

Problem solution Fit:

1. Problem(s) Identified		3. Existing Alternatives	
P1	Software development teams often face delays due to manual requirement gathering and classification	Alternative	Drawback
P2	Developers spend excessive time writing boilerplate code, reducing productivity	Manual SDLC Tools (e.g. Excel, Word)	Automotive mapping to SDLC phases using IBM Granite LLM
P3	Bug fixing and testing are time-consuming and often error-prone when done manually	Traditional IDE Plugins	Lack AI-powered adaptability for, natural language inputs
P4	Lack of automation leads to inconsistent documentation and knowledge gaps	QA Engineers	Den of cover end-end SDLC stages in a single platform
2. Target Audience (Who is facing the problem?)		Test Case Generator	Produces structured pytest cases for functional code
Developers	Need faster code generation, bug fixing, and test case creation	Code Summarizer	Explains code functionality in plain English
Project Managers	Require clearer classification of requirements and traceability across the SDLC	Chatbot Assistant	Real-time SDLC support for developers and team members
QA Engineers	Demand consistent, auto-generated test cases to validate code quickly	6. Unique Value Proposition	
Clients	Expect timely delivery and functional clarity in development cycles	SmartSDLC is an AI-Powered platform that automates the most time-intensive stages of Software Development Lifecycle –from gathering requirements to generating production-ready code, testing, and documentation—Using IBM's Granite LLM and deploy-	