

# Microsoft Azure Fundamentals Training (AZ-900T00)

## **Module 1: Describe cloud computing**

This module introduces you to cloud computing. It covers things such as cloud concepts, deployment models, and understanding shared responsibility in the cloud. Upon completion of this module, you will be able to:

- Define cloud computing
- · Describe the shared responsibility model
- Define cloud models, including public, private, and hybrid
- Identify appropriate use cases for each cloud model
- · Describe the consumption-based model
- Compare cloud pricing models



#### Module 2: Describe the benefits of using cloud services

This module introduces you to the benefits cloud computing can offer you or your organisation. Upon completion of this module, you will be able to:

- Describe the benefits of high availability and scalability in the cloud
- Describe the benefits of reliability and predictability in the cloud
- Describe the benefits of security and governance in the cloud
- Describe the benefits of manageability in the cloud

#### Module 3: Cloud service types

This module covers the different cloud service types and shares some of the use cases and benefits aligned with each service type. Upon completion of this module, you'll be able to:

- Describe Infrastructure as a Service (laaS)
- Describe Platform as a Service (PaaS)
- Describe Software as a Service (SaaS)
- Identify appropriate use cases for each cloud service (IaaS, PaaS, SaaS)



### Module 4: Describe the core architectural components of Azure

This module explains the basic infrastructure components of Microsoft Azure. You'll learn about the physical infrastructure, how resources are managed, and have a chance to create an Azure resource. Upon completion of this module, you will be able to:

- Describe Azure regions, region pairs, and sovereign regions
- Describe Availability Zones
- Describe Azure datacenters
- Describe Azure resources and Resource Groups
- · Describe subscriptions
- Describe management groups
- · Describe the hierarchy of resource groups, subscriptions, and management groups

## Module 5: Describe Azure compute and networking services

This module focuses on some of the computer services and networking services available within Azure. Upon completion of this module, you'll be able to:

- Compare compute types, including container instances, virtual machines, and functions
- Describe virtual machine (VM) options, including VMs, Virtual Machine Scale Sets, availability sets, Azure Virtual Desktop
- Describe resources required for virtual machines
- Describe application hosting options, including Azure Web Apps, containers, and virtual machines
- Describe virtual networking, including the purpose of Azure Virtual Networks, Azure virtual subnets, peering, Azure DNS, VPN Gateway, and ExpressRoute
- Define public and private endpoints

### Module 6: Azure storage services

This module introduces you to storage in Azure, including things such as different types of storage and how a distributed infrastructure can make your data more resilient. Upon completion of this module, you will be able to:

- Compare Azure storage services
- Describe storage tiers
- Describe redundancy options
- Describe storage account options and storage types
- Identify options for moving files, including AzCopy, Azure Storage Explorer, and Azure File Sync
- Describe migration options, including Azure Migrate and Azure Data Box



### Module 7: Describe Azure identity, access, and security

This module covers some of the authorisation and authentication methods available with Azure. By the end of this module, you will be able to:

- Describe directory services in Azure, including Microsoft Entra
- Describe authentication methods in Azure, including single sign-on (SSO), multifactor authentication (MFA), and passwordless
- Describe external identities and guest access in Azure
- Describe Microsoft Entra Conditional Access
- Describe Azure Role Based Access Control (RBAC)
- Describe the concept of Zero Trust
- Describe the purpose of the defense in depth model
- Describe the purpose of Microsoft Defender for Cloud

#### Module 8: Describe cost management in Azure

This module explores methods to estimate, track, and manage costs in Azure. By the end of this module, you will be able to:

- Describe factors that can affect costs in Azure
- Compare the Pricing calculator and Total Cost of Ownership (TCO) calculator
- Describe Azure Cost Management Tool
- Describe the purpose of tags

## Module 9: Describe features and tools in Azure for governance and compliance

This module introduces you to tools that can help with governance and compliance within Azure. By the end of this module, you will be able to:

- Describe the purpose of Azure Blueprints
- Describe the purpose of Azure Policy
- Describe the purpose of resource locks
- Describe the purpose of the Service Trust portal





## Module 10: Describe features and tools for managing and deploying Azure resources

This module covers tools that help you manage your Azure and on-premises resources. By the end of this module, you will be able to:

- · Describe Azure portal.
- Describe Azure Cloud Shell, including Azure CLI and Azure PowerShell.
- Describe the purpose of Azure Arc.
- Describe Azure Resource Manager (ARM) and Azure ARM templates.

## **Module 11: Describe monitoring tools in Azure**

This module covers tools that you can use to monitor your Azure environment. By the end of this module, you will be able to:

- Describe the purpose of Azure Advisor
- Describe Azure Service Health
- Describe Azure Monitor, including Azure Log Analytics, Azure Monitor Alerts, and Application Insights



