The Wainhouse Research Bulletin

NEWS AND VIEWS ON REAL-TIME UNIFIED COMMUNICATIONS

Don’t cry. This is our last newsletter for 2007. We wish all of our readers around the world a joyous holiday season and a prosperous 2008.

Stay with us in 2008 for continuing coverage of all things conferencing and collaboration, from videoconferencing to unified communications and from the latest products and corporate developments to the newest services. We invite all our readers to come interact with WR analysts personally at our upcoming Wainhouse Research Collaboration Summits: Berlin in April, Boston in July and the CSP Summit in October in Boston. See you there!

As always, please feel free to forward this newsletter to your colleagues. To be added to our FREE automated email distribution list, simply visit www.wainhouse.com/bulletin.

Andrew W. Davis, andrewwd@wainhouse.com

Cisco Ups Ante in Telepresence

If you were paying close attention in the past ten days, you would have detected a flurry of telepresence news coming out of Cisco San Jose. In fact, the company made two pretty exciting product development announcements and one pretty shocking customer announcement. We’ll take them here one at a time. But put them all together and you begin to get a pretty clear picture of just how serious the company is about visual communications and telepresence in particular. For anyone out there who thought Cisco might be a telepresence flash in the pan, it’s time to start rethinking.

Announcement #1 is H.323 interoperability. A year ago the folks at Cisco offered us a Stalinist philosophy towards telepresence, a strict hardline approach in which nothing should be allowed to shatter the telepresence illusion that the remote participants were in the same room with you. An era of glasnost appears to be now upon us, political liberation if you will. The market has spoken, and while many customers seem to love the Cisco Telepresence experience, they are also asking for multiple conference room designs and the ability to bring in those industry-standard videoconferencing systems we all know and love. The general architecture of the solution is shown in the diagram, which we have drawn as a multipoint call. Cisco systems will

---

Andrew W. Davis, andrewwd@wainhouse.com
connect to the CTMS device (voice activated) that can switch whole systems or individual screens, depending on the users choice. CTMS preserves Cisco’s 1080p video experience and spatial sound capabilities. All the H.323 systems connect to an MCU (based on Radvision technology). The CUVIC buffers the Cisco world from all the vagaries of G.xxx and H.xxx and supports any endpoint or protocol supported by the Radvision MCU. A single stream (768 kbps) from the MCU combines video from the H.323 endpoints and shows up on a single screen in the Cisco system. We saw a demo of this, and it indeed worked, but the CIF resolution and G.711 audio didn’t make the H.323 world look very impressive.

Announcement #2 is the enablement of inter-company communications. Several of us at WR actually got to see this first hand when we were part of a call between a Cisco site in North America and a BT site on the other side of the pond. The demo shows the commitment by Cisco and partners to solve the riddle of maintaining security while permitting relatively open communications between enterprises. The vision, still a long way off perhaps, is to have a telepresence capability that emulates the old PSTN – this time it would be the Public Switched Telepresence Network. We’ve since talked to two financial services firms that think inter-company telepresence sessions would be very valuable, enabling them to talk to their partners or to other firms that they buy from or sell to. BT is clearly in the lead in working on this problem, but Cisco is carrier-agnostic (as long as it’s Cisco-powered), and we would be very surprised if other network service providers weren’t working along the same lines.

Announcement #3 was Cisco’s claim that it had reached the 100 customer milestone with telepresence, with systems now installed in 40 countries. The announcement included the news that Proctor and Gamble is launching a network of more than 40 “video collaboration studios” (that was P&G’s term, a clear reference to their Halo experience) using the System 3000, with about 1/3 of the systems already in place. Rumors abound that the P&G deployment could grow over time to 300 rooms. Meanwhile, WR’s Brent Kelly reports that at the recent Cisco analyst conference John Chambers made the comment that Cisco would have to try hard to keep in front of P&G in terms of the total number of telepresence rooms deployed. Thus far, Cisco has 162, and it intends to have 244 by next July. So, maybe the rumor is based on more than fantasy. There are some interesting dynamics going on here behind the scenes. P&G, we believe, has been a Halo (and Polycom) customer, and we also believe P&G is one of HP’s leading services customers, having outsourced their IT to HP in 2004 in a 10-year deal worth somewhere in the neighborhood of $3B. Looks like the frontline of the telepresence war is located along the Ohio River right there in Cincinnati. See our Point Nine notice below for more on Cisco and telepresence.

**Aethra Launches Videoconferencing Service**

For those of you who think taking video to the desktop successfully will require a services strategy instead of a product strategy, your time may be coming. Last issue we reported on AGT’s beta test of PerfectMeetings, a rich media conferencing service. This week we learned of MeetIn Rich Media, a new service being launched by Italy-based Aethra. MeetIn Rich
Media, which again supports our hypothesis that it is nearly impossible to come up with good names for products or services in this market, is subscription based and supports 1) PCs with webcams, industry-standard (H.323 and H.320) room or personal video systems, as well as mobile videophones (UMTS). Of course multipoint is included. We are certain this SERVICE is based on an implementation of Radvision’s SCOPIA Desktop product, a development we have reported on previously. MeetIn Rich Media will be priced at about $200 per port per month – where a port equates to a concurrent user; for customers configuring one port per ten users, this comes out to $20/user/month. Aethra is becoming more aggressive in the videoconferencing market and this launch of a service could be very important.

**Polycom Introduces Lost Packet Recovery**

Polycom announced general availability of the HDX 8000 and 4000 high definition videoconferencing systems. Buried in the announcement is the mention that all HDX solutions now ship with V2.0 of the software. The interesting development here is that V2.0 includes an all-new, patent-pending Lost Packet Recovery (LPR) technology. LPR maximizes the quality of video, voice and content under tough network conditions common to public IP networks (read Internet) where packet loss and congestion are common. We saw a quick demo of LPR, which is based on forward error correction, a while ago and were very impressed. We hope to be able to provide readers with a more thorough assessment based on extensive testing within a few weeks.

LPR is not the same as historic error concealment; it does not hide the effect of packet loss or try to conceal it; it is actually a packet redundancy algorithm that ensures any lost info can be recalled and replaced. LPR is codec agnostic and can be used with H.263, H.264 or beyond (H.265 is on the horizon). We believe Polycom is working to drive LPR into the IETF SIP signaling standards.

When I asked Polycom’s John Antanaitis how LPR works, he explained that for every 10 packets sent, 7 have prime data and 3 are “data+recovery” packets. Any lost packets would be recovered from the D+R information. It sounded like a lot of overhead, but John explained that yes, it does require duplicate information to be sent. However, Polycom manages the D and D+R inside the original bandwidth allocation. For example, if you make a 512k call and begin to suffer from packet loss, LPR will take somewhere near 48k and use that for D+R information. The total call bandwidth remains at or below 512k. However, the call quality is significantly enhanced since the 464k (512k – 48k) looks better with D+R enhancements than a 512K call without. Even more interesting, perhaps, is that because the system needs only 7 total packets (whether in original 7 or the 3 D+R) to make a complete, high quality image, the impact of jitter is reduced (less wait time for possible missing, delayed or mis-ordered bits).

**News in Brief**

- Sweden-based Konftel has signed with Hello Direct to carry Konftel’s line of conference phones. Konftel recently introduced two new phones. The 200AUX ($549) can be used with a wireless headset. When the headset is connected to the Konftel 200AUX, the sound from the headset and conference phone’s microphone is transmitted simultaneously. The Konftel 300 is a high-tech phone with many new features such as a conference guide, flexible connectivity, the ability to record meetings, and a wireless headset connection. Besides analog lines, the Konftel 300 can be connected to cell phones and wireless phones, and to computers via USB.

- Siemens Communications announced the latest HiPath 8000 feature release, including over 40 new Unified Communications (UC) features such as enhanced one-number services, larger business-groups for managed service providers, new business-continuity and disaster-recovery options, expanded ENUM, and UC inter-working with systems from both IBM and Microsoft.

- Vello, The Conference That Calls You, today announced expanded service to support
international dial-out, allowing participants from around the world to be included in Vello calls generated from North America.

- Avistar has launched a worldwide channel partner program. The first VARs to sign up include Veloci, Communications III, and Manist in the USA and Media Plus in Japan. The company also released V9.3 of its software with a focus on improved network management capabilities, scalability, and remote management features.

- Holland-based Talk & Vision has signed a deal with HealthCity to deploy video communications (VSX 7000-based) as an alternative to the many trips between the customer’s three Dutch offices and its 93 sport centers.

- According to a blog entry by co-founder Chris Herot, Convoq has closed its doors. Convoq, which was renamed Zingdom Communications in August, raised more than $30 million in funding since its inception in 2002. Convoq's first products were Flash-based conferencing applications (audio, video, web) that utilized an intelligent presence engine ASAP (as soon as present). In the fall of 2006, the company decided to go in a new direction, developing a consumer-driven video communications tool. In early 2007 CEO Chuck Digate left the company and in late 2007 the investors pulled out. Herot has put the source code and patent portfolio of Zingdom up for sale, according to the blog post.

- SPIRIT DSP announced that Huawei Technologies has licensed SPIRIT’s TeamSpirit 3.0 Voice Engine PC to offer the highest quality PC VoIP solution to its operator and service provider customers.

**Two New Reports from WR: e-Learning, China**

**The Distance Education and e-Learning Landscape**

*Vol 1: Learning Management Platforms, Software & Tools*

Volume 1 of a three part series, this report captures market trends as of 2007 and provides a coherent view of the coming intersection between real-time conferencing tools and the many disparate corporate and educational LMS products and services. This volume provides an industry overview of LMS's and ancillary, influential software tools, complete with profiles of the leading providers. The report concludes with market sizing over three segments (K-12, higher ed, corporate) and a five year forecast, as well as a set of predictions for educational & corporate learning markets.

**Visual Communications in China: Navigating the Crossroads**

China is at a crossroads. This report outlines the dramatic cultural and economic trends that are well underway and how they are influencing the Chinese market for rich media conferencing solutions. The report also profiles the top 15 vendors, provides an analysis of their China market strategies, and ends with a detailed five-year forecast for videoconferencing endpoints and MCUs as well as web conferencing client/server solutions in mainland China.

Both reports are now available. For more information including an executive summary, or to purchase reports online please visit [www.wainhouse.com/reports](http://www.wainhouse.com/reports), or contact Sara Fargo, WR Client Services Manager at sfargo@wainhouse.com.
**Point Nine Update**

**Point Nine and AMI**

Point Nine is kicking off the New Year in Europe with a unique event in Edinburgh that is being hosted by our friends at the AMI Consortium. This meeting will focus on existing and future meeting technologies developed by AMI partners to optimise the effectiveness of meetings and human interaction. The cornerstone of this event are six interactive demonstrations of AMI core enabling technologies. Participants will meet with the scientists and see first-hand the latest advances in meeting capture technologies, unconstrained speech-to-text, vision processing and keyword spotting. The event is 15-January with a kick-off dinner 14-January. Details here.

**Point Nine via Telepresence**

We have reserved six telepresence suites courtesy of Cisco and will use these 26-February to host a half day Point Nine session with the topic **Telepresence: Can you speed business processes and reduce your carbon footprint?** If you can make it to Boston, New York, Atlanta, Washington DC, London, or Amsterdam contact Richard Norris to reserve your place. Save time, save money, save carbon and come by video! These sessions are definitely capacity limited, so reserve your place early. Starting time will be 8:00 in the North American time zone and 13:00 and 14:00 in London and Amsterdam respectively. Contact Richard if you would like to sponsor this very unusual session demonstrating the power of telepresence in sales, marketing, HR, and other business processes.

<table>
<thead>
<tr>
<th>Conference &amp; Collaboration Event Calendar</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>WHEN &amp; WHERE</strong></td>
</tr>
<tr>
<td>14-15 January, Edinburgh</td>
</tr>
<tr>
<td>14 February, Canary Wharf, London</td>
</tr>
<tr>
<td>8-10 April, 2008, Berlin, Germany</td>
</tr>
<tr>
<td>16-18 July, 2008, Boston, MA</td>
</tr>
</tbody>
</table>

**Videoconferencing in India**

**One on One with Chetan Turakhia, Director, Intellicon**

*WRB:* Let’s start with a quick question. Who is Intellicon?

*CT:* Intellicon is a multi-dimensional technology solution company focusing currently on communications (both voice and video) and automatic data capture (bar codes, RF ID, magnetic stripe, magnetic ink character reading, smart cards, etc). We have been in business 20 years and have 12 sales/support offices and 75 channel partners across India. With our direct and indirect set-up, we provide support to customers across the entire country.

Intellicon got into videoconferencing just two years back. Right now we are carrying products from Aethra and Radvision. We have approached this business two ways:

First: Offering videoconferencing solutions to different verticals through our direct team. For example: 1) India has many “spiritual gurus” who have a large number of followers spread across many cities and even countries. We have done a project for one guru so that people can...
see and listen to his lecture from remote locations. 2) We have installed one VC unit in the bedroom of an ailing mother of a frequently-traveling CEO. 3) We have enabled farmers and poor girls who makes saaris (Indian women’s traditional dress) in villages to show their products through a video system to remote buyers.

Second: Distributing VC products under a co-partner program run jointly by Aethra and Intellicon in such a way that there is no internal competition among partners.

WRB: It looks like your company started out in the PBX business; are you selling customers videoconferencing systems that are integrated to the PBX, or are the video systems stand-alone.

CT: Our current PBXs are using ISDN lines so currently we share media with video systems but there is no real integration. But now we have started offering IP PBXs as well as unified communication solutions from NEC. In the future, we will be integrating.

WRB: What are the major drivers that impact videoconferencing and/or unified communications?

CT: I would say the major driver is globalization which has created technology awareness in India. Lots of multi-national companies are now operating in India and these companies were the first to deploy videoconferencing; now it is spreading. Earlier, it used to take 10 to 20 years for something to come to India after being widely used in the West. Bar coding is one such example. Indian corporates (should I say new Indian multi-nationals) eventually led the way and then government offices, banks, and other institutes followed.

As far as unified communication goes, I think it will still take few years before UC really catches on in India. Currently, UC is restricted only to few large multi-nationals mainly in the IT space. The main reason is IP telephony is still catching up in India although most organizations are already using Digital PBXs (along with voicemail which is never actually used here) for voice.

WRB: Who are the major video vendors and how are they positioning themselves in India; how are they different?

CT: Aethra, Polycom, Tandberg, Sony are the major players. LifeSize has just entered India. All except Polycom have 3-4 partners while Polycom has 8-10 partners. Polycom, being present in India for longer, has started putting efforts to grow the market, but in the case of the others, it is left to the partners.

WRB: Who are the customers?

CT: Major takers are Banks & Financial Institutes, Large Corporates (automobile, pharma, cement, engineering companies, metal industries, IT) and Public Sector Institutes. New verticals to be watched are retail and infra-structure.

And of course the government is very important: defense, police, para-military forces, railways, and airports (still run by the government) are all going for the latest videoconferencing solutions. Government is actually becoming more IT savvy. We estimate government’s share to be approximately 45% of the total videoconferencing market.

India has 28 states and each state has been asked to create its own WAN which is purely on IP. For example, my state, Gujarat, has taken a major initiative on this and has implemented WAN throughout the state. The state has been divided in 24 districts and these 24 districts have been divided in 225 smaller Districts (we call them Taluka or Tehsil). We have a 2 MB link reaching to each of these 225 locations. And all these locations have started being equipped with videoconferencing facilities so that workers can communicate to the district office or main government office situated at the capital more effectively. This is part of e-governance project.

WRB: How important is high definition?

CT: Not much in current scenario but everybody knows it is the future. Visual communication
has to be real (or close to real) to start replacing traveling in a big way and HD is the best tool for this. Vendors talk about HD but buying will start getting momentum in India only when the cost of the equipment as well as the cost of the bandwidth comes down. Vendors talk about 3G as well but 3G is yet not deployed in India by service providers, in fact the government has yet not given clearance to anybody for 3G yet.

**WRB:** What about bandwidth?

**CT:** Yes, bandwidth is readily available in the top 8-10 cities, but India has a large market outside these cities. The cost is still very high. Many large organizations have their plants and factories in remote places (because government offered them incentives to do so) and those areas also need to be covered at a reasonable cost.

**WRB:** What about ISDN in India?

**CT:** ISDN is still very important. I estimate 80% of the equipment sold today is for use with ISDN. But we expect that to change fast.