

### Assignment -3

#### Python Programming

Assignment Date	06 October 2022
Student Name	Mr.NANDHAKUMAR S
Student Roll Number	GCTC1914L10
Maximum Marks	2 Marks

Write Python Code For Blinking LED And Traffic Lights For Raspberry Pi

#### BLINKING LED

```
import RPi.GPIO as GP
from time import sleep
GP.setwarnings(False)
GP.setmode(GP.BOARD)
GP.setup(8,GP.OUT,initial=GP.LOW)

while True:                                #infinite loop
    GP.output(8, GPIO.HIGH)  # Turn on
    print("The LED is ON")
    sleep(2)                    # Sleep for 2 second

    GP.output(8, GPIO.LOW)  # Turn off
    print("The LED is OFF")
    sleep(2)                # Sleep for 2 second
```

#### TRAFFIC LIGHT

```
from gpiozero import LED
from time import sleep
red= LED(17)                #pin numbers connected to Led's
aster=(22)
green=(27)
while True:
    red.on()                #RED light
    print("Red light is ON")
    for i in range(100,0,-1):
        print("Remaining time: ",i)
        sleep(1)
    red.off()

    aster.on()              # ASTER light
```

```
print("Yellow light is ON")
for i in range(5,0,-1):
    print("Remaining time: ",i)
    sleep(1)
aster.off()
```

```
green.on          #GREEN light
print("Green light is ON")
for i in range(30,0,-1):
    print("Remaining time: ",i)
    sleep(1)
green.off()
```