Architecting on AWS

Description

Architecting on AWS covers the fundamentals of building IT infrastructure on AWS. The course is designed to teach solutions architects how to optimize the use of the AWS cloud by understanding AWS services and how these services fit into cloud-based solutions. Because architectural solutions may differ depending on industry, type of applications, and size of business, this course emphasizes AWS cloud best practices and recommended design patterns to help students think through the process of architecting optimal IT solutions on AWS. It also presents case studies throughout the course that showcase how some AWS customers have designed their infrastructures and the strategies and services they implemented. Opportunities to build a variety of infrastructures via a guided, hands-on approach are also provided.

Course Objectives

This course teaches you how to:

- Make architectural decisions based on the AWS-recommended architectural principles and best practices.
- Leverage AWS services to make your infrastructure scalable, reliable, and highly available.
- Leverage AWS managed services to enable greater flexibility and resiliency in an infrastructure.
- Make an AWS-based infrastructure more efficient in order to increase performance and reduce costs.
- Use the Well-Architected Framework to improve architectures with AWS solutions.

Intended Audience

This course is intended for:

- Solutions architects
- Solution design engineers

Prerequisites

We recommend that attendees of this course have the following prerequisites:

- Courses taken: AWS Technical Essentials
- Working knowledge of distributed systems
- Familiarity with general networking concepts
- Working knowledge of multi-tier architectures
- Familiarity with cloud computing concepts

Hands-On Activity

This course allows you to test new skills and apply knowledge to your working environment through a variety of practical exercises.

Duration

3 days

Course Outline

This course covers the following concepts:

Day 1

- Core AWS Concepts
- Core AWS Knowledge
- Core AWS Services
- Designing your Environment
- Making your Environment HA

Day 2

- Forklifting an Existing Application onto AWS
- Event-Driven Scaling
- Automating
- Decoupling
- Build a new environment

Day 3

- The Well-Architected Framework
- Troubleshooting Your Environment
- Large-Scale Design Patterns and Case Studies