**Generative AI with IBM Cloud**

**Project Documentation format**

**1. Introduction**

• Project Title: [SmartSDLC – AI-Enhanced Software Development Lifecycle ]

• Team Members:

Team ID : LTVIP2025TMID32102

Team Size : 4

Team Leader : Mannem Priyanka

Team member : Lanke Harshitha

Team member : Lakshmi Divya Thota

Team member : M K Asish

2. Project Overview

• Purpose: Briefly describe the purpose and goals of the project.

• Features: Highlight key features and functionalities.

3. Architecture

• Frontend: Describe the frontend architecture using React.

• Backend: Outline the backend architecture using Node.js and Express.js.

• Database: Detail the database schema and interactions with MongoDB.

4. Setup Instructions

• Prerequisites: List software dependencies (e.g., Node.js, MongoDB).

• Installation: Step-by-step guide to clone, install dependencies, and set up the

environment variables.

5. Folder Structure

• Client: Describe the structure of the React frontend.

• Server: Explain the organization of the Node.js backend.

6. Running the Application

• Provide commands to start the frontend and backend servers locally.

o Frontend: npm start in the client directory.

o Backend: npm start in the server directory.

7. API Documentation

• Document all endpoints exposed by the backend.

• Include request methods, parameters, and example responses.

8. Authentication

• Explain how authentication and authorization are handled in the project.

• Include details about tokens, sessions, or any other methods used.

9. User Interface

• Provide screenshots or GIFs showcasing different UI features.

10. Testing

• Describe the testing strategy and tools used.

11. Screenshots or Demo

• Provide screenshots or a link to a demo to showcase the application.

12. Known Issues

• Document any known bugs or issues that users or developers should be aware of.

13. Future Enhancements

• Outline potential future features or improvements that could be made to the project.