Date	30 October 2022
Team ID	PNT2022TMID07810
Project Name	IoT Based Gadget child safety monitoring and notification
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ASSIGNMENT-4

Write code and connection in wowki for ultrasonic sensor.When ever distance is less than 100 cm send the alert to IBM cloud and display in device recent event.

```
#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);
```

```arduino
  digitalWrite(TRIG_PIN, HIGH);

  delayMicroseconds(10);

  digitalWrite(TRIG_PIN, LOW);

  int duration = pulseIn(ECHO_PIN, HIGH);

  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);

}
```
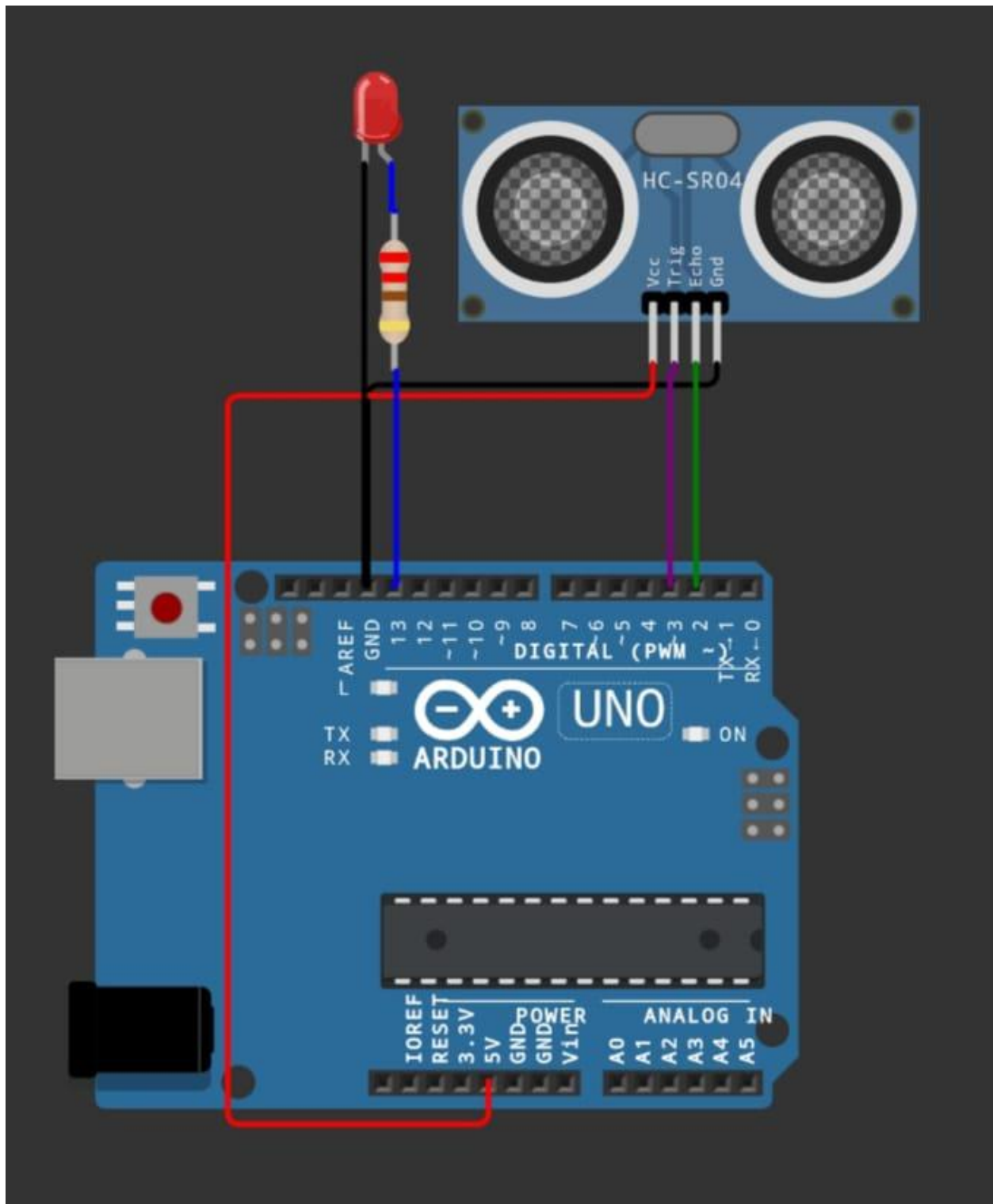
LINK:https://wokwi.com/projects/290056311044833800