

Advanced AWS Well-Architected Best Practices

Course Duration: 8 Hours (1 Day)

Overview

The Advanced AWS Well-Architected Best Practices course is a comprehensive learning path designed for different roles within the cloud computing domain. It aims to enhance the expertise of professionals by providing in-depth knowledge on optimizing AWS workloads across various aspects. Module 1: Solutions Architects focuses on designing resilient and efficient systems, with lessons covering advanced architectural patterns and decision-making frameworks. Module 2: Cloud Practitioners delves into AWS core services and best practices, with lessons on cost optimization and security fundamentals. Module 3: Data Engineers offers lessons on data ingestion, storage, and processing, ensuring high-performance and scalable data solutions. Module 4: Data Scientists addresses the deployment of machine learning models and big data analytics, with lessons on leveraging AWS for complex data tasks. Module 5: Developers is tailored to coding professionals, with lessons on automating and integrating applications within the AWS ecosystem. Overall, this course will help learners refine their AWS skills, ensuring well-architected frameworks and solutions that meet industry standards.

Audience Profile

The Advanced AWS Well-Architected Best Practices course is designed for IT professionals seeking to optimize cloud infrastructures and services. Target audience for the course:

- Solutions Architects
- Cloud Practitioners
- Cloud Engineers
- Data Engineers
- Data Scientists
- Software Developers
- DevOps Engineers
- IT Project Managers
- Systems Administrators
- Technical Leads
- Infrastructure Architects
- Security Analysts (with a focus on cloud security best practices)
- Database Administrators (interested in cloud-based solutions)
- IT consultants specializing in cloud services
- Technical Decision Makers considering cloud adoption or migration
- IT Professionals aiming for AWS certification advancement

Course Syllabus

Module 0: Course Introduction

Module 1: AWS Well-Architected Framework Reviews

- AWS Well-Architected Framework workload
- AWS Well-Architected Framework review phases
- AWS Well-Architected review approach, lessons learned, and use cases
- AWS Well-Architected review best practices
- AWS Well-Architected review anti-patterns
- Knowledge check

Module 2: Customer Scenario Group Sessions

- Customer Story
- Demonstration of the workflow
- Hands-on group exercise
- Demonstration: Running a review in the Operational Excellence pillar
- Role-play exercise: Running a review in the Security pillar
- Role-play exercise: Running a review in the Reliability pillar
- Role-play exercise: Running a review in the Performance Efficiency pillar
- Role-play exercise: Running a review in the Cost Optimization pillar

Module 3: Risk Solutions and Priorities

- AWS Well-Architected Framework review engagement workflow
- High risk and medium risk issues
- Defining risks
- Resolving high-risk issues (HRIs) and medium-risk issues (MRIs)
- Group discussion: Identifying and resolving significant risks for:
 - Operational Excellence
 - Security
 - Reliability
 - Performance Efficiency
 - Cost Optimization
- Prioritizing improvements
- AWS Well-Architected improvement workflow

Module 4: Resources

- Resource pages
- AWS Well-Architected ISVs
- AWS Well-Architected Partner Program (WAPP)
- Module 5: Course Summary
- Debrief
- What's next?
- Course feedback