Problem Solution Fit

Date	12 November 2022
Team ID	PNT2022TMID40222
Project Name	Project - SmartFarmer - IoT Enabled Smart Farming Application
Maximum Marks	4 marks

1. CUSTOMER SEGMENTS: Who is your customer? (Farmer with 2 Acers of Land)

A farmer wants to monitor and maintain his agricultural land when he is not present at land. Our intention is to assist them by remotely monitoring field conditions. This product prevents the demise of agriculture.

2. JOBS-TO-BE-DONE / PROBLEMS: (To control and Monitor the agricultural field)

The farmer want to control the Motor pump, lights, Gate valves and light traps using Mobile and web application.

He also wants to monitor the humidity, temperature and moisture of at the agricultural field.

3. TRIGGERS: (Technology Development is the Main trigger)

Farmer struggling to maintain his land when he was travel to another place for personal reasons. The technologies are well developed in agriculture in other countries. So, he wants a upgrade.

4 .AVAILABLE SOLUTIONS: (IOT enabled Smart Farming)

Using IOT, the irrigation process is automated. To automate the watering operation, field parameters and meteorological data were gathered and processed. Efficiency is limited over small distances, and data storage is challenging.

5. CHANNELS OF BEHAVIOUR:

ONLINE –The farmer does not require to present in Farming field.

OFFLINE –The farmer should connect with Online otherwise he must present at farming field to control the devices at offline

9.PROBLEM ROOT CAUSE:

It was hard for farmers to perform agriculture because of the often changing and uncertain weather and climate. When deciding whether to water your plants, these factors are crucial. When a farmer isn't there, it's hard to keep an eye on the field, which can cause crop damage.

10.YOUR SOLUTION:

Our product collects data from various types of sensors and sends the values to our main server. It also collects weather data from the Weather API. The final decision to irrigate the crop is made by the farmer using a mobile application.