

Dung Tran

SENIOR DEVOPS ENGINEER

+84-838-862-789 trdung.8398@gmail.com tdusnewbie Dung Tran

Senior DevOps Engineer with 6+ years of experience specializing in **Platform Engineering** and **Cloud-Native Architecture**. I have a proven track record of building high-scale, secure infrastructure on AWS and Azure. I focus on **FinOps (Cost Optimization)**, **GitOps**, and creating self-service platforms that allow developers to deploy hundreds of microservices safely and independently.

Professional Experience

Vietnam Silicon

Senior DevOps Engineer / Platform Lead

HO CHI MINH CITY, VIETNAM

Apr 2025 – Present

- **Enterprise Cloud Architecture:** Architected a multi-account AWS environment using **AWS Organizations** and specialized **Organizational Units** to meet strict enterprise compliance and security standards.
- **High-Scale Infrastructure Scaling:** Optimized resource management for heavy AI and data workloads using **Karpenter** and **KEDA**, ensuring system stability and high availability across 10+ AWS accounts.
- **Internal Developer Platform (IDP):** Designed and built a self-service deployment framework (using **Makefile**, **yq**, and **envsubst**). This allowed developers to manage **200+ microservices** independently while maintaining 100% compliance with production standards.
- **High-Scale GitOps:** Standardized deployment workflows across multiple clusters using **Argo CD** (App-of-Apps pattern). This improved the reliability of global deployments and reduced infrastructure provisioning time by **70%**.
- **Modular CI/CD Design:** Engineered a centralized **Reusable Workflow** architecture in GitHub Actions. This standardized pipelines across both **monorepo** and **multi-repo** setups, significantly improving scalability.
- **Zero-Trust Security:** Modernized the security stack by moving to **HashiCorp Vault** for dynamic secrets and **SOPS** for encrypted Git-based configurations. Integrated **Bank-Vaults** for sidecar-less secret injection into production pods.
- **Cloud Observability:** Orchestrated a centralized monitoring pipeline using the **Grafana LGTM stack** (Alloy, Mimir, Loki, Tempo). This unified logs, metrics, and traces, reducing the **Mean Time To Resolution (MTTR)** for production incidents by 40%.

Talentnet Corp

Senior DevOps Engineer

HO CHI MINH CITY, VIETNAM

Mar 2023 – Apr 2025

- **Hybrid CI/CD Architect:** Designed high-availability CI/CD models for **Azure Cloud** and **On-Premise** HR Tech systems. Standardized infrastructure across Dev, Staging, and Production to ensure 100% environment parity.
- **Modern IaC Research:** Led a technical migration study to move legacy Terraform stacks to **Pulumi TypeScript**, improving type safety and infrastructure testing capabilities.
- **Reliability Engineering:** Integrated **k6** for automated performance testing and designed **Disaster Recovery (DR)** strategies for critical payroll systems to ensure zero business interruption.

KMS Technology

Software / Senior DevOps Engineer

HO CHI MINH CITY, VIETNAM

May 2019 – Mar 2023

- **High-Security Pipelines:** Built secure CI/CD workflows for Healthcare applications, focusing on automated compliance auditing and data protection.
- **Engineering Efficiency:** Developed a custom test orchestration engine using **Docker** and **Python**, reducing large-scale test execution time by 50%.
- **Internal Platform:** Built a TypeScript-based developer portal integrated with Google APIs to improve team transparency and automated process tracking.

Technical Innovation & Personal Projects

Hybrid-Cloud Enterprise Homelab

Personal Project

DEVOPS & INFRASTRUCTURE

Ongoing R&D

- **High-Availability & Networking:** Achieved full redundancy using **Keepalived** and a **Technitium DNS cluster**. Designed a multi-layer traffic flow (NLB to ALB architecture) forwarding from **Nginx Proxy Manager** to a **Traefik Ingress** controller.
- **Hybrid-Cloud Infrastructure:** Managed a 2-node **Proxmox VE** cluster with a cloud witness node (OCI) via **Tailscale** and **Corosync QDevice** to ensure quorum across a multi-provider environment.
- **Infrastructure Automation:** Used **Ansible** to automate the entire system lifecycle, from OS hardening and LXC/VM provisioning to the deployment of a production-ready **K3s (Kubernetes)** cluster.
- **GitOps & Storage:** Implemented an **ArgoCD** “Root App” pattern for declarative cluster management. Orchestrated **Longhorn** for distributed block storage and **MetalLB** for bare-metal LoadBalancer support.

Skills & Technical Stack

- **Orchestration:** Kubernetes (EKS/AKS/K3s), ArgoCD, Helm, Karpenter, KEDA, Traefik, Longhorn
- **IaaS & Automation:** Terragrunt, Terraform, Ansible, Pulumi, GitHub Actions, Makefile, Bash
- **Observability:** Grafana, Prometheus, Alloy, Mimir, Loki, Tempo, Vector
- **Security & Ops:** HashiCorp Vault, Bank-Vaults, Teleport, SOPS, GitHub OIDC

Certifications & Languages

- AWS Certified Solutions Architect – Associate
- Duolingo English Test – Proficient (CEFR C1/C2)

Education

HCM University of Science

Information Technology

HO CHI MINH CITY, VIETNAM

2016 - 2020