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Keyestudio Flame Sensor



Introduction

This flame sensor can be used to detect fire or other lights with wavelength stands at 760nm ~ 1100nm.

In the fire-fighting robot game, the flame plays an important role in the probe, which can be used as the robot's eyes to find fire source.

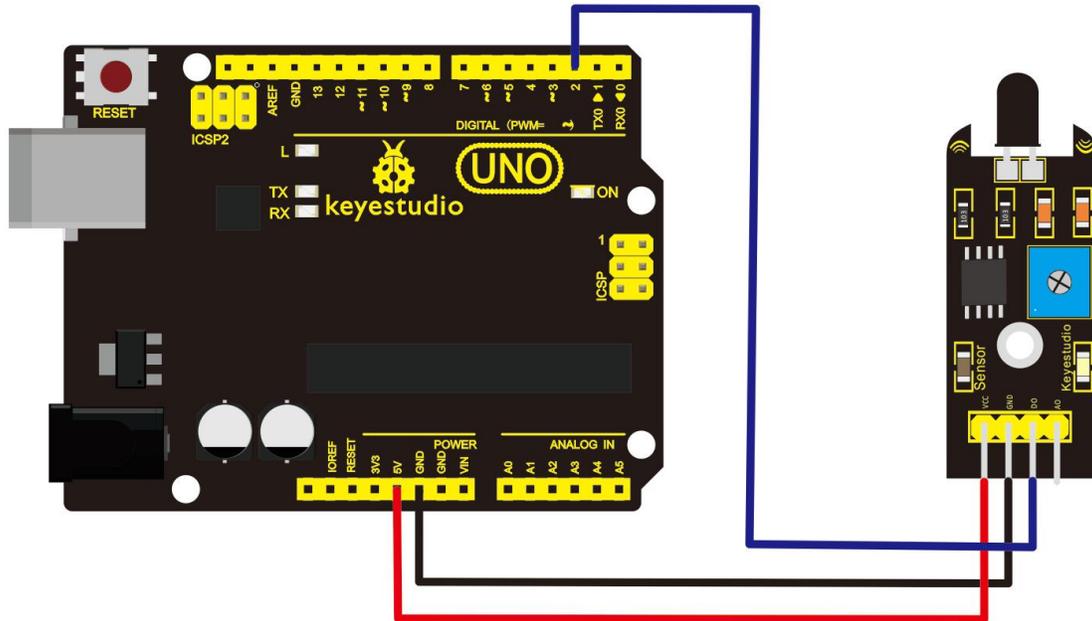
Specification

- Supply Voltage: 3.3V to 5V
- Detection range: 20cm (4.8V) ~ 100cm (1V)
- Rang of Spectral Bandwidth: 760nm to 1100nm
- Operating temperature: -25°Cto 85°C
- Interface: digital

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Connection Diagram

Connect the D0 pin to digital 2, GND pin to GND port, VCC pin to 5V port.



Sample Code:

```
const int flamePin = 2;      // the number of the flame pin
const int ledPin = 13;      // the number of the LED pin
// variables will change:
int State = 0;              // variable for reading status
void setup() {
  // initialize the LED pin as an output:
  pinMode(ledPin, OUTPUT);
  // initialize the pushbutton pin as an input:
  pinMode(flamePin, INPUT);
```

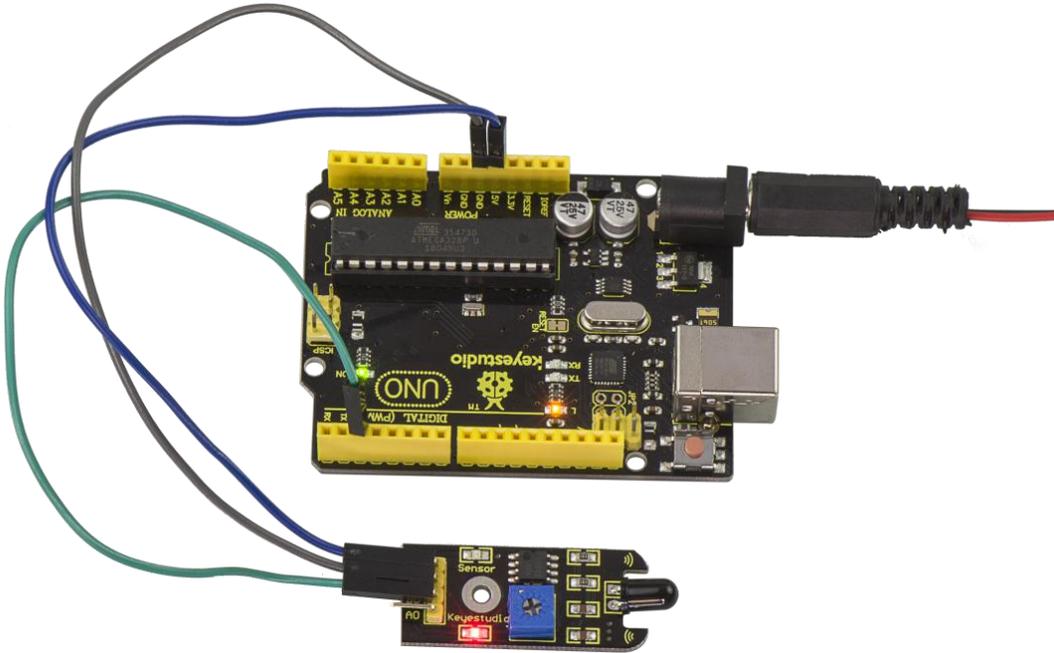
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```
}  
void loop(){  
    // read the state of the value:  
    State = digitalRead(flamePin);  
    if (State == HIGH) {  
  
        // turn LED on:  
        digitalWrite(ledPin, HIGH);  
    }  
    else {  
        // turn LED off:  
        digitalWrite(ledPin, LOW);  
    }  
}  
*****
```

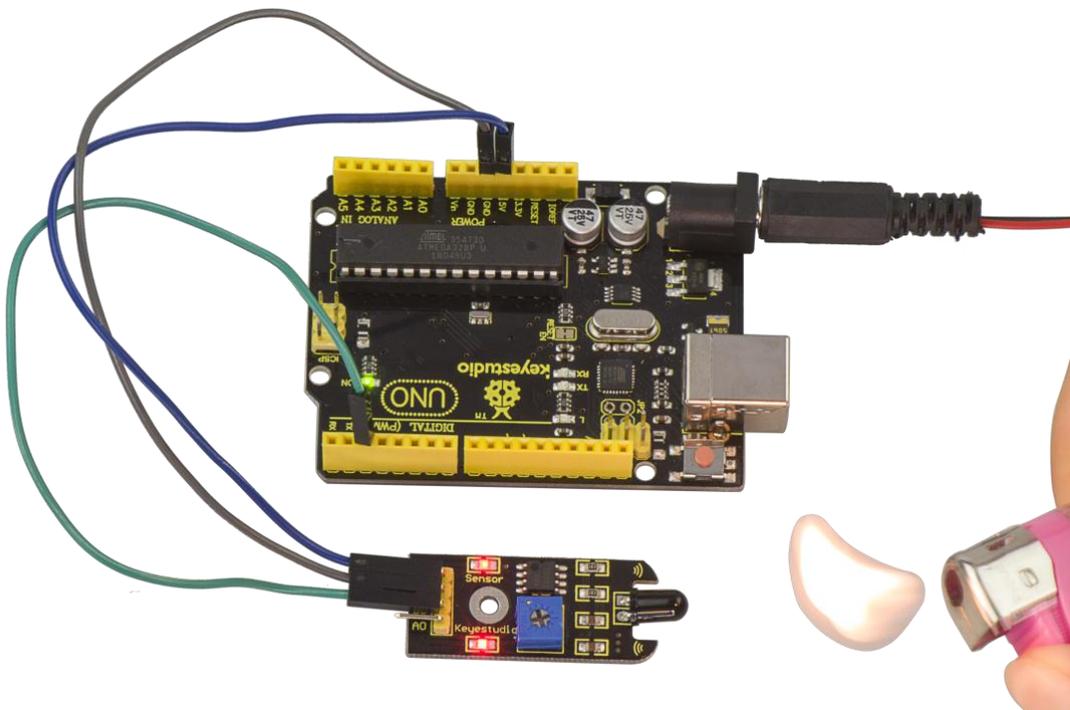
Example Result

Done wiring and powered up, upload well the code to the board.

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Then if you put a lighter close to the sensor, when the sensor detects the flame, another led on the sensor is turned on.



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Resource:

<https://fs.keystudio.com/KS0036>