Benjamin Young

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https://byoung585.github.io

Education

$University\ of\ Pittsburgh,\ School\ of\ Computing\ and\ Information,\ Pittsburgh,\ PA$

5 Year Combined BS+MS in Computer Science

- Graduation dates: BS: 12/2021, MS: 12/2022
- University of Pittsburgh Honors College Member
- School of Computing and Information Dean's List
- GPA: 3.7/4.0

- Relevant coursework:
 - o Structure of Programming Languages
 - o Undergraduate Compiler Design
 - o Graduate Compiler Design (Fall 2021)

Experience

Software Engineering Intern, Salesforce, Indianapolis, IN

May 2021 – August 2021

Member of Agile DevOps team responsible for managing infrastructure that sends 3.2 billion emails per day

- Implemented a series of automations to configure email sending software, run smoke tests on configurations, and automatically create change requests. These automations save 10 hours of manual work per week and clean up technical debt.
- Implemented new CI/CD pipeline to automatically create message transfer agent configurations, manage them via GitHub, test them through the dynamic creation of a Docker container in TeamCity, and deploy the configurations via TeamCity. This replaces a manual process, adding testing, validation, and automatic deployment, as well as increasing the speed at which new configurations can be deployed.
- Developed a custom Terraform module that reduces the time needed to deploy a new virtual machine, saving 15 hours weekly. This allows virtual machines to be configured in a simple and version control friendly way, instead of manually configuring each new virtual machine.

Software Engineering Intern, Carnegie Mellon University Software Engineering Institute, Pittsburgh, PA May 2019 – May 2021

Member of Agile full-stack development team responsible for developing web applications to facilitate cybersecurity training and exercises

- Developed two custom Terraform providers, allowing cybersecurity exercises and related resources to be created in a way that is simple, programmatic, and efficient. Engineers use these providers to create exercises instead of doing so manually with a GUI.
- Added significant functionality to multiple web applications, including webhooks, advanced text searching, and the ability for users to create custom diagrams consisting of images and click points, using Angular and C#.
- Led the development of a Java desktop application that consolidates information on the NICE cybersecurity framework, creating a single place where team members can easily query for information, instead of relying on searching through websites.

Skills

- Programming Languages: Java, Python, Go, C#, C, Rust, TypeScript, HTML, CSS, JavaScript, SQL, PHP
- Frameworks: Angular, .NET Core, Flask, JUnit, Selenium
- Technologies: Terraform, Jira, Linux, Git, Confluence, PostgreSQL, LaTeX, Chef, Splunk, Monit, TeamCity, Docker
- **Development Methodologies**: Agile Development, Test Driven Development

Activities

President of Pitt Sports Analysis Club

Lead discussion on a wide variety of professional and collegiate sports in meetings consisting of 30+ members.

- Make sure discussion stays relevant and all voices are heard, even during spirited debates.
- Ensure the club complies with university regulations governing registration, use of club funds, and use of the university's name
- Create and facilitate club activities, ensuring that they run smoothly and all members have a chance to participate.