# **JUSTIN PHAM**

## **SOFTWARE ENGINEER**





# **SKILLS**

Adobe XD Figma HTML, CSS SQL Java Kubectl AWS

Docker

## **EDUCATION**

Michigan State University Bachelors of Art, Experience Design

## **TRAINING**

#### Revature

Site Reliability Engineering

# **EXPERIENCE**

# Revature | Site Reliability Engineer

May 2022 - current

## Reverse Devops SRE - https://github.com/revature-rss-ben-1370/e-commerce-backend

Reverse, an E-Commerce MSA web application, will be deployed on Kubernetes. CI/CD pipelines will be developed for the frontend and backend services utilizing Jenkins with static code analysis, and high availability deployment strategies. Various information gathering tools such as Prometheus, Grafana, and the Metrics API will be implemented and leveraged for robust application metric gathering. The hosted application will be subjected to a series of production issues that must be handled by the project team.

#### Roles/Responsibilities:

- Provision EKS cluster using terraform
- Create CI/CD pipeline with Jenkins to automate build process
- Procure SLO document to set metric standards
- Use Prometheus with Grafana to monitor cluster and application.
- Utilize pair programming to accomplish project objectives

## Technologies:

Kubernetes, Jenkins, Grafana, Loki, Prometheus, Git, Maven, NodeJS, SonarQube, Terraform

#### Banking API - https://github.com/2205JavaSRE/PancakeController

The Bank app is a REST-based API that simulates banking operations. A customer can apply for an account, view their balance, and make withdrawals and deposits. An employee can approve or deny accounts and view account balances for their customers. A CICD pipeline is created with Terraform and used in the development process of the application. The pipeline will trigger a build using GitHub webhooks, it will create and push an image of the app to a public repository on DockerHub and will also deploy the app to a Kubernetes Cluster. Monitoring is achieved using Micrometer and Prometheus, with the metrics viewable in the Grafana dashboard. Alert rules are also created, based on SLOs that are defined by each team.

## Roles/Responsibilities:

API is built using Java with VScode
Took daily scrum notes for tasks and challenges (Scrum master)
Implemented Jenkins for CI/CD to our kubernetes cluster
Deployed Prometheus and Grafana to monitor metrics
Produced a SLO document to create metric standards

## Technologies:

Java, maven, Kubernetes, AWS EC2, Helm, Jenkins, Prometheus, Grafana, Docker, Terraform, Javalin

#### Expense Reimbursement API - https://tinyurl.com/3n7mnbkj

The Employee Reimbursement System (ERS) is a REST API that helps manage the process of reimbursing employees for expenses. Employees can be created and edited via the API. Expenses for employees can be added and updated to pending and approved. The application is a docker-compose project on a remote compute instance, hosted on the AWS Cloud Platform. Monitoring is also implemented, using Prometheus and Grafana.

#### Roles/Responsibilites:

Restful API is built using Java with Spring tool Eclipse
Test endpoints with Postman
Setup a database on AWS to store information
API is containerized and running on docker-compose network
Monitored application using micrometer, Prometheus, and Grafana

#### Technologies:

Java, Javalin, PostgreSQL, Postman, AWS RDS, AWS EC2, Docker, Prometheus, Granfana