

ASSIGNMENT 4

Date	07 November 2022
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Write code and connections in wowki for ultrasonic sensor.

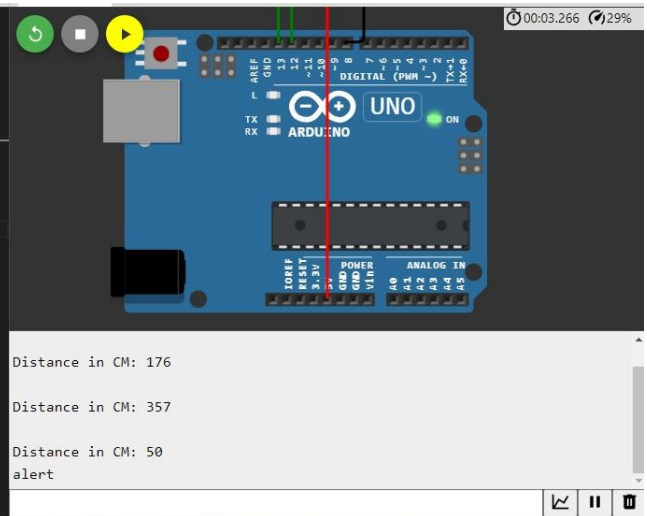
Whenever distance is less than 100cms send “alert” to ibm cloud and display in device recent events.

PROGRAM CODE:

```
#include      "Ultrasonic.h"
Ultrasonic ultrasonic(12, 13);
int distance; void setup() {
Serial.begin(9809);
}
void loop() {
distance = ultrasonic.read(CM);
Serial.print("Distance in CM: ");
Serial.println(distance);      if
(distance < 100)
Serial.print("alert");
Serial.println(); delay(1000);
}
```

OUTPUT:

```
1 #include "Ultrasonic.h"
2 Ultrasonic ultrasonic(12, 13);
3 int distance;
4 void setup() {
5   Serial.begin(9800);
6 }
7 void loop() {
8   distance = ultrasonic.read(CM);
9   Serial.print("Distance in CM: ");
10  Serial.println(distance);
11  if (distance < 100)
12    Serial.print("alert");
13    Serial.println();
14    delay(1000);
15  }
16
17
18
```



The screenshot shows the Arduino IDE interface. The code editor on the left contains the following C++ code:

```
1 #include "Ultrasonic.h"
2 Ultrasonic ultrasonic(12, 13);
3 int distance;
4 void setup() {
5   Serial.begin(9800);
6 }
7 void loop() {
8   distance = ultrasonic.read(CM);
9   Serial.print("Distance in CM: ");
10  Serial.println(distance);
11  if (distance < 100)
12    Serial.print("alert");
13    Serial.println();
14    delay(1000);
15  }
16
17
18
```

The serial monitor on the right displays the output of the program:

```
Distance in CM: 176
Distance in CM: 357
Distance in CM: 50
alert
```

The serial monitor also shows a status bar at the bottom with a green checkmark, a pause icon, and a trash icon.