Project Design Phase-I
Proposed Solution Template

Team ID	PNT2022TMID20281
Project Name	Fertilizer Recommendation System For Disease Prediction.
Maximum Marks	2 Marks

Proposed Solution Template:

The plant is affected by leaf disease then it reduces the growth of the agricultural level. Finding the leaf disease is an important role of agriculture preservation. The project aims to find Detection and recognition of plant diseases bacterial and fungal diseases. It helps Many people lead their life from agriculture field.

S.No.	Parameter	Description
1.	Problem Statement (Problem to be solved)	It is easy to identify leaf diseases. Generally, the plant diseases are caused by the abnormal physiological functionality of plants. Detection and recognition of plant diseases using machine learning are very efficient in providing symptoms of identifying diseases at its earliest. Mostly, the prediction and diagnosis of leaf diseases are depending on the segmentation such as segmenting the healthy tissues from diseased tissues of leaves.
2.	Idea / Solution description	Different types of image-processing techniques are applied to them, the process those images, to get different and useful features needed for the purpose of analyzing later-Plant leaf disease identification is especially needed to predict both the quality and quantity of the First segmentation step primarily based on a mild polygonal leaf model is first achieved and later used to guide the evolution of an energetic contour. Combining global shape descriptors given by the polygonal model with local curvature based features, the leaves are then classified overleaf database. In this research work introduce a method designed to deal with the obstacles raised by such complex images, for simple and plant leaves.
3.	Novelty / Uniqueness	Consumers Farming is one of the major sectors that influences a country's economic growth. In

		country like India, majority of the population is dependent on agriculture for their livelihood. Many new technologies, such as Machine Learning and Deep Learning, are being implemented into agriculture so that it is easier for farmers to grow and maximize their yield.
4.	Social Impact / Customer Satisfaction	In the crop recommendation application, the user can provide the soil data from their side and the application will predict which crop should the user grow. For the fertilizer recommendation application, the user can input the soil data and the type of crop they are growing, and the application will predict what the soil lacks or has excess of and will recommend improvements. For the last application, that is the plant disease prediction application, the user can input an image of a diseased plant leaf, and the application will predict what disease it is and will also give a little background about the disease and suggestions to cure it.
5.	Business Model (Revenue Model)	Predicting the fertilizers, Analyzing the disease in a tap makes the life of farmers easy with minimal subscriptions would provide an acceptable return for the organization. This action adds a lot of value to the company and the business in society.
6.	Scalability of the Solution	Our Fertilizer Recommendation system for disease Prediction is in the form of web application to provide this valuable service to the environment and society.