

Introduction

Contents

Introduction	1
Course Materials	2
Prerequisites	3
Course Outline	4
Course Outline (continued)	6
Lab Setup	8
Initial Logon Procedure	9
Demonstration: Using Microsoft Virtual PC	11
Microsoft Learning	12
Microsoft Certified Professional Program	15
Facilities	18



Information in this document, including URL and other Internet Web site references, is subject to change without notice. Unless otherwise noted, the example companies, organizations, products, domain names, e-mail addresses, logos, people, places, and events depicted herein are fictitious, and no association with any real company, organization, product, domain name, e-mail address, logo, person, place or event is intended or should be inferred. Complying with all applicable copyright laws is the responsibility of the user. Without limiting the rights under copyright, no part of this document may be reproduced, stored in or introduced into a retrieval system, or transmitted in any form or by any means (electronic, mechanical, photocopying, recording, or otherwise), or for any purpose, without the express written permission of Microsoft Corporation.

The names of manufacturers, products, or URLs are provided for informational purposes only and Microsoft makes no representations and warranties, either expressed, implied, or statutory, regarding these manufacturers or the use of the products with any Microsoft technologies. The inclusion of a manufacturer or product does not imply endorsement of Microsoft of the manufacturer or product. Links are provided to third party sites. Such sites are not under the control of Microsoft and Microsoft is not responsible for the contents of any linked site or any link contained in a linked site, or any changes or updates to such sites. Microsoft is not responsible for webcasting or any other form of transmission received from any linked site. Microsoft is providing these links to you only as a convenience, and the inclusion of any link does not imply endorsement of Microsoft of the site or the products contained therein.

Microsoft may have patents, patent applications, trademarks, copyrights, or other intellectual property rights covering subject matter in this document. Except as expressly provided in any written license agreement from Microsoft, the furnishing of this document does not give you any license to these patents, trademarks, copyrights, or other intellectual property.

© 2006 Microsoft Corporation. All rights reserved.

Microsoft, Active Directory, ActiveSync, Excel, FrontPage, IntelliMirror, Internet Explorer, MSN, NetMeeting, Outlook, SharePoint, SQL Server, Windows, Windows Server, and Windows Server System are either registered trademarks or trademarks of Microsoft Corporation in the United States and/or other countries.

The names of actual companies and products mentioned herein may be the trademarks of their respective owners.

Instructor Notes

Presentation:
30 minutes

The Introduction module provides students with an overview of the course content, materials, and logistics for Course 7034A, *Implementing Microsoft® Office Live Communications Server™ 2005 (SP1)*.

How to Teach This Module

This section contains information that will help you to teach this module.

Introduction

Welcome students to the course and introduce yourself. Provide a brief overview of your background to establish credibility.

Ask students to introduce themselves and provide their background, product experience, and expectations about the course.

Record student expectations on a whiteboard or flip chart that you can reference later in class.

Course materials

Tell students that everything they will need for this course is provided at their desk.

Have students write their names on both sides of their name cards.

Describe the contents of the student workbook.

Tell students where they can send comments and feedback on this course.

Note There is no student CD for this course.

Prerequisites

Describe the prerequisites for this course. This is an opportunity for you to identify students who may not have the appropriate background or experience to attend this course.

Course outline

Briefly describe each module and what students will learn. Explain how this course will meet students' expectations by relating the information that is covered in individual modules to their expectations.

Setup

Describe any necessary setup information for the course, including course files and classroom configuration.

Initial Logon Procedure

Explain the initial logon procedure that applies to your training center. Mention that course passwords must always be complex.

Demonstration: Using Microsoft Virtual PC

Before you perform this demonstration, start 7034A-FabrikamDC-A Virtual PC and 7034A-LCSEESRV-A Virtual PC. Start up these images before you commence the course, because the virtual computers take time to initialize.

In this course, students will use Microsoft® Virtual PC 2004 to perform all the hands-on practices. Demonstrate how to use Virtual PC by performing the following procedures:

1. On your desktop, use the **Start** menu to open **Virtual PC 2004**.
2. In **Virtual PC 2004**, click the machine name for **7034A-FabrikamDC-A**, and then click **Start Up**. Mention that students can run two virtual machines at once using just 1 GB of memory.
3. Show the students that the system tray of the host computer contains an icon for Virtual PC. If Virtual PC is running but the window becomes hidden, you can reactivate the window by double-clicking the icon in the system tray.

Also, you can simply right-click the icon in the system tray to create, start, and configure virtual machines.

4. Show the students that the title bar of each virtual machine indicates which server they are accessing.
5. Switch to **7034A-LCSEESRV-A**, and then log on by pressing the ALT key on the right side of the keyboard at the same time that you press the DELETE key. Point out that the ALT key on the right side of the keyboard is referred to as both the right-ALT key and the HOST key in Virtual PC 2004 Help and menus. Log on as **Administrator** with a password of **P@ssw0rd**.
6. Demonstrate Full-Screen mode by pressing right-ALT+ENTER. Repeat this key sequence to return to a window view.
7. Point out that the **7034A-LCSEESRV-A** desktop indicates the word **7034A-LCSEESRV-A**.
8. Switch to **7034A-FabrikamDC-A**, and then log on as **Administrator** by pressing right-ALT+DELETE.
9. Point out that the **7034A-FabrikamDC-A** desktop indicates the word **7034A-FABRIKAMDC-A**.
10. Use **ipconfig/all** at a command prompt at **7034A-FabrikamDC-A**, **7034A-LCSEESRV-A**, and the host computer to show the IP addresses configured for each. Use **ping** to show that **7034A-FabrikamDC-A** and **7034A-LCSEESRV-A** can ping each other, but cannot ping the host computer or any other computer on the host's network. For informational purposes, the IP address for **7034A-FabrikamDC-A** is ip_address1, and the IP address for **7034A-LCSEESRV-A** is ip_address2.
11. Show that there is already a mapping from drive E: to the **C:\Program Files\Microsoft Learning\7034\Tools** folder on the host computer. Point out that students can use this mapped drive to access the software and course tools stored on the host computer from all the VPC images.
12. Close **7034A-FabrikamDC-A** and **7034A-LCSEESRV-A**, and point out that students can either commit or discard changes when closing Virtual PC. Tell students that the lab instructions will prescribe whether they should leave the VPC images running or shut them down and discard changes at the end of a lab.

Important Emphasize that if the students do not follow the instructions to keep VPC images running or to shut them down without saving changes, then they may not be able to complete the labs properly.

Microsoft Learning

Explain the Microsoft Learning curriculum, and present the list of additional recommended courses.

Refer students to the Microsoft Learning Web page at <http://www.microsoft.com/learning/> for information about curriculum paths.

Microsoft Learning Product Types

Tell students that Microsoft offers four different learning product types, and that each type has different components and emphasis. Identify the key differences among the types. It is important that students understand the differences among these product types as well as the focus of the product type that they are currently attending. This understanding is particularly important for students who are considering attending a clinic, workshop, or seminar, so that their expectations are appropriate prior to registration and attendance.

Microsoft Certified Professional program

Inform students about the Microsoft Certified Professional (MCP) program, any certification exams that are related to this course, and the various certification options.

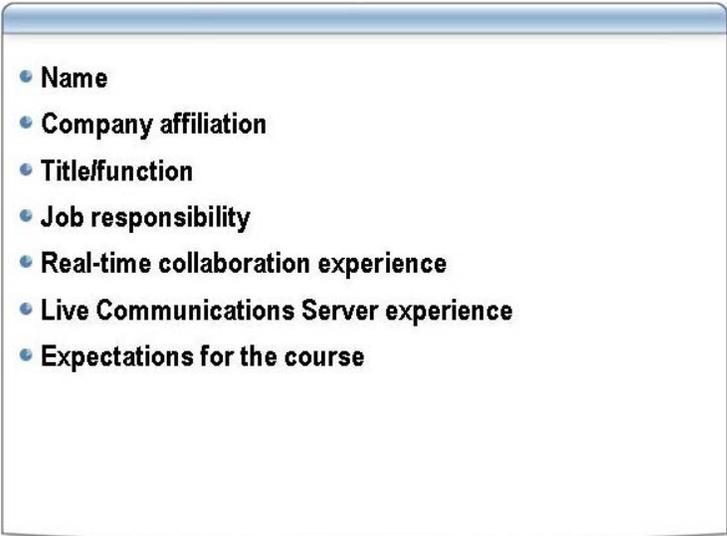
Facilities

Explain the class hours, extended building hours for labs, parking, restroom location, meals, phones, message posting, and where smoking is or is not allowed.

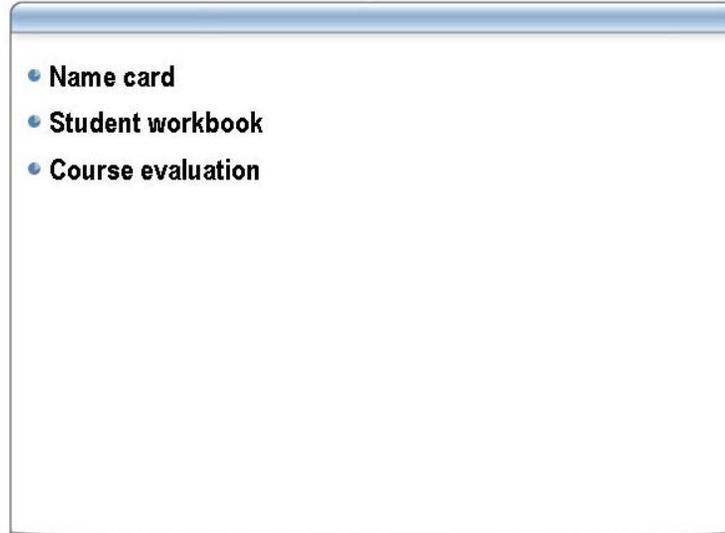
Let students know whether your facility has Internet access that is available for them to use during class breaks.

Also, make sure that the students are aware of the recycling program if one is available.

Introduction

- 
- **Name**
 - **Company affiliation**
 - **Title/function**
 - **Job responsibility**
 - **Real-time collaboration experience**
 - **Live Communications Server experience**
 - **Expectations for the course**
-

Course Materials



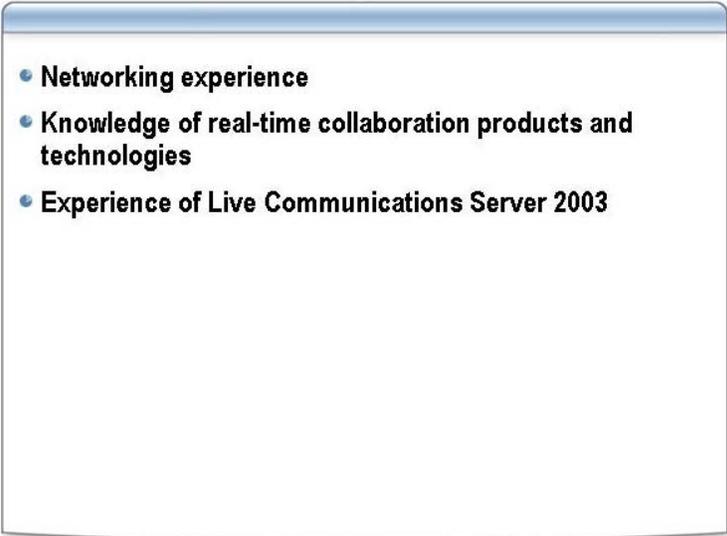
You should be supplied with the following materials for the course:

- *Name card*. Write your name on both sides of the name card.
- *Student workbook*. The student workbook contains the material covered in class, in addition to the hands-on lab exercises.
- *Course evaluation*. Near the end of the course, you will have the opportunity to complete an online evaluation to provide feedback on the course, training facility, and instructor.

To provide additional comments or feedback on the course, send e-mail to support@mscourseware.com. To inquire about the Microsoft Certified Professional program, send e-mail to mcp@microsoft.com.

Note There is no student materials CD for this course.

Prerequisites

- 
- **Networking experience**
 - **Knowledge of real-time collaboration products and technologies**
 - **Experience of Live Communications Server 2003**

This course requires that you meet the following prerequisites:

- Have a basic understanding of networking concepts and some general networking experience.
- Have a basic knowledge of real-time collaboration products and technologies.
- Have some experience of the Live Communications Server 2003 or Live Communications Server 2005 products.

Course Outline

- **Module 1: Introducing LCS 2005 with SP1**
- **Module 2: Deploying LCS 2005 with SP1 Enterprise Edition**
- **Module 3: Deploying LCS 2005 with SP1 Standard Edition**
- **Module 4: Administering LCS 2005 with SP1**
- **Module 5: Deploying Microsoft Office Communicator 2005**
- **Module 6: Installing an Access Proxy Server in LCS 2005 with SP1**
- **Module 7: Implementing Remote User Access with LCS 2005 with SP1**

Module 1, “Introducing LCS 2005 with SP1,” discusses the concepts of Real - Time Communications (RTC), and Microsoft® Live Communications Server 2005 with Service Pack 1 (LCS 2005 with SP1). It also looks at how LCS can integrate with other RTC products. It describes the different server roles in LCS 2005 with SP1, discusses the topologies it supports, and describes the different deployment and usage scenarios for it.

Module 2, “Deploying LCS 2005 with SP1 Enterprise Edition,” explains the procedure for preparing an Active Directory® infrastructure before installing LCS 2005 with SP1 Enterprise Edition. It also explains how to install LCS 2005 with SP1 Enterprise Edition using the Setup Wizard. Finally, it explains how to configure LCS servers after deployment for client access.

Module 3, “Deploying LCS 2005 with SP1 Standard Edition,” explains how to install the Standard Edition of LCS 2005 with SP1, and explains how carry out the installation using command-line tools instead of a graphical user interface (GUI). It explains the procedure for preparing an Active Directory infrastructure to deploy LCS 2005 with SP1 Standard Edition using command-line tools. It also explains how to install and activate LCS 2005 with SP1 Standard Edition using command-line tools. Finally, it explains how to deploy LCS 2005 with SP1 Standard Edition in a child domain.

Module 4, “Administering LCS 2005 with SP1,” looks at the various tools and consoles used to administer users and servers in LCS 2005 with SP1. It also explains how to configure global, user, and server settings for LCS 2005 with SP1, and describes how to enable several cross-domain management scenarios for LCS 2005 with SP1.

Module 5, “Deploying Microsoft Office Communicator 2005,” looks at Microsoft Office Communicator in detail, showing how this software integrates with LCS 2005 with SP1. Microsoft Office Communicator 2005 is the dedicated client for LCS 2005 with SP1, and this software provides full support for all the facilities in LCS.

Module 6, “Installing an Access Proxy Server in LCS 2005 with SP1,” explains how to install an Access Proxy server to enable external connections by providing secure communications for both inbound and outbound traffic across Internet-facing firewalls. You do this to extend your organization's reach by providing secure external connections to your remote users, business partners, and customers.

Module 7, “Implementing Remote User Access with LCS 2005 with SP1,” describes the concepts, features, and topologies of a Remote User Access implementation. It explains how to configure an Access Proxy server for Remote User Access capabilities, and to prepare an internal domain for Remote User Access.

Course Outline (*continued*)

- **Module 8: Implementing Federation with LCS 2005 with SP1**
- **Module 9: Implementing Public Cloud Instant Messaging with LCS 2005 with SP1**
- **Module 10: Securing LCS 2005 with SP1**
- **Module 11: Implementing Address Book Server on LCS 2005 with SP1**
- **Module 12: Archiving Messages with LCS 2005 with SP1**
- **Module 13: Upgrading from LCS 2003 to LCS 2005 with SP1**
- **Module 14: Troubleshooting LCS 2005 with SP1**

Module 8, “Implementing Federation with LCS 2005 with SP1,” explains the procedure for enabling Federation on your Access Proxy server in LCS 2005 with SP1. It also describes the different Federation models. Finally, this module explains how to deploy and configure an Access Proxy server for Federation.

Module 9, “Implementing Public Cloud Instant Messaging with LCS 2005 with SP1,” describes the concepts, features, and topologies of an Access Proxy server with Public Cloud Instant Messaging Connectivity (PIC). It describes the requirements and recommendations for an Access Proxy server with PIC deployment, and explains how to configure Access Proxy server settings for PIC.

Module 10, “Securing LCS 2005 with SP1,” explains how to implement security procedures to defend against threats to an LCS 2005 with SP1 topology. It also describes the methods used to address the threats to both the server and the client.

Module 11, “Implementing Address Book Server on LCS 2005 with SP1,” describes the process of planning and deploying the LCS 2005 with SP1 Address Book Service. This module describes the Address Book Service components and dependencies, and describes the interaction between the Client and the Address Book Service. It also describes the supported Address Book topologies. It explains how to plan an Address Book Service deployment, and then deploy it. Lastly, it explains how to configure and administer the Address Book server.

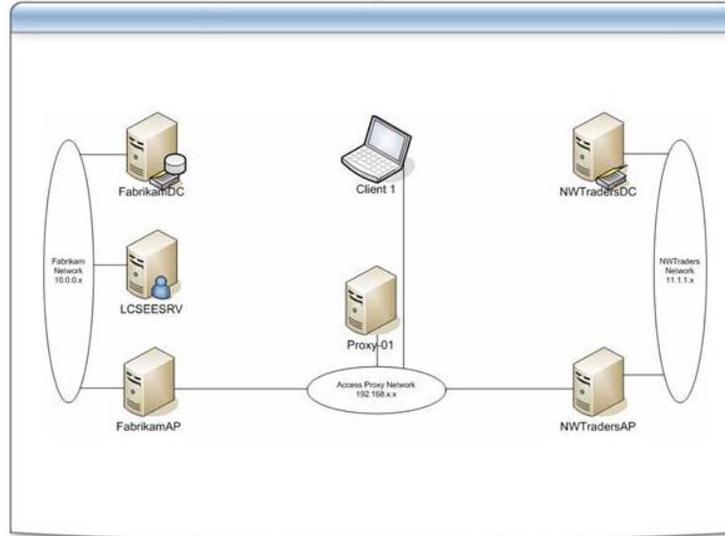
Module 12, “Archiving Messages with LCS 2005 with SP1,” describes the process of planning and deploying the LCS 2005 with SP1 Archiving service. It describes the Archiving Server and its components, and the various deployment options for it. This module also describes how to configure users for Archiving and how the settings for a user and for a forest work together.

Module 13, “Upgrading from LCS 2003 to LCS 2005 with SP1,” describes the process of upgrading from LCS 2003 to LCS 2005 with SP1. It explains how to

perform a side-by-side migration, and an in-place upgrade, and how to upgrade to the LCS 2005 with SP1 Archiving service.

Module 14, “Troubleshooting LCS 2005 with SP1,” explains how to investigate and troubleshoot issues with LCS 2005 with SP1. It explains the tools and approaches to investigate service failures and client connectivity problems on LCS 2005 with SP1. The module finishes with a practical example of troubleshooting, where the students attempt to use their knowledge to diagnose and fix an inoperative LCS 2005 with SP1 environment.

Lab Setup



Software

The following software will be used in the classroom:

- Microsoft Windows® Server 2003 with Service Pack 1 (SP1)
- Windows XP with Service Pack 2 (SP2)
- Live Communications Server 2005 with SP1
- Microsoft Office Communicator 2005
- Windows Messenger 5.1

Course files

There is additional software required for the practical elements in this course. This software is located in **C:\Program Files\Microsoft Learning\7034\Tools\Demo Files**. The **C:\Program Files\Microsoft Learning\7034\Tools** folder maps to the E: drive on each VPC image that you use during the labs.

There are some additional reading materials in **C:\Program Files\Microsoft Learning\7034\Tools\Additional Materials**. You should view these documents from the host computer, not the VPC images, as the VPC images do not include the Microsoft Word Viewer 2003 application.

Classroom setup

The classroom is set up in a virtual environment over three IP subnets and two domains as shown in the slide figure. Each student computer is configured as a stand-alone computer acting as a host for these virtual computers.

Note The labs in this course use virtual machines. To configure the virtual machines to be usable in a lab environment, the network topology has been substantially modified from a typical LCS 2005 with SP1 network configuration. The lab configuration combines many server roles in non-standard ways that are not recommended and are generally not viable in a production network.

Initial Logon Procedure

- **Log on to the host computer with your supplied user name and password.**
- **If prompted to change your password, use a complex password from three of the following categories:**
 - Uppercase letters (A to Z)
 - Lowercase letters (a to z)
 - Numbers (0 to 9)
 - Symbols (! @ # \$)

Introduction

To complete the practical elements of the course, you must first log on to the host computer. This process may vary, depending on the classroom setup. To log on to the host computer, carry out the following procedure.

Initial Logon

You must initially log on to the host computer, either as **Studentxx**, where *xx* is your student number, or as **Student**, depending on the classroom setup. Your instructor will confirm the logon name you should use.

Tasks

► Log on to your account

1. Press CTRL+ALT+DEL to open the **Log On to Windows** dialog box.
2. In the **User name** box, type **Studentxx** or **Student**, as directed by your instructor.
3. In the **Password** box, type **P@ssw0rd**, or another password as directed by your instructor.
4. In the **Log on to** box, select the name of the domain that is used in the course or the name of your computer, and then click **OK**.

If the **Logon Message** dialog box appears, stating that your password must be changed at initial logon, then carry out the following steps:

► Change your password

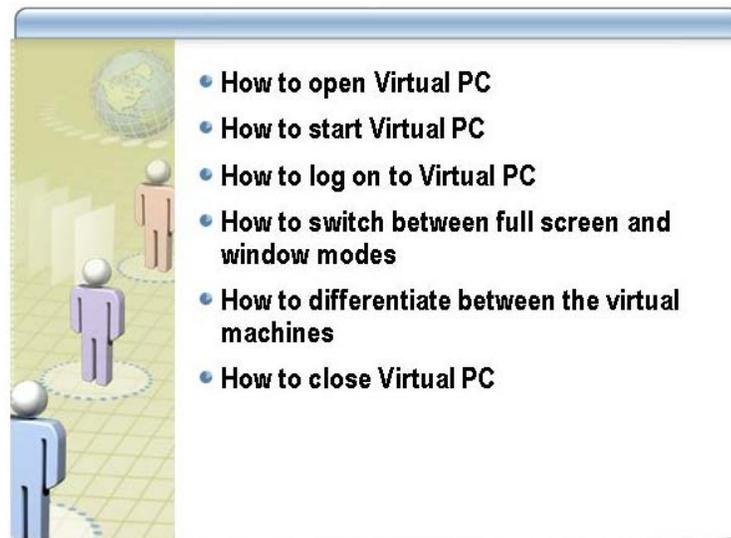
1. In the **Logon Message** dialog box, click **OK**.
2. In the **New Password** box, type your new password.
3. In the **Confirm New Password** box, retype your password, and then click **OK**.
4. In the **Change Password** dialog box, click **OK**.

Complex Passwords

To meet the complexity requirements for the password that you will use in this course, you must include in your password characters from at least three of the following four categories:

- Uppercase letters (A to Z)
- Lowercase letters (a to z)
- Numbers (0 to 9)
- Symbols (! @ # \$)

Demonstration: Using Microsoft Virtual PC



In this demonstration, your instructor will help familiarize you with the Virtual PC environment in which you will work to complete the practices and labs in this course. You will learn:

- How to open Virtual PC.
- How to start Virtual PC.
- How to log on to Virtual PC.
- How to switch between full-screen and window modes.
- How to tell the difference between the virtual machines that are used in the practices for this course.
- That the virtual machines can communicate with each other and with the host, but they cannot communicate with other computers that are outside of the virtual environment. (For example, no Internet access is available from the virtual environment.)
- How to close Virtual PC.

Keyboard shortcuts

While working in the Virtual PC environment, you may find it helpful to use keyboard shortcuts. All Virtual PC shortcuts include a key that is referred to as the HOST key or the right-ALT key. By default, the HOST key is the ALT key on the right side of your keyboard. Some useful shortcuts include:

- ALT+DELETE to log on to the Virtual PC
- ALT+ENTER to switch between full screen mode and window modes
- ALT+RIGHT ARROW to display the next Virtual PC

For more information about Virtual PC, see Virtual PC Help.

Microsoft Learning



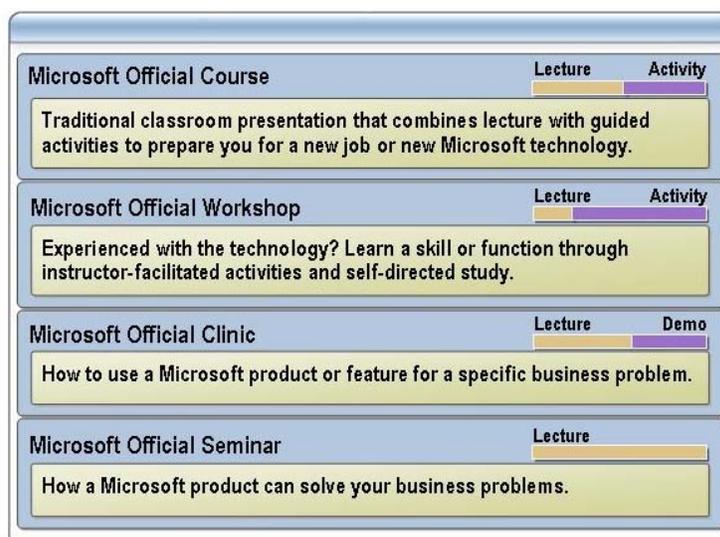
Microsoft Learning develops Official Microsoft Learning Products for computer professionals who design, develop, support, implement, or manage solutions by using Microsoft products and technologies. These learning products provide comprehensive, skills-based training in instructor-led and online formats.

Other related learning products may become available in the future, so for up-to-date information about recommended learning products, visit the Microsoft Learning Web site.

Microsoft Learning information

For more information, visit the Microsoft Learning Web site at <http://www.microsoft.com/learning/>.

Microsoft Learning Product Types



Microsoft Learning offers four types of instructor-led products type. Each is specific to a particular audience type and level of experience. The different product types also tend to suit different learning styles. These types are as follows:

- **Microsoft Official Courses** are for information technology (IT) professionals and developers who are new to a particular product or technology, and for experienced individuals who prefer to learn in a traditional classroom format. Courses provide a relevant and guided learning experience that combines lecture and practice to deliver thorough coverage of a Microsoft product or technology. Courses are designed to address the needs of learners engaged in planning, design, implementation, management, and support phases of the technology adoption lifecycle. They provide detailed information by focusing on concepts and principles, reference content, and in-depth hands-on lab activities to ensure knowledge transfer. Typically, the content of a course is broad, addressing a wide range of tasks necessary for the job role.
- **Microsoft Official Workshops** are for knowledgeable IT professionals and developers who learn best by doing and exploring. Workshops provide a hands-on learning experience in which participants use Microsoft products in a safe and collaborative environment based on real-world scenarios. Workshops are the learning products where students learn by doing through scenarios and through troubleshooting hands-on labs, targeted reviews, information resources, and best practices, with instructor facilitation.
- **Microsoft Official Clinics** are for IT professionals, developers and technical decision makers. Clinics offer a detailed “how to” presentation that describes the features and functionality of an existing or new Microsoft product or technology, and showcases product demonstrations and solutions. Clinics focus on how specific features will solve business problems.
- **Microsoft Official Seminars** are for business decision makers. Seminars provide a dynamic presentation of early and relevant information on

Microsoft products and technology solutions that enable decision makers to make critical business decisions through featured business scenarios, case studies, and success stories. Microsoft Official Seminars are concise, engaging, direct-from-the-source learning products that show how emerging Microsoft products and technologies help our customers serve their customers.

Microsoft Certified Professional Program

Exam number and title	Core exam for the following track	Elective exam for the following track
70-262: <i>Implementing, Managing, and Troubleshooting Microsoft Office Live Communications Server 2005</i>	Not Applicable	MCSE

<http://www.microsoft.com/learning/>

Microsoft
CERTIFIED
Professional

Microsoft Learning offers a variety of certification credentials for developers and IT professionals. The Microsoft Certified Professional (MCP) program is the leading certification program for validating your experience and skills, keeping you competitive in today's changing business environment.

Related certification exams

This course helps students prepare for Exam 70-262: *Implementing, Managing, and Troubleshooting Microsoft Office Live Communications Server 2005*.

Exam 70-262: *Implementing, Managing, and Troubleshooting Microsoft Office Live Communications Server 2005* is an elective exam for the MCSE certification.

MCP certifications

The MCP program includes the following certifications:

- MCDST on Microsoft Windows XP

The Microsoft Certified Desktop Support Technician (MCDST) certification is designed for professionals who successfully support and educate end users and troubleshoot operating system and application issues on desktop computers running the Microsoft Windows operating system.

- MCSA on Microsoft Windows Server 2003

The Microsoft Certified Systems Administrator (MCSA) certification is designed for professionals who implement, manage, and troubleshoot existing network and system environments based on the Windows Server 2003 platform. Implementation responsibilities include installing and configuring parts of systems. Management responsibilities include administering and supporting systems.

- **MCSE on Windows Server 2003**

The Microsoft Certified Systems Engineer (MCSE) credential is the premier certification for professionals who analyze business requirements and design and implement infrastructure for business solutions based on the Windows Server 2003 platform. Implementation responsibilities include installing, configuring, and troubleshooting network systems.

- **MCAD**

The Microsoft Certified Application Developer (MCAD) for Microsoft .NET credential is appropriate for professionals who use Microsoft technologies to develop and maintain department-level applications, components, Web or desktop clients, or back-end data services, or who work in teams developing enterprise applications. The credential covers job tasks ranging from developing to deploying and maintaining these solutions.

- **MCSA**

The Microsoft Certified Solution Developer (MCSA) credential is the premier certification for professionals who design and develop leading-edge business solutions with Microsoft development tools, technologies, platforms, and the Microsoft Windows DNA architecture. The types of applications MCSAs can develop include desktop applications and multi-user, Web-based, N-tier, and transaction-based applications. The credential covers job tasks ranging from analyzing business requirements to maintaining solutions.

- **MCDBA on Microsoft SQL Server™ 2000**

The Microsoft Certified Database Administrator (MCDBA) credential is the premier certification for professionals who implement and administer SQL Server databases. The certification is appropriate for individuals who derive physical database designs, develop logical data models, create physical databases, use Transact-SQL to create data services, manage and maintain databases, configure and manage security, monitor and optimize databases, and install and configure SQL Server.

- **MCP**

The Microsoft Certified Professional (MCP) credential is for individuals who have the skills to successfully implement a Microsoft product or technology as part of a business solution in an organization. Hands-on experience with the product is necessary to successfully achieve certification.

- **MCT**

Microsoft Certified Trainers (MCTs) demonstrate the instructional and technical skills that qualify them to deliver Official Microsoft Learning Products through a Microsoft Certified Partner for Learning Solutions.

Certification requirements

Requirements differ for each certification category and are specific to the products and job functions addressed by the certification. To become a Microsoft Certified Professional, you must pass rigorous certification exams that provide a valid and reliable measure of technical proficiency and expertise.

For More Information See the Microsoft Learning Web site at <http://www.microsoft.com/learning/>.

You can also send e-mail to mcphep@microsoft.com if you have specific certification questions.

Acquiring the skills tested by an MCP exam

Official Microsoft Learning Products can help you develop the skills that you need to do your job. They also complement the experience that you gain while working with Microsoft products and technologies. However, no one-to-one correlation exists between Official Microsoft Learning Products and MCP exams. Microsoft does not expect or intend for the courses to be the sole preparation method for passing MCP exams. Practical product knowledge and experience is also necessary to pass MCP exams.

To help prepare for MCP exams, use the preparation guides available for each exam. Each Exam Preparation Guide contains exam-specific information such as a list of topics on which you will be tested. These guides are available on the Microsoft Learning Web site at <http://www.microsoft.com/learning/>.

Facilities

