

Cisco Application Extension Platform: IP Broadcast Improves Organizational Communication

Introduction

Schools, hospitals, businesses, and government entities all recognize the criticality of timely and accurate communications in their organizations. Miscommunication and delayed announcements can affect productivity -- and potentially safety. Communications must meet accuracy and timeliness standards even when the recipient is located at a remote location or branch office, as staff increasingly tends to be. And given the volumes of email that must be managed, important messages can easily be overlooked or ignored, mandating the need for a diverse set of communications methods to ensure receipt of important messages.

Industry Trends

Numerous industry trends influence organizational communications. With technology facilitating virtual workplaces and geographical independence, the number of remote locations is growing 11 percent every year. In fact, U.S. government statistics based on U.S. Office of Personnel Management (OPM) reports indicate that 84 percent of government personnel work away from the campus location. With this proliferation, and the pressing need to decrease operating expenses, there is now a trend toward centralization and "thin" remote locations. But because an increasing number of decision makers are remote, centralization must be achieved without compromising branch-office performance or availability.

The wide adoption of IP communications has resulted in many innovations. Organizations need to innovate and adapt to remain competitive and deliver advanced services available only with a voice-over-IP (VoIP) foundation, but they also need to maintain and enhance traditional communication services.

Cisco and Singlewire: Location-Independent IP Broadcast

Cisco continues to expand the value of the integrated services router and the breadth of functions it delivers with the Cisco[®] Application Extension Platform (AXP), a network integrated services platform. Cisco AXP can help your organization host and deploy advanced applications, such as Singlewire[®] Software's InformaCast, onto your Cisco integrated services router. With the Singlewire InformaCast solution, your organization can reduce network complexity while saving on power and valuable space.

How It Works

The combination of Cisco AXP and Singlewire InformaCast addresses the need to consolidate in the remote locations of your organization. As depicted in Figures 1 and 2, Singlewire InformaCast is a software component that runs on the Cisco AXP module. The module, in either enhancednetwork-module (NME) or advanced-integration-module (AIM) form, resides in the Cisco integrated services router. Supported with either Cisco Unified Communications Manager (UCM) or Cisco Unified Communications Manager Express (UCME), Singlewire InformaCast allows you to simultaneously push an audio stream or text message to multiple Cisco IP Phones, InformaCast compliant IP speakers by Atlas Sound, the InformaCast Desktop Notification System, or an overhead paging system. An administrator can select a prerecorded message or send a live broadcast through either a password-protected webpage or the IP Phone services menu. The administrator can design these messages to be sent within a single site or across the organization and affiliates.



Figure 1. Cisco AXP and Singlewire InformaCast Single-Site Example

In a single-site solution, the same integrated services router that houses the AXP module can also provide Cisco Unified Communications Manager Express for even more consolidation and solution simplification. IP endpoints, such as Cisco IP Phones and traditional endpoints such as analog-based public announcement systems can be supported with the Cisco AXP with Singlewire InformaCast solution. Multicast is used across the broadcast network.



Figure 2. Cisco AXP with Singlewire InformaCast Multisite Example

Like the single-site solution, multicast is used for communications between connected Cisco UCME sites with a variety of endpoint types.

Solution Highlights

The solution provides server consolidation and a decreased branch-office footprint:

- Lowers total cost of ownership (TCO) with less power consumption
- · Provides enhanced productivity and better management
- · Provides better network and application services integration

The solution offers numerous services with a flexible breadth of service types:

- You can create live, temporary, or prerecorded audio broadcasts and/or text broadcasts.
- The solution supports a variety of endpoints.
- You can administer the solution through a variety of flexible interfaces.
- You can filter access to message types and recipient groups by user.
- You can schedule messages to be sent at a preset time or on a recurring basis.
- You can configure the frequency of message playback.

The solution technology is proven:

- Founded on 20 years of innovation and validated by millions of deployments sites, Cisco integrated services routers provide multiservice routing, offering your company exceptional network agility, performance, and intelligence.
- The Singlewire InformaCast resume includes successful installations with Cisco Unified Communications Solutions across a variety of organizational sizes. Singlewire has achieved multiyear Cisco awards for U.S. Technology Excellence Partner of the Year for Unified Communications and Security.

Business Benefits

Compliance:

- Overhead paging often does not reach hearing-impaired employees, compromising their safety. Singlewire InformaCast helps ensure the safety of all employees by simultaneously sending an audible broadcast and text message to Cisco IP Phones and desktops. All employees have equal access to vital information about emergencies or network outages.
- In the wake of September 11 and hurricane Katrina, many government entities are mandating that facilities meet strict emergency notification guidelines. The Cisco AXP with Singlewire InformaCast solution provides streamlined packaging to meet these emerging regulations.

Total cost of ownership:

- The Cisco AXP with Singlewire InformaCast solution optimizes total cost of ownership (TCO) by centralizing management and the hosting environment for service for up to 1000 endpoints from a single integrated services router.
- The IP-based broadcast solution saves up to 70 percent of the cost of a traditional paging system, adds many more features, and eases management complexity with a variety of management interfaces. The solution takes advantage of existing voice and data network resources, requires no dedicated wiring, and often requires no need to wire or rewire speakers and amplifiers. The broadcast solution extends the investment already made in Cisco IP Phones beyond just dial tone.

Improved organization communications:

- Because the Singlewire InformaCast application provides the ability to send simultaneous, live audio to an IP phone, desktop, and inline IP speaker, or any preferred endpoint, it is a critical component of improved organizational communications.
- The combined Cisco and Singlewire solution provides a simplified, consolidated package for one-button messaging from a phone or one-click messaging from the desktop, and it allows you to send live, recorded, or scheduled messages.

For More Information

About Singlewire

Located in Madison, Wisconsin, Singlewire Software develops and supports innovative voice applications centered around secure, fast, and reliable mass notification capabilities. Singlewire has been writing software applications for Cisco Unified Communications Manager longer than any Cisco partner. Singlewire's main application offerings, InformaCast, ControlKom, PushToTalk, and DORA, allow its customers unprecedented control in designing mass notifications, assigning them to specific recipients, and determining the medium for dissemination -- IP phones, IP speakers, email, and so on -- all with the peerless capacity for customization to its customers' specific environments. Singlewire is devoted to maintaining the agility and imagination needed to fulfill its customers' needs and fostering an environment for successful partnerships between its customers and the company.

http://www.singlewire.com



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