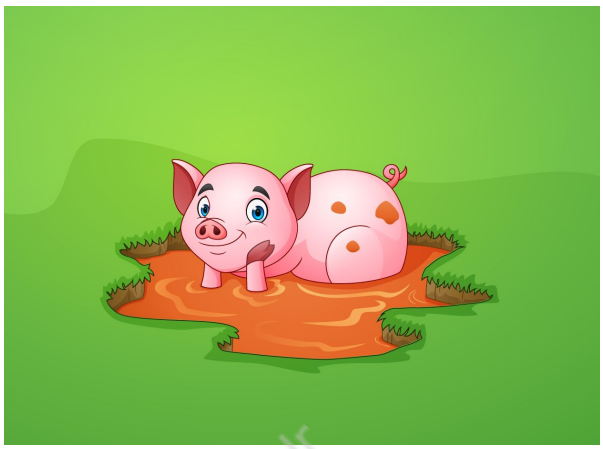
PRO-C30

Vanishing pigs



What is our GOAL for this MODULE?

The goal for this module is to remove a pig object when hit and add a vanishing effect to it.

What did we ACHIEVE in the class TODAY?

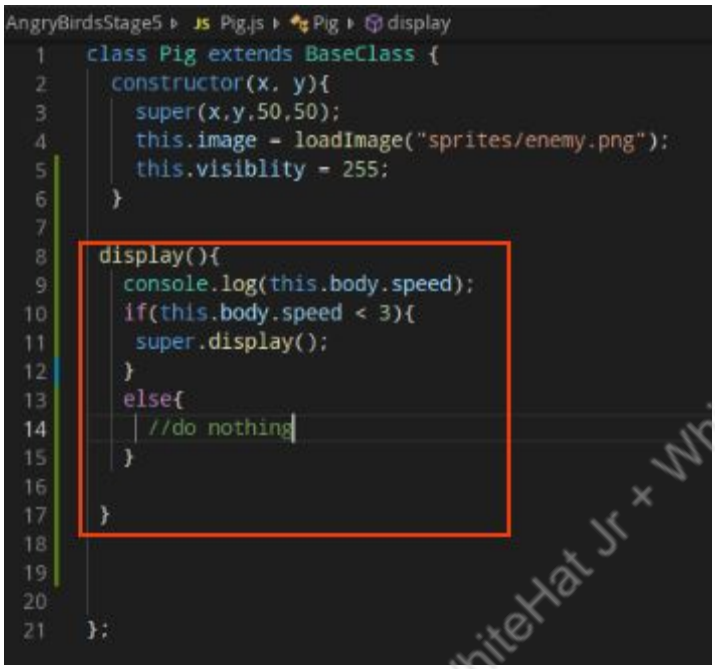
- Removed the pig object from the world when the pig is hit
- Added vanishing effect to the pig
- Used keyboard events to attach the bird back to the sling

Which CONCEPTS/ CODING BLOCKS did we cover today?

- Removing the object from the world.
- Using keyboard events to attach the bird back to the sling

How did we DO the activities?

When a bird has hit the pig, some of its properties change - like its speed, momentum etc. When dealing with the pig objects, to preserve readability, we wrote pig.js thus, display() function was called in every frame since it was called inside draw().



The code to remove the object from the world:

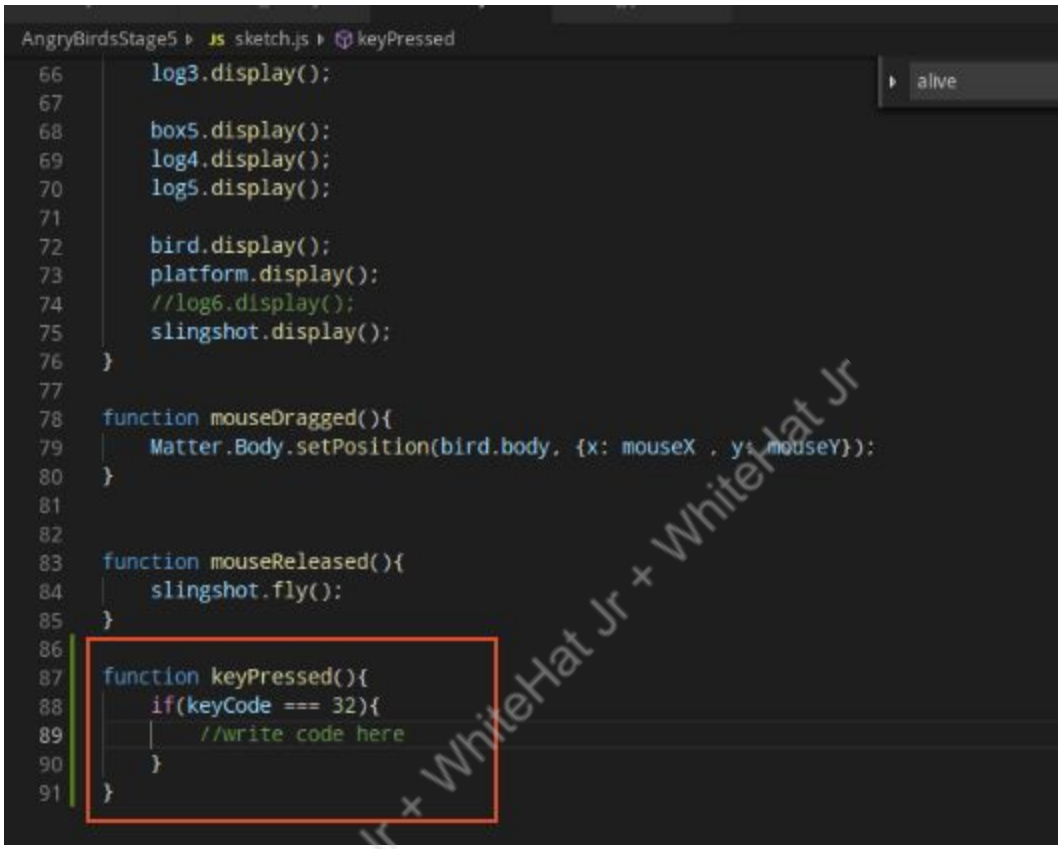
In order to make the pig vanish gradually (and not abruptly), we used tint():

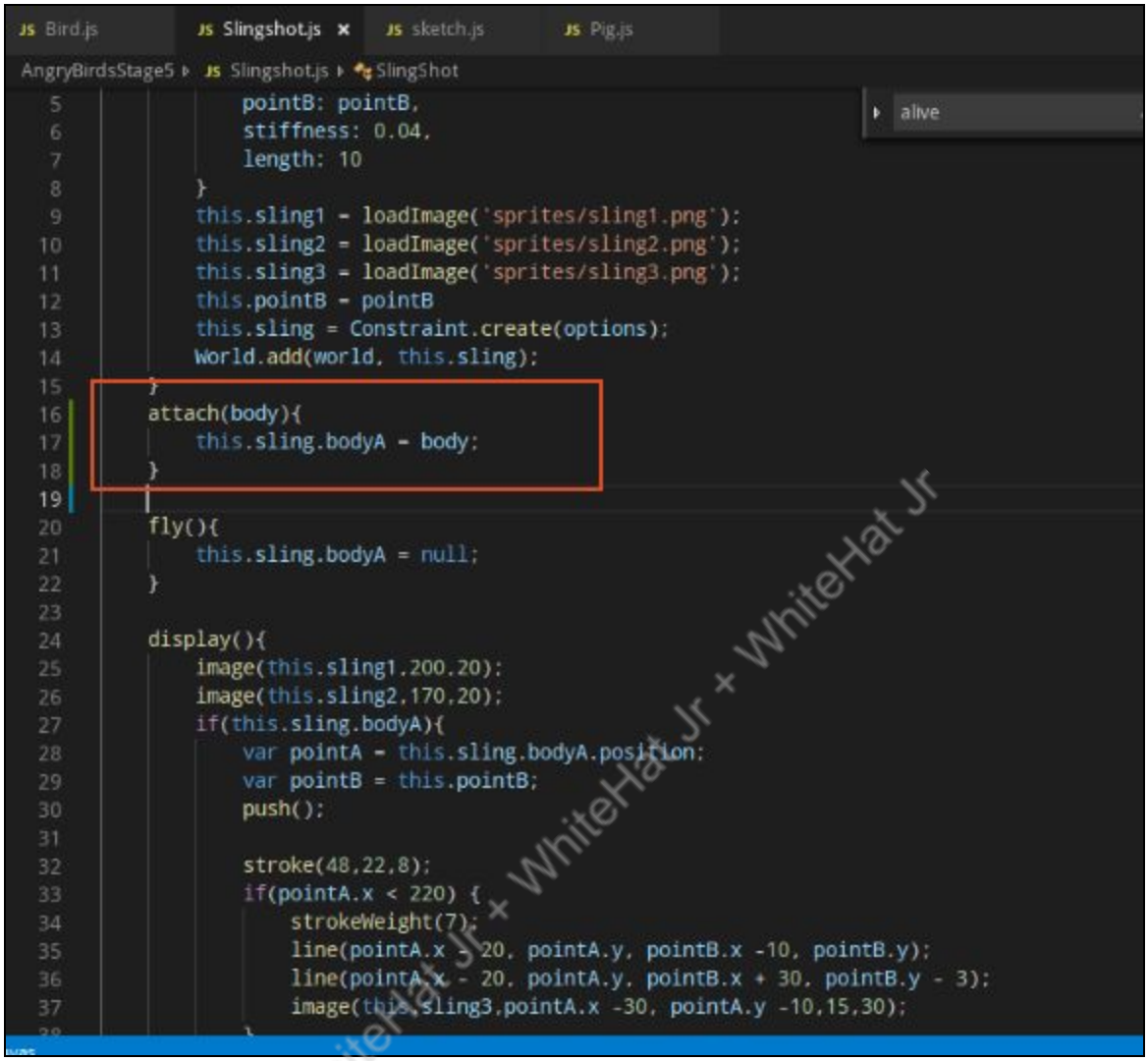
```
class Pig extends BaseClass {
  constructor(x, y){
    super(x,y,50, 50);
    this.image = loadImage("sprites/enemy.png");
    this.Visiblity = 255;
  }

 display(){
   console.log(this.body.speed);
   if(this.body.speed < 3){
    super.display();
   }
   else{
    World.remove(world, this.body);
    tint(255,this.Visiblity);
    image(this.image, this.body.position.x, this.body.position.y, 50, 50);
   }

 }


};
```

We reduced the visibility by 5 in every frame:

```
class Pig extends BaseClass {
  constructor(x, y){
    super(x,y,50,50);
    this.image = loadImage("sprites/enemy.png");
    this.Visiblity = 255;
  }

 display(){
  console.log(this.body.speed);
  if(this.body.speed < 3){
   super.display();
  }
  else{
    World.remove(world, this.body);
    push();
    this.Visiblity = this.Visiblity - 5;
    tint(255,this.Visiblity);
    image(this.image, this.body.position.x, this.body.position.y, 50, 50);
    pop();
  }

 }


};
```

We used ASCII value of ‘space’ key to instruct the computer to attach the bird back to slingshot when the key is pressed:





What's NEXT?

In the next class, you will be learning about arrays and bird trajectory.

EXTEND YOUR KNOWLEDGE:

You can learn more about the keyboard events from following link
https://www.geeksforgeeks.org/p5-js-keyboard-keyisdown/#:~:text=js%20%7C%20Keyboard%20%7C%20keyIsDown(),-Last%20Updated%3A%2016&text=The%20keyIsDown()%20function%20in,as%20moving%20a%20sprite%20diagonally.