hotel manager enters all the required information.
4. The system alerts the hotel manager that his work is successful.

#### **Extension**

3.a This field cannot be empty.

3.a.1 The system notifies the hotel manager that he has left a field unfilled and has to fill it.

### 3.3.10 UC-10: Remove Food

**Use case name:** Remove food

**Goal:** The Hotel Manager wishes to remove a food from the hotels menu.

**Primary Actor:** Hotel manager

**Precondition:** The hotel manager must be logged in.

**Post condition:** The system shall permit the hotel manager to remove a food from their menu.

**Failure:** The system denies the hotel manager to remove food from their menu.

**Trigger:** The hotel manager needs to remove a food from the hotels menu.

#### **Main Success Scenario**

1. The hotel manager selects the remove option.
2. The system prompt the hotel manager to enter some specifications of the food.

3. The hotel manager enters the food to removed.
4. The system verifies the food to be removed.
5. The hotel manager removes the food.
6. The Hotel manager saves changes.

**Extension**

3.a Food not found.

3.a.1 The system notifies the hotel manager the food he has requested doesn't exist.

**3.3.11 UC-11: Remove Member/Hotel**

**Use case name:** Remove Member/Hotel

**Goal:** The Admin wishes to remove a member/hotel from the system.

**Primary Actor:** Administrator

**Precondition:** The Administrator must be logged in.

**Post condition:** The system shall permit the administrator to remove a member/hotel from the system.

**Failure:** The system denies the administrator to remove a member/hotel from the system.

**Trigger:** The administrator desires to remove a member/hotel.

**Main Success Scenario**

1. The administrator selects the remove member/hotels options.
2. The system prompts the administrator to enter the members name/hotels name.
3. The administrator enters the name of member/hotel to be removed.
4. The system verifies the member/hotel to be removed.
5. The administrator removes member/hotel.
- 6.The Admin saves changes.

**Extension**

4.a member/hotel not found.

4.a.1 The system notifies the administrator the member/hotel he has requested doesn't exist.

### 3.3.12 UC-12: Add Member/Hotel

**Use case name:** Add Member/Hotel

**Goal:** The Admin wishes to add a member/hotel to the system .

**Primary Actor:** Administrator

**Precondition:** The administrator must be logged in.

**Post condition:** The system shall permit the administrator to add member/hotel to the system.

**Failure:** The system denies the administrator to add member/hotel to the system

**Trigger:** The administrator desires to add a member/hotel.

#### **Main Success Scenario**

1. The hotel manager selects the add member/hotel option.
2. The system prompt the Administrator to enter the necessary information about the member/hotel.
3. The system enters the required information.
4. The administrator saves his work.

#### **Extension**

3.a This field cannot be empty.

3.a.1 The system notifies the administrator that he has left a field unfilled.

### 3.3.13 UC-13: Update Food Portfolio

**Use case name:** Update Food Portfolio

**Goal:** Change some information about the existing food..

**Primary Actor:** Hotel manager

**Precondition:** The hotel manager must be logged in.

**Post condition:** The system shall permit the hotel manager to update food portfolio .

**Failure:** The system denies the hotel manager to update food portfolio.

**Trigger:**The hotel manager desires to change information about the existing food.

#### **Main Success Scenario**

1. The hotel manager selects the update food portfolio option.
2. The system prompt the hotel manager to enter the food name to updated.
3. The hotel manager enters the food name.

4. The system prompts the hotel manager to enter the changes.
5. The hotel manager enters the changes desired.
6. The hotel manager saves changes.

**Extension**

3.a Food not found.

- 5.a.1 The system notifies the hotel manager that the food he requested doesn't exist.

### **3.3.14 UC-14: Update Member/Hotel Record**

**Use case name:** Update member/hotel record

**Goal:** Changing the currently existing information about a member/hotel.

**Primary Actor:** Administrator

**Precondition:** The administrator must be logged in.

**Post condition:** The system shall permit the administrator to change member/hotel record .

**Failure:** The system denies the administrator to change member/hotel record.

**Trigger:** The administrator desires to change member/hotel record.

**Main Success Scenario**

1. The administrator selects the update member/hotel record option.
2. The system prompt the administrator to enter the member/hotel name.
3. The administrator enters the name of member/hotel.
4. The system request the administrators to change the desired information.
5. The administrator updates the selected members/hotels record.
6. The Administrator saves changes.

**Extension**

3.a Member/Hotel not found.

- 5.a.1 The system notifies the administrator the name is not found.

### **3.3.15 UC-15: Add Coordinator**

**Use case name:** Add Coordinator

**Goal:** The Admin wishes to add a coordinator to the system .

**Primary Actor:** Administrator

**Precondition:** The administrator must be logged in.

**Post condition:** The system shall permit the administrator to add coordinator to the system.

**Failure:** The system denies the administrator to add coordinator to the system

**Trigger:** The administrator desires to add a coordinator.

**Main Success Scenario**

1. The hotel manager selects the add coordinator option.
2. The system prompt the Administrator to enter the necessary information about the coordinator.
3. The Administartor enters the required information.
4. The administrator saves his work.

**Extension**

3.a This field cannot be empty.

3.a.1 The system notifies the administrator that he has left a field unfilled.

### **3.3.16 UC-16: Receive Order**

**Use case name:** Receive order

**Goal:** The coordinator wishes to receive order that is placed. .

**Primary Actor:** Coordinator

**Precondition:** The coordinator must be logged in.

**Post condition:** The system shall permit the coordinator to receive an order.

**Failure:** The system denies the coordinator to receive an order.

**Trigger:** The administrator desires to receive an order.

**Main Success Scenario**

1. The coordinator checks whether an order has been placed..
2. The system displays the order.
3. The coordinator passes it onto the hotel...

**Extension**

2.a No order placed currently.

3.a.1 The system notifies the coordinator that there is no order placed currently.

### **3.4 Non-Functional Requirements**

#### **3.4.1 Performance**

The system designed to operate given task in short period of time. The system provide service for many user at once to work with many customers. The system points out nearby hotels in 2 seconds and give search results in 3 seconds.

#### **3.4.2 Reliability**

The system backup it's database in two day 's gap constantly in case of failure happens, if failure happens the system restore to its normal condition using backup data.

#### **3.4.3 Availability**

The system work twenty-four hours a day, seven days a week to satisfy users need. The system available on web and android phone to increase accessibility of the system.

#### **3.4.4 Security**

The users and hotel managers personal information is confidential. The system gives high protection for money transactions, thus helps to pay for orders.

#### **3.4.5 Maintainability**

The system designed to support flexibility and extension which helps to maintain easily and efficiently.

#### **3.4.6 Portability**

The system is expected to be compatible with all web browsers and devices of various specifications.

### **3.5 Inverse Requirement**

Since we have decided to limit the scope to the city of Addis Ababa we won't be expecting much things that system won't do.

### 3.6 Logical Database Requirements

*Table 11 Logical Database*

Data	Attribute	Use
Customer Data	User name User Email Address Phone number Password User Type	This data is used to authenticate user account and to reset lost password.
Hotel and restaurant Data	Hotel name Address Food menu Food price	This data is used to give information about hotels and their service.
Order Data	User name Food name Food price Location	This data used to order food.
Comment Data	User name Hotel name Food name Content Date	This data is used to cache comments by a specific user for specific food item and hotel.
Delivery Data	Name Location	This data is used to store all the deliveries conducted.

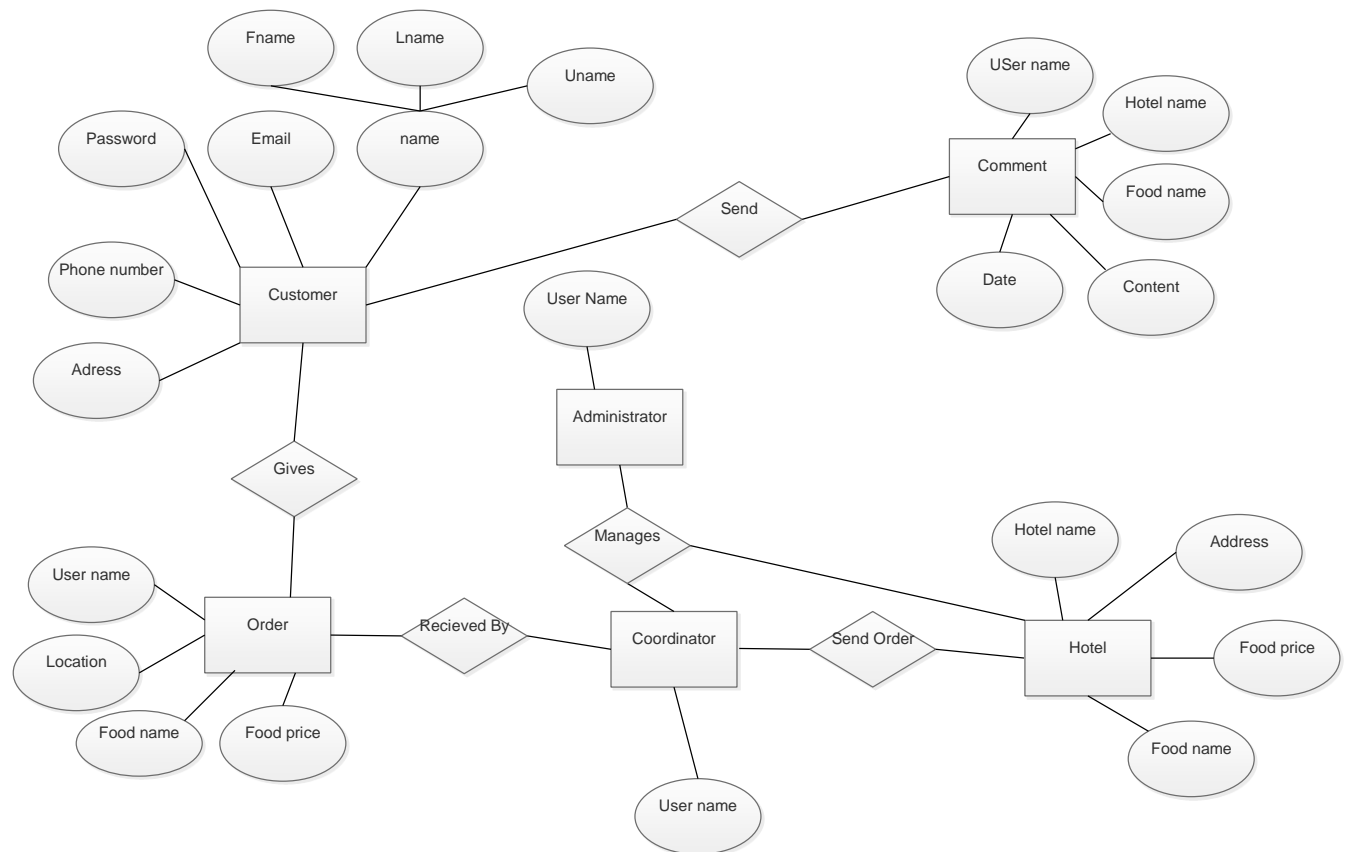


Figure 17 ER Diagram

## 4. Change Management Process

Currently for this project we are following the water fall model which makes it harder to be flexible and being bold and making changes regarding requirements so we have strived to understand the necessary requirements in our power. We would not make hasty and major changes since our model and our time is limited. We would consider any changes that come and discuss it among the group to find a better solution that would be manageable in our case.



## REFERENCE

- Google Map, <http://maps.google.com>, 04/06/2018
- Use Case, <http://www.bridging-the-gap.com/what-is-a-use-case/>, 04/06/2018
- SRS, [https://en.wikipedia.org/wiki/Software\\_requirements\\_specification](https://en.wikipedia.org/wiki/Software_requirements_specification), 04/07/2018
- Requirements, <https://www.inflectra.com/ideas/topic/requirements-definition.aspx>, 04/08/2018
- Deliver Addis, <https://deliveraddis.com/>, 04/08/2018
- We Deliver, <https://www.wedelivery-online.com/>, 04/09/2018
- Ethiopian Delivery, <https://www.delivery.com/food/ethiopian> , 04/09/2018