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();
```

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();
```

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

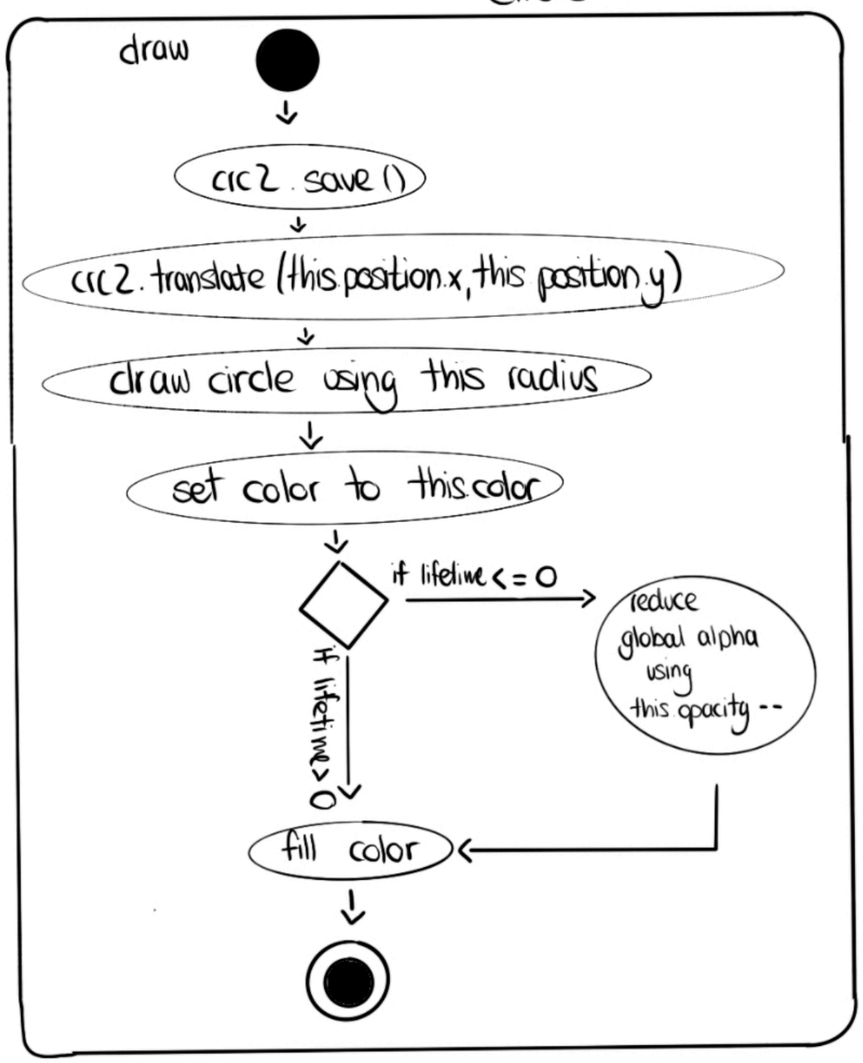
```
constructor (_color, _lifetime,
                -position) {
    super(_color, -position, -lifetime)
    this.draw() }
draw ();
```

Square

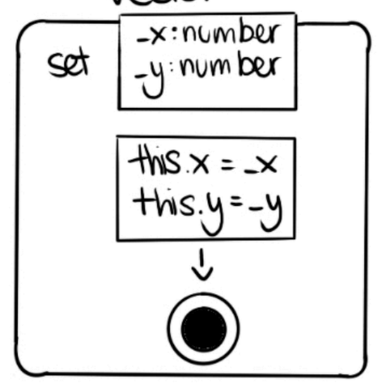
is a square Particle

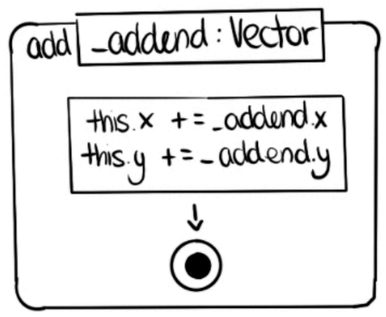
```
constructor (_color, _lifetime
                -position) {
    super(_color, -position, -lifetime)
    this.draw() }
draw ();
```

Circle

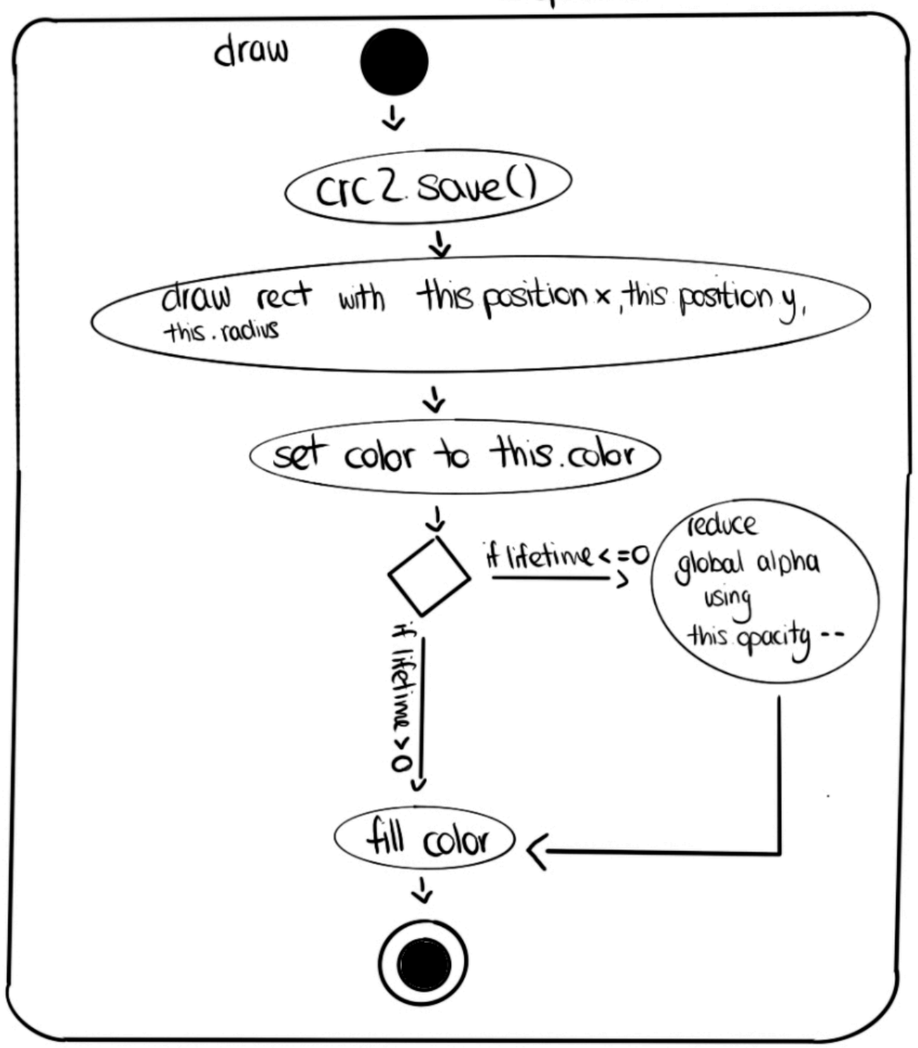


Vector

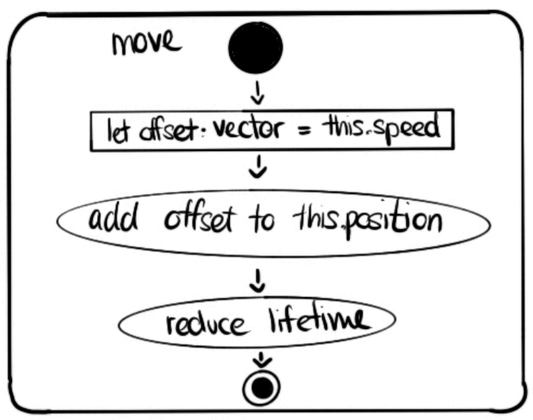




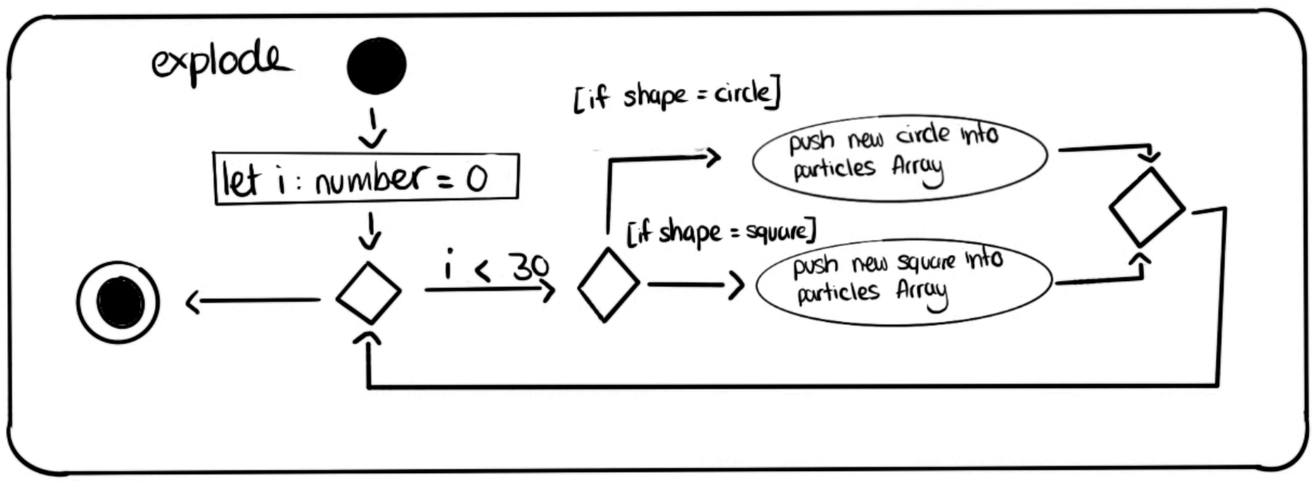
Square

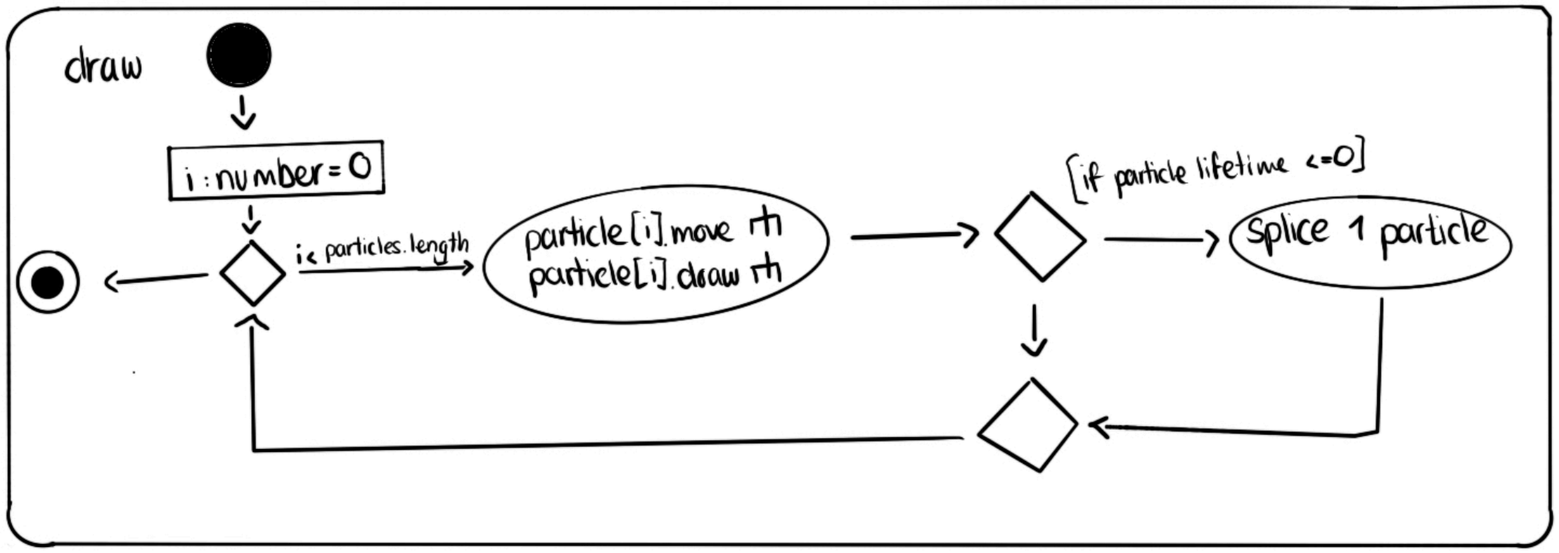


Particle



Rocket


explode
let i : number = 0
i < 30
[if shape = circle]
push new circle into particles Array
[if shape = square]
push new square into particles Array


draw
i : number = 0
i < particles.length
particle[i].move rh
particle[i].draw rh
[if particle lifetime <=0]
Splice 1 particle