# IBM ASSIGNMENT : 3

|  |  |
| --- | --- |
| **TEAMID** | PNT2022TMID17666 |
| **PROJECTNAME** | IOT BASED SAFETY GADGET FOR CHILD SAFETY MONITORING AND NOTIFICATION |
| **NAME** | JANANI ISHWARYA |
| **REGNO** | 611619205016 |

ASSIGNMENT-3

# PYTHONCODEFORBLINKINGLED AND TRAFFIC LIGHTS BY USING RASPBERRY PI

importRPi.GPIOasGPIO#ImportRaspberryPiGPIOlibrary

fromtime importsleep#Importthesleepfunctionfromthetimemodule

GPIO.setwarnings(False) # Ignore warning for nowGPIO.setmode(GPIO.BOARD)#Usephysicalpinnumbering

GPIO.setup(8,GPIO.OUT,initial=GPIO.LOW) #Setpin8 to beanoutputpinandset initialvaluetolow(off)

while True: # Run foreverGPIO.output(8, GPIO.HIGH) # Turn onsleep(1) # Sleep for 1 secondGPIO.output(8, GPIO.LOW) # Turn offsleep(1)# Sleepfor1second

import RPi.GPIO asGPIOimporttime

import signalimportsys

# SetupGPIO.setmode(GPIO.BCM)GPIO.setup(9, GPIO.OUT)GPIO.setup(10, GPIO.OUT)GPIO.setup(11,GPIO.OUT)

# Turn off all lights when user ends demodef allLightsOff(signal,frame):

GPIO.output(9, False)GPIO.output(10,False)GPIO.output(11,False)GPIO.cleanup()sys.exit(0)

signal.signal(signal.SIGINT,allLightsOff)

# Loop foreverwhile True:

#RedGPIO.output(9,True)

time.sleep(3)

# Red and amberGPIO.output(10,True)time.sleep(1)

# GreenGPIO.output(9, False)GPIO.output(10,False)GPIO.output(11, True)time.sleep(5)

# Amber

GPIO.output(11,False)GPIO.output(10, True)time.sleep(2)

# Amber off (red comes on at top of loop)GPIO.output(10,False)