

Vide/Sura Conference

“Data Collaboration....*is*
taking off slowly....at ESnet”

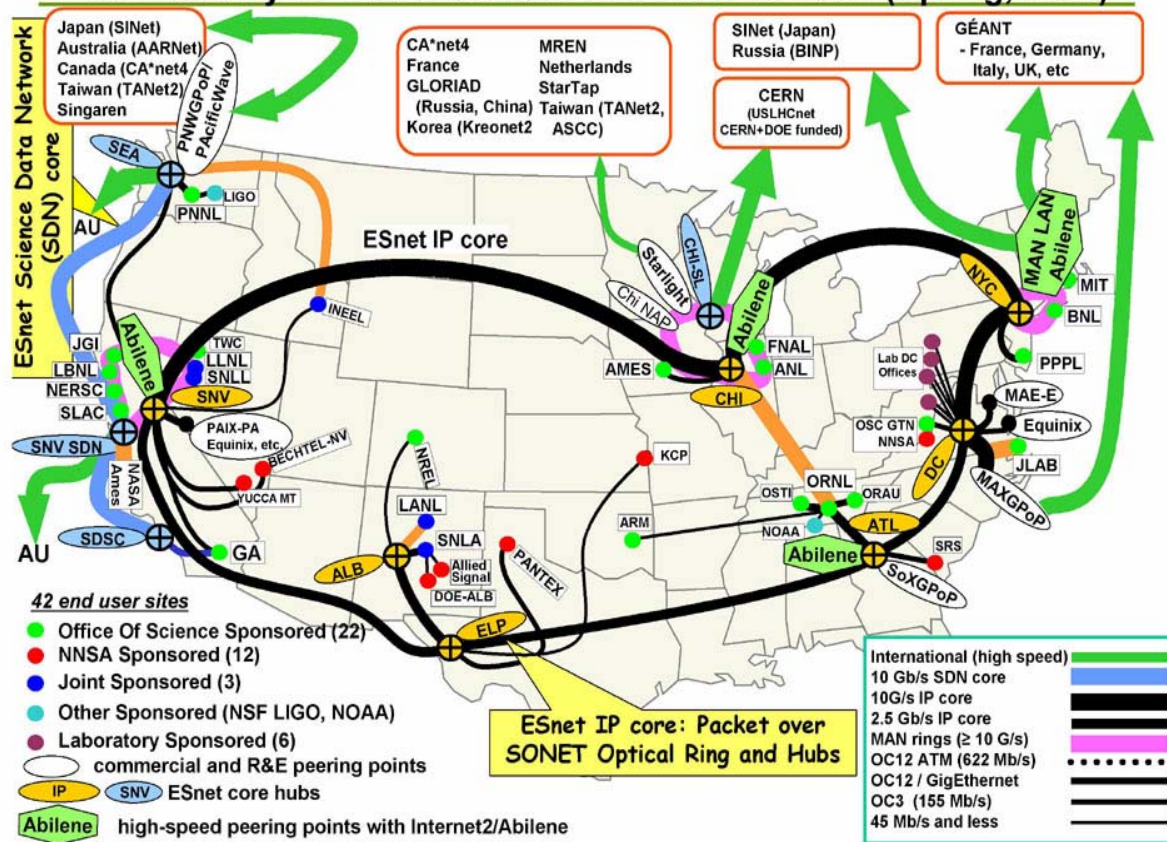
Mike Pihlman, ESnet
March 30, 2006



ESnet

The Energy Sciences Network is an ISP for the Department of Energy (www.es.net)

ESnet Layer 2 Architecture Provides Global High-Speed Internet Connectivity for DOE Facilities and Collaborators (Spring, 2006)



ESnet Collaboration Services

- Provide voice, video, and data collaboration services
- Over 1200 “endpoints” worldwide
- 218 organizations as of March 23, 2006
- Video is H.323 and is Ad- Hoc only
 - Averaged 5000 port hours/month for 2005
 - Single PRI for telephone/ISDN video access
- Audio/Data is scheduled or immediate
 - Audio averages around 2000 port hours/month
 - Data varies widely around 100 to 200 port hours/month



Data is slow to catch on...why?

- Culture
 - Voice meetings first
 - Video meetings second
 - Data not deemed important until recently
- Data is relatively hard to use
 - Individual usage (i.e. no handholding)
 - Need computer in Conference Room
 - Need to connect to the Web
 - Need to follow specific steps (multiple)
 - Need specific Operating Systems.



ESnet Data Collaboration

- Cisco MeetingPlace for audio and data
- Web-based, port 80 (good for firewalls)
- Interactive
- Our version is old, some limitations are:
 - Windows IE users can run the collaboration and interact
 - Others can see it but not run (or interact)
 - Need IE Virtual Machine to run in optimum mode
 - Not full-screen
 - Multiple steps to connect
- New version is much more robust...



Data Collaboration Pic

Display when you have VM loaded

Now Sharing:
Vide Demo (Guest)

Now Speaking:
(none)

Status	Participant
Main	
Mike Pihlman	
Vide Demo (Guest)	

List of Users

[Mike Pihlman] hello
[Vide Demo (Guest)] hello back

Chat

Message:

Send To: (All Users)

Work Area ➤ Service Provided

*To provide **voice, video, streaming, and data collaboration** technology that allows DOE Office of Science researchers, and their collaborators the ability to meet and exchange information remotely almost as easily as if they were in the same location.*

France (IN2P3) →

← New Mexico (Los Alamos)

← Chicago

Now Speaking: No speaker

System Alerts

>56 kbps

Internet

Data Collaboration Pic (2)

Trying to make display full screen

➤ Service Provided

To provide **voice, video, streaming, and data collaboration** technology that allows DOE Office of Science researchers, and their collaborators, the ability to meet and exchange information remotely almost as easily as if they were in the same location.



Now Speaking: No speaker

System Alerts

>56 kbps

Internet

Data Collaboration Pic (3)

Display when you have Java loaded

➤ Service Provided

To provide **voice, video, streaming, and data collaboration** technology that allows DOE Office of Science researchers, and their collaborators, the ability to meet and exchange information remotely almost as easily as if they were in the same location.

With Java

France (IN2P3)



New Mexico
(Los Alamos)

California (ESnet)

Chicago (Fermi)

Open WebChat

Share Application

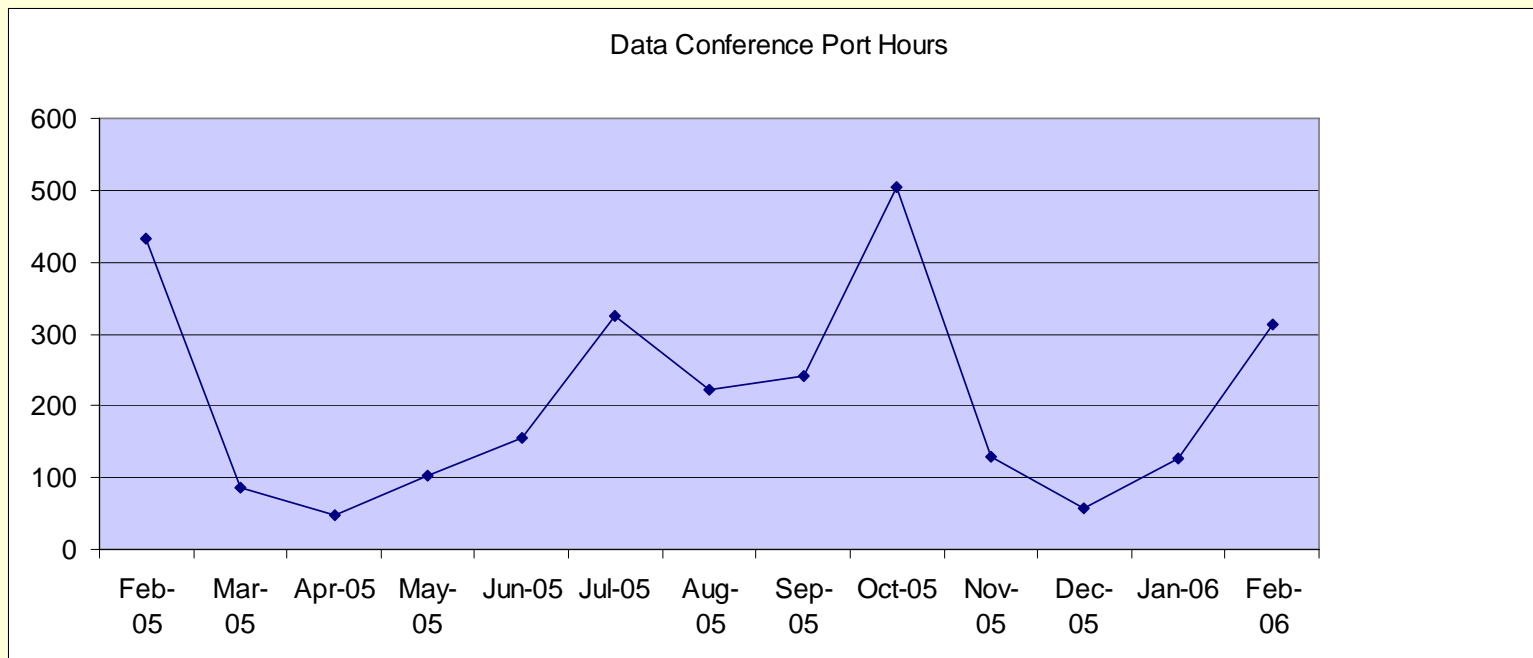
>56 kbps

Applet viewer started

Internet

Usage

- Data collaboration usage has always been very low compared to audio and video
- Recently usage is all over the map



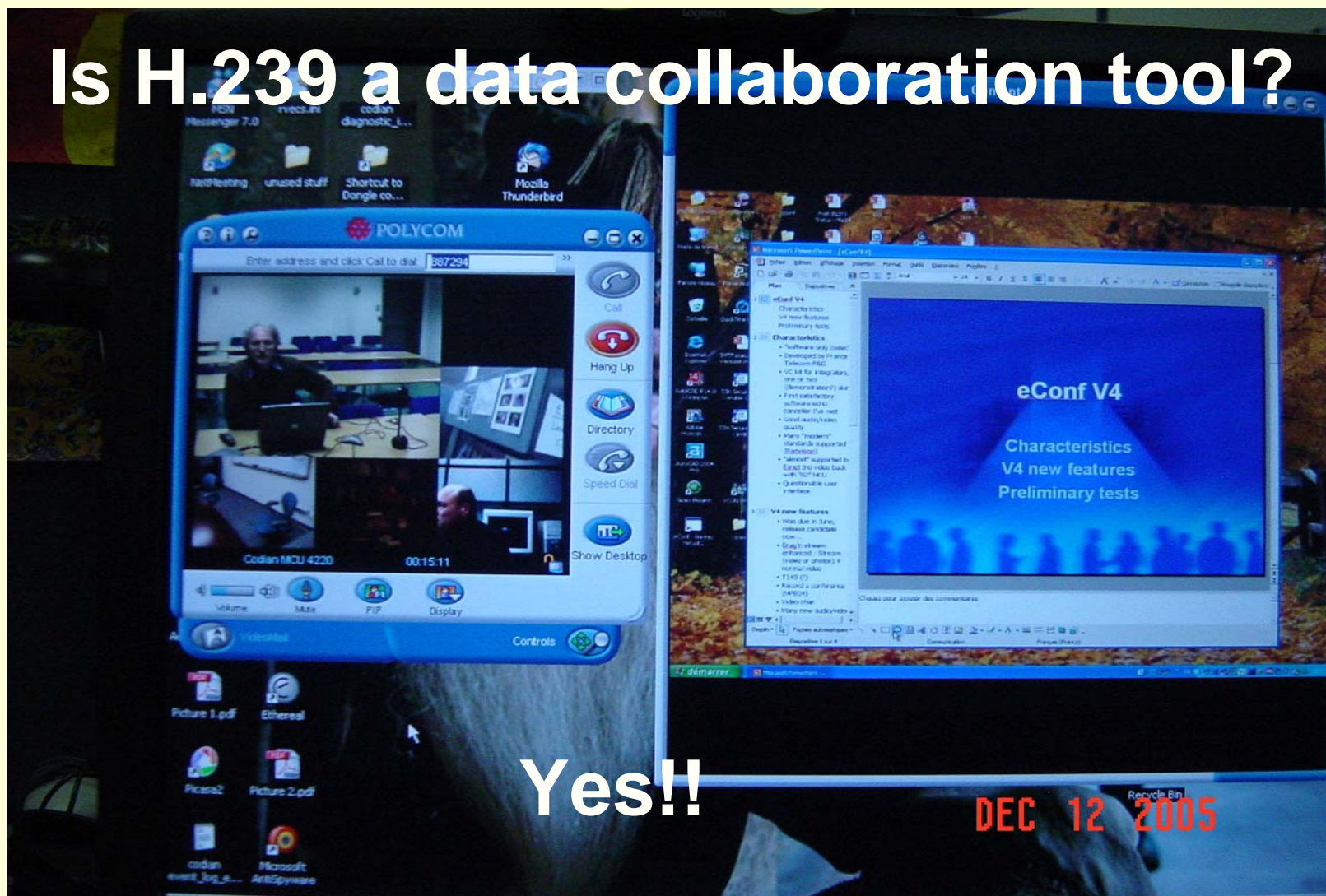
User Needs/Requests

- Work with multiple OS's
 - Mac, Windows, Linux/Unix
- Full screen display
- Ease of use
- When it does work for them...people seem to like it.



H.239

Is H.239 a data collaboration tool?



Yes!!

DEC 12 2005

How does H.239 fit in??

- Very well, actually
- Most data usage at ESnet is “presenting”
- H.323 video is used 3 times more than audio
- H.239 allows user to fire up data in the video session
- It is relatively easy to use



H.239 Issues..

- Endpoints are not ubiquitous
- Open H.323 clients do not support it
- Education/awareness of H.239 is lacking
 - And hard to do at ESnet



Summary

- ESnet supports web based and H.239 data collaboration applications
- Web based is still difficult to use and limited in capability
- Users are learning the value of data collaboration, but slowly
- Next few years will show if data collaboration awareness and usage increase

Questions?

