CHT A285: VMWARE VIEW: INSTALLATION, CONFIGURATION & MANAGEMENT

Item	Value
Curriculum Committee Approval Date	10/20/2021
Top Code	070800 - Computer Infrastructure and Support
Units	3 Total Units
Hours	72 Total Hours (Lecture Hours 45; Lab Hours 27)
Total Outside of Class Hours	0
Course Credit Status	Credit: Degree Applicable (D)
Material Fee	No
Basic Skills	Not Basic Skills (N)
Repeatable	No
Grading Policy	Standard Letter (S), • Pass/No Pass (B)

Course Description

Students will learn the concepts and capabilities of virtual desktops with a focus on the installation, configuration, and management of virtual desktops and thin clients using tools such as VMWare. This course will provide applications-oriented administrators with the knowledge and skills to virtualize applications with VMware ThinApp, modify parameters to handle special circumstances, and choose the best deployment and updating processes for organizational environments. ADVISORY: CHS A110, IT A110, CIS A110, CHS A191, IT A191 or CIS A191. Transfer Credit: CSU.

Course Level Student Learning Outcome(s)

1. Demonstrate in project format the use of the differing technologies, protocols and tools to design and build a virtual desktop.
2. Demonstrate in project format the ability to control, deploy and manage virtual resources.

Course Objectives

- 1. Install and configure View components.
- 2. Create and manage dedicated and floating desktop pools.
- 3. Deploy and manage linked-clone virtual desktops.
- 4. Configure and manage desktops that run in local mode.
- 5. Configure secure access to desktops through a public network.
- 6. Use ThinApp to package applications.
- 7. Describe the major components of the ThinApp architecture.
- 8. Modify Package.ini parameters to increase the variety and complexity of applications that can be virtualized.
- 9. Troubleshoot problems with ThinApp packages.

Lecture Content

The content and topics are as follows: 1. Introduction to VMware Viewa. View features and components 2. View Connection Servera. Installation and configuration 3. View Desktopsa. View Agentb. PCoIP and other remote display protocolsc. USB redirection and multimedia redirection 4. View Client Optionsa. View Client b. View Client with Local Modec. Thin clientsd. Virtual Printing 5. View Administratora. Configuring automated pools of dedicated and floating desktopsb. Role-based delegated administrationc. Managing ThinApp applications with View Managerd. Monitoring the View deployment 6. Configuring and Managing Linked Clonesa. View Composerb. Deploying and provisioning linked-clone desktopsc. Managing linked-clone desktopsd. Managing persistent disks 7. Local-Mode Desktopsa. Local-mode desktopsb. View Transfer Server and Transfer Server repositoryc. Local-mode operations 8. Command-Line Tools and Backup Optionsa. vdmadmin utilityb. Clients in kiosk modec. Backing up the View databasesd. Restoring the View databases 9. Managing VMware View Securitya. View security serverb. Network configuration and authentication options 10. View Manager Performance and Scalabilitya. Replica connection serversb. Performance considerations and load balancing 11. VMware “ThinApp”a. Using “ThinApp” to capture applicationsb. Deploying and updating “ThinApp” packagesc. Virtualizing Internet Explorer 6 for use on a Windows 7 system

Lab Content

Installing and Configuring the View Connection Server Installing the View Agent in Desktops Creating and Entitling a View Desktop Installing and Using the View Client Configuring and Using Virtual Printing Modifying Global Settings and Managing Users and Sessions Creating and Using an Automated Pool Role-Based Delegated Administration Install View Composer on a Standalone System Deploying Linked-Clone Desktops Modifying Linked-Clone Desktops Managing Linked-Clone Persistent Disks Configuring a View Security Server Configuring View Personal Management in Local Computer Policy Environment Capturing Applications with VMware ThinApp Deploying an Application Captured with VMware ThinApp Packaging Internet Explorer 6 with VMware ThinApp Configuring View Personal Management in Local Computer Policy Environment

Method(s) of Instruction

- Lecture (02)
- DE Live Online Lecture (02S)
- DE Online Lecture (02X)
- Lab (04)
- DE Live Online Lab (04S)
- DE Online Lab (04X)

Instructional Techniques

Lecture and application of ideas Students will be presented material from several different sources, including, but not limited to study guides, “Web-based” curriculum, in-class demonstrations of systems integration and personal experiences of industry professionals.Individual and paired exercises During the lab portion of the class, students will be required to perform many of the tasks of a network administrator. In order to complete several projects, students will need to work together in teams to build working local area networks.Interactive computer-based assignments Using computer and “Web-based” training tools, students will be working on simulated networks in order to solve problems.

Reading Assignments

Students will access the online curriculum, read the weekly assignments and take a quiz to facilitate the understanding of the material. Minimum of 3 hours per week (45 hours) reading from textbook material.

Writing Assignments

Program and configure a set of routers to create a simulated Wide Area Network (WAN) infrastructure. Given a minimum set of requirements, the student will design a recommended solution accommodating routing technologies using some combination of hardware and software. After the solution is designed, the student will create a presentation describing the results. Minimum of 3 hours per week creating and editing class and software projects.

Out-of-class Assignments

45 hours (3hrs/wk). Student performance on quizzes, tests, including short essays, and laboratory assignments will be used to determine proficiency

Demonstration of Critical Thinking

Reading and writing assignments Web-based research Term or other paper(s) Laboratory reportsProblem solving demonstrations Exams Homework problemsSkill demonstrations Performance exams Case study presentationsObjective examinations, including Multiple-choice True/false Completion

Required Writing, Problem Solving, Skills Demonstration

Program and configure a set of routers to create a simulated Wide Area Network (WAN) infrastructure. Given a minimum set of requirements, the student will design a recommended solution accommodating routing technologies using some combination of hardware and software. After the solution is designed, the student will create a presentation describing the results.

Eligible Disciplines

Computer information systems (computer network installation, microcomputer ...: Any bachelors degree and two years of professional experience, or any associate degree and six years of professional experience. Computer service technology: Any bachelors degree and two years of professional experience, or any associate degree and six years of professional experience.

Textbooks Resources

1. Required Von Oven, Peter. Mastering VMware Horizon 8, 1st ed. Apress, 2021