

# Windows Azure: Infrastructure as a Service (IaaS)



## Workshop**PLUS**

*Transform industry challenges into your opportunity by distinguishing yourself, and delighting your customers with Windows Azure and IaaS leveraged application platforms*

### Technical Highlights

After completing this course, you will be able to:

- Relate the purpose of Windows Azure IaaS to your application requirements.
- Design applications based on Windows Azure.
- Develop and deploy existing application platforms to Windows Azure..

## Overview

Microsoft Windows Azure is an internet-scale, high-availability cloud fabric operating on globally-distributed Microsoft data centers. Windows Azure and related tools support the development and deployment of applications into a hosted environment that extends the on-premises data center. The Windows Azure IaaS platform can be used advantageously to deploy existing and new application platforms mainly composed of the following:

- Operating systems
- Applications
- Middleware
- Database servers
- Third-party components and frameworks
- Internal and external networking configurations required for communications

This **three**-day Workshop**PLUS** provides architects, IT pros, and developers with the knowledge and experience needed to make the initial architectural and development decisions about their use of Windows Azure IaaS. It consists of two main parts: classroom teaching and hands-on experience introducing Windows Azure concepts and tools.

The course can also be customized to focus on the delivery of a particular application, with the flexibility to augment the course with a consulting engagement involving architectural assistance or proof of concept development.

### Key Features and Benefits

The course provides classroom presentation, class exercises, and hands-on lab materials, which will help you quickly acquire knowledge and skills needed to design and develop Windows Azure applications. A number of technology-focused demos, as well as sample automations, augment the materials

# Syllabus

## **Prerequisites:**

*We expect the participants to have:*

- *General familiarity with cloud computing.*
- *Understanding of application architecture.*
- *General understanding of networking concepts.*
- *Access to Azure management environment and account.*

This WorkshopPLUS runs for three full days. Students should anticipate consistent start and end times for each day. Early departure on any day is not recommended.

### **Module 1: Windows Azure Overview**

- Introduction to cloud computing
- Cloud services and scenarios
- Storage services
- Building block services

### **Module 2: Windows Azure Virtual Machines (VMs)**

- Support for key server applications
- Storage management and machine sizes
- Provisioning patterns and approaches
- High-availability features

### **Module 3: Windows Azure Networking**

- Virtual Machines and Domain Name System (DNS)
- Protocols and endpoints
- Cross-premise connectivity
- Virtual networking

### **Module 4: Virtual Machine Management and Automation**

- Windows Azure Management Portal
- Windows PowerShell Cmdlets for Windows Azure

### **Module 5: Identity**

- Discussion about Windows Azure Active Directory in IaaS
- Discussion about Windows Azure Active Directory

### **Module 6: Your Application in IaaS (Optional)**

The typical format of this workshopPLUS is three days, with part of the third day focusing on the application that you want to move into IaaS. The level of detail about the delivery of the third day will be discussed and agreed upon prior to the delivery of the WorkshopPLUS.

### **Module 7: SQL Server in IaaS (Optional)**

- Microsoft SQL Server IaaS vs. Platform as a Service (PaaS)
- Provisioning Windows Azure VMs for SQL Server
- Accessing SQL Server
- Migrating SQL Server data/workloads
- Best practices/summary/resources

*This datasheet was last updated October 14<sup>th</sup>, 2013. To ensure you have the latest version of this datasheet, check here:*  
<http://download.microsoft.com/download/1/C/1/1C15BA51-840E-498D-86C6-4BD35D33C79E/WorkshopPLUS-Windows-Azure-Infrastructure-as-a-Service.pdf>