Unified Contact Center Express Operations Guide, Release 11.0(1)

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Change History

Change	See	Date
Removal of Cisco Agent Desktop	The following Cisco Agent Desktop related sections have been removed from this version: • utils uccx finesse • show uccx dbserver sessions list • show uccx dbserver user waiting • utils service • show uccx trace levels • Updated Component Trace Files, on page 4 • Updated Network Services, on page 11	Initial release of document for 11.0(1)

About This Guide

The Cisco Unified Serviceability Administration Guide provides description and procedures for:

- Real-Time Monitoring Tool
- Unified CCX Disaster Recovery System
- Command Line Interface

Audience

This guide assists administrators to maintain and troubleshoot Cisco Unified CCX. This guide requires knowledge of telephony and IP networking technology.

Related Documents

Document	Link
Cisco Unified Serviceability Administration Guide	http://www.cisco.com/en/US/partner/products/sw/voicesw/ps556/prod_maintenance_guides_list.html
Cisco Unified Real-Time Monitoring Tool Administration Guide	http://www.cisco.com/en/US/partner/products/sw/voicesw/ps556/prod_maintenance_guides_list.html
Cisco Unified Communications Operating System Administration Guide	http://www.cisco.com/en/US/products/sw/custcosw/ps1846/prod_maintenance_guides_list.html
Cisco Unified Contact Center Express Installation and Upgrade Guide	http://www.cisco.com/en/US/products/sw/custcosw/ps1846/prod_installation_guides_list.html
Cisco Unified Contact Center Express Virtualization Docwiki	http://docwiki.cisco.com/wiki/Virtualization_for_Cisco_Unified_Contact_Center_Express
Cisco Unified Contact Center Express Troubleshooting Docwiki	http://docwiki.cisco.com/wiki/Troubleshooting_Unified_Contact_Center_Express

Obtaining Documentation and Submitting a Service Request

For information on obtaining documentation, using the Cisco Bug Search Tool (BST), submitting a service request, and gathering additional information, see *What's New in Cisco Product Documentation*, at: http://www.cisco.com/c/en/us/td/docs/general/whatsnew/whatsnew.html.

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CHAPTER 1

Serviceability

Cisco Unified CCX Serviceability, a web-based troubleshooting tool for Cisco Unified Contact Center Express (Unified CCX), provides the following functionality:

- Configure alarms for local and remote Syslogs.
- Configure trace settings for Unified CCX components. After these settings are enabled, you can collect and view trace information using the Real-Time Monitoring Tool (RTMT).
- Configure and manage log profiles for different Unified CCX components.
- Manage and control network services.
- View replication status, synchronize data, and reset replication for Unified CCX servers in a cluster through Datastore Control Center.
- Set parameters for different platform services.
- Set Java Virtual Machine (JVM) parameters for different Unified CCX services to collect thread and memory traces.

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Access Cisco Unified CCX Serviceability

Log in to Cisco Unified CCX Serviceability either with the end user credentials configured during the initial setup of CCX Administration interface, or with the application user credentials configured during install.

To access Cisco Unified CCX Serviceability, log in to Cisco Unified CCX Serviceability page using the following URL format: `https://server name or IP address/uccxservice`

Alarms

You can view alarm information by using the SysLog Viewer in Cisco Unified Real-Time Monitoring Tool (RTMT). See “Real-Time Monitoring Tool” section for detailed information on how to view alarm information.

Alarm Configuration

Use the **Alarm Configuration** web page in Unified CCX Serviceability to view and configure alarm server settings for different Unified CCX components.

Note To find more information on the Alarm messages in the system, use **Alarm Definition** page in *Cisco Unified Serviceability*.

Alarm Configuration Settings

Use the **Alarm Configuration** page to modify alarm settings.

In the case of a High Availability deployment, the alarm configuration changes are automatically propagated to the second node. If the second node cannot be contacted, an alert message indicating that the update has failed on the remote node is displayed.

Following table defines the options available on this page:

Table 1: Alarm Configuration Settings

Setting	Description
Enable Alarm for Local Syslogs	Enables the alarms to be stored as syslog messages locally. This setting can be viewed in the Application logs within Syslog viewer from the RTMT tool. For information about viewing logs with the SysLog Viewer, see “Real-Time Monitoring Tool” topic.
Enable Alarm for Remote Syslogs	Enable the alarm messages to be sent to the configured Syslog server. **Server Name** field - Provide the IP / hostname of the Syslog server to which the system should send the alarm messages.

Setting	Description
Alarm Event Level	Alarm event level messages range from severity 0 (most severe) to severity 7 (least severe). See the description below. When you choose a severity level, all messages of that severity level and higher are sent. For example, if you choose ERROR_ALARM (Severity 3), all messages of severity 3, severity 2, severity 1, and severity 0 are sent. The default is INFORMATIONAL_ALARM (Severity 6), which will send messages on all severity levels starting from 6 to severity level 0. You can choose one of the following alarm event level options from the drop-down list box: **Emergency** Systemic failures causing the whole Contact Center to be down. For example, “CCX engine crashed or went down abruptly”. **Alert** Multiple components failures on the system. For example, “Telephony and RMCM subsystem out of service due to CTI provider failure”. **Critical** Failures in the Major component of the system. For example “Web chat subsystem out of service”. **Error** Functionality or certain scenario not working as expected. For example, “Create dialog group failed”. **Warning** Some limits or threshold about to be breached. For example, “Historical reporting internal queue near capacity”. **Notice** Trigger of major operation notification. For example, “Engine Shutdown initiated by Administrator” **Informational** Information about various minor event occurrences in the system. For example, “Backup Operation completed”. **Debug** Detailed traces which help in debugging issues. For example, detailed information on some CCX events.

Traces

A trace file is a log file that records activity from the Cisco Unified Contact Center Express (Unified CCX) components. Trace files provide detailed information about specific errors and help you troubleshoot the errors.

The Unified CCX system also generates information about all threads that are running in the system. This information is stored in the thread dump file and is useful for troubleshooting.

Component Trace Files

The component trace file contains information about each component. You can create a trace file for any of the following Unified CCX components:

- Cisco Unified CCX Administration
- Cisco Unified CCX Cluster View Daemon
- Cisco Unified CCX Editor
- Cisco Unified CCX Engine
- Cisco Unified CM Telephony Client
- Cisco Unified Intelligence Center Services
- Cisco Unified CCX Socket.IO Service

After configuring the information that you want to include in trace files for various services, you can collect and view them by using the trace and log central option in the Cisco Unified Real-Time Monitoring Tool. See the “Real-Time Monitoring Tool” section for detailed information.

Configure Trace Parameters

To update trace file information and to activate and deactivate logging, follow this procedure:

Procedure

Step 1 From the Cisco Unified CCX Serviceability menu, choose **Trace** > **Configuration**.

Step 2 From the **Select Service** drop-down list box, choose a service or component for which you want to configure trace. Then click **Go**.
The debug levels for different Unified CCX subfacilities or services that are displayed may vary depending on the selected service.

Step 3 Update the debug level for one or more of the libraries or subfacilities for the selected service using the check box provided and click **Save**.

Step 4 To limit the number and size of the trace files, you can specify the trace output setting using the following table.

Field	Description
Maximum Number of Files	The maximum number of trace files that can be retained by the system. This field specifies the total number of trace files for a given service. Cisco Unified CCX Serviceability automatically appends a sequence number to the file name to indicate which file it is, for example, Cisco001MADM14.log. When the last file in the sequence is full, the trace data begins writing over the first file. The default value varies by service.
Maximum File Size	This field specifies the maximum size of the trace file in kilobytes or megabytes depending on the selected service. The default value varies according to the service you select.

Caution You should activate additional logging *only* for debugging and remember to *deactivate* logging once the debugging session is complete.

Note
- You will not be able to save the trace configuration if Cisco Unified Intelligence Center service on the publisher node is down.
- You will not be able to save the trace configuration if the Socket.IO service is down. When the node containing the socket.IO service is down then the log levels will not be saved on that particular node.

Trace Level Options

A trace file that records all information for a component, such as the Unified CCX Engine, can become large and difficult to read. To help you manage the trace file, the Cisco Unified CCX system lets you specify the subfacilities for which you want to record information using Trace Level Options page.

For each component, you can select one or more Debugging trace level options. The selections in the Trace Level page specify the level of details in the debugging messages that the system sends to a trace file. For instance, if you select Debugging option, the system sends only the basic error messages, while if you select XDebugging5 option, the system will send errors, warnings, informational, debugging, verbose messages and so on in detail to the trace file.

The table below describes the Trace file subfacilities.

Table 2: Trace File Subfacilities

Component Code	Description
AC_CLUSTER	Archive Cluster Component
AC_CONFIG	Archive Configuration Component

Component Code	Description
AC_DATABASE	Archive Database Component
AC_JTAPI	JTAPI Archive Component
AC_OS	Archive Operating System Component
ADM	Administration Client
ADM_CFG	Administration Configuration
APP_MGR	Applications Manager
ARCHIVE_MGR	Archive Manager
AW_CFG	Restore Administration Configuration
BARBI_CLI	Backup and Restore Client Interface
BOOTSTRAP_MGR	Cisco Unified CCX Bootstrap Manager
CFG_MGR	Configuration Manager
CHANNEL_MGR	Channel Manager
CLUSTER_MGR	Cluster Manager
CONTACT_MGR	Contact Manager
CONTACT_STEPS	Contact Steps
CRA_CMM	Cisco Unified CCX ClusterMsgMgr Component
CRA_HRDM	Cisco Unified CCX Historical Reporting Data Manager
CVD	Cluster View Daemon
DB	Database
DBPURGE_MGR	Database Purge Manager
DESKTOP	Cisco Unified CCX Editor Desktop
DOC_MGR	Document Manager
EDT	Cisco Unified CCX Editor general
ENG	Cisco Unified CCX Engine

Component Code	Description
EXECUTOR_MGR	Executor Manager
EXPR_MGR	Expression Manager
FILE_MGR	File Manager
GENERIC	Generic catalog for a facility
GRAMMAR_MGR	Grammar Manager
GRP_CFG	Group Configuration
HOLIDAY_MGR	Holiday Manager
HR_MGR	Historical Reports Manager
ICD_CTI	Cisco Unified CCX CTI Server
ICD_HDM	IPCC Express Historical Data Manager
ICD_RTDM	Cisco Unified CCX ICD Real-Time Data Manager
IVR_RTDM	Cisco Unified CCX IP IVR Real-Time Data Manager
IO_ICM	Cisco Unified ICME Input/Output
JASMIN	Java Signaling and Monitoring Interface
LIB_APPADMININTERCEPTOR	Cisco Unified CCX Administration Interceptor Library
LIB_AXL	AXL Library
LIB_CFG	Configuration Library
LIB_CLUSTER_CFG	Configuration Library for the cluster
LIB_CRTP	CRTP Library
LIB_DATABASE	Database Library
LIB_DIRECTORY	Directory Access Library
LIB_EVENT	Event Message Library
LIB_ICM	Cisco Unified ICME Library
LIB_JASPER	Jasper Tomcat Library

Component Code	Description
LIB_JCUP	JavaCup Library to parse expressions
LIB_JDBC	JDBC Library
LIB_JINI	JINI Services
LIB_JMAIL	Java Mail Library
LIB_JLEX	JLEX Library used to parse expressions
LIB_LICENSE	License Library
LIB_MEDIA	Media Library
LIB_RMI	Java Remote Method Invocation Library
LIB_SERVLET	Servlet Library
LIB_TC	Tomcat Library
LOG_MGR	Log Manager
MRCP_CFG	MRCP Configuration
MGR_MGR	Manager Manager
NODE_MGR	Node Manager
PALETTE	Editor Palette
PROMPT_MGR	Prompt Manager
PURGING	Purging
RPT	Reporting
RTPPORT_MGR	RTP Manager
SCRIPT_MGR	Script Manager
SESSION_MGR	Session Manager
SIP_STACK	SIP Stack logging
SOCKET_MGR	Socket Manager
SS_APP	Application Subsystem

Component Code	Description
SS_CHAT	Chat Subsystem
SS_CM	Contact Manager Subsystem
SS_CMT	Cisco Media Termination Subsystem
SS_DB	Database Subsystem
SS_EMAIL	Email Subsystem
SS_HTTP	HTTP Subsystem
SS_ICM	Cisco Unified ICME Subsystem
SS_MRCP_ASR	MRCP ASR Subsystem
SS_MRCP_TTS	MRCP TTS Subsystem
SS_OUTBOUND	Outbound Dialer Express Subsystem (uses MIVR log file)
SS_RM	Resource Manager Subsystem
SS_RMCM	Resource Manager Contact Manager Subsystem
SS_ROUTEANDQUEUE	Route and Queue Subsystem
SS_RTR	Real-Time Reporting Subsystem
SS_SIP	SIP Subsystem
SS_TEL	JTAPI Subsystem (Telephony)
STEP_CALL_CONTROL	Call Control Steps
STEP_MEDIA_CONTROL	Media Control Steps
STEP_SESSION	Sessions Steps
STEP_SESSION_MGMT	Session Management Steps
STEP_USER	User Steps
STEP_CALL_CONTACT	Call Contact Steps
STEPS_CONTACT	Contact Steps
STEPS_DB	Database Steps

Component Code	Description
STEPS_DOCUMENT	Document Steps
STEPS_EMAIL	E-mail Steps
STEPS_GENERAL	General Steps
STEPS_GRAMMAR	Grammar Steps
STEPS_HTTP	HTTP Steps
STEPS_ICM	Cisco Unified ICME Steps
STEPS_IPCC_EXP	Cisco Unified CCX Steps
STEPS_JAVA	Java Steps
STEPS_PROMPT	Prompt Steps
STEPS_SESSION	Session Steps
UCCX_WEBSERVICES	Chat Subsystem
USR_MGR	User Manager
WEB_STEPS	HTTP Contact Steps

When the Cisco Unified CCX product is running on a 7845 machine and tracing is ON (the default), limit the Busy Hour Call Completions (BHCC) to 4500 calls per hour. If you want to run a higher BHCC, turn the debug traces OFF. The trace subfacilities to be turned OFF are ICD_CTI, SS_TEL, SS_RM, SS_CM, and SS_RMCM.

Trace File Location

The Unified CCX server stores the trace files in the Log directory under the directory in which you installed the Unified CCX component. You can collect and view trace information using the Real-Time Monitoring Tool (RTMT).

Trace File Information

The trace files contain information in standard Syslog format. The file includes some or all of the following information for each event that is recorded:

- Line number
- Date and time the event occurred
- Facility and subfacility (component) name

- Severity level
- Message name
- Explanation
- Parameters and values

Log Profiles Management

Log profile is an aggregated entity that preserves multiple trace settings of the following Unified CCX services:

- Cisco Unified CCX Engine (Traces termed as MIVR)
- Cisco Unified CCX Administration (Traces termed as MADM)
- Cisco Unified CCX Cluster View Daemon (Traces termed as MCVD)

Choose **Trace** > **Profile** from the Unified CCX Serviceability menu to access the **Log Profiles Management** page.

Note Log Profiles Management does not support Socket.IO service.

Log profiles in Unified CCX can be one of the following two types:

1. System Log Profiles: These log profiles are preinstalled with Unified CCX , and you cannot modify these profiles.
2. Custom Log Profiles: If the trace settings generated by system profiles are not sufficient in a particular scenario, you can create custom log profiles for better troubleshooting. You can create and enable these custom log profiles as needed.

Note

- In a High Availability deployment of Unified CCX , all the log profile operations will be reflected on both the nodes in the cluster.
- You cannot delete the profile if the selected log profile is the last-enabled profile in the system.

Serviceability Tools

Network Services

Network services include services that the system requires to function and are activated by default.

After you install your application, network services start automatically. The list of services that is displayed in the **Control Center—Network Services** web page depends on the license package of your Unified CCX. If you have a Unified CCX Premium license, Cisco Unified Contact Center Express (Unified CCX) Serviceability categorizes the network services into the following categories:

- System services
- Admin services
- DB services
- Finesse services

Note

- Unified CCX Engine Services information will be removed from **UCCX Serviceability** page when an invalid license is uploaded.
- Only System and Admin services information will be visible in **Unified CCX Node Services** section.

Manage Network Services

Control Center in Cisco Unified CCX Serviceability lets you perform the following tasks:

- Start, stop, and restart Unified CCX services
- View and refresh the status of Unified CCX services

Choose **Tools** > **Control Center - Network Services** from the Unified CCX Serviceability menu to manage network services.

Tip You may need to manage services in both Cisco Unified CCX Serviceability and Cisco Unified Serviceability to troubleshoot a problem. The Cisco Unified Serviceability services are described in the *Cisco Unified Serviceability Administration Guide*.

Note You cannot start or stop Cisco Unified CCX Serviceability service using the Unified CCX Serviceability web interface and you need to use CLI. For a list of services that you can start and stop using the CLI and for detailed instructions, see “Command Line Interface Reference” section.

Manage Datastores

Datastores are components that allow you to manage and monitor historical, agent, repository, and configuration data across all servers in the Unified CCX cluster.

Use the Datastore Control Center to perform the following functions:

- Obtain an overview of the datastores in the cluster and their relationships.
- Manage the data store read/write access.
- Monitor and control the replication state (available only for Agent, Historical, and Repository datastores).

Note Support for High Availability and remote servers is available only in multiple-server deployments.

The Unified CCX cluster uses publisher/subscriber database model for data replication across the system. Under normal circumstances, the database master acts as the source of data and the other node acts as the target for the data. In other words, the database master is the *publisher* and the other node is the *subscriber*.

Note In the **Tools** > **Datastore Control Center** > **Datastores** page, the first node that is installed in the cluster is marked as publisher (with an icon marked P). In Unified CCX , the term "publisher" is used to denote only the first node in the cluster and does not indicate that node is the source of the data. Typically, the database master node acts as the source and the other node acts as the destination.

Synchronize Datastore

Use this procedure to synchronize data for each datastore between the two nodes in case of a mismatch.

Procedure

Choose **Tools** > **Datastore Control Center** > **Datastores** and click **Synchronize Data**

Note Synchronize datastore does not update any mismatch in the configuration datastore.

Manage Replication Between Nodes

The **Replication Servers** menu option in **Datastore Control Center** allows you to view replication status and reset the replication between two nodes for the data stores across all servers in the cluster. This menu will be available only in a High Availability deployment.

By default, replication between two nodes is removed if they are not able to synchronize with each other due to network outage for a substantial period of time. This time depends on the amount of requests sent from one node to the other and the load on servers. If the replication stops due to network outage, an alert is sent to the administrator so that the administrator can take corrective action.

If the replication is removed, the administrator can go to **Tools** > **Datastore Control Center** > **Replication Servers** submenu from the Cisco Unified CCX Serviceability menu and click **Reset Replication**. This ensures that the replication is established between the nodes and the data synchronization (repair) process is initiated. Click **Check Details** icon to monitor status of the repair.

If the network outage did not result in the replication setup being removed, after the network is functional, the synchronization of data between the databases will be automatic. For outages that last a few seconds, typically the administrator need not take any action, and the system will be able to synchronize automatically.

Note Even though the replication between the nodes is removed, data can still be written to the database, which is accessible to the Unified CCX engine.

When the subscriber node is not functional and it is required to make configuration updates from the publisher, you can disable Config Data store (CDS) and Historical Data store (HDS) on the subscriber using **Disable**

CDS and HDS icon or button. After the subscriber node is functional, you can enable CDS and HDS on the subscriber using the same toggle button.

Caution Any configuration in Application Administration and Historical data on the Subscriber node will be overwritten, when CDS is enabled again.

Replication During Network Outage

By default, replication between two nodes is removed if they are not able to synchronize with each other due to network outage for a substantial period of time. This time depends on the amount of requests sent from one node to the other and the load on servers. If the replication stops due to network outage, an alert is sent to the administrator so that the administrator can take corrective action.

If the replication is removed, the administrator can go to **Tools** > **Datastore Control Center** > **Replication Servers** submenu from the Cisco Unified CCX Serviceability menu and click **Reset Replication**. This ensures that the replication is established between the nodes and the data synchronization (repair) process is initiated. Click **Check Details** icon to monitor status of the repair.

If the network outage did not result in the replication setup being removed, after the network is functional, the synchronization of data between the databases will be automatic. For outages that last a few seconds, typically the administrator need not take any action, and the system will be able to synchronize automatically.

Note Even though the replication between the nodes is removed, data can still be written to the database, which is accessible to the Unified CCX engine.

Update Parameters

Use the Service Parameters page to view and update different services in Unified CCX servers. Ensure the following prerequisites are met before configuring the parameters:

- The servers are configured.
- The service is available on the servers.

Caution Some changes to service parameters may cause system failure. Cisco recommends that you do not make any changes to service parameters unless you fully understand the feature that you are changing or unless the Cisco Technical Assistance Center (TAC) specifies the changes.

The following services are supported in Unified CCX:

- Cisco AMC Service
- Cisco DRF Local
- Cisco DRF Master
- Cisco Log Partition Monitoring Tool

- Cisco RIS Data Collector
- Cisco Serviceability Reporter
- Cisco Trace Collection Service

For more information, see *Cisco Unified Contact Center Express Serviceability Administration Guide* available here:

http://www.cisco.com/en/US/partner/products/sw/voicesw/ps556/prod_maintenance_guides_list.html

Configure Performance Monitoring of Unified CCX Servers

Use the Performance Configuration and Logging page to configure Java Virtual Machine (JVM) parameters and dump Thread and Memory traces for performance monitoring of Unified CCX servers.

Use the following procedure to configure JVM parameters for a particular service on a particular server.

Procedure

Step 1 Choose **Tools** > **Performance Configuration and Logging** and select the server and a service for which you want to get the JVM options.

Step 2 Click **Dump Thread Trace** to dump the thread traces for the selected service in the selected server. You can collect the corresponding `jvm.log` from the log folder for that facility using Real-Time Monitoring Tool (RTMT).

Step 3 Click **Dump Memory Trace** to dump the memory traces. This creates the following two logs in the log folder for that facility.

- Memory-<facility name>-<time stamp>.hprof (for heap dump)
- histo-<facility name> <time stamp>.log (for histogram)

Step 4 Click **Enable** or **Disable** radio buttons in this page to change the JVM options.

Step 5 Click **Update JVM Options** to update the new settings for selected service on selected node.

Simple Network Management Protocol

Simple Network Management Protocol (SNMP) is an industry-standard interface for exchanging management information between network devices. SNMP enables you to monitor and manage the Unified CCX system. You also can set up SNMP traps to automatically notify any high-severity messages and errors that are generated by the Cisco Unified CCX system.

You can configure the SNMP settings using the **Cisco Unified Serviceability** web interface.

SNMP Management Information Base (MIB)

A Management Information Base (MIB) designates a collection of information that is organized hierarchically. MIBs are made up of managed objects, which are referenced by object identifiers. Managed objects are made up of one or more object instances, which are essentially variables. MIBs provide status monitoring, provisioning, and notification.

Table 3: SNMP MIBs

MIB	Agent Service
CISCO-VOICE-APPS-MIB	Cisco Unified CCX Voice Subagent
CISCO-CDP-MIB	Cisco CDP Agent
CISCO-SYSLOG-MIB	Cisco Syslog Agent
SYSAPPL-MIB	System Application Agent
MIB-II	MIB2 Agent
HOST-RESOURCES-MIB	Host Resources Agent

Note

- Unlike previous releases of Unified CCX , the SysAppl MIB implementation in Unified CCX 9.0(1) and later versions does not distinguish between Unified CCX activated services and deactivated services. It shows all the installed services in Unified CCX.
- In Unified CCX 9.0(1) and later versions , the SysAppl MIB will not provide the Unified CCX subsystem information and their status information. You can view the subsystem and their status information through Cisco Unified CCX Serviceability web interface.
- Syslog messages can also be sent as SNMP traps using the CISCO-SYSLOG-MIB. Refer to the section on CISCO-SYSLOG-MIB for details. They can be correlated to the failure of important features of Unified CCX .

The following section describes CISCO-VOICE-APPS-MIB. For more information about other CCX supported MIBs, see **Cisco Unified CM SNMP** chapter in the *Cisco Unified Serviceability Administration Guide* available here:

http://www.cisco.com/en/US/partner/products/sw/voicesw/ps556/prod_maintenance_guides_list.html

CISCO-VOICE-APPS-MIB

The CISCO-VOICE-APPS-MIB provides information associated with the installed workflow applications provisioned on the Unified CCX Server. It also provides information on the supported SNMP Traps on Unified CCX . You can manage CISCO-VOICE-APPS-MIB through **Unified CCX Serviceability** web interface.

Unified CCX Voice Subagent

Cisco Unified CCX Voice Subagent service implements the CISCO-VOICE-APPS-MIB. Cisco Unified CCX Voice Subagent Service communicates with the SNMP Master Agent through Cisco Unified CCX SNMP Java Adaptor. The Cisco Unified CCX SNMP Java Adaptor service should be up and running for the Unified CCX Voice Subagent to work properly.

For more information about the CISCO-VOICE-APPS-MIB, see this URL: ftp://ftp.cisco.com/pub/mibs/v2/CISCO-VOICE-APPS-MIB.my.

Note

- In Unified CCX , while exposing the Unified CCX workflow information through CISCO-VOICE-APPS-MIB, only one trigger per application row will be returned when doing a walk on the workflow table (cvaWorkflowInstallTable object). If there are multiple triggers associated with a Workflow application, these are shown as separate entries (rows).

SNMP Traps

Subsystems, which are the functional blocks of Unified CCX , sends out alarms that are routed to the Syslog or as SNMP Traps. SNMP Traps are generated when any Unified CCX Subsystem or module or processes start or stop or runtime failure occurs for a module. These failures can be tracked for each major component to track the health of the Unified CCX system.

The following Traps are supported as part of the CISCO-VOICE-APPS-MIB:

Trap Name	Description
cvaModuleStart	A cvaModuleStart notification signifies that an application module or subsystem has successfully started and transitioned into in-service state.
cvaModuleStop	A cvaModuleStop notification signifies that an application module or subsystem has stopped. If cause of the failure is known then, it will be specified as part of the Trap message.
cvaModuleRunTimeFailure	cvaModuleRunTimeFailure notification signifies that a run time failure has occurred. If cause of the failure is known then it will be specified as part of the Trap message.
cvaProcessStart	A cvaProcessStart notification signifies that a process has just started.
cvaProcessStop	A cvaProcessStop notification signifies that a process has just stopped.

The ModuleStart and ModuleStop traps are generated when the key Unified CCX services including Cisco Unified CCX Engine, Cisco Unified CCX Cluster View Daemon and, Cisco Unified CCX Administration and their modules/subsystems are started and stopped respectively.

The ProcessStart and ProcessStop traps are generated when the key Unified CCX services including Cisco Unified CCX Engine, Cisco Unified CCX Cluster View Daemon and Cisco Unified CCX Administration are started and stopped.

You can configure the notification destinations by using the **SNMP Notification Destination Configuration** page in Cisco Unified Serviceability.

Note SNMP Traps are not generated for events when the Unified CCX services and/or their subsystems go Out of Service or are In Service. These events are sent as Remote Syslog messages and can be viewed through any third-party Syslog Viewers. You can refer to the list of CCX services and their subsystems/modules from the Cisco Unified CCX Serviceability under **Tools** > **Control Center Network Services**.

Note

- Unified CCX does not support SNMP trap V3 notifications.
- CISCO-VOICE-APPS-MIB does not support INFORM notifications.

For all notifications, the system sends traps immediately if the corresponding trap flags are enabled. Before you configure notification destination, verify that the required SNMP services are activated and running. Also, make sure that you configured the privileges for the community string or user correctly.

More Info on SNMP

For more information related to SNMP such as SNMP Version 1, Version 2C, Version 3, SNMP system group configuration, SNMP informs and SNMP trap parameters, see *Cisco Unified Serviceability Administration Guide* available here:

http://www.cisco.com/en/US/partner/products/sw/voicesw/ps556/prod_maintenance_guides_list.html

CHAPTER 2

Real-Time Monitoring

The Cisco Unified Real-Time Monitoring Tool (RTMT), which runs as a client-side application, uses HTTPS and TCP to monitor system performance. Unified RTMT can connect directly to devices through HTTPS to troubleshoot system problems.

Unified RTMT allows you to perform the following tasks:

- Monitor a set of predefined management objects that monitor the health of the system.
- Generate alerts in the form of email messages, for objects when values go above or below user-configured thresholds.
- Collect and view traces in default viewers that exist in RTMT.
- View syslog messages in SysLog Viewer.
- Work with performance-monitoring counters.

Note Even when Unified RTMT is not running as an application on your desktop, tasks such as alarm and performance monitoring updates continue to take place on the server in the background.

- Installation and Configuration, page 19
- Performance Monitoring , page 20
- Tools, page 21

Installation and Configuration

The Unified RTMT installer can be downloaded using **Tools** > **Plug-ins** menu on the **Cisco Unified Contact Center Express Administration** web interface. See "Cisco Unified Real-Time Monitoring Tool" section in *Cisco Unified Real-Time Monitoring Tool Administration Guide for Cisco Unified Contact Center Express and Cisco Unified IP IVR* for installation and configuration procedures, available here:

http://www.cisco.com/en/US/partner/products/sw/voicesw/ps556/prod_maintenance_guides_list.html

Performance Monitoring

Unified CCX provides performance counters (called perfmon counters) for application performance monitoring. The perfmon counters help expose various performance values and enables to track application performance in real time.

The perfmon counters contain counter-based information, such as the name and index of the counter, the scale, the type, subcounters to set when setting a counter, the current values, and a map containing counter instance data. Each performance counter instance object contains instance-based data, like the instance ID and current values.

You can log perfmon counters locally on the computer and use the performance log viewer in Unified RTMT to display the perfmon CSV log files that you collected or the Real-time Information Server Data Collection (RISDC) perfmon logs. Choose **System** > **Performance** on the Unified RTMT tool to view perfmon counters.

Performance Objects

Unified RTMT provides a set of default monitoring objects that assist you in monitoring the health of the system. Default objects include performance counters or critical event status for the system and other supported services.

The system logs information every 10 seconds for predefined system counters.

Performance Counters

To troubleshoot system performance problems, you add a counter (query) that is associated with the perfmon object to the performance monitor, which displays a chart for the counter. Choose **System** > **Performance** > **Open Performance Monitoring** to add a new counter.

For more information about monitoring objects and counters, see "Performance Monitoring" section in the *Cisco Unified Real-Time Monitoring Tool Administration Guide for Cisco Unified Contact Center Express and Cisco Unified IP IVR*, available here:

http://www.cisco.com/en/us/products/sw/voicesw/ps556/prod_maintenance_guides_list.html

Performance Objects and Counters for Unified CCX

Following are the Unified CCX application specific objects:

- Unified CCX database monitors
- Unified CCX engine JVM heap
- Intelligence center database performance Info
- Intelligence center JVM statistics
- Intelligence center system condition table
- Intelligence center thread pool section
- Intelligence center tomcat connector

- Reporting engine info
- Ramfs
- SchedulerInfo

Note Expand the objects in RTMT to display the counters. Right click on each counter and select **Counter Description** for the description.

Critical Services

The Critical Services monitoring function provides the name of the critical service, the status (whether the service is up, down, activated, stopped by the administrator, starting, stopping, or in an unknown state), and the elapsed time during which the services are functional on the system.

Note Unified RTMT does not display a partial running status of a service in Unified CCX. For example, it does not display a service as “running” under "Critical Services" if some of its subsystems are down. The partial status of the Unified CCX services will only be viewable from the **Unified CCX Serviceability Administration** web interface.

Tools

Unified RTMT provides various tools to monitor and troubleshoot system issues. The following section briefly describes these tools.

Alerts

Unified CCX generates alert messages to notify the administrator when a predefined condition is met, such as when an activated service fails to start. The system sends alerts as email or displays alerts as a popup message on RTMT.

RTMT contains preconfigured and user-defined alerts that support alert modifications. Although you can perform configuration tasks for both types, you cannot delete preconfigured alerts (whereas you can add and delete user-defined alerts). Predefined alerts are configured for perfmon counter value thresholds as wells as event (alarms) notifications.

For more information about system alerts and managing alerts, see the “Alerts” topic in the *Cisco Unified Real-Time Monitoring Tool Administration Guide for Cisco Unified Contact Center Express and Cisco Unified IP IVR*, available here:

http://www.cisco.com/en/us/products/sw/voicesw/ps556/prod_maintenance_guides_list.html

Unified CCX Alerts

The following list contains preconfigured Unified CCX alerts:

Table 4:

Alert Name	Description
DB CRA % Space Used	The percentage of used space in the Unified CCX database, db_cra. The database, db_cra, contains the Unified CCX historical and configuration data.
DBReplicationStopped	Unified CCX Database Replication has been removed. This typically happens when the replication queues become full due to the inability to contact the other node.
HistoricalDataWrittenToFiles	Historical data is not written to the Unified CCX database and has been written to the file system. Please verify the state of the Unified CCX database.
Intelligence Center CUIC_DATABASE_UNAVAILABLE	This alert occurs when the Intelligence Center CUIC_DATABASE_UNAVAILABLE event gets generated. This indicates the system detected critical error with database.
Intelligence Center CUIC_DB_REPLICATION_FAILED	This alert occurs when the Intelligence Center CUIC_DB_REPLICATION_FAILED event gets generated. This indicates the Database replication failed.
Intelligence Center CUIC_REPORT_EXECUTION_FAILED	This alert occurs when the Intelligence Center CUIC_DB_REPLICATION_FAILED event gets generated. This indicates that the reporting server could not run a report. This could be because the associated datasource is offline.
Intelligence Center CUIC_UNRECOVERABLE_ERROR	This alert occurs when the Intelligence Center CUIC_UNRECOVERABLE_ERROR event gets generated. This indicates that the system has detected an internal error within Reporting Server which may prevent it from functioning correctly. Restart may be required.
CCXToCUICAdminSyncFailed	This alert occurs when the Unified CCX has failed to notify CUIC on any resource change.
CCXToCUICCVDSyncFailed	This alert occurs when the Unified CCX has failed to notify CUIC on any resource change.

CCXToCUICEngineSyncFailed	This alert occurs when the Unified CCX has failed to notify CUIC on any resource change.
MediasenseStatusDown	One or more Mediasense nodes configured with this CCX are down or unreachable. This will impact CUCM-based call recording and CCX subscriptions to Mediasense for recording events.
PurgeInvoked	This alert occurs when the Unified CCX Auto Purging has completed.
UnifiedCCXEngineMemoryUsageHigh	This alert occurs when the percentage of JVM heap memory used by Cisco Unified CCX Engine process is greater than the configured threshold value.
EMAIL_SERVER_DOWN	This alert occurs when the email server is not reachable.
SocialMinerTomcatServiceDown	This alert occurs when Social Miner Tomcat is not reachable.
SocialMinerXMPPServiceDown	This alert occurs when the Unified CCX has failed to contact Social Miner runtime server (XMPP).

Note To view or edit values for any alert, right click on the alert and select **Set Alert/Properties...**.

Traces and Logs

The trace and log central feature in RTMT allows you to configure on-demand trace collection for a specific date range or an absolute time. You can collect trace files that contain search criteria that you specify and save the trace collection criteria for later use, schedule one recurring trace collection and download the trace files to a SFTP or FTP server on your network, or collect a crash dump file.

After you collect the files, you can view them in the appropriate viewer within the RTMT. You can also view traces on the server without downloading the trace files by using the remote browse feature. You can open the trace files by either selecting the internal viewer that is provided with RTMT or choosing an appropriate program as an external viewer.

For more information about traces and logs, see “Tools for traces, logs, and plug-ins” in *Cisco Unified Real-Time Monitoring Tool Administration Guide for Cisco Unified Contact Center Express and Cisco Unified IP IVR*, available here:

http://www.cisco.com/en/US/partner/products/sw/voicesw/ps556/prod_maintenance_guides_list.html

CUCM Telephony Data Monitoring

Following entities can be monitored using **CUCM Telephony Data** RTMT:

- Triggers
- Call Control Groups
- CTI ports

To access **CUCM Telephony Data**, click **Cisco Unified CCX** tab in RTMT.

Triggers Page

The Triggers page displays the following information for the triggers that are configured for Unified CCX:

Table 5: Triggers Page Options

Counters	Description
TriggerDN	This field displays the directory number that is associated with the trigger.
Trigger State	This field displays the state of the trigger, which can be In Service, Out of Service, or Unknown.
Application Name	This field displays the name of Unified CCX application that is associated with the trigger.
Ready for Call	This field indicates whether the trigger is ready to accept the call.
CallControlGroup ID	This field displays the ID of the call control group that is associated with the trigger.
Media Group ID	This field displays the ID of the media group that is associated with the trigger.
Last State Change Time	This field displays the time of last state change for the trigger.
Recommended Action	This field provides the reason the trigger state is Out of Service or Unknown and provides the recommended action to return the trigger state to In Service. **Note** This field is populated only if the trigger is in Out of Service state or Unknown state.

Call Control Groups page

The Call Control Groups page provides the following information about the current Call Control Group that is configured for Unified CCX:

Table 6: Call Control Groups Page Options

Counters	Description
CallControlGroup ID	This field displays the ID that is associated with the call control group.
Group State	This field displays the state of the call control group, which can be In Service, Partial Service, or Out of Service.
Total Ports	This field displays the total number of CTI ports that are configured for the call control group.
InService Ports	This field displays the number of in-service CTI ports.
OOS Ports	This field displays the number of out-of-service CTI ports.

CTI Ports Page

The CTI Ports page provides the following information about the current CTI ports that are configured for Unified CCX:

Table 7: CTI Ports Page Options

Counters	Description
CTI Port DN	This field displays the directory number of the CTI port.
CallControlGroup ID	This field displays the ID of call control group to which the CTI port belongs.
Port State	This field displays the state of CTI port, which can be In Service or Out of Service.
CallID	This field displays the call ID of the last call that is available on the CTI port before the port state changed to Out of Service. **Note** This field is populated only if the port state is Out of Service.
Last State Change Time	This field displays the last time when the CTI port state changed.

Summary Page

The Summary page provides the following information:

Table 8: Summary Page Options

Counters	Description
Overall Telephony Subsystem State	This field displays the state of the Unified CCX telephony subsystem, which can be In Service, Partial Service, or Out of Service.
Call Control Groups In Service	This field displays the number of call control groups that are in service.
Call Control Groups Out Of Service	This field displays the number of call control groups that are out of service.
Call Control Groups In Partial Service	This field displays the number of call control groups that are in partial service.
Enabled Triggers	This field displays the number of triggers that are associated with valid call control group IDs.
Disabled Triggers	This field displays the number of triggers that are associated with invalid call control group IDs.
Triggers With Config Errors	This field displays the number of triggers with configuration errors.

Note In UCCX system, if we do not configure any Trigger and CTI Ports then CM Telephony displays Out of Service status. Similarly in IPIVR, if we do not configure ICM Subsystem then ICM Subsystem displays Out of Service status.

Cisco Unified Analysis Manager

Use Cisco Unified Analysis Manager, a tool included with the Unified RTMT to perform troubleshooting operations. Unified Analysis Manager also allows you to monitor various aspects of the devices added to the tool. Unified Analysis Manager is used to collect troubleshooting information from your system and analyze the information. It can identify the supported Unified Communications (UC) products and applications that you have in your system and troubleshoot call failures across these UC applications, collecting trace and log files and other platform and configuration information. You can use this information to troubleshoot on your own or send the information to Cisco Technical Assistance for analysis.

Unified Analysis Manager for Unified CCX

To monitor and troubleshoot a Unified CCX-based solution with the help of Unified Analysis Manager, you must connect to a Unified Communications Manager server and then add the Unified CCX nodes accordingly. You can add following nodes/servers for monitoring:

- Unified CCX node
- Call record server

Consider the following points while adding nodes/servers for monitoring:

- To add nodes/servers, ensure that you select **Node Type** as **Unified CCX**.
- To add a call record server, enter **uccxsct** in the **JDBC User Name** field.

  For detailed procedures to perform these actions, see "Cisco Unified Analysis Manager preferences" section in the *Cisco Unified Real-Time Monitoring Tool Administration Guide for Cisco Unified Contact Center Express and Cisco Unified IP IVR*, available here:

  http://www.cisco.com/en/us/products/sw/voicesw/ps556/prod_maintenance_guides_list.html

CHAPTER 3

Backup and Restore

Cisco Disaster Recovery System (Cisco DRS), which you can access from Cisco Unified Contact Center Express Administration, provides complete data backup-and-restore capabilities for all servers in a Cisco Unified Contact Center Express (Unified CCX) cluster. Cisco DRS allows you to perform regularly scheduled automatic or user-invoked data backups and to restore data in the case of a system failure.

To access Cisco DRS, choose **Disaster Recovery System** from the navigation drop-down list box in the upper-right corner of the **Cisco Unified CCX Administration** window. Log in to the Disaster Recovery System using platform administrator credentials.

Cisco DRS will back up and restore the following components:

- Cluster configurations and applications profile in the data repository
- Workflow scripts that are already uploaded in the data repository
- Platform
- Databases (such as db_cra, db_cra_repository, and FCRasSvr database)
- Configuration data (such as open LDAP and flat files)
- Recording files
- JTAPI configuration (jtapi.ini)
- Trace Collection Tool (TCT)
- User prompts, grammars, and documents
- CUIC_CONFIG configuration (such as configuration property files, security configuration, and Unified Intelligence Center Tomcat `server.xml`)
- Finesse components
- Socket.IO Server Configuration Files

In the case of high availability (HA), Cisco DRS performs a cluster-level backup, which means that it collects backups for all servers in a Unified CCX cluster to a central location and archives the backup data to a remote SFTP server.

DRS will back up and restore its own settings, that is, backup device settings (saved in file `drfDevice.xml`) and schedule settings (saved in file `drfSchedule.xml`) as part of the platform component. Once a server is restored with these files, you do not need to reconfigure DRS backup device and schedule settings.

Note Cisco DRS uses SSL-based communication between the Master Agent and the Local Agent for authentication and encryption of data between the Unified CCX publisher and subscriber nodes. Cisco DRS makes use of the IPSec certificates for its Public/Private Key encryption. Be aware that if you delete the IPSec truststore (`hostname.pem`) file from the Certificate Management pages, then Cisco DRS will not work as expected. If you delete the IPSec-trust file manually, then you must ensure that you upload the IPSec certificate to the IPSec-trust. For more details, see the certificate management help pages in the *Cisco Unified Communications Manager Security Guide* available here:

http://www.cisco.com/en/US/products/sw/voicesw/ps556/prod_maintenance_guides_list.html

- Important Considerations, page 30
- SFTP Requirements, page 31
- Master and Local Agents, page 31
- Backup Tasks, page 32
- Restore Scenarios, page 34
- Trace Files, page 39
- Command Line Interface, page 39
- Alarms, page 40

Important Considerations

Following are the important considerations when you perform backup and restore procedures:

- Before you run a backup or a restore, make sure that both nodes in a cluster are running the same version of Unified CCX . If different nodes are running different versions of Unified CCX, you will have a certificate mismatch and your backup or restore will fail.
- Before you restore Unified CCX, make sure that the hostname, IP address, DNS configuration, version, and deployment type matches the hostname, IP address, DNS configuration, version, and deployment type of the backup file that you want to restore.
- Before you restore Unified CCX, ensure that the Unified CCX version that is installed on the server matches the version of the backup file that you want to restore. Cisco DRS supports restore only for matching versions of Unified CCX. For example, Cisco DRS does not allow you to restore from Version 8.5(1).1000-1 to Version 9.0(1).1000-1, or from Version 8.5(2).1000-1 to Version 9.0(1).1000-2.
- Schedule backups during off-peak hours to avoid call-processing interruptions and impact to service.
- After you use the recovery disk to bring a server with a corrupted file system into a bootable and semi-functional state, rebuild the server.

  Note If you do not rebuild the server, you may notice missing directories, lost permissions, or corrupted soft links.

SFTP Requirements

To back up data to a remote device on the network, you must have an SFTP server that is configured and accessible from the Unified CCX node to run the backup. Cisco allows you to use any SFTP server products that have been certified with Cisco through the Interoperability Verification Testing (IVT) process. Cisco Developer Network (CDN) partners, such as GlobalSCAPE, certify their products with a specified version of Unified CCX. For information about which vendors have certified their products with your version of Unified CCX, see the following URL:

https://marketplace.cisco.com/catalog

For information on using GlobalSCAPE with supported Cisco Unified Communications versions, refer to the following URL:

http://www.globalscape.com/gsftps/cisco.aspx

Cisco uses the following servers for internal testing. You may use one of the servers, but you must contact the vendor for support:

- Open SSH (see http://sshwindows.sourceforge.net/)
- Cygwin (see http://www.cygwin.com/)
- Titan (see http://www.titanftp.com/)

Cisco does not support use of the SFTP product freeFTPD, because it has a 1-GB file-size limit.

Note

- For issues with third-party products that have not been certified through the IVT process, contact the third-party vendor for support.
- While a backup or restore is running, you cannot perform any Operating System (OS) Administration tasks because Cisco DRS blocks all OS Administration requests. However, you can use CLI commands to back up or restore the system.

Master and Local Agents

The system automatically starts the Master Agent service on each node of the cluster, but it is functional only on the first node. Both servers in a Unified CCX cluster must have Local Agent running to perform the backup and restore functions.

Note By default, a Local Agent automatically gets activated on each node of the cluster.

Master Agent Duties

The Master Agent (MA) performs the following duties:

- Stores system-wide component registration information.
- Maintains a complete set of scheduled tasks in an XML file. The MA updates this file when it receives updates of schedules from the user interface. The MA sends executable tasks to the applicable Local Agents, as scheduled. Local Agents execute immediate-backup tasks without delay.
- Lets you perform activities such as configuring backup devices, scheduling backups by adding new backup schedules, viewing or updating an existing schedule, displaying status of executed schedules, and performing system restoration.
- Stores backup data on a remote network location.

Local Agent Duties

In a Unified CCX cluster, the Local Agent runs backup and restore scripts on each node in the cluster.

Note Cisco DRS uses an SSL-based communication between the Master Agent and the Local Agent for authentication and encryption of data between the Unified CCX publisher and subscriber nodes. Cisco DRS uses IPSec certificates for its Public/Private Key encryption. This certificate exchange is handled internally; you do not need to make any configuration changes to accommodate this exchange.

Backup Tasks

You can perform the following backup tasks using Cisco DRS:

- Manage backup devices
- Create backup schedules
- Manage backup schedules
- Estimate size of backup tar file
- Perform manual backup
- Check backup status
- View history of last 20 backups

Manage Backup Devices

Before using Cisco DRS, you must configure the locations where the backup files will be stored. You can configure up to ten backup devices. Perform the following steps to configure backup devices.

Procedure

Step 1 On **Disaster Recovery System** page, choose **Backup** > **Backup Device**.

Step 2 Click appropriate button to add a new device or to edit settings of an existing backup device.

Step 3 Enter the backup device name and choose the backup device type.

Note You cannot delete a backup device that is configured as the backup device in a backup schedule.

Manage Backup Schedules

You can create up to ten backup schedules. Each backup schedule has its own set of properties, including a schedule for automatic backups, and a storage location.

Caution Schedule backups during off-peak hours to avoid call-processing interruptions and impact to service.

Procedure

Step 1 On the **Disaster Recovery System** page, choose **Backup** > **Scheduler**.

Step 2 Click the appropriate button to add a new schedule or to edit settings of an existing backup schedule.

Step 3 Fill out the form and enable the backup schedule.

Note
- If you plan to schedule a backup on a two-node deployment, ensure that both the servers in the cluster are running the same version of Unified CCX and are communicating in the network. Servers that are not communicating at the time of the scheduled backup will not be backed up.
- Do not schedule a backup to run while the **Update Database Statistics** task is running. By default, this task is set to run daily at 2:00 a.m.

Perform Manual Backup

Procedure

Step 1 On the **Disaster Recovery System** page, choose **Backup** > **Manual Backup**.

Step 2 Select a backup device and start the backup.

Step 3 Click **Estimate Size** to get the approximate size of the disk space that the backup file will consume on the SFTP server.
To perform backup tasks on virtual machines, see *Unified Communications VMware Requirements* docwiki, available here:

http://docwiki.cisco.com/wiki/Unified_Communications_VMWare_Requirements#Copy_Virtual_Machine

Check Backup Status

On the **Disaster Recovery System** page, choose **Backup** > **Current Status** to check the backup status.

Caution Be aware that if the backup to the remote server is not completed within 20 hours, the backup session will time out. You will then need to begin a fresh backup.

Restore Scenarios

You can choose to restore any node in the cluster.

Note

- Do not attempt a restore when there is a version mismatch between the Unified CCX nodes.
- If no backup is available, you may not be able to run the restore activity on any of the nodes through Cisco DRS.
- If restore is performed without rebuild, both the nodes have to be restored.
- **One-Step Restore** option is not supported in Unified CCX.

Caution

- Be aware that your backup `.tar` files are encrypted by a randomly generated password. Unified CCX uses the cluster security password to encrypt this password and save it along with the backup `.tar` files. If you change this security password between the backup and restore, Cisco DRS will prompt you for the old security password. Therefore, to use old backups, remember the old security password or perform a fresh backup immediately after you reset or change the password.
- Cisco DRS supports only matching versions of Unified CCX for restore. For example, Cisco DRS does not allow a restore from version 8.5(1).1000-1 to Version 9.0(1).1000-1, or from Version 8.5(1).1000-2 to Version 9.0(1).1000-1. (The last parts of the version number change when you install a service release or an engineering special.) The product versions need to match, end-to-end, for Cisco DRS to run a successful Unified CCX database restore.
- After you restore a node, reboot the node, and then perform the Data Resync manually by logging in to the web interface of **Cisco Unified CCX Administration**.
- The backup process does not back up the passwords that you set for Wallboard and Recording SFTP external database users. After data is restored, passwords revert to the original default value. If you set passwords for external database users, you must manually reset them from the **Password Management** window.

Restore SA or HA Setup (Without Rebuild)

Perform this procedure if you are restoring an SA or HA setup of Unified CCX to the last known good configuration, without reinstalling Unified CCX on any of the nodes. Do not perform this procedure after a hard drive failure or other hardware failure.

Note Before you restore a cluster, make sure that the second node in the cluster is functional and is communicating with the first node. Run the CLI command **utils network connectivity** to know if second node is communicating with the first node.

You must carry out a fresh installation for the second node if it is not functional or if it is not communicating with the first node at the time of the restore.

Caution You should not perform the restore activity of a SA backup in a HA setup; otherwise the cluster will break and the second node will be an orphan.

Procedure

Step 1 In the **Disaster Recovery System** page, choose **Restore** > **Restore Wizard**.
Follow the on-screen instructions in the wizard to complete the restore process. You can select a single node or both nodes while performing restore.

Note Restoring the node restores the entireUnified CCX database. This may take up to several hours based on the size of database that is being restored.

Step 2 Restart the SA server or the HA cluster when the restore is successful and the status shows 100 per cent.
For more information on restarting, see *Cisco Unified Operating System Administration Guide* available here: http://www.cisco.com/en/US/products/sw/custcosw/ps1846/prod_maintenance_guides_list.html.

Step 3 After you restart the SA server or HA cluster, perform the data resync by choosing **Subsystems** > **Cisco Unified CM Telephony** > **Data Resync** from **Cisco Unified CCX Administration** web interface.

Restore SA Setup (with Rebuild)

You can restore a SA setup (with rebuild) in the following cases:

- The hard drive fails, and you have a valid backup that was taken before the hard drive failure.
- The server hardware is to be replaced. Take a backup of Unified CCX when it is running in the old server hardware that is to be replaced. Note the backup device details before you shut down the Unified CCX setup.
- To correct a virtual machine with unaligned partitions, you will need to perform a manual backup first and follow the procedure by performing a fresh installation using the latest OVF Template from Unified Contact Center Express Virtual Machine Templates

Tip If you are performing any other type of hardware upgrades, such as replacing a network card or adding memory, you do not need to perform the following procedure.

Procedure

Step 1 Perform a fresh installation of the same version of Unified CCX (using the same administrator credentials, network configuration, and security password that you used earlier) on the node before you restore it.

Step 2 In the **Disaster Recovery System** page, choose **Restore** > **Restore Wizard**.
Follow the on-screen instructions in the wizard to complete the restore process.

Note
- There is no need to perform initial configuration in the **Unified CCX Administration** page for any restore with rebuild scenarios.
- To view the current license package, go to **System > Licensing > Display License**.

Step 3 Restart the server when the restore is successful and perform data resync manually using **Unified CCX Administration** page.

Note
- Apply the same license type on node the backup was taken to restore.
- If the License MAC has changed during the rebuild, the UCCX license will need to be rehosted. When applying the new license after the restore process has completed, apply a rehosted license with the same package (Standard, Enhanced, Premium, IP IVR) as the license contained within the backup that was restored.

For more information on the license rehosting mechanism, see the *Cisco Unified Contact Center Express Install and Upgrade Guide*, available here: http://www.cisco.com/en/US/products/sw/custcosw/ps1846/prod_installation_guides_list.html.

Restore Only First Node in HA Setup (with Rebuild)

In a High Availability (HA) setup, if there is a hard-drive failure or any other critical hardware or software failure which needs rebuild of the first node, then perform the following procedure to recover the publisher node to the last backed up state of the publisher.

Procedure

Step 1 Perform a fresh installation of the same version of Unified CCX (using the same administrator credentials, network configuration, and security password that you used earlier) on the node before you restore it.

Step 2 Navigate to Cisco Unified Contact Center Express Administration, select **Disaster Recovery System** from the Navigation drop-down list box in the upper-right corner of the Cisco Unified CCX Administration window, and click **Go**.
The Disaster Recovery System Logon window displays.

Note To view the current license package, go to **System > Licensing > Display License**.

Step 3 After the restore process is successful, run the following CLI command from the second node.

```
utils uccx setuppubrestore
```

Step 4 Run the following CLI command on the target node; that is, if you want to retrieve the publisher node's data, then run this command on the subscriber node, but if you want to retrieve the subscriber node's data (which is more up-to-date), then run this command on the publisher node.

```
utils uccx database forcedatasync
```

Step 5 Restart both the nodes and run the following CLI command on the Publisher node to set up replication:

```
utils uccx dbreplication reset
```

Step 6 To set up replication for the Cisco Finesse database:

a) Run the following CLI command on the Subscriber node:

```
utils dbreplication stop
```

b) Run the following CLI command on the Publisher node:

```
utils dbreplication reset all
```

Caution

- Apply the same license type on node the backup was taken to restore.
- If the License MAC has changed during the rebuild, the UCCX license will need to be rehosted. When applying the new license after the restore process has completed, apply a rehosted license with the same package (Standard, Enhanced, Premium, IP IVR) as the license contained within the backup that was restored.

For more information on the licensing rehosting mechanism, see *Cisco Unified Contact Center Express Install and Upgrade Guide* available here: http://www.cisco.com/en/US/products/sw/custcosw/ps1846/prod_installation_guides_list.html.

Restore Second Node in HA Setup (with Rebuild)

Caution In case the second node crashes and there is no backup available, you may not be able to restore anything. However, to recover the second node, delete the second node from the first node, add the second node details again, and then rebuild the second node. The recording and monitoring data which was present in the server cannot be recovered since there is no backup.

In a high availability (HA) setup, if there is a hard-drive failure or any other critical hardware or software failure which needs rebuild of the second node, then perform the following procedure to recover the second node to the last backed up state of the second node.

Procedure

Step 1 Perform a fresh installation of the same version of Unified CCX (using the same administrator credentials, network configuration, and security password that you used earlier) on the node before you restore it.

Step 2 In the **Disaster Recovery System** web interface, choose **Restore** > **Restore Wizard**.
Follow the on-screen instructions in the wizard to complete the restore process.

Note When you are prompted to choose the nodes to restore, choose only the second node.

Step 3 Restart the server when the restore status is 100 per cent.
For more information on restarting, see *Cisco Unified Operating System Administration Guide* available here: http://www.cisco.com/en/US/products/sw/custcosw/ps1846/prod_maintenance_guides_list.html.

Restore Both Nodes in HA Setup (with Rebuild)

In a High Availability (HA) setup, if a major hard drive failure occurs on both the nodes in the cluster, or in the event of a hard drive migration or replacement, you may need to rebuild both the nodes.

- In case of a hard drive failure if you have taken a valid backup before the failure, follow this procedure to restore both the nodes, starting with the first node.
- In case of server hardware replacement, take a backup of Unified CCX when running in the old server hardware that is to be replaced. Note the backup device details before you bring down the Unified CCX setup. Follow this procedure to bring up a new server.
- To correct a virtual machine with unaligned partitions, you need to perform a manual backup first and follow the procedure by performing a fresh installation using the latest OVF Template from Unified Contact Center Express Virtual Machine Templates to restore both the nodes, starting with the first node.

Caution Set up a new cluster if you do not have a valid backup for the first node.

Procedure

Step 1 Rebuild the first node by performing a fresh installation of the same version of Cisco Unified Contact Center Express (using the same administrator credentials, network configuration and security password being used before the failure).
For more information on installing Cisco Unified Contact Center Express, see *Cisco Unified Contact Center Express Install and Upgrade Guide* available here: http://www.cisco.com/en/US/products/sw/custcosw/ps1846/prod_installation_guides_list.html.

Step 2 Restore only the first node by following the procedure in Restore Only First Node in HA Setup (with Rebuild), on page 36.
Note To view the current license package, go to **System > Licensing > Display License**.

Step 3 Restart the first node.
For more information on restarting, see the *Cisco Unified Operating System Administration Guide* available here: http://www.cisco.com/en/US/products/sw/custcosw/ps1846/prod_maintenance_guides_list.html.

Caution

- Apply the same license type on node the backup was taken to restore and should be applied for first node only.
- If the License MAC has changed during the rebuild, the UCCX license will need to be rehosted. When applying the new license after the restore process has completed, apply a rehosted license with the same package (Standard, Enhanced, Premium, IP IVR) as the license contained within the backup that was restored. For more information on the licensing rehosting mechanism, see the Installing Cisco Unified Contact Center Express available here: http://www.cisco.com/en/US/products/sw/custcosw/ps1846/prod_installation_guides_list.html.

Step 4 Rebuild the second node by performing a fresh installation of the same version of Cisco Unified Contact Center Express (using the same administrator credentials, network configuration and security password being used before the failure).

Step 5 Restore only the second node by following the procedure in Restore Second Node in HA Setup (with Rebuild), on page 37.

Step 6 Restart the second node. Your data is restored on both the nodes of the cluster.

Trace Files

The trace files for the Master Agent, the user interface, each Local Agent, and the JSch (Java Secure Channel) library are found in the following locations:

- For the Master Agent, find the trace file at platform/drf/trace/drMA0*
- For each Local Agent, find the trace file at platform/drf/trace/drfLA0*
- For the user interface, find the trace file at platform/drf/trace/drfConfLib0*
- For the JSch, find the trace file at platforms/drf/trace/drfJSch*

You can view trace files by using the command line interface. For more information, see Command Line Interface, on page 39.

Command Line Interface

Cisco DRS also provides command-line access to few backup and restore tasks, as listed in the following table:

Table 9: Disaster Recovery System Command Line Interface Commands

Command	Description
utils disaster_recovery backup	Starts a manual backup by using the feature that is configured in the Cisco DRS interface
utils disaster_recovery restore	Starts a restore and requires parameters for backup location, filename, feature, and nodes to restore

Command	Description
utils disaster_recovery status	Displays the status of ongoing backup or restore job
utils disaster_recovery history	Displays the history of previous backup and restore operations
utils disaster_recovery show_backupfiles	Displays existing backup files
utils disaster_recovery cancel_backup	Cancels an ongoing backup job
utils disaster_recovery show_registration	Displays the currently configured registration
utils disaster_recovery show_tapeid	Displays the tape identification information
utils disaster_recovery device add	Adds the network or tape device
utils disaster_recovery device delete	Deletes the device
utils disaster_recovery device list	Lists all the devices
utils disaster_recovery schedule add	Adds a schedule
utils disaster_recovery schedule delete	Deletes a schedule
utils disaster_recovery schedule disable	Disables a schedule
utils disaster_recovery schedule enable	Enables a schedule
utils disaster_recovery schedule list	Lists all the schedules

Alarms

Cisco DRS (DRF) displays alarms for errors that can occur during a backup or restore procedure. The Cisco DRS alarms can be found detailed in the *Disaster Recovery System Administration Guide for Cisco Unified Communications Manager and IM & Presence Service* at http://www.cisco.com/c/en/us/support/unified-communications/unified-communications-manager-callmanager/products-maintenance-guides-list.html.

Table 10: Disaster Recovery System Alarms

Alarm Name	Description
DRFBackupDeviceError	Cisco DRS backup process encountered errors while it was accessing the device.
DRFBackupFailure	Cisco DRS backup process encountered errors.

Alarm Name	Description
DRFBackupInProgress	Cisco DRS cannot start new backup while another backup is still running.
DRFInternalProcessFailure	Cisco DRS internal process encountered an error.
DRFLA2MAFailure	Cisco DRS Local Agent cannot connect to Master Agent.
DRFLocalAgentStartFailure	Cisco DRS Local Agent might be down.
DRFMA2LAFailure	Cisco DRS Master Agent cannot connect to Local Agent.
DRFMABackupComponentFailure	Cisco DRS requested that a component back up its data; however, an error occurred during the backup process, and the backup of the component failed.
DRFMABackupNodeDisconnect	While the Cisco DRS Master Agent was running a backup operation on a Unified CCX node, the node disconnected before the backup operation completed.
DRFMARestoreComponentFailure	Cisco DRS requested that a component restore its data; however, an error occurred during the restore process, and the component was not restored.
DRFMARestoreNodeDisconnect	While the Cisco DRS Master Agent was running a restore operation on a Unified CCX node, the node disconnected before the restore operation completed.
DRFMasterAgentStartFailure	Cisco DRS Master Agent might be down.
DRFNoRegisteredComponent	Cisco DRS backup failed because no registered components are available.
DRFNoRegisteredFeature	No feature was selected for backup.
DRFRestoreDeviceError	Cisco DRS restore process cannot read from device.
DRFRestoreFailure	Cisco DRS restore process encountered errors.
DRFSftpFailure	Errors exist in Cisco DRS SFTP operation.
DRFSecurityViolation	The DRF Network Message contains a malicious pattern that could result in a security violation like code injection or directory traversal. DRF Network Message has been blocked.
DRFTruststoreMissing	The IPsec truststore is missing on the node. DRF Local Agent cannot connect to Master Agent.
DRFUnknownClient	The DRF Master Agent on the first node received a client connection request from an unknown server outside the cluster. The request was rejected.
DRFLocalDeviceError	DRF is unable to access local device.

Alarm Name	Description
DRFBackupCompleted	DRF backed up successfully.
DRFRestoreCompleted	DRF restored successfully.
DRFNoBackupTaken	DRF did not find a valid backup of the current system after an upgrade or migration or fresh install.

APPENDIX A

Command Line Interface

Unified CCX provides a command line interface as an alternative to the web administration page to configure and troubleshoot the system.

- Command Line Interface Basics, page 43
- Show commands, page 46
- Set Commands, page 64
- run Commands, page 71
- Utils Commands, page 73
- File Commands, page 90
- High Availability Commands, page 94
- Cisco Finesse Commands, page 103
- Cisco Unified Intelligence Center Commands, page 104

Command Line Interface Basics

Start CLI Session

Access the Cisco Unified Contact Center Express (Unified CCX) Command Line Interface (CLI) either remotely or locally using one of these two methods:

- From an SSH-enabled client workstation, use SSH to connect securely to the Unified CCX.
- Access the Unified CCX CLI directly or by using a terminal server that is connected to the serial port. Use this method if a problem exists with the IP address.

Perform the following steps to start a CLI session:

Procedure

Step 1 Perform one of the following tasks:

- From a remote system, use SSH to connect securely to the Cisco CCX Platform. In your SSH client, enter

  ssh adminname@hostname

  where *adminname* specifies the administrator ID and *hostname* specifies the hostname that was entered during installation.

  For example, **ssh admin@ccx-1**.

- From a direct connection, you receive this prompt automatically:

  ```
  ccx-1 login:
  ```

  where **ccx-1** represents the hostname of the system.

  Enter your administrator ID.

In either case, the system prompts you for a password.

Step 2 Enter password.
The CLI prompt displays. The prompt represents the administrator ID, for example:

```
admin:
```

Get Help with Commands

You can get two kinds of help for any command:

- Detailed help that includes a definition of the command and an example of its use.
- Short query help that includes only command syntax.

To get detailed help, at the CLI prompt, enter

help *command*

where *command* specifies the command name or the command and parameter.

Detailed Help Example:

```
admin:help file list activelog activelog help: This will list active
logging files options are: page - pause output detail - show detailed
listing reverse - reverse sort order date - sort by date size - sort by
size file-spec can contain '*' as wildcards
```

```
admin:file list activelog platform detail 02 Dec,2004 12:00:59 <dir> drf
 02 Dec,2004 12:00:59 <dir> log 16 Nov,2004 21:45:43 8,557 enGui.log 27
Oct,2004 11:54:33 47,916 startup.log dir count = 2, file count = 2
```

Note If you enter the **help** *command* without specifying the name of a particular command as the optional parameter, the system provides information about the CLI system.

To query only command syntax, at the CLI prompt, enter

command **?**

where *command* represents the command name or the command and parameter.

Query Example

```
admin:file list activelog?Syntax: file list activelog file-spec [options]
 file-spec mandatory file to view options optional
page|detail|reverse|[date|size]
```

Note If you enter a **?** after a menu command, such as **set**, it acts like the **Tab** key and lists the commands that are available.

Exit Command with Ctrl-C Key Sequence

You can stop most interactive commands by entering the **Ctrl-C** key sequence.

```
admin:utils system upgrade initiate Warning: Do not close this window
without first exiting the upgrade command. Source: 1) Remote Filesystem
2) DVD/CD q) quit Please select an option (1 - 2 or "q"): Exiting upgrade
 command. Please wait... Control-C pressed admin:
```

Note If you execute the command **utils system switch-version** and enter **Yes** to start the process, entering **Ctrl-C** exits the command but does not stop the switch-version process.

End CLI Session

To end the CLI session, enter **quit** at the CLI prompt.

If you are logged in remotely, you get logged off, and the SSH session is terminated. If you are logged in locally, you get logged off, and the login prompt appears.

Additional CLI Commands

Besides the commands available on Unified CCX , more commands are available that can be executed as a part of Unified Communications Operating System. For detailed information about all the CLI commands available for the Cisco Unified Communications Operating System, see the *Command Line Interface Reference Guide for Cisco Unified Communications Solutions* available here:

http://www.cisco.com/en/US/products/sw/voicesw/ps556/prod_maintenance_guides_list.html

The following Unified Communications Operating System commands are **not applicable** to Unified CCX :

- delete dscp
- file delete license
- file get license
- file list license
- file view license
- set cert bulk
- set dscp
- set network cluster publisher
- set network dhcp
- set network ipv6 dhcp
- set network ipv6 service
- set network ipv6 static_address
- show ctl
- show dscp
- show itl
- show network ipv6 settings
- show tech ccm_service
- run loadxml
- utils sso unavailable

Show commands

show uccx version

This command displays the Unified CCX versions on the active partition and the inactive partition. The inactive version is displayed only if the inactive partition is available.

Command syntax

show uccx version

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx version
Active UCCX Version: 10.5.0.95000-152
Inactive UCCX Version: NA
Command successful.
```

show uccx jtapi_client version

This command displays the JTAPI client version that the Unified CCX is using on the active and the inactive partitions. The inactive version is displayed only if the inactive partition is available.

Command syntax

show uccx jtapi_client version

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx jtapi_client version
Active:Cisco JTAPI version 9.0(0.96000)-4 Release
Inactive: NA
Command successful.
```

show uccx components

This command displays the various components in Unified CCX for which tracing can be turned on or off from CLI commands. This command is useful when you need the list of components to modify the trace settings of Unified CCX.

Command syntax

show uccx components

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx components
Various UCCX components are as follows -

 UCCXEngine
 UCCXCVD
 UCCXEditor
 JTAPI_CLIENT
 UCCXAppAdmin
```

show uccx subcomponents

This command displays the various subcomponents in specific Unified CCX component. This command is useful when you need the list of subcomponents to modify the trace settings of Unified CCX.

Command syntax

show uccx subcomponents *component* [options]

Options

- **component—**(Mandatory) Component such as UCCXEngine or UCCXEditor. For example, some of the UCCX subcomponents for 'UCCX_ENGINE' component are:
  - APP_MGR
  - ARCHIVE_MGR
  - BOOTSTRAP_MGR
  - CFG_MGR
  - CHANNEL_MGR and so on
- **page—**Displays the output one page at a time

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx subcomponents uccxengine
```

show uccx license

This command displays various licenses that are configured for Unified CCX and the features which have been activated. This command works only if the Unified CCX Cluster View Daemon (CVD) is running.

Note This command does not display license-expiry information. For more information about viewing licenses, see the *Cisco Unified Contact Center Express Administration Guide*.

Command syntax

show uccx license

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx license
Configured Licenses:

Package: Cisco Unified CCX Premium
IVR Port(s): 300
Cisco Unified CCX Premium Seat(s): 300
High Availability : Enabled
Cisco Unified CCX Preview Outbound Dialer: Enabled
Cisco Unified CCX Quality Manager Seat(s): 300
Cisco Unified CCX Advanced Quality Manager Seat(s): 300
Cisco Unified CCX Workforce Manager Seat(s): 300
Cisco Unified CCX Compliance Recording Seat(s): 300
Cisco Unified CCX Maximum Agents: 400
Cisco Unified CCX Licensed Outbound IVR Port(s): 150
Cisco Unified CCX Licensed Outbound Agent Seat(s): 150
For dynamic content like the Inbound ports In Use and Outbound IVR
Ports/Agent Seats In Use please check using the Cisco Unified CCX
Administration.

Command successful.
```

show uccx trace levels

This command displays the names and trace levels of the various Unified CCX components and subcomponents. If the optional component is specified, then the trace settings of all the subcomponents of the specified component are displayed. If both the optional component and subcomponent are specified, then the trace settings of the specified subcomponent of the specified component are displayed.

Command syntax

show uccx trace levels [options]

Options

- **Component—**Displays the trace levels of all the subcomponents of this component
- **Sub-component—**Displays the trace levels of this subcomponent for the specified component. The trace levels can be displayed only if the component was specified
- **page—**Displays the output one page at a time
- **file—**Stores the output to a file instead of showing it on the console. The name of the file is displayed after the completion of the command

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx trace levels UCCXEngine SS_HTTP
 Trace settings for component 'UCCX_ENGINE' and module 'SS_HTTP' are
  ALARM = true
```

```
  DEBUGGING = false
  XDEBUGGING1 = false
  XDEBUGGING2 = false
  XDEBUGGING3 = false
  XDEBUGGING4 = false
  XDEBUGGING5 = false

 Command successful.
```

show uccx provider ip axl

This command shows the Unified CCX AXL provider IP address.

Command syntax

show uccx provider ip axl

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin: show uccx provider ip axl
Cisco Unified Communications Manager IP is 10.78.14.140

Command Successful.
```

show uccx provider ip jtapi

This command shows the Unified CCX JTAPI provider IP address.

Command syntax

show uccx provider ip jtapi

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin: show uccx provider ip jtapi
UCCX JTAPI Provider is 10.78.14.140

Command Successful.
```

show uccx provider ip rmcm

This command shows the Unified CCX Resource Manager-Contact Manager provider IP address.

Command syntax

show uccx provider ip rmcm

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin: show uccx provider ip rmcm
UCCX RMCM Provider is 10.78.14.140

Command Successful.
```

show uccx trace file size

This command shows the trace file size for the specified component.

Command syntax

show uccx trace file size *[component]*

Options

component—(Mandatory) Component such as UCCXEngine or UCCXEditor

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: Yes

Example

```
admin: show uccx trace file size UCCXEngine
Trace file size for UCCXEngine is 3000000 bytes.

Command Successful.
```

show uccx trace file count

This commands shows the trace file count for the specified component, which is the maximum number of trace files. The new file overwrites the older files.

Command syntax

show uccx trace file count [component]

Options

component—(Mandatory) Component such as UCCXEngine or UCCXEditor

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: Yes

Example

```
admin: show uccx trace file count UCCXEngine
Trace file count for UCCXEngine is 300.

Command Successful.
```

show uccx tech dbserver all

This command runs the commands **show uccx tech dbserver log diagnostic** and **show uccx tech dbserver status** in succession and stores the output of the commands in a file.

Command syntax

show uccx tech dbserver all

Note The name of the file containing the output from each **show uccx tech** command run is automatically generated by the command script. The file path and filename are displayed after the completion of the operation.

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx tech dbserver all
This operation may take a few minutes to complete. Please wait...

Output is in file: uccx/cli/DbServerAll_1250664874580.txt

Command successful.
```

show uccx tech dbserver log diagnostic

This command checks for the existence of Informix assertion failure and shared memory dump logs. If logs exist, the name and path of the log files are displayed.

Command syntax

show uccx tech dbserver log diagnostic [options]

Options

page—Displays the output one page at a time

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx tech dbserver log diagnostic
This operation may take a few minutes to complete. Please wait...

The following diagnostic logs are available for the UC database server.
 core/log.txt
 core/gskit.log

 Command successful.
```

show uccx tech dbserver status

This command outputs a detailed status report of the Unified CCX database server (IDS engine) instance, that is **onstat -a** to a txt file.

Command syntax

show uccx tech dbserver status

Note The name of the file is automatically generated by the command script. The file path and filename are displayed after the completion of the operation.

Requirements

Level privilege—0

Command privilege level—0

Allowed during upgrade—Yes

Example

```
admin:show  uccx tech dbserver status
This operation may take a few minutes to complete. Please wait...

 Output is in file: uccx/cli/DbServerStatus_1250666138379.txt

 Command successful.
```

show uccx dbcontents

This command dumps the contents of the specified database. This command can be used to recreate a customer database on a test system for troubleshooting. For each Unified CCX database table, a dump csv file is created. Because there are huge numbers of files, these files are created in a subdirectory which will have the name as DbContents_<TIMESTAMP>. After the completion of the command, the subdirectory name and subdirectory path are displayed.

Command syntax

show uccx dbcontents database_name

Arguments

database_name—(Mandatory) Database whose contents will be output to CSV file

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:show uccx dbcontents db_cra
 This operation may take a few minutes to complete. Please wait...
 Database contents dump is in directory: uccx/cli/DbContents_1250666234370


 Command successful.
```

show uccx dbtable schema

This command displays the column names of the specified table.

Command syntax

show uccx dbtable schema database_name table_name [options]

Arguments

database_name—(Mandatory) Name of the database (db_cra, db_cra_repository etc.,) in which the table resides

table_name—(Mandatory) Name of the table

Options

page—Displays the output one page at a time

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx dbtable schema db_cra_repository documentsfiletbl
List of columns in table 'documentsfiletbl' in database 'db_cra_repository'
 is -
filename (nvarchar)
parentfolderid (nvarchar)
payload (blob)
lastmodifystamp (datetime year to fraction(3))
lastmodifyuser (nvarchar)
length (int)
checksum (int)

Command successful.
```

show uccx dbschema

This command outputs the schema for all the tables, views, and stored procedures in the specified database to a text file. The output consists of SQL statements that are necessary to replicate a specified database. The IDS “dbschema” utility is used to create the file. This command only displays the DB schema; it does not provide any data in the tables.

Command syntax

show uccx dbschema database_name

Arguments

database_name—(Mandatory) Name of the database whose schema will be output

Note The name of the file containing the schema is automatically generated by the command script. The file path and filename are displayed after the completion of the operation.

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx dbschema db_cra
Output is in file: uccx/cli/schema_db_cra_080212-110543.txt
```

show uccx dbtable list

This command displays the names of all the tables contained in the specified Unified CCX IDS database. The database names can be db_cra, db_cra_repository, FCRasSvr, sysmaster.

Command syntax

show uccx dbtable list database_name [options]

Arguments

database_name—(Mandatory) Database name where tables reside

Options

page—Displays the output one page at a time

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx dbtable list
db_craList of tables in database 'db_cra' is -
 agentconnectiondetail
 agentroutingsetting
 agentstatedetail
 application
 areacode
 campaign
 campaigncsqmap
 configlog
 configschema
 configschemacolumn
 configseed
...
...
teamcsqmapping
 workflowtask
 Command successful.
```

show uccx dbserver disk

This command displays information for each storage space (chunks and dbspaces).

Command syntax

show uccx dbserver disk [options]

Options

page—Displays the output one page at a time

file—Outputs the information to a .txt file. The filename is generated dynamically at runtime and the filename and path are displayed to user after the completion of the operation.

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx dbserver disk
SNO. DATABASE NAME      TOTAL SIZE (MB) USED SIZE (MB) FREE SIZE (MB)
PERCENT FREE
---- ------------------ --------------- -------------- --------------
------------
 1    rootdbs                     358.4           66.3          292.1
       81%
 2    log_dbs                     317.4          307.3           10.1
        3%
 3    db_cra                      512.0            8.8          503.2
       98%
 4    db_hist                   13000.0         3651.4         9348.6
       71%
 5    db_cra_repository            10.2            2.9            7.3
       71%
 6    db_frascal                  512.0            2.8          509.2
```

```
       99%
 7    temp_uccx                  1572.9           0.1         1572.7
       99%
 8    uccx_sbspace               3145.7         2988.1          157.6
        5%
 9    uccx_er                     204.8           0.1          204.7
       99%
 10   uccx_ersb                  1572.9         1494.1           78.8
        5%


CHUNK NO. OFFSET TOTAL SIZE (MB) FREE SIZE (MB) FILENAME
--------- ------ --------------- --------------
---------------------------------------------
 1         0               358.4          292.1
/var/opt/cisco/uccx/db/root_uccx_dbs
 2         0               317.4           10.1
/var/opt/cisco/uccx/db/log_dbs
 3         0               512.0          503.2
/var/opt/cisco/uccx/db/db_cra_dbs
 4         0             13000.0         9348.6
/common/var-uccx/dbc/db_hist_dbs
 5         0                10.2            7.3
/var/opt/cisco/uccx/db/db_cra_repository_dbs
 6         0               512.0          509.2
/var/opt/cisco/uccx/db/db_frascal_dbs
 7         0              1572.9         1572.8
/common/var-uccx/dbc/temp_uccx_dbs
 8         0              3145.7          157.6
/var/opt/cisco/uccx/db/uccx_sbspace_dbs
 9         0               204.8          204.7
/common/var-uccx/dbc/uccx_er_dbs
 10        0              1572.9           78.8
/common/var-uccx/dbc/uccx_ersb_dbs
```

show uccx dbserver sessions all

This command displays detailed session and SQL-related information for each database user session. The content of the information displayed is equivalent to running the IDS command **onstat -g ses** for each active session.

Command syntax

show uccx dbserver sessions all [options]

Options

- page—Displays the output one page at a time
- file—Outputs the information to a txt file. The filename is generated dynamically at runtime and the filename and path are displayed to user after the completion of the operation.

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx dbserver sessions all
IBM Informix Dynamic Server Version 10.00.UC5XD   -- On-Line -- Up 58
days 02:26:37 -- 444676 Kbytes

session                                     #RSAM    total      used
    dynamic
id       user     tty      pid      hostname threads  memory     memory
    explain
27       cudbeven -        6750     crslnx   1        151552     75400
    off

tid      name     rstcb    flags    curstk   status
75       sqlexec  52477164 Y--P---  4208     cond wait(netnorm)

Memory pools    count 2
name         class addr     totalsize freesize #allocfrag #freefrag
27           V     5309a020 147456    73704    148        50
27*O0        V     5442f020 4096      2448     1          1

name           free       used           name           free       used
overhead       0          3296           scb            0          96
opentable      0          6456           filetable      0          1088

sqscb info
scb      sqscb    optofc   pdqpriority sqlstats optcompind  directives
52fda4d0 53234018 0        0           0        0           1

Sess  SQL            Current            Iso Lock       SQL  ISAM F.E.
Id    Stmt type      Database           Lvl Mode       ERR  ERR  Vers
Explain
27    -              uccxdirdb         CR  Wait 30    0    0    9.03 Off


Last parsed SQL statement :
  SELECT FIRST 100 *, CAST(Timestamp AS varchar(32)) AS strTimestamp,
    CAST(Object_Id AS varchar(64)) AS strObject_Id FROM
    UccxDb: DbChangeEventQ WHERE EventId > ? ORDER BY EventId ASC
```

show uccx dbserver session

This command displays detailed session and SQL-related information for a specific session, which represents a user connected to the database server. The content of the information displayed is equivalent to running the IDS command **onstat -g ses** for an active session specified by the session-id.

Command syntax

show uccx dbserver session session_id [options]

Arguments

session_id—(Mandatory) The Informix session ID number

Options

page—Displays the output one page at a time

file—Outputs the information to a .txt file. The filename is generated dynamically at runtime and the filename and path are displayed to user after the completion of the operation.

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx dbserver session 58
IBM Informix Dynamic Server Version 11.50.UC4     -- On-Line -- Up 14
days 04:43:40 -- 254160 Kbytes

session           effective                            #RSAM    total
   used       dynamic
id       user     user      tty      pid      hostname threads  memory
   memory     explain
58       uccxuser -         -        -1       sakkumar 1        126976
   107496     off

tid      name     rstcb    flags    curstk   status
93       sqlexec  4b2deca0 Y--P---  5680     cond wait  netnorm   -

Memory pools    count 2
name         class addr     totalsize freesize #allocfrag #freefrag
58           V     4caa9028 122880    17064    332        18
58*O0        V     4c9d0028 4096      2416     1          1

name           free       used           name           free       used
overhead       0          3360           scb            0          96
opentable      0          8344           filetable      0          1104
ru             0          464            log            0          16512
temprec        0          21600          keys           0          1392
ralloc         0          5120           gentcb         0          1240
ostcb          0          2600           sqscb          0          29384
sql            0          40             rdahead        0          848
hashfiletab    0          280            osenv          0          1552
sqtcb          0          7464           fragman        0          368
GenPg          0          592            udr            0          5136

sqscb info
scb      sqscb    optofc   pdqpriority sqlstats optcompind  directives
4c907018 4cc92018 1        0           0        2           1

Sess       SQL            Current            Iso Lock       SQL  ISAM
F.E.
Id         Stmt type      Database           Lvl Mode       ERR  ERR
Vers  Explain
58         -              db_cra             LC  Not Wait   0    0
9.28  Off

Last parsed SQL statement :
  select campaignen0_.campaignID as campaignID3_, campaignen0_.profileID
 as
   profileID3_, campaignen0_.recordID as recordID3_, campaignen0_.active
 as
```

```
   active3_, campaignen0_.ansMachineRetry as ansMachi5_3_,
  campaignen0_.cacheSize as cacheSize3_, campaignen0_.callbackTimeLimit
as
   callback7_3_, campaignen0_.campaignName as campaign8_3_,
  campaignen0_.createDateTime as createDa9_3_, campaignen0_.dateInactive
as
   dateIna10_3_, campaignen0_.description as descrip11_3_,
  campaignen0_.enabled as enabled3_, campaignen0_.endTime as endTime3_,

   campaignen0_.maxAttempts as maxAtte14_3_,
   campaignen0_.missedCallbackAction as missedC15_3_,
   campaignen0_.privateData as private16_3_, campaignen0_.startTime as
   startTime3_ from Campaign campaignen0_ where campaignen0_.active=?
Command successful.
```

show uccx dbserver sessions list

This command displays a one-line summary of each active Unified CCX database session. The summary includes the database name, username, session ID, and process ID. The session ID information can be used to display more detailed information about a specified session using the **show uccx dbserver session** command.

Command syntax

show uccx dbserver sessions list [options]

Options

page—Displays the output one page at a time

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx dbserver sessions list
DATABASE           USERNAME     SESSION PROCESS ID
------------------ ------------ ------- ----------
 db_cra             uccxuser         49         -1
 db_cra             uccxuser         44         -1
 db_cra             uccxuser         46         -1
 db_cra             uccxuser         61         -1
 db_cra             uccxuser         24         -1
 db_cra             uccxuser         18         -1
 db_cra             uccxhruser    31224         -1
 db_cra             uccxuser         62         -1
 db_cra             uccxuser         60         -1
 db_cra             uccxuser         47         -1
 db_cra             uccxuser         59         -1
 db_cra             uccxuser         58         -1
 db_cra             uccxuser         48         -1
 db_cra             uccxuser         50         -1
 db_cra             uccxcliuser   31616         -1

 Command successful.
```

show uccx dbserver user list

This command displays a one-line summary of each active uccx database user. The summary includes the database name, session ID and process ID. The session ID information can be used to display more detailed information about a specified user session using the **show Unified CCX dbserver session** command.

Command syntax

show uccx dbserver user list [option]

Option

page—Displays the output one page at a time

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx dbserver user list
DATABASE           USERNAME     SESSION PROCESS ID
------------------ ------------ ------- ----------
 sysadmin           informix         15          0
 sysadmin           informix         16          0
 sysadmin           informix         17          0
 sysmaster          uccxuser         18         -1
 db_cra             uccxuser         18         -1
 sysmaster          uccxuser         24         -1
 db_cra             uccxuser         24         -1
 db_cra_repository  uccxuser         25         -1
 sysmaster          uccxuser         25         -1
 fcrassvr           uccxuser         26         -1
 sysmaster          uccxuser         26         -1
 sysmaster          uccxuser         44         -1
 db_cra             uccxuser         44         -1
 db_cra_repository  uccxuser         45         -1
 sysmaster          uccxuser         46         -1
 db_cra             uccxuser         46         -1
 sysmaster          uccxuser         47         -1
 db_cra             uccxuser         47         -1
 db_cra             uccxuser         48         -1
 sysmaster          uccxuser         48         -1
 sysmaster          uccxuser         49         -1

 Command successful.
```

show uccx dbserver user waiting

This command displays a one-line summary of each Unified CCX database user and also displays whether a user session is waiting for a resource.

Command syntax

show uccx dbserver user waiting [option]

Option

page—Displays the output one page at a time

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx dbserver user waiting
USERNAME     SESSION ID LATCH LOCK BUFFER CHECKPOINT TRANSACTION INCRITICAL
------------ ---------- ----- ---- ------ ---------- ----------- ----------

 informix            16     N    N      N          N           N
  N
 informix            17     N    N      N          N           N
  N
 informix            15     N    N      N          N           N
  N
 uccxcliuser      33927     N    N      N          N           N
  N
 uccxcliuser      32784     N    N      N          N           N
  N
 uccxcliuser      32737     N    N      N          N           N
  N
 uccxcliuser      32631     N    N      N          N           N
  N
 uccxcliuser      34424     N    N      N          N           N
  N
 uccxcliuser      32522     N    N      N          N           N
  N
 uccxcliuser      34364     N    N      N          N           N
  N
 uccxcliuser      32508     N    N      N          N           N
  N
 uccxcliuser      32480     N    N      N          N           N
  N
 uccxcliuser      31616     N    N      N          N           N
  N
 uccxcliuser      31601     N    N      N          N           N
  N
 uccxcliuser      34327     N    N      N          N           N
  N
 uccxcliuser      34071     N    N      N          N           N
  N
 uccxcliuser      33981     N    N      N          N           N
  N
 uccxcliuser      33939     N    N      N          N           N
  N
 uccxhruser       31224     N    N      N          N           N
  N
 uccxuser         30278     N    N      N          N           N
  N
 uccxuser            60     N    N      N          N           N
```

```
 N

Command successful.
```

show uccx tech dbserver log message

This command displays the most recent messages in the Informix message log. The number of messages displayed is determined by the lines parameter.

Command syntax

show uccx tech dbserver log message [lines] [option]

Arguments

lines—(Optional) Number of lines from message log that will be displayed. Defaults to 20.

Option

page—Displays the output one page at a time

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx tech dbserver log message 10
Message Log File: online.uccx.log

The last 10 lines of the log file are -

16:05:19  Maximum server connections 33
16:05:19  Checkpoint Statistics - Avg. Txn Block Time 0.000, # Txns blocked
 0, Plog used 21, Llog used 12

16:10:19  Checkpoint Completed:  duration was 0 seconds.
16:10:19  Wed Aug 19 - loguniq 8, logpos 0x93c018, timestamp: 0xb0244c
Interval: 4106

16:10:19  Maximum server connections 33
16:10:19  Checkpoint Statistics - Avg. Txn Block Time 0.000, # Txns blocked
 0, Plog used 2, Llog used 2


Command successful.
```

show uccx dbtable contents

This command displays the contents of the specified table.

Command syntax

show uccx dbtable contents database_name table_name [option]

Arguments

database_name—(Mandatory) Name of the database for example, db_cra, db_cra_repository in which the table resides

table_name—(Mandatory) Name of the table

Option

page—Displays the output one page at a time

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx dbtable contents db_cra resource
Output is in file: uccx/cli/resource_Contents_1250666550481.csv

 Command successful.
```

Set Commands

set uccx trace defaults

This command sets the default trace levels for all components and subcomponents in Unified CCX. If the optional component is specified, it sets the default trace levels only for all the subcomponents of the specified component. If both the optional component and subcomponent are specified, it sets the default trace levels only for the specified subcomponent under the component.

Command syntax

set uccx trace defaults [component] [subcomponent]

Options

- **Component—**(Mandatory) Sets the default trace levels for all the subcomponents of this component. The various components are UCCXEngine, UCCXCvd, UCCXAppAdmin and JTAPI_CLIENT.
- **Sub-component—**(Optional) Sets the default trace levels for this subcomponent for the specified component. This trace level can be specified only if the component was specified preceding it.

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:set uccx trace defaults uccxengine
SS_HTTP
Default traces restored successfully for the module.
```

set uccx trace file size component size

This command sets the trace file size for the specified component.

Command syntax

set uccx trace file size [component] [size]

Parameters

component—(Mandatory) The component such as UCCXEngine or UCCXEditor

size—(Mandatory) Specifies the file size in bytes

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:set uccx trace file size uccxengine 3145728
Trace file size for uccxengine is set to 3145728 bytes.
```

set uccx trace file count component no-of-files

This command sets the trace file count for the specified component, that is the maximum number of trace files after which older files will start getting overwritten.

Command syntax

set uccx trace file count [component] [no-of-files]

Arguments

- **component—**(Mandatory) The component such as UCCXEngine or UCCXEditor.
- **no-of-files—**(Mandatory) Specifies the number of files after which older files will get overwritten.

Requirements

Level privilege—1

Command privilege level—1

Allowed during upgrade—No

Example

```
admin:set uccx trace file count uccxengine 300
Trace file count for uccxengine is set to 300
```

set uccx trace enable

Enables the specified logging level for the sub-component in the component mentioned in the command. The user can enter multiple levels of logging by separating them by commas.

After the completion of the command, a message is displayed showing the current log trace settings enabled.

Restart the Unified CCX services for the trace changes to take effect.

Command syntax

set uccx trace enable *[component] [sub-component]* [level]

Options

component—(Mandatory) The component such as UCCXEngine or UCCXEditor or JTAPI_CLIENT

sub-component—(Mandatory) The subcomponent within the component such as JTAPI Subsystem within the UCCXEngine component. For the JTAPI_CLIENT component, there are no sub-components.

Level—(Mandatory) The logging level which will be enabled. Tracing levels are Debugging, XDebugging1, XDebugging2, XDebugging2, XDebugging3, XDebugging4 and XDebugging5. For the JTAPI_CLIENT, the tracing levels are Warning, Informational, Debug, Jtapi_Debug, JtapiImpl_Debug, Cti_Debug, CtiImpl_Debug, Protocol_Debug and Misc_Debug.

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example 1

```
admin:set uccx trace enable uccxengine SS_HTTP debugging
 Trace for uccxengine:SS_HTTP:debugging is enabled.
 Command successful.
```

Example 2

```
admin:set uccx trace enable UCCXengine ICD_CTI XDEBUGGING1,XDEBUGGING2
Trace for uccxengine:ICD_CTI:XDEBUGGING1 is enabled
Trace for uccxengine:ICD_CTI:XDEBUGGING2 is enabled
Command successful.
```

set uccx trace disable

Disables the specified logging level for the subcomponent in the component mentioned in the command. The user can enter multiple levels of logging by separating them by commas. You cannot use this command to turn off Alarm tracing.

After the completion of the command, a message is displayed showing the current log trace settings enabled.

Restart the Unified CCX services for the trace changes to take effect.

Command syntax

set uccx trace disable *[component] [sub-component]* [level]

Options

Component—The component such as UCCXEngine or UCCXEditor or JTAPI_CLIENT.

Sub-component—The subcomponent within the component such as JTAPI Subsystem within the UCCXEngine component. For the JTAPI_CLIENT component, there are no subcomponents.

Level—(Mandatory) The logging level which will be disabled. Tracing levels are Debugging, XDebugging1, XDebugging2, XDebugging2, XDebugging3, XDebugging4 and XDebugging5. For the JTAPI_CLIENT, the tracing levels are Warning, Informational, Debug, Jtapi_Debug, JtapiImpl_Debug, Cti_Debug, CtiImpl_Debug, Protocol_Debug and Misc_Debug. The tracing levels will also be available as part of the help of the command.

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example 1

```
admin:set uccx trace disable uccxengine ss_tel debugging
 Trace for uccxengine:ss_tel:debugging is disabled.
 Command successful.
```

Example 2

```
set uccx trace disable UCCXEngine ICD_CTI XDEBUGGING1,XDEBUGGING2
Trace for uccxengine:ICD_CTI:XDEBUGGING1 is disabled
Trace for uccxengine:ICD_CTI:XDEBUGGING2 is disabled
Command successful.
```

set password user security

This command changes the security/SFTP password on the UCOS box. In addition to changing the security password, it also changes the passwords of the internal Unified CCX users.

Command syntax

set password user security

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:set password user security
Please enter the old password: ******
Please enter the new password: ******
Reenter new password to confirm: ******
WARNING:
Please make sure that the security password on the publisher is changed
first.
The security password needs to be the same on all cluster nodes,
including the application server, therefore the security password on all
 nodes
need to be changed.

After changing the security password on a cluster node, please restart
that node.
```

```
Continue (y/n)?y

Please wait...

Command successful.
```

set uccx provider ip axl

This command sets the Unified CCX AXL provider IP address. Use this command only when the IP address of Unified Communications Manager has been changed and Unified CCX is being pointed to the new IP address.

Note After you run this command, restart the Unified CCX Engine service. After Unified CCX Engine service starts successfully, restart Cisco Tomcat using the CLI command **utils service restart Cisco Tomcat**.

For more information on how to restart the Unified CCX Engine service, see the *Cisco Unified CCX Serviceability Administration Guide* available at:

http://www.cisco.com/en/US/products/sw/custcosw/ps1846/products_installation_and_configuration_guides_list.html .

Command syntax

set uccx provider ip axl [ip-address]

Arguments

[ip-address]—The IP address of the AXL provider.

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: No

Example

```
admin: set uccx provider ip axl 10.78.14.140
Cisco Unified Communications Manager IP is set to 10.78.14.140

Command Successful.
```

set uccx provider ip jtapi

This command sets the Unified CCX JTAPI provider IP address. Use this command only when the IP address of Unified Communication Manager has been changed and Unified CCX is being pointed to the new IP address.

Note After you run this command, restart the Unified CCX Engine service. After Unified CCX Engine service starts successfully, restart Cisco Tomcat using the CLI command **utils service restart Cisco Tomcat**.

For more information on how to restart the Unified CCX Engine service, see the *Cisco Unified CCX Serviceability Administration Guide* available at:

http://www.cisco.com/en/US/products/sw/custcosw/ps1846/products_installation_and_configuration_guides_list.html .

Command syntax

set uccx provider ip jtapi *[ip-address]*

Arguments

[ip-address]—The IP address of the JTAPI provider.

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: No

Example

```
admin: set uccx provider ip jtapi 10.78.14.140
UCCX JTAPI Provider is set to 10.78.14.140

Command Successful.
```

set uccx provider ip rmcm

This command sets the Unified CCX Resource Manager-Contact Manager provider IP address. Use this command only when the IP address of Unified Communications Manager has been changed and Unified CCX is being pointed to the new IP address.

Note After you run this command, restart the Unified CCX Engine service. After Unified CCX Engine service starts successfully, restart Cisco Tomcat using the CLI command **utils service restart Cisco Tomcat**.

For more information on how to restart the Unified CCX Engine service, see the *Cisco Unified CCX Serviceability Administration Guide* available at:

http://www.cisco.com/en/US/products/sw/custcosw/ps1846/products_installation_and_configuration_guides_list.html .

Command syntax

set uccx provider ip rmcm *[ip-address]*

Arguments

[ip-address]—The IP address of the RMCM provider.

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: No

Example

```
admin: set uccx provider ip rmcm 10.78.14.140
UCCX RMCM Provider is set to 10.78.14.140

Command Successful.
```

set uccx appadmin administrator

Administrator capability can be added to a user in Unified Communications Manager using this command.

Note Run this command to set the administrator for a configured Unified CCX system only. For a newly installed system, you must login with the platform login password that you specified during installation.

Command syntax

set uccx appadmin administrator *[username]*

Options

[username]—Username is set as the Cisco Unified CCX application administration.

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:set uccx appadmin administrator username
UCCX appadmin adminstrator is set to username
```

Note You cannot assign Administrator capability to a user ID that is the same as the application administrator user ID that you created during the Unified CCX installation. If you assign Administrator capability to such a user ID, a “Command failed” error message is displayed on the console.

run Commands

run uccx hrdataexport

This command dumps the historical reporting data and related configuration information to `csv` files, and a `tar` file is created that contains all the exported csv files. The `tar` file is saved in the local file system, under `<activelog>/uccx/log/db/hrdataexport`.

The command output indicates the filename and specific commands that you must run to transfer the generated `tar` file to a remote server and to delete the file from the local disk.

If the Start Date and End Date are specified, then the data between those dates, including the start and end dates, is exported. If only one date parameter is passed, it is considered as start date and all the data from that date onwards is exported.

Note When the command is executed, any previous `tar` file that was created is deleted. At any point only one Historical Reporting data export file is saved in the local file system. So after the Historical Reporting data is exported, transfer the `tar` file to remote server before running the command again.

Command Syntax

run uccx hrdataexport all [Start Date] [End Date]

Dumps all the historical reporting data.

run uccx hrdataexport reports *report names* [Start Date] [End Date]

Dumps all the historical reporting data for given reports.

run uccx hrdataexport tables *table names* [Start Date] [End Date]

Dumps all the historical reporting data for given table names.

Parameters

report names—(Mandatory) Comma separated names of the specific reports for which the corresponding data has to be exported. Enclose the list of report names in “ ” (double quotes).

table names—(Mandatory) Comma separated names of the specific tables from which the data is exported. Enclose the list of table names in “ ” (double quotes).

[Start Date]—(Optional) Must be in the format “yyyy-MM-dd HH:mm:ss”, including the double quotes.

[End Date]—(Optional) Must be in the format “yyyy-MM-dd HH:mm:ss”, including the double quotes.

Examples

```
admin:run uccx hrdataexport all "2012-01-01 00:00:00" "2012-02-01 00:00:00"
```

```
admin:run uccx hrdataexport reports "abandoned call detail activity
report,aborted rejected call detail report"
"2012-01-01 00:00:00" "2012-02-01 00:00:00"
```

```
admin:run uccx hrdataexport tables
"agentconnectiondetail,agentstatedetail,contactcalldetail"
"2012-01-01 00:00:00" "2012-02-01 00:00:00"
```

run uccx sql database_name sql_query

Executes an SQL “select” statement from the CLI. Read-only operations are permitted. Insert, Update, Delete and any DML statements are disallowed. This command allows queries to be run against the Unified CCX databases (data stores) and sysmaster database for the Unified CCX Informix instance (IDS engine).

Command syntax

run uccx sql database_name sql_query [options]

Arguments

database_name—(Mandatory) Database on which the SQL statement is run

sql_query—(Mandatory) The sql statement to run

Options

page—Displays the output one page at a time

file—Stores the output to a file instead of showing it on the console. The name of the file is displayed after the completion of the command.

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: No

Example

```
admin:run uccx sql db_cra select resourceid,resourcename from resource
RESOURCEID      RESOURCENAME
----------------------
1        b
2        agent22
3        sacagent3
4        sacagent1
7        user
8        sacagent2
9       user agent2
10      user rtlite1
11       agent130
14       sk1
15       sk2
24      User RT Pro
```

run uccx sp database_name sp_name

Executes a stored procedure that is specified as a parameter on the database, which is also mentioned as a parameter. This command runs only a stored procedure.

Command Syntax

run uccx sp database_name sp_name [options]

Arguments

database_name—(Mandatory) Database on which the stored procedure is run

sp_name—(Mandatory) The stored procedure to be run

Options

page—Displays the output one page at a time

file—Stores the output to a file instead of showing it on the console. The name of the file is displayed after the completion of the command.

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: No

Example

```
admin:run uccx sp db_cra sp_email_contact_detail('2016-12-06
18:30:00','2016-12-07 18:29:59','testemailcsq1','FinesseAgent1','')
CONTACT_ID      SEQUENCE_NUMBER CSQ_NAME        AGENT_NAME      RECEIVED
        RETRIEVED       REPLIED DISCARDED       FROM_ADDRESS
REPLY_TO_ADDRESS        TO_ADDRESS      SUBJECT CONTACT_TYPE
CONTACT_DISPOSITION     EMAIL_REPLY_TO  EMAIL_REPLY_CC  EMAIL_REPLY_BCC
------------------------------------------------------------------------------------------------------------------------------------


 D82AC14C1000015800000EFF0A4E5D8A        0       testemailcsq1
FinesseAgent1   2016-12-07 07:22:49.0   2016-12-07 07:59:45.051 2016-12-07
 08:00:47.06  null    reboottest2@sky13.sm   "RebootTestUser2 Reboot."
<reboottest2@sky13.sm>    reboottest1@sky13.sm   test    1       2
 reboottest2@sky13.sm,reboottest1@sky13.sm

 Command successful.
```

Utils Commands

utils uccx notification-service log

This command allows you to enable, disable, and check the status of debug logging for Cisco Unified CCX Notification Service.

By default, debug logging is disabled for Cisco Unified CCX Notification Service. Enable debug logging for Cisco Unified CCX Notification Service when there is an issue in the system related to this service and when you require detailed logs for troubleshooting. After the troubleshooting is complete, disable logging for Cisco Unified CCX Notification Service.

You can retrieve the logs from the log-collection facility provided by Cisco Unified Real-Time Monitoring Tool.

You can execute **utils uccx notification-service log** only if Cisco Unified CCX Notification Service is running. If the service is not running, start the service first and then execute the command.

Note

- Logging for Cisco Unified CCX Notification Service affects system performance; therefore, disable logging when it is not required.
- Logging is disabled automatically when you restart Cisco Unified CCX Notification Service.

Command syntax

utils uccx notification-service log enable

utils uccx notification-service log disable

utils uccx notification-service log status

Arguments

None

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Examples

Check status of logging

```
admin:utils uccx notification-service log status

Cisco Unified CCX Notification Service logging is currently DISABLED.
```

Enable logging

```
admin:utils uccx notification-service log enable

WARNING! Enabling Cisco Unified CCX Notification Service logging can
affect system performance and should be disabled when logging is not
required.

Do you want to proceed (yes/no)?
Cisco Unified CCX Notification Service logging enabled successfully.

NOTE: Logging will be disabled automatically if Cisco Unified CCX
Notification Service is restarted.
```

Disable logging

```
admin:utils uccx notification-service log disable

Cisco Unified CCX Notification Service logging disabled successfully.
```

utils remote_account

This command allows you to enable, disable, create, and check the status of a remote account.

Command Syntax

- utils remote_account status
- utils remote_account enable
- utils remote_account disable
- utils remote_account create username life

Arguments

- **username—**Specifies the name of the remote account. The username can contain only lowercase characters and must be more than six characters long.
- **life—**Specifies the life of the account in days. After the specified number of days, the account expires.

Usage Guidelines

A remote account generates a pass phrase that allows Cisco support personnel to access the system for the specified life of the account. You can have only one remote account that is enabled at a time.

Example

```
admin:utils remote_account status
Remote Support
Status         : disabled
Decode Version : 2
```

Caution Avoid creating remote account usernames starting with "uccx" or "UCCX" because such usernames may conflict with system account names that are used internally within the Cisco Unified Contact Center Express server.

utils reset_application_ui_administrator_name

This command resets the application user interface administrator name for Serviceability, OAMP, CUIC Admin property, and CUIC Administrator.

Command syntax

utils reset_application_ui_administrator_name

Command Modes

Administrator (admin)

Requirements

Command privilege level: 0

Allowed during upgrade: Yes

Note Restart the service (Cisco Unified Intelligence Center Reporting Service) on all nodes in the cluster to enable the new administrator to log in to Unified Intelligence Center.

```
admin:utils reset_application_ui_administrator_name

-------------------- utils reset_ui_administrator_name --------------------


Reset user interface administrator user name

New administrator user name:

User_1
Serviceability Administrator user name has been successfully updated to
User_1

OAMP user name has been successfully updated to User_1

CUIC Admin property has been successfully updated to User_1

CUIC Administrator user name has been successfully updated to User_1
```

utils reset_application_ui_administrator_password

This command resets the application user interface administrator password.

Command syntax

utils reset_application_ui_administrator_password

Command Modes

Administrator (admin)

Requirements

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:utils reset_application_ui_administrator_password
New password:********
Confirm new Password:********
```

utils service

This command allows starting, stopping, and restarting of the following services:

- System SSH
- Service Manager
- A Cisco DB

- Cisco Database Layer Monitor
- Cisco DRF Local
- Cisco DRF Master
- Cisco Tomcat
- Cisco Unified Serviceability RTMT
- Cisco Finesse Tomcat
- Cisco Unified CCX Cluster View Daemon
- Cisco Unified CCX Database
- Cisco Unified CCX Administration
- Cisco Unified CCX Serviceability
- Cisco Unified CCX Engine
- Cisco Unified CCX DB Perfmon Counter Service
- Cisco Unified CCX Notification Service
- Cisco Unified CCX Perfmon Counter Service
- Cisco Unified CCX SNMP Java Adapter
- Cisco Unified CCX WebServices
- Cisco Unified CCX Configuration API
- Cisco Unified CCX Voice Subagent
- Cisco Unified CCX Socket.IO Service
- Cisco Unified Intelligence Center Reporting Service
- Cisco Unified Intelligence Center Serviceability Service

Command syntax

utils service [option] [service-name]

Arguments

option—The option to stop, start, or restart a service.

service-name—The service which is to be stopped, started, or restarted.

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils service start Cisco Unified CCX Administration
Service Manager is running
Cisco Unified CCX Administration[STARTING]
Cisco Unified CCX Administration[STARTING]
```

```
Cisco Unified CCX Administration[STARTED]
Cisco Unified CCX Administration[STARTED]
```

utils system upgrade

This command allows you to install upgrades and Cisco Option Package (COP) files from both local and remote directories.

Command syntax

utils system upgrade [Options]

Options

initiate—Starts a new upgrade wizard or assumes control of an existing upgrade wizard. The wizard prompts you for the location of the upgrade file for Unified CCX.

status—Displays status of the upgrade

cancel—Stops the upgrade process

Example

```
admin:utils system upgrade initiate

Warning: Do not close this window without first canceling the upgrade.

Source:

 1) Remote Filesystem via SFTP
 2) Remote Filesystem via FTP
 3) Local DVD/CD
 q) quit

Please select an option (1 - 3 or "q" ):
```

utils system switch-version

This command restarts and switches the system to the Unified CCX product release that is installed on the inactive partition.

Command syntax

utils system switch-version

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

When the user initiates a switch version, system restart, or system shutdown from the CLI, a warning message is displayed and user confirmation is requested before Unified CCX proceeds with the command execution. This command is applicable for the following scenarios:

- The system detects that a switch version is in progress.

- The system detects that a previous switch version was abruptly terminated.

Note A switch version operation is abruptly terminated if a power reset or hard reboot is performed on the Unified CCX system when the operation is in progress.

Example

```
admin:utils system switch-version

   ** There is no inactive side available **
```

utils uccx database dbserver integrity

This command checks the integrity of the database server disk structures and displays results. It also checks the DB configuration integrity and performs a fix if integrity is broken. Detailed information is output to a text file. The Informix oncheck utility is used for the command.

Command Syntax

utils uccx database dbserver integrity

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:utils uccx database dbserver integrity
 This operation may take a few minutes to complete. Please wait...

 Output is in file: uccx/cli/DbServerIntegrity_1372844998930.txt

 Command successful.
Starting DB config integrity check
 This operation may take a few minutes to complete. Please wait...

 Output is in file: uccx/cli/DbConfigIntegrity_1372845048816.txt
 Use "file view activelog  uccx/cli/DbConfigIntegrity_1372845048816.txt"
 command to see output
 Command successful.
```

Note The name of the file containing the output from all the checks performed is automatically generated by the command script. For the filename to be unique, the naming format is DbServerIntegrity_<TIMESTAMP>.txt. This format ensures the uniqueness across processes and over time. The file path and filename are displayed after the completion of the operation.

utils uccx list license

This command lists the licenses that are uploaded into the uccx system.

Command syntax

utils uccx list license

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx list license
The following licenses are uploaded in the system:
ccx90_pre_demo.lic
UCCXLicense.lic
ccx100_premium_300seat_allfeatures_dummy.lic
ccx90_enh_demo.lic
ccx_10.5-300_Seat_DummyLicense.lic
 Command successful.
```

utils uccx delete license licenseName

This command deletes a license, permanent or temporary, that is already uploaded into the Unified CCX system.

Caution Use this command with extreme care, because it will delete any license that has been uploaded to the Unified CCX system, without checking whether the license is a temporary or a permanent one. Use this command only to delete wrong or invalid permanent licenses. You can delete temporary licenses by using Unified CCX Administration.

Note For the single-node system, execute the delete command first, and then restart the Unified CCX node. For the HA system, execute the delete command separately on each of the two nodes, and then restart both the Unified CCX nodes in the cluster.

Command syntax

utils uccx delete license licenseName

Arguments

licenseName is deleted from the Unified CCX system

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx delete license ccx10_premium_300seat.lic
Warning:
Deleting the license may have adverse effect on the working of the uccx
system.
After deleting the license from all UCCX nodes, restart the UCCX nodes
in the cluster.
Are you sure you want to run this command?
Continue (y/n)?n
Exiting the command.
Command successful.
```

utils uccx jtapi_client update

This command updates the JTAPI Client version on the active partition on the Unified CCX box to match JTAPI version on the Unified Communications Manager. This command downloads the JTAPI Client from the Unified Communications Manager and checks whether the downloaded version needs to be installed. If the downloaded version needs to be installed, it installs the downloaded JTAPI Client and displays a message that the JTAPI Client was updated with the previous and the current versions. If the downloaded version does not need to be installed, it displays a message saying the same and displays the current JTAPI Client version.

The JTAPI client update occurs only on the local node and not the second node in case of an HA deployment.

Note After you run this command, you must reboot the Unified CCX server and restart all the Unified CCX services.

Command syntax

utils uccx jtapi_client update

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx jtapi_client update
Node ID: 1 -- Cisco JTAPI Client versions are consistent
 Command successful.
```

utils uccx prepend custom_classpath

This command adds the CustomJarName to the classpath ahead of the system classpath.

Note You must use this command when there are common classes being used in the custom code as well as by Unified CCX and there is a version mismatch between the common classes that are being used.

Caution You must add the custom classpath only if the Custom class files have a newer version than the class files used by Unified CCX. Adding class files that are of older version at the start of the classpath could lead to system instability.

Command syntax

utils uccx prepend custom_classpath *[CustomJarName]*

Arguments

CustomeJarName—Custom jar filename to be prepended to classpath

Example

```
admin:utils uccx add custom_classpath jsafe.jar
Command successful.
```

utils uccx switch-version db-check

This command allows you to check whether the database was corrupted after an unsuccessful switch version due to a restart in the middle of a switch version attempt. The command displays the status of last switch version. If there is a database backup available that can be restored, it prints the time stamp of the backup and display the CLI command **utils uccx switch-version db-recover** to recover from this backup.

Command Syntax

utils uccx switch-version db-check

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx switch-version db-check
ccx DB was found to be corrupted.

Last switch version was aborted at 05/29/2012 16:18:07
05/29/2012 16:18:07|root:Switch Version 9.0.1.10000-41 to 9.0.10000-42
Aborted

There is a CCX backup with timestamp 2012-05-29 16:16:19.000000000 +0530
 that was taken during a prior switch version.

!!!WARNING!!! IF YOU CHOOSE TO RECOVER FROM THIS BACKUP, ANY CHANGES DONE
 TO THE DATABASE AFTER THE TIMESTAMP OF THIS BACKUP WILL BE LOST.
```

```
You can run the CLI command "utils uccx switch-version db-recover" to
restore the DB from this backup.
```

utils uccx switch-version db-recover

This command first checks whether the database was corrupted after an unsuccessful switch version due to the restart in the middle of a switch version attempt. The command displays the status of the last switch version. If there is a database backup available that can be restored, it prints the time stamp of the backup and offer an option to restore the database from this backup. If the restore option is chosen, the command completes after restoring the database from this backup and bringing up all the services.

Command Syntax

utils uccx switch-version db-recover

Requirements

Level privilege: 1

Command privilege:1

Allowed during upgrade: No

Example

```
admin:utils uccx switch-version db-recover
CCX DB was found to be corrupted.

Last switch verison was aborted at 05/29/2012 16:18:07
05/29/2012 16:18:07|root:Switch Version 9.0.1.10000-42 Aborted

There is a CCX DB backup with timestamp 2012-05-29 16:16:19:000000000
+530 that was taken during a prior switch version.

!!!WARNING!!! IF YOU CHOOSE TO RECOVER FROM THIS BACKUP, ANY CHANGES DONE
 TO THE DATABASE AFTER THE TIMESTAMP OF THIS BACKUP WILL BE LOST.

Are you sure you want to continue?
Continue (y/n)?y
This operation may take a few minutes to complete. Please wait
```

utils uccx syncusers

This command allows you to synchronize the Unified CCX user passwords with the security password.

Command syntax

utils uccx syncusers

Example

```
admin:utils uccx syncusers
Command successful.
```

utils uccx synctocuic

Synchronizes the users, teams and grants permissions to the reports and stock folders from Unified CCX to Unified Intelligence Center. The following are the configurations that are pushed from Unified CCX to Unified Intelligence Center:

- Users
- Teams
- Stock folders
- Reports
- Value lists

If you make any changes to the above mentioned configurations in Unified Intelligence Center, then such changes are overwritten during the sync.

Note If the sync fails, then running this command or the auto sync that is part of the purge schedule will not revoke the permissions for the previously-synced users or user groups.

Command Syntax

utils uccx synctocuic

Example

```
admin:utils uccx synctocuic
Warning:
Synchronizing all the data to cuic will take some time.
Are you sure you want to run this command?
Continue (y/n)?y
Synchronization of the data from UCCX to CUIC is in progress...
Command successful.
```

utils uccx icd clid status

This command allows you to view the current configuration parameter values for the Caller ID (CLID) feature.

Command syntax

utils uccx icd clid status

Example

```
admin:utils uccx icd clid status
CLID Feature: Disabled
CLID Text Header: Caller Details
CLID Text Prefix: Calling Party Number :
```

utils uccx icd clid enable

This command allows you to enable the CLID feature.

Restart the Unified CCX Engine service for the changes to take effect.

In HA deployments, run this command separately on both the Unified CCX nodes.

After upgrade, run this command again to enable the CLID feature.

Command syntax

utils uccx icd clid enable

Example

```
admin:utils uccx icd clid enable
Successfully enabled the CLID feature
Please restart the "Cisco Unified CCX Engine" service for changes
to take effect
In case of Cisco Unified CCX HA cluster, enable the CLID feature in
remote node as well by running the CLI command
"utils uccx icd clid enable" on the remote node
```

utils uccx icd clid disable

This command allows you to disable the CLID feature.

Restart the Unified CCX Engine service for the changes to take effect.

In HA deployments, run this command separately on both the Unified CCX nodes.

After upgrade, run this command again to disable the CLID feature.

Command syntax

utils uccx icd clid disable

Example

```
admin:utils uccx icd clid disable
Successfully disabled the CLID feature
Please restart the "Cisco Unified CCX Engine" service for changes
to take effect
In case of Cisco Unified CCX HA cluster, disable the CLID feature in
remote node as well by running the CLI command
"utils uccx icd clid disable" on the remote node
```

utils uccx icd clid header

This command allows you to set the display header on the phone screen.

Restart the Unified CCX Engine service for the changes to take effect.

In HA deployments, run this command separately on both the Unified CCX nodes.

After upgrade, run this command again to set the values for the display header.

If the header string has space, enclose the entire string in double quotes.

You can set the header string to "" if you do not want to provide any values.

Command syntax

utils uccx icd clid header <header string>

Example

```
admin:utils uccx icd clid header "Caller Details"
Successfully set the CLID text header to "Caller Details"
Please restart the "Cisco Unified CCX Engine" service for changes
to take effect
In case of Cisco Unified CCX HA cluster, set the CLID text header in
remote node as well by running the CLI command
"utils uccx icd clid header <header string>" on the remote node
```

utils uccx icd clid prefix

This command allows you to set the prefix string for the calling party number displayed on the phone screen.

Restart the Unified CCX Engine service for the changes to take effect.

In HA deployments, run this command separately on both the Unified CCX nodes.

After upgrade, run this command again to set the values for the prefix string.

If the prefix string has space, enclose the entire string in double quotes.

You can set the prefix string to "" if you do not want to provide any values.

Command syntax

utils uccx icd clid prefix <prefix string>

Example

```
admin:utils uccx icd clid prefix "Calling Party Number : "
Successfully set the CLID text prefix to "Caller Party Number: "
Please restart the "Cisco Unified CCX Engine" service for changes
to take effect
In case of Cisco Unified CCX HA cluster, set the CLID text prefix in
remote node as well by running the CLI command
"utils uccx icd clid prefix <prefix string>" on the remote node
```

utils uccx security_filter enable

Run this command to enable Unified CCX administration security filter settings.

In HA deployments, run this command separately on both the Unified CCX nodes.

Command syntax

utils uccx security_filter enable

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx security_filter enable
The status of security filter is: enabled
Please restart Unified CCX service using
'utils service restart Cisco Tomcat' for changes to take effect.
In case of Cisco Unified CCX HA cluster, set the security filter in
remote node as well.
```

utils uccx security_filter disable

Run this command to disable Unified CCX administration security filter settings.

In HA deployments, run this command separately on both the Unified CCX nodes.

Command syntax

utils uccx security_filter disable

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx security_filter disable
The status of security filter is: disabled
Please restart Unified CCX service using
'utils service restart Cisco Tomcat' for changes to take effect.
In case of Cisco Unified CCX HA cluster, set the security filter in
remote node as well.
```

utils uccx security_filter status

Run this command to check the status of Unified CCX administration security filter flag.

Command syntax

utils uccx security_filter status

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx security_filter status
uccx security filter is :enabled
```

utils uccx dbreplication dump configfiles

Run this command to append the data of dbreplication configuration files to a text file. This command is only available in the High Availability deployment of Unified CCX.

Command syntax

utils uccx dbreplication dump configfiles

Requirements

Level privilege: 1

Command privilege level: 0

Allowed during upgrade: No

Example

```
admin:utils uccx dbreplication dump configfiles
Command Started
Output is in file: DbConfigFiles_120813161827.txt
Use "file view activelog uccx/cli/DbConfigFiles_120813161827.txt" command
 to view the file
Use "file get activelog uccx/cli/DbConfigFiles_120813161827.txt" command
 to get the file
Command Successful
```

utils uccx database healthcheck

This command runs the database health check script, which checks the health of the Unified CCX database.

After the execution of this command, a health check report is generated. If any issues are found by this script then they are recorded in the health check report. A solution file is also generated that consists of suggested solutions for the problems reported in the health check report file.

Command syntax

utils uccx database healthcheck

Requirements

Level privilege: 1

Command privilege level: 0

Allowed during upgrade: No

Example

```
admin:utils uccx database healthcheck
Command Started
This command may take few minutes to complete
UCCX database health report is available at:
/var/log/active/uccx/cli/healthcheck.rpt
UCCX database health report suggested solutions is available at:
/var/log/active/uccx/cli/healthcheck.soln
Use "file view activelog uccx/cli/healthcheck.rpt" command to view the
file
Use "file get activelog uccx/cli/healthcheck.rpt" command to get the file
```

```
Use "file view activelog uccx/cli/healthcheck.soln" command to view the
file
Use "file get activelog uccx/cli/healthcheck.soln" command to get the
file
Command Successful
```

utils uccx database dbperf start

Run this command to monitor the CPU and database utilization on the Unified CCX server.

After this command is executed, a successful execution message appears on the screen. This command runs in the background for the total duration specified in the command at periodic intervals and generates a file, which consists of the details related to CPU and database utilization.

Command syntax

utils uccx database dbperf start totalHours interval

Arguments

- **Interval—** Period of time between the execution / operation.
- **TotalHours—**Total duration of the execution.

Requirements

Level privilege: 1

Command privilege level: 0

Allowed during upgrade: No

Example

```
admin: utils uccx database dbperf start 10 20
The script runs every 20 minutes over a total duration of 10 hours.
Please collect files after 10 hours
Use "file get activelog uccx/cli/dbperf_250913131546.log" to get the file
Use "file view activelog uccx/cli/dbperf_250913131546.log" to view the
file
Command Successful
```

utils uccx database dbperf stop

Run this command to stop the current active instance of **utils uccx database dbperf start** before it runs to completion.

Command syntax

utils uccx database dbperf stop

Requirements

Level privilege: 1

Command privilege level: 0

Allowed during upgrade: No

Example

```
admin:utils uccx database dbperf stop
Execution of dbperf has been stopped
Command Successful
```

File Commands

File commands help in creating custom files that are stored in a specific directory in UCCX Filesystem.

file uccx view

Use this command to view custom files created by Unified CCX scripts.

Command syntax

file uccx view custom_file file-spec

Arguments

file-spec—(Mandatory) The file to view. The file-spec must resolve to a single file. File-spec can contain asterisks (*) as wildcards, providing it resolves to a single file.

Options

None

Requirements

Level privilege: 0

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:file uccx view custom_file test.txt
```

file uccx list custom_file

This command lists custom files that were created by Unified CCX scripts.

Command syntax

file uccx list custom_file file-spec *[options]*

Arguments

file-spec—(Mandatory) The file to view. File-spec can contain asterisks (*) as wildcards.

Options

***page*—**Pauses output

***detail*—**Shows detailed listing

***reverse*—**Reverses sort order

***date*—**Sorts by date

***size*—**Sorts by size

Requirements

Level privilege: 0

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:file uccx list custom_file * detail
08 Dec,2009 16:56:11 0 text.txt

dir count = 0, file count = 1
```

file uccx list prompt_file

This command lists prompt files created for various locales.

Command syntax

file uccx list prompt_file file_spec *[options]*

Arguments

file-spec—(Mandatory) The file to view. File-spec can contain asterisks (*) as wildcard.

Options

page—Pauses output

detail—Shows detailed listing

reverse—Reverses sort order

date—Sorts by date

size—Sorts by size

Requirements

Level privilege: 0

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:file uccx list prompt_file system/G711_ULAW/en_US detail
16 May,2012 17:50:19      <dir>    AA
16 May,2012 17:50:19      <dir>    ICD
16 May,2012 17:50:19      <dir>    ICM
16 May,2012 17:50:19      <dir>    SNU
16 May,2012 17:50:19      <dir>    SSA
16 May,2012 17:50:19      <dir>    UserDialog
16 May,2012 17:50:19      <dir>    gen
05 Dec,2002 06:19:03       13,822  continue_enter_number.wav
05 Dec,2002 06:19:03        7,280  credit_of.wav
05 Dec,2002 06:19:04       18,310  did_not_hear_name.wav
05 Dec,2002 06:19:04       11,430  enter_phone_number.wav
05 Dec,2002 06:19:05       12,926  finished.wav
```

```
05 Dec,2002 06:19:05        4,448  goodbye.wav
05 Dec,2002 06:19:06        8,546  name_cancelled.wav
05 Dec,2002 06:19:06       47,572  name_confirm.wav
05 Dec,2002 06:19:07       22,990  name_not_found.wav
05 Dec,2002 06:19:08       36,142  no_phone_number.wav
05 Dec,2002 06:19:08        3,902  of.wav
05 Dec,2002 06:19:09        5,492  past.wav
05 Dec,2002 06:19:09        5,110  pound.wav
05 Dec,2002 06:19:10        8,070  spell.wav
05 Dec,2002 06:19:10       11,524  spell_again.wav
05 Dec,2002 06:19:11       12,724  spell_another.wav
05 Dec,2002 06:19:11        5,596  star.wav
05 Dec,2002 06:19:12       45,074  system_problem.wav
05 Dec,2002 06:19:12        5,038  thankyou.wav
05 Dec,2002 06:19:13        8,910  try_again.wav
05 Dec,2002 06:19:14       51,810  unrecov_error_rec.wav
05 Dec,2002 06:19:14        5,216  welcome.wav
dir count = 7, file count = 22
admin:
```

file uccx get

This command transfers the custom files created by Unified CCX scripts outside the box.

Command syntax

file uccx get custom_file file-spec *[options]*

Arguments

file-spec—(Mandatory) File to transfer. File-spec can contain asterisks (*) as wildcards.

Options

reltime—(Mandatory) File to transfer. File-spec can contain asteriks (*) as wildcards.

abstime—(Mandatory) Absolute time to filter.

match—Search pattern to filter.

recurs—Obtains all the files located in file-spec and subdirectories

compress—Transfers files as compressed file

Requirements

Level privilege: 0

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:file uccx get custom_file text.txt abstime 00:00:12/01/08
01:00:12/30/08
```

file uccx tail

This command will tail a custom file that was created by a Unified CCX script.

Command syntax

file uccx tail custom_file file-spec *[options]*

Arguments

file-spec—(Mandatory) File to tail.

Options

hex,[num lines],regexp "expression"

recent—To tail the most recently changed file in the directory.

Requirements

Level privilege: 0

Command privilege level: 1

Allowed during upgrade: No

Example

Tail file starting with the last ten lines with pagination enabled:

```
admin:file uccx tail custom_file text.txt page 102005-08-03 15:01:41,248
 DEBUG [main] - cmdMVL size = 0
2005-08-03 15:01:41,248 INFO [main] - adding command in level3
(password/security)
2005-08-03 15:01:41,249 DEBUG [main] - begin for level4, topVL size = 0
2005-08-03 15:01:41,250 DEBUG [main] - begin for level4, topVL size = 0
2005-08-03 15:01:41,256 DEBUG [main] - begin for level3, topVL size = 0
2005-08-03 15:01:41,257 DEBUG [main] - begin for level2, topVL size = 0
2005-08-03 15:01:41,884 INFO [main] - merging complete
2005-08-03 15:06:27,619 INFO [main] - got to save history
2005-08-03 15:06:27,620 INFO [main] - Exiting CLI
```

file uccx dump

This command dumps the contents of a file on the Unified CCX custom files area.

Command syntax

file uccx dump custom_file file-spec *[options]*

Arguments

file-spec—(Mandatory) File to dump.

Options

hex, regexp "expression"

recent—To dump the most recently changed file in the directory

Requirements

Level privilege: 0

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:file uccx dump custom_file text.txt
23640935: Dec 06 22:59:43.407 IST Unable to process call,
Exception=java.lang.NullPointerException
23640936: Dec 06 22:59:43.407 IST java.lang.NullPointerException
```

file uccx delete

This command deletes a custom file that was created by a Unified CCX script. The command deletes one or more files on the Unified CCX custom files area.

Note Files that are in use cannot be deleted.

Command Syntax

file uccx delete custom_file file-spec [options]

Arguments

file-spec—(Mandatory) File to delete. File-spec can contain asterisk (*) as a wildcard.

Options

detail, noconfirm

Requirements

Level privilege: 0

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:file uccx delete custom_file log/*.log det noconfirmdeleting file
: log/cli00001.log
deleting file : log/cli00002.log
deleting file : log/cli00003.log
deleting file : log/cli00004.log
files:       found = 4, deleted = 4
```

High Availability Commands

Note If the Unified CCX database in either of the node is down or is Out of Service, High Availability commands do not work.

show uccx dbreplication tables

This command is only available in the High Availability deployment of Unified CCX. This commands list all the database tables which are involved in replication in the high availability deployment.

Command syntax

show uccx dbreplication tables *[options]*

Options

Page—Displays the output one page at a time

File—Stores the output to a file and displays the filename

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx dbreplication tables
This operation may take a few minutes to complete. Please wait...

CURRENTLY DEFINED REPLICATES
--------------------------------
REPLICATE:
template_db_cra_pshree_dactyl_sub_uccx_1_2_agentstatedetail
STATE:            Active ON:g_pshree_dactyl_pub_uccx
CONFLICT:         Timestamp
FREQUENCY:        immediate
QUEUE SIZE:       0
PARTICIPANT:      db_cra:informix.agentstatedetail
OPTIONS:          transaction,ris,ats,fullrow
REPLID:           131075 / 0x20003
REPLMODE:         PRIMARY  ON:g_pshree_dactyl_pub_uccx
APPLY-AS:         INFORMIX ON:g_pshree_dactyl_pub_uccx
REPLTYPE:         Master

.............
.............
.............

REPLICATE:
template_fcrassvr_pshree_dactyl_sub_uccx_3_3_fcrascalllogweek
STATE:            Active ON:g_pshree_dactyl_pub_uccx
CONFLICT:         Timestamp
FREQUENCY:        immediate
QUEUE SIZE:       0
PARTICIPANT:      fcrassvr:informix.fcrascalllogweek
OPTIONS:          transaction,ris,ats,fullrow
REPLID:           131104 / 0x20020
REPLMODE:         PRIMARY  ON:g_pshree_dactyl_pub_uccx
APPLY-AS:         INFORMIX ON:g_pshree_dactyl_pub_uccx
REPLTYPE:         Master
```

```
 Command successful.
admin:
```

show uccx dbreplication servers

This command is only available in the High Availability deployment of Unified CCX. This commands list all the database servers which are involved in replication in the high availability deployment and whether replication is still connected or if replication is broken.

Command syntax

show uccx dbreplication servers *[options]*

Options

- **Page—**Displays the output one page at a time
- **File—**Stores the output to a file and displays the filename

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show uccx dbreplication servers
SERVER                 ID STATE    STATUS     QUEUE  CONNECTION CHANGED
-----------------------------------------------------------------------
10.76.253.106        110 Active   Connected       0 Apr  7 22:01:19
10.76.253.107        100 Active   Local           0
```

utils uccx modify remote_IPAddress

This command is available only in the High Availability deployment of Unified CCX. This command updates IP address of remote node in the server. Use this command during IP address change of remote node.

Note Use this command only when the IP address of the other node is going to be changed.

After you run this command, reboot the Unified CCX server and restart all the Unified CCX services.

Command syntax

utils uccx modify remote_IPAddress <remote_server_old_ip_address> <remote_server_new_ip_address>

Arguments

remote_server_old_ip_address—Old IP address of the remote server

remote_server_new_ip_address—New IP address of the remote server

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx modify remote_IPAddress 10.76.253.82 10.76.253.83
 Old Remote IP Address: 10.76.253.82
 New Remote IP Address: 10.76.253.83

This command should be executed only in case you are changing IP Address
 of remote server.
Are you sure you want to run this command?
Continue (y/n)?y
 Command successful.
```

utils uccx modify remote_hostname

This command is available only in the High Availability deployment of Unified CCX. This command updates hostname of remote node in the server. Use this command during hostname change of remote node.

Note Use this command only when the hostname of the other node is changed.

After you run this command, reboot the Unified CCX server and restart all the Unified CCX services.

Command syntax

utils uccx modify remote_hostname < remote_server_old_hostname> <remote_server_new_hostname>

Arguments

remote_server_new_hostname—New hostname of the remote server

remote_server_old_hostname—Old hostname of the remote server

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx modify remote_hostname uccx-node-1 uccx-node-2
 Old Remote Hostname: uccx-node-1
 New Remote Hostname: uccx-node-2

This command should be executed only in case you are changing Host name
of remote server.
 Are you sure you want to run this command?
Continue (y/n)?y
Command Successful.
```

utils uccx database forcedatasync

This command gets the data from the other node in the cluster, effectively overwriting the data on this node.

Command syntax

utils uccx database forcedatasync

Arguments

None

Options

None

Requirements

Level privilege: 1

Command privilege level: 0

Allowed during upgrade: No

Example

```
admin: utils uccx database forcedatasync
Are you sure you want to overwrite the local database? (y/n).
 Command successful.
```

utils uccx setuppubrestore

This command sets up a passwordless communication between Unified CCX cluster nodes. Passwordless communication is required to perform the restore operation. Execute this command only on the subscriber node. Use this command while running restore using the "Publisher Only" option.

Note This command is available only in high availability mode.

Command syntax

utils uccx setuppubrestore

Example

```
admin:utils uccx setuppubrestore
```

utils uccx dbreplication setup

This command is available only in the High Availability deployment of Unified CCX. This command is used to set up database replication. The command can be executed on any node and it sets up database replication in the cluster.

Command syntax

utils uccx dbreplication setup

Options

Page—Displays the output one page at a time

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx dbreplication setup
The DB replication for the UCCX cluster has been setup.
```

utils uccx dbreplication status

This command is available only in the High Availability deployment of Unified CCX. This command is used to check the Unified CCX database replication status.

Command syntax

utils uccx dbreplication status

Options

None

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
utils uccx dbreplication status
SERVER                 ID STATE    STATUS     QUEUE  CONNECTION CHANGED
-----------------------------------------------------------------------
g_alpha_ha_n1_uccx      1 Active   Connected       0 Aug  8 18:45:26
g_alpha_ha_n2_uccx      2 Active   Local           0


-----------------------------------------------------------------
REPLICATE                                                STATE
-----------------------------------------------------------------
db_cra:informix.agentconnectiondetail                    Active
db_cra:informix.contactcalldetail                        Active
db_cra:informix.contactroutingdetail                     Active
db_cra:informix.eememailstatusdescription                Active
db_cra:informix.eemreasoncodedescription                 Active
db_cra:informix.eemcontactemaildetail                    Active
db_cra:informix.eememailagentstatedetail                 Active
db_cra_repository:informix.promptsfoldertbl              Active
db_cra_repository:informix.promptsfiletbl                Active
db_cra_repository:informix.grammarsfiletbl               Active
db_cra_repository:informix.documentsfiletbl              Active
db_cra_repository:informix.sysgrammarsfiletbl            Active
```

```
db_cra_repository:informix.latestsynchedtime            Active
fcrassvr:informix.fcrascalllogweek                      Inactive
fcrassvr:informix.fcrasrecordlog                        Inactive
fcrassvr:informix.latestsynchedtime                     Inactive
db_cra:informix.agentstatedetail                        Active
db_cra_repository:informix.scriptsfiletbl               Active
fcrassvr:informix.fcrascalllogtoday                     Inactive
db_cra:informix.monitoredresourcedetail                 Active
db_cra:informix.latestsynchedtime                       Active
db_cra:informix.eemactiveemail                          Active
db_cra_repository:informix.grammarsfoldertbl            Active
db_cra_repository:informix.documentsfoldertbl           Active
db_cra_repository:informix.scriptsfoldertbl             Active
fcrassvr:informix.fcrasstatelogtoday                    Inactive
db_cra:informix.contactqueuedetail                      Active
db_cra:informix.remotemonitoringdetail                  Active
db_cra:informix.eemstatedescription                     Active
db_cra:informix.eemqueueagentdetail                     Active
db_cra_repository:informix.sysgrammarsfoldertbl         Active
--------------------------------------------------------------------
```

utils uccx dbreplication templatestatus

This command is available only in the High Availability deployment of Unified CCX. This command is used to see the template status of the database replication.

Command syntax

utils uccx dbreplication templatestatus

Options

Page—Displays the output one page at a time

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx dbreplication templatestatus
The DB replication templatestatus is as follows.
```

utils uccx dbreplication repair

This command is available only in the High Availability deployment of Unified CCX. You can run this command on any node. This command repairs mismatched data between cluster nodes; it does not repair replication setup. The command initiates the repair, which executes in the background. To monitor the status of the repair process, the user must go to the data store control center in Serviceability Administration. For more information, see the *Cisco Unified Contact Center Express Serviceability Administration Guide* available at:

http://www.cisco.com/en/US/products/sw/custcosw/ps1846/products_installation_and_configuration_guides_list.html

Command syntax:

utils uccx dbreplication repair [database_name]|all

Arguments

[database_name]|all—(Mandatory) Database_name, which database to repair replication on. (Argument) all**—**Fix replication on all nodes.

Options

Page—Displays the output one page at a time

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx dbreplication repair all
Repair has been initiated in the background...
Please go to Data Control Center in Serviceability Admin to monitor the
status of the repair.
```

utils uccx dbreplication start

This command is available only in the High Availability deployment of Unified CCX. This command is used to start the database replication. Run this command on any node to start database replication in the entire cluster.

Command syntax

utils uccx dbreplication start

Options

Page—Displays the output one page at a time

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx dbreplication start
The DB replication for the UCCX cluster has been started.
```

utils uccx dbreplication stop

This command is available only in the High Availability deployment of Unified CCX. This command is used to stop database replication. Run this command on any node to stop database replication in the entire cluster.

Command syntax

utils uccx dbreplication stop

Options

Page—Displays the output one page at a time

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx dbreplication stop
The DB replication for the UCCX cluster has been stopped.
```

utils uccx dbreplication reset

This command is available only in the High Availability deployment of Unified CCX. This command is used to reset the database replication. Resetting replication involves the following activites, in the same order, and is equivalent to the commands presented in parentheses.

- Remove database replication (utils uccx dbreplication teardown)
- Setup database replication (utils uccx dbreplication setup)
- Initiate a data repair process for all the databases (utils uccx dbreplication repair all)

Command syntax

utils uccx dbreplication reset

Options

Page—Displays the output one page at a time

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx dbreplication reset
The DB replication for the UCCX cluster has been reset.
```

utils uccx dbreplication teardown

This command is available only in the High Availability deployment of Unified CCX. This command is used to remove the database replication. Running this command on any node with the cluster removes database replication between all nodes.

Command syntax

utils uccx dbreplication teardown

Options

page—Displays the output one page at a time

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:utils uccx dbreplication teardown
The DB replication for the UCCX cluster has been teardown.
```

Cisco Finesse Commands

utils reset_3rdpartygadget_password

Run this command to set or reset the password of the 3rdpartygadget account (where password is the new password for the account).

Use the 3rdpartygadget account to upload third-party gadgets to the Cisco Unified CCX Server so that you can use the gadgets from Cisco Finesse. Before you use this account, you must set the password.

Note The password length must be between 5 and 32 characters long and must not contain spaces or double quotes.

Command syntax

utils reset_3rdpartygadget_password

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

```
admin: utils reset_3rdpartygadget_password
New Password:
```

```
Confirm New Password:

Updating password for 3rdpartygadget...

Password updated successfully.
admin
```

Note Password values entered by the user is not echoed on the console.

Cisco Unified Intelligence Center Commands

show cuic component-status

This command shows the status of the Unified Intelligence Center components. The *Component name* parameter is mandatory.

Command syntax

show cuic component-status *Component name*

Component name

- **CuicStatus—**Shows status of Unified Intelligence Center web engine and the DB replication
- **DBRepStatus—**Shows status of database replication on this node
- **DBStatus—**Shows the database status
- **EmailStatus—**Shows status of the emailer component
- **SchedulerStatus—**Shows status of the report scheduler
- **DataSourceConnectionStatus—**Shows a data source connection status

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: No

Example

```
admin:show cuic component-status EmailStatus
```

show cuic properties

This command shows information about Cisco Unified Intelligence Center properties.

Command syntax

show cuic properties [options]

Options

- **host-to-ip—**Current host-to-IP translation for the Cisco Unified Intelligence Center databases in the cluster
- **http-enabled—**Displays the value *on* or *off* depending on the current value that is set for the http-enabled property
- **purge-retention—**Number of days data is retained in the Cisco Unified Intelligence Center database before it is purged
- **purge-time—**Time of day and the regular interval in minutes when the Cisco Unified Intelligence Center database is purged
- **session-timeout—**Session timeout for the Cisco Unified Intelligence Center web applications

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:show cuic properties purge-retention
purge_retention
===============
1
```

show cuic tech

Command syntax

This command provides technical details on the Cisco Unified Intelligence Center setup, such as database tables, triggers, procedures and so on.

show cuic tech procedures

This command displays the stored procedures in use for the database.

show cuic tech systables

This command displays the names of all the tables in the Unified Intelligence Center database.

show cuic tech dbschema

This command displays the database schema in a CSV file. This displays output to a `.csv` file.

show cuic tech table table_name

The command shows the contents of a table on the Unified Intelligence Center database. This displays output to a `.out` file.

show cuic tech triggers

This command displays Unified Intelligence Center table names and the triggers associated with those tables.

show cuic tech table cuicreport

This command redirects the contents of the specified database table into a file.

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: No

Example

```
admin:show cuic tech dbschema
------------show cuic tech dbschema--------------
Database schema
Output is in /cm/trace/dbi/dbSchema1331705967878.csv
Use "file view activelog/cm/trace/dbi/dbSchema1331705867878.csv" command
 to see output
```

```
admin:show cuic tech systables
--------Show cuic tech system tables-----------
SYSTEM TABLES
tabname
===================
GL_COLLATE
GL_CTYPE
VERSION
cdr_deltab_000657
cdr_deltab_000658
cdr_deltab_000659
cdr_deltab_000660
cdr_deltab_000661
cdr_deltab_000662
cdr_deltab_000663
cdr_deltab_000664
cdr_deltab_000665
cdr_deltab_000666
cdr_deltab_000667
cdr_deltab_000668
cdr_deltab_000669
cdr_deltab_000670
cdr_deltab_000671
cdr_deltab_000672
cdr_deltab_000673
cdr_deltab_000674
```

```
admin:show cuic tech table ?
Syntax:
   show cuic tech table table_name
   table_name mandatory table name
```

```
admin:show cuic tech triggers
-------------show cuic tech triggers---------

Triggers
tablename  trigger
==========================================

cuiccategory          tr_del_category
cuiccategory          tr_ins_category
cuiccategory          tr_upd_category
```

```
cuiccollection        tr_del_collection
cuiccollection        tr_ins_collection
cuiccollection        tr_upd_collection
cuicdashboard         tr_del_dashboard
cuicdashboard         tr_ins_dashboard
cuicdashboard         tr_upd_dashboard
cuicdatasource        tr_del_datasource
cuicdatasource        tr_ins_datasource
cuicdatasource        tr_upd_datasource
cuicreport            tr_del_report
cuicreport            tr_ins_report
cuicreport            tr_upd_report
cuicreportdefinition  tr_del_reportdefinition
cuicreportdefinition  tr_ins_reportdefinition
cuicreportdefinition  tr_upd_reportdefinition
cuicuser              tr_upd_userdefaultgroup
cuicvaluelist         tr_del_valuelist
cuicvaluelist         tr_ins_valuelist
```

show cuic trace

This command shows the log level and trace masks of the given subsystem. If the logging level is set to DEBUG, the trace mask is displayed. If the logging level is set to INFO, the trace masks are not displayed.

The command is case sensitive and can only be run on the Controller node.

To set traces on the member nodes, use the Operations Console command **Device Management > Log And Trace Settings**.

Command syntax

show cuic trace cuicserver [options]

Options

This consists of the subsystems of Unified Intelligence Center. The various subsystems available are:

- CUIC
- Infrastructure
- CUIC_MODEL_OBJECTS
- CUIC_DATA_PROCESSING
- CUIC_SECURITY
- CUIC_DISPLAY
- CUIC_MIGRATION
- CUIC_USER_HISTORY
- CUIC_JSP
- CUIC_STATISTICS

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: No

Example

```
admin:show cuic trace cuicserver Infrastructure
Log levels are not set - assumed to be Basic
Since log level is basic trace masks are not in effect for Infrastructure
```

set cuic properties

Use these commands to set values for the Unified Intelligence Center database and session timeout.

Command syntax

set cuic properties host-to-ip

Parameter

host—Enter the value for the host DNS name for the server, as displayed on the Data Sources interface

ip_adddress—Enter the IP address of the server for the historical or real-time database

set cuic properties session-timeout

Parameter

#numberofSeconds—This command sets the session timeout for the Unified Intelligence Center Reporting web application. The default is 14,400 seconds (4 hours).

Requirements

Level privilege: 0

Command privilege Level: 0

Allowed during upgrade: Yes

Example

```
admin:set cuic properties session-timeout 1900
Value has been successfully set
```

unset cuic properties

Use this command to unset the translation of host-to-IP hostname.

Command syntax

unset cuic properties host-to-ip [hostname]

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:unset cuic properties host-to-ip ccxbox1
```

set cuic syslog

Command syntax

set cuic syslog [disable|enable]

Options

- **disable—**To disable Cisco Unified Intelligence Center application remote syslogs
- **enable—**To enable Cisco Unified Intelligence Center application remote syslogs

Requirements

Level privilege: 0

Command privilege level: 0

Allowed during upgrade: Yes

Example

```
admin:set cuic syslog enable
```

set cuic trace

Use these commands to set or change the log levels and trace setting for the subsystems of two server processes (cuicserver and oampserver) to basic or detailed.

Command Syntax

set cuic trace basic *cuicserver [subsystem] none*

set cuic trace basic *oampserver [subsystem] none*

set cuic trace infrastructure *cuicserver [subsystem] [TRACE_FLAGS | none]*

set cuic trace infrastructure *oampserver [subsystem] [TRACE_FLAGS | none]*

set cuic trace subsystem *cuicserver [subsystem] [trace_mask1 trace_mask2]*

set cuic trace subsystem *oampserver [subsystem] [trace_mask1 trace_mask2]*

For cuicserver, the valid subsystems are:

- Infrastructure
- CUIC
- CUIC_MODEL_OBJECTS
- CUIC_DATA_PROCESSING
- CUIC_SECURITY
- CUIC_DISPLAY
- CUIC_MIGRATION

- CUIC_USER_HISTORY
- CUIC_JSP
- CUIC_STATISTICS

For oampserver, the valid subsystems are:

- Infrastructure
- OAMP_BO
- OAMP
- WSM_BO

Detailed log levels are set by enabling trace flags, which allows debug statements to appear in the logs. You can control debug tracing for specific functionalities (specified in the TRACE flag name), within specific subsystem components.

basic indicates to set a basic level of tracing. With this setting, messages and warnings are displayed.

detailed indicates to set a debug level and allows you to turn on tracing for specific components.

subsystem indicates the subsystem you are setting and displays the list of all valid subsystems.

none indicates that you do not want to set a flag for tracing.

Requirements

Level privilege: 1

Command privilege level: 1

Allowed during upgrade: Yes

Example

```
admin:set cuic trace basic cuicserver CUIC_SECURITY
Log level updated successfully. Trace masks are cleared
```

utils cuic purge

Command Syntax

utils cuic purge

This command runs a manual purge of the cuic database tables. You might do this if you receive an alert that the database is nearing capacity and you do not want to wait for the daily automatic purge.

The tables purged are:

- CuicDataSetInfo
- CuicDataSet
- CuicReportDefinitionFilter
- CuicReportDefinitionFilterField
- CuicReportDefinitionFilterParameter
- CuicCollection

- CuicCollectionValue

This command prompts for the password of the administration user. When the password is confirmed, the purge runs immediately.

Options

None

Requirements

Level privilege—1

Command privilege level—1

Allowed during upgrade—Yes

Example

```
admin:utils cuic purge
Executed Purge Sucessfully
```