

UI: Scribble

Create your Firework

>+<

Canvas
position absolute

Click event
listener
→ löst Roullete
aus



RadioButton
position
absolute

Size

Color

Shape

Circle

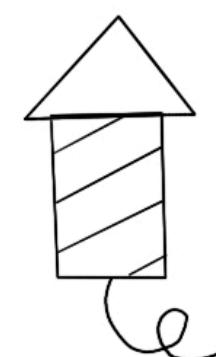
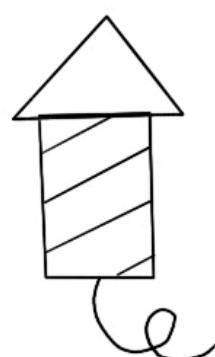
Square

Radio button
position absolute

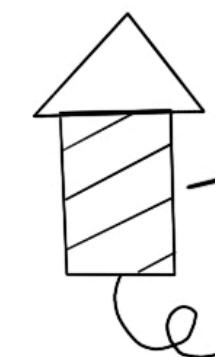
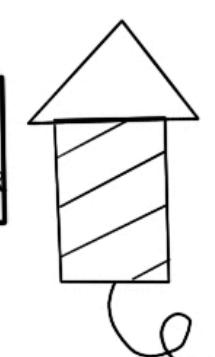
Button

Save

A horizontal form with three sections: "Size", "Color", and "Shape". Each section contains a radio button. Below the form are four stylized firework icons.

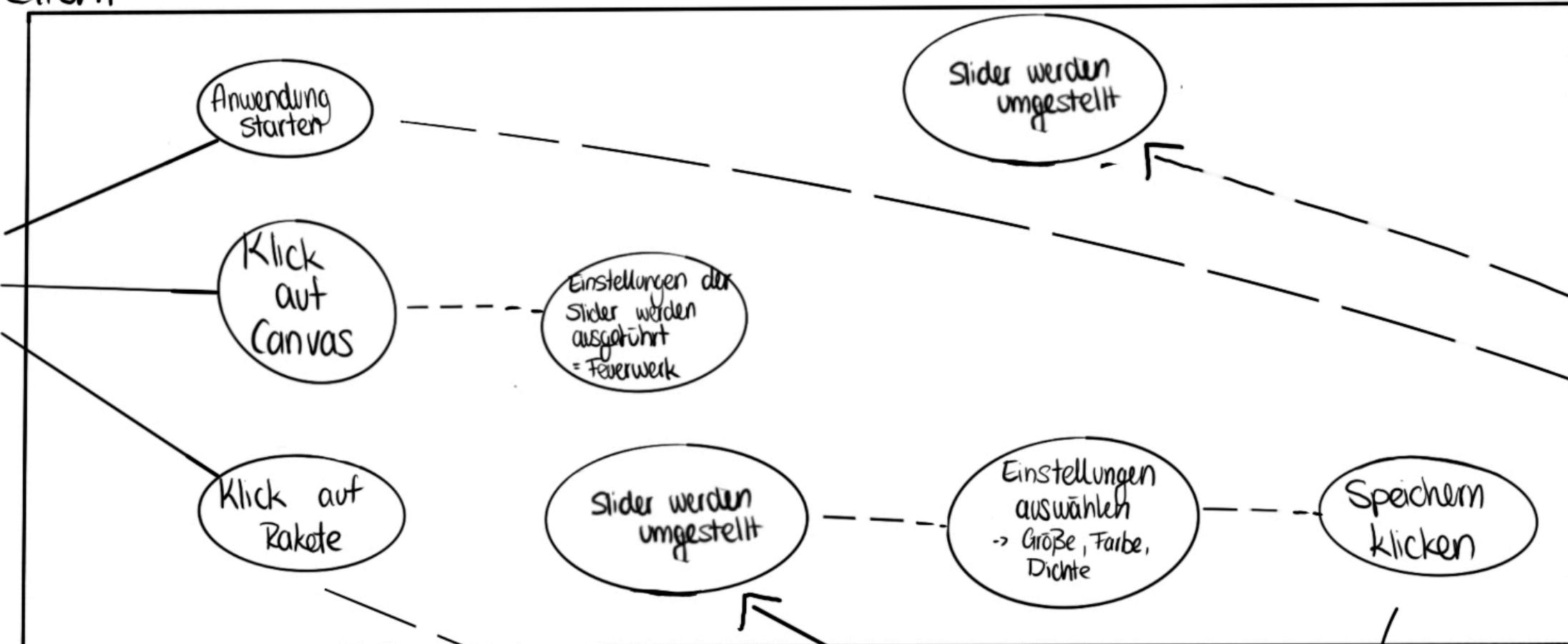


Color
wheel
position
absolute



Buttons
position
absolute

Client



Server



Particle

color: string
radius: number
speed: Vector
opacity: number

lifetime: number
position: Vector

constructor (-color, -position, -lifetime)

```
{  
    speed = new Vector(Math.Random)  
    position = new Vector(this.position.x, y)  
    this.position = position  
    this.color = color  
    this.radius = Math.random  
    this.speed = speed (Math.random)  
    this.opacity = 1  
    this.lifetime = -lifetime  
}  
draw();  
move();
```

Vector

x: number
y: number

constructor (-x, -y){
 this.set (-x, -y) }

set (-x, -y): void
add (addend: Vector): void

Circle

is a round Particle

constructor (-color, -lifetime,
 -position) {
 super(-color, -position, -lifetime)
 this.draw() }

draw () ;

Rocket

color: string
shape: string
position: Vector
lifetime: number

Particles: Particle = []

constructor (-color, -shape, -position, -lifetime) {

```
position = new Vector (-x, -y)  
this.color = -color  
this.shape = -shape  
this.position = position  
this.lifetime = -lifetime  
this.explode();
```

explode();
draw();

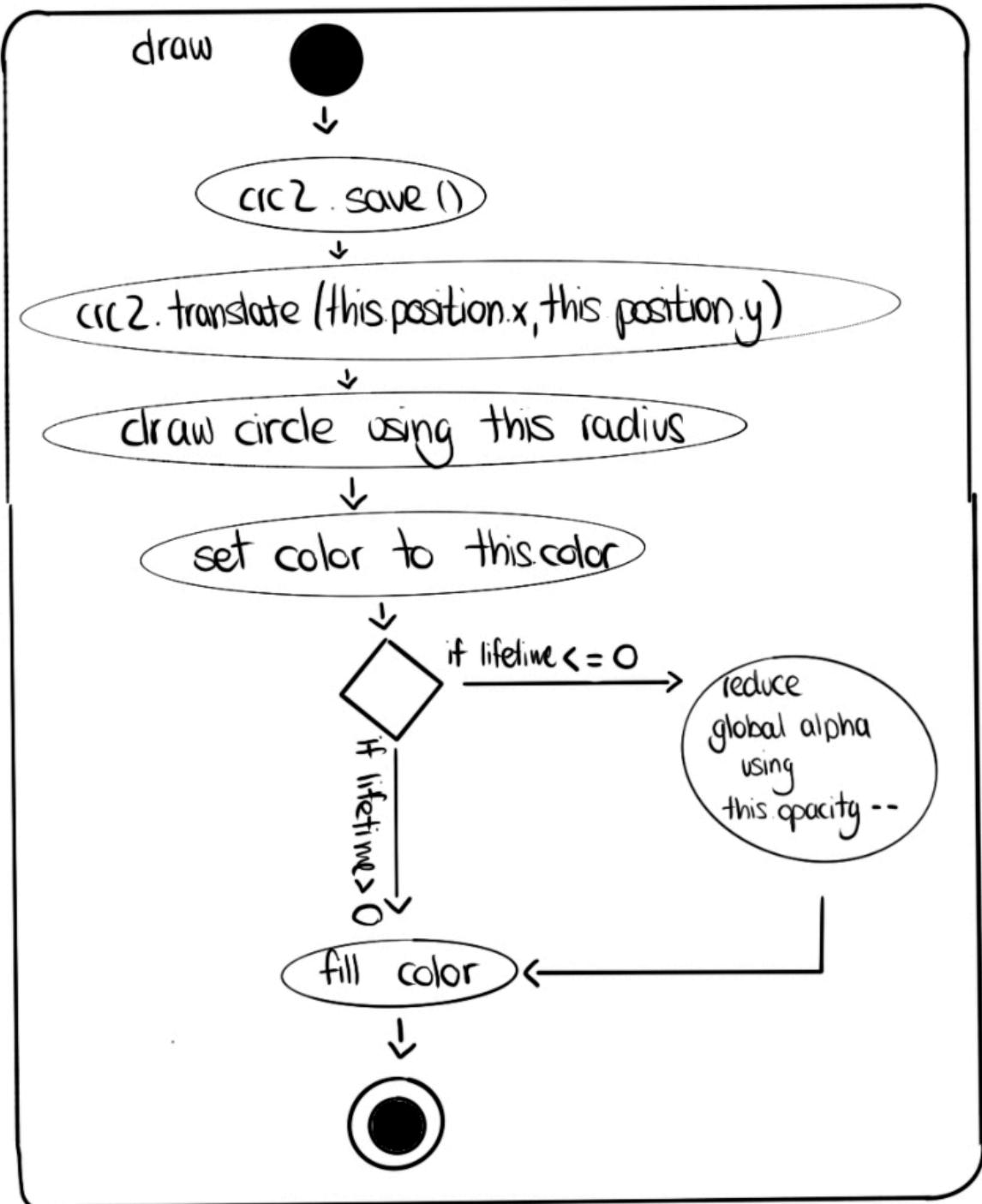
Square

is a square Particle

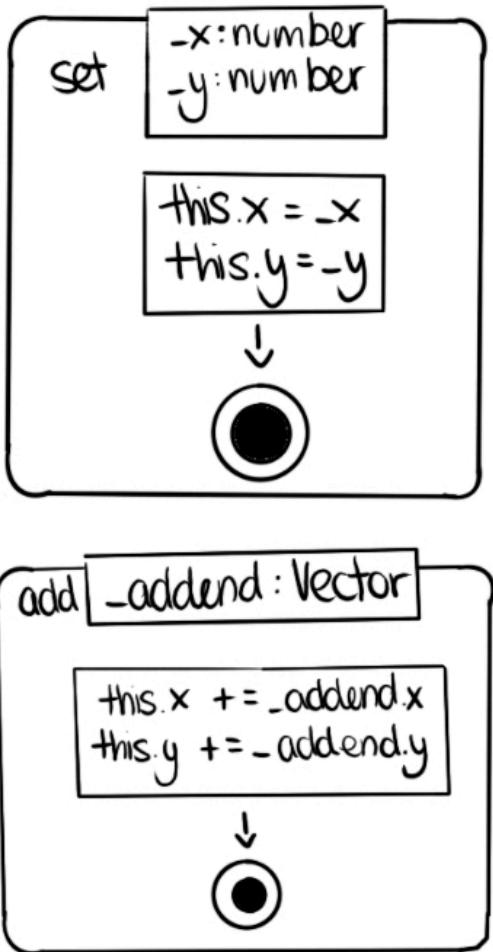
constructor (-color, -lifetime,
 -position) {
 super(-color, -position, -lifetime)
 this.draw() }

draw () ;

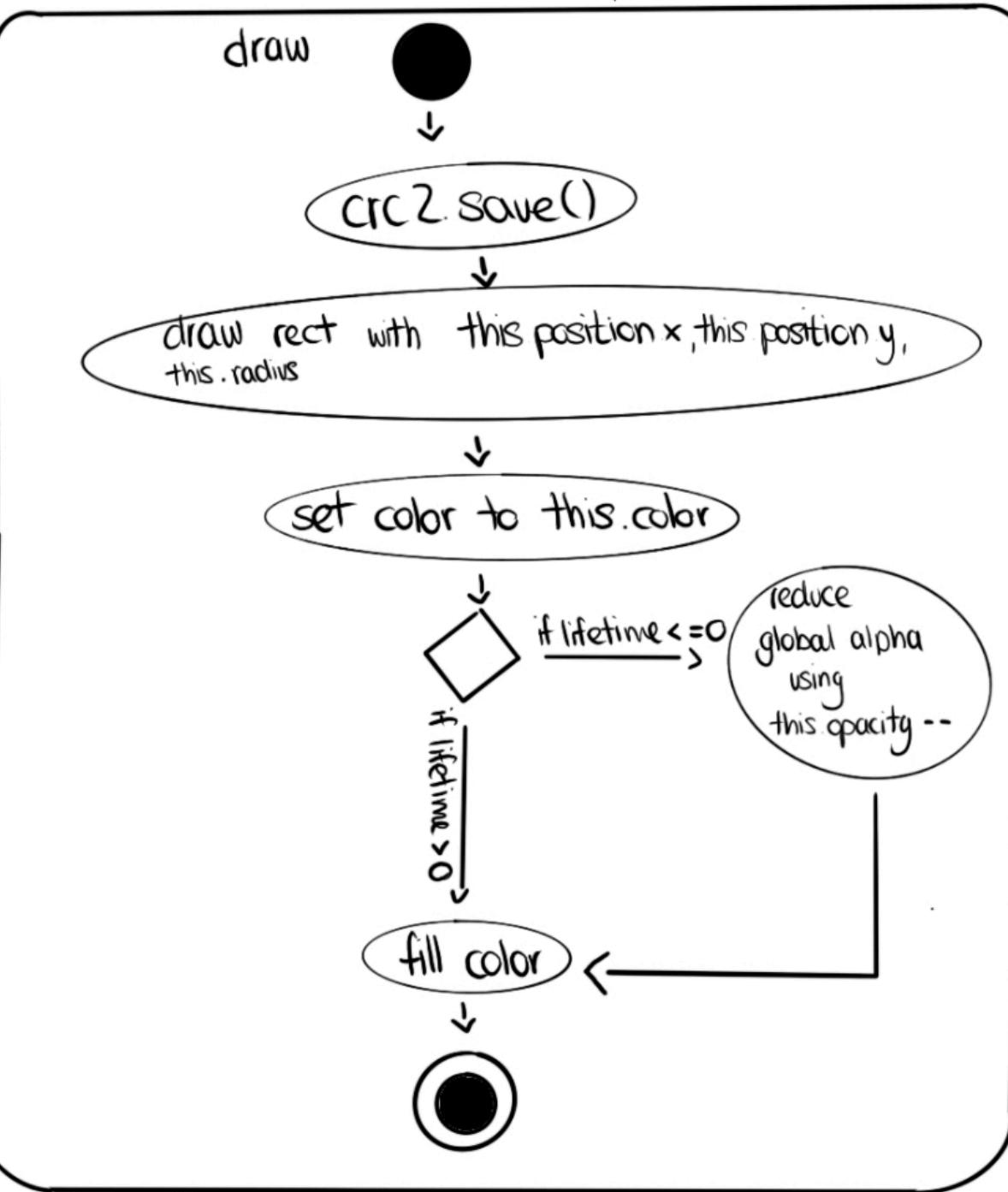
Circle



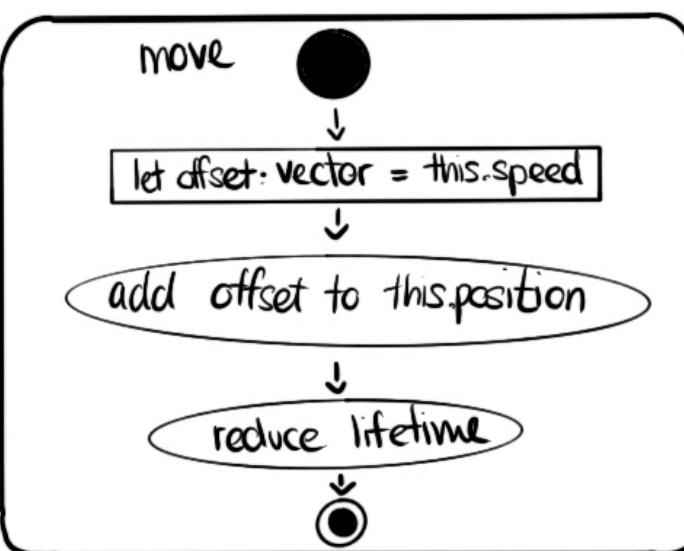
Vector



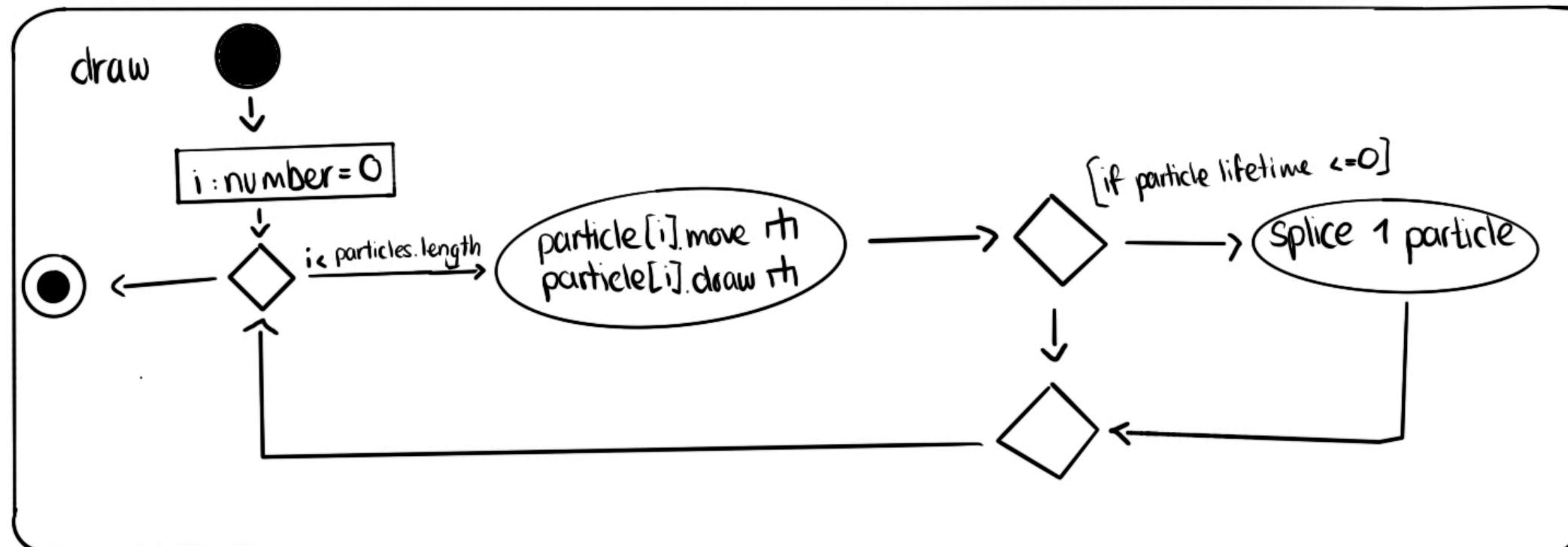
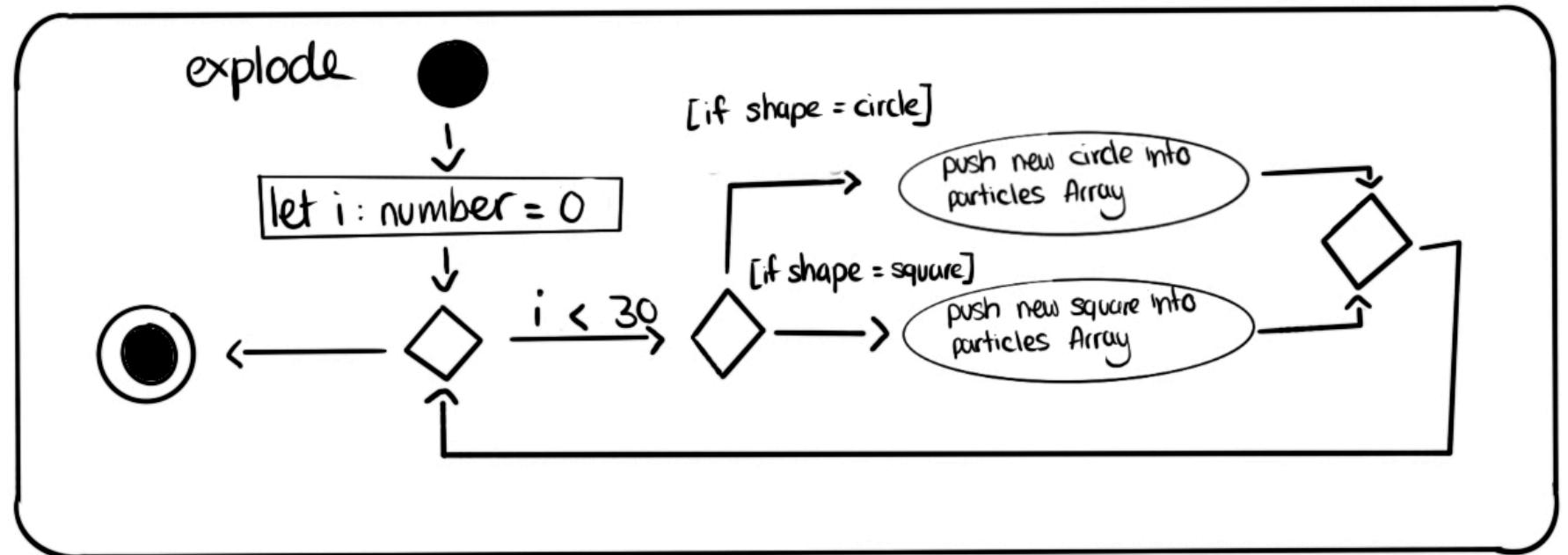
Square



Particle



Rocket

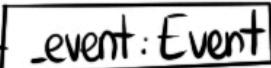


Main



```

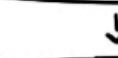
let crc2: CanvasRenderingContext2D
let canvas: HTMLCanvasElement
let lifetime: number
let color: string
let shape: string
let rocket: Rocket[] = []
let rs1: boolean = true
let rs2: " " = false
let rs3: " " = ""
let rs4: " " = ""
    
```



handleLoad



set canvas = html canvas
set crc2 = canvas context



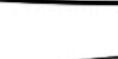
adjust canvas height and width



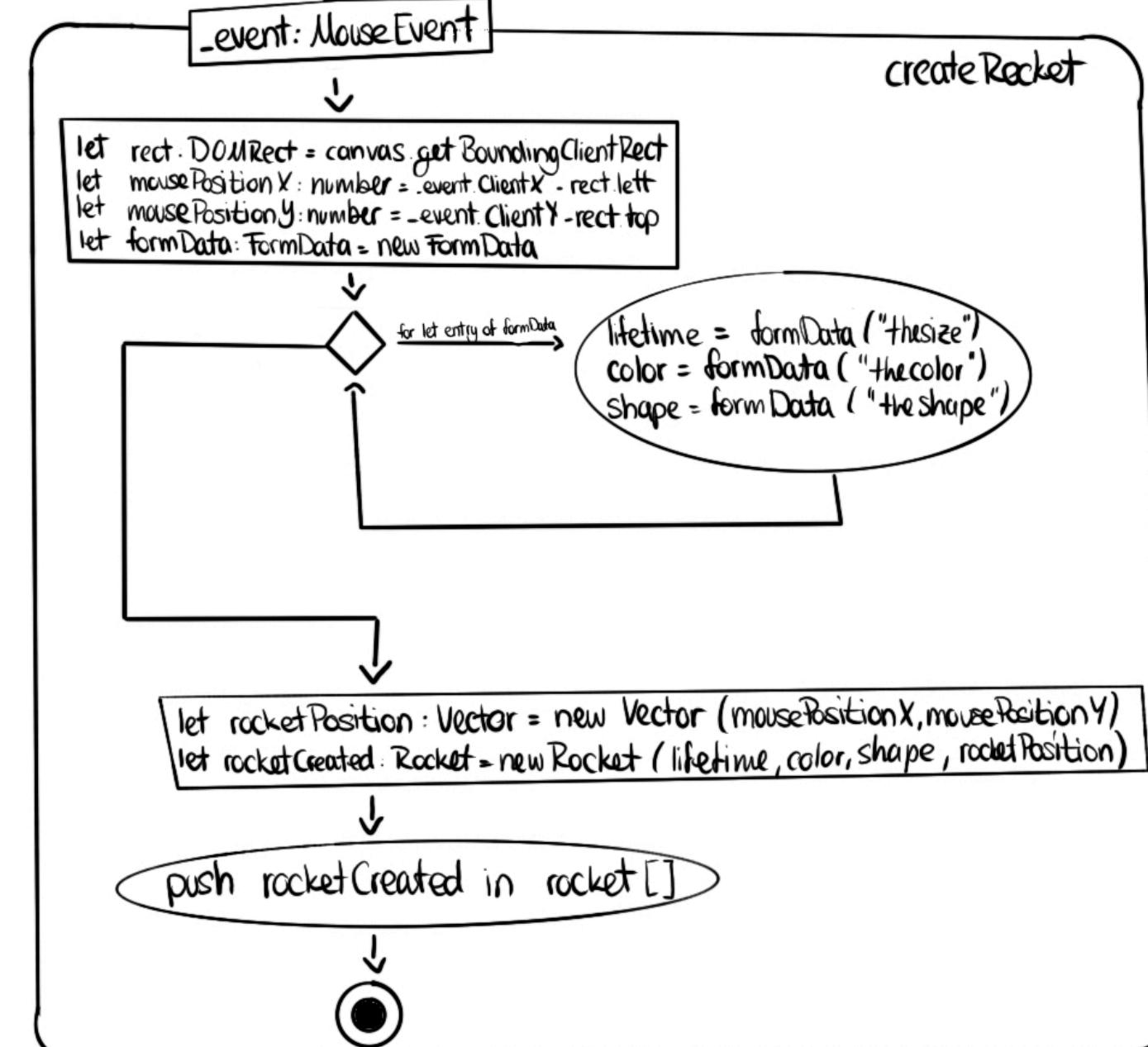
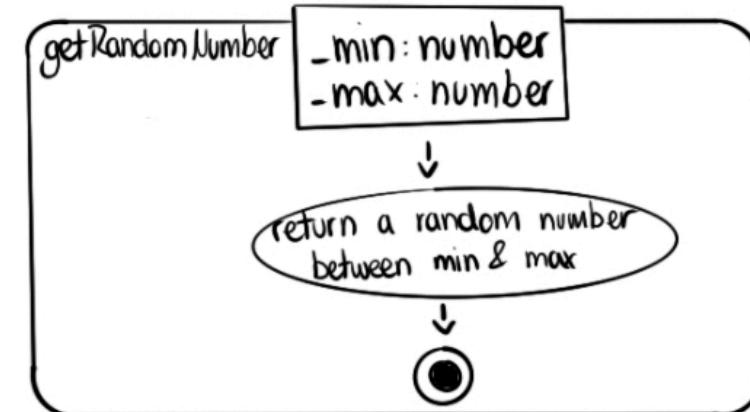
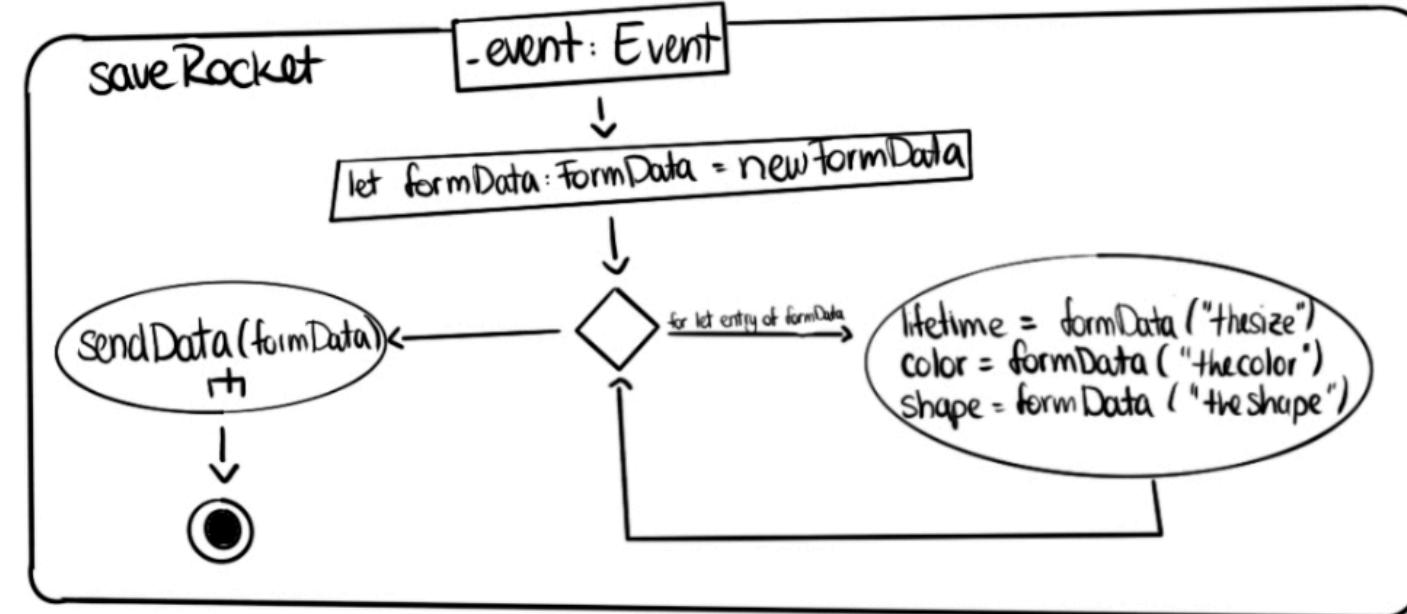
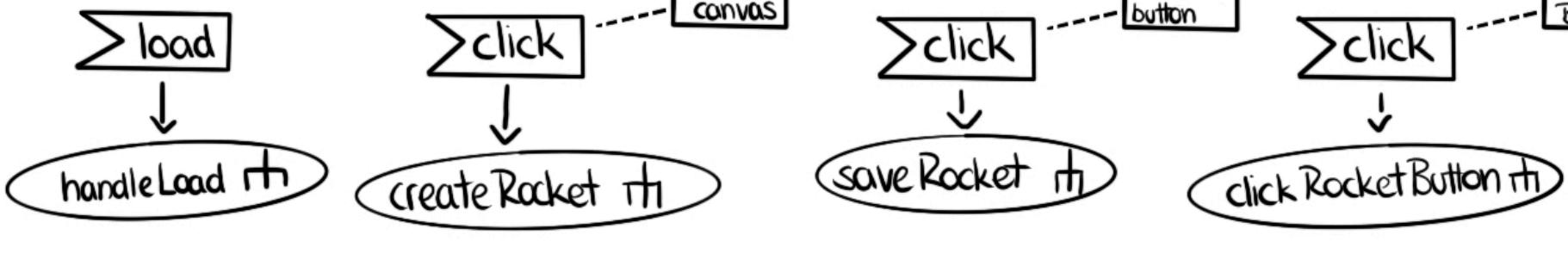
install click listener on
canvas, save button and the
4 Rocket buttons



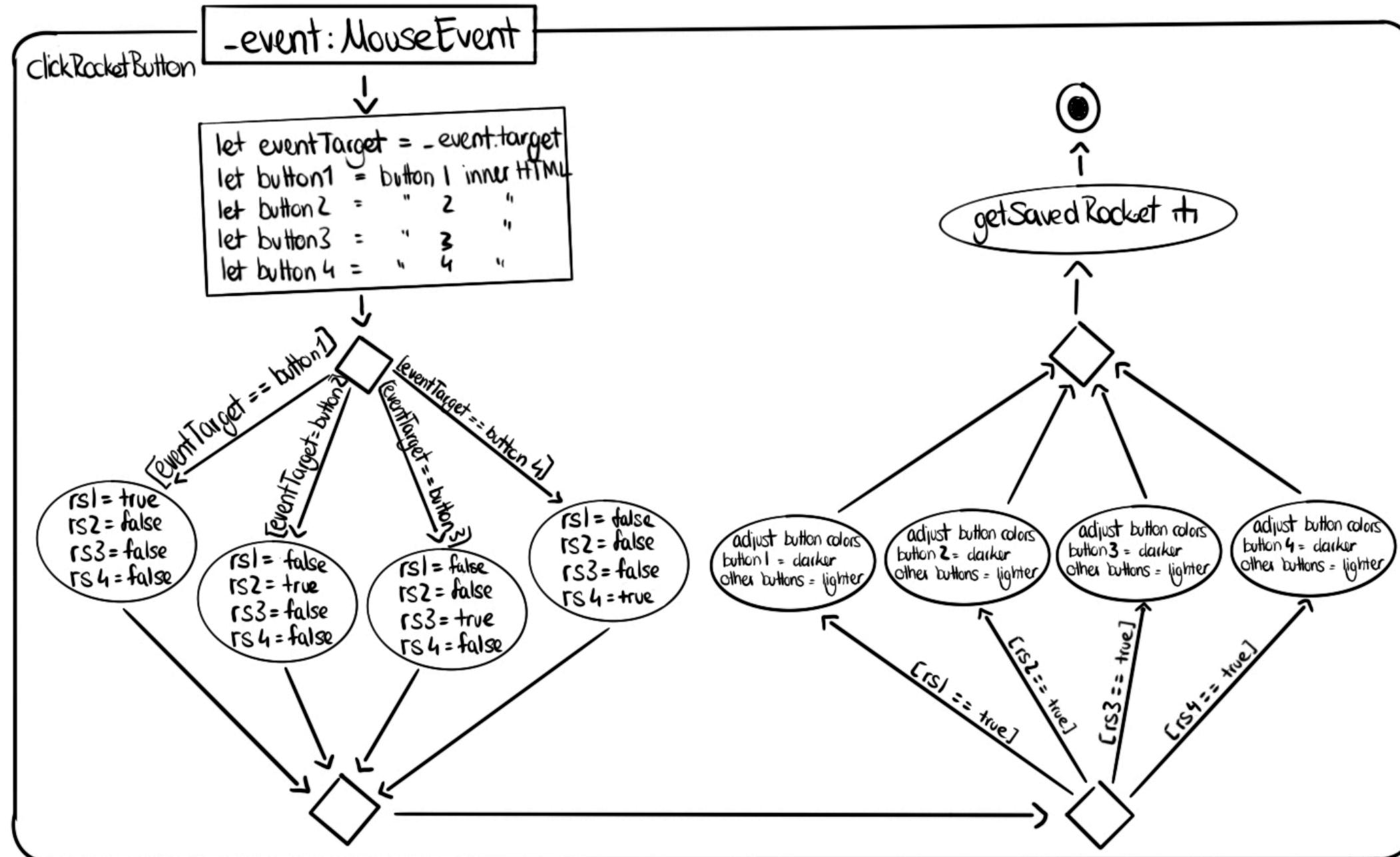
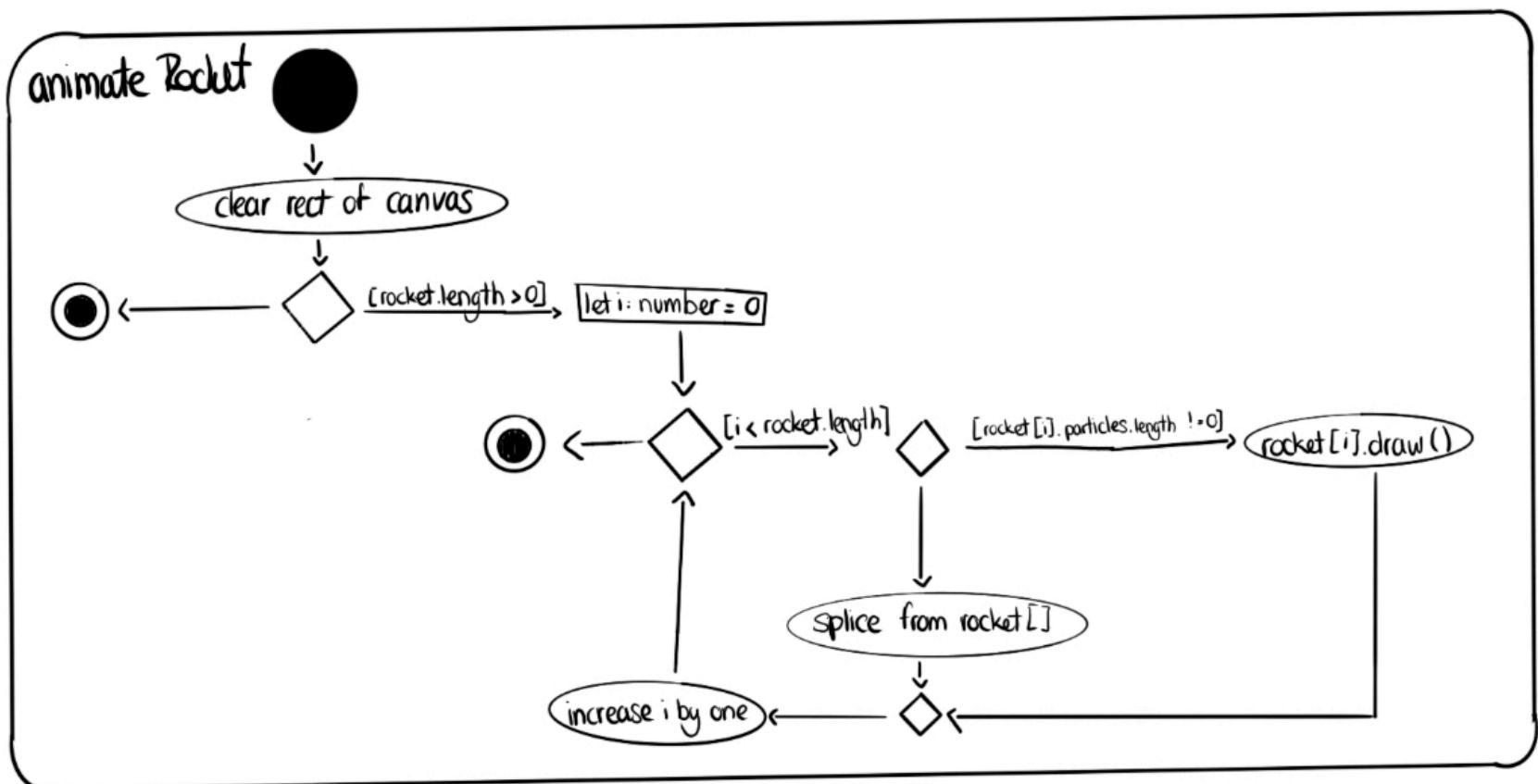
window.setInterval (animateRocket, 20)



get Saved Rocket



Main 2



Server

