**Phase 1: Project Definition and Design Thinking**

The scope of this document is to identify the problem and find a solution for Flood monitoring and to receive real-time water level data.

**Project Definition:**

* The project involves deploying IoT sensors near water bodies and flood-prone areas to monitor water levels and provide early flood warnings through a public platform.
* The objective is to enhance flood preparedness and response by issuing timely warnings to both the public and emergency response teams.
* This project includes defining objectives, designing the IoT sensor network, developing the warning platform, and integrating them using IoT technology and Python.

**Design Thinking:**

* Project Objectives: Define objectives such as real-time flood monitoring, early warning issuance, public safety, and emergency response coordination.
* IoT Sensor Network Design: Plan the deployment of IoT sensors to monitor water levels in flood-prone areas.
* .Early Warning Platform: Design a web-based platform to display real-time water level data and issue flood warnings.
* Integration Approach: Determine how IoT sensors will send data to the early warning platform.