

DFR0392 DFRduino M0

Robot Controller

DFR0398 Romeo BLE Quad

Mainboard Arduino Compatible

DFR0416 Bluno M0 Mainboard

Introduction Features Specification Pinout Dimensions Tutorial FAQ More Documents

COMMUNITY NEW

SKU:SEN0550

FORUM

BLOG

Introduction

This Gravity: Water Flow Sensor is designed based on the electromagnetic principle. It adopts oring rubber seal and



EDUCATION

interference and anti-vibration capabilities, offering reliable performance and long service life. The sensor can be used with microcontrollers like Arduino UNO to measure the flow of liquids with high concentration and low mucosity like water, diesel, engine oil, milk, paint, detergent, honey,

waterproofness. Also, it embraces high anti-electromagnetic

etc. (no impurity in liquid) **Features**

· Gravity interface, easy to wire Wide voltage of 3.5~24V

- Measure the flow of the high-concentration but low-viscosity
- liquid
- · RoHS compliant
- Operating Voltage: DC3.5~24V

Specification

Operating Current: ≤10mA (DC5V)

- · Output Mode: NPN pulse signal
- Pipe Diameter: G1/2
- Thread O.D.: 20.5mm/0.81"
- Thread Length: 29mm/1.14"

Thread I.D.: 10mm/0.39"

- Water Pressure Resistance: ≤1.2MPA
- Insulation Resistance: >100MΩ Flow Range: 30-1200L/H
- Error Range: ±1% (5-600L/H)
- Low Level of Output Pulse: <DC0.5V (input voltage DC5V)

Duty Cycle of Output Pulse: 50%±10%

• High Level of Output Pulse: > DC4.7V (input voltage DC5V)

Operating Temperature: ≤80°C

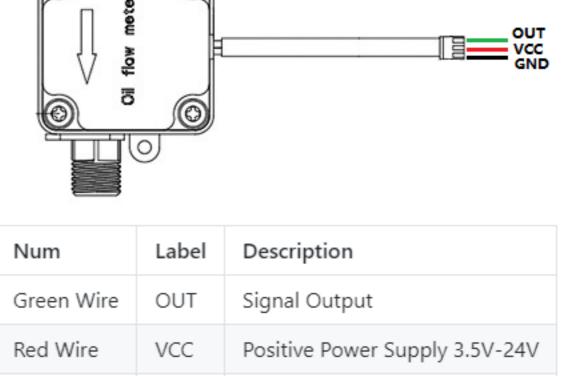
Operating Humidity: 35%~90%RH (no frosting)

Flow & Pulse Correlation: 1L=150 pulses

- Storage Temperature: -25°~+80°C • Storage Humidity: 25%~95%RH
- Dimensions: 80×47×37mm/3.15×1.85×1.46"
- **Pinout**

Black Wire

Dimensions



Negative Power Supply

†		

o DFRduino UNO R3 (or similar) x 1

GND



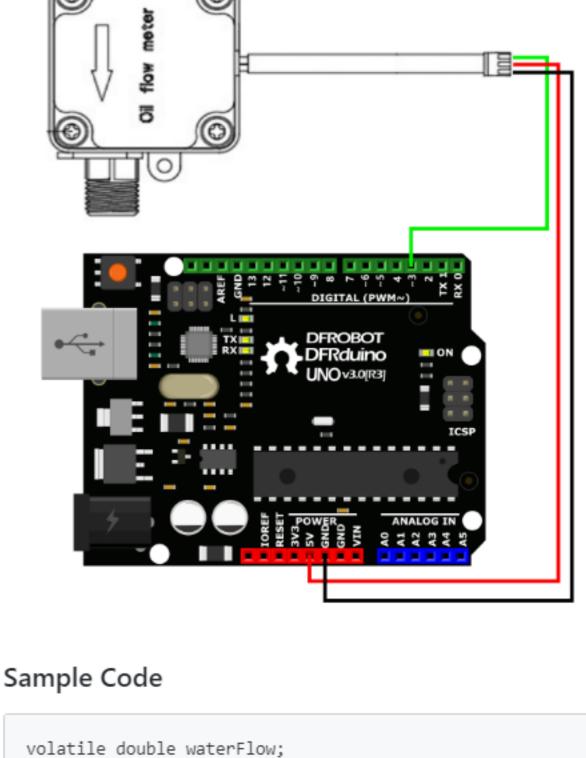
Water Flow Sensor x 1

Hardware

Arduino IDE

Software

Connection Diagram



void setup() {

```
Serial.begin(9600); //baudrate
    waterFlow = 0;
    attachInterrupt(1, pulse, RISING); //DIGITAL Pin 3: Interru
  void loop() {
    Serial.print("waterFlow:");
    Serial.print(waterFlow);
    Serial.println(" L");
    delay(500);
  void pulse() //measure the quantity of square wave
    waterFlow += 1.0 / 150.0; // 150 pulses=1L (refer to product
FAQ
```

DFRobot Forum.

For any questions, advice or cool ideas to share, please visit the

More Documents

Get Gravity: Water Flow Sensor (G1/2) from DFRobot Store or **DFRobot Distributor.**

Turn to the Top