Project Documentation

# Project Title

InsurAI: Corporate Policy Automation and Intelligence System

# Problem Statement

In the insurance industry, managing corporate policies involves handling large volumes of documents, compliance checks, renewals, and customer queries. These processes are often manual, time-consuming, and prone to human errors. Corporate clients face delays in policy issuance, renewals, and claim processing, resulting in reduced efficiency and customer satisfaction. There is a need for an automated, intelligent system that streamlines policy management, ensures compliance, reduces manual intervention, and improves decision-making.

# Solution Approach

I propose building 'InsurAI,' a Corporate Policy Automation and Intelligence System. This system will leverage automation, Artificial Intelligence (AI), and a full-stack application architecture to streamline policy lifecycle management. Key features include:  
- Automated policy creation, updates, and renewals  
- AI-powered compliance verification  
- Intelligent chat assistant for corporate clients  
- Secure role-based dashboards for clients, underwriters, and administrators  
- Data-driven insights and reporting dashboards  
  
The system will reduce manual work, speed up policy processing, minimize errors, and enhance customer experience.

# Tech Stack

Since the project will be developed with a focus on Full Stack Java, the following technologies will be used:  
  
1. Frontend:  
 - React for UI  
 - HTML5, CSS3, JavaScript  
  
2. Backend:  
 - Java (Spring Boot for REST APIs)  
 - Hibernate/JPA for ORM  
  
3. Database:  
 - MySQL for relational data storage  
  
4. AI & Automation Components:  
 - Python (for AI/ML models, integrated via APIs)  
 - Rule Engines (Drools/Java-based)  
  
5. DevOps & Deployment:  
 - Git & GitHub for version control  
 - Deployment on cloud (Heroku, Render, or Railway)  
  
6. Other Tools:  
 - Postman (API testing)  
 - Swagger (API documentation)  
 - VS Code (Development)