

AWS Certified Solutions Architect – Associate Course

Content Details:

1 Domain 1.0: Designing highly available, cost-efficient, fault-tolerant, scalable systems

1.1 Identify and recognize cloud architecture considerations, such as fundamental components and effective designs.

Content may include the following:

- How to design cloud services
- Planning and design
- Monitoring and logging
- Familiarity with:
 - Best practices for AWS architecture
 - Developing to client specifications, including pricing/cost (e.g., on Demand vs. Reserved)
 - Architectural trade-off decisions (e.g., high availability vs. cost, Amazon Relational Database Service (RDS) vs. installing your own database on Amazon Elastic Compute Cloud (EC2))
 - Hybrid IT architectures (e.g., Direct Connect, Storage Gateway, VPC, Directory Services)
 - Elasticity and scalability (e.g., Auto Scaling, SQS, ELB, CloudFront)

2 Domain 2.0: Implementation/Deployment

2.1 Identify the appropriate techniques and methods using Amazon EC2, Amazon S3, AWS Elastic Beanstalk, AWS CloudFormation, Amazon Virtual Private Cloud (VPC), and AWS Identity and Access Management (IAM) to code and implement a cloud solution.

Content may include the following:

- Configure an Amazon Machine Image (AMI)
- Operate and extend service management in a hybrid IT architecture
- Configure services to support compliance requirements in the cloud
- Launch instances across the AWS global infrastructure
- Configure IAM policies and best practices

3 Domain 3.0: Data Security

3.1 Recognize and implement secure practices for optimum cloud deployment and maintenance. Content may include the following:

- AWS administration and security services
- AWS Identity and Access Management (IAM)
- Amazon Virtual Private Cloud (VPC)
- AWS CloudTrail
- “Core” Amazon EC2 and S3 security feature sets
- Incorporating common conventional security products (Firewall, VPN)
- Encryption solutions (e.g., key services)
- Complex access controls (building sophisticated security groups, ACLs, etc.)
- Amazon CloudWatch for the security architect
- Trusted Advisor
- CloudWatch Logs

3.2 Recognize critical disaster recovery techniques and their implementation.

Content may include the following:

- AWS Import/Export
- AWS Storage Gateway
- Amazon Route53

4 Domain 4.0: Troubleshooting

Content may include the following:

- General troubleshooting information and questions