

Summary

Engineering professional with a proven track record of automating infrastructure on AWS using Terraform and deploying scalable applications with Docker and Kubernetes. Experienced in orchestrating end-to-end software delivery processes and managing robust CI/CD pipelines. Skilled in proactive system health monitoring and implementing comprehensive logging and alerting solutions with Prometheus and Grafana to ensure system reliability and high availability. Committed to optimizing performance and streamlining operations through close collaboration with development teams.

Skills

- Git
- Docker
- Jenkins
- CI/CD pipeline
- Kubernetes
- Terraform
- Prometheus
- Grafana
- Argo CD
- AWS
- Nagios
- Windows/Linux

Certificates

- Certified Ethical Hacker (CEH), Ec-Council, 2024-12-01
- Data Structure and Algorithm, Self Placed (Geeks for geeks), 2023-07-01
- Computer Architecture and Computer Organization, Udemy, 2023-05-01
- The World of Computer Networking, Udemy, 2022-10-01

Projects

- Kubernetes Website Deployment with Autoscaling: -Aug'25
 - Deployed a containerized web application on a Kubernetes Kind cluster, leveraging Docker Hub as the image repository.
 - Created and managed namespaces, deployments and services to ensure organized resource allocation and external Accessibility.
 - Configured VPA to automatically adjust resource and scale up to 10 pods under high load, ensuring performance and reliability.
 - Implemented Kubernetes objects to stimulate production-grade workload management and autoscaling strategies.
- Infrastructure-as-Code (IaC) Static Site Deployment on AWS: -Mar'25
 - Provisioned and automated the deployment of a static website using Terraform, creating AWS EC2 infrastructure with proper security groups, Docker installation, and application containerization.
 - Built and containerized a website using NGINX and Docker, pushed the image to Docker Hub, and orchestrated its deployment on AWS via `user_data` scripting within Terraform.
 - Implemented Infrastructure as Code (IaC) using Terraform to configure networking (security groups), compute resources, and application deployment on AWS, enabling reproducible and scalable deployments.
 - Achieved full-stack deployment automation using Docker, AWS EC2, Terraform, and NGINX, resulting in a zero-touch provisioning process and a fully functional web application running on the cloud.
- CI/CD Pipeline with Monitoring: -Oct'24
 - Designed and implemented a robust CI/CD pipeline using Jenkins, Docker, and AWS EC2 to automate the end-to-end lifecycle of web application deployment.
 - Integrated GitHub with Jenkins via webhooks to enable automated build and deployment triggers on every code commit, improving development efficiency and release consistency.
 - Configured Docker containers for isolated, repeatable build and deployment environments, ensuring platform-agnostic deployment of web applications.
 - Set up Nagios monitoring to track EC2 instance health, service uptime, and resource utilization, enabling real-time infrastructure alerting.

Education

- 08/2021 Lovely Professional University - Punjab, India
Bachelor of Technology Computer Science and Engineering
GPA: CGPA: 7.07
- 03/2021 Elite International School - Jhajjar, Haryana
Intermediate
GPA: Percentage: 82%
- 03/2019 Elite International School - Jhajjar, Haryana
Matriculation
GPA: Percentage: 85%

Achievements

- 5 Star Rank in C Language, Hacker Rank
- 3 Star Rank in C++ Language, Hacker Rank

Profiles

- [linkedin.com/in/nikhil-kumar-nik](https://www.linkedin.com/in/nikhil-kumar-nik)
- github.com/demonikkk