

Deploying Cisco Unified Contact Center Enterprise (DUCCEv1.0)

Course Objectives

- Demonstrate an overall understanding of the Cisco Unified CCE v8.0 system, processes, and its environment
- Install and configure a Cisco Unified CCE v8.0 system
- Create routing options using an external SQL database and an Application Gateway
- Install and configure Cisco Outbound Option
- Install and utilize Cisco Support Tools, Cisco Analysis Manager, and Cisco Unified Intelligence Center

Prerequisites

The knowledge and skills you must have before attending this course are as follows:

- Familiarity with Call Center operations
- Microsoft Active Directory
- Microsoft Windows 2003
- Microsoft SQL Server 2005
- Familiarity with CIPT
- AUCCE course attendance is a plus.

Course Outline

Module 1: Cisco Unified Contact Center Enterprise Overview

Lesson 1: Presenting Cisco Unified Contact Center Enterprise

- Define Cisco Unified CCE
- List the benefits of using Cisco Unified CCE to include carrier class reliability, scalability, and normalized reporting across multiple ACD platforms using WebView or Cisco Unified Intelligence Center
- Describe the options of Cisco Unified CCE, including Cisco Outbound Option, Cisco Interaction Manager, Customer Voice Portal, Agent Desktop options, Contact Center Management Portal, Remote Silent Monitoring, CRM connectors, and Expert Advisor

Lesson 2: Cisco Unified Contact Center Enterprise Deployment Models

- Describe the most common deployment models for Cisco Unified CCE
- Describe the Cisco Unified CCE networks and their roles
- Describe the various distributed network deployment types available
- Describe the QoS requirements for the Cisco Unified CCE networks
- Describe the general hardware and software requirements for Cisco Unified CCE

- Describe the fundamental properties of the Cisco engineering methodology, PPDIIO

Module 2: Cisco Unified Contact Center Enterprise Component Architecture

Lesson 1: Understanding Cisco Unified Contact Center Enterprise Processes

- Describe the ICM node startup sequence
- Describe a simple preroute call flow from an ICM node point of view
- List and define ICM node processes
- Understand the role of the Node Manager and the Node Manager Manager
- Describe the individual ICM node startup sequences
- List the actions that occur when a configuration change is submitted

Lesson 2: Understanding Cisco Unified Contact Center Enterprise Fault Tolerance

- List fault tolerance goals
- List components duplicated in order to satisfy fault tolerance goals
- Understand the basic hot standby and synchronized execution approaches to fault tolerance
- Demonstrate a duplexed Central Controller architecture
- Define the “synchronized” processes and the “synchronized zones”
- Describe a synchronized startup of a simplex Central Controller
- Describe synchronized execution
- Describe a call flow in a duplexed Central Controller
- Describe failure and recovery in a duplexed Central Controller
- Describe fault tolerance for peripheral gateways
- Describe the synchronized zone and hot standby properties of the peripheral gateway
- List the Central Controller failure scenarios and describe the results of a failure

Module 3: Installing Cisco Unified Contact Center Enterprise

Lesson 1: Introduction

- Describe the parent-child relationship and the advantages of using this deployment model
- Describe preroute and postroute call flows using the PG Generic peripheral gateway model
- Summarize the call flows for a parent-child deployment
- Present the class lab scenario

Lesson 2: Integrating Cisco Unified Communications Manager

- Define and describe Cisco Unified Communications Manager
- Define various terms associated with Cisco Unified Communications Manager that are used in Cisco Unified CCE
- Describe how to configure basic Cisco Unified Communications Manager objects such as phones, user accounts, and route points
- Describe the application user account and its purpose in Cisco Unified CCE integration

Lesson 3: Integrating Cisco Unified IP IVR

- Define Cisco Unified IP IVR and its features
- Describe the Cisco Unified IP IVR Script Editor and the basic properties of managing a script

- Describe the configuration requirements for integrating Cisco Unified IP IVR with Cisco Unified Communications Manager and the ICM software
- Describe the call control processes required to establish a call on Cisco Unified IP IVR from a postroute point of view
- Describe the call control processes required to establish a call on Cisco Unified IP IVR from a translation-route point of view

Lesson 4: Installing the Cisco Unified CCE Main Installer

- Recognize the domain models, organizational units, and security groups used by Cisco Unified Intelligent Contact Manager
- Use the Cisco Unified Contact Center Enterprise and Hosted Installer to install the core Unified CCE software
- Use Domain Manager to create the Root, Facility, and Instance Organizational Unit for a Cisco Unified ICM deployment

Lesson 5: Installing the Central Controller

- Install Router A
- Describe the Database Estimator Tool
- Describe the ICMDBA utility and how to use it to create a database
- Install Logger A
- List the various Administration & Data Server types
- Install an Administration & Data Server

Lesson 6: Installing the Peripheral Gateway

- Install the JTAPI client on the peripheral gateway server
- Configure a peripheral gateway in Configuration Manager
- Set up a peripheral gateway with PIMs for Cisco Unified Communications Manager and Cisco Unified IP IVR

Lesson 7: Agent Desktop Options

- Provide an overview of Cisco CTI Server
- Describe the CTI OS Toolkit and Software Development Kit
- Describe Cisco Agent Desktop
- Describe CRM connectors

Lesson 8: Installing CTI Services

- Describe how to install the CTI Server
- Describe how to install the CTI OS Server
- Describe how to install the CTI OS Clients

Lesson 9: Completing the Configuration

- Perform additional configurations for a Cisco Unified CCE deployment
- Create translation routes with the Translation Route Wizard

- Create and schedule a script to run

Module 4: Database and Application Driven Routing Options

Lesson 1: External Database Routing

- Create a database and a table in Microsoft SQL Server
- Write a simple SQL query to populate the database and examine the contents
- Define the database and its location in Configuration Manager
- Create a script that will use information from the database

Lesson 2: Application Gateway

- Describe an Application Gateway
- Set up a new script in Cisco Unified IP IVR to prompt and collect information for use in an Application Gateway demonstration
- Describe how to create an Application Gateway
- Use a Gateway node in an ICM script

Module 5: Installing Cisco Outbound Option

Lesson 1: Cisco Outbound Option Overview

- Define and describe the Cisco Outbound Option and its deployment options, including the Gateway SIP-based dialer
- Describe the Cisco Outbound Option dialing modes
- Describe how calls are processed in an outbound campaign
- Summarize the components and configuration requirements needed to implement an outbound campaign

Lesson 2: Cisco Outbound Option Installation

- Configure a dialer and export a dialer port map
- Enable Blended Agent ECC variables
- Create dialer ports in Cisco Unified Communications Manager
- Create the outbound database
- Set up the dialer component
- Set up the Media Routing peripheral gateway
- Configure an import rule
- Configure a query rule
- Set up a campaign
- Set up ICM scripting for outbound dialing

Module 6: Reporting and Maintenance Tools

Lesson 1: Cisco Unified Intelligence Center Overview

- Describe the benefits and features of Cisco Unified Intelligence Center
- Describe Cisco Unified Intelligence Center deployment models
- Describe Cisco Unified Intelligence Center Administration

Lesson 2: Cisco Support Tools

- Describe Support Tools
- Install the Support Tools applications
- Run command-line tests and utilities from the Support Tools dashboard
- Collect and merge log files using the Support Tools interface

Lesson 3: Cisco Unified Analysis Manager

- Provide an overview of Cisco Unified Analysis Manager
- Describe the Inventory components of Cisco Unified Analysis Manager
- Describe the Tools components of Cisco Unified Analysis Manager
- Describe the Administration components of Cisco Unified Analysis Manager