Name: Manyu kumar
Red: 2141011082

E-Commerce platform Using Micro-services and Event-Driven Architecture.

Overview: ~~An~~ An e-commerce platform called "ShopIter" that aims to provide a seamless shopping experience. The platform is built using Microservies Architecture (MSA) and Event-Driven Architecture (EDA) to ensure scalability, flexibility and responsiveness to user actions.

Microservices Architecture: Manages user accounts, authentication and profiles.

Product Service: Handles product listings, inventory management and product details

Order Service: Manages order processing

payment handling and order history.

Notification Service: Sends notifications to users about status, promotions and updates.

Review Service: Manages product reviews and ratings.

Event-Driven Architecture: Each service communicates through events, allowing for asynchronous processing.

Applying SOLID principles:
- Single Responsibility Principle
- Open/closed principle (OCP)
- Liskov Substitution Principle (LSP)
- Interface Segregation Principle (ISP)
- Dependency Inversion Principle (DIP).

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DRY: Don't Repeat Yourself
- Centralized logging service to avoid repetitive logging code in each microservice.
- Shared libraries for common

functionalities to prevent code duplication.

- Use of even schemas to standardize event formats across services, reduction redundancy.

KISS: (Keep it simple, stupid)

- Each microservice is designed to be simple and focused, avoiding unnecessary complexity.
- Event-driven communication simplifies interactions between services, reducing the need for complex API calls.
- User interfaces are designed with minimal steps for the user, ensuring a straightforward shopping experience.