

Problem Statement

1. **Automated Farming Solutions:** Develop a system that automates key farming tasks like harvesting, weeding, and fertilizer application, combining various tools and technologies for efficient crop management.
2. **Smart Agricultural Monitoring System:** Build a digital platform to monitor crop health, water levels, and nutrients, with features like pest and disease detection. Technologies such as AI or sensor-based systems can be integrated for better accuracy and decision-making.
3. **Energy-Efficient Agricultural Machinery:** Design low-power, multi-functional tools for farming operations, like ploughing, tillage, and harvesting, to reduce costs and improve productivity.
4. **Drone-Based Precision Farming:** Create drone solutions for seeding, spraying, and crop surveillance that enhance efficiency and precision in farm management.
5. **Livestock Health Management Platform:** Develop a digital system for monitoring livestock health, insemination schedules, and personalized care, improving animal welfare and farm productivity.
6. **Affordable Crop Protection Tools:** Innovate low-cost systems for crop protection, such as pest detection or animal deterrents, that provide farmers with accessible solutions for safeguarding crops.
7. **Post-Harvest Automation Systems:** Design automated tools for processing, cleaning, and threshing crops like sugarcane to streamline post-harvest operations and reduce manual labor.