

Module Title : CXD-330-1I-XenApp and XenDesktop Advanced Optimization and Troubleshooting
Duration : 4 days

Overview

Designed for students with previous XenApp and XenDesktop experience, this course is best suited for students looking to learn how to enhance the functionality of a new or existing environment and remediate complex issues.

Part 1: XenApp and XenDesktop Advanced Concepts – Optimizing the End User Experience

Days - 1-2

Learn the skills necessary to optimize the end user experience for both managed and unmanaged devices through policies, and customizations. Students will deliver a seamless Receiver, customize StoreFront, improve logon speeds, and configure settings to deliver graphics and media over limited resources in a virtual lab environment.

Part 2: XenApp and XenDesktop Advanced Concepts – Troubleshooting

Days - 3-4

Learn about the tools used and issues encountered by Citrix support using real world support ticket scenarios. Students will have access to a virtual lab environment to troubleshoot some of the top support issues and learn how to effectively identify the root cause and implement appropriate solutions. The course covers XenApp and XenDesktop services, databases, StoreFront, and Virtual Delivery Agent registration and connection.

Recommended prerequisite courses:

- CXD-203 Managing App and Desktop Solutions with Citrix XenApp and XenDesktop 7.6 or
- CXD-300 Deploying App and Desktop Solutions with Citrix XenApp and XenDesktop 7.6 or
- CMB-300 Deploy and Manage Citrix XenApp/XenDesktop 7.6 Fast Track

Note: This course is based on XenApp and XenDesktop 7.6 LTSR (Long Term Service Release) including the hands-on labs providing a stable platform for learning. Training on the current release (CR) is available through the Citrix eLearning subscription or as instructor led training at an additional cost. For more information on the long term service release program, please visit the program page.

Key Skills

Upon successful completion of this course, learners will be able to:

- Configure advanced customizations to StoreFront by modifying configuration files

- Configure a seamless experience for new users with Citrix Receiver
- Optimize the logon experience through Citrix Profile Manager and HDX settings
- Identify and configure the proper HDX graphics delivery method based on the user and device
- Configure HDX policies to ensure an interactive experience under limited bandwidth or CPU
- Optimize the experience for delivering applications over a double hop HDX connection
- Use troubleshooting tools to identify root cause of issues
- Use CDF tracing and logging to identify root cause of issues
- Use the XenApp and XenDesktop PowerShell SDK to troubleshoot and remediate issues
- Troubleshoot XenApp and XenDesktop services
- Troubleshoot database connectivity issues
- Troubleshoot Citrix StoreFront
- Troubleshoot user connection issues
- Troubleshoot the Virtual Delivery Agent (VDA) registration process

Audience

This course is recommended for those who are interested in learning how to optimize the end-user experience through policies and customizations. Specifically:

- Administrators
- Implementers / Engineers
- Architects

Instructional Method

This course is offered in instructor-led training (ILT)/virtual instructor-led training (vILT) formats with application of concepts through hands-on exercises in a live lab environment.

Course Materials

As part of this course you will receive the following materials:

- Access to a lab environment for the duration of the course
- Lab exercise guides
- Student manual containing materials presented by instructor with notes and references from Citrix architects
- Job aids summarizing key points and references for easy access
- Online courseware with videos covering course topics and lab demonstrations from various experts throughout Citrix

Preparatory Recommendations

Citrix recommends students prepare for this course by taking the one of the following courses:

- CXD-203 Managing App and Desktop Solutions with Citrix XenApp and XenDesktop 7.6
- CXD-300 Deploying App and Desktop Solutions with Citrix XenApp and XenDesktop 7.6
- CMB-300 Deploy and Manage Citrix XenApp/XenDesktop 7.6 Fast Track

It is also recommended to gain a basic understanding of the following concepts and technologies:

- Familiarity with how to navigate and use Windows Server 2012 R2
- Experience with Microsoft's PowerShell language (although a PowerShell introduction is included in this course)

Certification Preparation

At this time there is no associated certification with this course. To see the latest certifications, refer to the certifications page available [here](#).

Topic Outline

Part 1: Days 1-2

Understanding User Experience Issues

- Understanding common user issues
- Common misconfigurations that hinder adoption
- Understanding the user workflow

Configuring a Seamless Receiver

- Deploying Receiver seamlessly
- Configuring Receiver through ADMX templates
- Configuring Single Sign On authentication
- Presentation of apps and desktops

Customizing the StoreFront Experience

- Customizing StoreFront appearance and branding with StoreFront 3.0
- Using keywords with StoreFront
- Configuring resource filtering
- Advanced customizations through editing configuration files
- Porting customizations to NetScaler Gateway
- StoreFront launch and session timeouts

Optimizing the Logon Process

- Reducing logon times with folder redirection and exclusion
- Session prelaunch
- Session lingering

Optimizing HDX Graphics

- Understanding graphics delivery
- Configuring the graphics modes with policies and templates
- Selecting appropriate templates by use case
- Extracting graphics HDX information for troubleshooting
- Reducing bandwidth through policies and settings

Delivering Multimedia

- HDX Redirection technologies
- Client and server content fetching and rendering
- Configuring Flash video fallback behavior
- Configuring Windows media redirection and transcoding
- Using the HDX Skype for Business optimization pack

Configuring for Double Hop HDX Connections

- The double hop HDX scenario or ICA-pass-through
- Drive mapping with double hop
- Workspace control behavior
- Session sharing behavior

Part 2: Days 3-4

Troubleshooting Introduction

- Support methodology
- Troubleshooting tools
- Citrix Director
- CDF tracing
- Citrix Insight Services
- Citrix Diagnostic Toolkit

Using PowerShell

- PowerShell structure and syntax
- PowerShell help and discovery Cmdlets
- XenApp and XenDesktop PowerShell SDK

Troubleshooting StoreFront

- StoreFront authentication
- StoreFront enumeration
- StoreFront services
- XML Broker issue
- Subscription store backup and restore

Troubleshooting the XenApp and XenDesktop Controller

- FMA services architecture
- Validating FMA services
- XenApp and XenDesktop SQL connectivity and authentication
- XenApp and XenDesktop site recovery and cleanup

Troubleshooting VDA Registration

- VDA registration options
- VDA registration communications
- Common registration failures
- VDA registration troubleshooting methods

Troubleshooting VDA Connections

- Connection communication flow
- Common connection failures
- Citrix Receiver clean-up
- XenApp load balancing issues
- Analyzing ICA files
- Active Directory authentication with Citrix Director
- Enhanced reboot scheduling in Citrix Studio