

## ASSIGNMENT

### 4

Date	19 September 2022
Team ID	PNT2022TMID42919
Project Name	Assignment 1
Maximum Marks	2 Marks

write code and connections in wokwi  
for ultrasonic sensor:

Code:

```
#define ECHO_PIN 2
```

```
#define TRIG_PIN 3
```

```
void setup() { Serial.begin(115200);  
  pinMode(LED_BUILTIN, OUTPUT);  
  pinMode(TRIG_PIN, OUTPUT);  
  pinMode(ECHO_PIN, INPUT);  
}
```

```
float readDistanceCM() {  
  digitalWrite(TRIG_PIN, LOW);  
  delayMicroseconds(2);  
  digitalWrite(TRIG_PIN, HIGH);  
  delayMicroseconds(10);  
  digitalWrite(TRIG_PIN, LOW);  
  int duration = pulseIn(ECHO_PIN, HIGH);
```

## B11-5A1E

```
    return duration * 0.034 / 2;
}

void loop() {
    float distance = readDistanceCM();

    bool isNearby = distance < 100; digitalWrite(LED_BUILTIN,
    isNearby);

    Serial.print("Measured distance: ");
    Serial.println(readDistanceCM());

    delay(100);
}
```

### Output:

