# FINAL DOCUMENTATION

## SAD project


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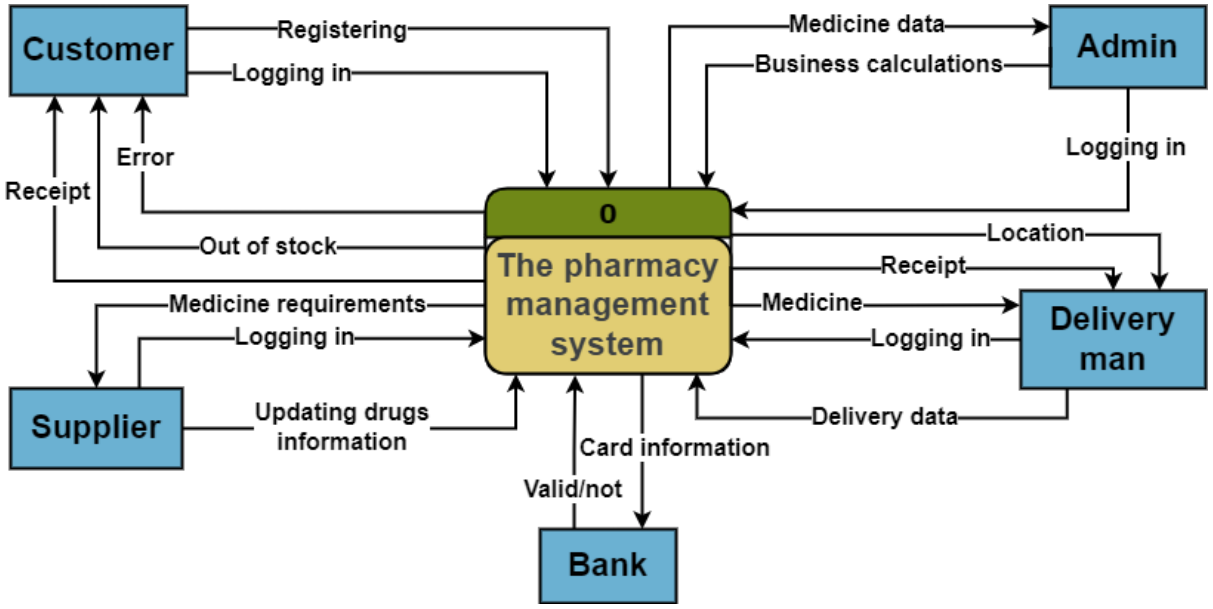
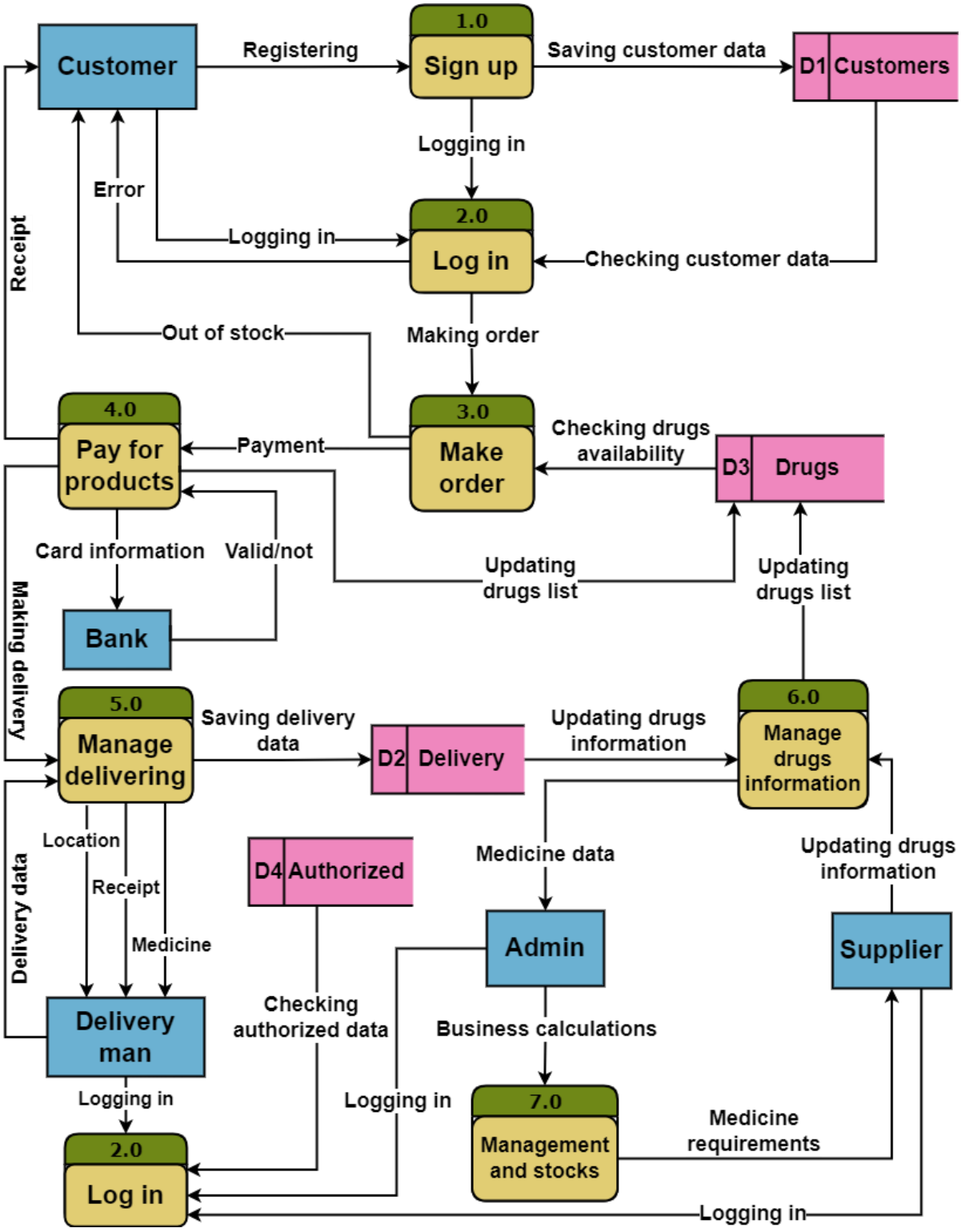
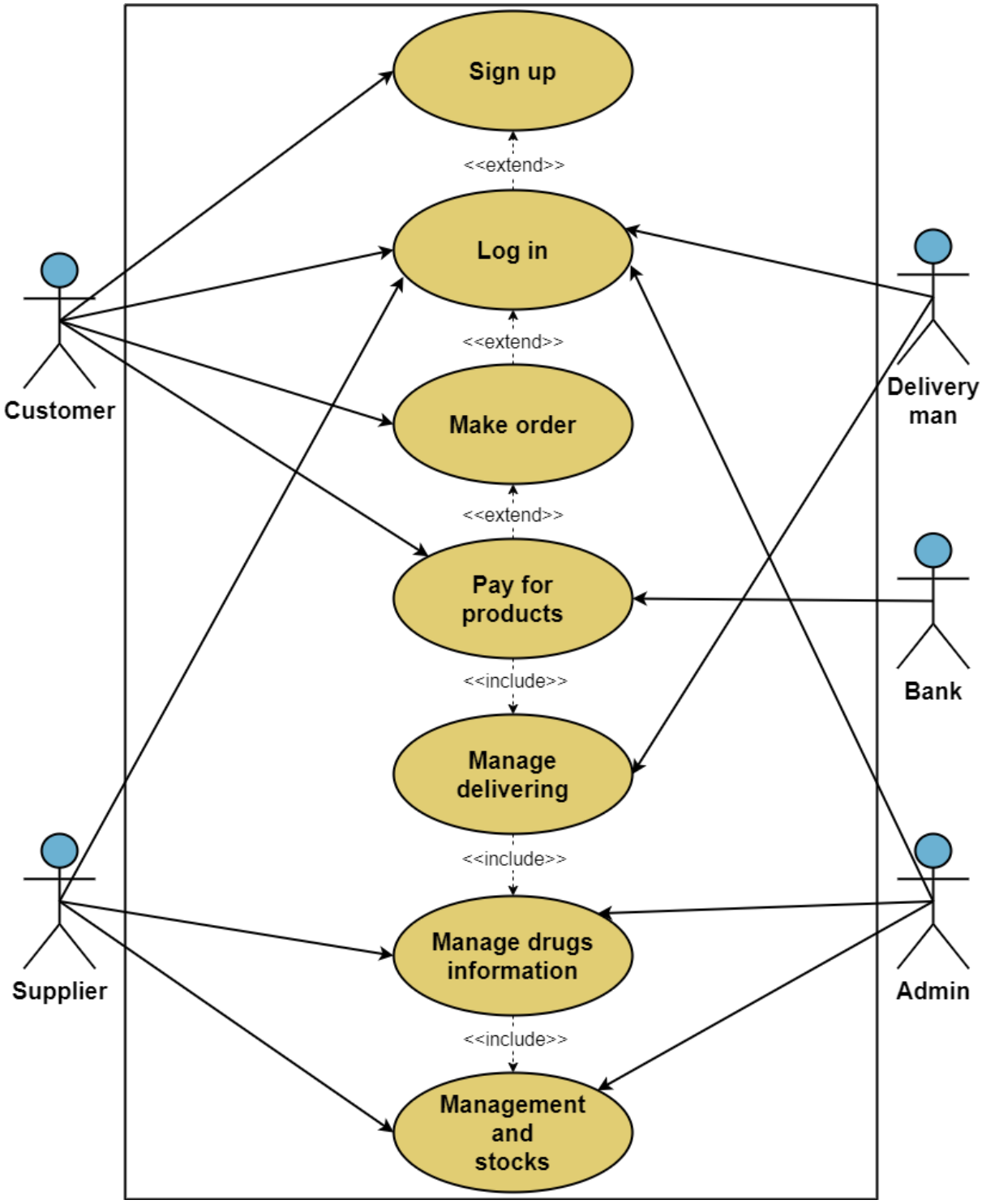
# 1. CONTEXT DIAGRAM



## 2. DFD LEVEL-0


Customer
Registering
1.0
Sign up
Saving customer data
D1 Customers
Logging in
Error
Logging in
2.0
Log in
Checking customer data
Receipt
Out of stock
Making order
4.0
Pay for products
Payment
3.0
Make order
Checking drugs availability
D3 Drugs
Card information
Valid/not
Updating drugs list
Updating drugs list
Bank
Making delivery
5.0
Manage delivering
Saving delivery data
D2 Delivery
Updating drugs information
6.0
Manage drugs information
Location
Receipt
Medicine
Delivery data
D4 Authorized
Medicine data
Updating drugs information
Admin
Supplier
Delivery man
Checking authorized data
Business calculations
Logging in
Logging in
7.0
Management and stocks
Medicine requirements
2.0
Log in
Logging in

# 3. USE-CASE DIAGRAM & ANALYSIS



| | | |
|---|---|---|
| ***Use Case Name:*** | ***Sign-Up*** | |
| ***Actor(s):*** | ***Customer*** | |
| ***Description:*** | ***This use case describes the process of a customer registering a new account. The user wants to create a new account on the platform to gain access to the system.*** | |
| ***Typical Course of Events:*** | ***Actor Action*** | ***System Response*** |
| | **<u>Step1:</u> This use case is initiated when a customer wants to make a new registration to the system.**<br><br>**<u>Step 9:</u>** ***This use case concludes when the user receives a confirmation message indicating successful registration.*** | **<u>Step2:</u> The user fills out the required registration form fields, including:**<br>• **First name**<br>• **Last name**<br>• **Email address**<br>• **Password**<br><br>**<u>Step 3:</u> The user submits the registration form.**<br><br>**<u>Step 4:</u>** ***The system verifies the email address for uniqueness and validity.***<br><br>**<u>Step 5:</u>** ***If the email is unique and valid, the system creates a new user account.***<br><br>**<u>Step 6:</u>** ***The system sends a verification email to the provided email address.***<br><br>**<u>Step 7:</u>** ***The user receives the verification email and clicks on the verification link.***<br><br>**<u>Step 8:</u>** ***The system verifies the email address and activates the user account.*** |

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|---|---|
| ***Alternate Courses:*** | <u>Step2:</u> ***If the user attempts to register with an email address that is already associated with an existing account:***<br>• ***The system displays an error message prompting the user to choose a different email address.***<br><br><u>Step3:</u> ***If the email address provided by the user is invalid:***<br>• ***The system displays an error message prompting the user to enter a valid email address.***<br><br><u>Step4:</u> ***If the user does not receive the verification email within a reasonable timeframe:***<br>• ***The system provides an option for the user to resend the verification email.***<br>• ***The user can also check their spam or junk mail folder.***<br><br><u>Step5:</u> ***If the user clicks on the verification link and it has expired or is invalid:***<br>• ***The system prompts the user to request a new verification email.*** |
| ***Precondition:*** | ***-The user has access to the platform's registration interface.***<br>***-The user has a valid email address.*** |
| ***Post condition:*** | ***-The user has successfully created a new account and can now log in to the platform using the provided credentials.*** |
| ***Assumption:*** | ***-None at this time.*** |

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|---|---|---|
| ***Use Case Name:*** | ***Login*** | |
| ***Actor(s):*** | ***Customer, Admin, Supplier, Delivery man*** | |
| ***Description:*** | ***This use case describes the process of a customer or admin logging in by an existing account and it aims to make the admin or customer access the system.*** | |
| ***Typical Course of Events:*** | ***Actor Action*** | ***System Response*** |
| | ***<u>Step 1:</u> This use case is initiated when a customer or admin wants to make a login to the system.*** | ***<u>Step2</u>: The actor starts to log in with email and password***<br>***<u>Step 3:</u> The system verifies the email and password combination and checks if credentials are correct.***<br>***<u>Step 4:</u> If the credentials are correct, the system logs the actor in.***<br>***<u>Step 5:</u> The system redirects the actor to the appropriate dashboard (customer or admin panel) based on the actor's role.***<br>***<u>Step 6:</u> The actor starts using the system's features according to their privileges.*** |
| | ***<u>Step7:</u> This use case concludes when the user receives a confirmation message indicating successful registration.*** | |

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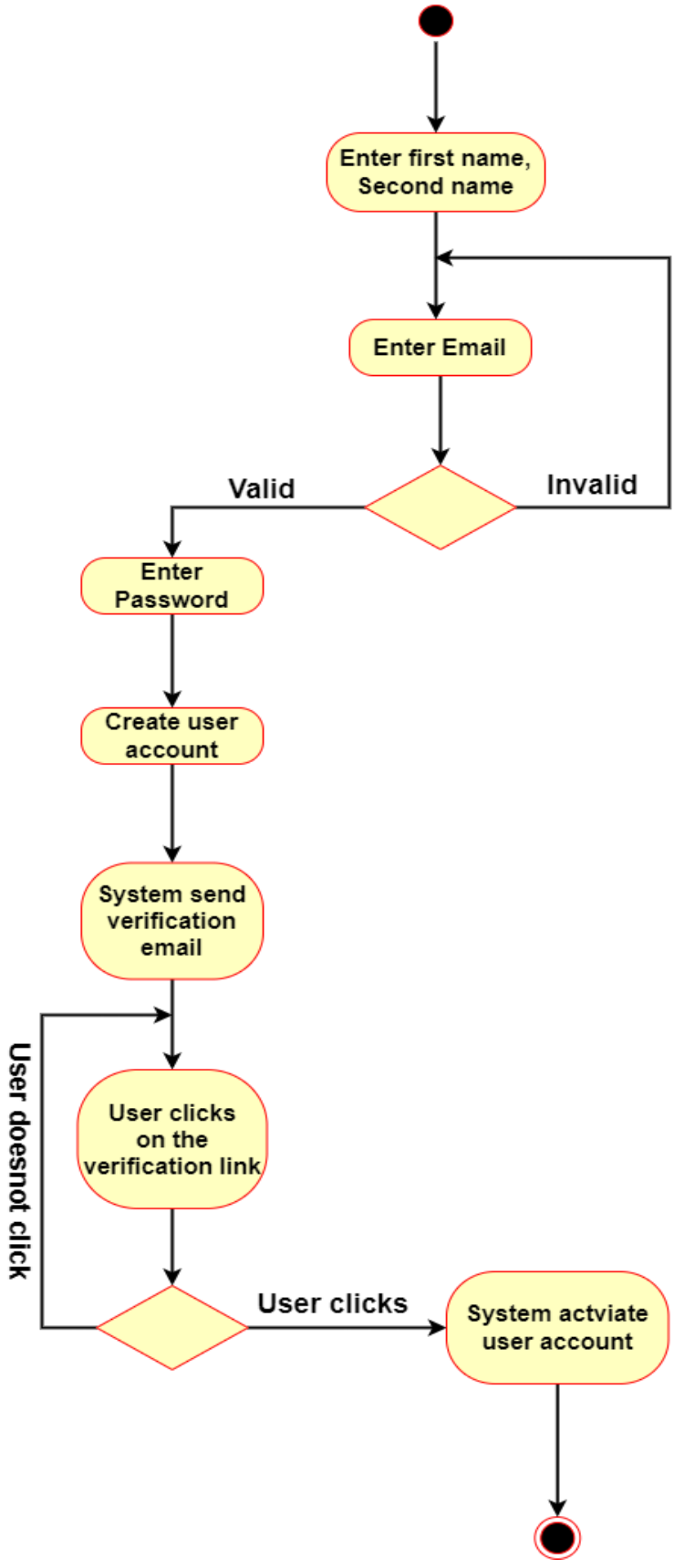
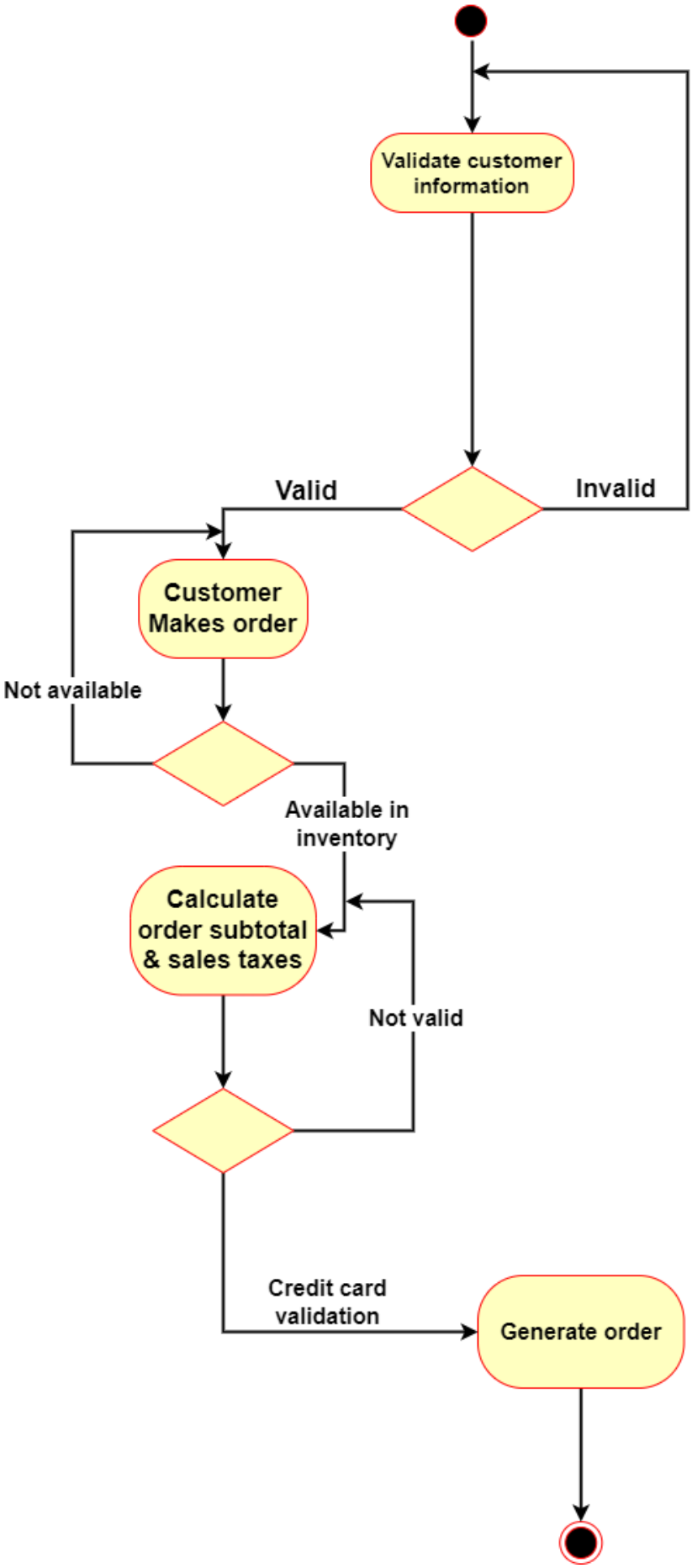
|---|---|
| ***Alternate Courses:*** | ***<u>Step2:</u> If the user enters an incorrect email address or password:***<br><br>• ***The system displays an error message indicating invalid credentials.***<br>• ***The user is prompted to re-enter the correct email address and password.***<br><br>***<u>Step3:</u> If the user's account is inactive or disabled (banned):***<br><br>• ***The system denies access and prompts the user to contact support for assistance.*** |
| ***Precondition:*** | ***-The user has an existing account on the platform.***<br><br>***-The user has access to the platform's login interface.***<br><br>***-The user knows their registered email address and password.*** |
| ***Post condition:*** | ***-The customer or admin successfully logs in and gains access to the platform's features and functionalities.*** |
| ***Assumption:*** | ***-None at this time.*** |

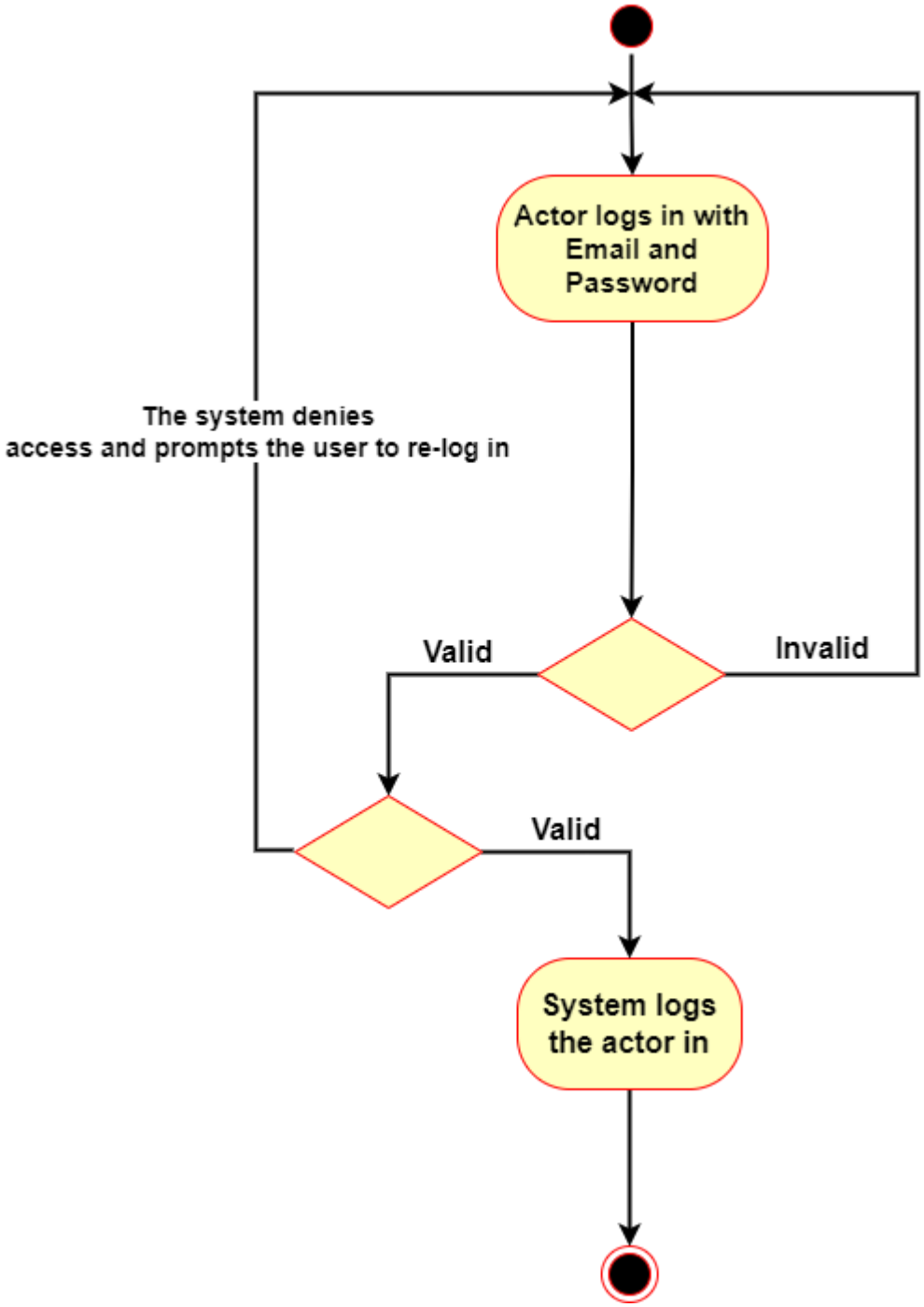
| | | |
|---|---|---|
| ***Use Case Name:*** | ***Make Order*** | |
| ***Actor(s):*** | ***Customer.*** | |
| ***Description:*** | ***This use case describes the process of a customer submitting a new order the customer will receive a notification that the order was accepted.*** | |
| ***Typical Course of Events:*** | ***Actor Action*** | ***System Response*** |
| | ***<u>Step1:</u> This use case is initiated when a customer submits an order to be processed.*** | ***<u>Step 2:</u> The customer information such as address & telephone number & Card information is validated against what is currently on file.*** |
| | | ***<u>Step 3:</u> For each product being ordered check the availability in inventory & record the order product information such as the quantity being ordered.*** |
| | | ***<u>Step 4:</u> Calculate order subtotal & Sales tax.*** |
| | | ***<u>Step 5:</u> The customer's credit card information is verified based on the amount due and accounts receivable transaction data is checked to make sure no payments are outstanding.*** |
| | | ***<u>Step 6</u>: Generate order (check the drug information in the warehouse).*** |
| | | ***<u>Step 7: G</u>enerate an order confirmation notice indicating the status of the order & send it to the customer.*** |
| | ***<u>Step 8:</u> This use case concludes when the customer receives the order confirmation notice.*** | |

| | |
|---|---|
| ***Alternate Courses:*** | ***<u>Step1:</u> If the customer has indicated an address or telephone number changes on the order, call use case revise data.***<br><br>***<u>Step2:</u> If the product number is not valid, send a notification to the customer requesting the customer to submit a valid product number.***<br><br>***<u>Step3:</u> If the product number is not available, record the ordered product information & mark the order as (back to reorder).*** |
| ***Precondition:*** | ***Orders can only be submitted by customers.*** |
| ***Post condition:*** | ***Customer order has been recorded.*** |
| ***Assumption:*** | ***None at this time.*** |

# 4. ACTIVITY DIAGRAM

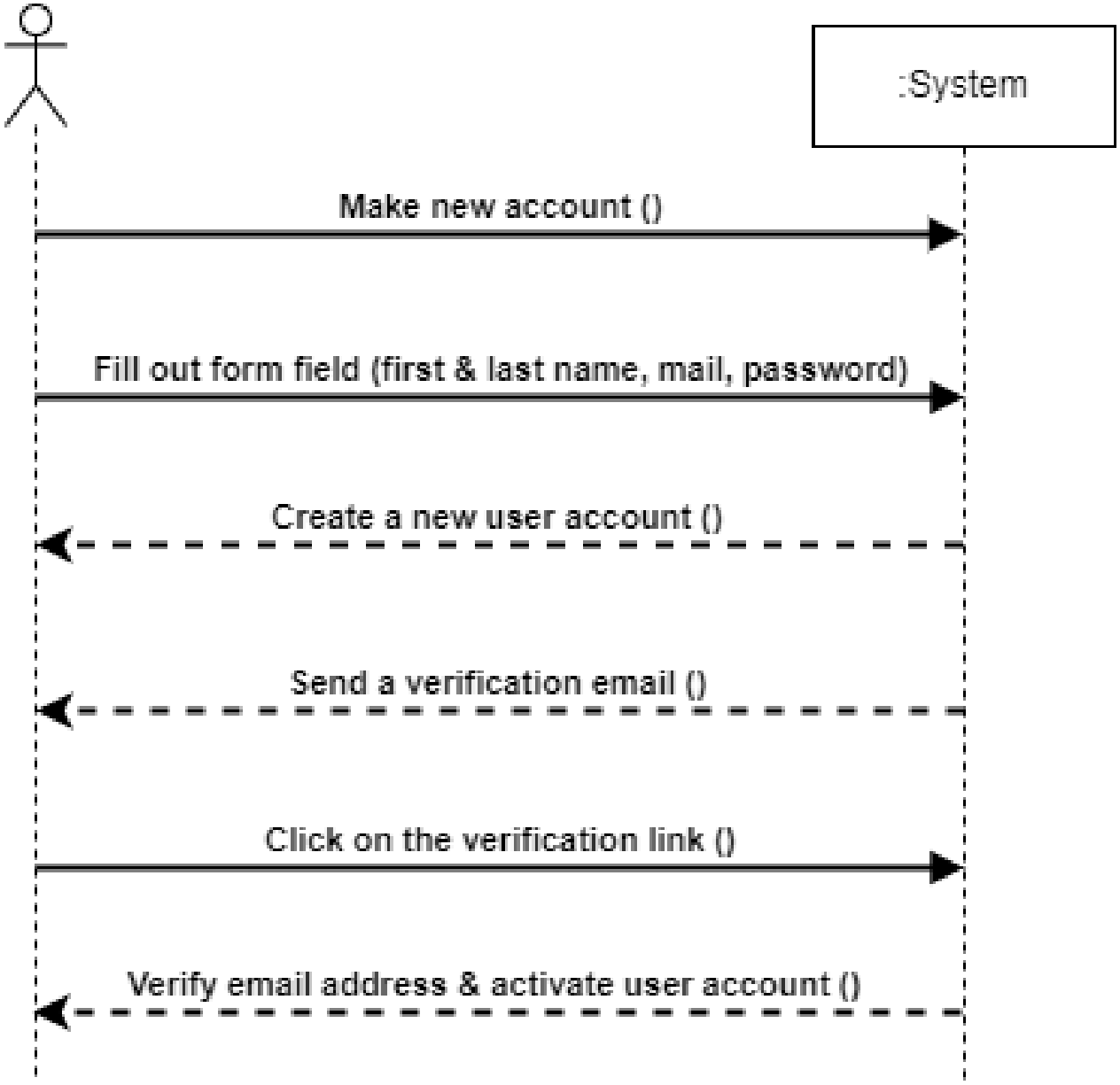



Validate customer information
Valid
Invalid
Customer Makes order
Not available
Available in inventory
Calculate order subtotal & sales taxes
Not valid
Credit card validation
Generate order

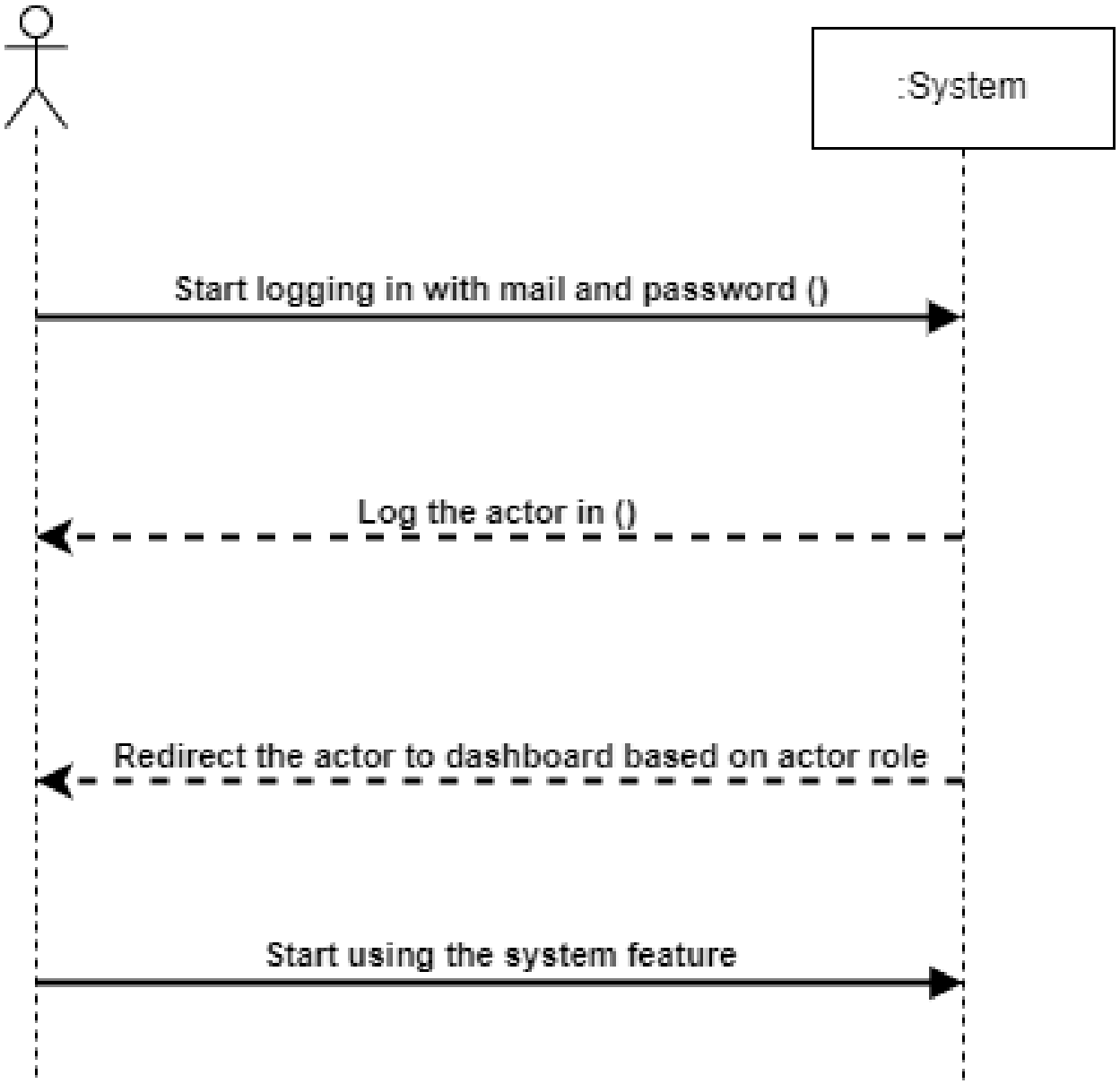

Actor logs in with Email and Password
The system denies access and prompts the user to re-log in
Valid
Invalid
Valid
System logs the actor in

## 5. SSD DIAGRAM

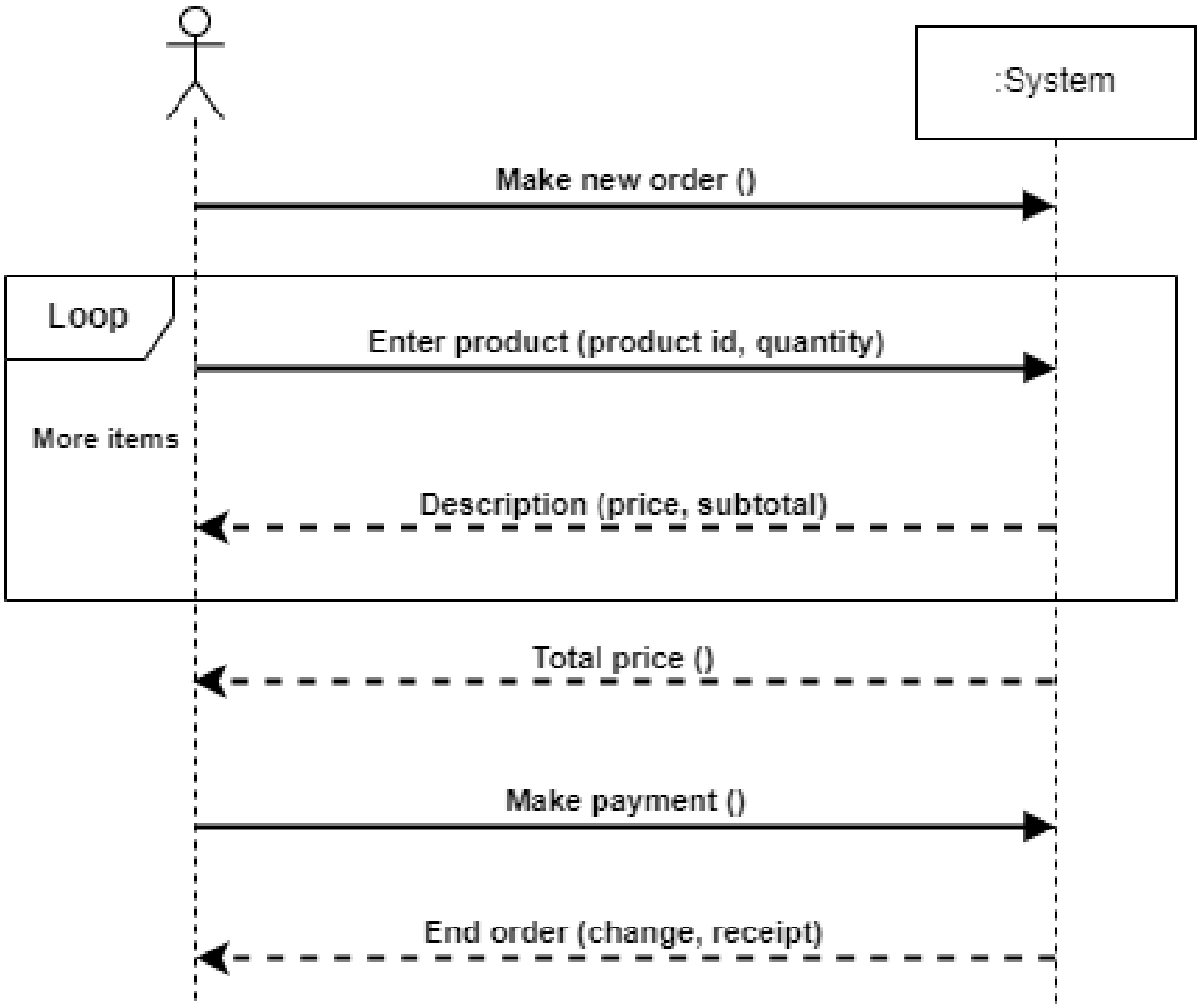
**SIGN-UP:**



***LOG-IN:***

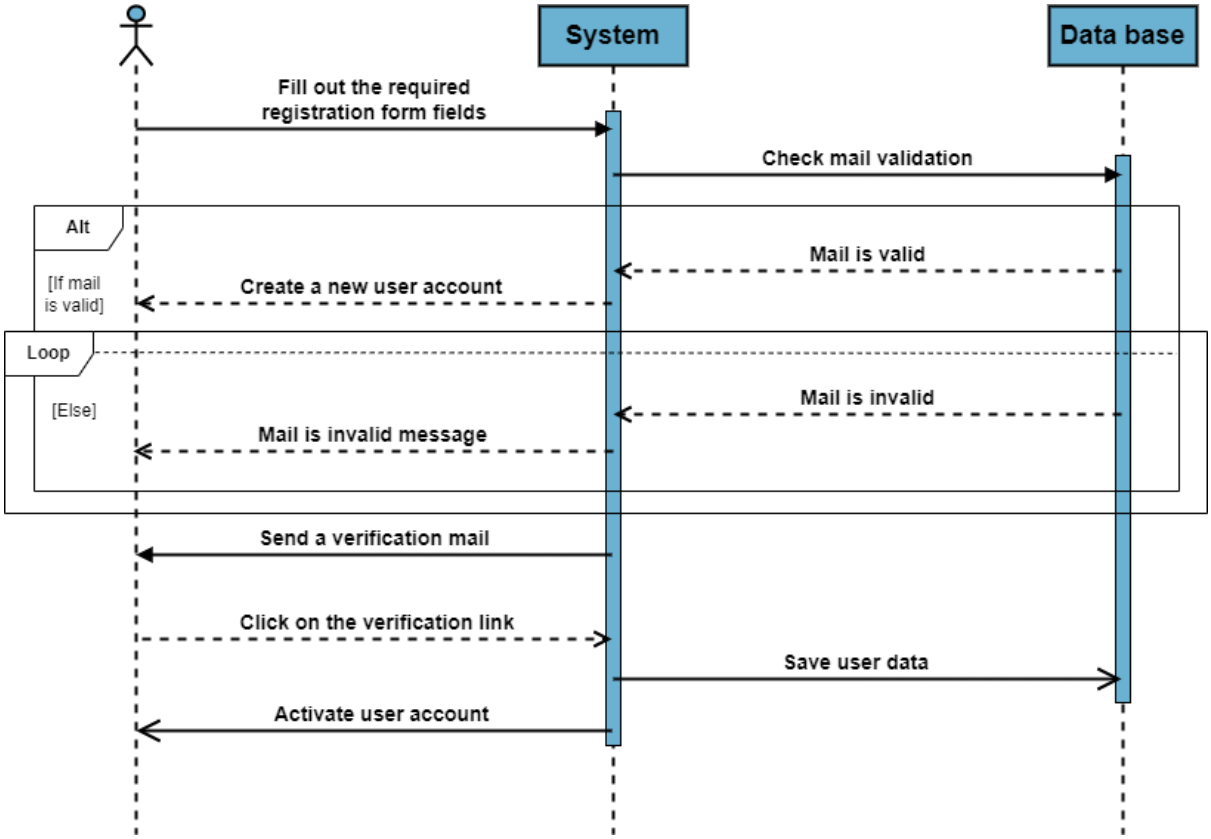

:System
Start logging in with mail and password ()
Log the actor in ()
Redirect the actor to dashboard based on actor role
Start using the system feature

## MAKE ORDER:

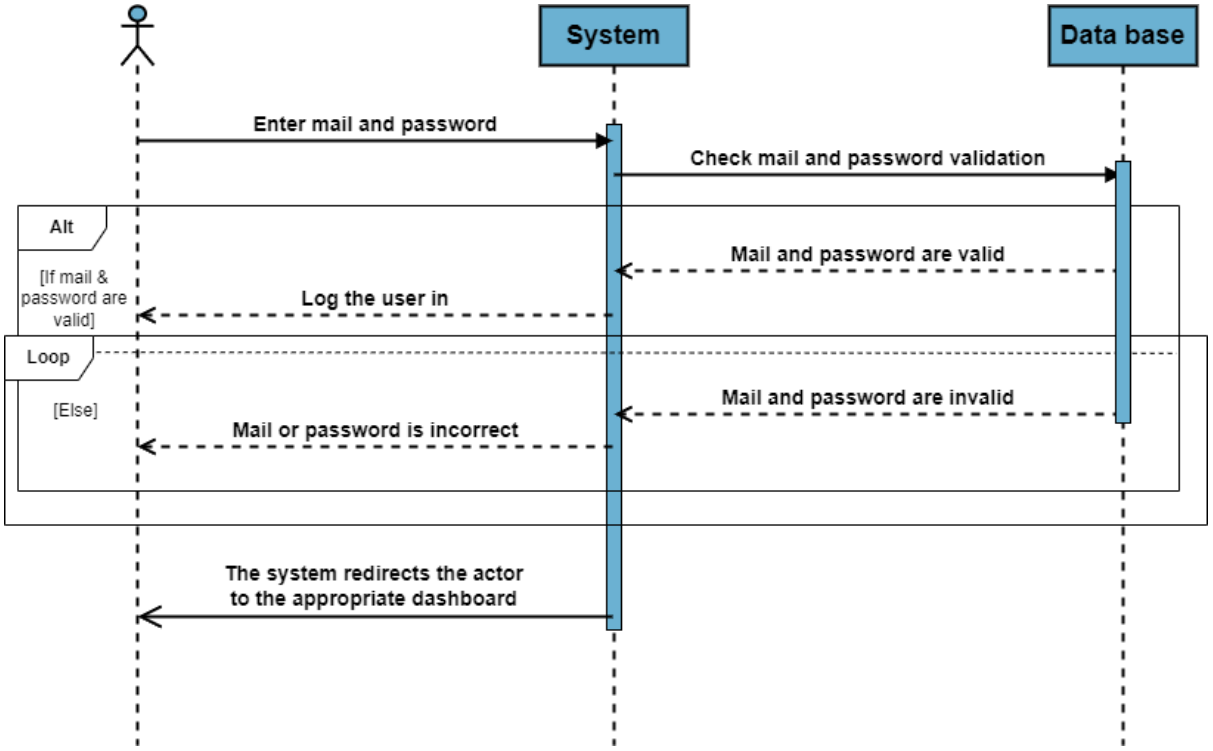

:System
Make new order ()
Loop
Enter product (product id, quantity)
More items
Description (price, subtotal)
Total price ()
Make payment ()
End order (change, receipt)

## 6. SD DIAGRAM

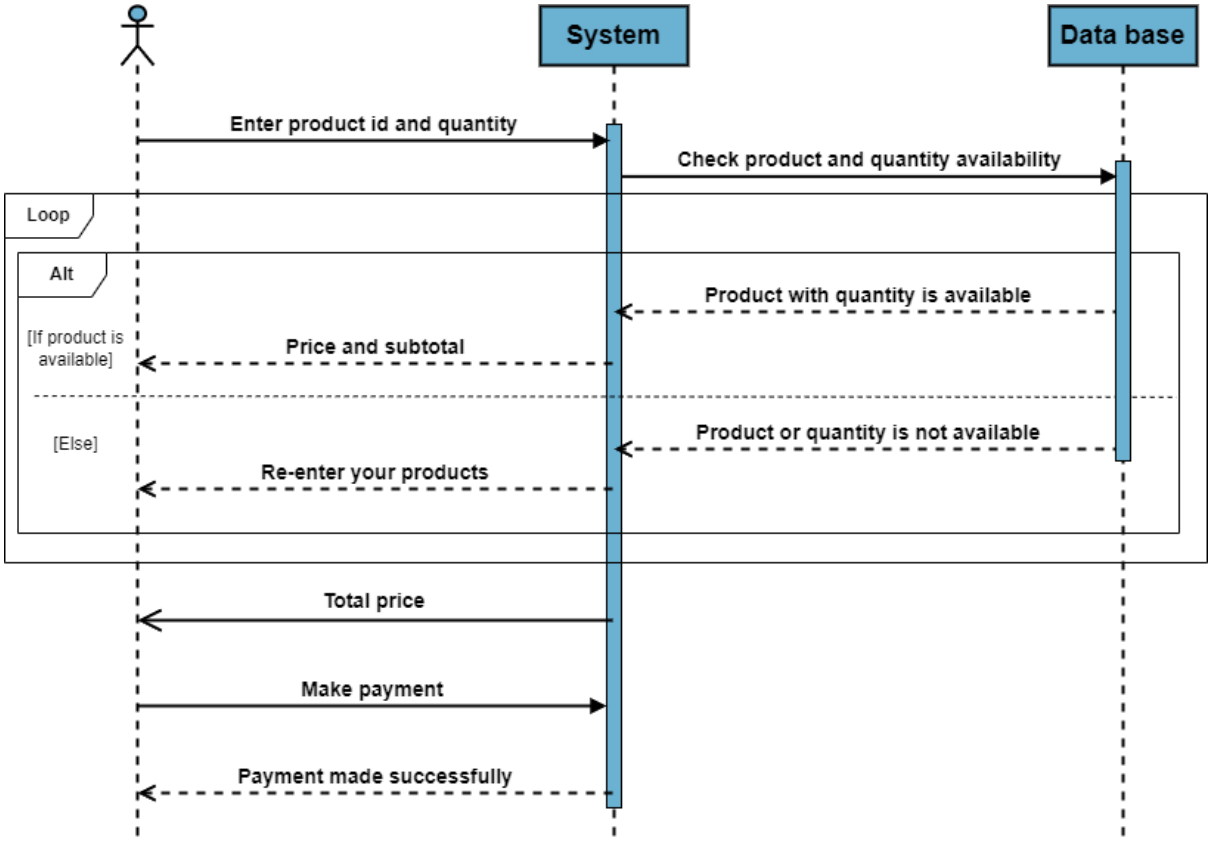
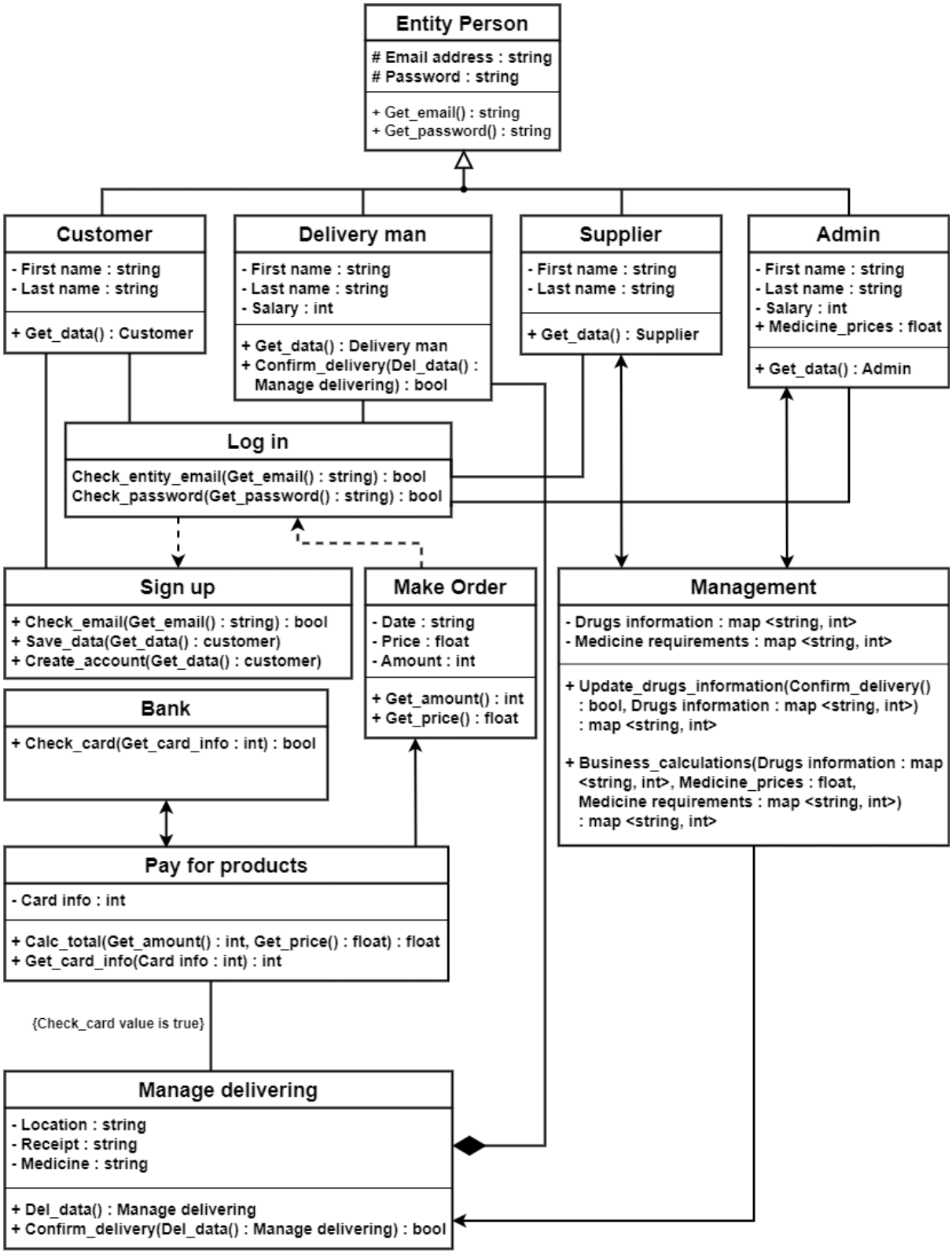
### SIGN-UP:



## ***LOG-IN:***


System
Data base
Enter mail and password
Check mail and password validation
Alt
[If mail & password are valid]
Mail and password are valid
Log the user in
Loop
[Else]
Mail and password are invalid
Mail or password is incorrect
The system redirects the actor to the appropriate dashboard

# MAKE ORDER:


System
Data base
Enter product id and quantity
Check product and quantity availability
Loop
Alt
Product with quantity is available
[If product is available]
Price and subtotal
[Else]
Product or quantity is not available
Re-enter your products
Total price
Make payment
Payment made successfully

# 7. CLASS DIAGRAM