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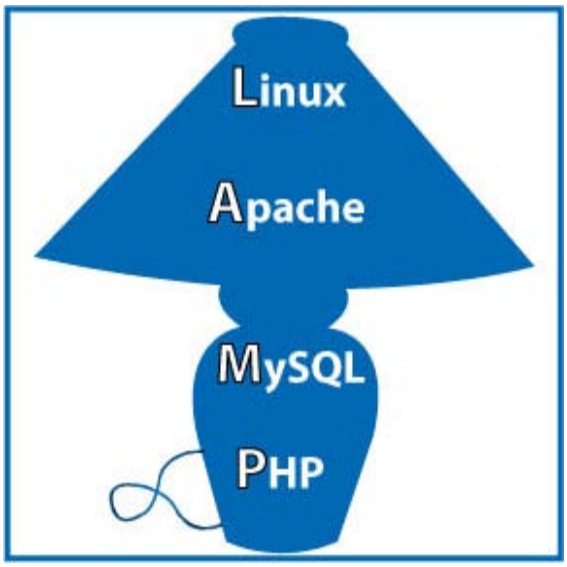

Major Articles

CIT Adds zLinux Virtual Server Hosting Service

NIH NexTalk Communication Services

NIH Biowulf Expands to 9000 Compute Cores

New Proposed Pricing Structure for Storage on Hosted Systems

New Video Decision Tool Helps You Tailor Your Online Meeting Options

Ask the NIH IT Service Desk About the Annual AD Account Review Process

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http://www.nih.gov is one of the most frequently visited federal government websites.

	May	*June*	*July*
Total hits for the month	67,829,866	69,359,389	66,084,525
Hits per day	2,188,060	2,311,979	2,131,758
Different individuals per month	3,405,776	3,171,817	3,150,599

The server has been up 100% of the time* during July.
* *Server uptime is independent of network accessibility.*

Articles

CIT Adds zLinux Virtual Server Hosting Service

Are you interested in hosting a blog using WordPress, setting up a website using PHP and MySQL, or hosting a Wiki? CIT's new zLinux Virtualized Server environment for hosting open source applications under the z/VM hypervisor can be just the service for you. Running on the robust, next generation IBM zServer platform, our zLinux Virtualized Server hosting began as a pilot offering, but is now available as a production service available to all HHS customers.

We can discuss hosting many other open source applications with you as well. With zLinux, there are no time delays waiting for procurements, and applications can be started and decommissioned within 24 hours, like most cloud computing environments.

Benefits to customers

CIT's zLinux Virtual Server Hosting offers customers multiple virtual Linux servers (Red Hat or Suse Linux) running on our IBM zServer platform. Customers who opt for zLinux virtual servers gain several advantages, such as:

- Hosting for open source applications in a virtual server environment.
- Quick deployment of a zLinux virtual server (in 24 hours or less).
- Reduced software licensing costs with the IBM zServer architecture, which are reflected in lower rates for our customers.
- Dynamic scaling of your server system resources to quickly meet increases and decreases in your application computing needs.
- Operational cost savings through reduced power, space, and support requirements, which translate to lowered investment costs and savings for customers.
- High reliability, high availability, and proven security that complies with NIH and HHS security requirements.

What kind of applications can take advantage of this service?

Examples of applications that can run on the zLinux Virtual Server include:

WordPress Blog applications: WordPress is a dynamic publishing tool for managing website content using a web browser. The platform is open source and powered by PHP and MySQL. WordPress offers:

- A user-friendly interface for publishing text and media.
- Website optimization for search engines with plugins.
- Features including workflow, plugin architecture, and a templating system.

LAMP (Linux, Apache, MySQL, and PHP/PERL)-based applications: an interlocking set of technologies on which developers can build and deploy web-based applications.

- Apache is the most widely used web server on the planet. Apache has been an open source effort from its beginnings in 1995 and is controlled by a group called The Apache Software Foundation. Apache remains the de facto reference platform against which all other web servers are judged.
- MySQL is a multithreaded, multiuser, SQL-based database management system with more than six million installations.
- PHP, Perl, and Python are the programming languages of choice in most LAMP and LAMP-like installations. All are characterized as concise, compact scripting languages that allow a user to execute a program on the web server from within a browser window.

Wikis: collaborative websites where authorized users can add or modify content using a browser.

Other applications:

- An Apache-based front end to an MS SQL server database
- A JAVA-based application using the Resin application server and communicating with a backend MS SQL database on a remote host

The zLinux server platform

The zLinux Virtual Server runs on the state of the art, next generation z9 Business Class server platform under the z/VM hypervisor, using Red Hat Linux to run multiple virtual Linux servers. The zServer system is secure, reliable, and has a greater than 99.999% availability. These CIT-managed servers are located in the highly secure NIH Data Center, in the NIH campus building 12 complex.

The benefits of virtualization

Using virtual servers instead of stand-alone servers can result in a large reduction in energy use while also freeing up space and keeping work areas cooler, thereby helping to green the Data Center. Since virtualization maximizes the efficient use of pooled resources, it is often a lower-cost solution over stand-alone servers.

How can virtualization lower costs?

- Virtualization decreases the number of administered physical servers, and so reduces overall power and cooling requirements.
- Operational savings result in a lower charge for CIT customers. Virtual server customers pay about 30 percent less than customers with physical servers.
- Virtualized systems are highly robust with built-in redundancy. Customer configurations that required multiple servers and load balancers for failover support can leverage the built-in redundancy of the virtualized environment to significantly lower their hardware requirements and costs.

More information

For more information, contact the NIH IT Service Desk online at http://itservicedesk.nih.gov or at 301-496-4357 (6-HELP) (local), 866-319-4357 (toll free), or 301-496-8294 (TTY) and ask to be connected to a virtual Linux server consultant.

NIH NexTalk Communication Services

Are you "trapped" at your desk with your TTY? Are you the only person your office relies on to communicate with citizens via TTY, because that telephone number rings only at your desk? Free yourself with an electronic telephony communications solution from CIT.

What is NTS?

The NexTalk Service (NTS) is an Internet-based, real-time, text communication system with special provisions for the communication needs of deaf, hard-of-hearing, and speech-impaired staff. NTS enables these users to communicate, without having to use a TTY-type device, with anyone who is:

- Using telephone networks with NexTalk or a TTY device or emulator, or who is calling through any relay service (Relay),
- Using the Internet with NexTalk or TTY-emulation software, or
- On the NIH Intranet using NexTalk or TTY-emulation software.

With NTS, any TTY, NexTalk, or Relay call can be answered and then transferred to another NexTalk user or group of users using your PC. NTS also takes messages, saves a list of contacts, and enables teleconferencing.

Who benefits?

NTS is improving the communications technology for staff who now rely on in-place TTY at NIH Institutes and Centers. Several categories of users can particularly benefit from using NTS. Deaf, hard-of-hearing, and speech-impaired staff will find it a convenient alternative for multiple TTY devices and their associated phone numbers. A single phone number can reach these users wherever they are working without the need for call forwarding and separate TTY devices. This is especially convenient for teleworkers.

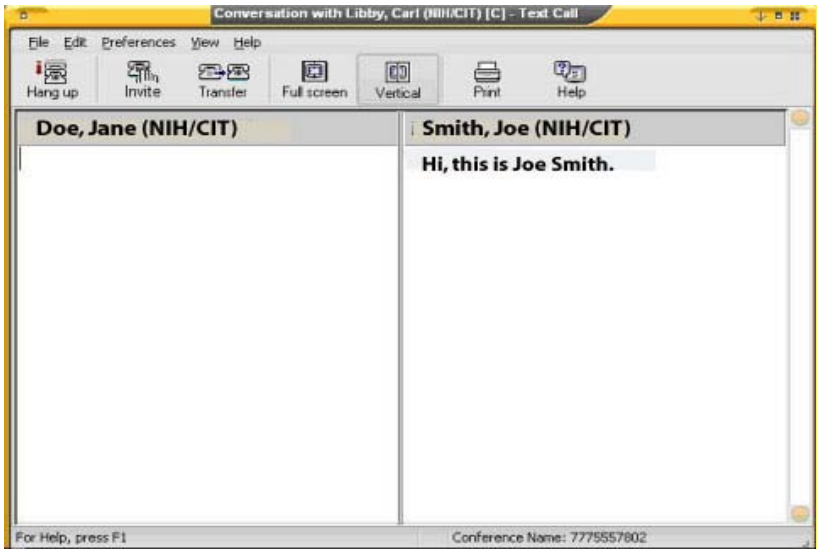
Likewise, call centers and offices that interact with the public also benefit from having a system with a dedicated incoming TTY phone line that can be easily forwarded or transferred to multiple NTS users. No single person need monitor a TTY device at a dedicated location. Staff can answer incoming and make outgoing TTY calls from any computer, including those at teleworking locations.

NTS Features

- Make and receive any TTY call, make TTY-to-Relay calls, receive Relay-to-TTY calls.
- Receive "Text Mail" messages that are forwarded to an email address.
- Call or accept text calls by any other NexTalk users.
- Transfer calls to and create conference calls with other NexTalk users.
- Send and receive internal instant messages using NTS.

How NTS works

NexTalk is a software application that installs directly on a user's Windows PC.



When a person-to-person or conference call is answered, a screen called the conversation viewer appears (see illustration above). The conversation is then entirely

"real time," that is, as each party in the conversation types words, the characters appear instantly and simultaneously on all participants' screens. No send button is needed.

Other parties can be invited in to a conference call, and calls can be easily transferred. If one or more parties are not available, messages can be left.

What will I need to use NTS?

You must have a PC; currently NTS does not work on Unix or Mac systems. You must get or have a dedicated phone number, and, when using NTS, you must be connected to the NIH Intranet/NIHnet. When you sign up for NTS, you will be assigned a dedicated phone number. If you are already using a phone line for TTY, you can choose to transfer that number to the NTS; there is a fee for the transfer.

How can I get NTS?

For more information, please see the Communication/Collaboration category in the CIT Service Catalog (http://cit.nih.gov/ServiceCatalog/) for the NexTalk Service entry. When you are ready to get NTS, please contact the NIH IT Service Desk in any of the following ways: online at http://itservicedesk.nih.gov or by phone at 301-496-4357 (6-HELP) (local), 866-319-4357 (toll free), or 301-496-8294 (TTY).

NIH Biowulf Expands to 9000 Compute Cores

In June, 336 new compute nodes came online as part of the NIH Biowulf Cluster (http://biowulf.nih.gov). The increase in compute power will be applied to a wide range of biomedical research applications including those in genomics, imaging, molecular dynamics, and statistical analysis.

The compute nodes

Each compute node consists of two Intel quad-core processors and 24 gigabytes (GB) of memory. At eight cores per node, the additional nodes add 2688 processing cores to Biowulf for a total of just under 9000 cores. In addition, sixteen of these new nodes have a larger memory complement of 72 GB for compute tasks requiring large memories, such as those common in sequence assembly and comparative genomics applications.

Issue of cost and power consumption

The competitive procurement for the nodes was begun in January and was awarded in April. The evaluation of proposals was based on application performance benchmarks and a total cost of ownership analysis based on initial cost and power consumption. In recent years, power consumption has become one of the largest cost factors for data centers housing scientific supercomputers. The system chosen was an IBM iDataPlex, which could provide more compute cycles for the same power utilization than the competition.

The Biowulf Cluster

At nearly 9000 processing cores, the NIH Biowulf Cluster is the largest single compute resource at the NIH and will help meet the ever increasing demand for computer power by biomedical research.

For more information about the Biowulf Cluster, please visit the Biowulf at NIH web page at http://biowulf.nih.gov/or view CIT's scientific computing resources web page at http://cit.nih.gov/Science/.

New Proposed Pricing Structure for Storage on Hosted Systems

In an ongoing effort to provide competitive, high-quality services and be responsive to customer feedback, CIT is proposing to restructure its pricing for managed storage for the Windows and Unix hosting services.

Beginning October 1, 2010 (federal fiscal year 2011), disk storage and backup storage will be priced separately, and volume discounts will be available.

What will the changes mean?

Previously, managed disk storage and backup storage were bundled as a single offering at a single rate with no volume discounts (Standard $5.00/GB/month and Premium $7.50/GB/month). The proposed new pricing structure is based on customer feedback, market research, and an evaluation of industry trends.

The new pricing structure offers backup storage independent of disk storage services, Standard and Premium categories each with separately-priced options for disk storage and SAN (Storage Area Network) provisioning services, and volume discounts for both disk storage and backup storage. These new options give customers more flexibility and choices in managing their backup and storage costs.

What will the FY2011 rates for storage services be?

Disk storage rates for FY2011 will be:

- Standard: $1.00/GB/month
- Premium: $2.50/GB/month

Standard storage services are generally used for mid-tier storage needs while Premium storage services are typically used to support large enterprise-level configurations. In general, Premium storage provides more paths from disk to server and supports higher

input/output rates compared to Standard storage. Premium storage also offers enhanced support for concurrent maintenance and live firmware updates resulting in less scheduled downtime.

The FY2011 rates for backup storage will be:

- $1.35/GB/month

If you have large amounts of data, you may be able to take advantage of high-volume discounts for disk storage and backup storage. The discounted rate applies to the amount of backup storage above the thresholds specified in the rates.

To see a detailed table of the proposed rate changes, please visit the Storage Pricing web page on the CIT website at http://www.cit.nih.gov/ServiceCatalog/StoragePricing.

Questions?

If you have questions about storage services, please contact the NIH IT Service Desk online at http://itservicedesk.nih.gov/ or by phone at 301-496-4357 (local), 866-319-4357 (toll free), or 301-496-8294 (TTY).

For the current CIT rates, please visit the CIT Data Center Rates page at http://www.cit.nih.gov/ServiceCatalog/DataCenterRates.htm.

New Video Decision Tool Helps You Tailor Your Online Meeting Options

Are you organizing a meeting, conference, or other event for which you want to enable the speakers, presenters, and participants to attend regardless of geographic location? Would you like to take advantage of online collaborative technology, such as videocasting, web collaboration, and teleconferencing, but are unsure which to choose?

CIT's new Video Decision Tool, launched in April, can help you find the best fit for your event. Simply use the free online tool to answer a series of questions about your event, and the Video Decision Tool will suggest one of three services—Web Collaboration, VideoCasting, or Video Teleconferencing—that best suits your needs.

What to consider

Before using the Video Decision Tool, consider the following questions:

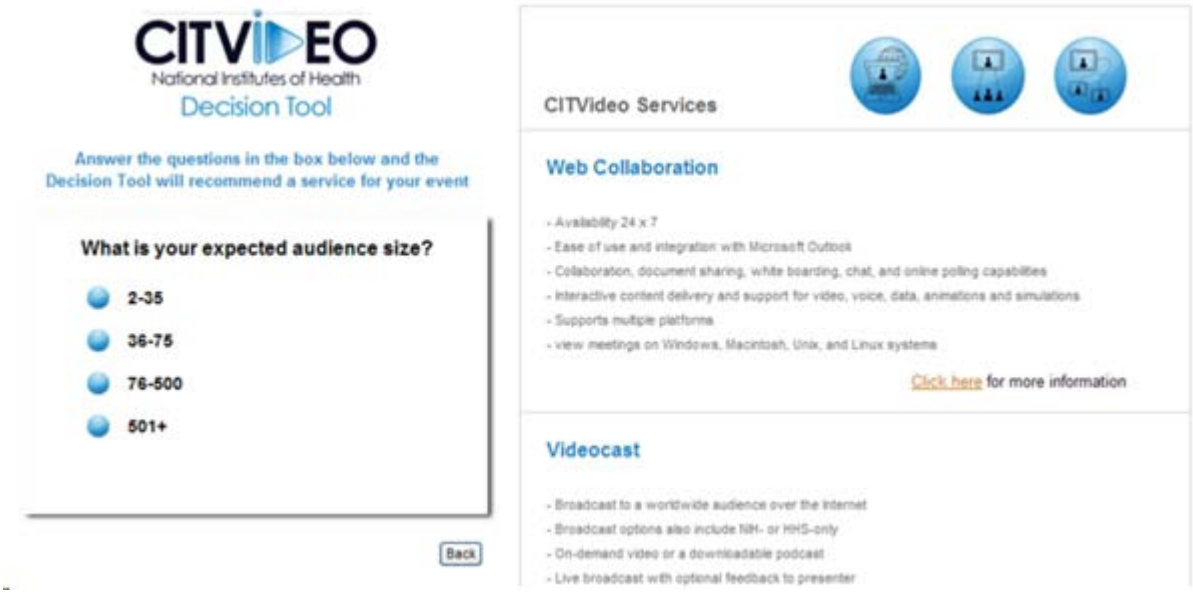
- How many participants will there be?
- Are there multiple presenters, and are they physically in multiple locations?
- Will the event be funded by NIH?
- Will you need captioning or other accessibility accommodations?
- Do you want to archive video of the event for later viewing?

How to use the tool

To use the Video Decision Tool:

1. Visit the Video Decision Tool web page at http://video.nih.gov/decisiontool/index.aspx. (You can also find a link to the Video Decision Tool on the Collaborative Technology Innovation & Video Services home page at http://video.nih.gov/.)

2. The questions you need to answer appear on the left side of the window, and a description of available video services appears on the right side of the window.



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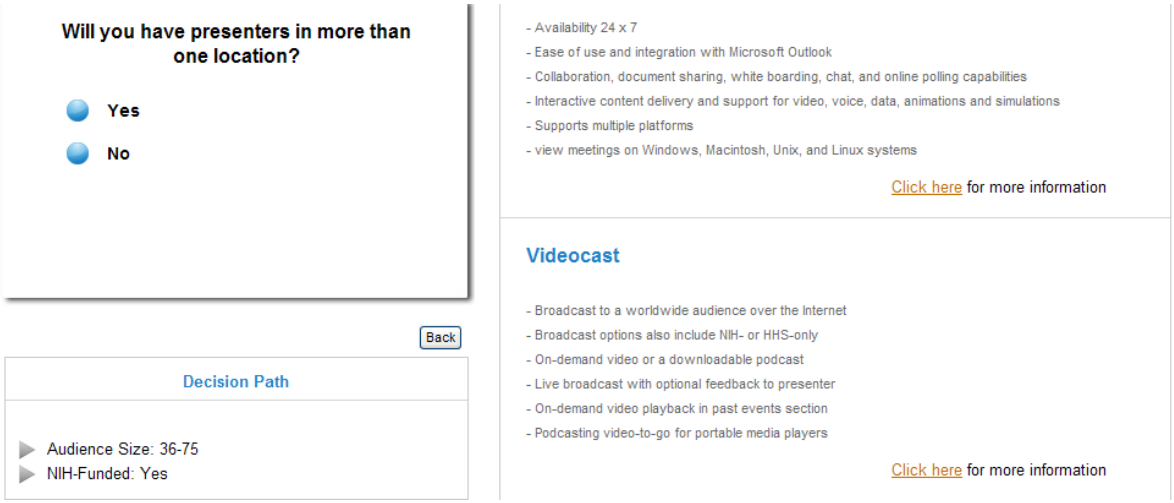

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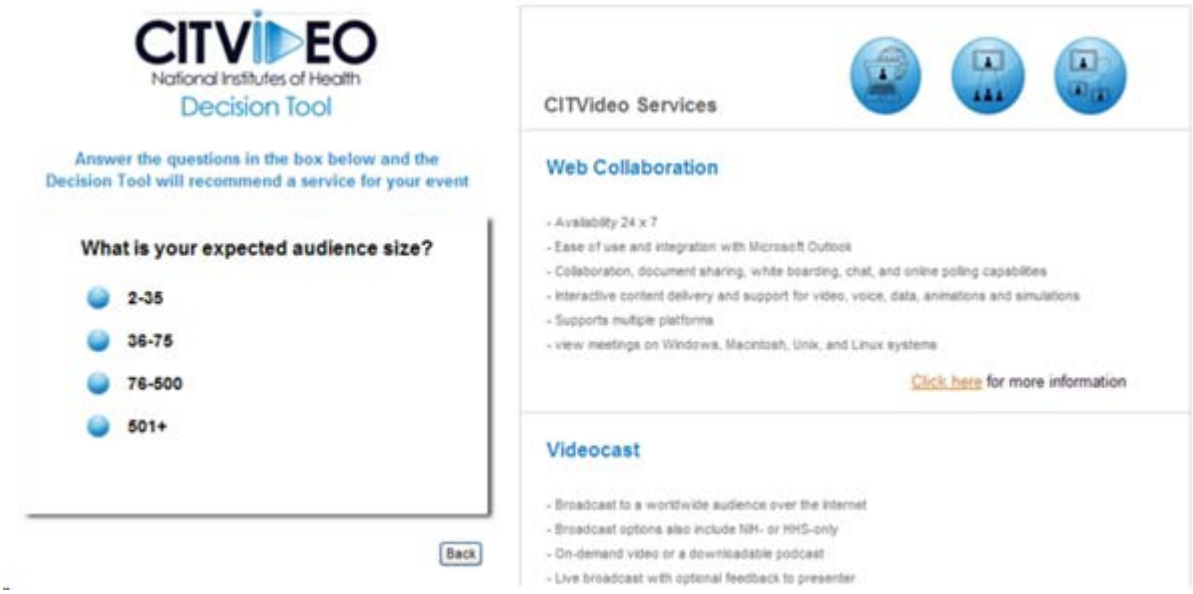

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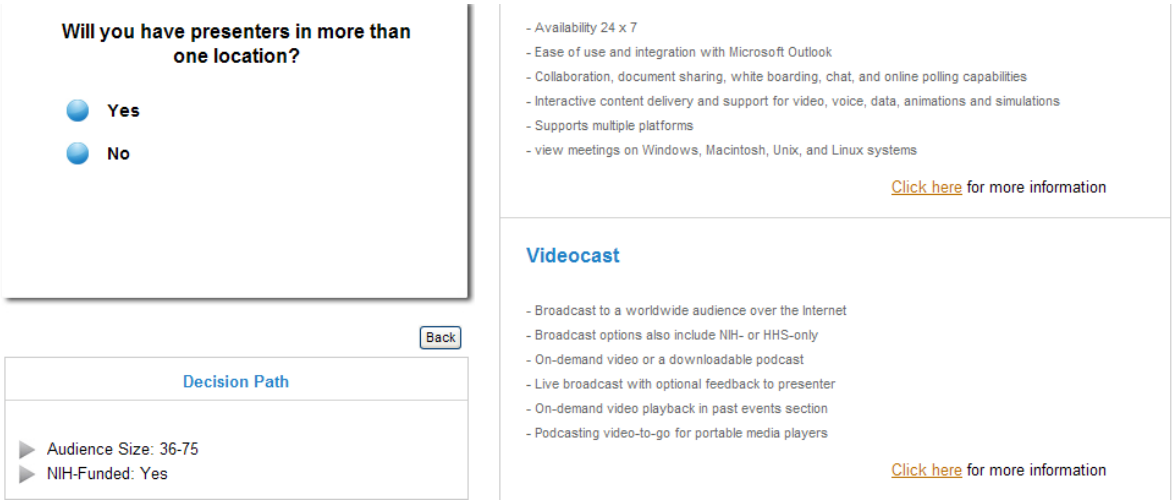
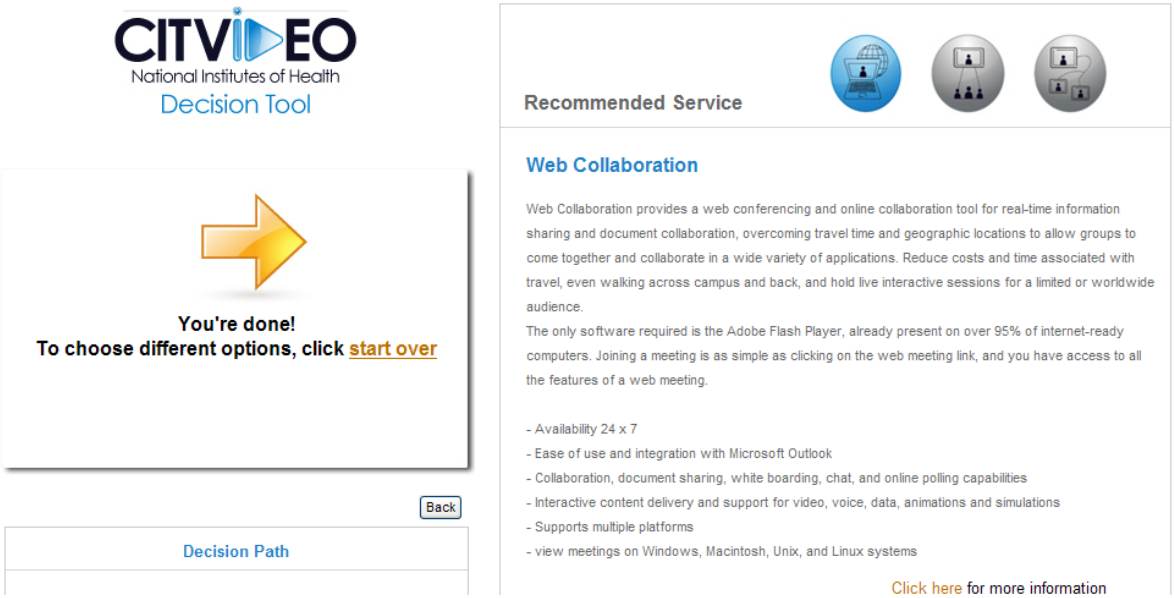


4. When the Video Decision Tool has enough information, the recommended service appears on the right side of the screen.



5. For more information about the recommended service, select the "Click here for more information" link at the bottom right of the service information box. This link will take you to the web page of the selected service, where you can find more in-depth information about the service along with the option to contact the CIT Video Group or the NIH IT Service Desk.

Other collaborative services offered by CIT

In addition to Web Collaboration, Videocasting, and Video Teleconferencing, CIT offers the following collaborative and assistive services:

- Podcasting
- Room Design and Support—transforming traditional spaces into multimedia conference rooms
- Captioning
- Video Relay Service—enabling real-time communication between sign language users and a remote hearing party

More information

If you have questions or comments about the Video Decision Tool, please contact the NIH IT Service Desk online at http://itservicedesk.nih.gov or by phone at 301-496-4357 (6-HELP) (local), 866-319-4357 (toll free), or 301-496-8294 (TTY) and ask for the CIT Video Group.

For additional information about CIT's video, collaborative, and assistive services, visit the Collaborative Technology Innovation and Video Services web page at http://video.nih.gov/ or contact the NIH IT Service Desk.

Information about our Video Service and financial forms (billing authorization, account code, and Service Level Descriptions) can be found on the Video Service and Financial Documentation web page: http://video.nih.gov/serviceDocuments.asp.

CIT Shows its Green Side at the NIH Earth Day Celebration

As part of its support of NIH's Greening Initiative and Environmental Policy (http://nems.nih.gov/policy_desc.cfm), the Center for Information Technology (CIT) showcased some of its greening efforts at this year's NIH Earth Day celebration (http://nems.nih.gov/earthday/) on April 22. The annual Earth Day event at NIH highlights ways for everyone at NIH to "go green" both on campus and at home.

A live web meeting demonstration

The CIT exhibit focused on the advantages and capabilities of online collaborative services such as Web Connect and streaming (or downloaded) videocasts. By connecting geographically distant participants online, these services enable you to save much of the time, money, and energy usually spent traveling to various meetings and events.

On-site, CIT staff Teresa Church Nuzzo, Wendy Lord-Toussaint, and Norma Stern used several laptops and a wireless connection to host a live Web Connect meeting with full video and audio between the booth on the lawn in front of building 1 on campus and the CIT Fernwood offices, where video team members Ghazal Behzadnejad, Lawrence Hammond, and Elliott Ware stood ready to wave to the visitors of the exhibit.

The live web meeting allowed visitors, on campus, to chat in real time with the staff at the remote location, something that proved to be especially fascinating to the young attendees participating in Take Your Child to Work Day. There were even reports of dancing and enthusiastic waving in front of the webcam, a sure sign of the immediate sense of involvement inspired by the web meeting experience.

The benefits of online collaboration

Going digital for your meetings (Web Connect) or informational sessions (VideoCasting) allows you to reduce travel costs—and these include not only the

standard costs you normally think of, like airfare and hotels, but also local travel, like the time and gas needed to go between campus and Fernwood—while increasing your overall audience size without adding major expenses. Cutting down on travel requirements is not only a green strategy, it also ensures higher participation among both presenters and the audience. People can join web meetings who wouldn't have been able to attend in person—as in the case of a doctor who literally finished doing surgery and then gave a presentation online.

Videocasts on the iPad

A big draw at the CIT booth was the iPad displaying a videocast of President Obama's visit to NIH, demonstrating that the CIT VideoCasting service can function on the most up-to-date mobile technology. Like Web Connect, videocasts enable information sharing without travel, reducing costs while increasing the size of your potential audience. Whether live streaming or downloaded at your convenience, videocasts allow you to view a meeting presentation from wherever you are, making it easier for information to be shared and people to collaborate regardless of geographic distance.

It should be noted that part of the big success of CIT's iPad videocast demonstration at Earth Day was due to the presence of an enthusiastic and technologically-savvy assistant: Wendy's 15-year-old son Justin, who expertly took charge of the iPad display and helped show off all its features.

Other presentations

A slide show presentation at the booth offered visitors unfamiliar with the NIH Data Center the opportunity to learn about its convenient location on campus, its strong security features, its implementation of greening strategies, and the availability of regularly-scheduled tours of the facility. Those interested in getting a closer look at some of the greening techniques employed at the Data Center—or those intrigued by the retinal scanning required for entry to the Data Center—found information about signing up for a tour on the CIT Training website (http://training.cit.nih.gov) listed on the web links handout cards at the booth.

Exhibit handouts also included copies of the *Interface* issue that focused on the Greening of the Data Center (http://datacenter.cit.nih.gov/interface/interface240/), brochures on CIT's greening efforts, and CIT website links.

Questions and more information

If you would like to know more about CIT's collaborative online services, please visit the CIT Video Services website (http://video.nih.gov/) or the CIT Service Catalog (http://cit.nih.gov/ServiceCatalog/). If you have any questions about the Data Center, CIT's greening policy, or any of the services mentioned in this article, contact the NIH IT Service Desk online at http://itservicedesk.nih.gov or by phone at 301-496-4357 (6-HELP) (local), 866-319-4357 (toll free), or 301-496-8294 (TTY).

CIT's ITIL Journey

A few years ago, Acting CIT Director Dr. Jack Jones realized that in order for CIT to remain competitive we had to change the way we functioned as an organization. Dr. Jones challenged the CIT Division Directors to improve our business processes and give both customers and management a better, more accessible and transparent picture of our services. ITIL (Information Technology Infrastructure Library) emerged as the tool that could best assist us in enhancing CIT's internal business functions.

What is ITIL?

ITIL is an IT service management framework that outlines good industry practices and processes for IT organizations. It is designed as a continual improvement framework with about two dozen processes dependent upon each other for input.

You can find more general information on the origins of ITIL and its key benefits for IT organizations in the *Interface* #242 article entitled "Interested in ITIL?" (http://datacenter.cit.nih.gov/interface/interface242/itil.html).

Introducing ITIL to CIT

An initial assessment of the ITIL framework and CIT was completed in late 2006, and CIT began putting those recommendations into practice in 2007. Our first step was to establish the new Service Management Office (SMO), from which the first major ITIL components at CIT, the Service Desk and the Service Catalog, emerged.

In order to best realize the ITIL framework's full benefits, we had to focus on instituting and then maturing each process to the point at which it could use and share information with other processes as designed. Until we can establish and mature *all* of the two dozen existing ITIL processes at CIT, such as Financial Management, Service Portfolio Management, or Service Level Management, introducing ITIL into our organization requires finding ways to incorporate some of their functions into our two established groups of ITIL processes.

For example, a process such as Service Portfolio Management is designed to approve services for Service Catalog Management to put in the Catalog. However, Service Portfolio Management is not mature enough yet to provide the information, so it has to be handled by Service Catalog Management.

In implementing ITIL at CIT, we concentrated most of our efforts on training in order to get the entire organization speaking the same language. We have now trained over 200 CIT staff on ITIL v3 Foundations, as well as two dozen at the ITIL intermediate level, and we currently have two fully certified ITIL experts.

A big challenge that we hope to address with ITIL in the next few years is improving the efficiency and effectiveness of the organization on a flatter budget (resources) while still fulfilling growing requirements for services, products, and innovation.

Service Catalog Management

In 2007, CIT launched one of the initial groups of CIT ITIL processes, Service Catalog Management. The primary goal of the process was to provide our customers with a single, authoritative list of CIT services. The Level 0 Service Catalog published in November 2007 was our first ITIL deliverable. The Level 0 Catalog encompassed approximately 100 services, categorized into logical groups with detailed descriptions, and the entire document was available in print and PDF format.

The next milestone occurred in August 2008, when CIT published a new level of the Catalog, which included 120 services in eleven different categories. Every service was broken down into key components, including: Service Description, Customer Benefits, Hours of Operation, Customer Market, and Related Links. In keeping with our focus on creating something that customers would find easy to use, this version was published on the CIT website and included a printer-friendly view.

The most recent iteration of the Catalog was published in March. This version is by far the most customer-friendly, with services viewable by alphabetical list, categories, or a catalog search. The new Catalog also includes Frequently Asked Questions, recently added services, and related services. You can explore the CIT Service Catalog online at http://www.cit.nih.gov/ServiceCatalog/.

Service Level Management

Since providing services to our customers is the core of CIT's mission, the other ITIL practice we initiated in 2007, from the original groups of CIT ITIL processes, was Service Level Management. The goal of Service Level Management is to establish clearly-defined levels of service, consistent quality, and achievable targets for IT services within an organization. The first deliverable of this process was the creation of the Agreements Repository. This was a tremendous advancement because it gave us the ability to store all agreements from all divisions in one central location. Previously,

agreements were in many different locations with no central tracking or reports. The benefits of the ITIL-based solution include more efficient reporting and routing, version tracking, search capabilities, and sorting.

Development and implementation of the Service Level Agreement (SLA) template was the next major milestone because it enabled CIT to use a standard, non-division-centric SLA format to present to all customers, regardless of the type of support or service they need. The benefits of a standard SLA format include a better understanding of the expectations for both the customer and the service provider, and the ability to track any and all metrics as required. As a result, customer satisfaction and reporting capabilities have improved.

In 2009, we implemented the first CIT Operational Level Agreement (OLA) and Memorandum of Understanding (MOU) templates, repository, and process. The new templates and processes enable us to ensure consistency in the way we manage agreements across CIT. The template includes components from CIT best practices and industry examples, as well as items suggested by ITIL vendors and publications. Finally, in 2010, CIT began using a new home-grown system for managing Service Level Agreements. The system enables faster document creation, routing, and enhanced reporting capabilities.

Financial Management

The ITIL Financial Management initiative began in 2009 when there was a demand from our customers for better governance and transparency. ITIL Financials provides CIT with a powerful tool for depicting the relationship between services and our charging models. Drawing information directly from the Service Catalog, it allows us to quantify services in financial terms, analyze and implement standardized budgeting and accounting methods, and continuously review charging models. "Customers and management will be able to see if our strategy is resulting in lower costs or greater service adoption, which services cost us the most and why, and how we compare to alternative sources." – John Burke, Chief Financial Officer, CIT.

NIH IT Service Desk

The Help Desk started its ITIL journey many years ago as a strategy for identifying how best to approach its immaturity as a support organization. ITIL was the most comprehensive methodology available that specifically addressed how we do our core business – delivering competent, high-quality support to NIH. As with any process improvement, there have been many bumps in the road – natural roadblocks that come with making significant changes to the business. By facing these challenges, we have effectively transformed our people, processes, and tools to fit the ITIL Service Desk model as of December 2009.

Our customers and our organization have already reaped innumerable benefits as a result of these changes. The NIH IT Service Desk, for example, has successfully met or exceeded its customer response targets consistently, despite increasing demand for its services. In addition to defining common processes and supporting technology, implementing ITIL has altered the focus of our staff to smarter management of our workload and ensuring our customers can use IT more effectively to do the work it takes to support NIH's mission.

Service Portfolio Management

In the summer of 2009, representatives from all of CIT's divisions came together for a workshop to start putting together a framework for Service Portfolio Management (SPM). SPM is the process that determines which services CIT offers, when they go into the Service Catalog, and when they are due for retirement. The challenges that we face in this area include compliance with the NIH Enterprise Architecture and the Enterprise Project Life Cycle (EPLC), and fitting the SPM process into the NIH governance structure. As CIT works through these challenges, the goal is to produce a repeatable process that can be used to ensure that services are chosen, reviewed, and retired in a structured way.

Questions?

If you would like to know more about ITIL at NIH, you can sign up for the ITILv3 Overview class offered by the CIT Computer Training Program (http://training.cit.nih.gov/coursedescription.aspx?courseID=CS0000000000181), visit the ITIL@NIH Interest Group website http://itil.nih.gov (login required), or contact the NIH IT Service Desk online at http://itservicedesk.nih.gov or by phone at 301-496-4357 (6-HELP) (local), 866-319-4357 (toll free), or 301-496-8294 (TTY).

CIT Retires NTLM Version 1

To enhance computer and networking security for all of NIH, CIT is retiring the authentication protocol Windows NT LAN Manager version 1 (NTLM v.1) at the enterprise level. NTLM version 2 has superseded version 1, and upgrading to the newer version ensures that our authentication services to NIH remain up-to-date and in compliance with security standards.

What is NTLM?

NTLM is an authentication protocol that CIT provides to NIH as part of our Active Directory (AD) Infrastructure Services. These services are important to all NIH computer users because your access to NIH applications and networks services relies on the AD's management of user accounts, computers, and other IT resources.

As an AD authentication protocol, NTLM provides a challenge-response authentication mechanism, in which clients are able to send their identities without sending a password to the server.

What will change?

Once version 1 has been retired, domain controllers will refuse LM and NTLM v.1 responses and accept only NTLM v.2 responses. Clients will use NTLM v.2 authentication, and should use NTLM v.2 session security if the server supports it.

Upgrading from NTLM version 1 to version 2 offers several benefits for users:

- Enhanced authentication security levels.
- Compliance with NIST security guidelines, SAS-70, and OIG audits.
- Better preparedness for using the Kerberos authentication protocol for cross-platform authentication and Single Sign On technologies.
- Improved integration of authentication and authorization mechanisms for CIT customers' enterprise applications.

Retirement timeline

The NIH Architecture Review Board (ARB), the NIH Information Technology Management Committee (ITMC), and the Chief Information Security Officer (CISO) initially approved the retirement of NTLM v.1 in 2006.

A full shutdown of NTLM v.1 was scheduled to occur in 2007, however some ICs were not able to update their systems and applications to support NTLM v.2 in time. To ensure a smooth process for the entire NIH community, we extended the testing and implementation schedule for the retirement project into this year.

DCSS has been conducting testing to ensure that all ICs are ready for the version 1 retirement. Full implementation of the NTLM v.1 retirement is currently set for the end of October.

Questions?

If you have questions about the NTLM v.1 retirement and its potential impact on you, please contact the NIH IT Service Desk online at http://itservicedesk.nih.gov or by phone at 301-496-4357 (6-HELP) (local), 866-319-4357 (toll free), or 301-496-8294 (TTY), and the Service Desk personnel will direct you to the proper contact.

Ask the NIH IT Service Desk

Annual Active Directory Account Review

On May 17, 2010, a new process was implemented at the request of the NIH Office of the Chief Information Officer for annual review and reauthorization of NIH Active Directory (AD) accounts.

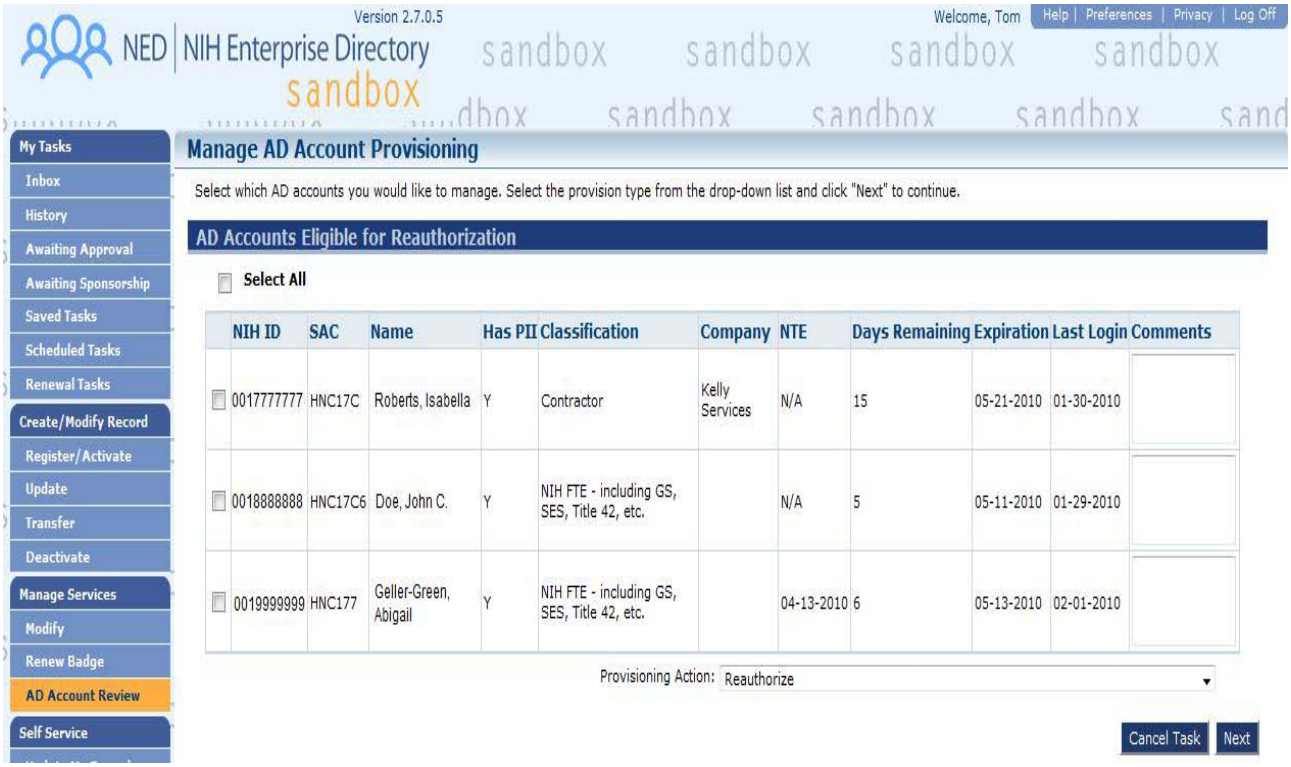
The new AD Account Review process requires NIH Enterprise Directory (NED) Administrative Officer (AO) Sponsors to annually review AD user accounts authorized in the system and to determine on a case-by-case basis whether each NIH user still requires their AD account (and exchange mailbox if also authorized).

What is the purpose of this change?

The purpose of this new process is to ensure that each person with an active NIH AD account still has a need for the account, as dictated by their NIH job responsibilities. In some instances, this process may also help to eliminate active NED records for users who may have left NIH.

How does the process work?

Thirty days prior to the one-year anniversary of the AD account sponsor/reauthorization date, AO Sponsors will receive an automated email notification and be directed to the AD Account Review interface in NED. There will be a list of all staff included in the AO Sponsor's primary Special Agreement Check (SAC) coverage eligible for reauthorization, as well as an option to "Reauthorize" or "Deauthorize." If more than one account is up for renewal, the AO Sponsor will be able to reauthorize or deauthorize multiple accounts in one action by selecting the necessary checkboxes next to the staff members.



As an AO Sponsor, what are my responsibilities?

When an AO Sponsor receives an account renewal notification, they should make certain the user still has a need for the AD account (and exchange mailbox if also authorized). In some instances this may require contacting a Project Officer/Supervisor or the actual user themselves. No account deauthorization should be performed until it has been determined the user no longer requires the account.

The AO Sponsor should promptly reauthorize or deauthorize the AD account after making a determination as to whether the account is needed or not.

Is there a review period?

Yes, there is a 30-day review period for all AD account provisioning or deprovisioning requests.

What will happen if no action is taken?

If no action is taken by an AO Sponsor within the 30 day review period, NED will automatically de-provision/deauthorize the AD account, and it will be immediately disabled. After being disabled, the account will be deleted in 15 days in accordance with the NIH Lifecycle Policy.

What should I do if an account is accidentally deauthorized instead of reauthorized?

There is no "undo" feature within AD Account Review. In order to reauthorize accounts, you must use the NED Manage Services – Modify menu option to request an AD account (and Exchange mailbox if also needed). After the task has been approved and sponsored, you should ask the NIH IT Service Desk to enable the accounts.

What should I do if an account was reauthorized but now needs to be deauthorized?

If the NED record should remain active, you should deauthorize the accounts using the NED Manage Services – Modify menu option. If the whole NED record should be deactivated, then you should use the NED Create/Modify Record - Deactivate menu option.

Why don't I see the AD Account Review function?

The majority of NED users are not responsible for using AD Account Review. This function is only available to AOs who also have the Sponsorship role.

What are some tips if I don't see all accounts I need to reauthorize?

1. In order to see accounts within AD Account Review you must set the necessary SAC codes as Primary SACs. An AO should click "Preferences" at the top right. Highlight the necessary SAC codes under Available SACs, use the right arrow

button to move them to Primary SACs, and click Submit.

2. Please search for a person using View Account History. You will see which actions have already occurred regarding the person's AD account. Often, this will show the account has already been reauthorized and the name of the AO Sponsor who took care of it.

Questions?

If you have questions or need assistance, please contact the NIH IT Service Desk online at http://itservicedesk.nih.gov/ or by phone at 301-496-4357, 301-496-8294 (TTY), or 866-319-4357 (toll free).

Directories and Reference Information

NIH Computer Center Hardware and Software
[http://cit.nih.gov/ServiceCatalog/HardwareSoftware.htm]

Computer Services Telephone Directory
[http://cit.nih.gov/NR/rdonlyres/CD8200B2-35E6-424C-A1C9-48DA35CE8155/0/TelephoneDirectory.pdf]

Online Services Directory
[http://www.cit.nih.gov/ServiceCatalog/OnlineServices.htm]

The CIT Service Catalog
[http://cit.nih.gov/ServiceCatalog/]

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