



JOSEPH HODGES

Software Engineer | AI/ML | DevOps | Python

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Wellington, NZ

joe-hodges

hephxtus

hephxtus.github.io

STRENGTHS

- AI/ML
- Cybersecurity
- DevOps
- Virtualisation
- Linux
- Agile
- CI/CD
- Red Hat
- Software Design
- VCS
- Fast learner
- Persistence
- Prioritisation
- Teamwork
- Communication skills
- Seek out Feedback
- Goal Oriented

LEARNING

- AWS
- Docker
- Networking
- Cloud
- Generative AI
- Mobile Development

LANGUAGES

Proficient:

Python | Bash | Java

Experienced:

Ansible | SQL | C++ | C#

Familiar:

Go | Ruby | F# | JS/TS

Frameworks:

Flutter | React | .NET

ABOUT ME

Software Engineer specialising in AI/ML and Full Stack Development with 2 years industry experience looking for next challenge. Motivated and eager to learn with experience at all stages of the software development lifecycle.

EXPERIENCE

Software Developer | NZX

11 2021 – Now

Wellington, NZ

- Designed, Implemented and Supported Automated Deployment scripts in python and ansible for applications and frameworks
- Developed CI/CD pipelines with Github Actions to ensure code quality organisation wide.
- Re-architect, Deployment and Maintenance of Tier One Legacy Systems across the organisation and stack.
- Oracle and Postgres Database Migration and deployment
- Assisted in training and upskilling new graduates

Junior Developer | Qontro

02 2021 – 11 2021

Auckland, NZ

- Brought in at the start of the year to rebuild their helpdesk (migrating to a freshdesk system), which involved writing an internal API in python as well as CLI to interact with it.
- Through personnel changes I became the defacto project manager and successfully saw this project through to handover.
- Briefed new project managers on progress, as well as giving regular updates to the wider company and CEO.
- Interfaced with Enterprise software, RESTful APIs, and python development
- Gained familiarity with Agile environments, Jira, and Confluence

ECS Outreach programme | Victoria University of Wellington

03 2020 – 11 2021

Auckland, NZ

- Mentorship of more first and second year Computer Science/Software Engineering Students
- Representing the Engineering faculty at events around Wellington
- Running lunchtime code club at local primary & intermediate school.

EDUCATION

BE (Hons) Software Engineering | Victoria University of Wellington

2019 – 2022

Wellington, NZ

- First Class Honours
- Specialising in AI/ML

PROJECTS

Genetic Algorithms for Community Detection in Social Networks | |

- Investigated existing Community detection algorithms, and identified issues
 - Developed and Implemented a new algorithm using GA utilizing Edien Vector centrality and local search to accurately and efficiently identify communities in social networks
 - Tested across large datasets and published results
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Exploratory Data Analysis and Manipulation | |

- Business and Data Understanding with seaborn
 - Data Preparation
 - ML model Design and Implementation with sklearn
 - Model Evaluation and Improvement
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Image Classification using CNN |

- Data Analysis and Augmentation with pytorch
 - Hyper Parameter Tuning
 - Building MLP and CNN's with kieras and tensorflow
 - Transfer and Ensemble Learning
 - Evaluation and Reporting
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Evolutionary Algorithms for Optimization, Computer Vision, and Machine Learning | |

- Cooperative Co-evolution Genetic Programming
 - Estimation of Distribution Algorithm
 - Evolution Strategies for Training Neural Networks
 - Evolutionary Programming and Differential Evolution Algorithms
 - Genetic Programming for Image Classification
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Evolutionary Computing for Optimization Problems | |

- used GA to solve a basic Knapsack problem and feature selection
 - used GP with symbolic regression to solve the Rosenbrock and Griewank Problems
 - NSGA-II to rank feature importance
 - Particale Swarm Optimisation for feature selection
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Checkout portfolio linked at the top for more info