Toxic

Brief Description and Concept:

By generating a poppy flower, whose fruit is toxic and used to make drugs, growing, and spreading through the canvas, I want to how drug invades people’s life. The contrast and diastole of the different colors of circles also showing the dizzy feeling after taking drugs.

Development and technical implementation:

I wanted to explore expressing “wave” at first when I saw the topic of the recitation. Yet when I experimented with sine and cosine function and used them to control the circles’ sizes and saw the circle expanded, the feeling of blossom attracted me, so I changed into creating a flower. Yet when the circle shrinked, it looked like a life is dying. Combining the blossom of a flower and the apoptosis of life, I thought of the poppy flower, which looks enthusiastic while has toxic fruits whose juice will make people dizzy and addicted. Therefore, I choose red as the main color of the circles and black as the background, which two are the classic color of a poppy.

Reflection:

List math functions that you utilized in your animation. Please share your experience while using them. What functions did you find useful? What made you confused and struggle?

Sin function: I used it to control the flower to consistently contract and diastole. As I want to show the flower growing layer by layer, I used the sin function like this:

Noise: To show the poppy extending on the canvas, I want its position to change. Yet, I don’t either want the position to change regularly or too messy, so I use the noise function. I misused the function at first, as I put a fixed value in the blanket. When I printed resulted value getting from noise function in the console, I got a fixed number. Then I realized that noise function is like sin/con function as if I want the resulted value to change, the value in the blanket should continuedly changing.

What kind of motion have you explored? What was the process like while combining them?

I used the oscillation motion to control the size of the circle, and make the circle move randomly. The oscillation motions create a circulated feeling, the animation will change identically every few seconds. When I added random movement motion, the frame is circulated, while different from what have appeared in the passing time.

How did you adjust sin() values using map() function? Describe the effectiveness.

I didn’t use map function to adjust the sin(). Instead, I multiply the sin() to amplify the change, which works as well.

How can circular (angular) movement be generated using sine and cosine?

Because the value of sin(x) or con(x) is generated by the ordinate or abscissa value in a unite circle. Thus, by using sin/cos (angle)\*radial distance as the X/Y position of an object, we can create circular movement.