Ecommerce Based

Online Shopping Website

A Synopsis Submitted for partial fulfillment of
Requirements For the

DEGREE
OF
BACHELOR OF COMPUTER APPLICATIONS

Submitted By

HABIBA
(Roll No- 210934106116)

Under the supervision of
Prof.Saroj Kumari
Asst. Professor-IT
(Institute of Technology & Science, Mohan Nagar, Ghaziabad)

DEPARTMENT OF BCA
INSTITUTE OF TECHNOLOGY & SCIENCE
MOHAN NAGAR, GHAZIABAD

Batch: 2021-2024

1. Introduction

1.1 Goal

Shopping has long been considered a recreational activity by many. Shopping online is no exception. The goal of this application is to develop a web based interface for online retailers. The system would be easy to use and hence make the shopping experience pleasant for the users. The goal of this application is

- To develop an easy to use web based interface where users can search for products, view a complete description of the products and order the products.
- A search engine that provides an easy and convenient way to search for products specific to their needs. The search engine would list a set of products based on the search term and the user can further filter the list based on various parameters.
- An AJAX enabled website with the latest AJAX controls giving attractive and interactive look to the web pages and prevents the annoying post backs.
- Drag and Drop feature which would allow the users to add a product to or remove a product from the shopping cart by dragging the product in to the shopping cart or out of the shopping cart.
- A user can view the complete specification of the product along with various images and also view the customer reviews of the product. They can also write their own reviews.

1.2 Need of the application

There are large numbers of commercial Online Shopping websites offering large number of products tailored to meet the shopping interests of large number of customers. These online marketplaces have thousands of products listed under various categories.

Problem:

- The basic problems with the existing systems are the non-interactive environment they provide to the users.
- The use of traditional user interfaces which make continuous post backs to the server; each post back makes a call to the server, gets the response and then refreshes the entire web form to display the result. This scenario adds an extra trade off causing a delay in displaying the results
- A search engine that would display the results without allowing the users to further filter the results based on various parameters.
- Use of traditional and non user friendly interfaces that are hard to use

Solution:

- The motive of this Online Shopping Web Application is to allow the user to play with the search tool and create different combinatorial search criterion to perform exhaustive search.
- Making the application AJAX enabled gets rid of these unnecessary delays letting the user to perform exhaustive search. The users of this application can easily feel the difference between the Ajax empowered user interfaces vs. traditional user interfaces.
- Provide Interactive interface through which a user can interact with different areas of application easily.
- A search engine that provides an easy and convenient way to search for products specific to their needs. The search engine would list a set of products based on the search term and the user can further filter the list based on various parameters.
- Provide Drag and Drop feature thereby allowing the user to add products to or remove products from the shopping cart by dragging the products in to or out of the shopping cart.

.

1.3 Scope

- The current system can be extended to allow the users to create accounts and save products in to wish list.
- The users could subscribe for price alerts which would enable them to receive messages when price for products fall below a particular level.
- The current system is confined only to the shopping cart process. It can be extended to have a easy to use check out process.
- Users can have multiple shipping and billing information saved. During checkout they can use the drag and drop feature to select shipping and billing information

1.4 System Feasibility

The system feasibility can be divided into the following sections:

1.4.1 Economic Feasibility

The project is economically feasible as the only cost involved is having a computer with the minimum requirements mentioned earlier. For the users to access the application, the only cost involved will be in getting access to the Internet.

1.4.2 Technical Feasibility

To deploy the application, the only technical aspects needed are mentioned below:

Operating Environment Window 10

Platform – Visual Studio 2023

Database SQL Server 2021

For Users:

Internet Browser

Internet Connection

1.4.3 Behavioral Feasibility

The application requires no special technical guidance and all the views available in the application are self explanatory. The users are well guided with warning and failure messages for all the actions taken.

1.5 Methodology/Work Planning

eCommerce, standing for electronic commerce, is the process of customers shopping online and processing their payment. An eCommerce website allows visitors to find their product(s), add them to their "cart," and securely enter their payment information to complete their purchase.

2. System Analysis

After carefully analyzing the requirements and functionality of the web application, I had two important diagrams by the end of the analysis phase. They are the ER diagram and data flow diagram which were the basis for finding out entities and relationships between them, the flow of information.

2.1 ER Diagram

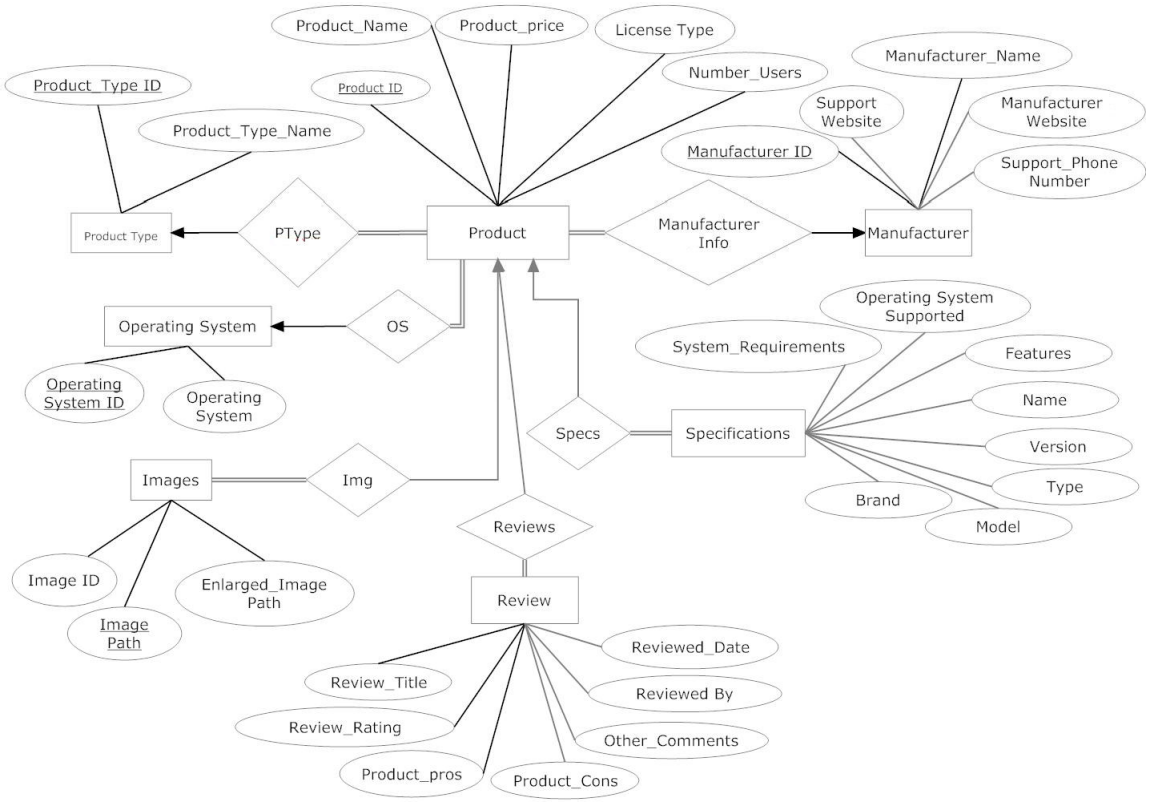

Figure 3.1 Entity Relation Ship Diagram

2.2 Data Flow Diagram

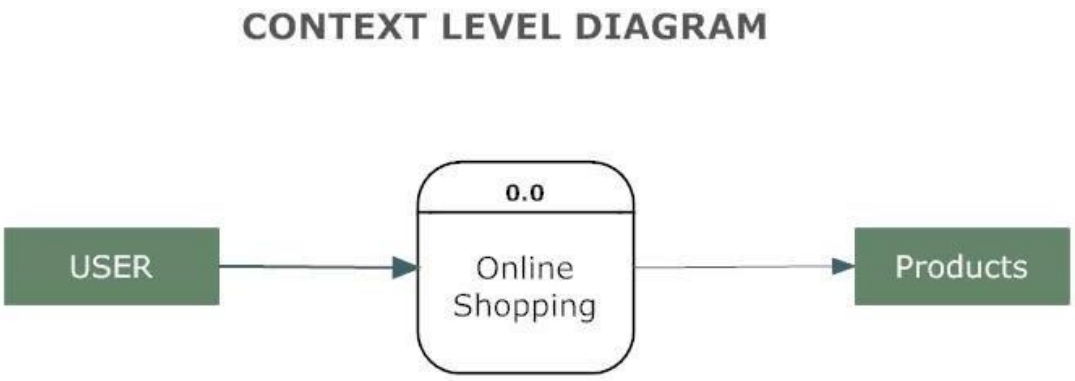

Figure 3.2: A Context Level Diagram

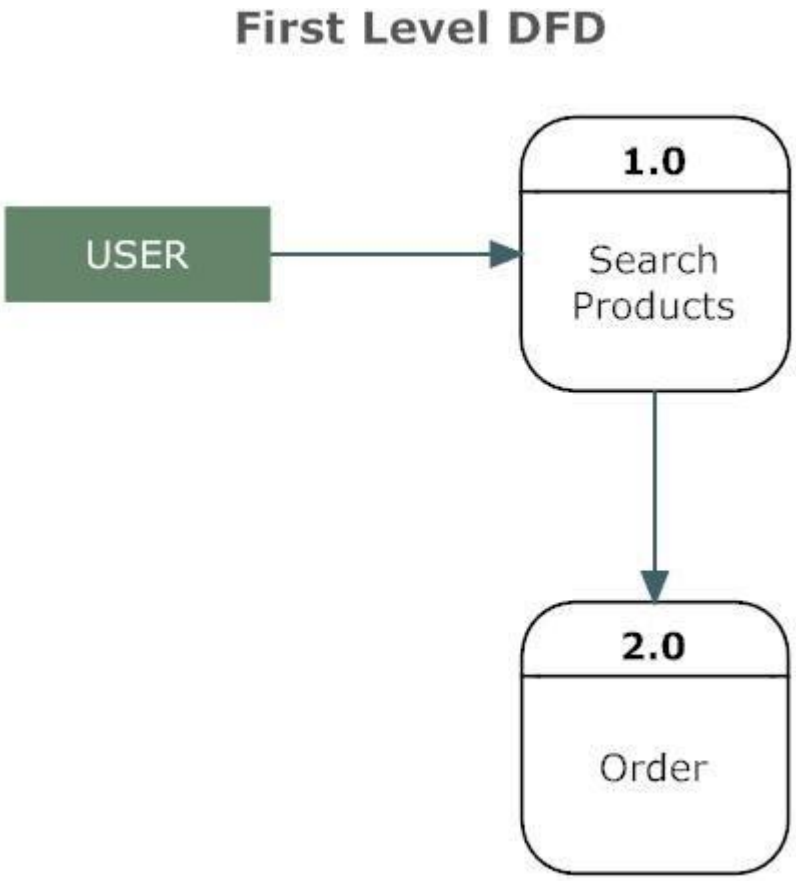

Figure 3.3: A First Level Diagram

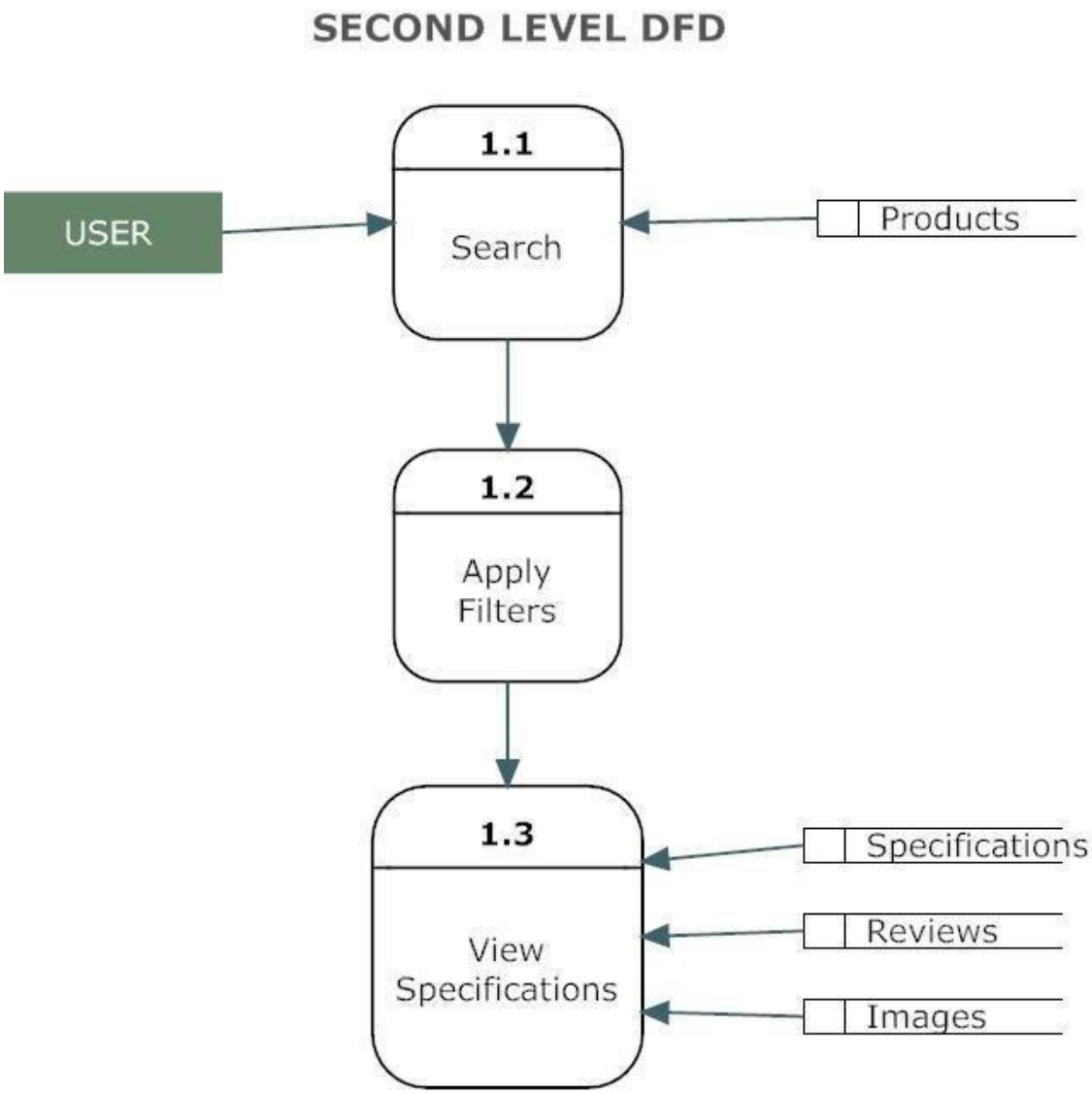

Figure 3.4: A Second Level Diagram

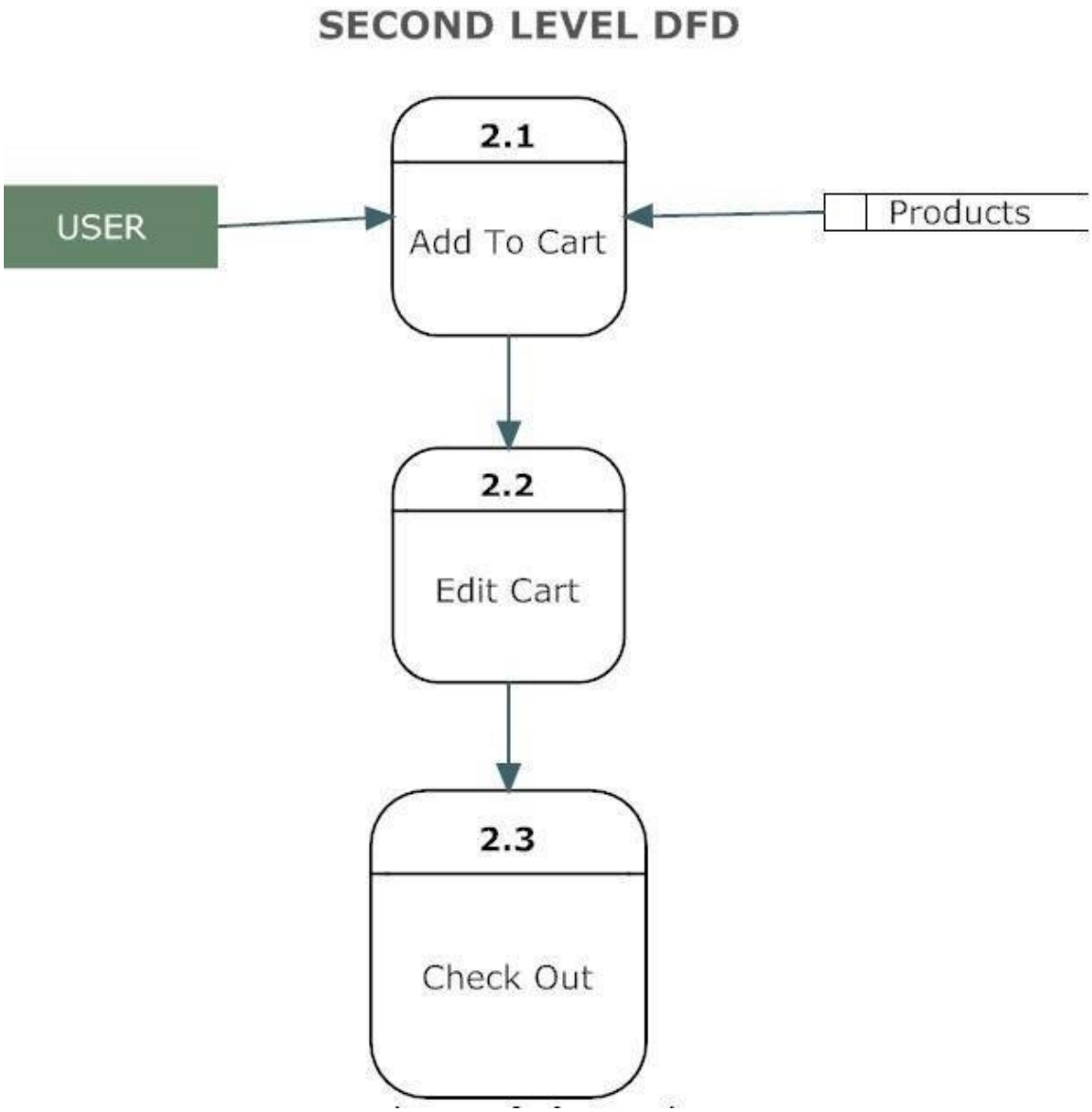

Figure 3.5: A Second Level Diagram

2.3 Platform Specifications – Deployment

2.3.1 Hardware Specification

Intel CORE I3

RAM 250 MB

Minimum Space Required 100 MB

2.3.2 Software Specification

Operating Environment – Window 10

Platform -Visual Studio 2022

Database SQL Server 2021

3. Conclusions

The ‘Online Shopping’ is designed to provide a web based application that would make searching, viewing and selection of a product easier. The search engine provides an easy and convenient way to search for products where a user can Search for a product interactively and the search engine would refine the products available based on the user’s input. The user can then view the complete specification of each product. They can also view the product reviews and also write their own reviews. Use of Ajax components would make the application interactive and prevents annoying post backs. Its drag and drop feature would make it easy to use.

3.1 Limitations

This application does not have a built in check out process. An external checkout package has to be integrated in to this application. Also users cannot save the shopping carts so that they can access later i.e. they cannot create wish lists which they can access later. This application does not have features by which user can set price ranges for products and receive alerts once the price reaches the particular range.

4. References

- Wikipedia for various diagrams
  http://www.wikipedia.org/
- Cool text for Images and buttons
  http://cooltext.com/
- K-State Research Exchange for samples in report writing
  http://krex.k-state.edu/dspace/handle/2097/959
- Smart Draw for drawing all the Diagrams used in this report.
  http://www.smartdraw.com/
- Sample Ecommerce Application
  http://www.NewEgg.com