

Sprint delivery 1

Title	Smart Farmer-IOT Enabled Smart Farming Application
Domain name	INTERNET OF THINGS
Team ID	PNT2022TMID29878

Arduino using C++ code To Connect Sensors:

```
#include "Arduino.h"
#include "dht.h"
#include "SoilMoisture.h"
#define dht_apin A0 const int sensor_pin = A1;
//soil moisture int pin_out = 9; dht DHT;
int c=0;
void setup()
{
  pinMode(2, INPUT);
  //Pin 2 as INPUT pinMode(3, OUTPUT);
  //PIN 3 as OUTPUT pinMode(9, OUTPUT);
  //output for pump
}
void loop()
{
  if (digitalRead(2) == HIGH)
  {
    digitalWrite(3, HIGH);
    // turn the LED/Buzz ON delay(10000);
    // wait for 100 msecond digitalWrite(3, LOW);
    // turn the LED/Buzz OFF delay(100);
  }
  Serial.begin(9600);
  delay(1000);
  DHT.read11(dht_apin);
  //temprature float h=DHT.humidity;
  float t=DHT.temperature;
  delay(5000);
  Serial.begin(9600);
  float moisture_percentage;
```

```

int sensor_analog;
sensor_analog = analogRead(sensor_pin);
moisture_percentage = ( 100 - ( sensor_analog/1023.00) * 100 );
float m=moisture_percentage;
delay(1000);
if(m=0)
{
mySerial.begin(9600);
delay(15000);
Serial.begin(9600);
delay(1000);
Serial.print("\r");
delay(1000);
Serial.print((String)"update- >" + (String)"Temprature=" + t + (String)"Humidity=" + h + (String)"Moisture=" + m);
delay(1000);
}

```

Circuit Diagram:



