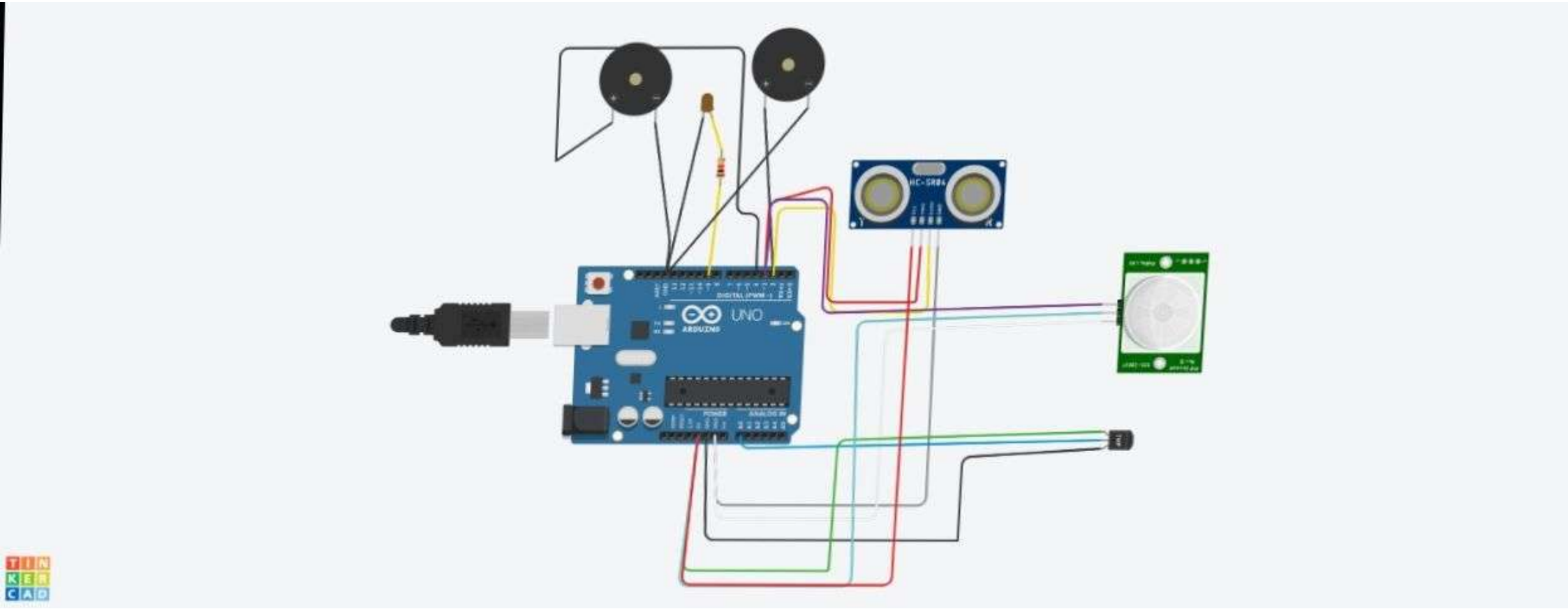
```
#include <LiquidCrystal.h> //LCD library
#define echo 2
#define trig 3
Float  duration; // time taken by the pulse to return back
Float  distance;
Int sensor_Input;
Float temp;// oneway distance travelled by the pulse
LiquidCrystal lcd(13, 12, 11, 10, 9, 8);//lcd(RS,EN,D4,D5,D6,D7)
Void setup() {
pinMode(trig, OUTPUT);
pinMode(echo, INPUT);
Serial.begin(9600);
Lcd.begin(16, 2);
}
Void loop() {
Time_Measurement();
Distance = duration * (0.0343) / 2;// calculate the oneway distance travelled by the pulse
Display_distance();
Measure_Temp();
}
Void time_Measurement()
{ //function to measure the time taken by the pulse to return back
digitalWrite(trig, LOW);
delayMicroseconds(2);
digitalWrite(trig, HIGH);
delayMicroseconds(10);
digitalWrite(trig, LOW);
duration = pulseIn(echo, HIGH);
}
```

```
Void measure_Temp()
{
Sensor_Input = analogRead(A0);
Temp = (float)sensor_Input / 1024;
Temp = temp * 5;
Temp = temp – 0.5;
Temp = temp * 100;
Serial.print(“Temp in C: “);
Serial.print(temp);
Serial.println();
}
Void display_distance()
{ //function to display the distance on LCD/Serial Monitor
Serial.print(“Distance in Cm: “);
Serial.print(distance);
Serial.println();
Delay(1000);
}
```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