EMPLOYMENT

Game Developer Pocket Talos LLC Jun 2019 - Present

AutoKnight (in development and published under Iron Horse Games)

- Designed and programmed all mechanics and features. C#, Unity
- Managed scrum notes, sprint reviews reports, and development blogs.
- Worked closely with the publisher and QA testers to ensure new features were designed and executed well.
- Integrated communication between cloud-based servers and web services.
- Built an anti-cheat system that encrypts save data and detects data tampering. Data tampering had 84% precision and 76% recall with a group of cheaters with at least 5 months of experience

Mar 2019 - Jun 2019, Jan 2020 - Present

Technical Software Developer Intern

Brain Game Center

- Built several variations of a psychological test that assessed visuospatial short-term working memory that helped <u>train 30,000 people</u> on working memory to understand individual differences in interventional needs.
 C#, Unity
- Refactored a psychological test's tutorial slides to dynamically utilize and set image and text components to render the slide rather than having a single poorly unscalable and unmaintainable picture for each slide.
- Coordinated with mentors to ensure new features followed design specifications.

EDUCATION

Riverside, CA

University of California, Riverside

Sept 2017 – Jun 2021

- B.S. in Computer Science, June 2021 (Dean's List)
- Coursework: Virtual Reality; System Administration; Database Management; Software Testing & Verification

TECHNICAL EXPERIENCE

Projects

- Incrementum (Jul 2019 Present). A set of tools geared towards assisting game developers with a variety of tasks for incremental / idle game development. Provides formulas and iterative models for a variety of progression systems as well as a robust numeric library that supports multiple notations. Reduced time spent calculating optimal choice by 93% with a group of mostly novice game developers C++, SDL
- Schedule It! (Oct 2019 Dec 2019). An online calendar tool for time management and coordinating meetings. You can view current events and schedule events accordingly. *React, Javascript, Firebase*
- Unconventional Space (Mar 2019 Jun 2019). A 3D VR puzzle game involving the manipulation of the user's perception of space to simulate non-<u>Euclidean</u> geometry, creating these seemingly impossible illusions. C#, Unity, Oculus
- Runescape Bot (Mar 2018 May 2019). Created an automation program for the game that simulated human interaction while completing specific tasks at a reasonable speed. *C++*, *SDL*, *OpenCV*, *TensorFlow*
- Tanks AI (Apr 2019). Developed a dynamic AI bot for the Unity Project *Tanks* whose behavior and difficulty is based on the actions the player takes. *C#*, *Unity*
- Pac-Man (Jan 2019). Developed my own game engine with custom ghost A.I. C++, SDL

LANGUAGES AND TECHNOLOGIES

- C++; C#; SQL; Java, Javascript; Bash; Python
- Unity; SDL; Oculus, SFML; OpenCV; OpenGL; Unreal Engine; TensorFlow; Firebase; AWS; Maya; Blender; XML; GameSparks; PlayFab; React; Github; Balsamiq; Unity Ads; Facebook Ads; ironSource; AppsFlyer

OTHER

- Contributed to the TensorFlow.Net repository by porting unit tests from Python to C#, and debugging examples and unit tests. C#, Python
- Created a Discord bot for my *AutoKnight* QA server that moderated conversations, delivered notifications, and scheduled events. *Python*