Homework 3B

Part1:

I am interested in animating a rigged object or character using three.js. The process would probably involve either loading in an already made model from Blender or creating a model with different kinds of geometry in my code(boxGeometry, sphereGeometry, etc.). The model from Blender could already have been rigged or I can create a skeleton for the model in my code using SkinnedMesh, which is a mesh with assigned vertices and weights to the geometry to help animate the geometry. If I were to create the model for animation purely using geometry and not a loaded object from Blender, I would want to create a mesh with several groups so that I can move each group independently, but have them exist as one mesh. If I want to animate this mesh, I would rotate, scale, or translate the different parts of the body. For example, if I want to make a walk cycle, I might rotate certain the legs of the body using sin() or cos(). Some other useful three.js features to create an animation using a mesh with a skeleton are AnimationMixer, which plays animations on an object in a scene.The root object is the object that will be animated by the mixer. Using clipAction, I can perform an animation on a specified AnimationClip, which is a reusable set of keyframes for an animation.

With this information, I also plan to look into examples and tutorials using these websites to create an animation with a rigged skeleton: - -
-https://www.smashingmagazine.com/2017/09/animation-interaction-techniques-webgl/#turning-constraints-into-opportunities
-https://threejs.org/examples/#webgl_animation_keyframes_json
-https://threejs.org/examples/#webgl_animation_skinning_morph
-https://threejs.org/examples/#webgl_animation_skinning_blending

Images are included as pngs, Homework3BImage1.png and Homework3BImage2.png.

Part2:
My partners are Joshua Navarro and Jenny Fullerton.