Veeam Certified Architect (VMCA)

Course Outline

Configuration and Management Introduction

- Describe RTOs and RPOs, what they mean for your business, how to manage and monitor performance against them
- The 3-2-1 Rule and its importance in formulating a successful backup strategy
- Identify key Veeam Availability Suite components and describe their usage scenarios

Building Backup Capabilities

- Backup methods, the appropriate use cases and impact on underlying file systems
- Create, modify, optimize and delete backup jobs, including NAS Backup jobs. Explore different tools and methods, such as BitLooker and Deduplication, to maximize environment performance
- Global Settings and their usage to prevent production performance bottlenecks, encrypt network traffic data and control network jurisdiction

Restoring from Backup

- Identify and describe the different restore tools and their features. Ensure you have the confidence to use the correct restore tool at the right time
- Using Secure Restore to prevent the restoration of malware
- Disaster recovery from backup, respond accordingly to a variety of real-world recovery scenarios

Backup Copy Jobs

- Simple vs Advanced Backup Copy Jobs, how to create and modify them using best practices to ensure efficient recovery
- Utilizing tape jobs, how to create and modify

Replication

- Identify and describe the options available for replication, the use cases and impacts of using
- Create, modify and delete replication jobs, outline considerations to ensure success

Failover

- Identify and describe in detail, failover features and the appropriate usage
- Develop, prepare and test failover plans to ensure recovery
- Disaster recovery from replica, respond accordingly to a variety of real-world recovery scenarios

Advanced Repository Capabilities

- Ensure efficiency by being able to select appropriate transport modes while being aware of the impact of various backup functions on the infrastructure
- Ensure scalability by integrating off-site S3 storage
- Ensure compatibility with existing deduplication appliances

Testing Backup and Replication

- Testing backups and replicas to ensure you can recover, what you need, when you need to
- Configure Veeam Data Labs and setup sandbox environments based on backup, replicas and storage snapshots
- Using Veeam Data Labs Staged Restore to manage and comply with General Data Protection Regulation (GDPR) legislation before releasing restores to production

Veeam Backup Enterprise Manager

- Manage multiple Veeam Backup & Replication installations from a single web console, maintaining a view of your entire virtual environment, ensuring data protection of ROBO and Enterprise environments.
- Create user and group roles, delegate workloads whilst maintaining data control
- Enable encryption password loss protection, helping to restore encrypted data in case of lost or forgotten encryption passwords

Veeam ONE

- Monitor your Virtual, Physical and Cloud environments with Veeam ONE™ and assess the different views available
- Configure Veeam ONE for your specific technical and business requirements, describe the alarm options available and how to customize their usage

 Set up, use and customize Veeam ONE Reporter, creating the reports and dashboards you require technically and for the business

Support

- Locate, migrate or restore backup configuration
- Identify and locate appropriate support resources
- Troubleshooting methodology to identify, isolate and remediate support issues

Design and Optimization

- Introduction
- Always-On™
- Design and Sizing

Design and Sizing

- DNS and name resolution
- Veeam BackUp Server
- Veeam BackUp Server Database
- Veeam BackUp Server Locations
- Veeam BackUp Server Proxy Sizing
- Transport Modes
- Repository Server
- Estimating Repository Capacity
- WAN Accelerator
- Interaction with Hypervisors

Infrastructure Assessment

- Stages of POC
- Important Data to Collect
- Network and Firewall
- Veeam ONETM

Security

- Permissions
- MS Hyper-V
- VMware vCenter
- App-aware Processing
- MS Active Directory
- MS SQL Server
- MS Exchange
- MS Sharepoint
- Oracle

Optimizations

- Protecting Veeam Backup & Replication Configuration
- Proxy and Repository Servers
- Scale-out Backup Repository
- Deduplication Appliances
- WAN Accelerator
- Tape Server, Drives and Drivers
- Veeam Backup Enterprise Manager
- Indexing
- Anti-Virus on Veeam Servers and Guest VMs

Automation

- Veeam Backup Server
- Silent Updates of Backup Server
- VMware vSphere Tags

Audit and Compliance

- Auditing
- Compliance

SureBackup and SureReplica

Troubleshooting

- Advanced troubleshooting and diagnostic techniques and methodologies
- Detailed understanding of log files, creation reading and searching
- Troubleshooting mode