**Learning Game Art as Programmer**

If you know me (probably you don’t) you know about my adventures on Game Development and learning/studying about art. Well, I started with the idea that I wanted to do animation, so I heavily studied 3D modeling and I was pretty proud of my abilities on it, but eventually I kind of gave up, I still mess with it sometimes, but it’s not a thing for me anymore. After that I briefly studied vector art, I even did a game using it and did the art for prototyping two of my other games (that I never happened to finish), and finally I decided to study Pixel Art because that was what I wanted for a new game that I’m still getting my stuff on to really develop it.

Basically, I have tested 3D art, Vector Art and Pixel Art, I really don’t know if there are any other form of art for games than that, well, you can draw the sprites with digital painting, but… people do that? I don’t know, I’m just a programmer that wants to be a designer!

If you, like me, like art and would like to learn it at least for prototyping and making your own games looking a little bit better, then this article probably is for you, I’m going to talk about what I’ve been through and hopefully help you to decide what kind of art you want to learn.

**Why would want to Learn Art as a Game Programmer?**

If you are asking yourself *“WHY THE HELL WOULD I WANT TO LEARN GAME ART AS A GAME PROGRAMMER?”* I will give you an answer!

**Answer:** I’m not saying that you should want to learn it or not, this is totally up to you, but learning some basics can be very useful for a variety of reasons:

1. **You get to do your own Game Art!** How cool is that? It might not be the best, but hey, if someone says that you art is terrible you can just say that this is Art Direction. Better than that, choose an art direction that is within your limits in art, **(opinion alert)** having simplistic art is way better than doing everything with squares, rectangles and triangles. Yes, I know about [Thomas Was Alone](http://store.steampowered.com/app/220780/Thomas_Was_Alone/), if you have a concept that works with having simple forms, just do it, a **(opinion alert)** good design beats good art, good programming and everything else.
2. **You can tweak others Art!** How cool is that? Just as an example, **(budget alert)** Unity Asset Store has this amazing [Platformer Animations Pack](https://www.assetstore.unity3d.com/en/#!/content/37075) by just $1! Can you believe it? If you have some basic knowledge and practice with Pixel Art you can get it and do great assets for your game. Tweaking others art is probably what you will do the most with your art skills as a game programmer.
3. **A lot of new design possibilities.** Probably you have already had a lot of ideas that you needed some specific art or it wouldn’t just work with squares and triangles. With art in your tool’s box you can design more games.

**Types of Art**

As I have said somewhere before, there are three types of art that are more used on game art, they are: 3D Art, Vector Art and Pixel Art. I will talk about my experiences with them, how I started learning it, how you can start learning it, what softwares you can use and the positive and negative sides of it. Let’s do it!

**3D Art**

If I were to look at how much time I spent on Game Art in my life, 3D Art would take about 65% of it. And the best thing I’ve done was a character with low polygon count that I was able to use in a game project with the help of Mixamo Rigging and Animations.

That says a lot about 3D Art. **It’s time consuming.** The learning curve is really slow and there are a lot of small areas inside it, such as:

1. **3D Modeling** — Yes, 3D modeling is just one (!) of the things you can do in 3D art, and also, in the industry you have specialized 3D Modeling Artists, you can focus on Character Modeling, Animals, Monsters, Environment, … Here you build your meshes building polygons, vertices, edges, etc…
2. **3D Sculpting** — This is easily mistaken by 3D Modeling and the line between them is really thin, you can specialize on the same things but Sculpting usually means working with a lot more of polygons and using tools that simulates real sculpting tools. It is usually better to get organic forms done right, after sculpting you will have to go through a process of transform your sculpted model in a mesh. To keep it short, when sculpting the polygon count gets really high and they get messed up, so you have to fix it.
3. **Rigging**— This is the act of adding bones to your model, we all needs bones to move, so do 3D models. This is boooooooring, but if you like animation, you will want to spend a lot of time here or praise the one who rigged correctly whatever you are animating.
4. **Texturing —**This one a little bit more complicated to explain… A 3D Model is made by a lot of squares (or triangles) and then you map those squares into a 2D surface, the image on this 2D surface is shown in the 3D model, you can use this to achieve more realistic results.
5. **Animation** — The endpoint of everything above, if you are doing any of these things chances are that you want to animate your model. Animating is like being a puppet master, it is difficult, it is a lot of theory and practice, but if you do it right you will feel quite powerful!

There are also particles effects, rendering, simulations, post-processing, … But I didn’t include that because that is usually done in the game engine, but for other kinds of arts such as films or just plain images there also someone who is going to do those.

So, if you want to get only 1 thing from 3D animation is that it is really slow to learn, it requires a lot of effort, practice and time, and this is the biggest **negative point**, it is really hard to do it as just a hobby or a side thing.

The **positive side** of 3D Art is that… Well, who doesn’t love 3D Art? The biggest games nowadays are 3D, the animation feels natural and smooth, some genres are really hard to imagine out of the 3D world, but as I said, good design beats everything else.

**Softwares:** [**Blender**](https://www.blender.org) (It’s free!) — Really powerful, free and open source, the number of people using it is growing a lot. **Maya and 3DS Max** (Free for Students) — You have to check Autodesk website for them, there are free plans for students, Maya is the industry standard for animation, even Pixar use it, there are lots of resources for both of them and both will pretty much suit your needs.

**How to Learn it?** I used [CGCookie](https://cgcookie.com), Blender Guru and Youtube Tutorials. My biggest advice nowadays is to use [Udemy](http://www.udemy.com), search for specific game art courses, Blender, Maya or 3Ds Max, there are even courses that talks about all of them. Don’t worry, 3D Art is just one thing, if you learn it on Blender you will be able to do it on Maya or 3DS Max when you learn the interface and get used to the other software.

**Vector Art**

**Pixel Art**

**Summarising**

Quick Guide:

1. “I Hate Myself” or “I have lots of time” or “3D is Life” or “I want to try 3D” — Just Learn 3D Art, it is pretty cool.
2. “I just want to draw something” or “I have already used vector software” or “I like vector art” — Pick Up Vector Art.
3. “I like old game aesthetics” or “ I just want to draw something and I have a lot of pacience or a drawing tablet” or “I want to use art direction as an excuse for bad art” — **PIXEL ART!**
4. “I’m an Artist” or “I want to be an artist”— Hmm… All of them? If you are an artist it is good to know the basics of all of them and them specialize on something, without spending your time programming and learning new langua… Wait. I’m writing this for programmers, what are you doing here?