# 3118- ENVIRONMENTAL MONITORING

# PROBLEM DEFINITION AND DESIGN THINKING

# Phase 1: UNDERSTANDING OF PROBLEM STATEMENT

The project involves setting up IOT devices to monitor environmental conditions in public parks, including temperature and humidity. The primary objective is to provide real-time environmental data to park visitors through a public platform, enabling them to plan their outdoor activities accordingly. This project includes defining objectives, designing the IOT sensor system, developing the environmental monitoring platform, and integrating them using IOT technology and Python.

## Problem Definition:

It has been researched and found that there has been the following issues with public park management. The issues or problems are listed below:

* The park management or the park visitors do not receive any information or updates on the environmental data
* This is resulting in the park visitors not being able to plan their outdoor activities or the visit to the public park
* This also has resulted in the failure of the park management to organize promotional outdoor activities and campaigns for park visitors
* This has resulted in an overall low visitor satisfaction.

# Design Thinking:

Having understood the above problem. We would design a solution which would be able to solve the same problem.

* An IoT based solution could immediately resolve the above issue.
* We would need to identify the right Digital Humidity and Temperature Sensor, for which we would need to perform extensive research on Original Equipment Manufacturers.
* The requirement also is that the IoT solution needs to be able to communicate to a public platform.
* Hence we would need internet connectivity and communication module.