Neeraja Khanapure

704-241-3152 — nirja.khanapure@gmail.com — linkedin.com/in/neerajakhanapure — Austin, TX

Professional Summary

Site Reliability Engineer with 9+ years of experience building and maintaining large-scale distributed systems across cloud platforms. Specialized in Kubernetes orchestration, infrastructure automation, and observability for high-throughput production environments. Strong background in Linux systems, Python and Go development, and designing reliability frameworks that support mission-critical services. Proven track record of reducing operational overhead through automation and improving system reliability through proactive monitoring and incident management.

Technical Skills

Programming Languages: Python, Go, Java, JavaScript, Bash, Shell Scripting, SQL
Container Orchestration: Kubernetes, Docker, Helm, EKS, GKE, Microservices Architecture
Cloud Platforms: AWS (EC2, EKS, Route 53, CloudWatch, VPC), GCP (GKE, Compute Engine), Azure
Infrastructure as Code: Terraform, Ansible, CloudFormation, Configuration Management
Monitoring & Observability: Prometheus, Grafana, Splunk, CloudWatch, Datadog, Alert Management
CI/CD Tools: Jenkins, GitHub Actions, Spinnaker, GitOps, Pipeline Orchestration
Databases: MySQL, MongoDB, DynamoDB, Redis, Elasticsearch
Linux Systems: Performance Tuning, System Administration, Networking, Troubleshooting

Professional Experience

Site Reliability Engineer (Contract) - Technical Lead April 2021 – Present
Apple Austin, TX

- Led reliability engineering for payments portal front-end pipeline and event management platform serving millions of daily transactions, ensuring 99.9% uptime across multi-region deployments through proactive monitoring and incident response.
- Designed and implemented comprehensive observability strategy using Prometheus and Grafana for microservices architecture, creating custom dashboards and alert rules that reduced mean time to detection by 45% for critical system health metrics.
- Orchestrated enterprise-wide migration from Datadog to Grafana across multiple product lines, coordinating with cross-functional teams to establish monitoring standards, convert existing dashboards, and train engineering teams on the new platform with zero service disruption.
- Built Python automation tools for operational tasks including log aggregation, metric collection, and incident triage, reducing manual operational overhead by 40% and enabling the team to scale infrastructure more efficiently.
- Architected Kubernetes cluster scaling solutions for connected technologies platform, designing network topology with VPC peering, configuring pod autoscaling policies, and implementing security controls to meet PCI compliance requirements.
- Established SLI/SLO framework for cloud-based microservices following SRE best practices, defining measurable reliability targets and error budgets that aligned engineering priorities with business objectives for system availability.
- Led post-mortem analysis for production incidents, facilitating blameless reviews with development and operations teams to identify root causes, document learnings, and implement preventive measures that reduced recurring incidents by 60%.
- Managed fleet infrastructure for software delivery lifecycle, coordinating provisioning workflows, resource allocation, and deployment orchestration across development, staging, and production environments.
- Developed DNS infrastructure using Route 53 with health checks and failover routing policies, imple-

menting global traffic distribution patterns that improved service availability during regional outages.
- Designed RBAC policies and IAM role structures for multi-tenant Kubernetes clusters, establishing principle of least privilege access controls and audit logging that reduced security incidents by 60%.
- Collaborated with vendors on multi-cloud deployment strategies, defining integration requirements for Spinnaker pipeline orchestration and service mesh implementations across AWS and GCP environments.

Site Reliability Engineer (Contract) - Cloud Infrastructure May 2020 – April 2021
PayPal San Jose, CA

- Built monitoring infrastructure using Grafana and Prometheus for payment processing systems handling high-throughput financial transactions, implementing telemetry correlation and alerting that improved incident response times.
- Designed GCP infrastructure for scalable microservices deployment, creating Terraform modules for automated provisioning of compute resources, load balancers, and networking components across multiple environments.
- Managed GKE cluster operations for containerized applications, configuring resource quotas, implementing horizontal pod autoscaling, and establishing high availability patterns with multi-zone deployments.
- Implemented network security controls and firewall rules for cloud environments, balancing access requirements with compliance policies while maintaining secure communication between services.
- Troubleshot distributed systems performance issues, using tracing tools and profiling techniques to identify bottlenecks in service communication, database queries, and resource contention scenarios.
- Standardized deployment processes using Helm charts for application packaging, creating reusable templates that reduced deployment complexity and improved consistency across environments.

DevOps Engineer - Infrastructure Lead January 2017 – September 2018
Elata Technologies Virginia Beach, VA

- Architected container orchestration platform on Kubernetes for enterprise applications, designing cluster topology, implementing pod scheduling strategies, and configuring persistent storage for stateful workloads.
- Automated AWS infrastructure provisioning using Terraform and Ansible, developing reusable modules for VPC creation, EC2 instance management, and security group configuration that reduced deployment time by 70%.
- Established configuration management practices using Ansible playbooks, standardizing system configurations across server fleets and enabling consistent environment setup for development and production systems.
- Implemented observability stack using LGTM (Loki, Grafana, Tempo, Mimir), creating comprehensive monitoring dashboards and alert configurations for proactive detection of system anomalies and performance degradation.
- Led Cloud Custodian adoption for automated security policy enforcement, developing custom rules for resource tagging, access control validation, and compliance monitoring across AWS accounts.
- Optimized system performance through Linux kernel tuning, application profiling, and database query optimization, working closely with development teams to implement recommendations that improved response times.

CI/CD Engineer (Contract) April 2016 – December 2016
AT&T Middletown, NJ

- Led migration from Hudson to Jenkins for CI/CD pipelines, redesigning build workflows, implementing pipeline-as-code using Groovy, and training development teams on new platform capabilities.
- Automated deployment processes using Ansible, creating playbooks for application deployment, configuration management, and rolling updates that reduced deployment errors and improved reliability.
- Developed Python automation scripts for backend task processing, data pipeline management, and operational workflows, integrating with existing systems through RESTful APIs.

Software Engineer (Contract) - Full Stack September 2015 – March 2016
Capital One Wilmington, DE

- Built responsive web applications for financial transaction processing using AngularJS, handling over 100,000 daily transactions with real-time validation and fraud detection integration.
- Designed CI/CD pipelines with integrated monitoring using Splunk and CloudWatch, implementing log aggregation, custom alerts, and dashboards that reduced incident response time by 60%.
- Optimized database performance for MySQL and MongoDB deployments supporting high-frequency trading applications, implementing indexing strategies and query optimization techniques.

Software Engineer (Contract) September 2014 – July 2015
McGraw Hill Education Columbus, OH

- Developed RESTful web services and front-end interfaces using AngularJS and JavaScript, implementing API endpoints, client-side validation, and responsive UI components for educational platform serving thousands of students.
- Automated build processes using Grunt, Gulp, Maven, and Jenkins to standardize compilation, testing, minification, and deployment workflows that improved developer productivity and code quality.
- Applied software engineering best practices including version control with Git, code reviews, unit testing with JUnit and Jasmine, and documentation to ensure maintainable and scalable application architecture.

Software Developer August 2011 – October 2012
Appzeal Technologies Ltd India

- Built internal web applications using Java, JavaScript, MySQL, and AJAX, gathering requirements from business stakeholders and implementing features for workflow automation and data management.
- Integrated third-party APIs and developed dynamic UI features using jQuery, creating interactive components that improved user experience and streamlined internal business processes.

Education

University of North Carolina Charlotte, NC
Master of Science in Computer Science May 2014
University of Mumbai India
Bachelor of Engineering in Electronics & Telecommunications June 2011