

Software Requirements Specification (SRS)

Project Name: Kanban Task Manager

Developer: Jasmine Nasar

Project Type: Full Stack Web Application

1. Introduction

The Kanban Task Manager is a web-based application designed to help users manage tasks efficiently using the Kanban methodology. It allows users to create, update, track, and organize tasks across different stages such as Todo, In Progress, and Done.

2. Overall Description

The system provides an intuitive interface for task management. It supports user authentication, task categorization, and real-time task updates. The application is accessible through modern web browsers.

3. System Features

- User Registration and Login
- Create, Edit, Delete Tasks
- Drag and Drop Tasks Between Columns
- Task Status Management (Todo, In Progress, Done)
- Secure Authentication Using JWT

4. Functional Requirements

FR1: The system shall allow users to register using email and password.

FR2: The system shall allow registered users to log in securely.

FR3: The system shall allow users to create tasks.

FR4: The system shall allow users to update and delete tasks.

FR5: The system shall display tasks based on their status.

5. Non-Functional Requirements

- Performance: Fast response time for user actions
- Security: Password encryption and JWT-based authentication
- Usability: User-friendly and responsive UI
- Scalability: Supports multiple users simultaneously

6. Technology Stack

Frontend: React.js, Tailwind CSS

Backend: Node.js, Express.js

Database: MongoDB Atlas

Deployment: Render (Backend), Vercel/Netlify (Frontend)

7. External Interface Requirements

The application interfaces with MongoDB Atlas for data storage and uses REST APIs for frontend-backend communication.

8. Conclusion

The Kanban Task Manager system aims to provide a simple yet effective solution for task management, improving productivity and workflow organization for users.