Philip	
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UTC-8

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https://github.com/

I'm an experienced Software Engineer / Data Scientist with passion for interdisciplinary, environmental, scientific, privacy, OSInt & citizen science projects.

Skills/Experience

Machine Learning Prototypes Remote Work Ticketing Systems
Data Science Linux Systems Education/Mentoring Rubber Ducking

Technologies

Python/PyTorch/sklearn R/dplyr skimage/scipy.signal // Dwarf/ C/C++ Angular/NativeScript Docker AWS/GCP/firebase

- Scientific Programmer (Research) May 2022 - April 2025 Remote sensing, using detector to match from satellite images to data Developed to join & catalog millions of satellite scenes, serving global ocean surveys Developed custom labeler for very large images, to make training data for object detection Led technology transfer work, moving research prototypes to automated pipelines & production Developed a light ORM/utils library to enforce best practices & documentaiton in cloud/IO Ran audits on research projects to address security, documentation, & repo cleanliness issues - Machine Learning Researcher II March 2020 - April 2022 Research on binaries in vulnerability detection & improving code legability from decompilation Developed feature extraction pipeline over cloud hosted virtual machines on TBs of data Implemented, verified & incorporated ML/DL code from academic research into release products Participated in authoring & reviewing / proposals for / funding solicitations - Mobile & Full Stack Engineer March 2019 - March 2020 , x-platform citizen sciencery app to promote Developed Developed core tools for tracking sightings & individual identification Contributed to data access API & web UI, supporting researchers in - Data Science Intern (NLP) June 2018 - Sept 2018 Prototyped employee expert recommender system, to eliminate weeks in ticket triage/assignment Designed & completed prototype from research papers & advisement of top employees - Graduate Research Assistant Oct 2017 - June 2018 Analyzed relationship of adjacent populations for & Developed processing/audit tools for survey & data to support study for Provided git, project management & security trainings for teams with varying readiness levels Graduate Research - Machine Learning (Audio Data) Sept 2017 - Dec 2019 Developed VAEs & anomaly detectors for applied acoustics in very noisy environments Developed a track explorer to enable research on 10 year (12 TB) continuous audio from Measured effects of to reduce noise & improve audio quality - Volunteer Developer & Consultant Nov 2015 - present Developed remote sensing tools to classify light technologies in photos for Consult on image processing for low cost diagnosis of

- R&D Software Engineer April 2014 - Dec 2015

Developed processing pipelines & workflows for work on multiple SBIR programs

Helped run professional trainings to disseminate new programming languages

Wrote on disenfranchisement under for feasibility study

Provided technology training/consult on code optimization, medical NLP & image processing

University

University

Computer Science & Machine Learning

Masters of Science

Computer Science & Cryptography

Bachelor of Science, Math Minor