

FRONTEND REQUIREMENTS
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ROLL NO : 00149806
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This document describes the user journey flow for an eCommerce marketplace, focusing on key steps and their technical implementation. It is tailored for building a robust and user-friendly platform.

Flowchart Overview

Below is the complete user journey flow for an eCommerce marketplace:

Home Page:

User lands on the homepage.
Displays featured categories, popular products, and a search bar.

Product Browsing:

User selects a category or uses the search bar

Product Details:

User clicks on a product to view its details.
Page includes product description, price, availability, and user reviews.

Add to Cart:

User adds the product to the cart.
Cart updates dynamically with quantity and price.

Checkout:

User proceeds to the checkout page.
Provides shipping address and selects a delivery option.

Payment:

User enters payment details.
Secure payment gateway processes the transaction.

Order Confirmation:

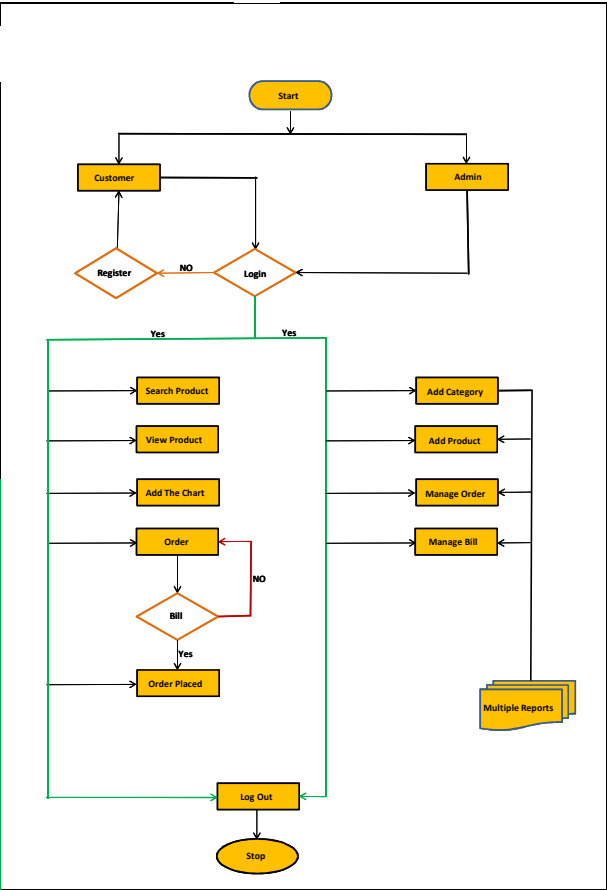
Order details are displayed and sent via email.
Order status is updated in the backend.

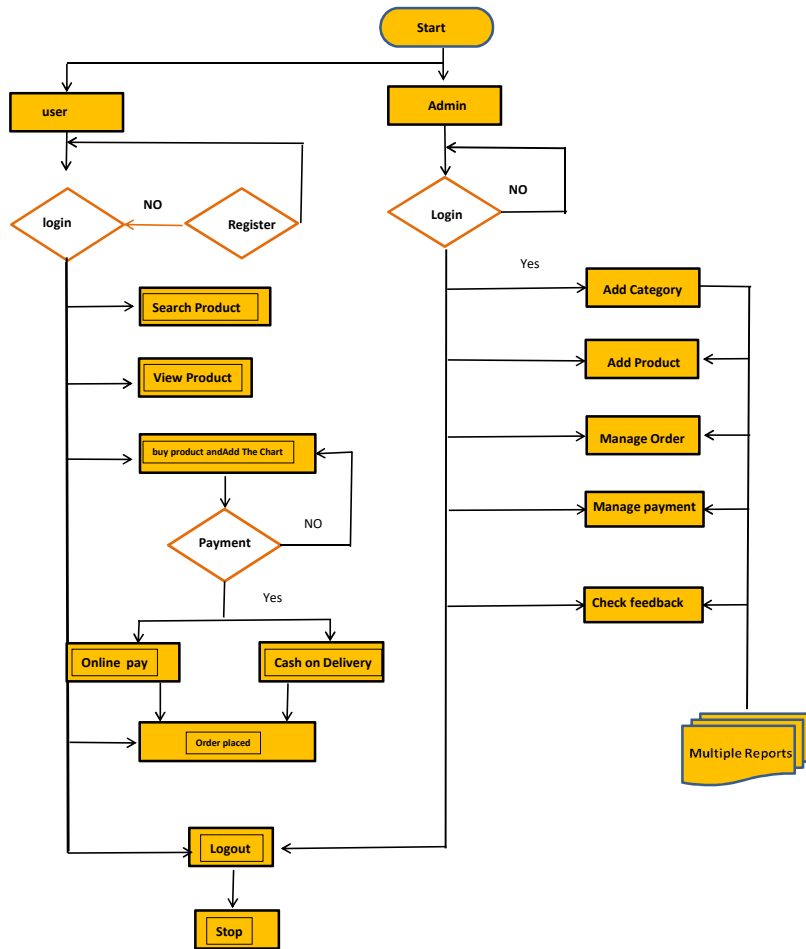
Shipment Tracking:

User visits the "Order History" section.
Real-time shipment tracking is enabled via API integration.

Delivery:

Product is delivered to the user's address





Frontend Requirements:

Cher receives a notification and can leave a review

User friendly mterface for browsing products

Responsive design for moble and desktop users

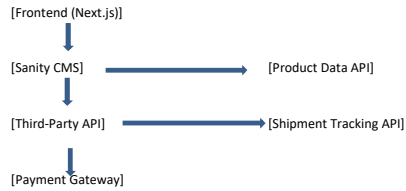
Essential pages Home, Product Listing, Product Details, Cart Checkout, and Order Confirmation

Design System Architecture

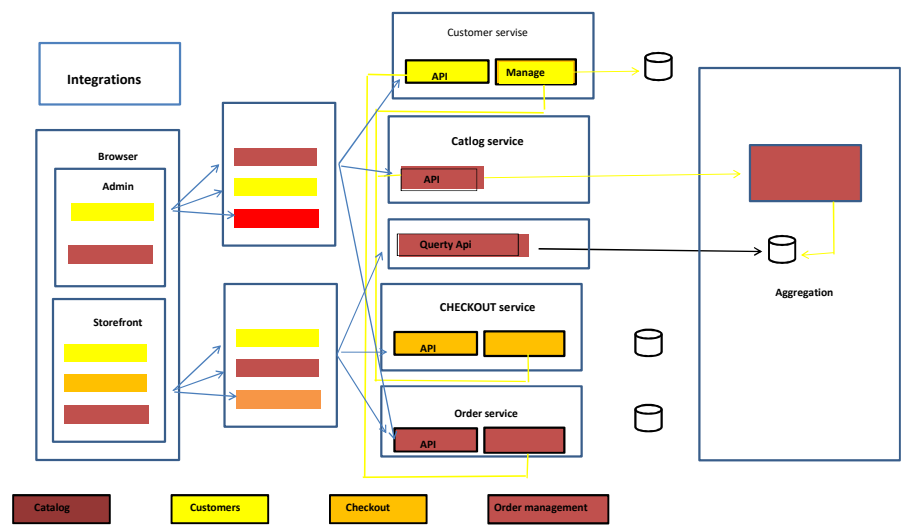
Create a high-level diagram showing how your system components itaract. Use too's the pen and paper software like Lucidchart, Figma or Excaldraw For example, a more detalend architecture might include workflows such as

System Architecture Overview

Diagram:



System Architecture



Components and Roles:

Frontend (Next.js):

1. Displays the user interface for browsing products, managing the cart, and placing orders.
2. Handles user interactions and communicates with backend services via APIs.

Sanity CMS:

1. Acts as the primary backend to manage product data, customer details, and order records.
2. Provides APIs for the frontend to fetch and update data.

Product Data API:

Provides endpoints to fetch product listings, details, and inventory status.

Third-Party APIs

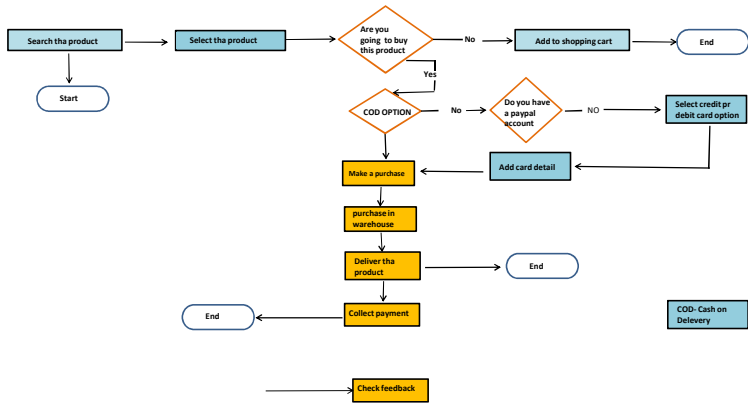
Provides endpoints to fetch product listings, details, and inventory status.

Third-Party APIs:

Integrates services like shipment tracking and payment processing.

Payment Gateway:

Processes user payments securely and provides transaction confirmation



Also make this EDR diagram in your project.

This diagram will define the relationships between entities in your database.

Example Entities:

1. Food Items:

Fields: id, name, price, description, image, categoryId

2. Categories:

Fields id, name.

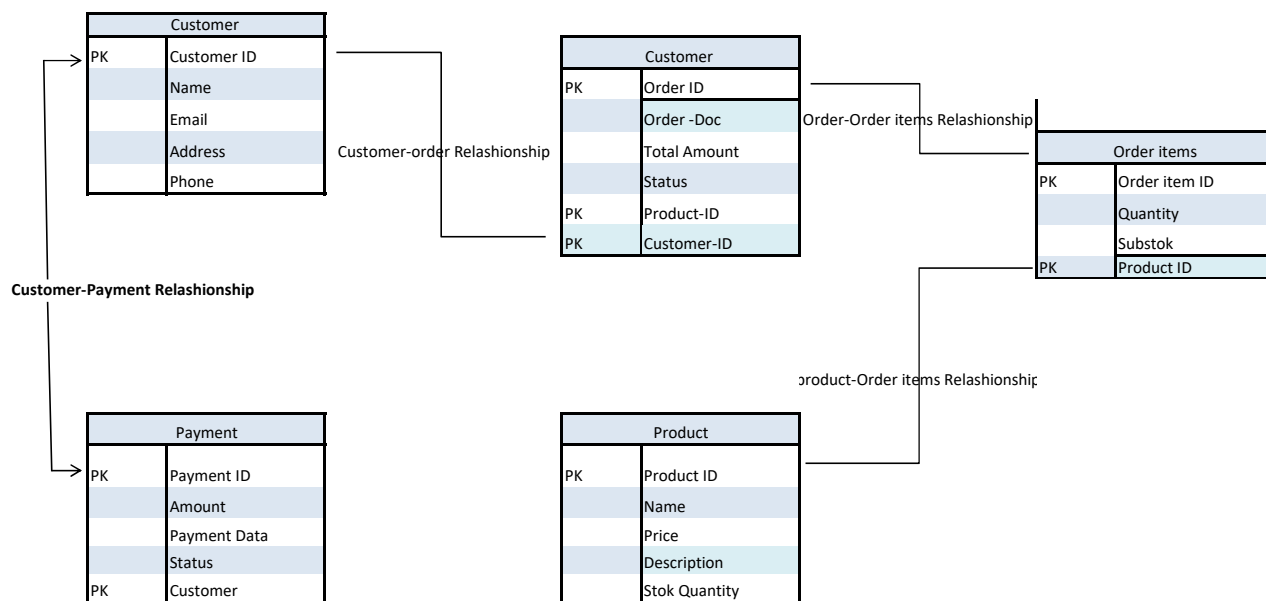
3. Users:

Fields: id, name, email, password

4. Orders:

Fields: id, userId

order Date, status



ENDPOINT	Method	Description	Parameters	Response Example
/api/furniture	GET	Fetch all food items	None	{id: 1, name: "Syltherine"}
/api/furnitures/id	GET	Fetch a single furniture item	id (Path)	{ id: 1, name: "Syltherine"}
/api/furnitures	POST	Add a new furniture item	name, price, category (Body)	{success: true, id: 5 }
/api/furnitures/:id	PUT	Update a furniture item	id (Path), name, price (Body)	{success: true }
/api/furnitures/id	DELETE	Delete a furniture item	id (Path)	{success: true}
/api/categories	GET	Fetch all furniture categories	None	{ categories: ["Jane Smith"]}