**E-COMMERCE APPLICATION ON IBM CLOUD FOUNDRY**

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**PHASE 5 SUBMISSION DOCUMENT**

**PHASE 5: FINAL SUBMISSION**

**Project Objectives:**

The project's primary objectives for the e-commerce application on IBM Cloud Foundry may include:

* Create a user-friendly and secure e-commerce platform.
* Enable users to browse, search, and purchase products online.
* Provide a seamless checkout and payment process.

Implement inventory management and order tracking features.

* Optimize performance, scalability, and reliability.

**Design Thinking Process:**

The design thinking process involves the following stages:

**Empathize:**

* Understand user needs and pain points related to online shopping.

**Define:**

* Define clear problem statements and project goals.

**Ideate:**

* Brainstorm ideas for the application's features and design.

**Prototype:**

* Create wireframes or mockups to visualize the user interface.

**Test:**

* Gather feedback from potential users and refine the design.

**Development Phases:**

The development phases may include:

**Requirements Gathering:**

* Collect detailed requirements from stakeholders.

**Architecture Design:**

* Plan the application's architecture and database structure.

**Front-end Development:**

* Create the user interface using web technologies (HTML, CSS, JavaScript).

**Back-end Development:**

* Implement server-side logic and APIs using frameworks like Node.js or Java.

**Database Integration:**

* Set up and configure a database for product and user data.

**Security Implementation:**

* Implement security measures like authentication and encryption.

**Payment Integration:**

* Integrate payment gateways for transactions.

**Testing and Quality Assurance:**

* Perform thorough testing, including unit, integration, and user acceptance testing.

**Deployment:**

* Deploy the application on IBM Cloud Foundry.

**Monitoring and Optimization:**

* Monitor the application's performance and make necessary optimizations.

**Platform Layout and Technical Implementation:**

* The platform layout should include components like:
* Homepage with product listings
* Product details page
* Shopping cart
* User account management
* Checkout and payment process
* Order tracking
* Search functionality
* Technical implementation details will depend on the technologies and tools used.
* You might use a Node.js or Java backend, a database like PostgreSQL or MongoDB, and front-end frameworks like React or Angular.
* Implement secure authentication and authorization mechanisms.
* Ensure scalability by using IBM Cloud Foundry's resources efficiently.

To include screenshots or images, capture relevant screens from your application and insert them into your documentation. You can use tools like Snipping Tool. (Windows) or the built-in screenshot feature on Mac to capture screens.