

AWS Boot Camp

Length: 5 Days

Summary: What is Amazon Web Services? In this intensive AWS boot camp course, you'll learn how the AWS suite of IT cloud computing services can be used separately or in combination to address common problems in computing and how to develop robust, flexible, and cost-effective cloud solutions.

Recommended Experience:

- Basic understanding of cloud computing concepts
- Knowledge of computing platform environments and networks

Who Should Attend: This hands-on course is designed for those with some experience in AWS. If your role requires you to demonstrate business benefits of AWS and if you are ready to move beyond foundational cloud computing understanding, this course is for you

COURSE CONTENT

Introduction to AWS Cloud Computing

GETTING STARTED WITH AMAZON WEB SERVICES (AWS)

- Creating accounts and analyzing the cost breakdown
- Evaluating Service Level Agreements (SLA)
- Console, command-line tools and API

OVERVIEW OF THE ARCHITECTURE

- EC2
- S3
- EBS
- Beanstalk
- RDS
- VPC
- CloudFront
- SimpleDB
- SQS
- CloudWatch

Achieving Agility with EC2

MANAGING THE EC2 INFRASTRUCTURE

- Browsing Amazon Machine Images (AMI)
- Specifying security groups and key pairs

PROVISIONING RESOURCES

- Evaluating Elastic Block Store (EBS) and instance store root devices
- Assigning elastic IP addresses
- Mapping instance types to computing needs

Implementing Durable and Reliable Storage

STORING DATA IN THE CLOUD

- Persisting off-instance storage with EBS volumes
- Creating backups with snapshots
- Achieving high durability with SimpleStorage Service
- Transmitting data in/out of the Amazon cloud

SIMPLIFYING THE DATABASE INFRASTRUCTURE

- Achieving high availability of nonrelational data with SimpleDB
- Effortlessly implementing a relational database with Relational Database Service (RDS)

CREATING COST-EFFECTIVE DISTRIBUTED SOLUTIONS

- Decoupling applications with Simple Queue Service
- Leveraging CloudFront for high-performance edge cache content delivery
- Delivering static and streaming content

Adapting EC2 to Your Business Needs

CUSTOMIZING VIRTUAL MACHINES

- Modifying existing images
- Creating new images off of running instances
- Converting an instance store AMI to an EBS AMI

CREATING AN AWS CLOUD ARCHITECTURE

- Applying best practices for a cloud solution
- Selecting a cloud setup for different use case scenarios

Handling Dynamic Resource Requirements

MONITORING FROM INSIDE OR OUTSIDE OF THE CLOUD

- Visualizing utilization metrics with CloudWatch
- Setting alarms to send and receive notifications

TRANSPARENTLY SCALING TO MEET LOAD VARIATIONS

- Distributing incoming traffic with elastic load balancing
- Dynamically adding and removing instances with Auto Scaling
- Setting capacity thresholds

Hosting Applications with Elastic Beanstalk

IMPROVING APPLICATION DELIVERY WITH PLATFORM AS A SERVICE (PAAS)

- Deploying scalable applications on the AWS cloud
- Selecting and launching an application environment

MANAGING APPLICATION ENVIRONMENTS

- Customizing and configuring platform stacks
- Provisioning application resources with CloudFormation

AWS Security Features

CONTROLLING ACCOUNT SECURITY

- Configuring access credentials
- Managing users with Identity Access Management (IAM)

LEVERAGING THE VIRTUAL PRIVATE CLOUD (VPC)

- Launching EC2 instances in private subnets for extra security
- Bridging EC2 instances to your internal network with a VPN
- Organizing EC2 instances in separate subnets with a VPC