

COPELAND ROYALL

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copey.dev

SKILLS

Languages Python, TypeScript/Javascript, Go

Software GCP, AWS, Kubernetes, Linux, Terraform, Pulumi, Node.js, CI/CD, Docker, Git

EXPERIENCE

Stealth Startup

January 2025

Cloud Engineer (Contract)

Architected and deployed AWS systems for early-stage startup using infrastructure as code.

- Created complete backend infrastructure for mixed EU/US platform, each with multiple test environments
- Utilized TypeScript/Node.js and Pulumi IaC for consistency between deployments and significant time savings when making changes to all projects

Visa

September 2023 – May 2024

Software Engineer

Created GCP infrastructure for payment industry product rollout in Europe with automated deployments, and established TypeScript development practices for infrastructure as code.

- Implemented TypeScript Pulumi IaC package to repeatably deploy 256 Pulumi resources across 4 Google Cloud (GCP) projects, meeting Payment Card Industry compliance, reducing deployment time and automating manual steps; also wrote packages for managing GKE, IAM and KMS resources
- Developed Pulumi packages with comprehensive unit testing using Mocha and Chai and created multi-language SDKs enabling TypeScript, Go and Python use cases
- Coordinated deployment of Cloudability FinOps in 45 production projects, calculating 10% cost savings
- Installed and updated Kubernetes cluster addons using Argo CD, Kustomize and Helm
- Migrated Concourse CI pipelines to new load-test platform

Visa

Summer 2022

DevOps Engineering Intern

Accelerated adoption of AWS by developing foundational Terraform packages and development processes.

- Developed Terraform modules for AWS Aurora and ElastiCache Redis for standardized multi-team use, including best practice configuration for enforced quality
- Created Terraform Enterprise and tfsec (security analysis) development workflow using Docker and WSL

Tangible AI

Summer 2021

Natural Language Processing Intern

Contributed Python ML-driven positivity-ranking news reader feature to open-source chatbot.

- Generated training data using Facebook and web scrapers for news article text and post reactions
- Trained TFIDF vectorizer and multi-output ridge regression model for positivity prediction, achieving a significant R^2 (model fit) score of 0.61, and an end classifier model for personalized recommendations

EDUCATION

University of Edinburgh

2019 – 2023

BSc Computer Science, First-class honors (GPA: 4.0)

Dissertation:

- Microservices and message queue-based multi-receiver ADS-B aircraft tracking data aggregation system
- Written in Go, utilizing Apache Kafka, MongoDB and GraphQL
- Achieved 10ms end-to-end latency

HOMELAB

Kubernetes Cluster

- Multi-network K3s cluster deployed with Flux CD, GitHub Actions, Linkerd, ingress-nginx, cert-manager, Prometheus/Grafana stack, SOPS (secrets), Helm, Cloudflare, Tailscale, Ubuntu
- [Severance-inspired Nginx + WebGL website](#) for fans of TV show, reaching 4,000 visitors
- [Python + Flask proxy service](#) for streaming podcasts through VPN server to change advert languages
- Google Gemini AI-based YouTube yoga analysis bot to log sessions on Strava with ASCII graphs

INTERESTS

[Long distance bike touring](#), mountain biking, camping, aviation, guitar