

ASSIGNMENT -3

Question:- Write a python code for Blinking LED and Traffic lights for Raspberry Pi .

LED Blinking:-

```
import RPi.GPIO as GPIO

import time

ledPin=22

def setup():

    GPIO.setmode(GPIO.BOARD)

    GPIO.setup(ledPin,GPIO.OUT)

    GPIO.output(ledPin,GPIO.LOW)

def loop():

    While True:

        Print 'LED on'

        GPIO.output(ledPin,GPIO.HIGH)
```

```
        Time.sleep(1.0)

        Print 'LED off'

        GPIO.output(ledPin,GPIO.LOW)

        Time.sleep(1.0)

def endprogram():

        GPIO.output(ledPin,GPIO.LOW)

        GPIO.cleanup()

if __name__ == '__main__':

        setup()

try:

        loop()

except KeyboardInterrupt:

        endprogram()
```

TRAFFIC LIGHT python code:-

```
from gpiozero import LED

from time import sleep
```

```
red=LED(17)
```

```
yellow=LED(22)
```

```
green=LED(27)
```

```
While True:
```

```
    red.on()
```

```
    sleep(15)
```

```
    red.off()
```

```
    sleep(1)
```

```
    yellow.on()
```

```
    sleep(10)
```

```
    yellow.off()
```

```
    sleep(1)
```

```
    green.on()
```

```
    sleep(10)
```

```
    green.off()
```

```
    sleep(1)
```