**Planning Technical Foundation**

**of E-Commerce business**

**Submission Title: “Marketplace Technical Foundation [Alishba E-commerce ]”**

**#Step 1:**

Define Technical Requirements :

**Frontend website:**

.user friendly interface

. make sure it is responsive on mobile and other desktop .

**Sanity CMS as backend:**

.Use sanity CMS to manage productdata, customerdetail, orderdetail & record.

.Designing schemas in sanity

**Third party APIs:**

.Use APIs for shipment tracking, payment method.

**2. Design System Architecture :**

[Frontend] (Next.js)

[Product Data API]

[Sanity CMS]

[Shipment Tracking API]

[Third-Party API]

[Payment Gateway]

Key Workflows to Include:

**1.User Registration:**

The user login the website and go the landing page of the website.

**2.Product Browsing:**

User browse through various product as they click on any product to visit its detail page which is powered by sanity as the backend CMS for updating product details.

**3.Adding to cart:**

user add the desired products in the cart.

1. **Payment method:**

User proceed to the payment page where they can choose payment method including cash on delivery, credit cards and online platforms.

**5. Shipment:**

After the payment, the shipping process is handled by ShipEngine, which track the delivery from the warehouse to the customer’s address.

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U Browsing the Productsdetail

Adding in carto cart

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ShipntsShipment process

checkout

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**3. Plan API Requirements**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **End Point** | **Method** | **Description** | **Parameter** | **Response** |
| / api/product | GET | Fetch all product | - |  |
| / api/product/id | GET | Fetch single Product | Path id | {id,name} |
| / api/Cart | POST | Add new item | Name,price,  category | {success,true,id:7} |
| / api/Product/id | PUT | Update an item | Id,name, price | {success,true,id:7} |

1. Sanity Schema for website

export default {

name: 'product',

title: 'Product',

type: 'document',

fields: [

{

name: 'name',

title: 'Name',

type: 'string',

},

{

name: 'description',

title: 'Description',

type: 'text',

},

{

name: 'category',

title: 'Category',

type: 'reference',

},

{

name: 'price',

title: 'Price',

type: 'number', },

{

name: 'stock',

title: 'Stock',

type: 'number',

},

{

name: 'image',

title: 'Image',

type: 'image',

},

],

};

export default {

name: 'category',

title: 'Category',

type: 'document',

fields: [

{

name: 'name',

title: 'Name',

type: 'string',

},

## User Schema

export default {

name: 'user',

title: 'User',

type: 'document',

fields: [

{

name: 'username',

title: 'Username',

type: 'string',

},

{

name: 'email',

title: 'Email',

type: 'string',

},

{

name: 'password',

title: 'Password',

type: 'string',

},

],

};

## Order Schema

export default {

name: 'order',

title: 'Order',

type: 'document',

fields: [

{

name: 'user',

title: 'User',

type: 'reference',

},

{

name: 'totalAmount',

title: 'Total Amount',

type: 'number',

},

{

name: 'paymentMethod',

title: 'Payment Method',

type: 'string',

options: {

list: [

{ title: 'Credit Card', value: 'credit\_card' },

{ title: 'PayPal', value: 'paypal' },

{ title: 'Cash on Delivery', value: 'cash\_on\_delivery' },

],

},

},

{

name: 'shippingAddress',

title: 'Shipping Address',

type: 'text',

},

{

name: 'orderStatus',

title: 'Order Status',

type: 'string',

options: {

list: [

{ title: 'Pending', value: 'pending' },

{ title: 'Shipped', value: 'shipped' },

{ title: 'Delivered', value: 'delivered' },

{ title: 'Cancelled', value: 'cancelled' },

],

},

},

],

};

## 

## 

## 

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## Order Item Schema

export default {

name: 'orderItem',

title: 'Order Item',

type: 'document',

fields: [

{

name: 'product',

title: 'Product',

type: 'reference',

},

{

name: 'quantity',

title: 'Quantity',

type: 'number',

},

{

name: 'price',

title: 'Price',

type: 'number',

},

{

name: 'total',

title: 'Total',

type: 'number',

},

],

};