Home Loan Management System using Java and ReactJS

Project Question / Problem Statement

Design and implement a Home Loan Management System using Java (Spring Boot) for backend and ReactJS for frontend. This system should help users apply for home loans, upload required documents, track loan approval stages, and manage EMI payments online. Admins should be able to verify documents, approve or reject applications, and monitor the loan portfolio.

Requirements & Features

Frontend (ReactJS):

• User signup, login, and profile management (JWT-based authentication)
• Loan application form with dynamic input validation (loan amount, tenure, property value, etc.)
• Document upload functionality (e.g., salary slip, ID proof)
• Application tracking dashboard for users
• Admin dashboard to view, verify, and update loan statuses
• Responsive UI using Material UI or TailwindCSS

Backend (Java + Spring Boot):

• RESTful API endpoints for loan application management
• Integration with a file storage system for document uploads
• Role-based access control using Spring Security and JWT
• EMI and interest calculation service based on loan details
• Database connectivity using JPA/Hibernate with MySQL/PostgreSQL
• Email notification service for application updates

Database (MySQL/PostgreSQL):

Tables could include:
• users (id, name, email, password, role)
• home_loan_applications (id, user_id, amount, tenure, property_value, status, interest_rate)
• documents (id, loan_id, document_type, file_path)
• emi_schedule (id, loan_id, due_date, amount, payment_status)

Expected Output

A functional full-stack application where users can:
• Apply for home loans and upload necessary documents
• Track loan approval progress and repayment schedule

Admins can:
• Verify user documents and approve/reject loan requests

- Manage all active loans and monitor EMI payment statuses
- Generate reports on loan disbursement and repayment performance