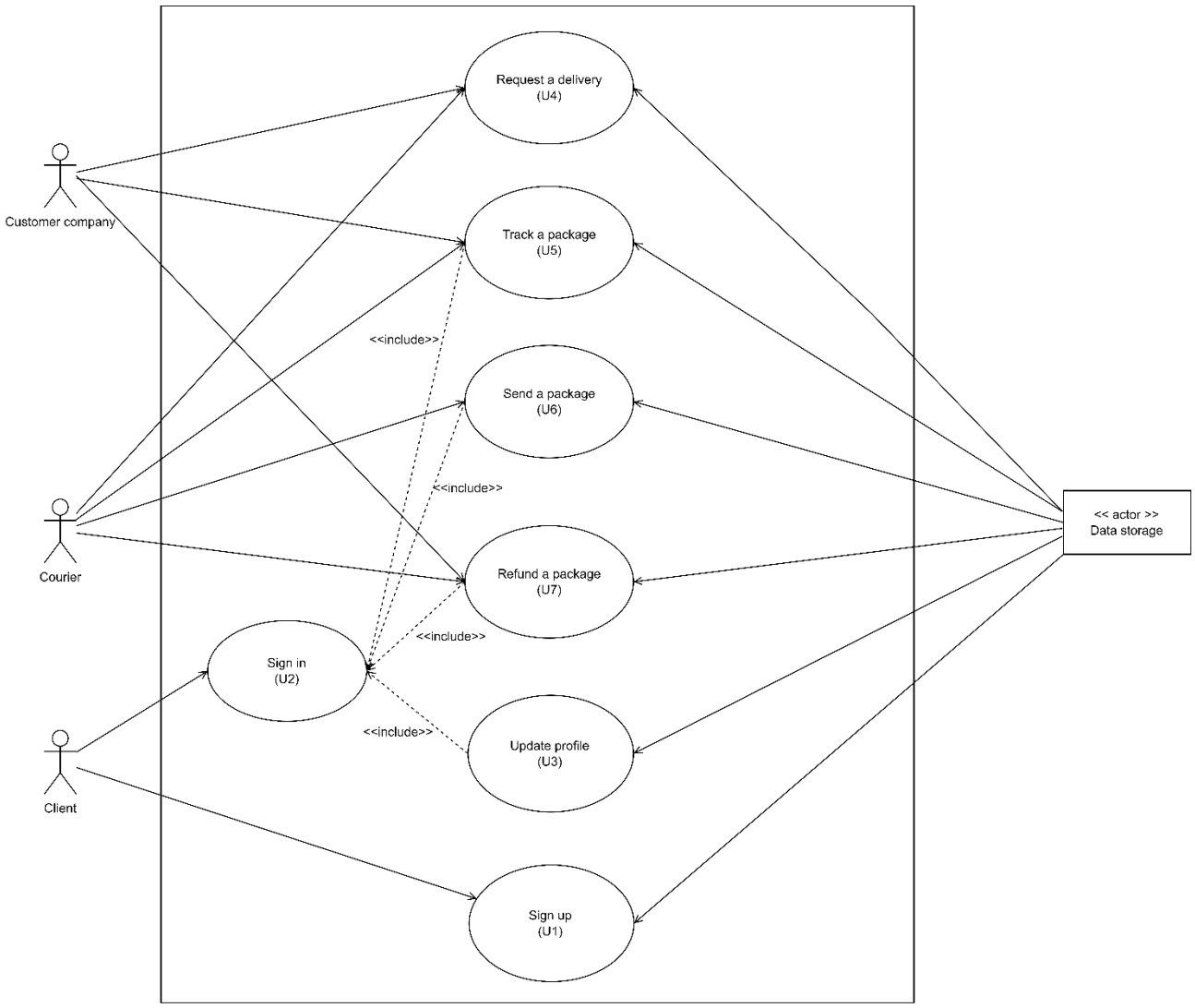

Goods Flow System

Andre Kim

Use Case Specification: Goods Flow e-Logistics System

Version <4.0>

Revision History

Date	Version	Description	Author
<10/22/22>	<1.0>	First Draft	Kim DongIn, Ahn ChanJun, Lee ChangMin
<11/12/22>	<2.0>	Add use-case. Modified use-case name. Modify all use-case basic flow. Add linked requirements all use-case. Add preconditions all use-case.	Kim DongIn, Ahn ChanJun, Lee ChangMin
<11/26/22>	<3.0>	Modify linked requirement, title grammar, actor, pre-condition, and use-case diagram	Kim DongIn, Ahn ChanJun, Lee ChangMin
<12/01/22>	<4.0>	Add use-case1, 2, 3, and 4. Delete 'Exchange a package' use-case. Modify all use-case contents.	Kim DongIn, Ahn ChanJun, Lee ChangMin

Use Case Specification: < Sign up >

U1. Sign up

1. Brief Description

The system provides the client with the creation of an account, through which the system obtains information by which the client can be identified. The client has been granted access to the system by creating an account.

2. Actors

2.1. Client: A consumer who wants to use the system.

2.2. Data Storage: A object which stores the client's account information.

3.Flow of Events.

3.1 Basic Flow

1. The client requests sign-up to the system.
2. The system provides sign-up process to the client.
3. The client writes sign-up information.
4. The system receives the client's sign-up information.
5. The system stores the client's sign-up information.
6. The system shows sign-up result to the client.

4. Pre-Conditions

There are no preconditions.

5. **Post-Conditions**

5.1. The client makes an account.

6. Linked Requirements

R24.

Use Case Specification: < Sign in >

U2. Sign in

1. Brief Description

The system provides a login function to the client. The system receives the information entered by the client, and based on this, the system determines whether the client is authorized to access the system. Clients who have been granted access to the system can use the system.

2. Actors

2.1. Client: A consumer who wants to use the system.

2.2. Data Storage: A object which checks the client's account information.

3.Flow of Events.

3.1 Basic Flow

1. The client requests sign-in to the system.
2. The system provides sign-in process to the client.
3. The client writes sign-in information.
4. The system receives the client's sign-in information.
5. The system checks the client's sign-in information.
6. The system shows sign-in result to the client.

4. Pre-Conditions

4.1. U1 must precede.

6. **Post-Conditions**

5.1. The client sign in the system.

6. Linked Requirements

R27, R28.

Use Case Specification: < Update a profile >

U3. Update a profile

1. Brief Description

The system provides the ability to modify the profile of the client. The system receives the information entered by the client, and through this, the system modifies or deletes the client's profile information. As a result, the client can use the system with the modified profile.

2. Actors

2.1. Client: A consumer who wants to use the system.

2.2. Data Storage: A object which checks the client's account information.

3.Flow of Events.

3.1 Basic Flow

1. The client requests a profile update service to the system.
2. The system provides the profile update service to the client.
3. The client writes a profile information.
4. The system receives the client's profile information.
5. The system updates the client's profile information.
6. The system shows the result to the client.

4. Pre-Conditions

4.1. U2 must precede.

7. **Post-Conditions**

5.1. The client updates a profile.

6. Linked Requirements

R25, R26.

Use Case Specification: < Request a delivery >

U4. Request a delivery

1. Brief Description

The system receives data from the customer company, processes it into data that meets the specifications of the shipping company, and delivers it to the shipping company. The system receives the tracking information and sends it to the customer company. In conclusion, the customer company receive the tracking information through the system.

2. Actors

2.1. Customer Company: A company or organization that needs courier service.

2.2. Courier: A company in charge of courier service.

2.3. Data Storage: Manage data received from the courier, and customer company.

3.Flow of Events.

3.1 Basic Flow

1. The customer company sends the order information to the system.
2. The system receives the order information.
3. The system sends the order information to the courier.
4. The courier receives the order information in the system.
5. The courier sends the courier contract code and tracking number to the system.
6. The system receives the courier contract code and tracking number from the courier.
7. The system sends the tracking information to the customer company.
8. The customer company receives the tracking information from the system.

4. Pre-Conditions

4.1. The customer company allocated the ID.

4.2. The courier allocated the ID.

8. **Post-Conditions**

5.1. The customer company receives the tracking information.

6. Linked Requirements

R1, R2, R3, R4, R5, R6, R7, R8, R9, R30, R31, R32, R33.

Use Case Specification: < Track a package >

U5. Track a package.

1. Brief Description

The system receives a tracking request from the client, the system sends the tracking information to the client. When the tracking information is updated, the courier sends the information to the system. The system receives this information, then transfer the information and sends to the client. In conclusion, the client receives the tracking information while a package is arrived.

2. Actors

2.1. Data storage: Manage data received from the client, courier, and customer company.2.2. Client: Individuals who purchase products while using the system.

2.3. Courier: A company in charge of courier service.

3.Flow of Events.

3.1 Basic Flow

1. The client requests a tracking service to the system.
2. The system receives the request from the client.
3. The system sends the tracking information to the client.
4. The courier sends the tracking information which is updated in the system.
5. The system receives the tracking information when it is updated from the courier.
6. The system sends the tracking information to the client.
7. The client receives the tracking information from the system.

4. Pre-Conditions

4.1. U2 must precede.

4.2. U4 must precede

5. **Post-Conditions**

5.1. The client receives the tracking information.

6. Linked Requirements

R10, R11, R12, R13, R14, R15, R16, R17.

Use Case Specification: <Send a package>

U6. Send a package.

1. Brief Description

When the client applies for delivery service by selecting information about the delivery item and transportation method, the system processes the delivery information sent by the client into data that meets the standards of the courier and delivers it to the courier. The system receives shipping information from the courier. When the tracking information is updated, the courier sends the information to the system. The system receives this information, then transfer the information and sends to the client. In conclusion, the client receives the tracking information while a package is arrived.

2. Actors

2.1 Data storage: Manage data received from the client, courier, and customer company.

2.2. Client: Individuals who purchase products while using the system.

2.3. Courier: A company in charge of courier service.

3. Flow of Events

3.1 Basic Flow

1. The client requests a delivery service to the system.
2. The system receives the request. The system sends the delivery information to the courier.
3. The courier sends the tracking information to the system.
4. The system receives the tracking information from the courier.
5. The system sends the tracking information to the client.
6. The courier sends the tracking information when it is updated in the system.
7. The system receives the tracking information which is updated from the courier.
8. The system sends the tracking information which is updated to the client.
9. The client receives the delivery result from the system.

4. Pre-Conditions

4.1. U2 must precede.

4.2. The courier allocated the ID.

Post-Conditions

5.1. The client checks the delivery result.

6. Linked Requirements

R3, R4, R5, R6, R7, R10, R11, R12, R13, R15, R16, R17, R29, R30, R31, R32, R33.

Use Case Specification: <Refund a package>

U7. Refund a package

1. Brief Description

When the customer applies the refund process for the delivery request, the system sends the client's request to the customer company and progresses the refund by contacting a courier. Also, the system processes the refund information according to the specifications and sends it to the courier. And when the refund is finished, the system receives the refund completion information. In conclusion, the system visualizes the refund result and sends it to the client.

2. Actors

2.1. Data storage: Manage data received from the client, courier, and customer company.

2.2. Client: Individuals who purchase products while using the system.

2.3. Courier: A company in charge of courier service.

2.4. Customer company: A company or organization that needs courier service.

3. Flow of Events

3.1 Basic Flow

1. The client requests a refund service to the system.
2. The system receives the refund request.
3. The system sends the received refund request to the customer company.
4. The system signs a new contract with the courier.
5. The system sends the refund information to the courier.
6. The courier receives the package from the client.
7. The courier sends the return information to the system until the return is done.
8. The system sends the return information to the customer company and until the return is done.
9. The customer company receives the return information to the system until the return is done.
10. The system sends the refund result to the client.
11. The client receives the refund result.

4. Pre-Conditions

4.1. U5 must precede.

5. Post-Conditions

5.1. The client receives the refund result.

6. Linked Requirements

R18, R19, R20, R21, R22, R23.