

Arduino Ultrasonic Distance Sensor with LED Alert

```
#define TRIG_PIN 6
#define ECHO_PIN 5
#define LED_PIN 12

long duration;
int distance;

void setup() {
    pinMode(TRIG_PIN, OUTPUT);
    pinMode(ECHO_PIN, INPUT);
    pinMode(LED_PIN, OUTPUT);
    Serial.begin(9600);
}

void loop() {
    digitalWrite(TRIG_PIN, LOW);
    delayMicroseconds(2);

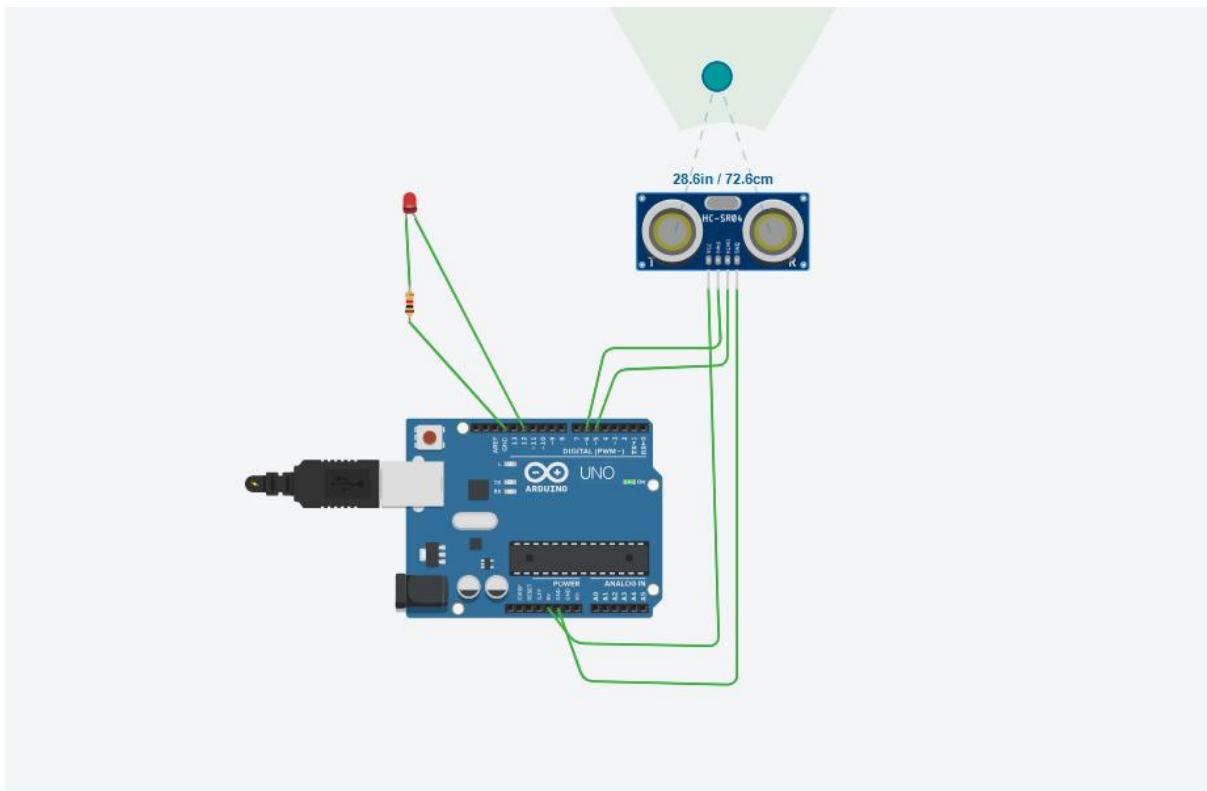
    digitalWrite(TRIG_PIN, HIGH);
    delayMicroseconds(10);
    digitalWrite(TRIG_PIN, LOW);

    duration = pulseIn(ECHO_PIN, HIGH);
    distance = duration * 0.034 / 2; // distance in cm

    if (distance < 100) {
        digitalWrite(LED_PIN, HIGH);
    } else {
        digitalWrite(LED_PIN, LOW);
    }
    Serial.println(distance);
    delay(500);
}
```

Output:

Screen:1



Screen:2

