



PyGame Intro

Monday 23rd - Game Jam Lesson
By Jake Roggenbuck

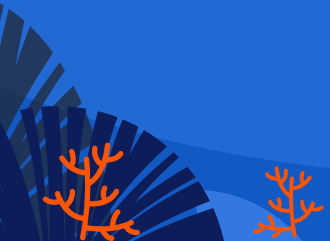
PyGame Init

```
import pygame

pygame.init()

win = pygame.display.set_mode( (500, 500) )

pygame.display.set_caption("Ocean Game")
```



Constants

```
RUN = True

while RUN:
    # ...

pygame.quit()
```

Game Loop

```
while RUN:
    pygame.time.delay(10)

    for event in pygame.event.get():
        if event.type == pygame.QUIT:
            RUN = False

        keys = pygame.key.get_pressed()

    pygame.display.update()

pygame.quit()
```

Keys

```
keys = pygame.key.get_pressed()

if keys[pygame.K_UP]:
    print("UP")

if keys[pygame.K_DOWN]:
    print("DOWN")

if keys[pygame.K_LEFT]:
    print("LEFT")

if keys[pygame.K_RIGHT]:
    print("RIGHT")
```

More vars

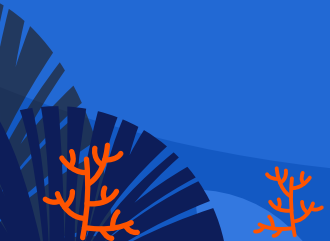
```
X = 200
```

```
Y = 200
```

```
VEL = 2
```

```
WIDTH = 10
```

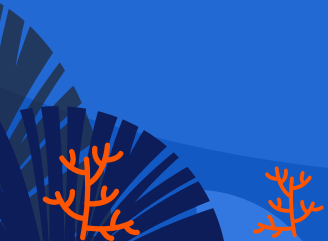
```
HEIGHT = 10
```



Image

<https://www.pixilart.com>

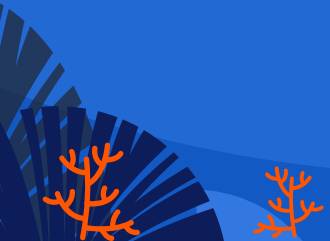
```
RIGHT_FISH = pygame.image.load("./fish.png")  
RIGHT_FISH = pygame.transform.scale(RIGHT_FISH, (80, 80))  
LEFT_FISH = pygame.transform.flip(RIGHT_FISH, True, False)
```



Direction

LEFT = 1
RIGHT = 2

DIRECTION = RIGHT



Full

```
while RUN:
    # ...

    keys = pygame.key.get_pressed()

    if keys[pygame.K_LEFT] and X > 0:
        X -= VEL
        DIRECTION = LEFT

    if keys[pygame.K_RIGHT] and X < 500 - WIDTH:
        X += VEL
        DIRECTION = RIGHT
```

```
if keys[pygame.K_UP] and Y > 0:  
    Y -= VEL  
  
if keys[pygame.K_DOWN] and Y < 500 - HEIGHT:  
    Y += VEL  
  
win.fill((0, 0, 0))  
fish = RIGHT_FISH if DIRECTION == RIGHT else LEFT_FISH  
win.blit(fish, (X, Y))  
  
pygame.display.update()
```

<https://github.com/JakeRoggenbuck/ocean-game>

