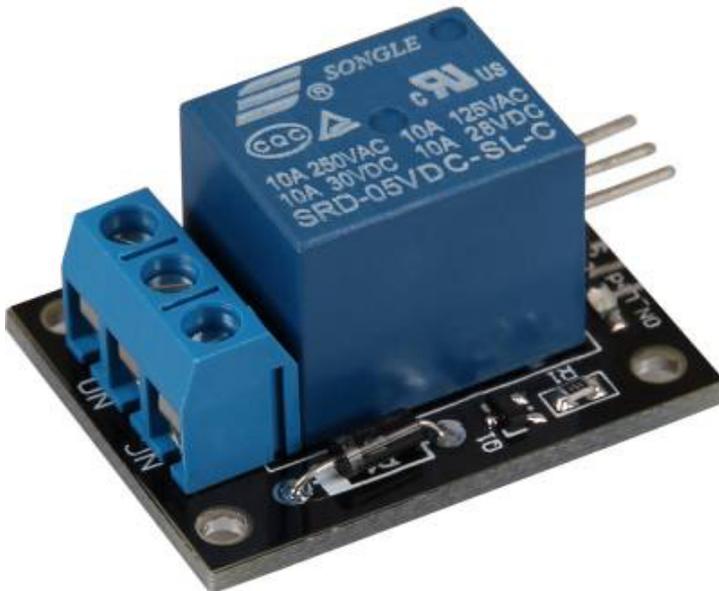


KY-019 5V Relais module

Contents

1 Picture	1
2 Technical data / Short description	1
3 Pinout	2
4 Code example Arduino	2
5 Code example Raspberry Pi	3

Picture



Technical data / Short description

Voltage range: 240VAC / 10A | 28VDC / 10A A relay to switch higher voltages via 5V output.

!!!! Caution !!!!

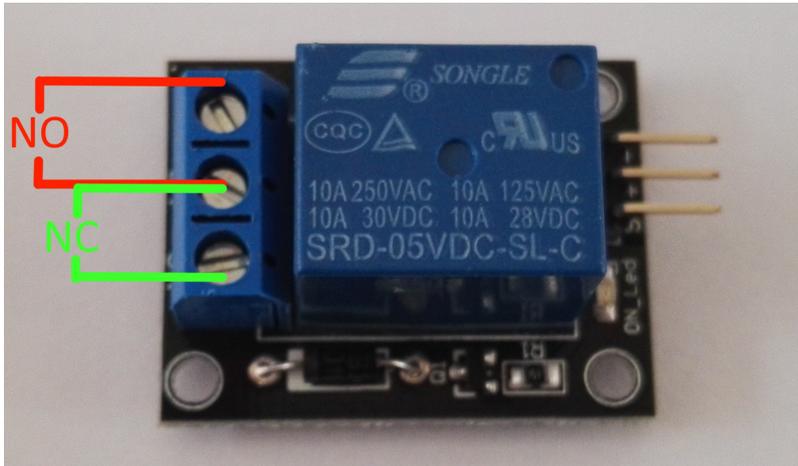
Working with voltages over 30V and a main voltage (230V) can harm your body or kill you. We advise you not to work with higher voltages unless you have the needed experience.

!!!! Caution !!!!

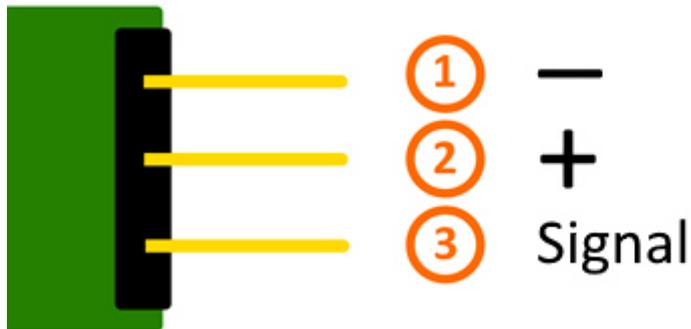
The output bar of the Relais has two output terminals.

KY-019 5V Relais module

- The first one is tagged with NC for "normally closed" which means that it's connected through by default.
 - The second one is tagged with NO for "normally open" which means it's not connected through by default.
- To switch both, you need a signal.



Pinout



Code example Arduino

The program imitates a direction indicator - it switches the status of the output terminals in a specific time period (delayTime).

```
int relay = 10; // Declaration of the pin which is connected with the relay
delayTime = 1 // The time which will be waited between the switches of the relay.

void setup ()
{
  pinMode (relay, OUTPUT); // Declaration of the pin to output
}
```

KY-019 5V Relais module

```
// The program imitates a direction indicator
void loop ()
{
  digitalWrite (relay, HIGH); // "NO" is now connected through
  delay (delayTime * 1000);
  digitalWrite (relay, LOW); // "NC" is now connected through
  delay (delayTime * 1000);
}
```

Connections Arduino:

Sensor -	=	[Pin GND]
Sensor +	=	[Pin 5V]
Sensor Signal	=	[Pin 10]

Example program download[KY-019_Relais](#)

Code example Raspberry Pi

The program imitates a direction indicator - it switches the status of the output terminals in a specific time period.

```
# Needed modules will be imported and configured
import RPi.GPIO as GPIO
import time

GPIO.setmode(GPIO.BCM)
# Declaration of the break between the changes of the relay status (in seconds)
delayTime = 1

# Declaration of the input pin which is connected with the sensor.
RELAIS_PIN = 21
GPIO.setup(RELAIS_PIN, GPIO.OUT)
GPIO.output(RELAIS_PIN, False)

print "Sensor-test [press ctrl+c to end]"

# Main program loop
try:
    while True:
        GPIO.output(RELAIS_PIN, True) # NO is now connected through
        time.sleep(delayTime)
        GPIO.output(RELAIS_PIN, False) # NC is now connected through
        time.sleep(delayTime)

# Scavenging work after the end of the program
except KeyboardInterrupt:
    GPIO.cleanup()
```

Connections Raspberry Pi:

Relais -	=	GND	[Pin 06]
Relais +	=	5V	[Pin 2]
Relais Signal	=	GPIO24	[Pin 18]

KY-019 5V Relais module

Example program download[KY-019_RPi_Relais](#)

To start, enter the command:

```
sudo python KY-019_RPi_Relais.py
```