EXPERIMENT-02

2) Draw a coffe coffe day ordering system. A coffe coffee day shop vending machine dispenses coffee to customers. Customers order coffee by selecting a recipe from a set of recipes. Customers pay for the coffee using coins. Change is given back, if any, to the customers. The ‘service assistant’ loads ingredients (coffee powder, milk, sugar, water, chocolate) into the coffee machine. The ‘service assistant’ adds recipe by indicating the name of the coffee, the units of coffee powder, milk, sugar, water, chocolate to be added as well as the cost of the coffee. The service assistant can also edit and delete a recipe. Develop the use case diagram for the specification above.

Aim:

To design a Use Case Diagram for a Coffee Coffee Day Ordering System that models customer interactions with the coffee vending machine and service assistant operations.

Procedure:

Identify the Actors

- Customer: Orders coffee, makes payment, receives change.
- Service Assistant: Loads ingredients, manages recipes.
- Coffee Machine (System): Processes orders, dispenses coffee, returns change.

Define the Use Cases

- For Customer:
    - Select Coffee
    - Make Payment
    - Receive Change
    - Receive Coffee
- For Service Assistant:
    - Load Ingredients
    - Add Recipe
    - Edit Recipe
    - Delete Recipe

Establish Relationships

- Associations between actors and use cases.
- Include/Extend relationships where applicable.

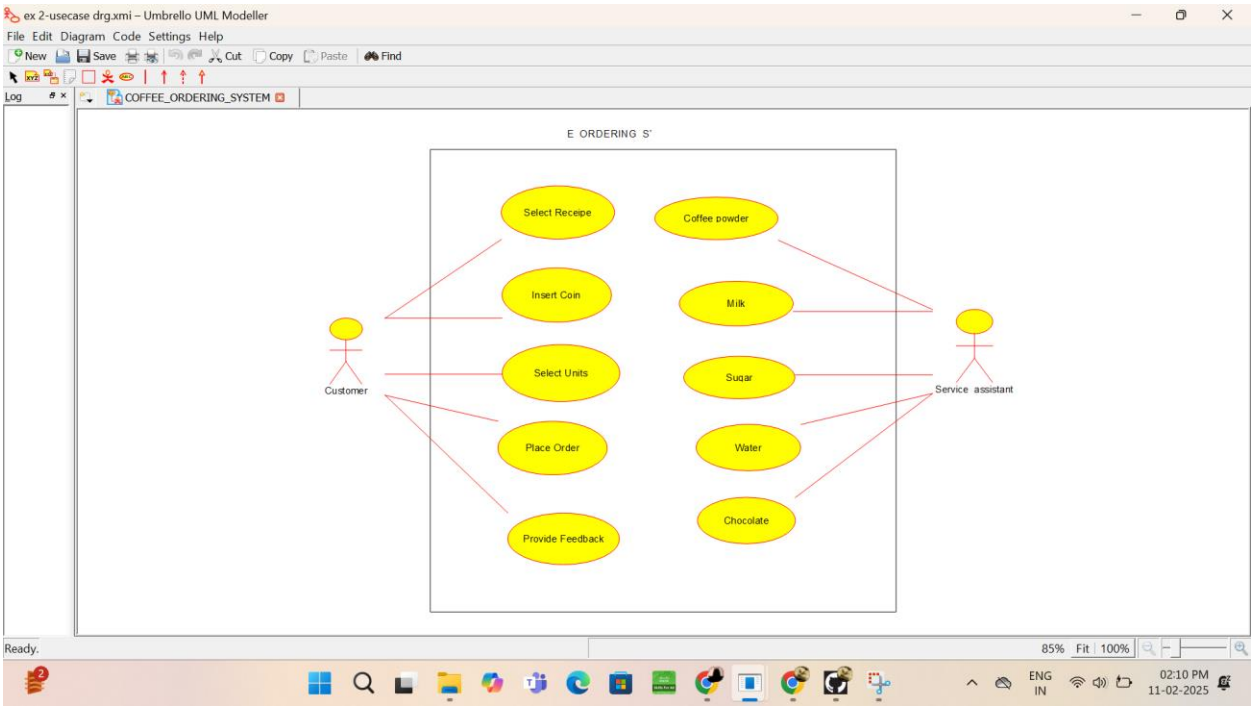
Draw the Use Case Diagram

- Represent actors as stick figures.
- Represent use cases as ovals.
- Connect actors to use cases with lines.

Verify the Diagram

- Ensure that all system functionalities and interactions are accurately depicted

Diagram:



Result:

A **Use Case Diagram** for the **Coffee Coffee Day Ordering System** was successfully designed, representing customer and service assistant interactions with the vending machine.