



Curso Advanced Architecting on AWS



Calle de la Basílica, 19
28020 Madrid
(34) 915 53 61 62
www.cas-training.com





AWS-AARC

CAS Training



Nivel

Intermedio



Duración

21 horas



Modalidad

Aula Virtual



Learning

by doing



Curso

Oficial

Curso Advanced Architecting on AWS

Dirigido a:

- Arquitectos de nube.
- Arquitectos de soluciones.
- Personas que diseñan soluciones para infraestructuras de nube.

Objetivos:

- Conocer cómo proteger las conexiones del punto de enlace de la red virtual privada (VPC) de Amazon Simple Storage Service (Amazon S3) en un entorno de laboratorio.
- Conocer las mejores prácticas para decidir qué servicios utilizar y cómo implementar la administración de permisos.
- Crear diseños híbridos de AWS destinados a atender los aumentos de tráfico y optimizar el trabajo remoto para garantizar la conformidad de los niveles 2 o 3 de seguridad FIPS 140-2.
- Aprender sobre soluciones y productos disponibles para diseñar una infraestructura híbrida.

Requisitos:

- Haber obtenido la certificación AWS Certified Solutions Architect Associate o haber completado el curso Architecting on AWS.
- Conocimientos y experiencia en los principales servicios de AWS, a partir de las categorías informática, almacenamiento, redes y AWS Identity and Access Management (IAM).

Material del curso:

Documentación oficial del **curso Advanced Architecting on AWS**.

Perfil del docente:

- Formador certificado por AWS.
- Más de 5 años de experiencia profesional.
- Más de 4 años de experiencia docente.
- Profesional activo en empresas del sector IT.

Metodología:

- “Learning by doing” se centra en un contexto real y concreto, buscando un aprendizaje en equipo para la resolución de problemas en el sector empresarial.
- Aulas con grupos reducidos para que el profesional adquiera la mejor atención por parte de nuestros instructores profesionales.
- El programa de estudios como partners oficiales es confeccionado por nuestro equipo de formación y revisado por las marcas de referencia en el sector.
- La impartición de las clases podrá ser realizada tanto en modalidad Presencial como Virtual.





Examen y Certificación:

Preparación para el examen de certificación: **Examen AWS Certified Solutions Architect Professional**





Contenidos:

Módulo 1: Reviewing Architecting Concepts

- Group Exercise: Review Architecting on AWS core best practices
- Lab 1: Securing Amazon S3 VPC Endpoint Communications

Módulo 2: Single to Multiple Accounts

- AWS Organizations for multi-account access and permissions
- AWS SSO to simplify access and authentication across AWS accounts and third-party services
- AWS Control Tower
- Permissions, access, and authentication

Módulo 3: Hybrid Connectivity

- AWS Client VPN authentication and control
- AWS Site-to-Site VPN
- AWS Direct Connect for hybrid public and private connections
- Increasing bandwidth and reducing cost
- Basic, high, and maximum resiliency
- Amazon Route 53 Resolver DNS resolution

Módulo 4: Specialized Infrastructure

- AWS Storage Gateway solutions
- On-demand VMware Cloud on AWS
- Extending cloud infrastructure services with AWS Outposts
- AWS Local Zones for latency-sensitive workloads
- Your 5G network with and without AWS Wavelength

Módulo 5: Connecting Networks

- Simplifying private subnet connections
- VPC isolation with a shared services VPC
- Transit Gateway Network Manager and VPC Reachability Analyzer
- AWS Resource Access Manager
- AWS PrivateLink and endpoint services
- Lab 2: Configuring Transit Gateways

Módulo 6: Containers

- Container solutions compared to virtual machines
- Docker benefits, components, solutions architecture, and versioning
- Container hosting on AWS to reduce cost
- Managed container services: Amazon Elastic Container Service (Amazon ECS) and Amazon Elastic Kubernetes Service (Amazon EKS)
- AWS Fargate
- Lab 3: Deploying an Application with Amazon EKS on Fargate

Módulo 7: Continuous Integration/Continuous Delivery (CI/CD)

- CI/CD solutions and impact
- CI/CD automation with AWS CodePipeline
- Deployment models
- AWS CloudFormation StackSets to improve deployment management

Módulo 8: High Availability and DDoS Protection

- Common DDoS attacks layers
- AWS WAF
- AWS WAF web access control lists (ACLs), real-time metrics, logs, and security automation
- AWS Shield Advanced services and AWS DDoS Response Team (DRT) services
- AWS Network Firewall and AWS Firewall Manager to protect accounts at scale

Módulo 9: Securing Data

- What cryptography is, why you would use it, and how to use it
- AWS KMS
- AWS CloudHSM architecture
- FIPS 140-2 Level 2 and Level 3 encryption
- Secrets Manager





Módulo 10: Large-Scale Data Stores

- Amazon S3 data storage management including storage class, inventory, metrics, and policies
- Data lake vs. data warehouse: Differences, benefits, and examples
- AWS Lake Formation solutions, security, and control
- Lab 4: Setting Up a Data Lake with Lake Formation

Módulo 11: Large-Scale Applications

- What edge services are and why you would use them
- Improve performance and mitigate risk with Amazon CloudFront
- Lambda@Edge
- AWS Global Accelerator: IP addresses, intelligent traffic distribution, and health checks
- Lab 5: Migrating an On-Premises NFS Share Using AWS DataSync and Storage Gateway

Módulo 12: Optimizing Cost

- On-premises and cloud acquisition/deprecation cycles
- Cloud cost management tools including reporting, control, and tagging
- Examples and analysis of the five pillars of cost optimization

Módulo 13: Migrating Workloads

- Business drivers and the process for migration
- Successful customer practices
- The 7 Rs to migrate and modernize
- Migration tools and services from AWS
- Migrating databases and large data stores
- AWS Schema Conversion Tool (AWS SCT)

Módulo 14: Capstone Project

- Use the Online Course Supplement (OCS) to review use cases, investigate data, and answer architecting design questions about Transit Gateway, hybrid connectivity, migration, and cost optimization





CAS TRAINING

UN ESPACIO PARA CRECER

cas-training.com



Curso Advanced Architecting on AWS

AWS-AARC

Microsoft
Partner



ORACLE

Partner

ORACLE
University

Digital Distribution Partner

