Team - Andre Kim

Goods Flow Logistics System
Software Requirements Specification Version <3.0>

Revision History

Date	Version	Description	Author
<10/08/22>	<1.0>	Initial Draft.	Kim DongIn, Ahn ChanJun, Lee ChangMin
<10/11/22>	<2.0>	Change on Usability, Performance, Security, Design Constraints, Interfaces requirements.	Kim DongIn, Ahn ChanJun, Lee ChangMin
<10/19/22>	<3.0>	Modification on the requirements and glossaries. Put ID on the requirements.	Kim DongIn, Ahn ChanJun, Lee ChangMin

Table of Contents

Software Requirements Specification

1. Introduction

The introduction of Software Requirements Specification (SRS) for the Goods Flow logistics System covers an overview of an entire SRS, which is its purposes, scope of use, definitions, acronyms, and other abbreviations and references. The focus of this document is to collect, analyze, and give deep insight into a distribution center and tracking services. That is possible by defining a detailed description of the problem by focusing on the functions and needs of stakeholders while finding problems while defining product characteristics at a high level. Exact tracking requirements can be provided in this document.

1.1 Purpose

The purpose of this document is to collect and analyze: The definition of package tracking and the requirements that consumers and stakeholders expect. Also, we can increase our understanding of the Package Tracking project by collecting and analyzing these things.

In a nutshell, the purpose of this document is to provide a high-level overview and detailed description of Package Tracking. It will describe the information of the target users of this project and the user interface. Furthermore, we can expect that it will be able to help designers and developers working on similar projects.

1.2 Scope

Primarily the scope is related to the e-Logistics function. It focuses on the needs of sellers, carriers, and shopping malls. Package Tracking aims to improve the quality of logistics services by solving problems with sellers, delivery companies, and shopping malls expected as main stakeholders with online technology. We can also help customers choose another tracking service. It can be used as a standard model for logistics services because it covers the overall functions of logistics. Customers can also get a description of what kind of information and features are required for the Goods Flow Logistics System.

1.3 Definitions, Acronyms, and Abbreviations

Client	A consumer which differs to the company
Courier contract code	Code issued when contracting with a courier company
e-SCM	electronic Supply Chain Management
FAQ	Frequently Asked Questions
HTTPS	Hypertext Transfer Protocol Secure.
MySQL	Oracle-backed open source relational database management system (RDBMS) based on Structured Query Language (SQL)
Python	Python is an interpreted, object-oriented, high-level programming language with dynamic semantics.
TCP/IP protocol	Transmission Control Protocol/Internet Protocol
Tracking number	Numbers assigned to packages when they are shipped.

1.4 References

Currently, there are no references.

1.5 Overview

The remaining sections of this document provide a general description, including characteristics of the users of this project, the product's hardware, and the product's environmental, functional, and data requirements. Section 2 gives the environmental requirements, functional requirements, data requirements, constraints, and assumptions made while designing the E-Logistics. It also gives the user viewpoint of the product. Section 2 also gives the specific requirements of the product. Section 2 also discusses the external interface requirements and gives a detailed description of functional requirements. Section 3 is for supporting information.

2. Specific Requirements

2.1 Functionality

This subsection contains the requirements for e-Logistics.

2.1.1 Receive order information from the customer company

R1 The system shall receive order information from the customer company.

2.1.2 Request delivery to the carrier

R1 The system shall request delivery to the carrier.

R2 The system shall link the courier contract code to the shipping company.

2.1.3 Receive tracking information from the carrier

R1 The system shall receive the tracking number from the courier.

R2 The system shall receive the delivery status for the tracking number.

R3 The system shall receive the delivery status when the data is updated.

2.1.4 Transfer tracking information to the customer company

R1 The system shall inform the customer company of the tracking number.

R2 The system shall update the delivery status when the package arrives at the hub.

2.1.5 Offer services for the client

2.1.5.1 Give information to the client

R1 The system shall display the status when the package arrives at the hub.

R2 The system shall display the tracking number.

R3 The system shall display the product name.

R4 The system shall display the shipper and consignee.

R5 The system shall display the delivery point.

R6 The system shall display the customer’s phone number.

R7 The system shall display the delivery man’s name.

R8 The system shall check the delivery status at any time.

R9 The system shall allow users to access the tracking information.

R10 The system shall display the current tracking information about the order.

2.1.5.2 Check transit requests from the client

R1 The system shall provide a temporary phone number for safety.

2.1.6 Offer delivery system

R1 The system shall provide installation and use of e-SCM free of charge.

2.1.7 Offer returns

R1 The system shall provide a return service.
R2 The system shall provide a return information to the customer company.
R3 The system shall provide a return information to the courier.
R4 The system shall sign a new contract with the courier company dedicated to the customer.
R5 The system shall display the result of return process to the client.

2.1.8 Maintain customer profile.

R1 The system shall allow the user to create a profile and set his information.
R2 The system shall allow the user to update the profile information.
R3 The system shall allow the user to delete the profile.

2.1.9 Provide Customer Support.

R1 The system shall provide help services.
R2 The system shall display help services upon request.
R3 The system shall provide FAQ customer support.
R4 The system shall display the FAQs upon request.
R5 The system shall provide sitemap options for customer support.
R6 The system shall allow the user to select the support type he wants.
R7 The system shall allow the users to enter the customer and system information for support.
R8 The system shall display the customer support contact numbers on the screen.

2.1.10 Kakao Message confirmation

R1 The system shall maintain customer's Kakao ID information.
R2 The system shall send a tracking information to the user through Kakao message.

2.1.11 Provide multiple shipping methods for the client.

R1 The system shall provide different shipping options provided by the shipping department.
R2 The system shall enable the users to select the shipping method.

2.2 Usability

2.2.1 GUI for websites

R1 The system shall display only 10 results on the current screen.

2.2.2 GUI for application

R1 The system shall provide the use of a menu.

R2 The system shall display all package list on the current screen.

R3 The system shall provide a scrolling on the shipping check page.

2.2.3 Accessibility

R1 The system shall provide web pages and app access.

2.3 Reliability & Availability

2.3.1 Internet service provider

R1 The system shall provide a contractual agreement with an internet service provider.

R2 The system shall provide the internet by network facilities of the provider.

2.4 Performance

R1 The system shall be based on the web and must be run from a web server.

R2 The system shall be run on Android and IOS.

R3 The system shall provide server that can serve at least 1000 users simultaneously.

R4 The performance shall depend upon the hardware components of the client/customer.

2.5 Security

2.5.1 Data Transfer

R1 The system shall confirm all transactions with the client's web browser.

R2 The system shall not leave any cookies on the client's device-containing the user's phone number.

R3 The system shall not leave any cookies on the client's device-containing the user's address.

2.5.2 Data Storage

R1 The system's storage shall never display a client's personal information.

R2 The system's storage shall only be accessible to authenticated administrators.

R3 The system's storage shall be encrypted.

2.6 Design Constraints

2.6.1 Standard Development Tools

R1 The system shall be built using Python and MySQL.

2.6.2 Website

R1 There are no memory requirements.

R2 The computers must be equipped with web browsers such as Chrome.

R3 The product's information must be stored in such a way that allows the client easy access to it.

R4 General knowledge of basic computer skills is required to use the website.

2.6.3 Application

R1 The app size should be less than 1GB.

R2 The device must be equipped with a wireless internet connection.

R3 General knowledge of basic application skills is required to use the app.

2.6.4 On-line User Documentation and Help System Requirements

2.6.4.1 Help System for a client who is using an application and website

R1 The system shall provide specific guidelines to a user for using the webpage and application system.

R2 The system shall provide a menu bar to implement online user help.

2.6.4.2 Help System for Customer Company

R1 The system shall provide specific guidelines to a user for using the Goods Flow system.

2.6.4.3 Help System for carrier

R1 The system shall provide specific guidelines to a user for using the Goods Flow system.

2.7 Interfaces

There are many types of interfaces as such supported by the Goods Flow system namely; User Interface, Software Interface, and Hardware Interface. However, in this prototype, you can test it on a local computer. There shall be a logical address of the system in IPv4 format. The test IP address will be 127.0.0.1.

2.7.1 User interfaces

R1 The user interface for the software shall be compatible with the browser specified in this document: Chrome, Firefox, and Explorer.

2.7.2 Hardware interfaces

R1 Since the application must run over the internet, all the hardware shall require connecting internet will be the hardware interface for the system.

2.7.3 Wireless internet interface

R1 The wireless internet interface for the software shall be compatible with the browser specified on this document: Chrome, Firefox, and Explorer.

2.7.4 Software interfaces

R1 The Goods Flow system shall communicate with the customer company to get the order information.

R2 The Goods Flow system shall communicate with the shipping system for tracking orders and updating shipping methods.

2.7.5 Communication interfaces

R1 The Goods Flow system shall use the HTTPS protocol for communication over the internet and the intranet communication will be through TCP/IP protocol suite.

R2 The prototype shall use TCP/IP protocol in local IP for the test.

2.8 Legal, copyright, and other notices

R1 The system should display the Goods Flow disclaimers, copyright, wordmark, trademark, and product warranties.

2.9 Applicable standards

R1 The system shall be satisfying the industry standard