

Software Requirements Document (SRD)

Project: Agricultural E-commerce Platform

Date: [Current Date]

Version: 1.0

1. Background

1.1. Overview

With the increasing demand for fresh, safe, and traceable agricultural products, connecting producers, sellers, and consumers efficiently has become essential. Currently, many agricultural sales channels remain traditional and lack technological integration to optimize transactions, inventory management, and reduce waste caused by product expiry or improper storage.

This project aims to develop a specialized e-commerce platform for agricultural products, providing a convenient, transparent, and efficient marketplace. Sellers can list their products, manage inventory, monitor product expiration dates, and receive notifications to handle nearly expired products—such as offering promotions, bundling, or converting products into other forms. Buyers can easily browse, compare, and purchase fresh agricultural products with clear information about origin and shelf life.

1.2. Problems and Opportunities

- **Agricultural waste:** Significant losses occur due to poor inventory management leading to product spoilage or expiration, causing financial loss and supply issues.
- **Lack of specialized platforms:** Existing e-commerce solutions are not optimized for the unique characteristics of agricultural products, such as expiration tracking or managing near-expiry product promotions.
- **Demand for transparency:** Consumers increasingly seek trustworthy information regarding product origin, quality, and expiration before making purchases.
- **Online shopping trends:** Customers prefer fast, convenient shopping with diverse product options and attractive offers.

1.3. Project Goals

- Develop an agricultural e-commerce website that connects sellers and buyers efficiently.
- Provide intelligent inventory management tools for sellers, especially for tracking product expiration.

- Integrate alert systems for near-expiry products with options for promotions, bundling, or product transformation.
- Optimize user experience for buyers to easily search, compare, and order products online.
- Ensure system stability, security, and scalability for future growth.

1.4. Stakeholders and Users

- **Sellers:** Individuals or organizations selling agricultural products who need inventory and order management tools.
- **Buyers:** End consumers looking to purchase fresh, safe, and transparently sourced agricultural goods.
- **Administrators:** System administrators managing platform operations, quality control, and issue resolution.