Source Code:

import pygame

import random

pygame.init()

# Colors

white = (255, 255, 255)

red = (255, 0, 0)

black = (0, 0, 0)

green = (17,100,4)

background\_green = (109,243,88)

# Creating window

screen\_width = 900

screen\_height = 600

gameWindow = pygame.display.set\_mode((screen\_width, screen\_height))

# Game Title

pygame.display.set\_caption("My first Game ")

pygame.display.update()

clock = pygame.time.Clock()

font = pygame.font.SysFont(None, 55)

def text\_screen(text, color, x, y):

screen\_text = font.render(text, True, color)

gameWindow.blit(screen\_text, [x,y])

# def snack\_head(x, y):

# pygame.draw.ellipse(gameWindow,green,[x,y,10,10])

# pass

# def snack\_body():

# pass

def plot\_snake(gameWindow, color, snk\_list, snake\_size):

for x,y in snk\_list:

pygame.draw.ellipse(gameWindow, green, [x, y, snake\_size, snake\_size])

# pygame.draw.ellipse(gameWindow, white, [x , y , 10,10])

# pygame.draw.ellipse(gameWindow, white, [x+20, y, 10, 10])

# Game Loop

def gameloop():

# Game specific variables

exit\_game = False

game\_over = False

snake\_x = 45

snake\_y = 55

velocity\_x = 0

velocity\_y = 0

snk\_list = []

snk\_length = 1

# Ploting the food on the game window

food\_x = random.randint(20, screen\_width / 2)

food\_y = random.randint(20, screen\_height / 2)

score = 0

init\_velocity = 5

snake\_size = 30

fps = 20

while not exit\_game:

if game\_over:

gameWindow.fill(white)

text\_screen("Game Over!", red, 150, 150)

text\_screen("your score : " + str(score \* 10) ,red,150,250)

#text\_screen()

for event in pygame.event.get():

if event.type == pygame.QUIT:

exit\_game = True

if event.type == pygame.KEYDOWN:

if event.key == pygame.K\_RETURN:

gameloop()

else:

for event in pygame.event.get():

if event.type == pygame.QUIT:

exit\_game = True

if event.type == pygame.KEYDOWN:

if event.key == pygame.K\_RIGHT:

velocity\_x = init\_velocity

velocity\_y = 0

if event.key == pygame.K\_LEFT:

velocity\_x = - init\_velocity

velocity\_y = 0

if event.key == pygame.K\_UP:

velocity\_y = - init\_velocity

velocity\_x = 0

if event.key == pygame.K\_DOWN:

velocity\_y = init\_velocity

velocity\_x = 0

snake\_x = snake\_x + velocity\_x

snake\_y = snake\_y + velocity\_y

if abs(snake\_x - food\_x)<20 and abs(snake\_y - food\_y)<20:

score +=1

food\_x = random.randint(20, screen\_width / 2)

food\_y = random.randint(20, screen\_height / 2)

snk\_length +=5

gameWindow.fill(background\_green)

text\_screen("Score: " + str(score \* 10), red, 5, 5)

pygame.draw.rect(gameWindow, red, [food\_x, food\_y, snake\_size, snake\_size])

head = []

head.append(snake\_x)

head.append(snake\_y)

snk\_list.append(head)

if len(snk\_list)>snk\_length:

del snk\_list[0]

if head in snk\_list[:-1]:

game\_over = True

if snake\_x<0 or snake\_x>screen\_width or snake\_y<0 or snake\_y>screen\_height:

game\_over = True

plot\_snake(gameWindow, black, snk\_list, snake\_size)

pygame.display.update()

clock.tick(fps)

pygame.quit()

quit()

gameloop()

Output:

