

Jacqueline Allex

jackieallex@gmail.com | 732.598.2503 | jackieallex.com | github.com/jallex

SKILLS

Programming : Python, C++, OpenGL, GLSL, C#, Javascript, Java, Git, Agile

DCC Proficiencies : Maya, Blender, Houdini, Nuke, Katana, UE4, Unity, ZBrush, Substance Painter

EXPERIENCE

Electronic Arts

Los Angeles, CA

Technical Artist Intern

May 2021 - Present

- Working as a Technical Artist Intern on Battlefield Mobile, building tools for artists in Unreal Engine 4.

ILM, Lucasfilm

San Francisco, CA

Core Pipeline Software Engineer Intern

January - May 2021

- Used Python3 to program features in Excavator, a tool for scanning a filesystem for information about what lives on disk and storing that information in elasticsearch for artists and engineers to reference.
- Wrote scripts and debugged farm jobs (Coda), worked using docker and linux.
- Transferred scanned information from redis to kafka, inserted data from kafka into elasticsearch.

Human Movement Neuroscience Lab

Boston, MA

VR | AR | Motion Capture Technical Engineer

January - December 2020

- Constructed skeleton and created full-body human animations using Python, Blender's API, and parsed data collected through marker and markerless motion capture sessions.
- Automated systems to clean up large amounts of mocap data.
- Calculate vectors and matrices related to position and rotation, quaternions in 3D space, perform calibrations, project rays, manipulate cameras and rigid bodies.

Bare Tree Media

Boston, MA

Computer Graphics Technical Director (Freelance)

March 2020 - May 2021

- Used Javascript to build components of AR filters such as custom shaders, particle effects, 3D and 2D animations, user interactivity, games, lighting, cameras.

Bank of America

Jersey City, NJ

Global Technology Analyst Intern

June - August 2019

- Used ReactJS and NodeJS to design and build 10+ features on the front-end and API.
- Collaborated on an Agile team of experienced developers and designers to create new application approaching UAT, Distribute, which facilitates data transfer in Credit Risk.

EDUCATION

Northeastern University, Khoury College of Computer Sciences

Boston, MA

Candidate for Bachelor of Science in Computer Science and Media Arts

May 2022

GPA: 3.75 / 4.0 (Dean's List Placement for Academic Excellence)

Coursework: Computer Graphics, Linear Algebra, Algorithms, Object Oriented Programming, Animation, Computer Science Fundamentals I & II

VOLUNTEERING

ACM SIGGRAPH 2021 Student Volunteer

PROJECTS

Raytracer

- Renders realistic images through ray tracing techniques on 3D scenes.
- Used C++ to implement space-time raytracing, motion blur, AABBs, BVH volumes, image textures, perlin noise, Vector3 math operations, rays, shaders, lights, geometry in a scene, normal determination, antialiasing, materials with refraction and reflection, and cameras

Mesh Decimator

- Object (.obj) reader and mesh decimator created using C++, OpenGL, and SDL implementing the Edge Collapse Algorithm