# Swanlund System Services : Sustainability Committee August '09, First Update

This page last changed on Aug 31, 2009 by childrss.

Here's a brief report on what we've been able to accomplish since December '08. More details, including a google map of thin client placement, user interviews, presentations and more may be found on the project website at <a href="http://illinois.edu/goto/greencomputing">http://illinois.edu/goto/greencomputing</a>

# **Quick Summary**

All grant monies have been spent, and we have approximately 40 total thin clients.

Out of 28 units purchased with Student Sustainability Fee monies, half (15) are permanently deployed as Student/Public Access kiosks, at any given time approximately 4 units are undeployed (as we get units back from demos/testing), and the 10 remaining units are in use as test-of-concept/try-before-you-buy devices for desktop replacements for departments around campus.

The trial desktop replacement program has been very successful: one department has already purchased two of their own thin clients after using one of the trial units. We expect to have most of the departments that are currently using Student Sustainability Fee thin clients purchase their own when our next proposal is funded.

Once the departments return their trial units, they will be redeployed for permanent installation as kiosks such as those at the at the Illini Union (this replacement has already been discussed and met with tentative approval from the Union's IT staff)

Financials					
	Thin Client Expenditur 2009	res	Award	Spent	Available
	Student Sust		\$7,000.00	\$7,000	
		Sorf's Award	\$3,000.00	\$3,000.00	
	Total \$9,621.89 Purchase	SSS Fu	nds	\$987.56	
		Dept Funds		\$1,975.12	

The Student Sustainability Fee monies went immediately towards purchase of thin client hardware, as the manufacturer was offering a discount on units purchased prior to Jan 1, 2009. Twenty-four ChipPC EX6500NG's (Windows CE), two EX6600's (Windows CE, Dual Monitor) and two ChipPC LXN2321's (Linux-based).

The SORF award was used for client access licenses (CALS) for the terminal servers, as well as a test implementation of Macintosh Terminal Server (AquaConnect), server upgrades as well as one additional Dual Monitor EX6600 and some accessories (VESA monitor mount & 3 USB power cables that allow the thin client to be powered by the USB ports on the monitor).

The SSS (swanlund system services) and departmental funds also went to purchasing thin clients. Individual departments are responsible for supplying the monitor, mouse and keyboard for each unit.

Staff time for Terminal Server setup, technical support, training and end-user assistance, marketing materials and their development were covered by Swanlund System Services.

## Deployment

For demos/presentations and quick deployments (to replace machines that have failed and must be repaired), we have configured a grab-n-go "crash cart" that consists of a 17" LCD panel monitor with a thin client velcro'd to the back along with a Keyboard, Mouse and Monitor. Providing a thin client as a temporary substitute for their "real computer" provides an excellent opportunity for introduction to

Terminal Services/Thin Client technology to a user at a time when they're grateful to keep up and running.

This same crash cart setup has also been used this at several of our presentations combined with two Kill-A-Watts to show the difference in power usage between a thin client and a traditional desktop.

Approximately 10 units were put into temporary use during Engineering Open House, by the UIUC Chapter of ACM (Association for Computing Machinery) as well as part of a display at Loomis Physics Lab by the NRES 199 students. From comments from the students running the poster sessions, they performed quite well (most were running in stand-alone mode (without being connected to a terminal server) using the built-in Windows CE web-browser, a limited capability edition of Internet Explorer).

In the following list, Campus IT Professionals net IDs are shown in **bold** (entries without associated ITPro net IDs are supported by Swanlund System Services -- **cclausen/childrss**). End users' net IDs are displayed in *italics*.

## **Sustainability Fee Units**

#### Permanent Installation (15)

- 4 Office of the Registrar (jecoyle, rkahn) to replace old self-service kiosks in the lobby.
- 6 Office of Student Financial Aid (dstrole) to replace 6 old computers also used as student selfservice kiosks
- 3 Computer Science/Siebel (mussulma) adding 3 stand-alone (not tied to a terminal server) email kiosks
- 2 Campus Recreation (awilke) e-mail kiosks at CRCE and ARC

#### Loan/Testing (10) (In use & In progress of installation)

- 3 Vice Chancellor for Student Affairs front desk reception area and Turner Fellow Interns (<u>http://studentaffairs.illinois.edu/students411/turnerfellows.html</u>)
- 3 FAA (wryan/jdcox) complete desktop replacement for 3 business office desktops (nutter, tatieman, burris1)
- 1 Urban & Regional Planning (**diannep**) to test as desktop replacement for business office (*gfisher*)
- 1 Public Affairs, (jaclynb) Public/Student Access for Freedom of Information Act requests
- 1 Student Affairs Development (*kmalone*) RETURNED. Used by Katie Malone testing for suitability for desktop replacement, 2 departmental thin clients purchased
- 1 Institutional Review Board (*kahler*) end-user testing for suitability for dual-monitor desktop replacement

# Temporary Setup

- ~10 Units 2009 Engineering Open House (EOH), ACM and NRES 199
  - ACM used to display student project websites, NRES used as a poster session demo to display what a low-energy thin-client looks like

#### **Departmental Purchased Units**

- 4 Office of the Chancellor (trice, slwilli, rawles, wdadams) complete desktop replacement
- 2 Office of the Chancellor awaiting deployment
- 1 Swanlund System Services (*childrss*) complete desktop replacement
- 2 Office of the Provost (awaiting deployment)
- 2 Student Affairs Advancement (*kmalone, cunninghm*) complete desktop replacement (these were purchased after trial use of the Sustainability Fee Purchased units)

## **Outreach & Public Engagement**

- Wed Nov 5th 2008: CCSP Fall 2008 Chris' initial presentation to Campus IT Professionals
- Fri Nov 14 2008: Craig Jackson's Friday Caffine Break (informal U of I Computer Professionals meeting)
- **Mon March 9th:** 2009 Public Engagement Symposium & Tehcnology Showcase Presentation open to general public, first run of Keynote presentation
- Fri March 13th: NRES 199 Building a Campus Carbon Registry We were asked to present at their class, so we used the "crash cart" setup as well as connecting the thin client up to the projector as well as keynote presentation.
- Fri & Sat March 13 & 14: Engineering Open House 2009 We manned a presentation table using the Keynote presentation and two Kill-a-Watt's to display the energy differences between a thinclient and a traditional desktop. Interest was generated from the general public as well as U of I Computer Science faculty working with Cloud Computing (similar to Google Apps). This is important as another possible venue of funding as well as expanding usage on campus and beyond.
- Wed, April 8th 2pm 8pm Planet U Poster session presentation, recycling materials used on website & keynote for EOH.
- **Campus Units "Green Teams"** -- We're working on contacting these teams to aid in identifying possible Thin Client deployments Spring CCSP 2009 Not listed: Various one-on-one demos to interested parties, on-site setups at departments for demos, information lunch discussions with other ITPros, all together.

We welcome any questions about the project at sabsupport@illinois.edu and should you wish to green your desktop, we'd be happy to work with your IT staff to place a loaner thin client on your desk.

Matt Childress, Chris Clausen Swanlund System Services SIGSAC