



Cisco Unified Contact Center Express Test Bed for Collaboration Systems Release 12.8

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Overview

This document describes the Cisco Unified Contact Center Express (Unified CCX) test bed that was used to complete Cisco Collaboration Systems Release 12.8 testing. The test bed is designed to simulate a medium-sized inbound and outbound contact center with local and remote agents. It uses Unified CCX for call treatment and queuing and Cisco Unified Communications Manager (Unified Communications Manager) for call control.

This test bed is designed to implement and test some of the design considerations and guidelines of the [Cisco Collaboration Systems Release 12.x Solution Reference Network Designs \(SRND\)](#), and [Cisco Unified Contact Center Express SRND](#).

For information about how to install and configure these and other Contact Center components, see Components Installation and Configuration Guides at: [Cisco Collaboration Systems for Contact Center Release 12.8](#).

More configuration information for contact center components is available at: [Configuration Examples and TechNotes](#).

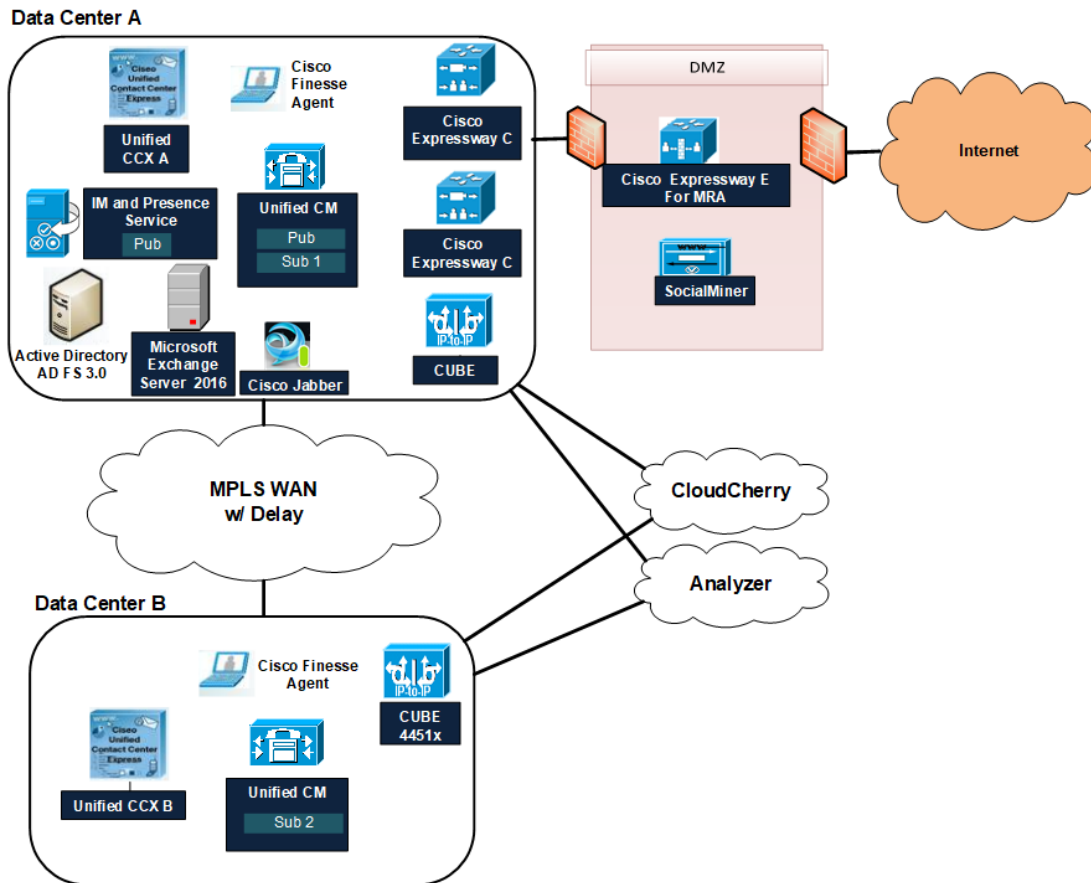
Unified CCX Test Bed and Deployment Architecture

This Unified CCX test bed is designed to replicate a 400 agent inbound and outbound contact center in multiple sites with agents located locally. The test bed design has two data centers separated across a WAN.

The entire deployment uses two data centers connected through a high-speed WAN for redundancy. All solution components are designed for high availability (HA) wherever possible. The figure provides an overview of the Unified CCX Test Bed and Deployment Architecture.

Figure 1: Collaboration Systems Release 12.8: Unified CCX Test Architecture

Unified Contact Center Express Test Architecture



General Deployment Options

Cisco Unified Contact Center Express (Unified CCX) provides a secure, highly available, and easy to deploy customer interaction management solution for up to 400 agents. This integrated solution is intended for both formal and informal contact centers.

Unified CCX provides options to address multiple functional areas such as:

- Inbound voice
- Outbound campaign
- Agent email
- Mobile and Remote Access

Other components included are:

- Web-based reports
- Cisco SocialMiner user licenses for social forum activity monitoring and follow-up

- Web-based Cisco Finesse desktops

You can deploy these options on Cisco Unified Communications on Cisco Unified Computing System (Cisco Unified Communications on Cisco UCS) or any other equivalent specification-based third-party virtual servers with the supported deployment models.

As a part of testing, we completed sanity call flow testing for the following features:

Cisco Headset and Finesse Integration

Cisco Finesse is the next generation browser-based agent and supervisor desktop for Unified CCX. Cisco Finesse is an alternative to Cisco Agent Desktop, Cisco Supervisor Desktop, and Cisco Desktop Administrator. Cisco Finesse is available with enhanced and premium license packages and provides typical inbound voice functionality. It supports Unified Communications Manager-based silent monitoring and workflow-based recording as well as Work Force Optimization (WFO).

Cisco Headset and Finesse Integration improves productivity of contact center agents by enabling them to change the Ready/Not Ready status from their Cisco headset. This feature is targeted to Contact Center customers whom also integrate with Cisco Unified Communications Manager.

Cisco Unified Communications Mobile and Remote Access

Cisco Unified Communications Mobile and Remote Access (MRA) is a core part of the Cisco Collaboration Edge Architecture. It allows endpoints such as the Cisco IP Phone 7800 and 8800 Series and the Cisco DX Series to have their registration, call control, provisioning, messaging, and presence services provided by Unified Communications Manager when the endpoint is not within the enterprise network. Cisco Expressway provides secure firewall traversal and line-side support for Unified Communications Manager registrations.

For more deployment information about Mobile and Remote Access through Cisco Expressway, see <https://www.cisco.com/c/en/us/support/unified-communications/expressway-series/products-installation-and-configuration-guides-list.html>.

44XX Gateway Support

The Cisco 4451x Router runs on IOS-XE Software. The Cisco IOS-XE Software is designed to provide modular packaging, feature velocity, and powerful resiliency.

Cisco Finesse

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Unified CCX Predictive and Progressive Agent Outbound

The outbound feature provides outbound dialing functionality in addition to existing Unified CCX inbound capabilities. This feature allows agents who are not busy with inbound calls to handle outbound calls.

With the Outbound feature, Unified CCX places customer calls using the Unified Communications Manager.

Agent Predictive and Progressive Dialer leverages the call control and Call Progress Analysis (CPA) from SIP gateway. The SIP gateway performs call progressive analysis of the call and informs the outcome of the call to Unified CCX. All the dialed contacts, which are live voice, are connected to an agent and the remaining calls are disconnected.

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