# Eric Huang

# Site Reliability Engineer

Certified Kubernetes Administrator and conscientious software engineer. Aiming to leverage my skills in automation, observability, cloud-native solutions, and problem solving abilities to improve system reliability and efficiency.

# **Work Experience**

## **Site Reliability Engineer**

Engineering Dept., LINE Taiwan Limited

Dec. 2022 - Present

Taipei, Taiwan

- Co-maintained internal Terraform provider <u>terda</u> and promoted Terraform adoption and advocacy at LINE Taiwan.
- Profiled and tuned the self-hosted Loki, reducing storage overhead by 80% and keeping query performance.
- Introduced Grafana Alloy and Faro SDK at LINE Taiwan, achieving end-to-end tracing, RUM, and presented the work at <u>COSCUP 2024</u>.
- Developed slack-based workflow automation framework and migrated pipelines to GitHub Action, improving operational quality.
- Designed and built internal infra cost calculator, metrics snapshotter, and dashboards, providing cloud spending visibility and optimization.
- Developed internal secret management system integration toolkit, including GitHub Action and ArgoCD plugin, to enhance security and compliance.
- Analyzed the root cause of technical debt, and developed alternative solution to resolve it. Also helped sunsetting highly operational cost internal system.

#### **Senior Engineer**

Intelligent Banking Division, E.SUN bank

May 2021 - Dec. 2022

Taipei, Taiwan

- Designed & built up a robust monitoring/alerting system that collect **15+** GB metrics per day across **100+** servers.
- Experienced in Kubernetes administration & cluster and service migration for 8 cluster (60+ nodes) with 95% & 99% SLA.
- Adopted automation tool to construct production-grade and GPU-accelerated k8s cluster, and contributed to upstream <u>Kubespray</u> & backported to existing playbook.
- Developed tools for automating process of daily routine, config management, app deployment, and system validation task, which lead to effectively reduce operational costs.

## Engineer

Computer Integration Manufacturer, tsmc

Ct 2020 - Jan 2021

Hsinchu, Taiwan

# **Projects**

#### Rust Playground with WASM

• Forked <u>Rust Playground</u> to render Web Assembly from compiled Rust, and managed to render them on <u>mdBook</u> as well.

## **Court Reserver**

Rust CLI program for Taipei Metropolitan court reservation, runs in the concurrency way to avoid manual operation on APP.

**(**+886)986366141

in chen-yi-huang

**?** titaneric

**⊘** www.titaneric.com

☑ chenyihuang001@gmail.com

# **Skills**

#### **Programming**

Python • Golang • Rust • Typst

# **Technologies**

Kubernetes • Containerization • Nvidia Cloud-Native tech • Linux SysAdmin • TCP/IP • Observability • ArgoCD

#### IaC, CI/CD

# **Education**

#### MEng

Data Science

Yuan Ze Univ.

**1** 2018 - 2020

National Chiao Tung Univ.

#### **BSc**

DSC

Computer Science

**2**014 – 2018

# **Articles**

- Grafana Alloy Best Practice
- [transl.] Terraform for Verda A journey of Infrastructure as Code for our private cloud
- The Journey to the Kubernetes
  Networking
- The Journey to the Kubernetes metrics
- Auto Differentiation
- Buddy System

# **Contributions**

# Reduce redundant calculation

pytorch, jax, autograd

Fix golang map iteration (BPF)

**♀** <u>beyla</u>

# Support kubeadm patch

**Q** <u>kubespray</u>

# **Awards & Certs**

- LINE Dev Governance Best Practice
- <u>Certified Kubernetes Administrator</u>
- Arctic Code Vault Contributor