

EDUCATION

Rochester Institute of Technology

Rochester, NY

Master of Science, Game Design and Development | 2024

Bachelor of Science, Game Design and Development and Minor in Japanese | 2021

- GPA: 3.6 – *magna cum laude*

SKILLS

Programming Languages: C#, C++, Python, JavaScript, SQL, HTML, CSS

Software: Visual Studio, Visual Studio Code, PyCharm, Unreal Engine 4/5, Unity

Frameworks: DirectX 11, DirectX 12, Entity Framework Core 2, Windows Forms, LINQ

Other: Amazon Web Services (AWS), .NET, Git version control, Object-Oriented Programming

EXPERIENCE

EagleDream Technologies | Software Engineering Intern

Summer – Fall 2019, Fall 2020

- Created data processing functions for a client as part of migration to cloud infrastructure, using Python, AWS Lambda, DynamoDB, Simple Storage Service (S3)
- Developed an API with authentication within AWS for writing a JSON payload to a NoSQL database, using AWS Lambda, API Gateway, DynamoDB
- Implemented design changes to an existing website based on a design mockup using CSS, SASS, PHP

3DRose | Developer/Nighttime Processor

2016 - 2020

- Contributed to an app that uses Sears' API to pull orders from the Sears Marketplace into 3DRose's own database, to allow for processing and fulfillment of orders
- Automated the technical review process of hundreds image submissions from artists, by independently designing & developing an app based on user needs and image criteria, using C# Windows Forms
- Authored code documentation on a program with 18 months of active development history
- Conducted the nightly order processing necessary to prepare for production the following morning
- Trained 3 more employees on vital nightly order processing

PROJECT HIGHLIGHTS

Channel Getaway (Academic Capstone & Ongoing Project) | Technical Artist & Team Lead

2023-Present

- Organized a core team of 4 students, with additional help from 5 external members, using Agile principles
- Took charge of a project in jeopardy by managing priorities and reducing ambitious project scope and complexity, enabling the team to deliver on original core design goals within a limited semester timeline
- Supported 4 artists in meeting asset technical requirements, including props, character models, texturing, and UI work
- Established artist documentation with guidelines to streamline asset creation and implementation, setting effective standards for organization and performance
- Designed and developed custom VFX according to project goals, in particular, custom post processing shaders to simulate black-and-white film and a color CRT TV in Unreal Engine 5

Brave Magnet (Global Game Jam Team Project)

2022

- Coordinated a team of 7 students located in both the United States and Japan, using Japanese language ability to help bridge the language barrier

DirectX12 Raymarching Art Tool (Pair Academic & Personal Project)

2021

- Designed a standalone tool to enable people unfamiliar with shader programming and raymarching math to create 3D scenes entirely through raymarching
- Implemented large code refactors to an existing DirectX 12 codebase based on research and carefully considered needs and time constraints of the current project