Jasjeet Singh 408.550.5218 mrjasjeetsingh@gmail.com

(click 👆 to see my LinkedIn profile)







Certifications:

(certified for each, for verification, click each / any badge)

OVERVIEW

- 14+ years of IT Industry experience, as a self-motivated, target-driven, proven individual contributor, team leader & fast-learner, with extensive background as DevOps, Site Reliability Engineer and Solution Architect.
- Proven track record of superior performance in leading platform initiatives, meeting deadlines & delivering complex projects ahead of time, with aggressive schedules.

TechStack Exposure in Current Role for MicroService Architecture

Layers	Tools in use
Application Deployment Framework	GITOps for Canary or Blue/Green Application Releases
Container Orchestration Platform	Kubernetes clusters on-prem, AWS EKS
Container Runtime	Docker
Custom Resource Definitions (CRDs) used:	
Service Mesh	Istio, Consul
ContainerNetworkInterface(CNI) Plugin	Calico for n/wSecRules, Envoy Proxy for appSecurityRules
LoadBalancer	Ingress by Nginx, F5 Big-IP; CloudFlare, Netscaler/CitrixGateway
Monitoring & Observability	Prometheus with visualisation at Grafana, Kiali, AppDynamics, Splunk
ContinuousDeployment(CD)	argoCD, fluxCD
Package Manager & Deployment Tool	Helm Charts, Kustomize
laaC Tool	Terraform, AWS CloudFormation
Secret Storage	Vault, Delinea, CyberArk
Continuous Integration (CI) Tool	Jenkins Scripted Pipeline with DSL for GIT Branching & Bitbucket wf
Programming / Scripting Languages	Bash/Shell, Python, HCL, Ansible Playbook with Role fw, Groovy
Control scripts	kubectl, istioctl, eksctl, calicoctl, kops
Serialisation Formats	JSON, YAML
Source Code Repositories	GIT, BitBucket, GITHub, S3, Artifactory, DockerHub, ECR, SVN, RCS
Certificate Renewals & Deployments	AppviewX and Cloudflare, leveraging openssl/keytool cert mgmt utility

PROFESSIONAL EXPERIENCE

1. Principal DevOps Consultant, Application Engineering - TransUnion Jan 2023 - present (1 year)

I work on optimising design of scalable, highly available, large-scale distributed hybrid infrastructure for microservices; collaborate with multiple cross-functional teams for implementation and manage infrastructure, by working with NOC to rectify and automate any of repetitive workflows to achieve Operational Excellence

- Tech Stack used during entire SDLC:
 - System Design -- MS Visio / Confluence
 - Infrastructure creation/enhancement automation
 - Terraform CF scripts, invoking modules, for infrastructure resource creation/updates
 - Ansible configuration deployment scripts, written in Role Framework to push secrets in Hashicorp Vault
 - Kustomize / Helm Chart setup to include needed Kubernetes components to spin Docker instances, on-prem and in EKS cluster
 - Bash/Python code deployment scripts to invoke Helm charts to create
 & scale minimum count of pods on-prem.
 - argoCD / fluxCD used for newer micro-sites, with Istio used for entry gateway & Service Mesh

Application Code Deployment Release

- CI pipeline setup using Jenkins, triggered via SCM Hook of GIT/GITOps Merge of an approved feature branch, leading to invocation of Ansible Playbook.
- CD pipeline setup for GITOps framework via argoCD / fluxCD
- Observability -- Promethues/PMG scrapes logs from Metrics Server & IstioD's Galley; and used as DataSource for visualisation at Grafana/AMG, Kiali, AppDynamics; troubleshooting & setting up alerts using Splunk
- Periodic deployment and administration of Kubernetes clusters on-prem & in AWS.
- Introduced multiple process enhancements, leading to faster delivery times with significantly improved quality of deliverables.
- Regular renewal and deployment of certs at CloudFlare and/or AppViewX

2. Vice President, Application DevOps - Morgan Stanley, Menlo Park April 2014 - Jan 2023 (~ 9 yrs)

- Extensively worked on projects setup on-premises, Hybrid mode & on cloud.
- As **Solution Architect**, performed requirements gathering for various teams, set up Terraform scripts to build lower Environments, tested, updated based on feedback, re-built, got it certified and set up PRD/DR Environments.
- As **DevOps**, setup & enhanced **CI/CD** workflows
 - **On-Prem:** setup Jenkins Pipeline Libraries in Groovy scripting, with DSL and using GIT, BitBucket, writing Ansible Playbooks in YAML.
 - AWS: setup Code[Commit/Build/Deploy] via CodePipeline & Kubernetes(EKS) orchestration for ECS Fargate

- As **Technical Leader**, driven several new Project initiatives across SDLC with Capacity Planning, by collaborating with TechDev Teams, right from providing
 - optimal Design solutions with System Design Diagrams,
 - presented ProjectReview to Leadership till GoLive/SoftLaunch to deliver CertifiedSetup PRD/DR large-scale Distributed Systems
 - As Site Reliability Engineer, worked with NOC to monitor / ensure High Availability, scan alerts to remediate issues, via triage, troubleshooting, rectifying RootCauseAnalysis, fixes & enhancements.
- Performed continuous Automation of any repetitive tasks to Roll of legacy Distributed Systems, like cleanup of cache, reinstall/restart services, followed by cache warmup by triggering hits to most frequently used URLs, making initial performance slick & flawless, thereby leading to minimal human errors.
- Led Monolithic to Microservice migration & ApplicationSelf-Service control for Dev Teams to manage configs & environment-specific metadata with single PullRequest; & leverage ZeroBuildBreak(ZBB) before merging changes.
- Collaborated with cross-functional teams like Network, Storage, Dev, QA, PLT, NOC, DBA, SCM towards 3-tier Architecture setup for
 - Front-end service setup with CDN (Akamai & AWS CloudFront) talking to Nginx, Apache Web Servers, that internally talk over secure binary AJP protocol to Tomcat AppServer, JBOSS/Wildfly or WAS.
 - Service-layer setup for connections to fetch data from Database.
 - Backend collaborated with DBA Teams.

3. Tech Lead in Application Engineering - Cisco Systems, San Jose Apr 2009 - Apr 2014 (5 years)

- Setup HealthCheck of existing services via SystemCapacityPlanning initiative along with setup of monitoring alerts to track various applications.
- Automation of many processes like
 - o Application Code Deploy, Start/Stop/cleaning-cache, Content Cleanup
 - Index Rebuilds, DB Stats & Patch/Hotfix Deployments
- This helped businesses meet timelines well ahead of time, save money and efforts, improve efficiency, reduce time and avoid human intervention/errors.

EDUCATION

MS (Master of Science) in Software Engineering BITS-Pilani (Birla Institute of Technology & Science), Pilani, India, tied with MIT Cambridge 2005-09

BCA (Bachelor of Computer Applications)
JIMS (Jagan International Management School), GGS IP University, New Delhi, India 2002-05