Suzhou Garden in VR

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Abstract—Making a Suzhou Garden inside VR by using unreal. Inside the interactive garden, you can play game asks for your entire body coordination, and game helps you to understand more about Chinese architecture.

Keywords—Interactive, VR, Chinese, garden, environment, game, lego, play.

Classical Suzhou garden is a type of garden which is really popular from Southern Song to late Qing dynasties (11th to 19th century). The pursuit of their design is trying to using constructed landscape mimicking the real grand nature view such as waterfalls, rivers, hills, rocks, mountains. This VR project is just a personal humble mimic of one of the Suzhou gardens. It's still in its developing stage, more objects and tricks will be add on, and more refinement is needed.

Figure 1 - Main girl watches Secondary girl swing as the Inferno rises.

I. VR

VR can give people an immersive experience. You can enjoy an environment million miles away even million years ago by using the headset to see things around you, the controller to touch and feel the object inside. It is a pretty magic feeling for people new to VR. After working on this project and explored a bit of VR world, I still feel excited to wearing the headset to play any VR game or enter any VR environment every time. This project is just an attempt to the grand VR world.

Inside the garden you can look around the view, pick up the stones near your feet, crossing the bridge, jump into the water, and using legos to build your own Chinese architecture. It's fun and challenging. There will be more tricks inside this project. In the digital world, you can do whatever you want.

II. UNREAL ENGINE, 3D DESIGN

The project is mainly accomplished by unreal engine 4, Maya, and substance painter. First at all, I built a high poly count models of the architecture, and used a low poly model covered the high poly one. Then I baked all the texture of the high poly model into the low poly one by substance painter. Thus, I can put the model into UE4 effortlessly without any distortion. Unreal is a great tool to use for it's simple and free. As a 3D Design student, I am exciting to put my design inside a world that I can walk into and have fun.

Figure 3 - The left one is the high poly model, the right is low poly model on the high poly model.

III. CONCLUSION

This VR project is an attempt to creating an interactive environment with pleasing views, more interactive objects will be add-on in order to explore and even maximize the advantages of you can build anything against the law of gravity and have all kinds of effects that would not hurt people physically at all.
IV. ACKNOWLEDGMENTS
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V. REFERENCES