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# **Cisco Prime Collaboration 10.0**

# Deliver superior end-user quality of experience and lower operating expenses with simplified, unified management across voice and video collaboration networks.

Enterprise networks are undergoing continuous transformation as organizations invest in next-generation collaboration technologies with integrated voice and video deployments. IT departments must be empowered to effectively manage this transformation and the lifecycle of these networks, services, endpoints, and collaboration architectures. They also must meet demands from end users for anywhere, anytime network access with consistent high quality of service. At the same time, these organizations are under increasing pressure to reduce operating expenses and optimize limited resources.

Traditional siloed, nonintegrated management tools have made it difficult for collaboration network operators to quickly and effectively troubleshoot issues, provision new users, or perform changes. The result is collaboration network management operations that are complex, manual, error prone, and inefficient.

Cisco Prime<sup>™</sup> Collaboration addresses these challenges by providing simplified, unified management for voice and video networks. The solution helps ensure a superior end-user quality of experience, lowers operating expenses, and allows enterprises to extract the full value from their unified communications and collaboration technology investment.

#### **Cisco Prime Collaboration Overview**

Cisco Prime Collaboration removes management complexity and provides automated, accelerated provisioning, real-time monitoring, proactive troubleshooting, and long-term trending and analytics in one integrated product. The solution delivers a premier operations experience through an intuitive user interface and optimized operator methodology, including automated workflows that ease implementation and ongoing administration.

#### Provisioning

Provisioning features include automated processes for Cisco<sup>®</sup> Unified Communications and Cisco TelePresence<sup>®</sup> 1 initial deployments and for "day-2" moves, adds, changes, and deletions (MACDs). An intuitive user interface provides a single view of a subscriber and the subscriber's services (see Figure 1) as well as a consolidated view of subscribers across the organization. With these capabilities, Cisco Prime Collaboration significantly accelerates site rollouts and dramatically reduces the time required for ongoing changes, resulting in exceptional productivity gains and lower operating expenses. In addition, by significantly simplifying moves, adds, and changes, the solution facilitates delegation of these tasks - allowing organizations to optimize IT resources and further reduce total cost of ownership.

#### Figure 1. User/Subscriber Services View

cisco	Cisco Prime Collaboration	6	Home Design 🔻 Deploy 🔻 Reports 🔻 Administration 🔻	Change Pas	sword	<b>P00</b>
New Se	al Settings		Service Details Found 7 Services. 🔁			
					Show All	- 8
Provision	rovisioning History		Service Name	Processor	Last Update	
Found 4	Orders. 😰		Extension Mobility Access (Cisco 9971: tgerbic-1)	ccm_10-CiscoUnifiedCM	12-09-2013 02:28:42	
Orders	Status	Date	- Extension Mobility Line (23306)	ccm_10-CiscoUnifiedCM	12-09-2013 02:28:42	
74	COMPLETE	12-09-2013	Endpoint (Cisco Jabber for iPhone: TCTMYPHONE)	ccm_10-CiscoUnifiedCM	12-09-2013 02:35:49	
	COMPLETE	12-09-2013	Endpoint (Cisco TelePresence EX90: SEP098734568203)	ccm_10-CiscoUnifiedCM	12-09-2013 02:28:42	
73		12-09-2013	- Line (23305 Tony Gerbic)	ccm_10-CiscoUnifiedCM	12-09-2013 02:28:42	
72	COMPLETE	12-09-2013	- Voicemail (23305)	uc_10.0.1-CiscoUnityCon	12-09-2013 02:38:52	
71	COMPLETE	12-09-2013	User Services (User Services Enabled)	ccm_10-CiscoUnifiedCM	12-09-2013 02:35:43	

#### Assurance

Cisco Prime Collaboration provides efficient, integrated service assurance management through a single, consolidated view of the Cisco voice and video collaboration environment. This includes continuous, real-time monitoring and advanced troubleshooting tools for Cisco Unified Communications and Cisco TelePresence systems including the underlying transport infrastructures, as seen in Figure 2.

#### Figure 2. User-Defined Summary View



Cisco Prime Collaboration proactively notifies operators of issues and facilitates speedy resolution of problems through proactive fault detection and rapid isolation using purpose-built diagnostic tools. For video, the solution allows operators to view end-to-end session paths over Cisco and third-party devices, and on Cisco Medianet routers, jitter and packet loss statistics help pinpoint hotspots affecting session quality (see Figures 3 and 4). As a result, Cisco Prime Collaboration expedites operator resolution of service quality issues before affecting end users - for a superior end-user collaborative experience.









#### Longer Term Trending and Analysis

Using the Analytics module, Cisco Prime Collaboration also provides historical reporting of key performance indicators (KPIs) and helps enable IT network managers to analyze trends for capacity planning, resource optimization, and quality of service. The solution helps track collaboration technology adoption rates in the network and provides metrics to help analyze how users are actually using the collaboration endpoints daily (see Figure 5). It also provides insights into key collaboration network resource usage trends. With one year's worth of historical data, many options to slice and dice the reports, and easy report customization, Cisco Prime Collaboration provides actionable information to IT managers, planners, and executives. This information simplifies the long-term planning process, informs ongoing technology investment decisions, and helps optimize the network configuration to improve end-user quality of experience.



#### Figure 5. Analytics Technology Adoption View

#### **Features and Benefits**

Table 1 gives a summary of the features and benefits of Cisco Prime Collaboration.

#### Table 1. Cisco Prime Collaboration Features and Benefits Summary

Feature	Benefits	
Voice and Video Management on a Single Pane of Glass		
Single product with an integrated view of all statistics and alarms	<ul> <li>Simplify management of voice and video and lower costs</li> <li>Reduce hardware expense and administration</li> <li>Reduce training expenses</li> </ul>	
Single login for all options with Lightweight Directory Access Protocol (LDAP) support	Increase operating efficiencies	
Cisco Best Practices		
Alignment with Cisco collaboration products	Help ensure high network availability and quality of service using monitoring and troubleshooting capabilities that are fine-tuned to Cisco collaboration applications	
Day-1 support	Enjoy day-1 support of new Cisco collaboration product releases to help ensure up-to- date coverage with no manageability gaps	
IPv6 support	Provision and monitor IPv6 endpoints	

# **Cisco Prime Collaboration Provisioning**

Day-1 Voice and Video Provisioning		
Single interface for call control, messaging, presence, and video	Accelerate provisioning tasks	
Video infrastructure and endpoint provisioning	Promote greater adoption of Cisco TelePresence through large-scale provisioning of Cisco TelePresence infrastructure and Cisco Unified Communications Manager registered endpoints	
Configuration templates	<ul> <li>Create consistent overall network implementation by defining standard configurations that can be used in situations such as rolling out new offices, locations, remote sites, or organizational overlays</li> </ul>	
	Reduce troubleshooting time	
Provisioning policy settable at several levels	Provide policy and domain control for administrators handling day-2 provisioning by automating provisioning based on preset policies for services, service areas, and subscriber types	
Batch provisioning	Increase operating efficiencies and reduce costs with scheduled scripts and templates for batch provisioning that let an operator rapidly and consistently add or modify a large number of users or a large number of endpoints/device profiles (and the corresponding configuration settings). A single batch can act across an entire unified communications/telepresence network	
Day-2 Voice and Video Provisioning		
Automated processes	Greatly reduce the time required to move, add, change, or delete voice users and their services	
	<ul> <li>Easily delegate MACD tasks for operational efficiencies and savings</li> </ul>	
	Improve provisioning accuracy	
Delegation of MACD tasks	<ul> <li>Allow MACD requests to be met without requiring an underlying knowledge of the voice and video applications</li> </ul>	
	<ul> <li>Assign domain and service areas to administrators and promote greater operational control by making sure that MACD activities are limited to parameters set for each administrator</li> </ul>	
Batch operations	<ul> <li>Perform mass user additions or changes using a consistent approach for easier system maintenance - including batch operations across multiple unified communications clusters; for example, user service management can be spread across call control and voicemail in the same batch line</li> </ul>	
	<ul> <li>Improve administrator productivity with batch scheduling</li> </ul>	
End-user policy assignment	Promote greater operational control with policy for services and devices defined by the roles of the user	

Operational Tracking for Provisioning		
Order tracking	Provide greater operational control by tracking changes made to infrastructure and user services, including order number, operator placing the order, end user, and date and time	
Audit trail	Promote accountability and network security and facilitate troubleshooting by tracking login, logout, IP address, time and date, time logged in, and reason for logout (as well as PIN and password changes)	
Northbound Interfaces		
Web services interface	Ease automation of provisioning workflow and query of service inventory	
Northbound provisioning API	Integrate easily with custom applications, web service portals, and human resources systems for automated, consistent service provisioning. An SDK is provided with example code	

# **Cisco Prime Collaboration Assurance**

Fault Monitoring					
At-a-glance and real-time status views of all faults in the collaboration network	Expedite operator resolution of issues				
Event correlation that streamlines dependent events into fewer alarms	Reduce alarm clutter				
Guided alarm diagnosis using contextual actions	Promote operator efficiency by limiting actions to those appropriate to the selected device				
View of third-party events created from any syslog, basic MIB 2 device or Linux/Windows server	Enjoy greater operator flexibility to monitor more device types				
Automatic forwarding of alarms as emails (with URL links) to access assurance features directly from the email with device context	Notify operators even when they are not viewing the management system, reducing downtime and helping to ensure that critical alarms are not missed				
Automatic forwarding of filtered alarms as traps to other management systems	Integrates the actionable alarms created by the Cisco Prime Collaboration Assurance module into other management systems, providing easy integration with existing operational support systems				
At-a-Glance Dashboards					
Device, endpoint, and user views such as End-user Impact, Collaboration Infrastructure Summary, and TelePresence Endpoint Utilization Summary	<ul> <li>Get at-a-glance consolidated information for devices, applications, and endpoints</li> <li>Visualize all endpoints for a user using a single interface</li> <li>Quickly determine service experience for all endpoints</li> </ul>				
Key performance indicator views	<ul> <li>Improve mean time to repair (MTTR) with statistics summary displays that focus the operator on the KPIs for the devices most affected</li> <li>Promote proactive troubleshooting and efficient operations with information tailored to each operator's preference</li> </ul>				
Direct launch into troubleshooting best practices and diagnostic screens	<ul><li>Reduce key clicks</li><li>Reduce training requirements</li></ul>				
Performance Monitoring					
Monitoring of collaboration resource usage	Enjoy greater visibility into critical performance metrics of each managed element				
Graphical views for side-by-side comparison of selected metrics with "zoom-in" capabilities	Reduce troubleshooting time and effort with statistical charts that overlay multiple KPIs for a device with up to one week's worth of data, allowing the operator to zoom in to any part of the display time frame				
Export of tabular content in comma- separated value (CSV) format	Promote further data analysis and collaboration among teams				
Quality of Service Monitoring					
Mean Opinion Scores (MOSs) that measure and identify jitter, packet loss, and delay that notify operators of impairments in the network	Improve quality of service by isolating quality issues in each device pool and identify site-level problems				
Deployment of the Cisco 1040 Sensors or the Cisco Prime Network Analysis Module (NAM) to improve the MOS granularity, sampling and reporting every 60 seconds	Improve quality of service and sample in multiple locations to reduce the time needed to isolate problems				
Video quality measurements during sessions and	Help ensure that each video session is the highest quality				

presession simulations					
Diagnostics and Testing					
Jitter, packet loss, differentiated services code point (DSCP), and percent utilization information for Cisco IP service-level agreement (IP SLA) and Medianet-	<ul> <li>Quickly and efficiently isolate network impairments in real time with testing and diagnostic features built into Cisco network devices</li> <li>Easily identify configuration issues that can reduce guality for voice and video</li> </ul>				
equipped Cisco devices	endpoints				
Scheduled pretesting of key components and circuits using end-to-end site connectivity tests, unified communications application feature tests, and WAN link performance tests	Assure service readiness and the highest quality end-user experience				
Automatic display of technology-specific diagnostic views based on the device selected	Reduce time to isolate problems and training expense with guided troubleshooting workflows and smart-links to the recommended test or measurement display				
KPI charts that display, in a single view, the most important information for the device or device grouping	Expedite troubleshooting by reducing the number of key clicks and open windows needed to collect enough information to identify and resolve a problem				
Dynamic statistical overlay charts that allow multiple KPI charts to be overlaid, providing a single time reference	Improve diagnostic efficiency with user-selected statistical overlays that align related measurements in time to make it easier to identify cause and effect				
Northbound Interface					
Northbound alarms in Simple Network Management Protocol (SNMP) trap format based on Cisco Prime Collaboration MIB	Integrate easily with existing operational support systems, providing the same actionable collaboration alarms and events to another network management system				
Short-term Reports (up to 7 Days) for Day-to-Day Operations and Troubleshooting					
Complete collaboration inventory of infrastructure and endpoints with serial numbers, firmware versions, locations, and much more	Reduce time spent collecting inventory information by providing flexible reporting from the Cisco Prime Collaboration database				
Tracking of patterns with quality history information including call quality measurements and event reports	Improve uptime by reviewing key metrics and event history across the collaboration network in a concise report format				
Tracing of Cisco TelePresence usage patterns and resource loading video session utilization	Identify over- or underused endpoints for better capacity planning and to drive efficient usage practices				
Provisioning details on the voice users, services, and resource configurations	Quickly generate a services summary to efficiently identify service and asset deployment across the voice part of the collaboration network				
Activity details on phone moves and changes	Help manage a large phone deployment by tracking all phone movement in a networkwide report, reducing troubleshooting time and improving overall inventory management				

## **Cisco Prime Collaboration Analytics**

Cisco Prime Collaboration Analytics - Long Term Reporting and Analysis	
Technology Adoption	Visualize the speed of deployment; track service usage distribution by endpoint model and type; determine voice and video service consumption trends
Asset Usage	Analyze trends for least used endpoints
Traffic Analysis	View statistics on dialed numbers, off net calls, call traffic per location, and traffic type (local, internal, external, and more)
Service Experience	Help ensure high end-user satisfaction by monitoring call failure trends, service quality distribution by location, and most impacted endpoints
Capacity Analysis	Track the Average Bouncing Busy Hour to determine traffic load and detect trunk capacity; analyze CAC bandwidth, conferencing MCUs, and trunk utilization

## Cisco Prime Collaboration Standard and Advanced

Cisco Prime Collaboration Standard is included with all Cisco Unified Workspace Licensing and Cisco User Connect Licensing for Cisco Unified Communications, taking the complexity out of provisioning and monitoring your voice and video deployments. For deployments requiring more advanced management capabilities, Cisco Prime Collaboration Advanced offers additional automation, deeper diagnostics, and long-term reporting.

### Cisco Prime Collaboration Advanced Licensing and Ordering Information

Cisco Prime Collaboration is a licensed software product that is secured to the MAC of the host server. Licensing is ordered based on the collaboration management options required (Assurance, Provisioning, or Analytics) and the endpoint type (Phone or Cisco TelePresence) and the quantity of those endpoints.

When ordering Cisco Prime Collaboration, the Assurance, Analytics, and Provisioning modules are options, available separately or in bundles. Cisco Prime Collaboration Analytics requires Cisco Prime Collaboration Assurance to be installed first since it provides all the raw data to the Analytics module.

#### **Upgrade Information**

Cisco Prime Product Assured Software Subscription allows prepayment for major upgrades to Cisco Prime Collaboration 9.5 and 10.0 for 1-, 2-, 3-, or 5-year subscription contracts. It works in conjunction with the Cisco Essential Services (ESW) maintenance plan, whereby ESW provides Cisco Technical Assistance Center (TAC) support and access to minor updates and patches from the cisco.com software download site.

For system requirements, please refer to the Cisco Prime Collaboration Quick Start Guide.

To place an order, visit the <u>Cisco Ordering Home Page</u>. To download trial software, visit the <u>Cisco Promotional</u> <u>Software Store</u>.

#### Service and Support

Using the Cisco lifecycle services approach, Cisco and its partners provide a broad portfolio of end-to-end services and support that can help increase your network's business value and return on investment. This approach defines the minimum set of activities needed, by technology and by network complexity, to help you successfully deploy and operate Cisco technologies and optimize their performance throughout the lifecycle of your network.

#### For More Information

For more information about Cisco Prime Collaboration, visit <u>http://www.cisco.com/go/primecollaboration</u> or contact your Cisco account team or channel partner.



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