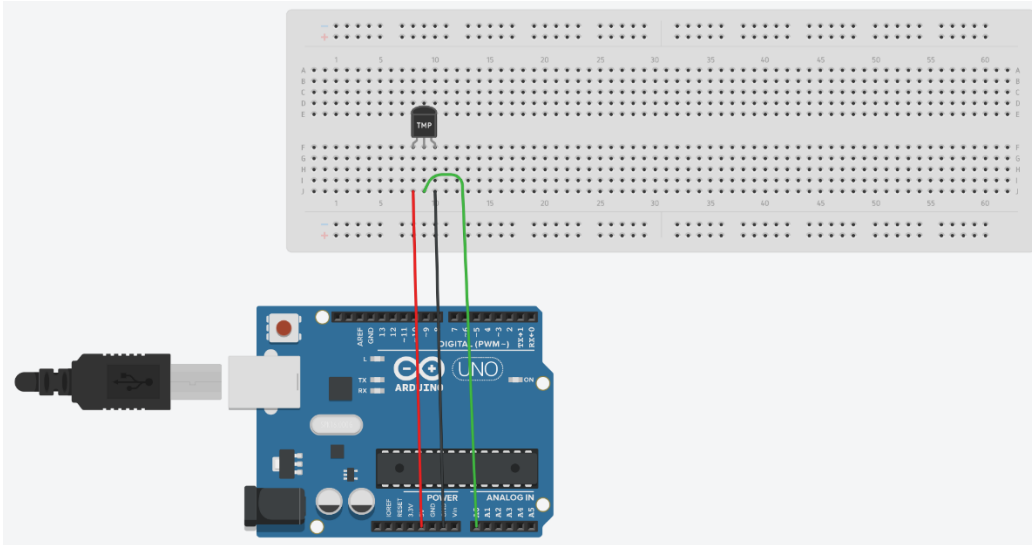


Testing Information

Steps for Setting up

- 1) Connect TMP 36 to breadboard.
- 2) Connect the wires as shown in the following figure. One wire should be connected from A0 to the middle of the TMP pin. Another wire should be connected from "GND" to the right side of the TMP pin. The last wire should be connected from "3V" from the Arduino to the left side of the TMP pin.



- 3) Make sure the wires are in the correct pins before powering on the Arduino.
- 4) Use the following code on Arduino IDE Software

```
14 const int temp_pin=A0;
15 void setup () {
16     Serial.begin(9600);
17 }
18
19 void loop() {
20     float voltage;
21     float temp_c;
22
23     //Read the voltage and conver to temperature
24     voltage= analogRead(temp_pin)*5.0/1023;
25     temp_c=100*voltage-50;
26
27     //Print voltage and temp
28     Serial.print("Voltage: ");
29     Serial.print(voltage);
30     Serial.print("    deg C:    ");
31     Serial.println(temp_c);
32
33     delay(500);}
```

Getting the Results on Excel

- 1) Download "Data Streamer" on Excel
- 2) Connect USB-A to B Cable from Arduino to a laptop.

- 3) Open Data Streamer tab on Excel

The following sheets will appear

- i. Data In
 - ii. Data Out
 - iii. Settings
- 4) Begin streaming data
 - 5) Save into a text file
 - 6) Plot data