

# Justin B. Helfman

440-465-9588 | justinbhelfman@gmail.com | <https://jbhelf.github.io>

## EDUCATION

### **Purdue University, West Lafayette, Indiana**

- B.S. Computer Engineering
- Entrepreneurship & Innovation Certificate

**August 2018 - May 2022**

**GPA: 3.14/4.0**

## WORK & LEADERSHIP EXPERIENCE

### **Alteryx, Broomfield, Colorado – Associate Site Reliability Engineer**

**July 2022 - January 2023**

- Oversaw cloud operations efforts, resolving urgent defects and system outages affecting customers
- Directed SRE into an agile-based workflow, resulting in 29 documented and completed epics in 3 months
- Orchestrated design of automated auditing tools for Security and Organizational Controls (SOC 2)

### **Purdue University, West Lafayette, Indiana - Teaching Assistant (Software Engineering Tools)**

**January - May 2022**

- Created coursework to give students experience in CI/CD topics using GitHub actions
- Course topics included CI/CD, IaaS, PaaS, FaaS, Python, NodeJs, UNIX, GIT, JIRA, and Fuzzing

### **Alteryx, Broomfield, Colorado – DevOps Engineering Intern**

**May - August 2021**

- Built Amazon Machine Images (AMI) to expand what data sources may be used with Alteryx Designer
- AMIs used in over 130,000 instances in GitLab pipelines over a 12-week period
- Built a framework to automatically audit AMIs and determine value based on accessibility and security

### **Eaton Corporation, Moon Township, Pennsylvania – Software Engineering Intern**

**January - April 2021**

- Created remote scripts to interface with circuit breakers, testing for functionality and defects

### **Eaton Corporation, Plymouth, Minnesota – Software Engineering Intern**

**June - August 2020**

- Organized and delivered a continuous integration/continuous development tool using virtual machines
- Presented project final summary saving an estimated 2000 hours per year within my team

### **Alpha Epsilon Pi – Recruitment Chair, Executive Board Member**

**January 2019 - November 2020**

- Orchestrated the recruitment team, enrolling a new member class, exceeding previous records by 35%
- Designed socially distant events during the COVID-19 pandemic increasing membership by 16%

## PROJECTS

### **NHL Score Prediction Neural Network**

**December 2022-Present**

- Designing a multilayer perceptron neural network that predicts NHL game outcomes

### **Movie Recommendation Bot**

**January 2022**

- Built an automated texting service that processed participant voting based on a list of movies

### **Digital Systems Design Project**

**August - December 2021**

- Created an app to digitally record and display the results of a physical chess game
- Worked with chess AI to aid player moves, and provide a variable difficulty computer to play against

### **Computer Networking Design Projects**

**August - December 2020**

- Developed code emulating HTTP clients, servers, forking, caesar cipher encryption, and UDP routing

### **Deep Learning (Neural Networks) Design Projects**

**August - December 2020**

- Implemented Neural Turing Machines, Convolutional LSTM, and Generative Adversarial Networks

### **SARS-CoV-2 (COVID-19) Analyses**

**May-December 2020**

- Compiled a review and method validation of 4 ICML papers in the context of infectious disease forecasting
- Administered predictive mortality and infection models and observed trends between these forecasts and global ratings by country of human development, free press, and mean years of schooling

## LANGUAGES & TECHNOLOGIES

C (4 years) • Python (4 years) • Linux/Unix (4 years) • Git (4 years) • PowerShell (3 years) • CI/CD (2 years) • HTML (0-1 year) • SQL (0-1 year) • AWS (0-1 year) • Google Cloud Platform (0-1 year) • Tensorflow & PyTorch (0-1 year)