Nathan Shek Final Self-Assessment

Overall, with the amount of time I spent outside of class learning syntax/structure, and particularly the increased amount of time I spent reviewing/learning concepts instead of simply just programming, I'm really proud of how my final result came out. During my midterm self-assessment, I noted how I used to spend a lot of time just programming instead of really cementing the concepts I wanted to use — I made a pretty big change after I noted that, and I think my final product reflects that.

In terms of Processing and P5.js, since, I ended up using P5 for the latter half of the semester, most of my successes and struggles came from trying to incorporate completely new concepts (images, libraries) into my work as I continued on with my final project. That being said, while these concepts took me quite a long time to really understand and apply, I'm really proud that my final project reflects a state of understanding of these concepts (I would consider my application of these concepts to be my success!)

For me personally, OOP and Procedural Programming are similar in that they both require extensive planning – OOP in that you have to really understand what objects/classes/overlaps you'd like to have throughout the entire project, and Procedural in that you need to go step by step into building up the final product. OOP and Procedural are different to me in the exact order that I would create things – with OOP, classes/particular visual elements would definitely come first, and planning-wise, I would start by laying out the structure of what I set my goal as; in contrast, with procedural, while I would still definitely start by making a plan, it was much more loose in terms of the order that I could do things. Perhaps this is the reason why I personally like procedural more – with OOP, it personally feels like there's less leeway creatively if I come up with new ideas since OOP requires so much structure and specific organization, while procedural felt more like a "go with the flow" type of deal (which I personally find more comfortable).

Specifically with my final project, the thing that I really solidified for myself was the use of external libraries. I hadn't used any libraries prior to the final project, so I'll admit that I was pretty apprehensive about using libraries when I first started, but I put in a lot of time and effort into understanding just what exactly I could do with the libraries I was using (play, sound). Once I overcame the first hurdle of understanding how libraries worked, I feel like I was really able to let my creativity soar in a way that I hadn't been able to before, especially with the animations that I made (I'd call this my "breakthrough" – it was the ability to really put into code what exactly was inside of my head, instead of simply making a still or less dynamic version of it.)

I'm proud of the issues that arose that I was able to solve in my final project – most of my trouble came from the number of scenes that I had and creating the pathways (and conditionals for each respective pathway). Out of the entire project, the pathways were definitely the things that took me the most time to really figure out, and especially once I tried

switching over the majority of the visuals to the draw loop (instead of on simple keypress), I had a lot of success really figuring out logic-wise what was happening so that I could really make it work.

My intended milestone for my project was to have all of the pathways completely laid out and set in stone so that I could build on top of them, and I would say that I partially met my milestone — I ended up figuring out a good portion of the pathways, where specific keypresses would lead to the correct pathways, but because of the sounds and the animations, I had failed to realize that the draw loop was absolutely necessary, so I had to do a lot of additional work on top of where I was for my milestone in order to reach where I truly needed to be for that stage, but ultimately my struggle to convert everything into that draw loop made everything so much easier to manage.

With my final project, I'm the proudest of how I was able to use so many concepts together to create a seamless final product, and I'm particularly proud of my use of the play library. As I stated before, I was quite apprehensive about using the newer concepts from class (particularly images and libraries), so the fact that the majority of my final project relied on these concepts makes me really feel good about myself (especially considering I was struggling to understand those very concepts at first).

Moving forward, I'm still honestly unsure what I want to do with programming (I have no idea what I want to do with my life yet!), but the thing I'm really taking from this class is the determination to truly understand and apply concepts. I know this may sound pretty generic and unimportant, but I really don't think I've ever tried so hard in a class to make sure I could understand absolutely everything and apply them almost simultaneously, and I now know that I'm capable of creating some pretty cool things with that mindset.