

User Stories to Use Case Activity

1. Major User Stories

- **Customer user stories:**

As a customer, I want to browse products by category, so I can find what I'm looking for quickly.

As a customer, I want to securely pay for my purchase, so I feel confident that my payment information is protected.

Seller Use-Cases:

As a seller, I want to upload new products and track my sales, so I can manage my store efficiently.

- **Main Use Cases:**

- **Browse Products by Category**
- **Secure Payment for Purchases**
- **Upload and Track Products for Sale**
- **Manage Orders (for sellers)**

2. Chosen Use Case Template (System Analysis)

Use Case 1: Browse Products by Category

- **Actors:** Customers, Preconditions
- **Description:** User signs up with username and password, which gets stored in the database. When the user tries to log in, it checks the credentials.
- **Preconditions:** The customer can only browse the products if they are logged into the site. Categories and products are already sub-categorized in the system.
- **Postconditions:** The products which have the selected category are shown on the system. The selected products are then taken to the cart if the customer wishes to buy the products..

Steps:

1. The customer get access to the system and log in.
2. After that, the system confirms the identity of the customer.
3. The end user moves to the product browsing page of the website.
4. We make the customer choose a category from a predetermined list.
5. Depending on the selected category, the system retrieves and display products of interest.
6. The customer can, therefore, use the sorting or filtering to narrow down the results based on price/ratings etc.

Use Case 2: Secure Payment for Purchases

- **Actors:** Customer, Payment Gateway, Business Owner
- **Description:** Ensure that Customers can safely complete transactions, which builds trust in the marketplace.
- **Preconditions:** To access the checkout options, the customer has to have products in the shopping cart.

Login- The customer is logged in the page and the account information is stored.

- **Postconditions:** The payment is accepted and administered in the system which modifies the order status. A confirmation message is also provided to the customer with the details of the current order.
- **Steps:**

1. The customer is also able to view their shopping cart.
2. When the customer is finished, s/he hits the button "Proceed to Checkout."
3. The system then directs the customer to a payment page fully linked with Stripe/PayPal.
4. The customer submits an amount for consideration relating to services or products to be provided.
5. The payment gateway handle and process the transaction and send an acknowledgement to the backend functionality.
6. The system batch process the order and update the status to "Paid" then issues a receipt to the customers..

Use Case 3: Upload and Track Products for Sale

- **Actors:** Seller
- **Description:** Sellers can upload new products together with details of the sales and progress of their sales.
- **Preconditions:** The seller according to model must be authenticated .
- **Postconditions:** The Product is launched into the market and the seller can listen and quantify the level of sales within a website..

Steps:

1. Seller logs into the system.
2. Seller navigates to the "Add New Product" page.
3. System displays the product upload form (name, description, category, etc.).
4. Seller fills in product details and uploads images.
5. Seller submits the product form.
6. System validates the data and adds the product to the database.
7. System confirms product upload, and it appears in the seller's dashboard for tracking.
8. Alternate Flows:
9. Seller not authenticated: Seller is redirected to the login page and must log in to proceed.
10. Invalid data: The system prompts the seller to correct errors (e.g., missing fields).
11. Image upload fails: The system notifies the seller to upload a valid image format/size.
12. Server error: The system alerts the seller that the upload failed and to try again later.

Use Case 4: Manage Orders(for sellers)

- **Actors:** Seller
- **Description:** The Manage Orders use case allows sellers to view order details and update the status of customer orders, such as marking them as "Shipped." This helps sellers efficiently track sales and keep customers informed about their order status, ensuring smooth order management..

Preconditions: The seller is authenticated and has products listed on the marketplace.
Orders have been placed by customers.

- **Postconditions:** The seller can view the details of the order, mark the order as shipped, and update the order status in the system..
- **Steps:**
 1. Seller logs into the system.
 2. Seller navigates to the "Order Management" page in the dashboard.
 3. System displays a list of pending and completed orders with details like product, customer information, and order date.
 4. Seller views the details of a selected order (e.g., products purchased, shipping address).
 5. Seller updates the order status to "Shipped" or another relevant status.
 6. System updates the order status and notifies the customer via email.
 7. Seller continues to monitor the status of orders as they progress.
- 8. Alternate Flows:
- 9. Order details not available: If there's an issue retrieving the order information, the system shows an error message and asks the seller to try again later.
- 10. Invalid order status change: If the seller tries to change the status to an invalid state (e.g., directly to "Completed" without shipping), the system prompts the seller to follow the correct workflow.
- 11. Network/Server failure: The system notifies the seller that the update failed due to a network or server issue and asks them to retry

Updated Use Case:

