# Nick Lemoing

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**೧** GitHub **in** LinkedIn

# Education

## University of Waterloo

Computer Science (9/2016 - 4/2021) 91 Average, Dean's List in 5 of 6 terms Favourite Courses: Game Theory, Theory of Computation

# Skills

## Programming Languages

Python **JavaScript** C/C++Golang Scheme

#### Frontend Frameworks

React Angular

#### **Data Science**

NumPy Pandas Scikit-learn Jupyter

## DevOps

Docker Kubernetes Vagrant

#### Cloud environments

AWS Azure

#### Communication

Client pitches and presentations Strong technical and informal writer

## Interests

#### Ultimate Frisbee

I've played for my university's school team for three seasons.

I also played on NYU's team while living in New York.

## Creative Writing

I write articles about sports and business topics that interest me.

I'm also a hobbyist short story writer.

#### **Bike Rides**

While in New York I biked to work every day, as well as to all five boroughs.

My blog has an article about the experience.

# Experience

## Data Engineer Munich Re

mathred 9/2019 - Present

- Decreased search times by a factor of 10 in our hosted PDF viewer
- Developed custom visualization, navigation and annotation components for reviewing medical PDFs using PDF.js
- Automated build-and-deploy processes for hosted services using CI/CD pipelines

#### Data Scientist Munich Re

**#** 1/2019 - 4/2019

- Researched and implemented a parallelized, clustering-based algorithm to reduce dimensionality in datasets with correlated features
- Developed black-box model interpretation and visualization tools in Python and React
- Evaluated alternative data sources using interpretable random forest models to reduce underwriting time

### Software Developer Bonfire Interactive

**#** 5/2019 - 8/2019

- Developed new features for the core procurement app with Angular and Node is
- Kickstarted the consolidation of several backend services into a Node.js API
- Spearheaded the addition of an integration testing framework to ensure stability across Bonfire services

# **Projects**

# PlanUW Schedule planner for uWaterloo courses

**11**/2019

JavaScript, Node.js

- Features include course planning and automatic degree requirement parsing
- Lightweight frontend for blazing fast load times (60KB for all assets)

## GNight Generalized knight simulator and visualizer C++, OpenCV, d3.is

 $mathred{m} 7/2019$ 

- Analyzed movement of general chess knights using BFS and Random Walk algorithms
- Built a path visualization module using OpenCV
- Implemented animated visualizations in d3 for the explorative post on my blog

# GoCV Templated resume generator

 $mathred{m} 9/2019$ 

Golang

- Built a resume templator to generate multiple views from common JSON data
- Supports TeX, HTML output with potential to add other formats
- Used as the basis for my personal site as well as this resume

# Teaching and Research

#### Research Assistant

**#** 5/2019 - 8/2019

3D Images

- Researched algorithms for consistent 3D line drawings
- Implemented a 3D image stylization algorithm in OpenCV
- Supervisor: Lesley Istead

## Teaching Assistant

mathred 9/2017 - Present

Math and CS

- Organized and presented end-of-term review sessions for hundreds of students
- Prepared weekly review courses for first year courses
- Specialties: Functional Programming, Linear Algebra, Statistics