

Write a Python Code For Blinked LED And Traffic Lights In Raspberry Pi

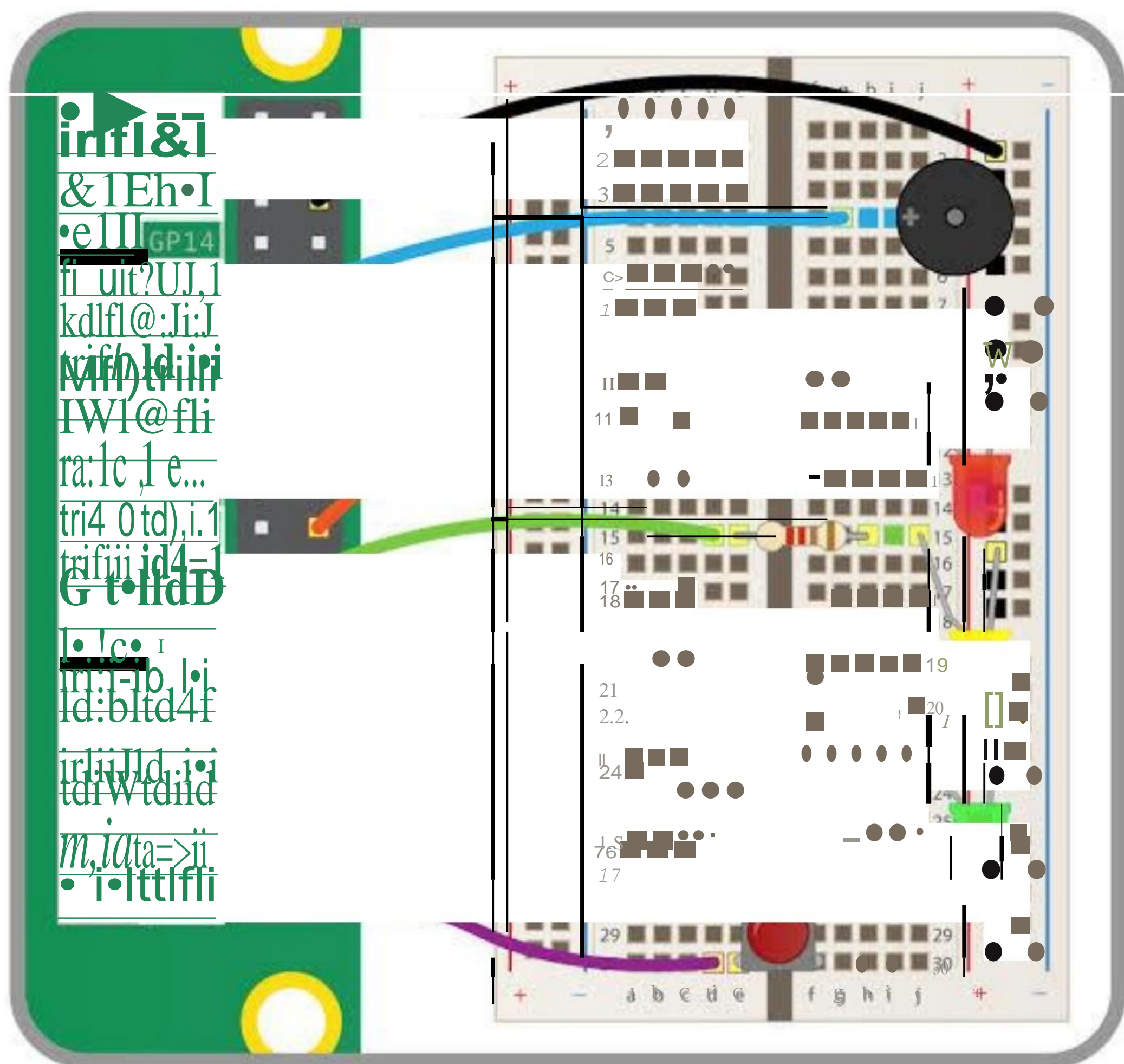
Assignment-3

By

M.Suba

952319106034

Write a code for Blinked LED and Traffic Lights in Raspberry Pi



Coding for Blinked LED

Import **RPi.GPIO** as **GPIO** # **RPi.GPIO** can be referred as **GPIO** from now

Import time

ledPin = 22 # pin22

def setup():

 GPIO.setmode(GPIO.BOARD) # GPIO
Numbering of Pins

 GPIO.setup(ledPin, GPIO.OUT) # Set
ledPin as output

 GPIO.output(ledPin, GPIO.LOW) # Set
ledPin to LOW to turn Off the LED

Def loop():

 While True:

```

    Print 'LED on'

    GPIO.output(ledPin, GPIO.HIGH)  #
LED On

    Time.sleep(1.0)                  # wait 1 sec

    Print 'LED off'

    GPIO.output(ledPin,  GPIO.LOW)  #
LED Off

    Time.sleep(1 .0)                  # wait 1 sec

Def endprogram():

    GPIO.output(ledPin,  GPIO.LOW)  # LED
Off

    GPIO.cleanup()                    # Release
resources

If __name__ == '__main__':          # Program starts
from here

    Setup()

    Try:

        Loop()

```

```
Light Except KeyboardInterrupt: # When  
'Ctrl+C' is pressed, the destroy() will be executed  
  
Endprogram()
```

Coding for Traffic lights

```
from gpiozero import LED
```

```
from time import sleep
```

```
Green = LED(17)
```

```
Yellow = LED(27)
```

```
Red = LED(22)
```

```
def switchLights (greenLight, yellowLight,  
redLight, sleepTime):
```

If greenLight:

Green.on()

Else:

Green.off()

If yellowLight:

Yellow.on()

Else:

Yellow.off()

If redLight:

Red.on()

Else:

Red.off()

Sleep(sleepTille)

While True:

switchLights (True, False, False, 10)

switchLights (False, True, False, 1)

switchLights (False, False, True, 10)

switchLights (False, True, True, 1)

