**JEEVAN G**

**Senior DevOps Cloud Engineer**

With over 14 years of professional IT experience, I am an AWS/DevOps Engineer committed to automation and optimization. I specialize in bridging the gap between operations and development for efficient code delivery to customers. My expertise includes Cloud services and DevOps automation development on Linux systems. I am currently seeking a role in AWS/DevOps to leverage my technical skills.

**PROFESSIONAL SUMMARY**

* Proficient in shell scripting languages, including BASH for Linux and Mac, as well as PowerShell for Windows systems.
* Extensive experience in implementing AWS Redshift data warehouse solutions, leading projects to migrate data from on-premise databases to AWS Redshift, RDS, and S3.
* Actively involved in automating data processing tasks using Python, creating scripts to streamline input value file generation and Terraform module and workspace initialization.
* Utilized Terraform and Python to automate provisioning and repetitive tasks, coupled with Docker containerization and service orchestration.
* Well-versed in AWS security tools like CloudTrail, AWS Inspector, Kibana, Grafana, and AWS Guard Duty, with experience in monitoring network, file systems, and process activity using AWS Inspector Software Agents.
* Automated AWS S3 data transfers with Python scripts.
* Proficient in designing microservices deployment using Docker and Kubernetes, implementing DevOps practices across AWS, Google Cloud, Elastic Search, Beanstalk, and Kubernetes.
* Led the implementation of Continuous Integration (CI) using Jenkins and continuous deployment practices.
* Installed and configured Chef Server and created recipes for environment setup, as well as wrote Ansible playbooks, tasks, roles, and templates.
* Orchestrated AWS provisioning and management using Ansible and Jenkins, covering EC2 instances, volumes, DNS, and S3.
* Developed infrastructure automation in AWS, working with services like EC2, Dynamo DB, Lambda, EBS, RDS, Dynamo, ELB, and EIP through AWS Cloud Formation.
* Utilized Amazon Web Services API and Boto/AWS SDK to automate cloud deployments.
* Set up and configured Nagios for network service and host resource monitoring, complemented by server monitoring tools like Datadog, CloudWatch, and ELK Stack (Elastic Search, Logstash, Kibana).
* Served as the Communication Lead for resolving P1 and P2 critical issues, actively contributing to Site Reliability Engineering (SRE) duties, including alert automation and monitoring Service Level Objectives (SLO) and Service Level Indicators (SLI) latency issues.
* Implemented Dynatrace for application performance monitoring across various cloud technologies, such as AWS and GCP, achieving end-to-end implementation.
* Implemented Elastic Search and Logstash to centralize logging and securely store logs and metrics in an S3 bucket using Lambda functions.
* Took on the responsibility of installing, setting up, and configuring Apache Kafka.
* Worked with Apache Kafka to achieve high throughput for both publishing and subscribing, utilizing disk structures that ensure consistent performance even when dealing with terabytes of stored messages.
* Managed centralized monitoring and logging for both cloud and on-premises systems, employing tools such as New Relic and Splunk.
* Installed Jenkins on a Linux machine and established a master-slave configuration to enable concurrent builds through a build farm.
* Utilized GIT to diligently track all work and source code changes.
* Excelled in documentation and consistently applied Agile Methodology to software development processes and methodologies.

Skills Profile

* **Cloud Services:**

**Amazon Web Services** - EC2, S3, Route53, VPC, SNS, SQS, SWF, EMR, Redshift, DynamoDB, RDS, CloudFront, ELB, EBS, Elastic Cache, ECS, Lambda, Cloud Watch, CloudFormation, Glacier/Snowball etc.

* **Automation Frameworks**: Terraform and Ansible.
* **Containers, Clusters:** Dockers, Kubernetes, Open shift.
* **Programming Languages**: C, BASH, C++, Python, shell scripting, YAML, Core Java.
* **Database Servers**: Dynamo DB, Oracle, MySQL, MS SQL.
* **Operation Systems**: Linux, Windows.
* **Web Servers**: Apache Tomcat

**Professional Experience:**

Client: **Kroger, Cincinnati, OH**

Role: **Sr. DevOps Automation Engineer** Duration: **May 2022 – Present**

Kroger Health & Wellness is one of America’s leading retail healthcare organizations with 2,200 pharmacies and 11 specialty pharmacies, and 225 clinics nationwide.

**Responsibilities:**

* Automated build and deployment process for applications, culminating in the development of a comprehensive continuous integration system using Jenkins.
* Proficiently utilized Terraform, a tool for securely and efficiently building, changing, and versioning infrastructure. Employed key Terraform features, including Infrastructure as Code, Execution Plans, Resource Graphs, and Change Automation.
* Significantly reduced build and deployment times by implementing a Docker workflow. Maintained Docker container clusters managed by Kubernetes, which were leveraged for the runtime environment of the CI/CD system to build, test, and deploy.
* Established pipelines to deploy code from GitHub to Kubernetes (K8s) clusters in the form of Docker containers, utilizing the Spinnaker platform.
* Enhanced automation using Bash and Python, including Boto3, in conjunction with Ansible and Terraform for tasks such as encrypting EBS volumes, backing up AMIs, and scheduling Lambda functions for routine AWS operations.
* Wrote Python scripts for managing AWS resources through API calls using the BOTO SDK and worked extensively with AWS CLI.
* Developed scripts for creating new snapshots and purging old snapshots in S3 using S3 CLI tools.
* Successfully installed and configured Enterprise JFrog Artifactory.
* Designed Python and Jenkins-based microservice onboarding tools to simplify the creation and maintenance of build jobs, Kubernetes deployments, and services.
* Implemented AWS Lambda functions to execute scripts in response to events in Amazon DynamoDB tables, S3 buckets, or HTTP requests via Amazon API Gateway.
* Employed Docker Swarm to cluster containers for high availability and to manage various infrastructure resources, including physical machines, VMs, and Docker containers using Terraform.
* Installed and configured AWS Inspector created targets and templates, and scheduled assessment runs for all EC2 instances within the AWS account.
* Collaborated with application teams to install and update operating systems, Hadoop, patches, and version upgrades. Integrated Kafka with Spark in a sandbox environment.
* Integrated applications with the New Relic monitoring tool to gain comprehensive insight and proactive monitoring.
* Worked on AWS Lambda functions development as part of the Micros services development.
* Utilized New Relic to monitor changes across the CI/CD pipeline and infrastructure. Supported and maintained log analytics frameworks through ELK (Elasticsearch, Logstash, Kibana).
* Monitored servers using Nagios and CloudWatch, while also leveraging the ELK Stack (Elasticsearch, Fluentd, Kibana).
* Established infrastructure and service monitoring using Prometheus, Grafana, Elasticsearch, Kibana, and Fluentd, with CloudWatch for logging and monitoring.
* Introduced Prometheus and Grafana and created dashboards to visualize SaaS product behaviors, focusing on the Four Golden Signals.
* Crafted custom Prometheus queries and made modifications to Prometheus collectors and filters to ensure relevant data was passed into Grafana.
* Integrated the Datadog cloud monitoring tool with PagerDuty for real-time alerts to designated points of contact (POCs).
* Developed DataDog dashboards for various applications and monitored real-time and historical metrics.

Client: **Convergint, Chicago, IL**

Role: **Sr. DevOps Automation Engineer** Duration: **July** **2019 – Apr 2022**

Convergint is a Security & Investigations service provider. Convergint works with global network of partners and manufacturers to design, install, and service electronic security, cybersecurity, fire and life safety, building automation, and audio-visual systems for enterprise customers.

**Responsibilities:**

* Analyzed the Requirements from the client and developed Test cases based on functional requirements, general requirements, and system specifications.
* Prepared test data for positive and negative test scenarios for Functional Testing as documented in the test plan.
* Responsible for Installation, Configuration Management, Maintenance and Systems Development of RedHat Linux, Linux / UNIX Systems.
* Responsible for VMware provisioning & application build using Jenkins, Puppet and Chef.
* Monitored the systems and administered Servers for day-to-day problems, patches, user administration, and hardware failure, monitoring log files, backup, and software up gradation, configuration changes and documentation.
* Collected data to monitor the JVM garbage collector activity and used the data to visualize out-of-memory situations of applications in a Kibana dashboard which I created.
* Instrumented Dynatrace with AWS EC2, Lambda applications.
* Worked on p1 and p2 issues using Dynatrace identified bottleneck issues.
* Experience working with Docker Hub, Internal Docker Registry and Docker Engine.
* Provided end-user training for all Subversion (SVN)/GIT users to effectively use the tool.
* Developed build using ANT and MAVEN as build tools and used Jenkins to kick off the builds move from one environment to other non-prod environments.
* Implemented continuous delivery pipe line using Docker and Jenkins.
* Written scripts for Jenkins home backup daily into JFrog Artifactory.
* Design, build and manage the ELK (Elasticsearch, Logstash, and Kibana) cluster for centralized logging and search functionalities for the App.
* Worked on AWS Lambda functions development as part of the Micros services development.
* Validate the agents installed on it for CI/CD flow and check the application status after rehydration and Jenkins provides continuous integration services for software development.
* Designed a system using Kafka to auto - scale the backend servers based on the events throughput.
* Utilized AWS CLI to automate backups of ephemeral data-stores to S3 buckets and EBS.
* Experienced with installation of AWS CLI to control various AWS services through SHELL/BASH scripting.
* Participated in 24x7 on call support rotation, owned high/critical system issues and engaged stakeholders through PagerDuty to resolve issues at earliest possible timeframe.
* Co-ordinate offshore development and manage day to day activities

Client: **Vanguard, Raleigh, NC**

Role: **Sr.** **DevOps Engineer** Duration**: Oct 2017 – Jan 2019**

Vanguard is the largest provider of mutual funds and the second-largest provider of exchange-traded funds (ETFs) in the world. Vanguard offers brokerage services, educational account services, financial planning, asset management, and trust services.

**Responsibilities:**

* Deployed application updates using Jenkins. Triggering build on remote servers through Jenkins. Integrated Jenkins with various tools such as Nexus, Sonarqube, Checkmarx.
* On the DEV environment, executed scripts that will build docker images locally, tag docker images, automatically refresh authentication token and push the created/updated docker images to ECR registry.
* Monitored Network, File systems and process activity by installing AWS Inspector Software Agents on EC2 instances that are included in Assessments.
* Automated Amazon AWS Guard Duty to inspect and pull logs from various sources such as Amazon CloudTrail, Amazon VPC Flow and DNS logs for cloud automation.
* Used Amazon Guard Duty to prevent malicious activities for AWS EC2 instances, users and various AWS resources.
* Implemented AWS code pipeline and created CloudFormation JSON templates in Terraform for Infrastructure as code
* Deployment and implementation of Chef for infrastructure as code initiative.
* Worked on AWS Lambda functions development as part of the Micros services development.
* Using BotoAPI written Lambda functions for triggering and debugging the cloud watch metrics
* Managed Ansible Playbooks with Ansible modules, implemented CD automation using Ansible.
* Worked on setting up the policies to back the data from AWS S3 to AWS Glacier
* Experience in creating inventory, job templates and scheduling jobs using AnsibleTower.
* Deployed and migrated applications using AWS tools code pipeline, code commit, ops works & cloud formation.
* Environment: Docker, Git, Jenkins, EMR, Evident.IO, Ansible tower, CodePipeline, Powershell, Groovy.

Client: **Geico, Chevy Chase, MD**

Role: **Sr. Cloud Engineer** Duration: **Mar 2014 to Sep 2017**

GEICO (Government Employees Insurance Company) is a well-known American auto insurance company that provides coverage for cars, motorcycles, boats, and recreational vehicles. In addition to auto insurance, GEICO also offers homeowners, renters, and other types of insurance.

**Responsibilities:**

* Proficiently manage EC2 instances, VPCs, network gateways, ACLs, bastion host instances, public/private subnets, security groups, Elastic Load Balancer, Elasticache, S3, Auto Scaling Groups, ECS clusters, ECS tasks, ECS services, Route53, CloudFront, and Elastic IP within the AWS CLI.
* Collaborated with various AWS features, such as EC2, Workspaces, IAM, CloudWatch, and Lambda, to streamline operations.
* Successfully automated the deployment of AWS Workspaces for users using Python scripts, enhancing workflow efficiency.
* Demonstrated expertise in configuring Application Load Balancers (ALBs) with a focus on high availability, spanning multiple subnets across different availability zones, and fine-tuning security settings and health checks for applications.
* Implemented Amazon Guard Duty to proactively protect AWS EC2 instances, users, and other AWS resources from potential malicious activities.
* Leveraged AWS Lambda to create functions and assign roles for running Python scripts, enhancing automation capabilities.
* Proficiently managed AWS Elastic Block Storage (EBS), employing different volume types and selecting the appropriate EBS volumes to meet specific requirements.
* Successfully implemented OAuth and OpenID for both mobile and non-browser solutions using Ping Federate.
* Automated the deployment of Docker images using AWS CLI scripts, efficiently managed Docker container snapshots, image removal, and Docker volumes.
* Worked within an environment that utilized AWS, Git, Jenkins, Docker, Maven, Jira, Chef, Ansible, WebLogic, Nexus, Shell scripting, Python, and Nginx to drive operational success.

Client: **Multiple Clients**

Role: **IT Analyst** Duration: **Oct 2007 to Feb 2014**

* Proficiently manage EC2 instances, VPCs, network gateways, ACLs, bastion host instances, public/private subnets, security groups, Elastic Load Balancer, Elasticache, S3, Auto Scaling Groups, ECS clusters, ECS tasks, ECS services, Route53, CloudFront, and Elastic IP within the AWS CLI.
* Collaborated with various AWS features, such as EC2, Workspaces, IAM, CloudWatch, and Lambda, to streamline operations.
* Successfully automated the deployment of AWS Workspaces for users using Python scripts, enhancing workflow efficiency.
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* Successfully implemented OAuth and OpenID for both mobile and non-browser solutions using Ping Federate.
* Automated the deployment of Docker images using AWS CLI scripts, efficiently managed Docker container snapshots, image removal, and Docker volumes.
* Worked within an environment that utilized AWS, Git, Jenkins, Docker, Maven, Jira, Chef, Ansible, WebLogic, Nexus, Shell scripting, Python, and Nginx to drive operational success.
* Oversaw the installation and configuration of RHEL, CentOS, and SuSe operating systems.
* Managed day-to-day RHEL tasks, including user access, the establishment of sudo rules, and system upgrades.
* Proficiently installed and configured RAID arrays, including RAID 0, RAID 1, and RAID 5, ensuring data integrity and availability.
* Administered kernel, firmware, and RPM package updates, while also adding SAN disks to the system.
* Conducted the installation and configuration of critical network services, such as SSH, TELNET, FTP, DHCP, and DNS, enhancing network accessibility and security.
* Established robust network functionality by configuring services like NFS, NIS, TCP/IP, and ZFS.
* Proactively monitored and effectively resolved operating system issues to maintain system stability and performance.
* Provided around-the-clock on-call support on a rotational basis and managed high-priority incidents through bridge calls, ensuring uninterrupted system availability and performance.

**Education:**

Bachelors – Madras University, India – 2001

Masters in Computer Science – FDU, Teaneck, NJ -2007