# A close up of a sign  Description automatically generatedA close up of a sign  Description automatically generated

# Keyur Jayaswal [U.S Citizen]

#  Speaker Phone(214) 900-4929 Keyur.jayaswal@gmail.com <https://www.linkedin.com/in/keyurjayaswal/>

**PROFESSIONAL SUMMARY**
AWS Certified, 4+ years of hands-on experience with Multi Cloud security management, DevOps transformation, migrations, automation, microservices implementations supporting Healthcare, Retail, Mortgage, Media, Hotel & Resorts industry and govt clients. 18+ years of applications and Infrastructure management related technical consulting experience, helping various enterprise clients adopting agile methodology. Great understanding on NIST, CIA triad, HIPPA and PCI DSS compliance framework and experienced in layered security and Zero trust methodology (Infrastructure & Data / Network Security, User Access Mechanisms, Governance & Compliance, Monitoring & Event Management and Disaster Recovery/Business Continuity.)

Core Competency: Cloud adoption(AWS, GCP, Azure), Specialize in cyber security, compute & storage services, DevSecOps tooling (Prisma Cloud, Terraform, The Vault) and Continuous integration/continuous delivery (CICD) and deployment model, SAN (HP, IBM, EMC, DELL), NAS (NetApp), Fabric (Cisco and Brocade), Server (HP, Dell, IBM) Hypervisor (VMware, Hyper-V, IBM PowerVM, KVM), OS (UNIX, Windows) and Network Administration, Backup/Recovery, High Availability, Disaster Recovery, Virtualization, Database and Risk Management. Proficient in Palo Alto Cloud Native Security offerings (Prisma Cloud and Compute)

**EDUCATION**

* Amazon Certified Security – Specialty 2020
* Amazon Certified Solutions Architect 2019
* Amazon Certified Networking – Specialty (Targeted for September 2020)
* Amazon Certified Solutions Architect – Professional (Targeted for December 2020)
* Professional Certification of IBM Advance POWER Virtualization 2004
* Professional Certification of IBM pSeries and p5 Systems Administration AIX V5.3 2004
* Professional Certification of IBM pSeries AIX System Support V5.1 2004
* Attend three-year college to peruse bachelor’s degree in Computer Science, Dallas County Community College, Dallas, TX 1999

**TECHNICAL TRAINING**

* Microsoft Azure Essentials training AZ-900 2020
* Running Kubernetes on AWS Workshop 2020
* Participated in Docker Essentials Training 2019
* DS8000/DS6000/DS4000 Storage & Copy Services Hands-On Workshop 2006
* SAN Volume Controller 2145 & Copy Services Hands-On Workshop 2006
* SAN Storage Hands-On Workshop for EMC VMAX, VNX, VPLEX, CLARiiON, DMX 2010
* NAS Storage Hands-On Workshop for NetApp Storage 2010
* IBM Virtualization PowerVM , Logical Partitioning and Micro-Partitioning Workshop 2007
* HACMP Planning, implementation and Advance Problem Determination Hands-on Workshop 2005
* Participated in Redhat Linux Systems Administration workshop RHCE 2004

**PROFESSIONAL EXPERIENCE**

**NTTDATA Services**  Oct 2013- Feb 2020

**Cloud Solutions Architect – SecOps (AWS)** Dallas, TX

* Worked with stakeholders to build Secure Cloud adoption Framework (CAF), migration strategy that moved 300 plus applications securely to AWS Cloud in three different regions.
* Reviewed applications requirements aligning to secure cloud migration from brown filed and green filed deployments that applied security design principles to deliver AWS Well-Architect Framework as a best practices guidance to supporting teams.
* Architected secure AWS Landing Zone to migrate four different datacenters due to lease expiration that includes 300 plus applications running globally.
* Design and plan shared responsibility model to protect all client applications, implemented network security, account security, secure HTTPS access, logs, trusted advisory checks.
* Implemented AWS config service to continuously monitor and record all AWS configuration change and enable configuration assessment, audit and evaluate the configuration of AWS resources that allowed to build automation to meet the compliance requirements.
* Implemented Identity and access management solutions to support 8000 plus users globally with Microsoft Active Directory federation and Single Sign On (SSO) using SAML, Okta and PingFederate as identity provider with Multi-Factor Authentication to support multiple cloud as well as setup Amazon Cognito for mobile web access.
* Setup AWS roles to handle various access management utilizing cross account access, policy management and AWS Organization with service control policy (SCP)
* Implemented remote access management solutions using Amazon Session Manager & Bastion Hosts, Managed data and secrets with Systems manager parameter store.
* Rotated, managed and retrieved database and API keys with AWS Secret Manager as well as controlled KMS keys encrypt data for secure management.
* Provision managed and deployed public and private SSL/TLS Certificate to support AWS and internal connected services using Amazon certificate manager.
* Design and implemented Secure logging and monitoring solution utilizing Amazon CloudTrail service to generate alert that triggered response mechanism with Amazon CloudWatch, Lambda and multiple security service to manage automation.
* Implemented endpoint protection to prevent attacks, breaches to remediate and respond to threats and reduce attack surface.
* Design and architected Denial of Service attacks and Threat detection solution to continuously monitor and protect AWS accounts and workloads that protected infrastructure and application layers that help to build Incident response automation promptly.
* Worked with Incident response team to support Cloud security incidents by defining roles and responsibilities and response mechanisms that allow team to educate, prepare and simulate potential incidents and create runbooks and automation for quick response as well as assisted security team to run penetration testing in the cloud when needed.
* Implemented cyber security frameworks such as NIST/CVE/CIS Benchmarks/HIPPA/PCIDSS/OWASP/SOC to meet compliance requirements to protect all cloud resources.
* Implemented static code analysis tool (SAST) such as Checkmarx and Dynamic code analysis tool (DAST) such as Netsparker for Web applications to identify vulnerability and manage the risk.
* Implemented Palo Alto Prisma Cloud Native Security to scan the repository to identify Open Source known threats and Licensing issues that allowed run security control assessment (SCA) to detect the vulnerable open source libraries from the source files and binaries.
* Implemented container security with Qualys and Prisma Cloud Compute (Twistlock) to provide vulnerability management and compliance across the application lifecycle by scanning images and serverless functions to prevent security and compliance issues from progressing through the development pipeline and continuously monitoring all registries and environments
* Implemented Hybrid cloud solutions that allowed secure connectivity between datacenter sites and AWS cloud environment to manage data encryption utilizing AWS Direct Connect and VPN technology with Amazon Transit gateway.
* Design, Plan and integrated security tools with CICD/Pipeline to meet the security requirements.

**Dell Services** Nov 2011-April 2013

**Cloud and Infrastructure Engineer** Plano, TX

* To reduce downtime and obtain highest level of efficiency, help client to shift monolithic applications to microservices based service-oriented application architecture, and deployed their containers in Kubernetes
* Consolidated multiple data centers resources, virtual machines, monolithic distributed codebase and distributed systems by creating Jenkins automation pipeline running terraform templates & helm charts along with ansible to manage configuration management to deploy container for each application components orchestrated by Kubernetes clusters.
* Helped client increase the efficiency and improve software delivery process to speed the technological operations maintaining minimum cost by building cloud based containerized automated continuous deployment and continuous delivery pipeline practicing agile methodology.
* Helped client redesign deployment methods to build a scalable and reliable deployment platform adopting cloud services and microservice based application management with container orchestration by Kubernetes
* Implemented tools and technologies to provision and configure an enterprise software system in public utility clouds with a focus on increasing efficiency and elasticity of deployed compute without sacrificing quality
* Increased the effectiveness, reliability and performance of container orchestration platform (Docker/Kubernetes) by identifying and measuring key indicators, making changes to the production systems in an automated way and evaluating the results.
* Ensured that the container orchestration platform (Docker/Kubernetes) is maintained properly by measuring and monitoring availability, latency, performance and system health.
* Managed the packaging and deployment of our infrastructure product and our deployment/upgrade processes.
* Designed and implement required failover mechanisms within the Docker/Kubernetes ecosystems, troubleshoot and resolve issues within the Docker and Kubernetes environment
* Worked closely with the Product Owner to groom user stories, including providing implementation details, estimating effort, and contributing to acceptance criteria
* Worked with sales team as a liaison to provide technical guidance with cloud, automation and DevOps services to assist with RFP, RFI, technical assessment, discovery, Gap & risk analysis, cloud Jumpstart, well architecture review, design solutions, provide roadmap, application rationalization and migration with clients AWS focused cloud journey.
* Worked with clients to develop, build and communicate organizational strategy for the cloud services to be leveraged and define use cases in which the organization will develop the most business value.
* Help clients architect the processes by which IT and business staff choose cloud services as the deployment model of choice per application, include the rationale to determine which applications should use cloud services. Implement decision logic process that evolves over time.
* Assist client Identify a comprehensive set of risks posed by cloud services and a risk mitigation mapping matrix for coping and overcoming such risks. In addition, tied information classification efforts to gains or loses comfort with cloud projects. Collaborated with IT security and risk departments to include a framework that details a cloud exit strategy per provider or per application.
* Partner with senior IT management to make the necessary changes for cloud directives to realize their full potential for the entire organization.
* Responsible for overseeing cloud computing initiatives and leading all IT resources and cross business cloud architecture team.
* Provided assistance with client to create informal or ad hoc cloud initiatives and seek to recommend better cloud structure and leadership to senior IT management
* Responsible for defining, describing and conveying cloud initiatives, Identify the risk, Impacts and benefits for the services, develop awareness system by This is often publishing educational or positioning documents within each client organization.
* Enterprise level guidance that conveys best practices and common pitfalls for cloud system design, infrastructure integrations, application development practices and application runtime principles.
* Shared perspectives and opinions on a cloud architect role and participated in a team that is creating the cloud leadership structure
* Designing the comprehensive set of enterprise management processes, tools, integrations and procedures to ensure running cloud systems is in control. This effort included professionally managing cloud providers, applications, infrastructure and systems.
* Responsible for recommending or finding a qualified individual to fulfill the cloud Architect role.
* Assess client services against current architecture and requirements. Storage services that can be deployed to replace traditional storage area networks (SANs) and network-attached storage (NAS) storage devices. Services that offer disaster recovery as a service (DRaaS) and backup as a service. Database as a service (DBaaS) offerings.

**Perot System**  Jul 2006- Oct 2011

**Infrastructure Engineer**  Plano, TX

* Responsible for collaborating and setting cloud vision, providing thought leadership in cloud infrastructure and cloud services architecture to meet operational objectives for cloud solutions.
* Provided leadership, mentorship and subject matter expertise to clients in the delivery of enterprise private and hybrid cloud solutions while assuming responsibility for translating customer requirements and go to market messages to consulting and technology implementation and design services.
* Developed, modified and documented IT architectural solutions, new drivers-based opportunities and strategies, run discoveries, defined heterogeneous Infrastructure environments as well as cloud based and software defined data center technology to manage client’s cloud and storage environment to reduce TCO.
* Assisted in platform definition and roadmap development, identified gaps in multi-tenant, highly available cloud service solution/feature functionality, and recommended improvements.
* Created and managed future state of cloud reference architecture and pattern development and facilitated contributions back to the Open Source community.
* Provided architectural direction to design, solutions sizing, implementations and deployments of OpenStack based cloud environments with services such as Keystone, Nova, Glance, Horizon, Swift, Cinder, Neutron, Ceilmeter to deliver secure, agile, catalog driven, self-service oriented highly elastic private & Hybrid cloud based on IaaS, PaaS, SaaS service models.
* Successfully transition 30 plus block SAN/storage based application in an Oracle RAC environment running on RedHat LINUX hosted on VMware vCloud from legacy 150 plus EMC SAN/Storage frame to VBlock and XtremIO for VDI Host environment and VMAX3 for Block Storage and HP CS700, XP7 storage frame, as well as implemented file NAS/Storage on NetApp Clustered ONTAP solution with recommended best practices and created standard operating procedure to ensure the environment.
* Evaluated complete assessment of EMC environment, gathered capacity, key features and performance requirement to design, develop storage refresh plan and size new Elastic scale out solution with Cisco MDS fabric to support four-year strategy planning.
* Deployed 100+ new EMC, HP, NetApp storage array, created catalog based self-service offering with ViPR Controller and VMware vCloud backend utilizing Cisco UCS and RecoverPoint technologies to created private cloud, worked with management team, change control team, project manager and infrastructure team as well as HP Sales, technical architect and support team to successfully Implement all new storage frame.
* Mapped Private cloud (OpenStack/Ceph, IBM, EMC, VMware) as well as Public cloud (AWS, Azure) ecosystem to current and future cloud solution needs, recognized integration points for cloud to work with existing business service models and identified impediments to enterprise cloud service adoption.
* Consolidated infrastructure resources to cloud managed resources, Designed and Implemented Cisco UCS Director, VMware vCloud Suite and EMC ViPR Controller, ViPR SRM as well as Redhat OpenStack based cloud solutions, with backend EMC ScaleIO for block storage, Elastic Cloud Storage (ECS) for object storage and Isilon Storage for file and VBLOCK Storage based solutions for various clients.
* Created and detailed high-level designs as well as implementation designs for individual cloud services and end-to-end orchestration of these services.

**IBM** Nov 2000 – Jul 2006

**Systems Engineer** Coppell, TX

* Designed, configured and implemented HACMP clustering, SAN attached storage in a large number of AIX servers in a multi-platform environment that included AIX, Windows and Linux operating systems.
* Planned, designed and implemented 2-Node, 3-Node HACMP clusters with/without

Oracle RAC from scratch in a fast-paced and dynamic environment for maximum high availability.

* Debugged and solved the cluster resources, resource failover, and cluster crash problems on daily bases.
* Upgraded various levels of HACMP clusters to latest levels available HA versions including OS patches with least possible downtime.
* Implemented, configured and maintained redundant IBM SAN with IBM DS4000, DS6000, DS8000, DS400, 2105, SSA RAID storages in multi-platform environment.
* Planed, Implemented and tested IBM SDD, RDAC, EMC PowerPath and MPIO multi-pathing software for better performance, redundancy and availability.
* Configured, Migrated and Zoned ESS-2105, DS4000 storage direct attached hosts to IBM

SAN Volume Controller managed hosts.

* Setup and administrated IBM SVC and daily admin work including upgrade of SVC cluster, mdisk and host management, and service and maintenance.
* Maintained and zoned multi fabric SAN environment with Brocade, Mcdata switches and directors.
* Planned and implemented IBM virtualization products such as IBM VIO server and VIO clients using IBM based SAN storages in redundant VIO Server-Client portal on Power5 based hardware.
* Established and maintained technical standards and security policies.
* Created and maintained internal database of maintenance procedures and change request documents of frequently occurring problems.
* Maintained 25 plus storage subsystems which includes mostly IBM DS8300 and DS4800, DS4700, DS4300, EMC DMX, Hitachi AMS1000, AMS500, HDS 9580V and 3PAR S800 all included 500TB plus SAN storage.
* Responsible for allocating new storage, maintaining existing arrays, and de-allocating decommissioned hosts.
* Responsibility includes maintaining storage complex, hardware, RAID array site, managing array, rank, extent pools, volume groups copy services with DS8k, also managing DS8k failed hardware replacement and maintaining internal LPAR's, DA adapters, Disk enclosures and Disk drives, DSCLI and 2107 management console.
* Managed DS4000/FAStT Storage manager 9/10, created new array, maintained existing array, host groups, mapping, flash copy, volume copy, upgraded controller, Drive, ESM and EXP firmware and troubleshooting numerous problem also collected support data for complex problem determination.
* Worked with technology refresh project where we replaced IBM DS8300 and EMC DMX to replace IBM-2105 shark storage and EMC CLARiiON storage.
* Configured TPC for storage subsystem, fabric and application. Managed snap with EMC control center.
* Configured SVC clusters from scratch. These supported 500 plus open systems hosts with 500TB Hitachi AMS1000, AMS500, EMC DMX as backend storage.
* Moved SAN attach DS4000, Hitachi AMS 1000, HDS 9580V and EMC storage array to SVC managed array and served 1500 plus UNIX hosts in production environment.

**SKILLS/TOOLING**

|  |  |
| --- | --- |
| Cloud Environments |  AWS, GCP, Microsoft Azure, IBM Cloud. |
| AWS Services |  Route 53, EC2, S3, ELB, RDS, AMI, IAM, Cloud Formation, CLI, Cloud Trial, SNS, SQS, EBS, Cloud Trail, VPC, Auto Scaling, AWS Lambda, DynamoDB, Redshift, X-Ray, Database Migration Service, Aurora, Cloud Watch |
| Cyber/Cloud Security  | CIA Triad, HIPPA, PCI Compliance, **AWS**: IAM, Organization, SSO, KMS, GuardDuty, Macie, WAF, Shield, Inspector, Secrets Manager, Certificate Manager, AWS Directory Services **GCP**: Cloud Armor, Security Command Center, StackDriver **HashiCorp**: Vault, Terraform, Consul, **Palo Alto** Prisma Cloud (Cloud Native Security/Compute-TwistLock/Access) |
| Configuration Management Tools |  Chef, Puppet, Ansible, Salt Stack |
| Continuous Integration Tools  |  Jenkins, Bamboo, Hudson |
| Orchestration Tools |  Cloud Formation, Terraform |
| Containerization |  Docker, Kubernetes, ECS, GKS |
| Monitoring Tools |  ELK, Splunk, Cloud Watch, Nagios, |
| Build Tools |  ANT, Maven, Gradle, Packer |
| Version Control Tools |  SVN, GIT, GIT Hub, GIT Lab, Bit Bucket |
| Languages/ Scripts |  C, C#, Shell, Bash, PHP, Python, Java, PHP, Ruby, Perl |
| Change management | PVCS tracker, AppDynamics |
| Operating Systems |  Unix/Linux & Windows, Red Hat, CentOS, SUSE, Solaris, Ubuntu, Mac, Debian |
| SDLC |  Scrum, Agile, Waterfall |
| Web Technologies |  HTML, CSS, Java Script, Wicket, DWR, jQuery, Bootstrap, XML, AJAX, JSON, XSD, XSL, XPATH. |
| Databases |  Oracle, MySQL, MongoDB, SQL Server, MS SQL, NOSQL, Cassandra DB |
| Testing Tools |  Cucumber, Junit, Selenium |
| Application Web Servers |  Apache, Tomcat, HTTP Server, WebLogic, Nginx, JBOSS, Web Spher.0e |
| Bug Tracking Tools |  JIRA, HP Quality Center, Bugzilla, IBM Rational Clear Quest, Remedy |

**REFERANCES**

Available up on request