



**Anjalai Ammal - Mahalingam Engineering College,
Kovilvenni, Thiruvarur (D.t) – 614 403**

Department of Information Technology

CROP MANAGEMENT AND SMART FARMING USING IOT

ZERO REVIEW

Batch Number : 3

Project Batch Members:

P. ASRAF HUSSAIN	-	820417104009
G S. GOVINDASAMY	-	820417104015
A. MOHAMMED AJEEM	-	820417104030

Guided By

Mr. R. RAMA RAJESH M.E,

Assistant Professor,

Department of IT,

AAMEC.

Signature of the Guide

Signature of the Project Coordinator

DOMAIN – IOT

WHAT IS IOT ?

- IOT is short for Internet of Things
- The Internet of Things(IOT) is inter-networking of physical devices.
- This system has ability to transfer data over a network without requiring human-to-human or human-to-computer interaction.

WHY IOT ?

- IOT has many applications in agriculture, smart cities, smart home, healthcare, business sectors, Traffic monitoring, transport and logistics etc.
- This is a growing mega trend that will influence everything from businesses to our daily personal lives.
- Here we are mainly focusing on agriculture, as it plays a vital role in development of our country's economy.

AIM OF THE PROJECT

- Usually the farmer pumps the water more or less to cultivate the land.
- This may result in wastage of water or insufficiency to the crops.
- By using soil moisture sensor, farmer gets an alerting message when the moisture level increases or decreases.
- Also when the water level is too high, there is a separate machine which acts like a ridges, and opens the door for water to go through other fields.
- If the water level is sufficient for the crops or soil, the machine locks the ridges, stores the water for crops.

ISSUES IN THE EXISTING SYSTEM

- The existing literature suggest that crop management only indicates the detail of water level and plant consumption.
- There is no sign of additional any machine that act accordingly to situation that depends on what the plant needs in water consumption.

FEATURES OF THE PROPOSED SYSTEM

- In this work we can able to rectify the problem, without man power the machine act like a man and makes the ridges automatically based on the water consumption.
- By using soil moisture sensor we can also able to get updates about the soil and water level management.
- We can also add humidity check and machine that flow water to the plants when it needs by using sensors.

ABSTRACT

Internet of Things (IoT) plays a crucial role in smart agriculture. Smart farming is an emerging concept, because IoT sensors capable of providing information about their agriculture fields. The paper aims making use of evolving technology i.e. IoT and smart agriculture using automation. Usually the farmer pumps the water more or less to cultivate the land. One more type of IoT product in agriculture and another element of precision farming are crop management devices. Just like weather stations, they should be placed in the field to collect data specific to crop farming; from temperature and precipitation to leaf water potential and overall crop health. Thus, you can monitor your crop growth and any anomalies to effectively prevent any diseases or infestations that can harm your yield. By using soil moisture sensor, farmer gets an alerting message when the moisture level increases or decreases. Also when the water level is too high, there is a separate machine which acts like a ridges, and opens the door for water to go through other fields. If the water level is sufficient for the crops or soil, the machine locks the ridges, stores the water for crops. In this work we can able to rectify the problem, without man power the machine act like a man and makes the ridges automatically based on the water consumption. By using soil moisture sensor we can also able to get updates about the soil and water level management. We can also add humidity check and machine that flow water to the plants when it needs by using sensors.