Cisco Finesse
The Next Generation Agent Experience

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BRKCCT-1031
Use Cisco Spark to communicate with the speaker after the event!

What if I have a question after visiting Cisco Live? ... Cisco Spark

How

1. Go to the Cisco Live Mobile app
2. Find this session
3. Click the join link in the session description
4. Navigate to the room, room name = Session ID
5. Enter messages in the room

Spark rooms will be available until July 29, 2016
Agenda

• Business Overview
• Finesse 11.5 Features
• Deploying Finesse
• Migrating from CAD & CTI-OS
• Cisco-on-Cisco Case Study: Our Internal CTI-OS to Finesse Migration + Demo
• Q&A
Business Overview
Cisco Finesse
Revolutionizing the Contact Center Agent Experience

- Browser-based agent desktop for easy management & upgrades
- Designed to empower agents via user-centered design product
- Flexible and Expandable – Finesse is a web gadget container
  - All applications that agents need (Cisco or 3rd party) contained within Finesse
  - Administrators define agent and supervisor layouts
- Developer Friendly Web API
Enterprise Mash-ups
Enabling Unified Desktops for Agents

- Gadget Architecture enables easier integration
- Gadget Upgrades handled by each server
- Reduces version compatibility dependencies
Cisco Finesse Workflows

- Customers require a way of triggering screen pops or passing data to other applications without custom development.
- Finesse delivers this functionality via flexible workflows.
- Finesse supports the ability to do a browser screen pop or call a REST API on Finesse or a 3rd party application.

Define **events** that trigger the workflow

Evaluate **conditions** to see if workflow applies to this customer or agent

A resulting **workflow action** is performed
Finesse 11.5 Feature Set
SSO support for CC 11.5

- Single Sign-on for Agent and Supervisor interfaces
- Solutions: CCX, P/CCE, HCS
- Components: Finesse, CUIC, MediaSense, Transaction API

- Exclusions:
  - Applications built using the Finesse API
  - >4k Scale
  - IdP limited to ADFS
  - Finesse IP Phone Agents cannot be SSO enabled
  - CCE Remote DC (>80 ms RTT)
SSO enabled deployment

This is a place holder page, Final Idp served page would be subject to deployment

Finesse home page

Clears the local cookie
Enterprise Chat and Email

Enterprise-grade functionality for email, chat, call back for web and mobile
Integral part of CCE 11.5
Context Service in Finesse
Integrate any task routing with CCE
Simplified REST APIs

Routing, Administration & Reporting via CCE
Out-of-the-box Context Service integration
Cross domain calls to the Finesse API (CORS)

Simplification needed in current deployments using 3rd party web applications:

- **Current usage =>**
  - A gadget needs to be hosted in the external system
  - A package needs to be hosted in the Finesse server

- **Business need =>**
  - Host the complete application in the external system

- **Solution =>**
  - Cross domain calls to the Finesse API using CORS
  - Following header set in all Finesse REST API responses and BOSH HTTP responses: `Access-Control-Allow-Origin: *`
Incoming Call Toaster Notification

- The browser prompts the agent to show or block notifications
- Implemented via HTML5 (no browser plug-in required)
- Not Supported for Internet Explorer
Adjust Height of Team Performance Gadget

Configure the height of the gadget in layout file:

```xml
<gadget>/desktop/gadgets/TeamPerformance.jsp?maxRows=20</gadget>
```
# 11.5 Browser and OS Compatibility

<table>
<thead>
<tr>
<th>Operating System</th>
<th>Supported Browsers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Windows 7</td>
<td>Chrome 48 and higher</td>
</tr>
<tr>
<td>Windows 10</td>
<td>Internet Explorer 11</td>
</tr>
<tr>
<td></td>
<td>Firefox ESR 45 and higher ESR’s</td>
</tr>
<tr>
<td>Chromebook</td>
<td>Chrome 48 and higher</td>
</tr>
<tr>
<td>Mac OS</td>
<td>Firefox ESR 45 and higher ESR’s</td>
</tr>
</tbody>
</table>
CAD/CTI-OS
End-Of-Life Announcement
CAD/CTI-OS End Of Life Summary

- EOL process initiated in January 2015 for CCE & CCX
- CTI-OS will continue to be supported for ICM
- CCX 10.6 is the last release of CAD for CCX
- CCE 11.0 includes CTI-OS/CAD for upgrades only
- Finesse is the only desktop option for new CCE 11.0 customers
- CCE 11.5 is Finesse only
## CCX/CCE - CAD/CTI-OS EOL Timeline

<table>
<thead>
<tr>
<th>Date</th>
<th>Event</th>
</tr>
</thead>
<tbody>
<tr>
<td>Jan 2015</td>
<td>Formal EOL Announcement</td>
</tr>
<tr>
<td>July 2015</td>
<td>End of Sale</td>
</tr>
<tr>
<td>October 2015</td>
<td>Last Ship Date</td>
</tr>
<tr>
<td>July 2016</td>
<td>End of SW Maintenance</td>
</tr>
<tr>
<td>July 2018</td>
<td>Last Day of Support</td>
</tr>
</tbody>
</table>
High Level Architecture
High Level Architecture - CCE
Finesse Side A & B are Both Active

Cisco Finesse Server – Side A
Web Services  Gadget Container

Cisco Finesse Server – Side B
Web Services  Gadget Container

Cisco Finesse Agent 1

Cisco Finesse Agent 2

DB Replication for Configuration Data
High Level Architecture - CCX
One Finesse Server is active at a time

Cisco Finesse
Agent 1

Cisco Unified Contact Center Express - Primary

Cisco Finesse Subsystem

All other CCX Subsystems

Cisco Finesse
Agent 2

Cisco Unified Contact Center Express - Secondary

Cisco Finesse Subsystem

All other CCX Subsystems
High Availability Finesse for CCE
High Availability
Finesse Side A & B are Both Active

Cisco Finesse Server – Side A
Web Services   Gadget Container

Cisco Finesse Server – Side B
Web Services   Gadget Container

CCE PG Side A
CCE PG Side B

DB Replication for Configuration Data
High Availability
CCE PG Side A Fails…

Cisco Finesse Server – Side A
Web Services | Gadget Container

Cisco Finesse Server – Side B
Web Services | Gadget Container

DB Replication for Configuration Data

CCE PG Side B

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PG Failover - User Experience

Finesse Client detects that the Finesse Server is out of service....

- Banner message lets the agent know there is an issue
- The Finesse client calls the SystemInfo API on both Finesse servers to determine if any server is in service
- The Finesse Client will connect to whichever Finesse Server is in service
- Agents can continue to use 3rd party gadgets during failover
High Availability
Each Finesse Node Connects to CCE PG Side B

Cisco Finesse Server – Side A
Web Services | Gadget Container

Cisco Finesse Server – Side B
Web Services | Gadget Container

Cisco Finesse Agent 1
Cisco Finesse Agent 2

DB Replication for Configuration Data

CCE PG Side A
CCE PG Side B
When the Finesse Client finds a Finesse Server, the error message is dismissed and the agent can continue processing the call without an additional login.
High Availability
Finesse Server A Fails...

Cisco Finesse Agent 1

Cisco Finesse Agent 2

Cisco Finesse Server – Side A

Cisco Finesse Server – Side B

Web Services

Gadget Container

Web Services

Gadget Container

CCE

PG Side A

CCE

PG Side B

DB Replication for Configuration Data
Finesse Server Failover - User Experience

Finesse Client detects that the Finesse Server is out of service….

- Banner message lets the agent know there is an issue
- The Finesse client calls the SystemInfo API on both Finesse servers to determine if any server is in service
- The Finesse Client will connect to whichever Finesse Server is in service
- Agents can continue to use 3rd party gadgets during failover
High Availability
Finesse Automatically Fails Over to Side B

Cisco Finesse Server – Side A
Web Services
Gadget Container

Cisco Finesse Server
Agent 1

Cisco Finesse Server – Side B
Web Services
Gadget Container

Cisco Finesse Server
Agent 2

CCE
PG Side A
DB Replication for Configuration Data

CCE
PG Side B

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Finesse Client Redirects to the other Finesse Server—User Experience

When the Finesse Client finds a Finesse Server, the error message is dismissed and the agent can continue processing the call

Finesse automatically logs the agent in! No manual steps for the Agent!
High Availability
Finesse Server detects that the Client is Lost, waits 60sec and logs agent out
High Availability
Finesse Server is Down Before Client Logs In Requires Manual Failover to Side B
High Availability Finesse for CCX
Finesse for CCX High Availability

- All agents will be connected to the CCX Primary Node
- Finesse Subsystem and CCX will be in or out of service at same time
- Finesse wouldn’t be in-service and CCX out-of-service at same time or vice versa
Bandwidth Requirements
Cisco Finesse Bandwidth Calculator

- Takes aggregate call profile as input
- Outputs Client to Server bandwidth requirements
- Linked from CCE & CCX Design Guides

### Finesse Bandwidth Calculator
**Release 9.1**

**Customer Site Information**

<table>
<thead>
<tr>
<th>Value</th>
<th>Units</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of Agents</td>
<td>13</td>
<td>Agent(s)</td>
</tr>
<tr>
<td>Number of Supervisors</td>
<td>2</td>
<td>Supervisor(s)</td>
</tr>
<tr>
<td>Maximum Login Time for all users</td>
<td>1</td>
<td>minute(s)</td>
</tr>
</tbody>
</table>

**Call Center Information**

### Call Profile

<table>
<thead>
<tr>
<th>BHCA</th>
<th>30</th>
<th>calls/hour</th>
<th>Typically 30 calls per hour per agent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Agent Call Wrap-Up Time</td>
<td>30</td>
<td>second(s)</td>
<td></td>
</tr>
<tr>
<td>Average Call Duration</td>
<td>1800</td>
<td>second(s)</td>
<td></td>
</tr>
<tr>
<td>Calls Per Second</td>
<td>0.01</td>
<td>Calls/Second</td>
<td>Equal to (Number of Agents) / (Average Call Duration)</td>
</tr>
</tbody>
</table>

### Call Distribution

| Percentage of incoming Straight Calls | 90% | percent | 95% Straight Calls Typical |
| Percentage of Outgoing Straight Calls | 0% | percent |
| Percentage of Consultative Transfer Calls | 0% | percent | 10% Transfer Calls Typical |
| Percentage of Single-Stop Transfer Calls | 5% | percent |
| Percentage of Consultative Conference Calls | 5% | percent | 5% Conference Calls Typical |
| Total | 100% | percent | Adjust Call Distribution to equal 100% |
| Percentage of Calls that are silently monitored | 10% | percent |
| Percentage of Calls that are barged in on | 5% | percent | This will be less than or equal to the number of silent monitor calls |
| Percentage of Calls that are intercepted | 5% | percent | This will be less than or equal to the number of Barged Calls |

### CCE Configuration Information

| Average number of agents per Team | 30 | agent(s) | 0 Default, 50 agents per team maximum |
| Average number of Skill Groups per Supervisor | 10 | skill group(s) | 0 Default, 50 skill groups maximum |
| Number of performed skill groups on the PC | 30 | skill group(s) | 0 Default, 50 skill groups maximum |
# Finesse Client-Side Bandwidth Requirements

Login Bandwidth based on 1 minute login time for all agents.

<table>
<thead>
<tr>
<th></th>
<th>Non-Cache Login BW Requirements</th>
<th>Cached Login BW Requirements</th>
<th>Post Login BW Requirements</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Per Supervisor</strong></td>
<td>447 kbps</td>
<td>58 kbps</td>
<td>10 kbps</td>
</tr>
<tr>
<td><strong>Per Agent</strong></td>
<td>354 kbps</td>
<td>24 kbps</td>
<td>8 kbps</td>
</tr>
</tbody>
</table>

Avg. kbps Per Supervisor
Avg. kbps Per Agent

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Finesse for CCE Bandwidth Usage Example

- 1000 Agents
- 200 Supervisors
- 1 minute login time
- 3 minute calls
- 30 second wrap-up
- 2000 bytes ECC Data
- 1000 bytes Call Variables
- 85% Calls Inbound

Cisco Finesse Clients -> Cisco Finesse Server

<table>
<thead>
<tr>
<th>Login BW (All Users, No Cache)</th>
<th>432 mbps</th>
</tr>
</thead>
<tbody>
<tr>
<td>Login BW (All Users, Caching)</td>
<td>34 mbps</td>
</tr>
<tr>
<td>Post-Login BW (All Users)</td>
<td>12 mbps</td>
</tr>
</tbody>
</table>

| Total BW (All Users)           | 2.6 mbps |

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Managing Bandwidth with Finesse for CCX

- All Finesse clients connect to the Primary Node
- All users will redirect to the secondary node if the primary node goes down
- Finesse Server is co-located on CCX so no bandwidth required for Finesse Server to CCX connection
Best Practices for Managing Bandwidth

- **CCX & CCE** -- Ensure that Finesse login screen is cached before going into production (on both Finesse Servers) to minimize login page size

- **CCE** -- Equally distribute users across both Finesse servers to minimize the number of simultaneous users logging in upon failover

- **CCE** -- It is more important to optimize the network between Finesse Client-to-Server as compared to the Finesse Server-to-PG connection
CAD & CTI-OS Migration
Step #1 : Read CAD to Finesse Migration Whitepaper


Cisco Unified Contact Center Express

Selecting the Right Desktop for Your Cisco Unified Contact Center Express: Cisco Finesse or Cisco Agent Desktop

Introduction

This white paper is intended for those Cisco Unified Contact Center Express customers who are deciding between Cisco Finesse or Cisco Agent Desktop for the desktop. You will find valuable information in this white paper to help you understand the differences in features and functionality between Finesse and Cisco Agent Desktop. By learning how these differences affect your business and agent supervisor productivity, you will be able to make a well-informed decision about which solution is best for your business.

Finesse is a next-generation agent and supervisor desktop solution designed to meet the growing needs of agents, supervisors, and the administrators and developers who support them. Finesse offers numerous benefits, including:

- A 100-percent browser-based agent and supervisor desktop: Finesse runs in a browser, which means you install Cisco Unified Contact Center Express (CCX) and agents simply point their browser to the Unified CCX server. There is no client executable to install and maintain, which reduces total cost of ownership.
- A container architecture built for client-side integration: Finesse is more than an agent state and call control application. It is an OpenSocial gadget container, built to include third-party applications in a single agent desktop experience. Rather than switching between applications, agents will have easy access to all applications and tools from a single window, increasing agent efficiency.
- An easy-to-use API: The Finesse API is a modern, open-standards-based, web API, exposed via representational state transfer (REST). Each function available in the Finesse user interface (UI) has a corresponding REST API that allows all types of integrations for developers to use. The API's extensibility and ease of use is unprecedented on Unified CCX.

Feature Differences between Cisco Finesse and Cisco Agent Desktop

Before making a decision for your desktop, it is important that you understand the differences in features for Finesse and Cisco Agent Desktop. Licensing for Finesse is available as a Unified CCX Enhanced or Premium agent seat license.

Some key features in Cisco Agent Desktop are not yet available in Finesse. These features include:
Step #2 : Understand the Detailed Feature Set

Detailed Finesse feature set as compared to CTI-OS & CAD:


Key Post 11.5 Gaps:
- Agent-Agents Chat
- CAD Workflow Parity
- Historical Reports
- Recent Call List
- Personal Phonebooks
- Direct Transfer (CCX Only)
Step #3: Run a Pilot

- **CCX 10.6**
  - Mixed operation of CAD and Finesse
    - Every user on a given team must have the same desktop
    - Web chat and email agents need to be flash cutover at start
    - No data migration from CAD to Finesse
  - Unified CCX 11.0 supports Finesse only

- **CCE**
  - Mixed Mode Support with CTI-OS and CAD
  - CAD - Every user on a given team must have the same desktop
  - CTI-OS – Mix & Match CTI-OS and Finesse
Cisco-on-Cisco Case Study: CTI-OS to Finesse Internal Migration

Chris Del Grande, Member of Technical Staff (MTS) IT
BRKCCT-1031
Agenda

• Cisco Contact Center Overview
• “Cisco on Cisco” CTI OS to Finesse Migration Plan
• Best Practices, Tips, and Tricks
• Finesse Demo
Cisco Contact Centers Span the Globe

- 6 global UCCE clusters
- 1,800+ agents at over 50 sites plus external BPO partners
- 28 multi-site contact center client groups (TS, CS, Managed Svcs, Internal TS, Travel, HR, etc)
- 7.5 million calls routed annually by ICM
Our Finesse Migration Plan – Initial Deployment

- Initial implementation largely “Out of Box”…customizations would soon follow
- Recreated legacy CTI OS screenpops within Finesse
- 15 agent Employee Tech Support pilot group @ 1 site for 3 weeks
- Globally conducted (and recorded) 12 one-hour training sessions
- Agents and Supervisors attended the session that best fit their schedule
- Hybrid approach: CTI OS still available as backup through July 2016
Our Finesse Migration Plan – Optimization Phase

• Established post-implementation Finesse optimization projects on a group-by-group basis

• Teams that quickly adopted Finesse were rewarded with their own optimization project (ongoing)

• Team Managers, Supervisors, Agents and IT collaborated on ideas

• Optimizations included custom tabs, gadgets, workflow actions, screenpops, layouts, phonebooks, and application integrations
Our Finesse Migration Plan – The User Community

• Created the Finesse User Community

• Collaboration site for news, learning materials, videos, forum discussions, support requests, and Finesse login

• Increased awareness and adoption
Finesse Agent Login Map

Custom login map allows agents and supervisors to pick their UCCE instance

Finesse User Community one click away
Our Finesse Migration – What Did It Take?

• 6 months

• IT resources (3 FTEs)
  ✓ IT UC Architect (¼ FTE)
  ✓ IT Project Manager (¼ FTE)
  ✓ IT Tech Lead / Analyst (1 FTE)
  ✓ IT UCCE Engineer (1 FTE)
  ✓ IT Web Developer (½ FTE)
The Results So Far…

• Costly CTI OS screenpops recreated in 20 min using Workflow Actions
• Customizations (gadgets, pops, etc) can deliver significant “Change the Business” value
• Dramatically improved agent & caller experience
• Up to 15% reduction in Average Handle Time for optimized teams
• Much more to come as the optimization projects progress
Best Practices, Tips, and Tricks

- Engage at agent level to identify optimization opportunities large and small
- Deliver new features via small agile iterations
- Leverage the Finesse API, and/or investigate solutions offered by Cisco Partners
- Create a “Finesse Support” gadget to put help options within easy reach
- Recommend agents dedicate one browser type to Finesse (Firefox or Chrome)
- Use an online Callback option to collect and deliver valuable caller data, determine call routing, etc
- If agents need content visible beyond current call, consider external browser pops vs embedded gadgets, or include a pop-out button in gadget
Finesse Demo
Thank you
Closing

Offline Questions…

tephipps@cisco.com
cdelgran@cisco.com
Complete Your Online Session Evaluation

• Give us your feedback to be entered into a Daily Survey Drawing. A daily winner will receive a $750 Amazon gift card.

• Complete your session surveys through the Cisco Live mobile app or from the Session Catalog on CiscoLive.com/us.

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- Demos in the Cisco campus
- Walk-in Self-Paced Labs
- Lunch & Learn
- Meet the Engineer 1:1 meetings
- Related sessions
Demo Slides

- **Demo Scenario #1:**
  Cisco employee calling our Internal Technical Support group (employee helpdesk)

- A series of custom gadgets, workflow actions, and other customizations have been implemented for this global team

- Similar “Finesse Optimization” projects occurring for all other contact center groups

- The following screenshots illustrate the key contents of the live demo…
Finesse Agent Login Map

Primary Finesse launchpad

Custom login map allows agents and supervisors to pick their account site

Finesse User Community support site available here
Employee ANI delivers multiple automatic benefits

Username, Emp ID#, and VIP status are retrieved by CVP from LDAP using ANI

Employee’s profile is displayed within the People (Directory) gadget

Agent can greet by name, view title, team, location, reporting structure, and other key data
Finesse workflow action pops Remedy app

Remedy’s New Case page is launched within a browser tab

Case is prepopulated with Employee’s contact record

Browser pop instead of gadget allows agent to keep this case on desktop as long as needed
Smart Support Gadget

Custom gadget aggregates caller’s IT related inventory from multiple sources

Agent can interact with computer stats, recent cases, accounts, devices, and more. Warning indicators appear for items needing attention

“pop out” button spawns gadget into new window (as desired by agent)
Useful Links Gadget
Simple yet powerful

Custom gadget allows agents to quickly send common URLs via instant messenger or email

xmpp: and mailto: links pre-addressed to username and populated with URL
Custom “support” tab provides direct access to key sections of the Finesse User Community collaboration site.

Self-service documentation, request help, or provide feedback.
B+S Connects UCCE adapter within Salesforce.com

Can use ANI or Caller Entered Digits to search and pop any matching Salesforce records of your choice.

Also enables click-to-dial and a number of other valuable features.

The ANI provided by the carrier of the incoming call is used to perform a Contact search against all Phone fields, resulting in any matching CONTACT (and their Account) to "pop" as the call arrives.

Agent can then review existing cases, chats, etc and/or create a new case if necessary (prefilled with contact).