

Experience

The Walt Disney Company

Orlando, FL

R&D Software Engineer - TA

Aug 2016-Present

- Engineer solutions for Internet of Things and BLE Beacon based projects
- Responsible for software and hardware engineering tasks related to R&D prototypes
- Developed lighting shows used in custom GPS-based show control system for WDW Busses
- Utilize new technologies in creative solutions to challenging problems for Disney Parks & Resorts

The Walt Disney Company: Professional Internship

Orlando, FL

Software Engineer Intern

May 2014-Aug 2016

- Developed event playback script in node.js/Java, to simulate and analyze tests in real-time
- Built and modified iOS apps in Swift 2.0 used to determine RSSI properties for Beacon technologies
- Used Raspberry Pi and BeagleBone Black in Linux, incorporated Bluetooth low energy frameworks
- Assisted in development of a web-based app used for attraction vehicle overhaul
- Engineered software to virtually simulate hardware components in ride and show elements
- Created interactive GUIs for operator consoles in TRON Lightcycle Power Run in Shanghai

The DiSTI Corporation

Orlando, FL

Software Engineer Intern

May 2015-Aug 2015

- Utilized GUI software and C++ on R&D team to engineer customized 3-D virtual maintenance training solutions, used in the aerospace, automotive, medical, and training industries
- Experienced working on cross-platform product (Windows/Linux) with build tools, version control, and Agile-Scrum development process

Skills

Programming languages:

Proficient in C, Java (Object-Oriented Programming)**Familiar with** Swift, C#, C++, Python, JavaScript, jQuery, SQL, HTML5, and CSS3 Fundamentals**Operating Systems:** Microsoft Windows (2000, XP, 7), Mac OS X (10.6-10.12), Linux (Ubuntu, Debian)**Applications:** Xcode, Eclipse, Visual Studio, Microsoft SQL Server, MySQL, FileZilla, GIT/Subversion, Atlassian JIRA/Confluence, VMware/VirtualBox, Atom/VS Code, Terminal, Arduino, vpt7**Hardware:** Raspberry Pi, BeagleBone Black, Arduino, Beacons, Leap Motion, Soldering, 3D Printing, Laser Cutting, Lighting Control, PixLite Mk II, Medialon Showmaster, ENTTEC Pixelator, vpt7 Projection Mapping

Education

University of Central Florida

Orlando, FL

Bachelor of Science in Computer Science with **Honors**

GPA: 3.57, Major GPA: 3.73

Projects

Disney Projects

- Designed front end UI for application that populates a guest list based off beacon proximity.
- Helped develop a dynamic web application used for attraction vehicle overhaul (C#, HTML, CSS, JS).
- Provided functionality to create custom ride vehicle maintenance scenarios. Application increased the throughput in Central Shops and optimized vehicle maintenance schedules.
- Assisted in development of ride and show hardware simulation to allow for pre-programming of attractions control systems using C# and ASP.NET MVC. Gained knowledge of how PLCs work.

Leap Motion and Robotics

- Developed applications using Leap Motion as controller for Philips Hue lights and Sphero robot.
- Controlled robotic servos to match hand position in real time through JavaScript.

Object-Oriented Software Engineering Project

- Led project team of 6 engineers to create a 2D side scrolling Java game, which incorporated enemies, character animations, and puzzles. Followed software development life cycle using Agile.

Compiler for PL/0 Programming Language

- Wrote a fully functional compiler in C that created a lexeme list, parsed that list, and generated op code. This was read by a virtual machine, which showed the program running on the stack.

Volunteer

Tech Behind the Dreams

Disney's Ultimate EnginEARing Exploration

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