

E-commerce Web Application Project – Documentation

Project Objectives

- Provide a **secure and scalable platform** for online shopping.
- Allow **sellers** to manage their products and sales easily.
- Give **customers** a smooth shopping experience (browse, filter, checkout, order tracking).
- Provide an **admin panel** to manage users, products, and sales analytics.
- Ensure the system is Fully **responsive design** for desktop, tablet, and mobile.

Features

1. Authentication System

- **User Registration:** First Name, Last Name, Email, Password & Confirm Password, Mobile Phone, Profile Picture (optional).
- **Account Activation:** Email confirmation link (valid for 24 hours).
- **Login:** Email and password authentication (after activation).
- **Password Reset:** Email reset link for forgotten passwords.
- **User Profile:**
 - View and edit personal information (except email).
 - Add address, birthdate, city, country.
 - Manage orders and wishlist.

2. Product System

- **Sellers:** Create, update, and delete products.
- **Product Attributes:** Title, Description, Price, Stock Quantity, Category, Images, Tags, Brand, Optional Discount.
- **Browsing:** Users can browse, search, and filter products by category, brand, or tag.
- **Product Detail Page:** Includes images (slider), description, price, rating, reviews, and related products.

3. Cart & Order System

- **Shopping Cart:**
 - Add, update, and remove products.
 - Persistent cart for both logged-in and guest users.
- **Checkout:**
 - Shipping address form.
 - Payment method (simulated).
 - Order confirmation and summary.
- **Order History:** Customers can view previous orders.
- **Sellers Dashboard:** Sellers can track their sales.
- **Order Status:**
 - Flow: Pending → Processing → Shipped → Delivered.
 - Status updated by seller or admin.

4. Homepage

- Slider with **featured or top-rated products**.
- Sections for **featured categories, latest products, and best sellers**.
- Search bar to find products by **name, tag, or brand**.

5. Admin Panel (Basic CMS)

- Manage users, products, categories, and tags.
- Approve or reject products submitted by sellers.
- Feature specific products.
- View orders and basic sales analytics.

Bonus Features (Future Enhancements)

- Add to **Wishlist**.
- Advanced product reviews (ratings, comments).
- Multi-language support (Arabic & English).

References / Inspiration

- [Amazon](#)
- [Jumia Egypt](#)
- [Noon](#)
- [Souq](#)

Development Notes

- Focus on **essential features first** before implementing bonus features.
- Follow **clean code principles** and maintainable architecture.
- Use **React.js** for frontend and **Django Framework** for backend.
- Authentication handled via **JWT**.

Project Delivery Instructions

- Students must upload the complete project source code to **GitHub**.
- The project must also be **deployed** (e.g., using **Heroku, Render, Vercel, or Netlify**) so it can be accessed online.
- Finally, students must **attach the GitHub repository link and the live deployed link** in the project ticket inside the **CRM system**.