

# CALE WORKMAN

[CaleWorkman@gmail.com](mailto:CaleWorkman@gmail.com) | 843-513-7391 | [www.caleworkman.com](http://www.caleworkman.com)

Software engineer with 5+ years of python experience building automation tools and systems. Full-stack web developer with 2+ years of experience in ReactJS, Swift, HTML, and CSS. Experienced working in an Agile environment with object-oriented programming, test-driven development, and MVC design patterns.

## WORK EXPERIENCE

**R&D Engineer** 2019 - present  
Samtec

- Developed Python 3 tools to interface with Ansys Electronics Design Suite and Keysight equipment.
- Created a Python tool to automate the PCB design, validation, and documentation process; resulted in faster board prototyping and more accurate documentation across the SI group.
- Wrote Python scripts to manage the Ansys materials database.
- Led the transition to a Git-based versioning system using VSTS.

*Technologies: Python 3, Git, VSTS*

**Software Developer** 2018  
Cognito Forms

- Managed Tier 3 customer support, debugged complex customer forms, and root-caused bugs.
- Developed software features with C#/.NET using MVC design patterns.

*Technologies: C#, .NET, HTML5, CSS3, JavaScript, jQuery, VSTS, Azure, Git, Trello, Zendesk*

**Electrical Validation Engineer** 2014 - 2018  
Intel

- Developed signal integrity electrical validation methods for server microprocessors and DDR3/4 memory technologies.
- Created automation software with Python for hardware validation, data collection, and data processing.
- Performed data analysis using JMP and MATLAB scripting.

*Technologies: Python 2/3, MATLAB, JMP*

**Graduate Assistant** 2013 - 2015  
University of South Carolina

- Taught courses in Electromagnetics and project design.
- Named Outstanding Teaching Assistant for 2013 and 2014.

## EDUCATION

**Ph.D. Computer Science** Expected 2024  
*University of South Carolina*

**M.E. Electrical Engineering, 3.650 GPA** 2016  
*University of South Carolina*

**B.S. Electrical Engineering, Magna Cum Laude** 2012  
*University of South Carolina*

## PORTFOLIO

**Barley**

[www.barleyapp.co](http://www.barleyapp.co)

- Developed an iOS app for bar and restaurant inventory management available on the Apple store.
- Utilized third-party API's (Phaxio, Mailgun) to submit orders via fax or email.
- Built a Python 3 backend to keep each state-wide catalog up to date.

*Technologies: Swift, XCode, Python 3, CloudKit, REST, iOS, Zeplin*

**In the Money App**

[www.inthemoney.app](http://www.inthemoney.app)

- Developed a responsive mobile-first single-page React app to plot profit-loss diagrams for stock option orders using real-time finance data.
- Used AWS Amplify used for CI and API Gateway to serve a RESTful API.

*Technologies: React, HTML5, CSS3, JavaScript, Jest, AWS, Express, NodeJS*

**Personal Website**

[www.caleworkman.com](http://www.caleworkman.com)

- Developed a responsive single-page React app to serve as a personal online portfolio and resume.

*Technologies: React, HTML, CSS, JavaScript, AWS, REST*