

Introduction to Networking Fundamentals, Skill Labs

Course Specifications

Course Number: ACI76-031SL_rev1.0

Lab Length: Approximately 14 hours

Understanding the Concepts of Internet, Intranet and Extranet (98-366)

Introduction

Objective

The Understanding the Concepts of Internet, Intranet and Extranet module provides you with the instructions and devices to develop your hands-on skills in the following topics.

- Managing Security Zones in Internet Explorer
- Configuring Windows Firewall and Blocking Applications
- Installing and Configuring Routing and Remote Access

Understand Local Area Networks (LANs) (98-366)

Introduction

Objective

The Understand Local Area Networks (LANs) module provides you with the instructions and devices to develop your hands on skills in the following topics:

- Configure IP Addresses

Configuring Routing (98-366)

Introduction

Objective

The Configuring Routing module provides you with the instructions and devices to develop your hands on skills in the following topics:

- Configure Networking
- Test Connectivity
- Configure Routers
- Configure Routing Protocols

Configuring a NAT Firewall (98-366)

Introduction

Objective

The Configuring a NAT Firewall module provides you with the instruction and computer hardware to develop your hands-on skills in the defined topics. This module includes the following exercises:

- Configuring NAT Firewall
- Configuring Port Forwarding

Understand IPv4 (98-366)

Introduction

Objective

The Understand IPv4 module provides you with the instructions and devices to develop your hands-on skills in the following topics:

- Configure IPv4 Settings

Understanding IPv6 (98-366)

Introduction

Objective

The Understand IPv6 module provides you with the instructions and devices to develop your hands-on skills in the following topics:

- Configure IPv6 Settings

Understanding Name Resolution (98-366)

Introduction

Objective

The Name Resolution module provides you with the instructions and devices to develop your hands on skills in the following topics.

- Work with Host Names
- Work with the HOSTS File
- Testing Name Resolution
- Examining DNS Configuration
- Configure a DNS Server
- Testing DNS
- Installing and configuring WINS

Managing DHCP Servers (98-366)

Introduction

Objective

The Managing DHCP Servers module provides you with the instructions and devices to develop your hands on skills in the following topics.

- Configure a DHCP Server
- Obtain an IP Address Lease for DHCP Client
- Configure DHCP Server in Linux

Working with TCP/IP Command Line Tools (98-366)

Introduction

Objective

The Working with TCP/IP Command Line Tools module provides you with the instruction and server hardware to develop your hands on skills in the defined topics. This module includes the following exercises:

- Using Ipconfig
- Using Tracert
- Using Netstat
- Using Nslookup
- Using Pathping
- Using Nbtstat
- Using Arp
- Using Ping

Overview

Lab Details:

In this module, you will be working on the following equipment to carry out the steps defined in each exercise.

- PLABDC01 (Windows Server 2012 R2 - Domain Controller)
- PLABWIN810 (Windows 8.1 - Domain Workstation)
- PLABWIN701 (Windows 7 - Domain Workstation)

Understand Client Server and Peer to Peer Networks (98-366)

Introduction

Objective

The Understand Client Server and Peer-to-Peer Networks module provides you with the instruction and server hardware to develop your hands-on skills in the defined topics. This module includes the following exercises:

- Understand Domains and Workgroups
- Creating a HomeGroup

Understand Network Communications and Protocols (98-366)

Introduction

Objective

The Understand Network Communications and Protocols module provides you with the instruction and computer hardware to develop your hands on skills in the defined topics. This module includes the following exercises:

- Verifying Port 80 for HTTP
- Verifying Port 443 for HTTPS
- Verify Port 139 for NetBIOS
- Understanding TCP and UDP

Install and Configure VPN Server (98-366)

Introduction

Objective

The Install and Configure VPN Server module provides you with the instruction and server hardware to develop your hands-on skills. This module includes the following exercises:

- Install VPN Server
- Configure VPN Server Properties
- Using PPTP

Understand IPSec (98-366)

Introduction

Objective

The Understand IPSec module provides you with the instruction and server hardware to develop your hands-on skills. This module includes the following exercises:

- Prepare Lab Environment for Network Monitor

Course Outline

- Create Connection Security Rules

Understand How Software as a Service (SaaS) Works (98-366)

Introduction

Objective

The Understand How Software as a Service (SaaS) Works module provides you with the instruction and server hardware to develop your hands on skills in the defined topics. This module includes the following exercises:

- Sign Up for Microsoft Office 365 Trial
- Sharing Documents in OneDrive