**Project Title: "AI-Driven Deadlock Resolution for Smarter Multithreading"  
  
Project Team:**

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**Project Abstract:**

In modern computing, deadlocks in multithreaded applications lead to severe performance bottlenecks and crashes, especially in systems handling complex parallel tasks. Traditional deadlock detection methods, such as code analysis and static checks, are often inefficient in highly dynamic, real-time environments. This project leverages Artificial Intelligence (AI) algorithms, particularly machine learning models, to predict, detect, and resolve deadlocks more efficiently. By utilizing real-time analysis of thread interactions and learning from previous deadlock scenarios, AI can offer proactive deadlock avoidance and faster recovery compared to conventional methods. The proposed AI-driven solution will reduce application downtime, improve system performance, and provide an adaptive framework that evolves with changing software behaviors, ideal for high-performance and multi-core computing environments.