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Summary

Mission
Education is the key to a prosperous future for North Carolina. DELTA promotes the quality of education by extending the reach of the faculty, collaboratively applying expertise in technology and pedagogy in an efficient, effective, and service-oriented environment.

Vision
We seek to improve the quality of education by harnessing technology to provide ready access for all learners. In this way we hope to meet the challenges of a changing society.

Programs
DELTA’s program accomplishments—grouped by unit—represent changes in the scope of activities, changes in volume of activities, significant achievements, and special programs for FY ’08.

Distance Education
The Distance Education (DE) unit continued to grow DE enrollment, programs and services in FY ’08. DE enrollment experienced a 16% growth from FY ’07 representing nearly 1,000 additional students, with a total of 52,071 student credit hours in 46 degree, certificate, teacher licensure, and subject specialization programs. Eleven new faculty members and 24 new or re-recorded classes were added to the DE Flexible Access Credit Courses program. This growth, in part, was a result of DE’s continued proactive approach by the DE Planning and Development office to reach out to faculty, departments, and other colleges.

DELTA’s DE unit successfully consolidated DE Student Services, which allows for enhanced services such as Non-Degree Studies (NDS) student application review and processing, course registrations, advising, and proctoring services. Additional reorganization in the DE unit allowed for the creation of DE Educational Technology Services, which supports the implementation of rich media recording environments—specifically MediaSite—for faculty to capture and deliver content to distance students.

Two initiatives of significance in the DE unit include the development of the NC State Youth Offender Program and the continuation of the DE Program Coordinator
meeting series. DE’s Assessment and Diversity unit provided several courses for NC State’s participation in the Youth Offender Program, a federally-sponsored initiative aimed at reducing recidivism rates. The DE Program Coordinator Meeting series has continued semi-monthly meetings to bring participants updates on University administration procedures, presentations on topics of interest, and round table discussion and collaboration.

**Instructional Support Services**

DELTA Instructional Support Services (ISS) increased its faculty support and production services in FY ’08, in addition to taking on new initiatives such as a Large Course Redesign (LCR) project and a pilot of Moodle, an open source learning management system (LMS).

DELTA ISS offered 161 workshops attended by 1,575 participants (faculty, staff, and graduate students), a participant increase of 87% from FY ’07. ISS staff provided 4,430 help calls and consultations, a 36% increase over FY ’07. Feedback from the Help Desk service showed 92% of respondents saying that their problem was resolved satisfactorily. ISS also hosted the 10th Teaching and Learning with Technology Summer Institute for Faculty and the Instructional Technology Assistant Program (ITAP), immersive programs for faculty, staff, and graduate students. DELTA course production supported the development of 26 courses in FY ’08 through the IDEA Grants, LITRE Grants, and DE programs. Staff course production hours (6,100 hours), saw a 13.5% increase over FY ’07.

New to FY ’08 was support for Large Course Redesign (LCR), an approach to reconceiving and rebuilding the delivery of large-enrollment courses to increase student learning outcomes and contain instructional costs—primarily by incorporating instructional technology. DELTA provided funds and staff support for LCR projects in Chemistry, Biology, Physics, and Engineering.

ISS continued faculty support for NC State’s learning management systems, including Blackboard Vista, Elluminate, and WolfWare. Vista and Elluminate usage continued to grow in FY ’08. DELTA, in collaboration with CALS, also began a pilot of Moodle, an open source LMS.

**Educational Technology Services**

In a year of restructuring, Education Technology Services (ETS, formerly Information Technology), focused on new responsibilities, technology shifts, and laying the groundwork for DELTA’s future in LMS research and classroom capture.

In FY ’08 Media Distribution Services assumed complete oversight and operational responsibility for the CRC cable channel 18. After research into classroom capture options, Video Communication Services (VCS) selected and deployed Rich Media capture stations (MediaSite and Echo 360) into all VCS-managed classrooms (except
Withers). This completely eliminated the use of hard media in the classrooms and expanded the process of archiving captured classes as digital assets.

Keeping up with their production responsibilities, VCS supported the university through the booking of 5,302 work orders totaling 8,012 hours of services. 3,963 of those hours were directly related to Distance Education courses produced in DE classrooms. 906 hours were transmitted via H.323, including 608 hours transmitted for the Engineering 2+2 and BSE programs.

The newly-formed Applications Development and Applications Support groups led DELTA's planning and design (primarily system and deployment design) as well as governance on the Moodle pilot project. Additional ETS planning during FY '08 included the creation of a 10-year facilities plan for VCS classrooms.

**Marketing and Partnership Development**

Marketing and Partnership Development (MPD) fulfilled its most important strategic goal of FY '08 by developing, implementing, and strengthening the DELTA brand and reputation, while supporting the NCSU parent brand. As part of this effort, MPD developed a new DELTA tagline: Learning without Limits.

Additionally, DELTA MPD developed and implemented a strategic marketing approach for DELTA marketing and communication materials. This required the development of an integrated, collaborative MPD team, made up DELTA members from MPD, DE, ISS, and ETS. This team completed more than 35 marketing projects in FY '08.

A final accomplishment of DELTA MPD in FY '08 was managing the Gateway Technology Center (GTC) partnership with East Carolina University (ECU) to provide DE services to the Rocky Mount region. GTC highlights from the year include DE recruitment, the development of an NC Teach cohort, a new DE Master's in School Administration, advancement of the 2+2 Pre-Engineering partnership with community colleges, and the success of the NC State College of Management Math Enrichment Camp.

**Business Office**

DELTA's Finance and Business Office refined internal procedures in FY '08 as well as modifying funding distribution procedures for DE programs and Flexible Access courses. The Finance and Business Office created an SOP to better define EPA positions within the organization. By describing the responsibilities associated with specific titles, they are able to ensure equitable use of titles across the organization.

Starting in FY '08, DELTA began distributing DE funds on a continuing basis to colleges that have DE programs. These continuing funds are determined by formulaic funding based on DE student credit hour (SCH) projections for each DE program within each department of that college. Each college receives 50% of their
program's continuing budget in the Fall and then the remaining 50% after Spring census if at least 95% of the projected fundable SCH budget has been realized. If 95% is not met, then continuing budget is allocated in proportion to actual enrollments.

DELTA also implemented a plan to augment the funding provided for courses offered via the Flexible Access Program by adding an amount to support college-level administrative overhead. This funding is provided directly to the college and is in addition to the funding already allocated for faculty overload salary and benefits and departmental support.

Compact Plan Initiatives

DELTA's Compact Plan Initiatives for 2007-2010 and their status include the following:

2. Launch the Large Course Redesign (LCR) initiative. Status: In progress.
5. Implement a Rich Media Capture system and a plan for video classroom redesign. Status: In progress.
12. Establish a new position to support new technology evaluation and dissemination. Status: Not funded.

The 2007-2010 Compact Plan: Action Item Progress Report can be found at http://delta.ncsu.edu/about/reports/.

Research

DELTA was engaged in a variety of research areas relating to large course redesign, educational gaming and 3D online learning environments, accessibility and media distribution.
**Large Course Redesign (LCR):** In FY ’08 DELTA staff members were involved in researching LCR principals, program planning for LCR implementation at NC State, and providing seminars on LCR topics. Staff worked with faculty teaching four high needs courses to apply large course redesign methodology to address whole-course issues rather than focusing on one section of a course. DELTA has initiated a pilot grants program to provide LCR support to targeted high needs courses.

**Serious Games and 3D Online Learning Environments:** DELTA continued its investigation of 3D Online Environments for teaching and learning. Efforts have focused on developing solutions for virtual laboratories (vLabs), which resulted in an immersive Flash game for Plant Pathology disease diagnostics. Other explorations include Torque Game Engine, Unity3D, Open Croquet and Second Life.

**Accessibility:** Related to accessibility, DELTA staff conducted and presented research on online assessment tools for students with disabilities and modifying open source software for the purpose of accessibility and usability.

**iPod and Cell Phone Media Deployment:** DELTA researched new ways of deploying media for distance education courses. They successfully explored transcoding content into file formats compatible with iPods and other portable media players. They also successfully tested deployment of content on video capable cell phones.

### Staff

**Changes**

Due to staff turnover and the creation of new positions, 15 new staff members joined DELTA in FY ’08. All SPA positions were career banded, addressing many salary inequities within SPA positions at DELTA. Additionally, DELTA EPA titles were reassigned to ensure equitable use of titles across the organization and accordance with university guidelines.

**Professional Development and Activities**

DELTA staff members from all units were active in professional development and committee service, both within and outside of the NC State community. Kay Zimmerman was elected as the President of the North Carolina Distance Learning Association for 2008-2009. Three DELTA employees participated in established leadership development programs. See DELTA unit reports for a detailed list of conferences attended, papers presented, and committees served on.

**Awards**

DELTA staff members received the following recognition and awards in FY ’08:
• Dr. Tom Miller was honored by the United States Distance Learning Association (USDLA) with its award for Outstanding Leadership by an Individual in the field of Distance Learning. Miller was also awarded the Excellence in Leadership in the field of Distance Learning by the North Carolina Distance Learning Association (NCDLA).
• The DELTA Instructional Services Faculty Support Team received the Gertrude Cox Project Award for their success with the 9th Summer Institute.
• Tony Pearson, manager for DELTA’s Video Communication Services, was named a 2008 University Awards for Excellence winner.
• Peter Watson was nominated for Pride of the Wolfpack Award.
• John Pugh was nominated for the 2008 University Awards for Excellence. He also received a Pride of the Wolfpack Award.

Diversity, Retention, and Staff Well-Being
DELTA is addressing two goals for increasing diversity—within DELTA and within the DE student population—as indicated in our Compact Plan Initiatives. These initiatives are:

• Examine workforce diversity and retention
• Examine DE diversity initiatives based on retention/attrition factors (formerly DE Student Retention Initiative)

DELTA is committed to hiring and retaining a diverse and qualified pool of applicants following best practices in hiring, retention and diversity. In our commitment to best hiring practices, DELTA’s SOP requires an OEO orientation session at the initiation of every position search.

Contributing to the retention and well-being of staff involves various organizational efforts, from addressing salary issues to providing a supportive work environment. In FY ’08, DELTA addressed salary issues and title/responsibility inequities by completing the banding of all SPA positions in DELTA, and via the creation of an SOP for EPA employees related to across-the-board duties for individuals at various “title” levels within the organization.

DELTA also continued to support a team-building, annual staff retreat in May 2008, held at the JC Raulston Arboretum. DELTA senior staff and the retreat planning committee worked with NC State’s Training & Organizational Development Unit to create an exciting retreat that combined problem-solving sessions related to organizational goals and needs with the opportunity to have some fun and get to know their colleagues better.

DELTA also has an Activities Committee. In FY ’08 this committee hosted bi-monthly birthday celebrations to recognize birthdays of all employees, and
organized a number of fun outings and team-building events including several lunch brown bag picnics at Lake Raleigh, a Fall Festival with a pumpkin carving and costume contest, a November Thanksgiving potluck luncheon, the DELTA Holiday party, and DELTA’s participation in the March 2008 NC State Employee Appreciation walk (where we won “the shoes”).

Finally, DELTA staff participated in NC State’s staff well-being survey (http://www2.acs.ncsu.edu/UPA/survey/staff/index.htm). Senior staff analyzed the results of this survey, and based on this feedback, have implemented several initiatives to create better communication between and among DELTA senior staff and all DELTA staff, including initial efforts to reorganize the DELTA One Team staff meetings and the creation of a new employee welcome lunch.
Distance Education

DELTA's Distance Education unit seeks to optimize NC State's land grant mission by extending learning opportunities to North Carolina’s citizens and beyond. To accomplish this goal the Distance Education office administers DE activities at North Carolina State University, including program planning and development, enrollment planning, preparation of DE course schedules and calendars, student advising, enrollment, and registration services, DE faculty and student support services, local and remote exam proctoring services, assessment and diversity initiatives, educational technology services, and ongoing collaboration with internal support services and external colleagues.

Programs/Compact Plan – Achievements, Changes in Scope, Volume of Activities

Enrollment Growth

9,408 students were registered in 1040 courses and sections offered by NC State faculty in 46 degree, certificate, teacher licensure, and subject specialization programs for a total of 52,071 student credit hours during the 2007-08 academic year. Almost 1,000 additional students were enrolled over the previous year, achieving an overall enrollment growth of 16%. Eleven new faculty and 24 new or re-recorded courses were added to the DE Flexible Access Credit Courses program during 07-08.
We continued a proactive approach to **DE Planning and Development** of new DE initiatives by encouraging faculty, department, and college participation in DE initiatives. This was accomplished through meetings and interface with faculty, program coordinators, department and college leadership to provide an overview of DE services and support, and serving as a consultant for the development of proposals and implementation of plans to offer new DE courses or establish DE programs. Outcomes of these efforts in 2007-08 included two new online Master's programs in the College of Engineering and new student cohorts begun in the Master of School Administration and the NC Teach lateral entry teacher program. DE Planning and Development funding was provided for eight additional DE program initiatives. Six new Master's degrees are in the development or approval phases: Master of Arts in Teaching, MS in Environmental Assessment, Master of Parks, Recreation and Tourism Management, Master of Geographic Information Systems, Master of Nuclear Engineering, and a Master of Materials Science and Engineering.

Overall DE enrollment projections for the 2009-11 biennium were prepared in consultation with DE program directors/coordinators and College leadership. A 15% average annual growth in DE fundable student credit hours enrollments and 12.5% in DE non-fundable enrollments is projected.


**DE Administrative Services** scheduled all Distance Education and Study Abroad course sections in the Registration and Records database, coordinated collection and posting of InfoFacts, course syllabi, student handouts, responded to queries from the Ask the Pack FAQ, and staffed the DE Help Desk to respond to faculty and student requests.

A major focus for 2007-08 was the completion of DE student services consolidation within the DE unit. This streamlined approach allowed us to work more closely with DE students, and to better understand their objectives and needs while achieving economies of scale.

The consolidation of DE services within the DE office included several enhanced service responsibilities in 2007-08:

- 3,000 non-degree seeking (NDS) student applications were reviewed and processed, including residency determinations, international student registries, campus safety question review, and other miscellaneous concerns.
- Registration services were provided for DE programs, averaging 400 course registrations per week during peak periods. Approximately
80% of all registrations are specific to DE programs, not stand-alone Flexible Access courses.

- A full-time academic adviser provided advising contacts to more than 1,600 students by phone, office visits, email, and FAQ responses.
- Exam proctoring services in a secure facility were provided on-site for 8,103 exams and proctoring arrangements were made for 1,779 remote exams.
- Outreach services included representation at the NCSU new student orientation sessions, military and corporate education fairs, and on-site orientations for North Carolina School of Science and Mathematics high school students enrolled in DE courses.

The DE Assessment and Diversity unit developed the first NC State Youth Offender Program which has been successful in reducing recidivism rates. This program is funded by the U.S. Department of Education through the N.C. Department of Corrections. Support services included faculty recruitment to teach in the prison setting, orientation facilitation, and assistance with registration and record-keeping processes.

A middle school age-appropriate video was created in partnership with the College of Veterinary Medicine and DELTA’s Video Communication Services, specifically designed to assist in the recruitment of underrepresented minorities and others who might have an interest in veterinary medicine.

The unit also conducted preliminary evaluation for the new Learn and Earn Online program in preparation for implementation of the program in Spring 2009, including a site visit to the UNC Greensboro iSchool. It conducted DE services surveys of DE faculty and students, and continued work on the Quality Assurance and Retention and Attrition studies.

**DE Initiatives**

A semi-monthly DE program coordinator meeting series continued, providing updates on University administration procedures, presentations on topics of interest, and round table discussion and collaboration. UNC Online, campus VISTA technologies and services, and DE’s rich media initiative were presented to the group, and discussions on a number of DE topics took place.

The Internet accounts for more than 60% of all Distance Education course content delivery and also provides course support and email communications for all DE courses. As we progress toward a more mixed use of technology for content delivery, rich media video capture systems have emerged as a cost-effective means to provide flexibility and ease of use for faculty to update and deliver course
content. This combination of Internet and video technologies allows the seamless integration of course content with the instructor's pedagogical approach for an optimal learning environment.

The DE Educational Technology Services unit was established in 2008 to support the implementation of rich media recording environments for faculty to capture and deliver content to distance students. This versatile instructional resource available to both on-campus and DE faculty combines hardware and software delivery to provide just-in-time recordings needed for instruction, training, announcements, etc which are delivered via the internet.

Since its inception the unit has begun building relationships with faculty departments and programs across the NCSU campus and introducing them to the new rich media technology DE is making available to them for their use in DE courses or department needs. These relationships are key to the success of the rich media studio and can provide many opportunities for DE initiatives across campus and the use of technology.

Mediasite projects completed or in process:
• Public and private colleges and universities met at UNC GA and featured representatives from major foundations (Fulbright, Marshall, Rhodes, etc). We provided an online recording of all presentations so those not present could take advantage of these representatives’ visit and willingness to talk with individuals and answer questions, as well as create a long-standing resource for educators from across our State. The website is:
http://mediasite.eos.ncsu.edu/Mediasite/Catalog/?cid=ce51a879-2ef4-46b5-b719-e08670d012f3

• Instructional Support Services (ISS) offers a wide range of workshops for faculty, staff, and graduate students engaged in teaching and learning with technology. With the rich media mobile unit we are able to record the workshops and make them available online. The website is:
http://mediasite.eos.ncsu.edu/Mediasite/Catalog/?cid=e0bfae70-9757-4f23-b576-b34148e47210

• The Benefits department within Human Resources at NCSU would like to provide faculty and staff with web-based online training. We are currently working with Benefits to record these videos. The website is: http://mediasite.eos.ncsu.edu/Mediasite/Catalog/?cid=a422ce5a-d70d-4d5d-ae86-de6a9364abdf

• Registration and Records’ Student Information Systems (SIS) will be replacing the legacy system at NCSU used by faculty and staff across campus. Full implementation with occur in 2009. R&R has recorded several videos to assist in training users how to use the system. We are continuing to work with them to provide further videos to meet their training needs. The website is: http://mediasite.eos.ncsu.edu/Mediasite/Catalog/?cid=de624c69-1a6e-475d-9d8d-06067849a042

• For those unable to attend the DELTA Staff Meetings we are able to make those available online:
http://mediasite.eos.ncsu.edu/Mediasite/Catalog/?cid=ee5ea729-4f9d-4a11-916c-2b4c65f6bd1d

• We are working with Lee Ann Gillen, Instructional Designer, to record guest lecturers for Dr. Keith Harris’ course FS201. Website: http://mediasite.eos.ncsu.edu/Mediasite/Catalog/?cid=02d42511-a92e-41dc-9368-4a76b32246c4

• We recorded seven guest lecturers for Sherry Dutton’s course, NPS 498
Website:
http://mediasite.eos.ncsu.edu/Mediasite/Catalog/?cid=239e14b6-5f9a-40a1-93d0-2b18d890a6ce

We are working with Randy Wells in Crop Science to record several lectures for his CS 714 course.
Website:
http://mediasite.eos.ncsu.edu/Mediasite/Catalog/?cid=e6491744-5c78-4189-8b0d-c1be965ab5bc

CTE and ITRE are research centers at NC State Centennial Campus studying various types of transportation systems (highways, transit, bikeways, etc.), their related design/engineering components and impacts. Their educational mission is to deliver research/training information to working practitioners as well as to students (i.e. non-credit professional development). Currently, there’s been a clear increase in demand for more web-based rather than satellite delivery of our programs. We will be working with CTE/ITRE to determine how we can help meet their needs for web-based delivery.

Evaluating and planning for the long term aspects of Mediasite implementation:

- Automatic feeds from Registration and Records for automatic creation of schedules within Mediasite for DE courses recorded in the VCS studios.
- Standards and methods for security for Administrators and users of the system
- Integration of new technologies and other enhancements

Other Projects:

- We are working with DELTA’s Marketing and Partnership Development unit to develop a plan to create a new DE website to meet the needs of potential and current students, faculty and staff.
- DE Course Template - We are working with DELTA’s Marketing and Partnership Unit to streamline a course “splash-site” for every distance education course to build brand consistency, improve InfoFacts and have one location for all aspects of the course (course website, InfoFact, welcome video, etc)
• Serve as liaison for UNC Online to ensure data feeds are accurate and timely from NCSU programs being listed on the website.
(http://online.northcarolina.edu/)
DE Staff: New Hires, Appointments, Professional Activities, and Recognition

New hires included Karen Potter, Administrative Support Specialist; Lily Leegstra, DE Proctoring Assistant; Sharon Broere, Assistance Director DE Administrative Services; Laura Stephenson, Associate Director, DE Educational Technology Services.

John Pugh was a nominee for the Award for Excellence and a Pride of the Wolfpack recipient for his contributions to the DE Proctoring Center’s streamlined exam scheduling process, enhanced security features, and increased use of electronic exams.

Monica Price served on the University Assessment Committee, African American Coordinating Committee, University Diversity Committee, UNC System Online Course Quality Committee, and co-chaired the UNC System Assessment Interest Group. She published a new issue of the DE Assessment and Diversity newsletter and gave a presentation to the Chancellor’s African American Community Advisory Council.

Laura Stephenson served on DELTA’s Rich Media Evaluation Committee, the LMS Strategy Committee and the Web Steering Committee. She also participated as a member of the Right Now FAQ Implementation Committee.

Melissa Williford was promoted to Director, Distance Education Administrative Services. She served on the SIS Implementation Team/Admissions and the Study Abroad Scholarship Selection Committee; she gave presentations at the NCSU New Faculty Orientation, presented and facilitated at the NCSSM student orientation session, and gave a presentation, “DE Administrative Services” at DELTA’s 2008 Summer institute.

Rebecca Swanson gave presentations to faculty, administrative, and civic groups. She served on NC State’s Student Information Systems Advisory Team, Enrollment Planning Committee, University Courses and Curricula Committee, the UCCC Subcommittee on Syllabus Regulation Review and the Certificate Guidelines, the Admissions Background Review and Investigation Committee, the Class Evaluation Implementation Team, the Blended MBA Task Force, the Summer Sessions Advisory Committee, the Substantive Change Review Team, and the Program Planning Committee for the TLT Conference. She published a review of *The Great Sea Island Storm of 1893* in the *South Carolina Historical Magazine*, vol. 108 (2007) and completed written and oral comprehensives for the PhD in History at the University of South Carolina, attaining ABD status in May 2008.
Instructional Support Services

FY 2008: Summer 2007, Fall 2007, Spring 2008 Workshop Schedule
July 1, 2007 – June 30, 2008 Production, Consulting and Service Schedule

Last updated by Donna Petherbridge September 10, 2008
Edited by Jennifer Warren
Written contributions:
Kim McAllister, Stacy Smith, Mike Cuales, David Howard, Traci Temple, Greg Kraus

Executive Summary
DELTA Instructional Support Services (DELTA ISS) provides a wide range of training, consulting, production support and creative services for faculty, staff, and graduate students engaged in teaching and learning with technology (TLT) activities at North Carolina State University (NC State). Services include training and support services (e.g. instructional house calls, regularly scheduled workshops, seminars, custom training), production services (instructional design, development and production, project management, and instructional resources), and instructional development (via a course redesign pilot program). DELTA ISS offers programs (ITAP and Summer Institute) and production support (both grant-related, through IDEA grants, pilot redesign grants, and general production support) for faculty, staff and graduate students engaged in TLT efforts. The DELTA ISS group is a unit within Distance Education and Learning Technology Applications (DELTA), with an Associate Vice Provost (AVP) reporting directly to the Vice Provost for DELTA. In FY 2008, DELTA ISS was comprised of twenty-one permanent staff positions (fourteen staff members in these positions were here during the entire fiscal year, while other positions experienced turnover and there were new positions also filled) and a number of students supporting a variety of activities.

During FY 2008, DELTA ISS offered 161 regularly scheduled workshop offerings consisting of 50 unique workshops, including the introduction of 16 newly created workshops. We utilized 22 trainers, including our partners in the Library and guest speakers. We had 1575 regular workshop enrollments (up from 835 in FY 2007, an 87% overall increase) (see Figure 1.1). We trained 500 unique participants via
regularly scheduled workshops (up from 305 in FY 2007, a 63.9% overall increase),
including 194 faculty, 211 staff, 86 graduate students, seven undergraduates, and
two others (see Figure 1.4). When considering the number of workshops offered
and the proportion of attendees, there were some overall participation decreases in
certain groups compared to the whole (for example, proportionately, faculty
participation decreased and staff and graduate student participation increased, see
the workshop section for details). Around 94% of participants responding to
workshop evaluation questions agreed or strongly agreed that our workshops and
training sessions met their expectations, a statistic consistent over the past seven
years. Custom training sessions continue to be utilized as a way to deliver tailored
training and support to various departments, with 126 enrollments, a decrease from
FY 2007 (see Figure 1.10), which may be in part explained by our increased, more
targeted regular workshop offerings.

In FY 2008, 4430 e-mails, phone, and in-person help calls and consultations were
documented, an overall increase of 36% (from an overall total of 3248 documented
calls in FY 2007). A total of 4118 Remedy calls and 312 Instructional House Calls
were reported during FY 2008 (see Figure 1.13). The marked increase in Remedy
calls, after a targeted decrease between FY 2006 & 2007 as more solutions were put
online, can be partially explained by Vista problems in fall 2007 that resulted in very
high call volumes. Noticeable spikes for service requests continue to occur primarily
in August/September, and January/February, with a smaller spike occurring in
May/June for the support of the summer school classes (see Figure 1.16). The
implementation of a customer service survey this year resulted in 454 surveys
returned that were very positive toward our Help Desk service, with 92% of
respondents indicating that their problem was resolved satisfactorily.

The Summer Institute (SI) had 39 regular participants (compared to 43 in SI 2007, a
slight decrease in participation caused by four last-minute withdrawals) (see Figure
1.19). This year’s Summer Institute included an open enrollment elective day where
faculty and staff not enrolled in the institute could attend, with 69 additional unique
participants enrolled in these electives, a 6.15% participation increase from FY
2007. The program was again highly rated by participants, with 100% of program
survey respondents indicating they would recommend the program to a colleague.

In FY 2007, the Instructional Technology Assistant Program (ITAP) underwent a
program assessment with the goal of improving the program to better meet
constituent needs, and with this evaluation process, only nine participants
completed the program in 2007. In FY 2008, 20 participants completed the
program, out of the 27 accepted to the program (a 74% completion rate). Additional
ITAP information can be found at http://delta.ncsu.edu/itap.

In a production capacity during FY 2008, the DELTA ISS staff, with the support of
others within DELTA, provided services and support to faculty involved in 26 course
production projects and two major non-course projects, consistent with the level of
course involvement in FY 2007. These projects were generated by the IDEA Grants program, the LITRE Grants program, DE programs that requested production support, other academic course production requests, and internal production requests. Figure 1.24 provides an overview of all DELTA ISS production hours, both course and non-course during FY 2008, compared to production hours during the three previous years (2005 – 2007). Including internal production and marketing projects, there was a 27.8% increase in documented production hours between FY 2007 & FY 2008. Looking only at course production numbers, DELTA ISS staff spent over 6100 hours working on course production projects, an increase of 13.5% from FY 2007. There was a 57.8% increase in the number of non-course production hours (which includes marketing materials for individual DE courses (splash pages), general DE course marketing, other projects as assigned, and research into new technologies).

LITRE grants were supported by approximately 85 hours of DELTA ISS staff time during FY 2008 (about half of what they were in FY 2007). IDEA grants work involved major work in completing continued grants from FY 2007, and initial work on grants awarded in FY 2008. During FY 2008, 11 projects from three different colleges (CALS, CHASS, Education, and PAMS) were still active from earlier grant cycles. DELTA ISS staff spent about 3921 hours during FY 2008 on these continuing projects. Additionally, 13 new IDEA grants were awarded during the FY 2008 IDEA grant cycle, four of which have not required production hours at this time. Around 1245 DELTA ISS staff hours were spent in support of these new grants. Of the 26 production projects that were active during the FY 2008 (to include all production work), 17 are completed. In the course of all production projects, DELTA ISS staff members have worked with faculty to create online materials for 15 new distance education courses, ten existing distance education courses, and one face-to-face course. Additionally, DELTA ISS staff provided over 4050 hours to non-course production projects, including Virtual Worlds research and development, and to marketing production. Figure 1.24 and Table 1.7 provide a summary of all course production projects hours for FY 2008.

Multimedia initiatives continued to move forward during FY 2008. DELTA ISS worked toward better defining processes and systems to accommodate the growing demand for creative and multimedia content across the organization. Creating reusable tools, Serious Games design and high-impact marketing efforts to promote Distance Education were a focus. Accomplishments include the DELTA branding initiative, Plant Pathology Disease Diagnostics game (vLabs), NCTEACH campaign, and 3D-Online Learning Environments research.

Large Course Redesign, which is the re-conceiving and rebuilding the delivery of a large-enrollment course to increase student learning outcomes and contain or reduce instructional costs, primarily by incorporating instructional technology, began as a DELTA supported project this year. In addition to monetary resources, DELTA ISS staff provided 161 hours of support toward redesign projects in
Chemistry, Biology, Physics and Engineering (see Figure 1.25). Additionally, DELTA ISS staff were involved in researching LCR principals, program planning for LCR implementation at NC State, and providing seminars on LCR topics.

Our Synchronous Learning Management System (LMS), Elluminate, is available to all NC State faculty and staff for professional purposes, including non-credit activities. By the end of FY 2008, there were 448 Moderator accounts in Elluminate, compared to 27 Moderator accounts in FY 2007 (+1600% increase). The total number of online sessions for FY 2008 was 3455, with an average of 10.6 sessions per day. This compares to 1189 sessions in FY 2007 (+191% increase). Out of pilot and into production last year, this appears to be a widely used technology for supporting teaching and learning.

During FY 2008, Blackboard Vista, continued in full production, integrated as a regular part of our LMS support structure. DELTA ISS Staff continued to support the use of Vista through the regularly scheduled workshops, some custom training sessions, the LearnTech Help Desk, the Summer Institute and ITAP programs, and through instructional house calls. WolfWare, NC State’s home grown LMS, was also supported. Blackboard Vista usage continues to increase each year, while WolfWare usage has declined over time. Overall usage information for all LMS activity can be viewed at:


During Spring, 2008, in collaboration with CALS, a small pilot of the open source LMS, Moodle, began. Six course sections were delivered in Moodle during Spring 2008, and 13 sections were delivered in Summer 1, 2008. Assessment of these courses is ongoing. Additional information documenting the Moodle investigation and can be found at: http://wikis.lib.ncsu.edu/index.php/LMS_Strategy.

Major accomplishments this fiscal year include:

- Continued excellence in faculty support services as evidenced by satisfaction measures, including post-Help Desk support customer satisfaction surveys and post-workshop satisfaction measures, both measures indicating at 92%+ satisfaction rate.
- A substantial increase in overall workshop enrollments (87%), unique participants (63.9%), and an increase in the number of attendees in a given workshop (Overall average from 6.33 to 9.78).
- Managing an increasing number of individualized help calls (36% increase), after a decrease in the previous year. We will need to continue to coordinate, though, with OIT to reduce this number, and continue to create job aids and online resources, as 25%+ growth per year in help calls is not sustainable with current staffing.
• Served our clients in a timely and professional manner during fairly significant start of semester challenges (August 2007) experienced with Blackboard Vista (class rolls issue).

• Continued close working ties, and new management models, with the Marketing & Partnership Development offers in order to create efficiencies in the production of marketing materials, and move forward a holistic creative direction for DELTA, including a successful collaboration on the DELTA branding initiative.

• Continued excellence in multimedia research and implementation, including the completion of a Plant Pathology Disease Diagnostics game (vLabs), NCTEACH campaign, and continued 3D-Online Learning Environments research.

• Completed 17 production projects that were active during the FY 2008 (to include all production work).

• Worked with faculty to create online materials for 15 new distance education courses, ten existing distance education courses, and one face-to-face course, providing 6145 staff hours toward course production projects.

• Researched, planned and implemented a pilot grants and support program for Large Course Redesign (LCR) initiatives. Awarded resources in support of early redesign planning for Chemistry 101, MAE 206/208 and Physics 205.

• Successfully supported a Synchronous Learning Management System (SLMS), Elluminate Live, service as part of our regularly support technology toolkit, as the usage grew exponentially during the year.

• Successfully collaborated with CALS to establish the Moodle Pilot server in Fall 2007 in support of a limited Moodle Pilot in Spring & Summer 2008 (19 courses), creating workshops and training in support of these courses.

• Continued professional involvement in a number of committees, workgroups and professional organizations by ISS staff members both within and external to NC State University.
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Description of Current Programs and Services

Instructional Support Services provides a wide range of training, consulting, production support and creative services for faculty, staff, and graduate students engaged in teaching and learning with technology (TLT) activities. Services include instructional house calls, regular workshops, seminars, custom training, instructional design and development, project management services, course redesign support, and access to a variety of resources (such as TLT materials and information for development of online courses and programs, campus subscription to Educause materials, etc.). DELTA ISS offers programs (ITAP and Summer Institute) and production support (IDEA grants, general course production services, and limited course redesign pilot grants) for faculty, staff and graduate students engaged in TLT efforts.

Normal operational hours are 8 a.m. to 5 p.m. throughout the year, with some evening workshops and occasional consultations scheduled between 5-9 p.m. During busy start of semester times, staff members are also often scheduled to monitor the help desk on evenings and weekends. DELTA ISS offices are located in the Learning and Research Center for the Digital Age (LRCDA) on the second floor of the East Wing in D.H. Hill Library on main campus in room 2113, and in the Venture III building in suite 267 on Centennial Campus.

Key programs offered and initiatives supported by the Instructional Service group during FY 2008 included:

a. **Workshops and Seminars (regularly scheduled).** Every semester (spring, summer & fall), DELTA ISS offered a series of regularly scheduled workshops on the tools and methodologies to support distributed and distance learning efforts. A selection of our offerings are taped and then broadcast on the Cooperating Raleigh Colleges Network (Channel 18), as part of a broader Faculty Development Outreach Initiative effort. Regular, ongoing assessments of all workshops and seminars are completed, recording participant responses in a database at the end of each workshop or seminar (both regularly scheduled and custom training). These assessments provide feedback on instructors and content, give opportunities for participants to suggest other workshops and programs that they would be interested in attending, and are used to evaluate instructors and plan future workshops and seminars.

b. **Custom Training.** In addition to our regularly scheduled workshops, we provide customized training within the DELTA supported toolset for faculty,
staff, and graduate students engaged in TLT activities at no charge to the NC State community. Customized training includes hands-on workshop sessions and seminars for faculty and informational seminars for departments. We will provide a single workshop or a series of workshops customized to meet the needs of a particular group. We can schedule time in the ITTC labs in the library, or our staff will go to other locations on campus. All customized training includes a needs assessment, the training itself, and follow-up with all participants.

c. **Instructional House Calls & Help Desk Support.** Our consultants can assist faculty in a face-to-face setting in the faculty member's office or in our offices, providing support for the faculty member's instructional technology needs. Additionally, our consultants maintain and monitor a Remedy (Help Desk) queue, in coordination with the Office of Information Technology (OIT) who offer front-line support. In assessing these efforts, both volume of calls and quality of response is monitored, and the professionalism and timeliness in which these are handled is reflected in performance reviews of staff members. Customer surveys are used to evaluate our help service.

d. **The Summer Institute.** The Teaching with Technology Summer Institute for faculty is a way for faculty to learn about instructional technology tools and techniques that can be used to support teaching and learning at NC State, and can accommodate up to 45 participants. Faculty members learn about supported technologies and resources available to them on campus as well as specific technical skills that will facilitate the creation and publication of Web-enhanced materials. Faculty members have the opportunity in the Summer Institute to discern what tools and techniques work best in their individual context. To assess this program, participants complete both a pre-assessment and a post-assessment form. This data is used to measure changes in knowledge, skills and attitudes as a result of the Summer Institute. Additionally, formative evaluation measures are built into the Summer Institute so that participants can provide feedback during the course of the Summer Institute. Program reports are available on the DELTA Web site. As with assessment data gathered from workshops and seminars, program assessment data is used to better plan and improve future programs.

e. **The Instructional Technology Assistant Program (ITAP).** ITAP is offered for NC State University students and staff members who wish to gain expertise in the technology used to create Web-supplemented or Web-based classroom environments. The program, which can enroll up to 20 participants per academic year, is designed to help address the need for local, college, and departmental technical support in instructional technology. For the purposes of assessment, the Instructional Technology Assistant Program
(ITAP) has both participants and their faculty sponsors complete an evaluation of the program once participants have completed their projects.

f. **IDEA Grants Program.** DELTA Innovation in Distributed Education Applications (IDEA) Grants ([http://delta.ncsu.edu/ideagrants/](http://delta.ncsu.edu/ideagrants/)) are provided to promote innovation in the use of instructional technology in online distance teaching and learning, build expertise in this area, and enhance the technology-rich learning environment at North Carolina State University. The DELTA ISS staff is charged with administering and supporting the IDEA grants program, including the online submission and review system, the processes and procedures associated with delivering grant-related services to faculty, consultations with potential applicants, and internal project management.

g. **Course Production.** DELTA provides assistance to NCSU faculty and staff in the form of funds and personnel to support planning, design and development of online and distance education courses, programs and materials. DELTA ISS staff work on course production projects as part of IDEA Grants, in strategic and directed support of DE Programs and other DELTA initiatives, and as a result of ad hoc Online Course Production requests.

h. **General Production Services.** The DELTA ISS staff can provide small scale (less than 10 hours) production support (for example, creating a website, multimedia resource, etc.) outside of IDEA Grants and Course Production services upon request for NC State University credit courses, via our Instructional House call service, depending on the scope of the project. Email learntech@ncsu.edu with your request.

i. **DE Production Services.** The DELTA ISS staff provides production support for DE courses per requests from DELTA’s Distance Education group.

j. **Large Course Redesign.** Large Course Redesign (LCR) is the re-conceiving and rebuilding of the delivery of a large-enrollment course to increase student learning outcomes and contain or reduce instructional costs, primarily by incorporating instructional technology. DELTA has initiated a pilot grants program to provide LCR support to targeted high needs courses.

k. **Learning Management System Training & Support.** DELTA ISS staff members provided a substantial amount of support for Elluminate, DELTA’s synchronous learning management system (SLMS) in FY 2008. DELTA ISS provided training, staff support and program management for this project, which is now part of DELTA’s Learning Management System (LMS).
infrastructure. DELTA ISS staff members also continued to provide a substantial amount of support for Blackboard Vista, a Learning Management System (LMS) that was released to the general campus fall 2005. DELTA ISS staff members provided continued support and training efforts as part of the LMS infrastructure support of this product during FY 2008. In addition, DELTA ISS staff members were actively involved in the spring 2008 NC State Moodle Pilot.

1. **Marketing Support.** The Multimedia production team works closely with Marketing & Partnership Development office in the design and creation of marketing materials.

The Instructional Support Services group, (renamed this year – was formerly the Instructional Services group), is one of the five units within DELTA, including Distance Education, Educational Technology Services, Marketing & Partnership Development, and the Business Office. In FY 2008, the DELTA ISS staff was comprised of 21 full-time permanent staff positions (with a number of those positions vacant for part of the year due to resignations and searches for new positions – 14 of these full-time, permanent staff were actually in DELTA the entire fiscal year), four temporary professional staff members, and 26 part-time students (graduate, undergraduate) supporting a variety of activities. The three additional students who work in the Digital Media Lab are paid for with DELTA funds, but work directly for the Library.

FY 2008

Director/AVP: Donna Petherbridge

Administrative Support Specialist: Jennifer Warren

Asst. Director, Instructional Development: Traci Temple***

Senior Instructional Designer and Associate Manager for Instructional Support Services/Assoc Director: Stacy Smith

Program Assistant (Administrative Support Specialist): Kim McAllister

Instructional Technologist: Scott Watkins** (Beth Shepherd*) & Greg Kraus & (Yiling Chappelow*)

Technology Support Specialist: Lisa Fiedor

Technology Support Technician: Charlie Morris** (Andy Click*)

Web Applications Developer: Thomas Wilson

Senior Instructional Designer/Assoc Director: David Howard
Information Specialist: Alyson Tuck*

Instructional Designers: Rob Hambrick** (Lee Ann Gillen*), Cathi Phillips*, Kim Rothwell

Senior Multimedia Specialist/Assoc Director: Mike Cuales

Multimedia Specialists: Amanda Robertson & Ben Huckaby

Media Specialist: Patrick (PJ) Odom

Web Content Developer: Timothy Wright**

Temporary Professional Staff: Lee Ann Gillen (Instructional Production), David Tredwell (Multimedia Support), Vishaal Khandoobhai * (Faculty Support Services), Amanda Baines* (Production)

Part-time Student Employees, Faculty Support Services:
Marc Gracieux, Derek Leek, Scott Miller, Manisha Devasthali *


Digital Media Lab Student Employees: Christopher Hill, Ryan Rodgers, William Blackton

* = new hire during FY 2008; for student workers, many of these students only worked for a part of the year or for the duration of a project

** = left during FY 2008

*** = transfer from another unit

During FY 2008, Traci Temple, Beth Shepherd, Yiling Chappelow, Andy Click, Lee Ann Gillen, Cathi Phillips and Alyson Tuck joined our team. Traci was transferred to DELTA from the Faculty Center for Teaching and Learning (FCTL), Beth, Andy and Lee Ann were hired fill an open position left by the departure of other staff during the fiscal year (Scott Watkins, Charlie Morris and Rob Hambrick), Yiling filled a new Instructional Technologist position, Alyson filled a new Information Specialist position, and Cathi filled a new Instructional Designer position. In addition, we had a number of new students join our team as former students graduated. Recruiting for, filling, and then training the personnel in these positions while maintaining an excellent service level contributed again to a very challenging year.
In addition to the name change of our group this year from Instructional Services to Instructional Support Services, the following title/job responsibility changes occurred this year within our group:

a) Donna Petherbridge, from Director of Instructional Services to Associate Vice-Provost for Instructional Support Services
b) Stacy Smith, from Senior Instructional Designer and Associate Manager for Instructional Support Services to Associate Director for Faculty Development & Support Services
c) David Howard, from Senior Instructional Designer to Associate Director for Instructional Design & Course Production Services
d) Mike Cuales, from Senior Multimedia Specialist to Associate Director for Creative & Multimedia Production Services
e) Amanda Robertson, from Multimedia Specialist to Senior Multimedia Specialist

In addition, Tim Wright’s position (Web Content Developer) was moved to the Tech area of DELTA within the Educational Technology Services Team.

Record Keeping

The Faculty Development Management System keeps track of regularly scheduled workshops, custom training sessions, and Instructional House Calls. We keep track of our other programs (e.g., ITAP, IDEA grants, general production requests, course design and development) and processes via individual program tracking, utilizing spreadsheets, and an internal wiki, and Basecamp, and we account for help desk calls through the campus Remedy system. We keep regular monthly updates in the DELTA Monthly Reporting Tool, including reports of all of our workshops, Remedy calls, Instructional House Calls, production hours, major projects, and key meetings. Associate Directors are also responsible for meta-level reporting for their areas.
Training and Support

DELTA ISS provides a wide range of training, consulting and support services for faculty, staff and graduate students engaged in teaching and learning with technology (TLT) activities. Training and support activities include workshops and seminars, custom training sessions, faculty help desk and special programs (Summer Institute and ITAP).

Workshops and Seminars (regularly scheduled)

In FY 2008 (which we count as June 1, 2007 – May 31, 2008, based on our workshop schedule cycles), we had 1575 enrollments in our regular workshops (573 faculty enrollments, 679 staff enrollments, 302 graduate student enrollments, 14 undergraduate student enrollment, and 7 other enrollments, see Figure 1.1). 500 unique faculty, students and staff were supported in FY 2008 via our regularly scheduled workshops and seminars (194 faculty, 211 staff, 86 graduate students, 7 undergraduate, and 2 other, see Figure 1.4).

Overall average enrollments per workshop increased considerably from 6.33 to 9.78. For the second time in five years, the average number of people enrolled in regularly scheduled workshops rose (6.01 in FY 2006, 6.33 in FY 2007 and 9.78 in FY 2008), reversing a trend from previous years, when enrollment had been experiencing a yearly decline (see Figure 1.3). Strategically targeted communication, workshop schedule adjustments, and updated brochure designs are likely contributors to the larger class averages. The addition of Elluminate and Moodle workshops as well as the addition of more Dreamweaver workshops, as OIT (formerly ITD) removed Dreamweaver from its teaching schedule, were also contributing factors.

We offered 161 regularly scheduled workshops in FY 2008, compared with 132 regularly scheduled workshops offered in FY 2007. The yield of enrollments per workshops offered was impressive. Our enrollment numbers (1575) were the highest they have been for the past five years (see Table 1.1) as we focused our energies on determining the best offerings formula that would offer the best yields on time and other resource investments. We have worked hard to generate higher enrollments by researching (through feedback on surveys and data mining) the most highly desired workshop offerings, times and frequencies. In addition, we advertise our trainings in attractive, clear and well dispersed manners (brochures, banner ups, DELTA web site, etc.)
When analyzing workshop enrollment numbers, an increase in the percentage of enrollments (per workshop) can be seen in several areas. Viewing raw enrollment numbers, we had 1575 regular workshop enrollments (up from 835 in FY 2007, an 87% overall increase). Considering the proportion of enrollees and the number of workshops offered, graduate enrollments in regularly scheduled workshops increased 15.14% (to 19.17% FY 2008 from 16.65% FY 2007) and staff enrollments in regularly scheduled workshops increased 17.24% (to 43.11% in FY 2008 from 36.77% in 2007). While faculty enrollments in regularly scheduled workshops decreased by 20.90% as a proportion of all enrollments in FY 2007 to 36.38% (see Figure 1.2); it can be noted that, with the exception of FY 2007, faculty percentage participation numbers are the highest this year than they have been in the last five years. The shift in unique faculty participation versus staff participation from last year to this is likely due to high staff attendance of Dreamweaver workshops. Staff members, especially those who assist faculty, seek our Dreamweaver workshops in higher numbers now that OIT (formerly ITD) is no longer offering Dreamweaver workshops.

![Figure 1.1 FY 2008 Regular Workshop Enrollments](image)
Figure 1.2 FY 2004-2008 Enrollments in Regular Workshops by Type with percentage comparisons based on the number of workshops offered each year.
Average Enrollment Per Workshop: FY 2004 - 2008

Figure 1.3 FY 2004 - 2008 Average Enrollment Per Workshop

Table 1.1 FY 2004 – 2008 average enrollment per workshop offered in regularly scheduled workshops

<table>
<thead>
<tr>
<th>Fiscal Year</th>
<th>Number of Workshops Offered</th>
<th>Number of Enrollments</th>
<th>Average Number of Enrollments Per Workshop</th>
</tr>
</thead>
<tbody>
<tr>
<td>FY 2004</td>
<td>204</td>
<td>1538</td>
<td>7.54</td>
</tr>
<tr>
<td>FY 2005</td>
<td>182</td>
<td>1271</td>
<td>6.98</td>
</tr>
<tr>
<td>FY 2006</td>
<td>247</td>
<td>1485</td>
<td>6.01</td>
</tr>
</tbody>
</table>
Unique graduate and staff enrollments per regular workshops offered also increased (see Figure 1.5). Unique graduate enrollments per regular workshops offered increased by 15.14% to 19.17% in FY 2008 (up from 16.65% in FY 2007, see Figure 1.5) and unique staff enrollments increased by 14.92% to 42.20% in FY 2008 (up from 36.72% in FY 2007, see Figure 1.5).

We trained 500 unique participants via regularly scheduled workshops in FY 2008 (up from 305 in FY 2007, a 63.9% overall increase), including 194 faculty, 211 staff, 86 graduate students, seven undergraduates, and two others (see Figure 1.4). Although the proportion of overall unique enrollments decreased based on percentage in FY 2008 by 13.09% at 31.75% (from 36.53% in FY 2007), it rose higher than FY 2006 by 4.78% (see Figure 1.6). With the exception of FY 2007, it is the highest of the last five years. One reason our percentages for overall unique numbers may be lower this year is that this year we have encouraged and promoted the attendance of related (also known as “series”) workshops. Although they are not defined as a “series”, one course is generally a pre-requisite for another or builds upon the knowledge acquired in a previous workshop. Thus, the same participants frequently attend the entire set of the series. Therefore, we gain “repeat customer,” which lowers our overall unique participation numbers. Some of our workshops offerings that fell into this category in FY 2008 included Dreamweaver I, II and III, with HTML as a precursor and Section 508 Accessibility as a recommended follow up. Others included Blackboard Vista Beginners and Advanced, and Putting Your Course Online Part I, II and III. The Dreamweaver and Vista series are requested and offered frequently. Overall unique numbers may have decreased this year by percentages in relation to our number of offerings because of this. However, the strong unique enrollment numbers over the years - and the high total number of unique enrollments - illustrate that we are reaching more new participants with our programs.
Unique Enrollments for Regular Workshops by Academic Rank FY 2008

Faculty, 194 38.80%
Staff, 211 42.20%
Graduates, 86 19.17%
Undergraduates, 7 1.40%
Others, 2 0.40%

Figure 1.4 FY 2008 Unique Participants in Regular Workshops

Unique Enrollments in Regular Workshops: FY 2004 - 2008

<table>
<thead>
<tr>
<th></th>
<th>Faculty</th>
<th>Staff</th>
<th>Graduates</th>
<th>Undergraduates</th>
<th>Others</th>
</tr>
</thead>
<tbody>
<tr>
<td>FY 2004</td>
<td>29.44%</td>
<td>35.54%</td>
<td>36.35%</td>
<td>2.65%</td>
<td>1.06%</td>
</tr>
<tr>
<td>FY 2005</td>
<td>28.90%</td>
<td>39.87%</td>
<td>25.58%</td>
<td>3.99%</td>
<td>1.66%</td>
</tr>
<tr>
<td>FY 2006</td>
<td>40.31%</td>
<td>32.29%</td>
<td>27.07%</td>
<td>2.00%</td>
<td>1.78%</td>
</tr>
<tr>
<td>FY 2007</td>
<td>44.26%</td>
<td>36.72%</td>
<td>16.65%</td>
<td>0.33%</td>
<td>1.31%</td>
</tr>
<tr>
<td>FY 2008</td>
<td>38.80%</td>
<td>42.20%</td>
<td>19.17%</td>
<td>1.40%</td>
<td>0.40%</td>
</tr>
</tbody>
</table>
In FY 2008, we had 161 scheduled workshop offerings consisting of 50 unique workshops, including the introduction of 16 new workshops and seminars. Workshops were offered in the following key areas: **Accessibility; Web Design and Development; Graphics and Multimedia** (including collaborative workshops/seminars/tours with the NCSU Libraries / Herman Berkhoff, Rob Rucker); **Vista; Additional Resources and Technologies** (including collaborative workshops with the NCSU Libraries / Eleanor Smith, Kim Duckett, Katherine Willis; CALS – IT / Leigh Jay Hicks; Brown-Bag Seminars. In addition, we opened our Summer Institute Electives to open enrollment on a space available basis including collaborative workshops with the NCSU Libraries / Herman Berkhoff, Kim Duckett, Tripp Reade; WebAssign / Anne Squire; and guest speakers / General Chemistry Redesign at Iowa: From “Weed Out” to Exemplar”, Norbert Pienta, University of Iowa; Model-Based Problem Solving in the Large Science Classroom, Steve Brewer, University of Massachusetts.
We utilized 22 trainers during this time frame and provided a total of 311.50 training hours, which is an increase of almost 108 training hours from FY 2007 (see Figure 1.7). Our participant “no show” rate dropped to 15.05% in FY 2008 from 17.84% in 2007. This was due in part to the restoration of automated workshop reminders in FDMS as well as adding a new notification message about DELTA workshops. We decreased our class “cancellation” rate to 2.48% in FY 2008 from 6.8% in FY 2007. We cancelled four workshops over the academic year for reasons including adverse weather, instructor illness and a power outage effecting D.H. Hill Library, which shut down the training labs. Instructors of canceled workshops sent digital copies of the handouts to registered participants, and registered participants were encouraged to sign up for another workshop offering or to contact the instructor directly for one-to-one assistance.

![Unique Workshops, Workshop Hours, Offerings and Trainers](image)

Figure 1.7 FY 2004 – 2008 Unique Workshops, Workshop Hours, Offerings and Trainers
**College Participation**

Unique college participation in our regularly scheduled workshops for FY 2008 is indicated on the chart below. Unique college participation, as related to the number of workshops offered (and seen in percentages) in our regularly scheduled workshops remained consistent. Slight increases (between 1% and 2%) were seen in four colleges, six colleges stayed the same, and three slightly decreased (between 1% and 3%), as compared with percentage participation in FY 2007, see Figures 1.8 and 1.9.

![Figure 1.8 FY 2008 Unique Participant Demographics by College](image-url)
Figure 1.9 FY 2006 – FY 2008 Unique Percent Participation in Regular Workshops by College

**Participant Reaction to Workshops**

DELTA instructors solicit participant feedback on each workshop using an online evaluation form [http://delta.ncsu.edu/workshops/evaluation](http://delta.ncsu.edu/workshops/evaluation). The following survey responses to our workshops are summarized below, from Summer 2007 – Spring 2008 workshops (77% response rate for workshop enrollments, 1032 evaluations received).
Survey responses indicated that participants strongly agree or agree that: goals and objectives were made clear at the beginning of the workshop (96%); the instructor was able to communicate the subject matter effectively (95%) and was clear and easy to follow (93%); individual help was provided when needed (94%); the workshop was taught at an appropriate pace (92%); time was provided for questions (94%) and that the workshop met their expectations (94%). Other questions focusing on if the workshop presented was advertised and if class began and ended on time, received responses of 95% to 98%.

Selected Survey Comments:

- Good workshop. Made confusing subject matter understandable. Thanks!
- Great workshop to get started with Vista. I was able to learn all the basics and more! Loved it!
- The workshop was very well presented and provided a lot of information on how to organize course material in an efficient way.
- The instructor was wonderful. I’m excited to learn and incorporate more of these technologies into my teaching.
- Great workshop! It moved at a good pace and the instructor was highly knowledgeable.
- I’m so glad this workshop is offered! This takes the mystery out of a lot of projects I had pending.
- Great workshop. Very effective teaching methods. I learned everything I came to learn about. Nicely done.
- This was really great, far exceeded my expectations. Thank you.

These numbers and quotes reflect that our participants are consistently highly satisfied with the quality and nature of the workshops they are attending. These responses are not significantly different from the feedback over the past five years, indicating that we are successful in delivering high quality workshops which serve our campus community well.

Custom Training

Recognizing the need for custom support for instructors and teaching assistants within departments, we continue to offer specialized classes for faculty, staff and graduate students engaged in teaching and learning with technology. Custom training sessions are provided upon request and participation is also solicited through our campus partnerships (e.g., Vista Reps in each college).
We record two types of custom trainings sessions: **Custom Workshops** (defined as a hand-on session requested by a department or group comprised mostly of faculty with some attendance by staff and graduate students) and **Custom Overviews** (defined as overview sessions on a topic of interest requested by faculty for their students to support teaching and learning in their classes).

Approximately 110 unique participants were supported by custom training sessions (compared to 215 in FY 2007, a 48.84% decrease [see Figure 1.12]). This year we provided only one Custom Overview for the Department of Sociology in CHASS, supporting four staff, one faculty member and one graduate student.

Overall, this constitutes approximately 116 unique participants served by our custom training service (compared to 312 in FY 2006, a 62.82% decrease). Over the course of the academic year, we had a total of 20 requests for custom trainings, down from 32 in FY 2006. We hypothesize that clients in FY 2008 took greater advantage of our regularly scheduled workshops, which partly explains the decrease in these requests (as well as the increase in regular workshop participation numbers). Even so, there continues to be a demand for just-in-time custom training. Custom training also fill in the gaps between when trainings are offered (semester finish and start times) and meets the needs of those clients who are unable to attend regularly scheduled workshops for various reasons (see figures 1.10 and 1.11 and table 1.3).

**Table 1.2 FY 2004 – FY 2008 custom training unique trainees by participant type excluding overview participants**

<table>
<thead>
<tr>
<th>Fiscal Year</th>
<th>Total</th>
<th>Faculty</th>
<th>Staff</th>
<th>Graduate Students</th>
<th>Undergrad Students</th>
<th>Other</th>
</tr>
</thead>
<tbody>
<tr>
<td>FY 2004</td>
<td>189</td>
<td>97</td>
<td>49</td>
<td>31</td>
<td>12</td>
<td>0</td>
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<td>FY 2005</td>
<td>180</td>
<td>49</td>
<td>49</td>
<td>81</td>
<td>1</td>
<td>0</td>
</tr>
<tr>
<td>FY 2006</td>
<td>169</td>
<td>84</td>
<td>35</td>
<td>45</td>
<td>5</td>
<td>0</td>
</tr>
<tr>
<td>FY 2007</td>
<td>215</td>
<td>83</td>
<td>51</td>
<td>76</td>
<td>3</td>
<td>2</td>
</tr>
<tr>
<td>FY 2008</td>
<td>110</td>
<td>39</td>
<td>32</td>
<td>39</td>
<td>0</td>
<td>0</td>
</tr>
</tbody>
</table>
Figure 1.10 FY 2004-2008 Custom Training Enrollments by Participant Type Including Overviews

Table 1.3 FY 2004 – FY 2008 requests for custom trainings by type of custom training

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Custom Workshops</td>
<td>16</td>
<td>27</td>
<td>33</td>
<td>28</td>
<td>19</td>
</tr>
<tr>
<td>Overviews</td>
<td>14</td>
<td>8</td>
<td>3</td>
<td>4</td>
<td>1</td>
</tr>
</tbody>
</table>
Figure 1.11 FY 2004-2008 College Participation in Custom Training: Number of Unique Trainees Excluding Overview Participants
Figure 1.12 FY 2008 College Participation in Custom Training: Number of Unique Trainees Excluding Overview Participants (*Other includes departments across campus that are not related to one specific college, e.g. DELTA, Human Resources, NCSU Libraries, etc.)

**Instructional House Calls and Help Desk Support**

We continue to offer personalized support to faculty and support staff on the effective use of instructional technologies. Our help desk services are provided via phone, e-mail and in-person meetings. These help calls are typically short, easy to resolve problems (and are tracked using Remedy). We also provide one-on-one assistance (Instructional House Calls) for longer, more in-depth issues (which we track with internal reports). For consulting services, our FY 2007 count is based on data from July 1, 2007 – June 30, 2008.
In FY 2008, DELTA ISS resolved/participated in 4430 documented e-mails, phone, and in-person consultations. This is an overall increase of 36.39% (from the 3248 documented support calls and consultations in FY 2007). A total of 4118 Remedy calls and 312 Instructional House Calls were reported in our tracking systems during FY 2008 (see Figure 1.13). The marked increase in Remedy calls can be partly explained by a system-wide problem in which class roll data failed to propagate into Vista courses in Fall 2007, leading to a need for manual roll adjustments for a large number of courses.

**Help Call Totals: FY 2004 - 2008**

![Graph showing Help Call Totals from FY 2004 to FY 2008](image)

Figure 1.13 FY 2004-2008 Instructional House Calls and Help Desk Support
Instructional House Call system (n=304), a graph provides the breakdown of support given by college (see also Figures 1.14 and 1.15)
House Calls by College: FY 2004 - 2008

Figure 1.14 FY 2004-2008 Instructional House Calls by College
In addition to tracking Instructional House Call support provided to the colleges, we continue to track the number of Instructional House Calls and Remedy calls resolved each month to better capture activity patterns. By tracking volume, we can better prepare staffing levels and plan programs around historically busy consulting times. As expected, the largest volume of calls occurred at the beginning of fall and spring semesters, with the bulk occurring in August (see Figure 1.16). We also experienced a smaller rise in call volume in May, due to faculty support needs for summer school classes.
This year, our team began to label calls to our help desk with a primary "product". This new practice allows us to better track issues by the system or application they deal with, giving us more insight into which services are support-intensive. As expected, most help calls are related to the LMS tools - Vista and Elluminate (see Figure 1.17). The large "Other" category is made up of products used no more than 10 times in 2008, suggesting that we may need to re-evaluate the need for some of the products used, and whether or not they can be absorbed into larger categories.
In addition to tracking products, our team began to implement customer surveys in 2007 for all our help calls. The use of Remedy surveys helps us keep a pulse on how our support staff is doing in responding to customer needs. Six questions are asked in the customer satisfaction survey, and respondents answer on a scale of "Strongly Agree" to "Strongly Disagree." Customers can choose to abstain from any question in the list.

Out of 4118 Remedy calls resolved, a total of 454 surveys were submitted in FY 2008 (a response rate of approximately 11%). Positive response was overwhelming, and our customers reported that our staff is highly courteous, respectful, knowledgeable and quick to solve their problem (see Figure 1.18). Nearly 92% of respondents said that their problem or issue was resolved to their satisfaction. Only 4% of surveys were submitted by clients who had an unsatisfactory experience. Our third question had the highest "Neither agree nor disagree" value (Q3: You were kept informed of the progress towards resolving this issue), as well as the highest number of unanswered submissions, which suggests the question may be confusing or may not apply to many of the calls. We will continue to work with the Remedy Advisory Committee to evaluate these surveys and improve question clarity where necessary.
**Remedy Survey Responses FY 2008**

![Survey Responses Chart]

<table>
<thead>
<tr>
<th>Q1</th>
<th>Q2</th>
<th>Q3</th>
<th>Q4</th>
<th>Q5</th>
<th>Q6</th>
</tr>
</thead>
<tbody>
<tr>
<td>Strongly Agree</td>
<td>360</td>
<td>356</td>
<td>303</td>
<td>338</td>
<td>355</td>
</tr>
<tr>
<td>Agree</td>
<td>54</td>
<td>61</td>
<td>66</td>
<td>67</td>
<td>62</td>
</tr>
<tr>
<td>Neither</td>
<td>7</td>
<td>10</td>
<td>36</td>
<td>12</td>
<td>9</td>
</tr>
<tr>
<td>Disagree</td>
<td>0</td>
<td>5</td>
<td>3</td>
<td>1</td>
<td>4</td>
</tr>
<tr>
<td>Strongly Disagree</td>
<td>18</td>
<td>18</td>
<td>16</td>
<td>18</td>
<td>18</td>
</tr>
<tr>
<td>No Answer</td>
<td>15</td>
<td>4</td>
<td>30</td>
<td>18</td>
<td>6</td>
</tr>
</tbody>
</table>

Figure 1.18 Remedy Survey Responses FY 2008

**Q1:** The person assisting you was courteous and respectful.
**Q2:** The response to your request was timely.
**Q3:** You were kept informed of the progress towards resolving this issue.
**Q4:** The person assisting you was knowledgeable about the subject area of your request or able to refer you to someone knowledgeable.
**Q5:** The problem or request represented by this issue was resolved to your satisfaction.
**Q6:** You believe that you contacted the correct support agency when you sought assistance with this issue.

**Selected Survey Comments:**

- "Knowledgeable and friendly, and very willing to assist in helping me with my IT needs for my courses!"
• "Everyone involved in helping me was courteous and professional, and I was impressed with their diligence and patience."
• "The technician was very patient and thorough. I did not feel rushed nor did I feel it moved too slowly. Great experience."
• "Tech support has consistently been efficient and helpful. I especially appreciate the demeanor and attitude of the staff. I have found that they are as professional as they are patient."
• "I wish that everyone I deal with would be as competent as these people. Could not be more satisfied."

The DELTA Instructional Support Services continues to provide a valuable service to faculty and staff seeking help with instructional technologies. The LMS tools remain our most support-intensive services, due largely to the sheer volume of faculty, staff and students making use of those services. Judging from previous years, little has changed in regard to our busy times. We continue to see a rise in support calls near the start of each semester as new courses are set up and content put online. Customer satisfaction is high, though we may need to revisit the phrasing of our survey questions to ensure accurate interpretation of our customer feedback in the future.

The Summer Institute 2008

Based on final participation numbers, participant demand for the Summer Institute on Teaching and Learning with Technology remained high in 2008. Current program capacity, which is based on our experience with optimal training numbers as well as available resources, is 40 total participants.

A total of 39 participants attended the Summer Institute in 2008, 29 NCSU faculty members and two staff accepted invitations, along with seven support staff; one DELTA staff also attended as a guest. The original participant acceptance number for 2008 was 46. In the days just prior to and at the beginning of SI, the program had four withdrawals and three no shows. So, although the final 39 participants represent a 9.30% decrease from the 43 who attended in FY 2006, expected attendance levels were to be higher as interest and demand remains high.

The largest group participating in the Summer Institute this year was from CHASS, followed by CALS (see Figure 1.19). Both of these colleges have historically had the highest participation in the Summer Institute. In final program 2008 participation counts, five colleges had increased participation, six decreased and two stayed the same as the previous year (see Figure 1.20).
Figure 1.19 FY 2008 Summer Institute Program Participation by College

Figure 1.20 FY 2004 – 2008 SI Program Participation by College
During the final day of 2008 Summer Institute, we opened enrollment to faculty, staff and graduate students outside of the Institute and encouraged them to attend the elective sessions. As a result, we saw a total of 171 enrollments on the Friday of Summer Institute (see Figure 1.21). This is a 5.55% increase in attendance from FY 2007. Of that overall enrollment number, 69 were “unique participants” which is an increase of 6.15% from the previous year.

Figure 1.21 Summer Institute Open Enrollment Elective Day Attendance FY 2006-2008

Of those 69 unique attendees, 35 were faculty not enrolled in Summer Institute, and they attended a total of 13 workshops. This is an increase of 105.88% from SI 2007 when 17 unique faculty participants (not in the SI program for that year) attended workshops (see Figure 1.22).
The topics for these open sessions included classes related to content development (e.g. Large Course Redesign Principles and Techniques,), Tech Tools (e.g. WebAssign and Elluminate) Theory and Practice (e.g. Model-Based Problem Solving in the Large Science Classroom), Institutional Policies and Resources (e.g. Five Steps To Analyzing Any Copyright Question), and Hot Topics (e.g. Web 2.0, Wikis: Instructional Uses, 3D Online Learning Environments).

A survey was sent to Summer Institute participants within a week of the end of the program. Based on a response rate of 69% (27 responses received), all respondents were highly satisfied in the overall quality of the 2008 Summer Institute [Excellent (81%), Very Good (11%), or Good (8%)]. Additionally, all respondents (100%) indicated they would recommend the Summer Institute to a colleague (another finding consistent with previous year’s survey data).

More detailed information based on the 2008 Summer Institute is available on the DELTA web site (at http://delta.ncsu.edu/docs/about/reports/si2008_report.pdf).

**The Instructional Technology Assistant Program (ITAP) 2008**

DELTA ISS continued to oversee the Instructional Technology Assistant Program (ITAP) in FY 2008. ITAP participants are NC State graduate students or staff members who are engaged in supporting faculty with instructional technology.
ITAP participants attend approximately eight workshops throughout the semester and also work on an online project related to their faculty sponsor’s class. Throughout the program participants are taught the effective use of instructional technology in education.

We continued to implement the recommended changes of FY 2007 which included (1) a reduction in the number of required workshops, (2) an increase in content related to instructional design and online pedagogy, and (3) the addition of an LMS component to the ITAP experience.

ITAP was offered during Fall 2007 and Spring 2008 this fiscal year. Table 1.4 summarizes ITAP participation levels for FY 2008.

**Table 1.4 ITAP participation levels for Fall 2007 and Spring 2008**

<table>
<thead>
<tr>
<th></th>
<th>Applied</th>
<th>Accepted</th>
<th>Completed</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Fall 2007</strong></td>
<td>21</td>
<td>12</td>
<td>10</td>
</tr>
<tr>
<td><strong>Spring 2008</strong></td>
<td>17</td>
<td>15</td>
<td>10*</td>
</tr>
</tbody>
</table>

* Expected number of completions; project evaluations are still under way for Spring 2008

The highest ITAP participation in FY 2008 was seen in both the College of Natural Resources and the College of Education (three participants each) in the Fall of 2007 and from CHASS in the Spring of 2008 (five participants). In total, the Fall of 2007 had participation from seven colleges. The spring of 2008 had participation from eight colleges. ITAP participation by college for FY 2008 can be seen in table 1.5 and in figure 1.23.
Table 1.5 Participation by college in ITAP Fall 2007 and Spring 2008

<table>
<thead>
<tr>
<th></th>
<th>Fall 2007</th>
<th>Spring 2008</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>CHASS</td>
<td>2</td>
<td>5</td>
<td>7</td>
</tr>
<tr>
<td>Natural Resources</td>
<td>3</td>
<td>2</td>
<td>5</td>
</tr>
<tr>
<td>Education</td>
<td>3</td>
<td>1</td>
<td>4</td>
</tr>
<tr>
<td>Management</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>CALS</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>Engineering</td>
<td>1</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Design</td>
<td>1</td>
<td>0</td>
<td>1</td>
</tr>
<tr>
<td>PAMS</td>
<td>0</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Other</td>
<td>0</td>
<td>1</td>
<td>1</td>
</tr>
</tbody>
</table>

Figure 1.23 ITAP Participation by College FY '08

Figure 1.23 ITAP Participation by College FY 2008
In fiscal year 2007 ITAP was reworked during the Fall semester to better meet the needs of the participants and was only held during the Spring 2007 semester. The Spring 2007 data shows that participation in FY 2008 is on par with FY 2007’s participation (see table 1.1).

### Table 1.6 FY 2007 and FY 2008 ITAP participation

<table>
<thead>
<tr>
<th></th>
<th>Applied</th>
<th>Accepted</th>
<th>Completed</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Spring 2007</strong></td>
<td>16</td>
<td>14</td>
<td>9</td>
</tr>
<tr>
<td><strong>Fall 2007</strong></td>
<td>21</td>
<td>12</td>
<td>10</td>
</tr>
<tr>
<td><strong>Spring 2008</strong></td>
<td>17</td>
<td>15</td>
<td>10*</td>
</tr>
</tbody>
</table>

As part of our ongoing evaluation of ITAP, we are making some changes to the FY 2009 program.

- Most of the DELTA ISS staff will be more involved with mentoring ITAP participants through the program either through
  - Conducting project evaluations
  - Helping answer individual participant questions
  - Giving direction to the participants’ projects
- The project evaluation rubric will be updated to better assess the quality of the projects
- The ITAP program web site will be delivered on the Moodle pilot server
- The requirement to use an “emerging technology” will be dropped in favor of incorporating an “engaging technology” into the course

More ITAP information can be found at: [http://delta.ncsu.edu/itap](http://delta.ncsu.edu/itap). Our goal for FY 2009 is to have approximately 20 people complete the program. ITAP is marketed through online announcements and is consistently able to attract enough applicants to meet our goals. Feedback from both participants and faculty sponsors continues to indicate that this program is making an impact in increasing instructional technology resources for various distributed education environments.
Course Production

During FY 2008, the DELTA ISS staff, with the support of others within DELTA, provided services and support to faculty involved in 26 major course production projects and two major non-course projects. These projects were generated by the IDEA Grants program, the LITRE Grants program, DE programs that requested production support, other academic course production requests, and internal production requests. Figure 1.24 provides an overview of all FY 2008 DELTA ISS production hours, both course and non-course, compared to production hours during the three previous years. The increased number of production hours is reflective of the increasing demand for our production services and the resulting growth of our unit in both full-time and part-time staff. The trend should continue into the next fiscal year.

Figure 1.24 DELTA ISS Production Hours FY2005, FY2006, FY2007, FY2008
**Major Accomplishments**

DELTA ISS staff and other DELTA personnel spent over **6100** hours working on course production projects in FY 2008. Of the 26 major course production projects (listed individually in table 1.7) that were active during the year, 17 are completed. In the course of these projects, DELTA ISS staff members have worked with faculty to create online materials for 15 new distance education courses, ten existing distance education courses, and one face-to-face course. Additionally, DELTA ISS staff provided over **4050** hours to non-course production projects, including Virtual Worlds research and development and Marketing production.
### Table 1.7 Production hours, FY 2008

**Major Course Production Projects**

<table>
<thead>
<tr>
<th>IDEA Grants (continued)</th>
<th>Hrs</th>
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<td>ARE 303</td>
<td>195</td>
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<tr>
<td>CH 221</td>
<td>765</td>
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<tr>
<td>CS 524</td>
<td>176</td>
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<td>242</td>
</tr>
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<td>CSC 506</td>
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<tr>
<td>ECI 517</td>
<td>302</td>
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<td>ECD 530</td>
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<td>ENG 331</td>
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<tr>
<td>PP 315</td>
<td>995</td>
</tr>
<tr>
<td>SSC 532</td>
<td>192</td>
</tr>
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**11 projects** | **3921**

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<th>IDEA Grants (new)</th>
<th>Hrs</th>
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<tbody>
<tr>
<td>ADN 219</td>
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<td>176</td>
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<tr>
<td>ECI 579</td>
<td>375</td>
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<tr>
<td>FLS 201</td>
<td>45</td>
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<tr>
<td>FS 201</td>
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<tr>
<td>PS 498</td>
<td>245</td>
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## ST 311

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### LITRE Grants

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<tr>
<td>ArchaeInteractive</td>
<td>24</td>
</tr>
<tr>
<td>Virtual Microscopy</td>
<td>61</td>
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</tbody>
</table>

### DE Program Support (including Learn and Earn Online)

<table>
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<th>Hours</th>
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<tbody>
<tr>
<td>FLS 102</td>
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<tr>
<td>MA 105 (Learn &amp; Earn)</td>
<td>186</td>
</tr>
<tr>
<td>ST 101 (Learn &amp; Earn)</td>
<td>143</td>
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</table>

### Online Course Production

<table>
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<tr>
<th>Project</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>FS 785</td>
<td>222</td>
</tr>
<tr>
<td>Other Course Production</td>
<td>89</td>
</tr>
</tbody>
</table>

### Total Course Production Hours

<table>
<thead>
<tr>
<th>Total</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>6144</td>
</tr>
</tbody>
</table>

### Non-Course Production Projects

<table>
<thead>
<tr>
<th>Project</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>Marketing Production</td>
<td>2138</td>
</tr>
<tr>
<td>Virtual Worlds Project</td>
<td>1470</td>
</tr>
</tbody>
</table>
Other Non-Course Production 462

Total Non-Course Production Hours 4070

**Future Plans**

In the next year the course production team will be working on continuing IDEA Grant projects from the 2006-07 and 2007-08 cycles, new IDEA Grant projects from the 2008-09 cycle, projects to support key Distance Education initiatives like Learn and Earn Online and projects to support the DELTA Large Course Redesign program. We will continue to conduct research into virtual worlds and support the NCSU Wolflands presence in Second Life and learn more about serious games for education. In addition to course development and research projects, there are two major initiatives for the course production team this year.

1. The production program needs to start leveraging the work we do on projects into resources for the wider NCSU community. This will result in two long-term projects starting in FY 2009: the creation of an online course development resource and the submission of many project reports to the DELTA Gallery. The course development resource will have reusable templates, documentation about creating effective course materials, advice about how to meet certain learning objectives in an online environment and examples of innovative and instructionally-sound learning materials. The DELTA Gallery is intended to showcase work done across DELTA. The production team will actively participate in the design and development of the Gallery and then contribute to it. Hopefully these two efforts will have significant overlap.

2. The production team must begin to evaluate the effectiveness of our projects both in terms of how well we serve the faculty we work with and how effective the course materials we create are in helping students meet identified learning objectives. In the past few months we have created and started to pilot-test a survey for faculty who have participated in one of the course production programs. In the coming year we will finalize the survey and then start to make it a regular part of our project wrap-up process. The results will help us to evaluate and improve our course development process. We will also need to work on small research projects in collaboration with faculty to evaluate the effectiveness of instructional innovations.

In the past year, due to uneven staffing in the Instructional Design team, we staggered project start dates by necessity. Although this has caused some stress, in general it has been very effective at keeping production team efforts more focused.
We will endeavor to continue staggering start dates and prioritizing team efforts with the goal of having a relatively small number of projects active at once while still starting projects in time to meet course delivery deadlines.

**IDEA Grants**

### 2007-08 Overview

In November 2007, 13 grants were awarded out of the 18 submitted for the 2007-08 IDEA Grant cycle. Details of these grants can be found in the following sections of this report. The total awarded for the 2007-08 cycle was $115,000.

#### Table 1.8 IDEA Grants historical award summary

<table>
<thead>
<tr>
<th>Year</th>
<th># accepted</th>
<th>% accepted</th>
<th>Funds awarded(^{(1)})</th>
<th>Staff time awarded / spent</th>
</tr>
</thead>
<tbody>
<tr>
<td>00–01</td>
<td>32 of 68</td>
<td>47%</td>
<td>$492,161</td>
<td>0 hrs / 0 hrs</td>
</tr>
<tr>
<td>01–02</td>
<td>39 of 49</td>
<td>80%</td>
<td>$1,012,085</td>
<td>0 hrs / 1,210 hrs</td>
</tr>
<tr>
<td>02–03</td>
<td>31 of 77</td>
<td>40%</td>
<td>$220,790</td>
<td>1,183 hrs / 852 hrs</td>
</tr>
<tr>
<td>03–04</td>
<td>16 of 55</td>
<td>29%</td>
<td>$118,753</td>
<td>1,820 hrs / 2,178 hrs</td>
</tr>
<tr>
<td>04–05</td>
<td>23 of 36</td>
<td>64%</td>
<td>$191,569</td>
<td>1,851 hrs / 2,850 hrs</td>
</tr>
<tr>
<td>05–06</td>
<td>11 of 18</td>
<td>61%</td>
<td>$104,955</td>
<td>2,535 hrs / 5,734 hrs</td>
</tr>
<tr>
<td>06–07</td>
<td>13 of 33</td>
<td>39%</td>
<td>$104,955</td>
<td>0 hrs / 5,424 hrs</td>
</tr>
<tr>
<td>07–08</td>
<td>13 of 22</td>
<td>59%</td>
<td>$115,141</td>
<td>0 hrs / 1,245 hrs</td>
</tr>
<tr>
<td>Totals</td>
<td>178 of 358</td>
<td>50%</td>
<td>$2,359,865</td>
<td>7,389 hrs / 19,493 hrs</td>
</tr>
</tbody>
</table>

\(^{(1)}\) The figures in this table do not include the 2nd and 3rd year of funding for multi-year grants. Multi-year grants were awarded in the first two cycles of the IDEA Grants program.
In the first year of the IDEA Grant program, only funds were awarded. In the second year, DELTA staff started working on certain projects and after talking with recipients and hearing the need for skilled assistance, staff time was made a component of the grant program starting in the FY 2002-03 cycle. Some assistance was then rendered to recipients of FY 2001-02 grants.

In order to increase the flexibility of DELTA staff and to better respond to the needs of the projects, DELTA ceased granting a specific number of hours for each grant beginning with the FY 2006-07 cycle. Instead, DELTA staff work with faculty to determine the needs for the project and then staff time is used as needed to meet those needs. Staff time is still in addition to funds granted and does not need to be paid for out of the monetary award.

One of the 13 grant projects in the FY 2006 cycle are still in progress.

Seven of the 13 grant projects in the FY 2007 cycle are still in progress.

2008-09 Planning

In the Request for Proposals for the 2008-09 cycle, a few changes to the IDEA Grants program were instituted. The Course Grant category was not modified as it has been very successful since being altered for the 2006-07 cycle. 20 Course Grants were submitted by the June 19th deadline. The Exploratory Grants were altered this year so that they target technologies that have been identified by DELTA as areas that seem ripe for innovation. For the 2008-09 cycle, mobile technologies and Web 2.0 applications were targeted and four Exploratory grants were submitted. In addition Exploratory Grants were changed so that they have a predetermined $8,000 award, like the Course Grants. A new category of grants was created to spur research on the effectiveness of Distance Education instructional innovations. The Research Grants are not meant to support the creation of significant new materials but sponsor collaborative research between faculty and DELTA staff. There was one Research Grant submitted this year.
IDEA Grant Project Work: Projects from Previous Cycles

During FY 2008, 11 projects from five different colleges (CALS, PAMS, Engineering, Education and CHASS) were still active from previous grant cycles. DELTA ISS staff spent 3,921 hours during FY 2007 on these projects. Ten of the projects are now complete.

ARE 303: Farm Business Management

DELTA ISS staff worked with Dr. van der Hoeven to create a new Distance Education course, ARE 303. The project began with a series of meetings to plan the course, review existing materials, and suggest activities and assessments that would help achieve the instructional objectives. DELTA ISS staff provided templates and training for the creation of a series of narrated presentations and assisted with the creation of course materials including content, assignments and quizzes.

Table 1.9 ARE 303 project summary

<table>
<thead>
<tr>
<th>Faculty: Guido van der Hoeven</th>
<th>DELTA ISS Staff: Rob Hambrick, AJ Klingenmeier, David Howard, Amanda Robertson</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: ARE 303</td>
<td>Resources: 195 hours spent (FY 2008)</td>
</tr>
<tr>
<td>New DE Course</td>
<td>237 hours spent (Total)</td>
</tr>
<tr>
<td>Type III</td>
<td></td>
</tr>
<tr>
<td>Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College: CALS</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>

CH 221: Organic Chemistry I

DELTA ISS staff are working with Dr. Sandberg to create online instructional materials to improve CH 221, which was already being taught as a DE course. Specifically, we are working on a flashcard system that will allow Dr. Sandberg to easily add more cards, to order cards in a certain way as well as allowing random access and to link to additional materials from a card. We are also working with Dr. Sandberg to produce some three-dimensional animations of common and important chemical reactions.
Table 1.10 CH 221 project summary

<table>
<thead>
<tr>
<th>Faculty: Kay Sandberg</th>
<th>DELTA ISS Staff: Amanda Robertson, Ben Huckaby, David Treadwell, AJ Klingenmeier, Matt Hisamoto, Philip Allen</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: CH 221</td>
<td>Resources: 765 hours spent (FY 2008)</td>
</tr>
<tr>
<td>Existing DE Course</td>
<td>803 hours spent (Total)</td>
</tr>
<tr>
<td>Type III</td>
<td></td>
</tr>
<tr>
<td>Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College: PAMS</td>
<td>Status: In Progress</td>
</tr>
</tbody>
</table>

CS 424: Seed Biology / Ecology

DELTA ISS staff supported Dr. Spears in the creation of a new Distance Education course, CS 424/524, for upper level undergraduates (CS 424) and graduate (CS 524) students. The course features a series of narrated presentations, video demonstrations of root development, germination, & seed formation, and a series of videos that introduce each of the eight main modules.

Table 1.11 CS 424 (524) project summary

<table>
<thead>
<tr>
<th>Faculty: Jan Spears</th>
<th>DELTA ISS Staff: Lee Ann Gillen, Alison Citron</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: CS 424 (524)</td>
<td>Resources: 176 hours spent (FY 2008)</td>
</tr>
<tr>
<td>New DE Course</td>
<td>227 hours spent (Total)</td>
</tr>
<tr>
<td>Type III</td>
<td></td>
</tr>
<tr>
<td>Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College: CALS</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>
CS 714:

Dr. Wells collaborated with DELTA ISS staff to create a new Distance Education course, CS 714, for agricultural professionals. Together, we created an introductory video along with a public page and a set of marketing materials, a set of narrated presentations, assessments and assignments delivered through Vista learning modules and an image library which will be featured in several learning activities.

Table 1.12 CS 714 project summary

<table>
<thead>
<tr>
<th>Faculty: Randy Wells</th>
<th>DELTA ISS Staff: Rob Hambrick, Alison Citron, Brian Lee, Amanda Robertson, David Howard</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: CS 714</td>
<td>Resources: 242 hours spent (FY 2008)</td>
</tr>
<tr>
<td></td>
<td>296 hours spent (Total)</td>
</tr>
<tr>
<td>College: CALS</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>

CSC 506: Parallel Computing

DELTA ISS staff worked with Dr. Gehringer to improve his existing and successful Distance Education offering of CSC 506. We worked with him to redesign his website to match the redesign of CSC 379 that was done last year in a different IDEA Grant. We also created a set of simulations of parallel computing processes that Dr. Gehringer can build off of as he continues to improve the course.

Table 1.13 CSC 506 project summary

<table>
<thead>
<tr>
<th>Faculty: Ed Gehringer</th>
<th>DELTA ISS Staff: Thomas Wilson, Tim Wright</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: CSC 506</td>
<td>Resources: 314 hours spent (FY 2008)</td>
</tr>
<tr>
<td></td>
<td>591 hours spent (Total)</td>
</tr>
<tr>
<td>College: Engineering</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>
**ECD 530: Theories and Techniques of Counseling**

Dr. Ting collaborated with DELTA ISS staff to create a Distance Education version of his existing counseling course, ECD 530. The course features ways for students to practice counseling skills both alone and with each other, a set of learning modules that cover both theoretical and practical knowledge about counseling techniques, and numerous video samples of counseling interactions.

**Table 1.14 ECD 530 project summary**

<table>
<thead>
<tr>
<th>Faculty: Raymond Ting</th>
<th>DELTA ISS Staff: Kim Rothwell, Rob Hambrick, Matt Hisamoto, Hilary Schmidt, Alison Citron, Mike Cuales</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: ECD 530</td>
<td>Resources: 159 hours spent (FY 2008)</td>
</tr>
<tr>
<td>New DE Course</td>
<td>265 hours spent (Total)</td>
</tr>
<tr>
<td>Type II Masters</td>
<td></td>
</tr>
<tr>
<td>College: Education</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>
ECI 517: Advanced Multimedia Design & Applications

DELTA ISS staff consulted with Dr. Oliver to help him improve his class. These consultations centered around facilitating discussions in his Distance Education section, incorporating collaborative exercises for Distance Education students and finding good examples of various multimedia learning models. We worked with Dr. Oliver to create a web application that allows students to search for and compare two documents from a set of letters from plantation owners. This application serves as one of the examples of designing for a particular learning style and will also be available to students who are interested in exploring the collection of plantation letters.

Table 1.15 ECI 517 project summary

<table>
<thead>
<tr>
<th>Faculty: Kevin Oliver</th>
<th>DELTA ISS Staff: Lisa Fiedor, David Tredwell</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: ECI 517</td>
<td>Resources: 302 hours spent (FY 2008)</td>
</tr>
<tr>
<td>Existing DE Course</td>
<td>330 hours spent (Total)</td>
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<td>Type II Masters</td>
<td></td>
</tr>
<tr>
<td>College: Education</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>

ENG 331: Communication for Engineering and Technology

DELTA ISS staff worked with Ms. Trunzo to improve her existing Distance Education offering of ENG331. She wanted to explore methods for facilitating group writing when the group is not in one physical location. This evolved into the creation of a course website that emphasizes community for the class members and offers many options for collaboration tools. Ms. Trunzo now maintains a Twitter feed and a Facebook page and both are incorporated into her course although students are not required to use either tool. Similarly, options for collaboration include Google Docs, Elluminate, Second Life and Skype depending on student group preferences.
Table 1.16 ENG 331 project summary

<table>
<thead>
<tr>
<th>Faculty: Stephanie Trunzo</th>
<th>DELTA ISS Staff: Kim Rothwell, Scott Watkins, David Howard</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: ENG 331</td>
<td>Resources: 225 hours spent (FY 2008)</td>
</tr>
<tr>
<td>Existing DE Course</td>
<td>250 hours spent (Total)</td>
</tr>
<tr>
<td>Type I</td>
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<tr>
<td>Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College: CHASS</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>

**ENT 425: General Entomology**

Dr. Meyer and DELTA ISS staff worked together to create a Distance Education version of his ENT425 course. The course features a series of labs that lead the students through the process of building an insect collection. This includes instructions about insect collection and mounting, insect identification, understanding the ecological roles of insects, knowing about internal and external anatomy of insects and knowing the differences between immature and mature specimens. The website for the course was redesigned and learning modules were created that lead the Distance Education students through the vast amount of material in a structured way.

Table 1.17 ENT 425 project summary

<table>
<thead>
<tr>
<th>Faculty: John Meyer</th>
<th>DELTA ISS Staff: Kim Rothwell, Courtney Evans, Matt Hisamoto, Alison Citron, Tim Wright, Mike Cuales, David Howard, Amanda Robertson, Huaiying Gao, Wilfred Itte</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: ENT 425</td>
<td>Resources: 356 hours spent (FY 2008)</td>
</tr>
<tr>
<td>New DE Course</td>
<td>1910 hours spent (Total)</td>
</tr>
<tr>
<td>Type III</td>
<td></td>
</tr>
<tr>
<td>Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College: CALS</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>
**PP 315: Introductory Plant Pathology**

DELTA ISS staff worked with Dr. Shew to add innovative learning materials to his existing Distance Education course. One of the main objectives of PP 315 is to teach students about the process for diagnosing a plant disease. DELTA ISS staff produced a video tour of the on-campus plant diagnostic clinic and created an interactive plant diagnostics learning game. The learning game gives students an opportunity to go through the diagnosis process independently and get feedback about their decisions and about the process they used to arrive at their diagnoses. DELTA ISS staff also redesigned the PP 315 course website, which had grown organically over time into an extensive set of learning resources, and migrated those learning materials from his old site to the new one.

**Table 1.18 PP 315 project summary**

<table>
<thead>
<tr>
<th>Faculty: David Shew</th>
<th>DELTA ISS Staff: Amanda Robertson, Huaiying Gao, Thomas Wilson, Tim Wright, Ben Huckaby, Brian Lee, Hilary Schmidt, Courtney Evans, Matt Hisamoto, Lee Ann Gillen, Alison Citron, Mike Cuales</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: PP 315</td>
<td>Resources: 996 hours spent (FY 2008)</td>
</tr>
<tr>
<td>Existing DE Course</td>
<td>3415 hours spent (Total)</td>
</tr>
<tr>
<td>Type II Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College: CALS</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>

**SSC 532: Soil Microbiology**

Dr. Graves and DELTA ISS staff collaborated to update DE materials that were developed about six years ago and used to teach a DE course on Soil Microbiology. The original designer of the course, Dr. Wollum, is now retired. The update of materials included migrating the course delivery into Vista and redesigning or creating chapter web pages, assignments, discussion boards, quizzes and tests, Study Mate modules, problem sets, and possibly labs. As part of the update, many animations created by Dr. Wollum were captured to use in a new format.
Table 1.19 SSC 532 project summary

<table>
<thead>
<tr>
<th>Faculty: Alexandria Graves</th>
<th>DELTA ISS Staff: Lee Ann Gillen</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: SSC 532</td>
<td>Resources: 192 hours spent (FY 2008)</td>
</tr>
<tr>
<td>New DE Course</td>
<td>308 hours spent (Total)</td>
</tr>
<tr>
<td>Type III Masters</td>
<td></td>
</tr>
<tr>
<td>College: CALS</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>
IDEA Grant Project Work: Projects from the New Cycle

13 IDEA grants across six colleges were awarded during the 2007-2008 IDEA grant cycle, four of which required no significant production work from DELTA ISS staff. 1,245 DELTA ISS staff hours have been spent in support of the remaining nine grants. Two of the projects are complete, four will be complete before the next IDEA Grant cycle begins and three are planned for delivery in Spring 2009 or later.

ADN 219: Digital Imaging

DELTA ISS Staff are working with Dr. Fitzgerald and other instructors of ADN 219 to develop a Distance Education version of the course. The course satisfied both skill-building and design theory learning objectives and is project-driven. We are collaborating to compile a comprehensive set of projects that can be combined in different ways by different instructors to cover the course learning objectives. The course will feature demonstrations of design software and tutorials about their use. One feature of design courses is the use of critique sessions to enable students to get feedback about their work. In this course, different methods of doing critique will be identified and tried to determine which are effective.

Table 1.20 ADN 219 project summary

<table>
<thead>
<tr>
<th>Faculty: Pat Fitzgerald</th>
<th>DELTA ISS Staff: Cathi Phillips, Ben Huckaby, Mike Cuales, Leah Lawrence</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: ADN 219</td>
<td>Resources: 154 hours spent (FY 2008)</td>
</tr>
<tr>
<td>New DE Course</td>
<td>Type III Undergraduate</td>
</tr>
<tr>
<td>College: Design</td>
<td>Status: In Progress</td>
</tr>
</tbody>
</table>

ANS 205: Physiology of Domestic Animals

Dr. Pratt and DELTA ISS staff are collaborating to create lab materials to accompany an existing Distance Education version of ANS 205 that does not include the lab portion. The labs will feature video demonstrations of lab exercises, lab practicals, 3-D models of animal skeletons, muscles and organs, and interactive exercises to reinforce good DELTA ISSection practices.
Table 1.21 ANS 205 project summary

<table>
<thead>
<tr>
<th>Faculty: Shannon Pratt</th>
<th>DELTA ISS Staff: Lee Ann Gillen</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: ANS 205</td>
<td>Resources: 8 hours spent (FY 2008)</td>
</tr>
<tr>
<td>New DE Course</td>
<td>Type III</td>
</tr>
<tr>
<td>Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College: CALS</td>
<td>Status: In Progress</td>
</tr>
</tbody>
</table>

D 492: Universal by Design

DELTA ISS staff are assisting the Center for Universal Design to create a Distance Education version of D 492. The course is heavily focused on readings and discussions but will require some work to replicate field trips and create online examples of universally designed spaces.

Table 1.22 D 492 project summary

<table>
<thead>
<tr>
<th>Faculty: Sean Vance</th>
<th>DELTA ISS Staff: David Howard</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: D 492</td>
<td>Resources: 7 hours spent (FY 2008)</td>
</tr>
<tr>
<td>New DE Course</td>
<td>Type III</td>
</tr>
<tr>
<td>Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College: Design</td>
<td>Status: In Progress</td>
</tr>
</tbody>
</table>

ECD 524: Career Counseling and Development

Dr. Ting collaborated with DELTA ISS staff to create a Distance Education version of his existing counseling course, ECD 524 following the successful model of ECD 530. The course features a set of learning modules that cover both theoretical and practical knowledge about career counseling techniques and assignments to reinforce the lecture materials.
### Table 1.23 ECD 524 project summary

<table>
<thead>
<tr>
<th>Faculty: Raymond Ting</th>
<th>DELTA ISS Staff: Kim Rothwell, Alison Citron, Brian Lee</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: ECD 524</td>
<td>Resources: 176 hours spent (FY 2008)</td>
</tr>
<tr>
<td></td>
<td>New DE Course</td>
</tr>
<tr>
<td></td>
<td>Type II Masters</td>
</tr>
<tr>
<td>College: Education</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>

**ECI 579: Organization and Behavioral Management of Inclusive Classrooms**

Dr. Sabornie worked with DELTA ISS staff to develop a Distance Education version of ECI 579. This course will be a required course in the new Masters of Art in Teaching degree program. One of the key learning objectives for ECI 579 is helping students recognize situations in the classroom and identify the appropriate response to reinforce desired behaviors. We created one animatic of instructor-student interactions to demonstrate both good and bad behaviors and assisted with developing scripts for several others. We also worked with a local high school drama club to create a video of common classroom behaviors to be used as part of a pre-test / post-test exercise that has students identify examples of good and bad behaviors.

### Table 1.24 ECI 579 project summary

<table>
<thead>
<tr>
<th>Faculty: Ed Sabornie</th>
<th>DELTA ISS Staff: Lee Ann Gillen, Ben Huckaby, Leah Lawrence, Mike Cuales, Brian Lee, David Tredwell</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: ECI 579</td>
<td>Resources: 375 hours spent (FY 2008)</td>
</tr>
<tr>
<td></td>
<td>New DE Course</td>
</tr>
<tr>
<td></td>
<td>Type II Masters</td>
</tr>
<tr>
<td>College: Education</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>

**FLS 201: Intermediate Spanish I (Business Spanish)**

DELTA ISS staff supported Ms. Dolan in the creation of a Distance Education version of Business Spanish. This course uses text materials written by Ms. Dolan as
well as a set of interactive exercises that reinforce material learned that session. The course also features a five-part recording by a native speaker that gives the students a context for the course.

Table 1.25 FLS 201 project summary

<table>
<thead>
<tr>
<th>Faculty: Louise Dolan</th>
<th>DELTA ISS Staff: David Howard, Charlie Morris, Lisa Fiedor</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: FLS 201</td>
<td>Resources: 45 hours spent (FY 2008)</td>
</tr>
<tr>
<td>Type II</td>
<td></td>
</tr>
<tr>
<td>Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College: CHASS</td>
<td>Status: In Progress</td>
</tr>
</tbody>
</table>

FS 201: Food Science and the Consumer

DELTA ISS staff are working with Dr. Harris to develop a Distance Education section of Food Science and the Consumer. Dr Harris is an engaging classroom instructor and we have worked out several ways to have his personality integrated into the online materials. We developed a set of caricatures that go with characters that he uses to introduce his lectures. We have also videotaped a variety of demonstrations that he does in class. We are working with him to integrate these pieces into a set of learning modules that will feature narrated presentations, written content, exercises, readings and quizzes.

Table 1.26 FS 201 project summary

<table>
<thead>
<tr>
<th>Faculty: Keith Harris</th>
<th>DELTA ISS Staff: Lee Ann Gillen, AJ Klingenmeier</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: FS 201</td>
<td>Resources: 125 hours spent (FY 2008)</td>
</tr>
<tr>
<td>Type III</td>
<td></td>
</tr>
<tr>
<td>Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College: CALS</td>
<td>Status: In Progress</td>
</tr>
</tbody>
</table>
**PS 498: Vulnerable Populations and Public Policy**

Dr. Simons-Rudolph is working with DELTA ISS staff to create a two-course sequence on vulnerable populations and the public policies that affect them. The first course will be based on readings and discussions and will also have the students using a game to better understand policies and researching organizations that affect public policy for vulnerable populations. The second course will be an internship in one of these organizations and students will contribute their experiences to a database of organizations and internships that will help inform later students.

**Table 1.27 PS 498 project summary**

<table>
<thead>
<tr>
<th>Faculty:</th>
<th>Joe Simons-Rudolph</th>
<th>DELTA ISS Staff: Alyson Tuck, Leah Lawrence</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: PS 498</td>
<td>New DE Course</td>
<td>Resources: 245 hours spent (FY 2008)</td>
</tr>
<tr>
<td></td>
<td>Type I</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College:</td>
<td>CHASS</td>
<td>Status: In Progress</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**ST 311: Introduction to Statistics**

Dr. Woodard needed a set of web-based applications to demonstrate key concepts in ST 311, an existing Distance Education course. DELTA ISS staff worked with him to identify the specific set of requirements for the applications, prioritize those requirements and find a contractor to create the applications. DELTA ISS staff also oversaw the contractor and will provide assistance with integrating the applications into the rest of the learning materials for ST 311.

**Table 1.28 ST 311 project summary**

<table>
<thead>
<tr>
<th>Faculty:</th>
<th>Roger Woodard</th>
<th>DELTA ISS Staff: Kim Rothwell, Ben Huckaby</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: ST 311</td>
<td>Existing DE Course</td>
<td>Resources: 110 hours spent (FY 2008)</td>
</tr>
<tr>
<td></td>
<td>Type I</td>
<td>Undergraduate</td>
</tr>
</tbody>
</table>
LITRE Grant Project Work

DELTA ISS are still supporting two projects that originated in the LITRE Grant program. Around 85 DELTA ISS staff hours have been spent in support of these two projects. One of these projects has been completed and the other, while still in progress, will be moved to DELTA Educational Technology Services.

ArchaeInteractive

The ArchaeInteractive project had two distinct elements. One element was the creation of online teaching modules and an ArchaeInteractive website. This first element was completed in 2005-06. The second element is the design and development of an archaeological data selection and visualization application. The application will facilitate the search and visualization of Dr. Fitzpatrick’s radio carbon database of Caribbean archaeological finds. The application interface will allow researchers to search the database creating data sets which can then be represented visually or as text data. The tool will also be used as an instructional tool in Archaeology classes.

Table 1.29 Archaeinteractive LITRE Grant project summary

<table>
<thead>
<tr>
<th>Faculty: Scott Fitzpatrick</th>
<th>DELTA ISS Staff: Thomas Wilson</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: ANT 385 / 495</td>
<td>Resources: 24 hours spent (FY 2008)</td>
</tr>
<tr>
<td></td>
<td>166 hours spent (Total)</td>
</tr>
<tr>
<td>College: CHASS</td>
<td>Status: In Progress</td>
</tr>
</tbody>
</table>

Virtual Microscopy

With her LITRE Grant award, Dr. Neel purchased a WebSlide® Server from Bacus Labs that allows dynamic interaction with microscopy images. DELTA ISS staff worked with Dr. Neel to develop a website that gives students and faculty in Veterinary Medicine access to the slides in a variety of ways.
Table 1.30 Virtual Microscopy LITRE Grant project summary

<table>
<thead>
<tr>
<th>Faculty: Jennifer Neel</th>
<th>DELTA ISS Staff: Tim Wright, David Howard</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: VMP 964</td>
<td>Resources: 61 hours spent (FY 2008)</td>
</tr>
<tr>
<td></td>
<td>181 hours spent (Total)</td>
</tr>
<tr>
<td>College: Veterinary Medicine</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>

Other Course Development Projects

Instructional Services has also supported several other course development projects. These are mainly started by requests from the Distance Education Planning and Development unit and this year include two courses, MA 105 and ST 101, which will be part of the NC State University offerings for Learn and Earn Online.

FLS 102: Elementary Spanish II

Ms. Tharrington worked with DELTA ISS staff to develop FLS 102 Elementary Spanish II as an online course offered through Distance Education particularly for the new CHASS Leadership in the Public Sector undergraduate degree completion program. Specifically, the new course is delivered through Vista and has chapter web pages, assignments, discussion boards, quizzes and tests, and other learning materials. There are vocabulary / grammar exercises for terms covered in Chapters 5 - 9 of the textbook. The students are required to meet in a virtual classroom and record conversations that can be reviewed later by the instructor.

Table 1.31 FLS 102 project summary

<table>
<thead>
<tr>
<th>Faculty: Karen Tharrington</th>
<th>DELTA ISS Staff: Lee Ann Gillen, David Howard, Wilfred Itte, Hilary Schmidt</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: FLS 102</td>
<td>Resources: 255 hours spent (FY 2008)</td>
</tr>
<tr>
<td>New DE Course Type I Undergraduate</td>
<td>273 hours spent (Total)</td>
</tr>
<tr>
<td>College: CHASS</td>
<td>Status: Complete</td>
</tr>
</tbody>
</table>
**MA 105: Mathematics of Finance**

DELTA ISS staff are working with Ms. McCollum to improve her Distance Education course. Specifically, the project entailed reviewing all of the lecture videos that existed and then extracting the pieces that are most useful. These shorter videos are then situated in course learning modules along with assignments and readings from text materials. DELTA ISS staff also worked with Ms. McCollum to recreate the MA 105 Manual which is a compilation of notes that highlight important topics from the lectures, sample problems with solutions worked out and sets of problems for students to work on their own. There are also extensive WebAssign resources for the course.

**Table 1.32 MA 105 project summary**

<table>
<thead>
<tr>
<th>Faculty: Marilyn McCollum</th>
<th>DELTA ISS Staff: Cathi Phillips, Lee Ann Gillen, Kim Rothwell, David Howard, Leah Lawrence</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: MA 105</td>
<td>Resources: 186 hours spent (FY 2008)</td>
</tr>
<tr>
<td>Existing DE Course</td>
<td></td>
</tr>
<tr>
<td>Type I</td>
<td></td>
</tr>
<tr>
<td>Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College: PAMS</td>
<td>Status: In Progress</td>
</tr>
</tbody>
</table>

**ST 101: Statistics by Example**

Dr. Woodard is collaborating with DELTA ISS staff to create a Distance Education version of ST 101. This project focuses on creating learning modules that will take approximately 30 minutes for students to complete in order to provide maximum flexibility. These modules feature individual activities, group activities, reading assignments, quizzes and problem sets.
Table 1.33 ST 101 project summary

<table>
<thead>
<tr>
<th>Faculty: Roger Woodard</th>
<th>DELTA ISS Staff: Kim Rothwell, Cathi Phillips, AJ Klingenmeier, Laura Sellars</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: ST 101</td>
<td>Resources: 143 hours spent (FY 2008)</td>
</tr>
<tr>
<td>New DE Course</td>
<td></td>
</tr>
<tr>
<td>Type I</td>
<td></td>
</tr>
<tr>
<td>Undergraduate</td>
<td></td>
</tr>
<tr>
<td>College: PAMS</td>
<td>Status: In Progress</td>
</tr>
</tbody>
</table>

FS 785: Food Rheology

Dr. Daubert is working with DELTA ISS staff to improve his Distance Education version of Food Rheology. Course materials are being moved into Vista and Dr. Daubert is recording a series of narrated presentations. DELTA ISS staff and Dr. Daubert are also collaborating with Dr. Jim Steffe from Michigan State University to create some materials for the course, including a welcome video featuring both instructors. Course materials developed for FS 785 will also be used in a MSU version of the course.

Table 1.34 FS 785 project summary

<table>
<thead>
<tr>
<th>Faculty: Chris Daubert</th>
<th>DELTA ISS Staff: Lee Ann Gillen, Leah Lawrence, Brian Lee</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course: FS 785</td>
<td>Resources: 223 hours spent (FY 2008)</td>
</tr>
<tr>
<td>New DE Course</td>
<td></td>
</tr>
<tr>
<td>Type Doctorate</td>
<td></td>
</tr>
<tr>
<td>College: CALS</td>
<td>Status: In Progress</td>
</tr>
</tbody>
</table>
Multimedia Initiatives

Multimedia (MM) initiatives involved continued support for course production, increased efforts in multimedia application development and further collaboration with Marketing and Partnership Development and other DELTA units. The in-house team continues to work towards defining processes and systems to accommodate the growing demand for creative and multimedia content across the organization. During FY 2008, the team focused on developing reusable tools, Serious Games design for education and high-impact marketing and advertising campaigns to promote Distance Education. Major accomplishments included the DELTA branding initiative, Plant Pathology Disease Diagnostics game (vLabs), NCTEACH campaign, 3D-Online Learning Environments and further improve in project management. Internships and professional temporary staff continued to be an invaluable resource for multimedia production. DELTA has worked closely with the College of Design to recruit and retain skilled part-time staff responsible for assisting with a variety of design and production projects. The DELTA ISS team has also employed students from Engineering, Computer Science, Communications and CHASS.

New MM Initiatives:

3D Online Learning Environments – Research

The DELTA ISS team continued its investigation of 3D Online Environments for teaching and learning. Efforts have focused on developing solutions for virtual laboratories (vLabs), which resulted in an immersive Flash game for Plant Pathology disease diagnostics. Other explorations include Torque Game Engine, Unity3D, Open Croquet and Second Life.

Marketing Communications – Creative

During FY 2008, the DELTA ISS production team developed the creative materials for the DELTA branding initiative, various interactive and print advertising campaigns for Distance Education, marketing for individual courses and design and marketing support for DELTA initiatives such as Summer Institute and Workshops.
Large Course Redesign

Large Course Redesign (LCR) is the re-conceiving and rebuilding of the delivery of a large-enrollment course to increase student learning outcomes and contain or reduce instructional costs, primarily by incorporating instructional technology. The National Center for Academic Transformation’s Pew Program in Course Redesign (http://www.thencat.org/index.html) advocates an approach that seeks to increase student learning outcomes and contain costs by focusing on the redesign of large introductory university courses. The Program defines large courses as those that are among the top 25 in enrollment, and/or the top five percent in enrollment in a college. By redesigning these large introductory courses, virtually every student who attends the university can be positively affected.

Major Accomplishments

DELTA ISS staff spent over 700 hours dedicated to the LCR program, including the needed program planning, administrative and research activities to get this program started this year, as well as in working with the individual projects. The staff focused on better understanding LCR concepts this year, via professional development (conference attendance and presentations), research, project planning, and faculty and staff training (workshops and seminars) in the FY 2008. This also included establishing the DELTA Large Course Redesign (LCR) Pilot Grant Program—a criteria-based proposal process to support the redesign of large enrollment and critical path courses at the university (see “LCR Future Plans” below).

LCR Seed Grant Project Work

DELTA has been working with faculty and staff on initial redesign planning and implementation for several "high needs" courses at NCSU. We developed a process for proactively targeting courses for redesign using existing data from the Registrar’s Office (course enrollment, course grade distribution, average D and F rates, percentage of course repeats and average course GPA) to identify courses for potential redesign and to begin establishing assessment criteria to measure future outcomes of LCR.

During the FY 2007, DELTA (in conjunction with the Registrar’s office) identified four courses to receive DELTA LCR seed grant funding in support of course redesign planning: Chemistry 101, Mechanical and Aerospace Engineering 206 and 208, and Physics 205. DELTA ISS staff have worked with the faculty teaching these courses to apply large course redesign methodology to address whole-course issues rather than focusing on one section of a course. These projects have included the commitment of multiple faculty, staff and the long-term support of
departmental/college administration, as project outcomes will need a long term focus.

**CH 101: Chemistry—A Molecular Science**

CH 101 is a course that served over 3200 students during the FY 2008. The D/F rate for this course is historically high, ranging from 24% - 30% depending on the semester. A main objective for redesigning this project is to reduce the percentage of students who receive a D-grade or lower and to reduce the number of students repeating the course. A new pedagogical approach blending traditional classroom time with instructional technology will deepen students’ understanding of basic concepts through the availability of content suited to different learning styles, through links to applications in other fields, and through the enhanced visualization of nanoscopic processes.

DELTA ISS staff met with Greg Neyhart to discuss funding a pilot redesign for CH 101. LCR methodology, principles and strategies were reviewed. Questions for how to assess learning after redesign were also addressed in anticipation of comparing students’ grades in traditional lecture courses with grades after redesign. Several meetings amongst the CH 101 redesign team revealed that an initial step is a need to revisit the course objectives to provide a stronger foundation for LCR. The team is establishing a plan for how to transfer course material to the Web. Strategies and goals for the redesign include the following: provide additional drill on basic material; develop remedial tutorials for students who enter with deficiencies in problem solving ability; and show students the connectivity of topics within the course, whether through interactive concept maps or other means. This work will continue in FY 2009.

**Table 1.35 CH 101 project summary**

<table>
<thead>
<tr>
<th>Faculty:</th>
<th>DELTA ISS Staff:</th>
</tr>
</thead>
</table>
| • Greg Neyhart, Teaching Assistant Professor  
  • Alton Banks, Professor | • Traci Temple  
  • Lisa Fiedor  
  • David Howard  
  • Donna Petherbridge |

<table>
<thead>
<tr>
<th>Course:</th>
<th>Resources:</th>
</tr>
</thead>
<tbody>
<tr>
<td>• CH 101: Chemistry—A Molecular Science</td>
<td>• 38 hours</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>College:</th>
<th>Status:</th>
</tr>
</thead>
<tbody>
<tr>
<td>• The College of Physical and Mathematical Sciences</td>
<td>• In progress</td>
</tr>
</tbody>
</table>
MAE 206 & MAE 208: Engineering Statics & Engineering Dynamics

MAE 206 and 208 are critical-path courses laying the foundation for the future of the students’ study in engineering; they are the first engineering courses for many students and a high level of understanding is required. These courses served over 1000 students during the FY 2007. Students’ mathematical preparation (Trigonometry and Linear Algebra) for Statics and Dynamics is highly variable. As a result, many students do not have the math skills necessary for successfully completing these lower-level engineering courses. DELTA ISS staff worked with Anna Howard to plan the redesign of MAE 206 and 208. The redesign of these courses calls for significant in and out of class group work for the students to engage with the material. Face-to-face class time will be reduced. Material covered in class will focus on motivation and context followed by in-class, instructor-led individual and group work. Online modules will include 19 lessons, each with a Web-based description of the skill, a video example of how the skill or concept is applied in the discipline, and a practice quiz for students to complete.

Table 1.36 MAE 206 & MAE 208 project summary

<table>
<thead>
<tr>
<th>Faculty:</th>
<th>DELTA ISS Staff:</th>
</tr>
</thead>
</table>
| • Anna Howard, Teaching Assistant Professor, MAE 206 Course Coordinator  
• Larry Silverberg, Professor, Associate Department Head, MAE 208 course coordinator | • Traci Temple  
• Lisa Fiedor  
• Kim Rothwell  
• Donna Petherbridge |

<table>
<thead>
<tr>
<th>Course:</th>
<th>Resources:</th>
</tr>
</thead>
<tbody>
<tr>
<td>• MAE 206: Engineering Statics Undergraduate</td>
<td>• 48 hours</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>College:</th>
<th>Status:</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Engineering</td>
<td>• In progress</td>
</tr>
</tbody>
</table>

PY 205: Physics for Engineers and Scientists I

PY 205 is the first course in a two-semester sequence in introductory physics, with laboratory. The course is a calculus-based study of mechanics, sound and heat.

With the resources provided to the Physics department, Dr. Karen Daniels (Physics) was able to apprentice SCALE-UP (Student-Centered Activities for Large Enrollment Undergraduate Programs) in SP/08 with the goal of applying lessons learned to her own teaching of the course. SCALE-UP is a collaborative, hands-on, computer-rich,
interactive learning environment for large-enrollment courses.

Table 1.37 PY 205 project summary

<table>
<thead>
<tr>
<th>Faculty:</th>
<th>DELTA ISS Staff:</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Anna Howard, Teaching Assistant Professor, MAE 206 Course Coordinator</td>
<td>• Traci Temple</td>
</tr>
<tr>
<td>• Larry Silverberg, Professor, Associate Department Head, MAE 208 course coordinator</td>
<td>• Lisa Fiedor</td>
</tr>
<tr>
<td>• Donna Petherbridge</td>
<td>• Donna Petherbridge</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Course:</th>
<th>Resources:</th>
</tr>
</thead>
<tbody>
<tr>
<td>• PY 205 Physics for Engineers and Scientists</td>
<td>• 9 hours</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>College:</th>
<th>Status:</th>
</tr>
</thead>
<tbody>
<tr>
<td>• The College of Physical and Mathematical Sciences</td>
<td>• Course Observation Completed, Assessment/Outcomes to be documented in conjunction with Dr. Daniels after she has an opportunity to apply to her own classroom</td>
</tr>
</tbody>
</table>

**Other LCR Projects**

Instructional Support Services has also assisted with other large course redesign projects. These projects included DELTA ISS research and consultation specific to the project needs, as asked for by those involved in the project (i.e., digital repositories, assessment, and conference attendance).

**BIO 181 & BIO 183: Introductory Biology I & II**

BIO 181 and 183 are courses that served over 1700 students during the FY 2007. DELTA ISS staff have consulted with Alan Schueler and other College of Agriculture and Life Sciences (CALS) Information Technology Staff about the BIO 181 and 183 large course redesign project. The biology LCR team and DELTA met on several occasions to discuss planning and open source learning management software resources available for offering a hybrid course (MOODLE). DELTA ISS staff have also investigated the use of the Equella Digital Repository and researched biology redesign projects at peer institutions. The goal was to gather information that will help in the development an offering of BIO 181 and 183, which will address the anticipated increase in student enrollments in biology and majors requiring biology for future study. Opening the course to more students will allow the CALS to increase the capacity of BIO 181 and 183, and set a foundation for further development of hybrid and DE versions of biology courses and biology academic programs.
Table 1.38 BIO 181/183 project summary

<table>
<thead>
<tr>
<th>Faculty &amp; Staff:</th>
<th>DELTA ISS Staff:</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Alan Schueler, Director, Academic and Administrative Technology</td>
<td></td>
</tr>
<tr>
<td>• Miriam Ferzli, Teaching Assistant Professor</td>
<td>• Traci Temple</td>
</tr>
<tr>
<td>• Lisa Parks, Teaching Assistant Professor</td>
<td>• Lisa Fiedor</td>
</tr>
<tr>
<td></td>
<td>• Donna Petherbridge</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Course:</th>
<th>Resources:</th>
</tr>
</thead>
<tbody>
<tr>
<td>• BIO 181/183 Introductory to Biology I &amp; II</td>
<td>• 66 hours</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>College:</th>
<th>Status:</th>
</tr>
</thead>
<tbody>
<tr>
<td>• The College of Agriculture and Life Sciences</td>
<td>• In progress</td>
</tr>
</tbody>
</table>

Figure 1.25 Summary of Hours Spent on Program Specific LCR Projects

**DELTA Staff Hours for Individual Project LCR Efforts during FY 2008**

![Bar chart showing hours for different projects](chart.png)

LCR Future Plans

The DELTA Large Course Redesign (LCR) Pilot Grants program ([http://delta.ncsu.edu/teach/funding/lcgrants/](http://delta.ncsu.edu/teach/funding/lcgrants/)) provides financial and staff resources for faculty involved in redesigning large courses. Established in the FY 2008 and using the process for targeting courses for redesign using data from the Registrar’s Office, this program will fund two - four large course redesign projects during the FY 2009.
LCR at NCSU is anticipated to grow from these initial four projects to approximately seven projects during FY 2009. In addition to monetary support, DELTA ISS will provide instructional design, instructional technology and instructional development support to the existing and future LCR projects. It will be important to determine if redesigning large lecture courses improves student learning, reduces the DWF rates and opens enrollments for “bottleneck” courses. DELTA ISS staff will collaborate with faculty to achieve one or more of the following: 1) develop an LCR project plan; 2) provide LCR principles and methods instruction; 3) create timelines for project completion; and 4) establish a plan and methods for assessing the success of LCR.
SLMS/LMS Support

*Synchronous Learning Management System (Elluminate)*

During FY 2008, Elluminate moved from a pilot service to full scale production, becoming fully integrated into our LMS support structure. Increased usage, new training programs, more thorough end-user support, and hardware improvements accompanied this change.

As opposed to NC State’s other LMS offerings (Vista, WolfWare) which are tied primarily to for-credit courses, Elluminate is available to all NCSU faculty and staff for professional purposes. This has caused an even larger increase in usage since faculty and staff who do not teach for-credit courses, such as Extension, have found many uses for Elluminate. By the end of FY 2008, there were 448 Moderator accounts in Elluminate, compared to 27 Moderator accounts in FY 2007 (+1600% increase). The total number of online sessions for FY 2008 were 3455, with an average of 10.6 sessions per day. This compares to 1189 sessions in FY 2007 (+191% increase). Figure 1.26 summarizes Elluminate usage and illustrates an increase in the Spring of 2008 as more people became aware of Elluminate and started utilizing it more.
Figure 2.26: Number of Sessions by Month, Elluminate

Elluminate usage tends vary depending on the days of the week (see Figure 1.27), and it tends to spike in the evening hours between 6:00PM and 9:00PM (see Figure 1.28). The number of sessions per week throughout the day stays fairly constant at about five meetings per hour, but the number of participants per week jumps from 16 per hour during the work day to 40 per hour during the evening hours. This is most likely due to DE classes being offered in the evening. The average session time for Elluminate sessions was 1 hour, 3 minutes.

Figure 1.27 shows the average weekly usage by day of the week, and Figure 1.28 shows the average number of sessions per week that were started at a given time versus the number of participants who joined meetings during the same time frame.
Figure 3.27: Average Weekly Usage by day of the week, Elluminate
Figure 1.28: Average Weekly Sessions vs. Participants
In FY 2008, DELTA created a new and expanded Elluminate Moderator Training workshop which was taught seven times to a total of 105 participants. There were also four custom Elluminate trainings taught to a total of 24 participants. The workshop was also expanded from a 60 to a 90, and then to a 120 minute workshop during FY 2008.

In addition to becoming part of our regular training schedule, Elluminate support became part of our standard help desk support. We answered 368 Elluminate Remedy calls and increased the number of Remedy solutions to 20.

Moving Elluminate to full scale production involved transferring the servers to MCSN for hosting. We currently have two servers, one for production and one for testing.

In addition, Greg Kraus, David Howard, and Lou Harrison attended the Elluminati conference in October 2007, and Greg Kraus and David Howard presented at the Elluminate User Group Meeting at Duke in December 2007 about NCSU’s use of Elluminate.

*Note: The data for FY 2008 is limited to 8/24/2007-6/30/2008 because when the server was moved from pilot to production we lost the first two months of data for FY 2008.*
Learning Management Systems (Blackboard Vista and WolfWare)

During FY 2008, both Blackboard Vista and WolfWare were in full production, integrated as a regular part of our LMS support structure. DELTA ISS Staff continued to support the use of these LMSs through the regularly scheduled workshops, some custom training sessions, the LearnTech Help Desk, the Summer Institute and ITAP programs, and through instructional house calls.

During FY 2008 (summer 2007, fall 2007 and spring 2008) a steady usage of both Vista and WolfWare are apparent, underlying the importance of LMSs as part of the campus infrastructure.

![LMS Usage By Semester - R&R Sections](image)

Figure 1.29 LMS Usage by Semester – Registration and Records sections, current as of Sept 5, 2008*

*Note: While there were 28 Moodle sections created for spring 2008, only 6 were actively used by students.

See [http://raleigh.delta.ncsu.edu/lms_reports/index.php](http://raleigh.delta.ncsu.edu/lms_reports/index.php) for reporting information on LMS usage at NC State, including usage by college.
Learning Management Systems Pilot (Moodle)

In FY 2008, DELTA and CALS began a joint effort exploring Moodle as a possible LMS for NCSU. This impetus for this investigation arose out of:

1. Continued problems with the company Blackboard, including support and software performance issues.
2. A need to reevaluate LMS software after using Blackboard (WebCT & Vista) for a number of years.
3. An interest on the NC State Campus in looking at Open Source solutions that can tie into our existing campus architecture.
4. An interest in having more control over our own destiny.


DELTA and CALS established the Moodle Pilot server in Fall 2007. During Spring 2008, 28 sections were created in Moodle, though only six courses were actually used in supporting teaching (as defined by having evidence of student logins into the course). Other sections created were more investigative in nature instead of directly used. 13 sections using Moodle were taught in Summer I. Spring and summer courses involved 174 unique students in Spring 2008, and 396 students (343 unique) in Summer one.

One spring class, Dr. Hofelt’s class in Toxicology, has completed an assessment of student satisfaction in using Moodle, with a sample of 23 students. The assessment indicated that approximately 96% of respondents were Generally Positive (@ 44%) or Very Positive (@ 52%) regarding the functionality of the Moodle site. No one was negative regarding the functionality of the Moodle site. Approximately 74% of respondents like indicated that Moodle is better, or much better, in their opinion, than Blackboard Vista, with 39% indicating that Moodle is better than Blackboard Vista for most things, but not for everything, and with around 35% indicating a preference for Moodle to be used in their classes. No one compared Moodle negatively to Blackboard, four students found them about the same, and two did not respond. Assessment for the other Spring & Summer courses is currently being analyzed.

In FY 2008, DELTA taught five Moodle workshops to a total of 60 participants. The workshop was expanded from 60 minutes initially to 90 minutes. Additionally, DELTA answered 35 Remedy calls regarding Moodle for FY 2008.
Selected DELTA ISS Presentations, Publications & Research

In addition to the orientations, presentations, workshops and seminars given by the DELTA Instructional Support Services staff in support of the NC State Community, a number of the DELTA ISS staff demonstrated their commitment to contributing to the TLT professional community through their involvement with presentations, publications and research outside the NC State Community in FY 2008.

These staff included:

- Fiedor, Lisa. Poster Session: "Online Assessment Tools: Do They Work for Students with Disabilities?", Educause 2007, Seattle, WA, 10/24/07
- Fiedor, Lisa. Presentation: "Online Assessment Tools: Do They Work for Students with Disabilities?", UNC CAUSE, 12/5/07
- Fiedor, Lisa. Presentation: "Online Assessment Tools - Do They Provide a Valid Assessment of Learning for Students with a Disability?,” UNC TLT 2008 Conference, Raleigh, NC, 3/14/2008


• Temple, Traci. & Banks, Alton. (Fall 2007). Technology Enabled Classroom. Accounting Education Forum: North Carolina Associates of CPAs, Chapel Hill, NC

• Temple, Traci (et al). What Technologies Students Are Using At North Carolina State University: A Case Study, an NC State publication available online (http://www4.ncsu.edu/~tltemple/student_it_ncsu2.pdf)

Selected Professional Accomplishments

Instructional Support Services staff members are committed to professional growth and recognition. The following are some of the professional accomplishments and awards received by staff members during FY 2008.


Outreach & Service

Instructional Support Services staff members are also involved in outreach and service activities both internal and external to the University, such as teaching courses, coordinating multi-institutional events, participating in special task forces, interest groups and campus wide committees, and serving on editorial boards.

NC State Internal Outreach & Service

- Click, Andy. Member, OIT Remedy Advisory Committee
- DELTA ISS Staff. Participation in campus TLTR meetings and forums throughout the year.
- Fiedor, Lisa. Pathways Team 4 Presentation to the NC State Staff Senate: "CSI: NCSU WolfWalks Crosswalk Safety Initiative", 9/5/07
- Fiedor, Lisa. Moderator and Organizer, NC State TLTR Session: Project 25: Ten Years Later
- Howard, David. Council for Undergraduate Education
• Howard, David. Search Committee for a Web & Distance Education Coordinator for the College of Natural Resources
• Kraus, Greg. BLERN, see http://blogs.lib.ncsu.edu/page/blern.
• Kraus, Greg. Moodle Best Practices in Course Design workgroup
• Howard, David & Kraus, Greg. Moodle Technical workgroup
• Petherbridge, Donna; Smith, Stacy; Kraus, Greg. Moodle Pilot Implementation Committee (partnership with CALS, CNR, Education).
• Petherbridge, Donna. LITRE Assessment Committee.
• Petherbridge, Donna. LITRE Special Task Force on Student Learning (through August 2007)
• Robertson, Amanda. Taught AND219: Digital Imaging, NCSU College of Design.
• Smith, Stacy. Contributor, NCSU “Clickers” Evaluation Team
• Smith, Stacy. Chair-elect, Key Haven Committee
• Temple, Traci. Taught a section of DF 101—Design Fundamentals Studio I, Department of Art & Design, College of Design, Fall 2007.
• Temple, Traci. Taught the new course ADN 492—Life Drawing, Department of Art & Design, College of Design, Spring 2008.
• Temple, Traci. Presented Integration of technology to match or complement teaching styles: A blended learning approach for Preparing the Professoriate (PtP), North Carolina State University, Fall 2007.

**External to NC State Outreach & Service**

• Howard, David. Member, Learning Object Repository pilot workgroup.
• Howard, David. UNC TLT Conference Program Committee
• Howard, David. Chair, UNC TLT Conference Review Subcommittee
• Howard, David. UNC TLT Conference Proceedings Subcommittee
• Howard, David. UNC TLTC Instructional Professionals Interest Group
• Howard, David. Co-Chair, North Carolina Learning Object Repository Interface Working Group
• Fiedor, Lisa. Member, UNC TLT Conference Program Committee, Workshops Workgroup, Review Subcommittee, and Plenary Speakers Subcommittee.
• Petherbridge, Donna. UNC TLT Board Representative from NC State University & Board Secretary.
• Petherbridge, Donna. NC State ELI Member Representative.
• Petherbridge, Donna. Reviewer for Vol. 27, of To Improve the Academy (Professional and Organizational Development Network (POD), January 2008.
• Petherbridge, Donna. 2008 Conference Proposal reviewer for the Professional & Organizational Development (POD) Network & the National Council for Staff, Program & Organizational Development (NCSPOD) (actual conference is in October, 2008, with proposal reviews in April, 2008).
• Smith, Stacy. 2008 TLT Conference: Review Subcommittee
• Smith, Stacy. NCSU representative for the Blackboard Institutes
• Smith, Stacy. NCSU coordinator for the Blackboard Exemplary Course Program
• Temple, Traci. North Carolina State University liaison for the New Media Consortium (NMC) membership
Selected Conference Participation

To stay abreast of new and emerging technology and pedagogy, Instructional Support Services staff attend a variety of local and national conferences and training sessions. Conferences or training events (outside of NC State University) where one or more Instructional Support Services staff members attended during FY 2008 included:

- Accessing Higher Ground Conference, 2007
- BbWorld Conference. Boston, July 2007
- Duke Technology Showcase, Durham, NC, April 2008
- EDUCAUSE Annual Conference, October 2007, Seattle.
- Educause Learning Initiative (ELI) Annual meeting, January 2008, San Antonio
- Elluminate Users Group Meeting at Duke University, December 2007
- Game Developer’s Conference (GDC), February 2008, San Francisco, CA
- InHOWse Designers Conference, Fall 2007, Austin, TX
- Moodlerooms seminar, December 2007
- SIGGRAPH, August 2007
- TLT Group Friday Live Seminars (via webcasting, throughout the year)
- UNC CAUSE, 2007
- UNC Teaching and Learning with Technology Conference, Raleigh, NC, March 2008
- UNC Teaching and Learning with Technology Moodle Training, Greensboro, NC, July 2007

Professional Memberships

Instructional Support Services staff members also have memberships in a variety of local and national organizations, and working groups/interest groups associated with these organizations. Memberships for various individuals during FY 2008 included:
• Access Technologists Higher Education Network (ATHEN)
• Access Technologists Higher Education Network (ATHEN), Accessible Technology Design Initiative Working Group and iTunesU Accessibility Working Group
• American Association of University Women
• American Institute of Graphic Artists (AIGA)
• American Society for Training & Development, Research Triangle Area Chapter, (ASTD-RTA)
• American Society for Training & Development, National Organization
• Blackboard Accessibility Interest Group, Blackboard Accessibility Documentation Sub-Group, and Blackboard Accessibility Design Sub-Group
• Blackboard Certified Trainers
• ECAR
• EDUCAUSE
• Educause Learning Initiative (ELI)
• Instructional Technology Forum (ITFORUM)
• NC State SIGGRAPH Chapter
• New Media Consortium
• Phi Kappa Phi Honor Society
• Professional and Organizational Development (POD) Network
• SIGGRAPH
• Society for Applied Learning Technology (SALT)
• TRI-IT
• UNC TLTC (Board Member, Secretary to the Board, Open Source LMS Evaluation Project)
Educational Technology Services

Last updated by Lou Harrison, September 2, 2008

Contributions: Joe Gray, Bill Hicks, Tony Pearson, Peter Watson, Jeff Webster

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Executive Summary

**DELTA Educational Technology Services**
Technology and services to support teaching and learning at the university, and to support DELTA. This department includes Media Distribution Services (MDS), Video Communication Services (VCS), Video Engineering, Application Development (AppDev) and Application Support (AppSup).

**Desktop Support for DELTA**
Technical support and troubleshooting for DELTA desktop computers and hardware/software consultation and purchasing.

**Video Engineering**
Planning, design, installation, consultation and support, for DE (110D) classrooms.

**Media Distribution Services (MDS)**
Instructional content delivery to DE students via media formats such as Cable broadcasting and DVD.

**Application Development (AppDev)**
Development and integration of Web based tools for use with our learning management system and other DELTA services.

**Application Support (AppSup)**
Management, coordination and implementation of university-level education technology systems, including learning management systems and DELTA technical development.

**Video Communication Services (VCS)**
We provide support for incorporating video technology into your course, including Videoconferencing, DE Classrooms, and Producer/Director Planning Services.
Media Distribution Services

Academic year 2007-2008 was one of positive change and growth for DELTA’s Media Distribution Services. In addition to fulfilling our primary mission of Distance Education (DE) media duplication and distribution support, key goals were met in the development of our Digital Media System.

The achievements of the year are part of the overarching plan to expand and enhance MDS services and support for NC State, while building systems and infrastructure able to meet the demands of the future. Meeting targeted goals this year is possible because of our diligent work in prior years, and we anticipate the accomplishments of next year will likewise build upon these. In this way we seek “continuous quality improvement” in our service to NCSU faculty and students.

As was true last year, improvements to our systems and procedures highlight the evolving nature of distributing video based instruction and indicate major impacts on how MDS approaches its mission. All progress and modifications to our infrastructure and methods occurred while daily production obligations were still being met. Despite the difficulty inherent in doing “business as usual” while making major system and procedure changes, MDS was able to meet the challenge and in fact improve service to our clients during the year. The hard work was worth the effort, for the end result is a more robust service, better positioned to take advantage of future developments as technology evolves.

Cooperating Raleigh Colleges Channel 18

In August 2007 DELTA Media Distribution assumed complete oversight and operational responsibility for the CRC cable channel 18. Accomplishments are as follows:

- Managed all aspects of transition from Creative Services tape based system to DELTA’s MediaEdge digital server.
- Directed the transition of CRC programming to digital format for MediaEdge. All work was done in-house by Media Distribution personnel.
- Supervised creation and programming of new “readerboard messages” for the channel. Peter Watson wrote copy and department staff creating graphics with music beds for channel 18.
- Peter Watson worked cooperatively with CRC Director, local Raleigh colleges, Tom Miller and Thomas Conway (“CRC Task Force”) on transition of channel operations to DELTA as well as technical
standards for new programming and acquisition of new programming.

- Peter Watson assumed supervision of part time CRC employee, Kristin Kauffman. All technical systems operate under his direction and all channel personnel report directly to him.
- Peter Watson introduced the idea of satellite programming for the channel, and oversaw the upgrading of a DELTA satellite dish for acquisition of Annenberg programs.
- Department staff downloaded Annenberg programming, creating digital files for the channel. MDS staff also manage all other technical facets of the channel on a day-to-day basis.
- Changed the signal path to Time Warner from Hillsborough Building to Centennial Main Distribution Frame (located in Partners 1 directly underneath Media Distribution operations center; oversaw installation of new fiber optics; changed monitoring channel 18 to direct Time Warner cable signal; created fiber path for Annenberg programs from existing fiber link.
- Made channel 18 working space more functional by re-arranging equipment in Server Room and Archive Room, purchasing additional equipment and Acoustilock cabinets to do so.

**DVD Delivery Improvements**

The Media Distribution department implemented the following improvements in the production and delivery of distance education materials delivered on DVD:

- Employees Bob Wilkerson and Brian Dyer created new DVD labels and set covers, featuring wolf pictures, cleaner NC State logo, etc.
- Reproduction of DVD set covers was moved from Kinko's to University Graphics, thereby improving print quality while reducing cost and keeping funds expended in the NC State “family”.
- Changed DVD packaging and QC procedures. Once QC’d, DVD sets are placed in sealed plastic so it’s easy to tell if DVD set has been used or not. This saves considerable QC time as sealed sets are returned to usable inventory.
- Changed delivery and pick up dates to ensure all sets are in stock at least two weeks prior to the semester start. Changed delivery vehicle to box truck, saving time and streamlining deliveries.
Implemented use of UTS temporaries to help with DVD deliveries and returns, improving time of delivery. It’s cost efficient and allows permanent employees to better oversee the process.

**Personnel Initiatives**

The Media Distribution Department saw the following personnel changes implemented in 2007-2008:

- Media Technician I Bob Wilkerson was hired into a Media Technician II position, effective October 1, 2007.
- Peter Watson was promoted from Media Distribution Manager to Associate Director of Media Distribution.
- Media Technician I Brian Dyer was hired as a Media Technician II position, effective April 1, 2008.
- The Career Banding process was initiated for all Media Distribution employees, moving them into the Broadcast and Emerging Media band.

**Professional Development**

- September 2007: Employees attended Instructional Services Vista workshops to better understand the system and explore how Media Distribution might support Vista based media.
- October 2007: Peter Watson, Bob Wilkerson and Brian Dyer attended PPI trade show in Greenbelt, Maryland to evaluate media equipment and software.
- December 2007: All employees attended NCREN Day at MCNC in RTP for Rich Media demos/evaluation and NCREN “community” discussions.
- December 2007: Employees Bob Wilkerson and Brian Dyer attended the Government Video Expo trade show in Washington, DC to evaluate media equipment and software.
- March 2008: All employees attended TLTC in Raleigh.
- April 2008: Employees Bob Wilkerson and Brian Dyer attended the National Association of Broadcasters trade show for evaluation of media equipment and software.
• Peter Watson attended several Streaming Media Magazine “webinars” on media distribution over the course of the year
• May 2008: Peter Watson, Bob Wilkerson and Brian Dyer attended the Streaming Media East conference in NYC.
• Peter Watson maintained Lynda.com online software training account for all employees. Employees were required to train between 2 – 4 hours a week and report progress in Employee Weekly Reports.
• Lynda.com training was extended to part time person Kristin Kauffman (did not require training or reports).
• Lynda.com training access was extended to CRC Director Jennifer Spiker so she could teach herself Dreamweaver.

\textit{VCS Facilities Planning (“Ten Year Plan”)}

Peter Watson was involved in the creation of a 10 year facilities plan for VCS video classrooms. This became a major project over the course of the year:

• Peter Watson received the assignment from AVP Lou Harrison in November 2007. He worked cooperatively with Joe Gray and Tony Pearson on the project from November through the rest of the year, compiling all data into a detailed report and cost projection spreadsheet.
• Final report was presented to Tom Miller April 25, 2008.
• Tom Miller directed that the report be pared down so he could use it to advocate for more NCSU Facilities department funding.
• Alyson Tuck was also assigned to the project, providing much needed writing and editorial skills. The project extended into the 2008-2009 year.

\textit{Research and Development}

The Media Distribution Department initiated or participated in the following R&D activities:

• iTunes University – Coordinated DELTA tests with Hal Meeks, worked with him on uploading content, managing content, and so on.
• Rich Media Taskforce – Peter Watson served on Rich Media Taskforce chaired by Tony Pearson. Attended Accordent and MediaEdge demos, participated in group discussions.
iPod deployment of media – staff explored transcoding content into file formats compatible with iPods and other portable media players. Tests were successful and presented to all DELTA meeting.

Cell phone deployment of media – staff tested deployment of content on video capable cell phones. Tests successful.


**Equipment, Software and Facilities**

- Most CRC equipment and facilities improvements are listed above in the CRC section, and not repeated here.
- Summer 2007: Infrastructure upgrades (in concert with VCS Manager Tony Pearson): Network switch expansion, IP port activation, and final construction details for Server Room (Channel 18 Master Control).
- August 2007: Upgraded all Adobe production software
- August 2007: Upgraded graphics cards for production computers
- September/October 2007: Inherited VCS Anystream Agility Workgroup & MediaEdge servers, as these systems were underutilized by VCS and could be put to use in Media Distribution. Brought both systems online.
- October 2007: Purchased Mac Pro system to upgrade production computer resources
- Spring 2008: Purchased Telestream’s Episode Engine Pro software to increase transcoding capacity, capabilities and options. Employees Bob Wilkerson and Brian Dyer evaluated it in depth at NAB, and came back with a solid recommendation.
- Spring 2008: Apple Xserve server class computer acquired for Episode Engine Pro. Xserve and software successfully deployed and operational.
- Spring 2008: Purchased Adaptec Snap Server to increase storage capacity for digital media storage and working projects.
- Spring 2008: Purchased Sigma routing switcher for server room production, channel 18, etc. Replaces old Leitch router inherited from VCS.
• Purchased additional drives for MediaEdge server #2’s Rorke storage array expanding capacity from 800 GB to 2.4 TB
• Drives ordered and received to do the same for primary MediaEdge
• Initiated solution for Pictron network failures “timing out” of webscheduler.
• Initiated inquiry for Comtech to increase network capacity for Partners 1. Worked with Robert Holloman on this.

Presentations and Awards

• September 2007: Department R&D efforts presented to Delta “One Team” meeting by Peter Watson
• October 2007: At Tom’s request, Peter Watson made R&D presentation at the full Delta department meeting.
• April 2008: Peter Watson received nomination for Pride of the Wolfpack Award

Additional Accomplishments and Responsibilities

• Summer 2007: Peter Watson met with B.J. Attarian and Tony Pearson to discuss possible collaboration between channel 18/Media Distribution department and Wolf TV.
• Spring 2008: Media Distribution collaboration with Instructional Services. Staff met with DELTA Instructional Services staff (David Howard, Lee Ann Gillen and Mike Cuales) to discuss collaboration on Learn and Earn project. Staff worked with IS by gleaning designated clips from MA 105 MPEG-2 files and transcoding into Flash video, using Episode Engine system. Over 200 segments were transcoded in less than 2 days.
• Staff worked with IS on Summer Institute DVD
• Spring 2008: Peter Watson served on Search Committee for DELTA Associate Vice Provost for Business and Finance.
• Spring 2008: Peter Watson served on Search Committee for DELTA Assistant Director of Distance Education
• Spring 2008: Peter Watson initiated contact with NCSU Marketplace staff to eliminate bothersome e-mail approval notices sent out when Robert Holloman placed orders. Set up meeting with the interested
parties and Marketplace staff. Issue was resolved and duplicate e-mails were eliminated.

- All year: Peter Watson served as DELTA liaison to Comtech “Video Furnace” initiative. The Video Furnace is intended to replace co-axial cable TV distribution on campus with IP delivered H.264 files.
Application Support

AppSup Executive Summary

The Application Support (AppSup) group was formed in December 2007 as the former Technical Systems + Integration (TSI) group was split into two groups.

AppSup will mainly focus on two areas: Supporting current application software with upgrades, maintenance and troubleshooting and providing hardware and software infrastructure for those same applications. Those systems will include but are not limited to: Blackboard Vista, Elluminate, Moodle, and internal DELTA applications. Other examples of systems, which will come under our support as they become production level, will be rich-media classroom capture, storage services within DELTA., and production MySQL services for internal DELTA use.

AppSup Activities

There have been two major activities for the year: Forming the group and continuing growth of hardware and software in support of existing systems.

Forming the Group

At the start this group consisted of two existing employees, Tricia McKellar and Laura Chen, and one Associate Director, Bill Hicks. In March Tricia (our main DBA) left for another position at UNC-GA leaving the group with one junior DBA and two empty positions. During the summer Laura finished her Oracle 9i certification to become an OCP. With the completion of her certification the paperwork was submitted to adjust the level of her position from Journey to Advanced and promote her to the primary DBA role for the group. At the same time, Tricia’s old position was changed from an Operating and Systems Analyst to a Business and Technology Application Analyst for equity purposes in the group and to reflect the current changes of Laura’s role as primary DBA.

During the spring months the position #60709 was modified and advertised. Several interviews were conducted for the position. A candidate was offered a job but turned it down for various reasons but mainly due to lack of salary. The search continues for a qualified candidate.

Growth and changes in hardware and software

Changes to Vista

- Upgraded to Hotfix 2 for Vista 4.2.2
- Upgraded to Service Pack 3 bringing us to Vista 4.2.3
- Purchased new hardware for new database server (T5220)
- Purchased new hardware more addition managed virtual nodes (T5220)
- Purchased new hardware to use for Oracle backups (Sunfire X4500)
Changes to Elluminate
• Purchased and installed new hardware for primary Elluminate server
• Upgraded to Elluminate 8.1
• Upgraded to Elluminate 8.3
• Added various small fixes for compatibility issues

Changes to Moodle
• Installed 3 systems to use for Pilot, Testing, and Development
• Researched and implemented failover database systems
• Purchased 2 new Sun Blade 6000 for production system with 10 nodes each
• Purchased new hardware for storage of Moodle data (Sunfire X4500)

Support of Existing Systems
This group has had several challenges supporting existing systems this year. Not least of which is lack of personnel. This group is responsible for maintaining and supporting large mission critical systems for DELTA and the University as a whole and has done a relatively good job with the limited resources available. A large amount of assistance came from the AppDev group mainly by using the Linux and Solaris expertise of Jeff Webster. He was an important piece of helping maintain stability and move forward with the installs for both Elluminate and Moodle.

Several new systems have been developed to support existing functionality needed with DELTA. One of these is a highly available production MySQL environment to provide services for the new PeopleSoft data integration that is necessary for most of the LMS integration work that AppDev will be doing. Another is the storage system that is currently being developed using the Sunfire X4500’s (Thumpers) to be used with Moodle for backups and basic storage requirements.

Growth
Several changes have been made to allow for growth. One example of this is the restructuring and better utilization of storage space on the current 6140 StorEdge SAN. By making some adjustments we have doubled the space available for RMAN backups from 1.6TB to 3.2TB. Another example is making configuration changes on the Vista cluster to allow what once were dedicated nodes for JMS and integration to be used in the general pool if needed. This allows for better utilization of existing hardware to provide services for all users.

The upcoming year will utilize many technologies being researched currently. These changes in the existing architecture will include:
• Implementing and installing new production database server for Vista and at the same time upgrading the Oracle software to 10g.
• Implementing and installing a fully clustered and highly available Moodle system with redundant front-end nodes and redundant MySQL database servers

**AppSup Staffing**

**December 2007**
Associate Director: Bill Hicks
Business & Technology Application Analyst: Laura Chen
Operating and Systems Analyst: Tricia McKellar
Business & Technology Application Specialist: (vacant)

**March 2008**
Associate Director: Bill Hicks
Business & Technology Application Specialist: (vacant)
Business & Technology Application Analyst: Laura Chen
Business & Technology Application Analyst: (vacant)
Application Development

AppDev Executive Summary

The Application Development (AppDev) group was formed in December 2007 as the former Technical Systems + Integration (TSI) group was split into two groups.

AppDev will focus on application development, primarily php web applications, and data integration. These efforts will touch most groups in DELTA as well as numerous other groups at NCState. Work will be done in support of our Enterprise LMS’s (WolfWare, Blackboard Vista, Elluminate and Moodle), internal DELTA applications that help to improve our business processes via automation and in new areas of collaboration like rich-media classroom capture.

AppDev Activities

AppDev had three major activity areas for the year. These were forming the group, continuing development and support of existing applications, and participating in the planning and development of our LMS’s.

Forming the Group

Creating the AppDev group was a major challenge for the year and will continue into next year. In December 2007 when the group was formed it had one existing employee, Tim Wright, and the Associate Director, Jeff Webster, started December 17th. In addition there were three empty positions, one of which was being advertised.

During the next six months the two empty EPA positions, which had not been advertised, were reclassified and advertised. Interviews were conducted for all three positions and one was filled. Drew Davidson joined us June 2nd as a new employee. In addition on June 30th Thomas Wilson joined the group, this was the last component in consolidating DELTA applications developers in the same group.

Development and Support of Existing Applications

Ongoing development and support of exiting applications was also a unique challenge for the year. The primary problem was a lack of departmental history, since most of the previous developers had left months before the group was formed. The group did an excellent job of keeping up with the critical needs for the existing applications. Major tasks for the year included: an initial inventory of applications, transition of applications and websites on OIT web servers from PHP4 to PHP5, the annual update of the IDEA Grants application and the beginning of development on the Syllabus Tool working with the Division of Undergraduate Academic Programs (DUAP).
Planning and Development of LMS’s

An ongoing major project area for AppDev will be our LMS activities. The largest of these will be data integration, but there will be an increasing level of development needed as the deployment of Moodle continues. In addition there is ongoing support for our legacy LMS WolfWare.

This year work continued on the planning and early development for the new PeopleSoft based student information system, SIS. This work will pick up as the last major portions of SIS go live in Spring 2009. For AppDev this involves updating our programs that pull student, course and other data from SIS that DELTA relies on for our LMS’s and other applications. We also have to update our grade submission routines used by Vista and WolfWare and other programs we have that provide data back to Registration and Records.

Work on the Moodle pilot project was mostly planning and design this year, primarily system and deployment design as well as governance. Three custom themes were designed and deployed to help with NCState branding.

Our legacy LMS WolfWare continued to run without major problems. DELTA contracts with OIT under SLA to provide server hosting, operating system installation and maintenance, tape backup and monitoring services for WolfWare. This year DELTA purchased two machines to update the existing servers that provide database, cron and email services for WolfWare.

**AppDev Staffing**

December 2007

Associate Director: Jeff Webster

Business & Technology Application Analyst: Tim Wright

Business & Technology Application Analyst: (vacant)

EPA Web Application Developer: (vacant)

June 2008

Associate Director: Jeff Webster

Business & Technology Application Specialist: Drew Davidson

Business & Technology Application Analyst: Tim Wright

Business & Technology Application Analyst: Thomas Wilson
Business & Technology Application Analyst: (vacant)

Business & Technology Application Analyst: (vacant)
Video Engineering

Rich Media Project

- Mediasite selected for current production Mar. 20, 2008
- Echo 360 selected for future scalable campus wide solution March 20, 2008
- All VCS facilities, with the exception of Withers, modified to accommodate the implementation of the Mediasite and Echo 360 capture stations.
- Mediasite and Echo 360 capture station installation completed June 11, 2008.
- Mediasite operational testing performed during summer 2008 in preparation for 2008 Fall semester roll out.

Facilities Projects

Withers Hall Room 125
  - Pre Bid Meeting December 12, 2007.
  - Vendor awarded contract January 24, 2008.
  - Equipment installation begun April 7, 2008.
  - System Tests completed July 24, 2008, facility operational.

MRC Room 313 Renovation and Control Room 314 Upgrade
  - Participated in architectural design of Room 313 renovation.
  - Designed new control room system.
  - Room installation begun July 28, 2008.
  - Installation completed August 20, 2008, facility operational.
Main Campus Master Control Room
- Ricks Hall Annex has been selected as Central Control location.
- Master control design to be determined as use in the Withers facility progresses.

Park Shops DE Classroom and Studio Room 130, 132
- Building construction is ongoing, occupancy scheduled for February 2009.

Camera and Pan/Tilt System Upgrades
- Twenty systems installed total.

Professional Development
- Attended Planning and Maintaining Windows 2003 Active Directory Infrastructure
- MCSE Certification Course October 30-November 20, 2007. (Joe)
- Attended InfoComm Communications Industry Trade Show in Las Vegas NV, June 17-21, 2008. (Joe)
- Attended Polycom SE200 Training May 13-16, 2008 (Joe, Tim)
- Attended Polycom RMX Training May 28-30, 2008 (Joe, Tim)

Video Communication Services Staff FY 2008
Operations Manager for Video Communication Services: Tony Pearson
Senior Producer/Production Manager for Video Communication Services: Larry Evans
Video Communications Services

Vision

Video Communication Services provides an appropriate array of facilities and services to help North Carolina State faculty incorporate video technology into their teaching, research, and extension activities. We produce and deliver distance education courses from NC State’s media-rich classrooms, and provide video production services and a broadcast infrastructure for university- and state-affiliated organizations.

Goals

1. To provide the infrastructure and expert knowledge needed to effectively use audio and video in support of DELTA and other campus/government programs.
2. To evaluate, recommend and support new techniques and technologies for improving training, education and information exchange

Operational Statistics

Video Communication Services (VCS) provided services each month to 38 departments through our comprehensive suite of services: consultations, video conferences and multimedia projects. This number reflects only the departments of clients with whom we had direct interaction each month, but doesn’t necessarily indicate the number of departments that take advantage of VCS-supported applications and services. Video Communication Services conducts an average of 250 one-to-one consultations per month either in person, on the phone or through email.

Upgrades/Modifications

- Daniels 331 and EBII 1230 were upgraded with new projectors and screens.
- Daniels 327, Winston 132, EBII 1230, Mann Hall 406, MRC 313, and the MRC Conference room received High Definition Video Conferencing Codecs capable of H.239 content sharing.
- A Polycom RMX 2000 (MCU) Multipoint Conferencing Unit was installed in Partners 1 providing support for a full range of video
resolutions (CIF, standard definition, and high definition) to protect prior and future infrastructure investments.

- A Polycom ReadiManager SE200 was installed in Partners 1 to complement the RMX 2000 and to simplify the management and scheduling of Video Communication Services enterprise video + voice conference systems providing integrated conference management, scheduling, and gatekeeper functionality.
- Two RSS 2000s were also installed providing on-demand recording, streaming, and archiving solution for multimedia conferences. Users can view web casts with windows media player or realplayer.
- The scheduling and conference administration areas were also upgraded with Polycom HDX 4000 Video Conferencing Systems. Enhancing our capabilities for the data sharing protocol H.239 and allowing the program coordinators to transmit, monitor and receive content.
- MRC 313 underwent a complete overhaul bringing the facility up to code and ADA compliance. Duel projections screens were added as well as new LCD displays, and instructor controls at the lectern.
- Withers 125 was completed in March 2008 as a pilot classroom for the new level one design of Distance Education Classrooms. Its design allows full control of all presentations and capture systems by the presenter or faculty. The design also anticipates future upgrades to tie into a central control room and contains a tracking camera with push to talk microphones.
- Upgrades to the production suites included the installation of an Apple’s XSAN to allow media created in the Final Cut suits to be shared on RAID storage volumes over a high-speed Fibre Channel network.
- Apple Mac Books were also provided to producers on staff allowing total flexibility to create and capture content in the field.

In 2008, Video Communication Services supported the university through the booking of 5,302 work orders totaling 8012 hours of services. 3963 of those hours were directly related to Distance Education courses produced in our DE classrooms. 906 hours were transmitted via H.323, including 608 hours transmitted for the Engineering 2+2 and BSE programs. Regular seminar series were also produced for Family and Consumer Science, Philosophy & Religion and NSF through the NC-REN network. Other conferences were also facilitated for UNC-GA, Entomology, and The College of Ag and Life Sciences.
Classroom Utilization by Room

<table>
<thead>
<tr>
<th>Room</th>
<th>Booked Hours</th>
<th>Actual Hours</th>
<th>Billed Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>Daniels 327</td>
<td>800</td>
<td>500</td>
<td>600</td>
</tr>
<tr>
<td>Daniels 331</td>
<td>700</td>
<td>400</td>
<td>500</td>
</tr>
<tr>
<td>EB II 1230</td>
<td>900</td>
<td>600</td>
<td>700</td>
</tr>
<tr>
<td>Mann Hall 406</td>
<td>500</td>
<td>300</td>
<td>400</td>
</tr>
<tr>
<td>MRC 313</td>
<td>400</td>
<td>200</td>
<td>300</td>
</tr>
<tr>
<td>Poe Hall 202</td>
<td>200</td>
<td>100</td>
<td>200</td>
</tr>
<tr>
<td>Winston 132</td>
<td>300</td>
<td>200</td>
<td>300</td>
</tr>
</tbody>
</table>
Video Communication Services provided the ability to transmit programs and courses to sites throughout the country through the latest IP video technology and networking capabilities with Ku and C-Band satellite uplinks and downlinks as well as fiber-based networks. To support teaching and learning through distance education technology, each month Video Communication Services facilitated 11.5 hours of video conferences from its two video conference facilities.
In addition to video conferencing 906 hours were facilitated via H.323 for interactive conferences and classroom sessions and an additional 541 hours used microwave transmission for interactive sessions over the NCREN Network.
**H.323 Transmission Services**

![Graph](image)

**NCREN Microwave Transmissions Utilization**

![Graph](image)
Through the use of our MCU and NC-REN’s MCU (Multi-Point Conferencing Units) we were able to offer 478 hours of multipoint videoconferencing and courses with sites throughout the state and nation.

**MCU Utilization**

Other NC State University departments and state agencies made use of VCS production services for educational programs, proposal supplements, research report enhancements, and public information initiatives. Video Communication Services continued to assist the University in its expanded use of video in Distance Learning via the Internet.

Video Communication Services utilized over 4416 hours assisting faculty in teaching and research activities by producing media segments and videos for the following clients:

- College of Education
- Computer Science
- Delta
- Distance Education Administrative Services
- Marine, Earth & Atmospheric Science
- Industrial Extension Service
- Engineering Online
**Major Accomplishments and Challenges**

- Withers 125 brought on line as a pilot modal for the next generation of distance education classrooms.
- Staff training on the RMX 2000 Polycom MCU
- Staff training on the SE200 Polycom gatekeeper and scheduling management system
- Staff training and certification on SMART Interactive white boards

**Highlights**

In addition to the daily operational activities, Video Communication Services also undertook many special projects and initiatives:

- DE VET School Video
- Energy Management Video
- ELI Focus Session

**Awards, Accomplishments, and New Hires**

1. Tony Pearson, manager for DELTA’s Video Communication Services, was named a 2008 University Awards for Excellence winner at the annual University Awards for Excellence Luncheon in May. Forty-seven nominees from across the University were honored; five were named winners. This award recognizes excellence in the areas of outstanding state government service, innovations, public service, safety and heroism, and human relations.

2. Tony Pearson, 15 years of service

3. Michael Whitman, 5 years of service

4. Shelia Martin, 5 years of service
5. Mark Wiest joined the Video Communications Services Staff in January 2007 as a Production Assistant III.

6. Shawn Colvin joined the Video Communications Services Staff in January 2007 as a Production Assistant III.

7. Former Pride of the Wolfpack award Winners
   - 2003 - Tony Pearson
   - 2004 - Larry Evans
   - 2006 - Sheila Martin

Comments from our users:

1. Hi Everyone,
   Great shoot yesterday! In each location, we were well received and generated positive buzz about Delta. Kudos to Jeff and his team for overcoming a variety of technical difficulties to keep the cameras rolling. We appreciate your dedication!

   Looking forward to viewing the results of everyone's hard work.

   Many thanks to you and your team!

   Cathi Phillips
   Instructional Designer
   DELTA Instructional Support Services
   NC State University

2. Dear Darren,
   We truly appreciate the excellence you demonstrated in assisting us with the Wednesday, 1 pm presentation of Global Seminar. Dr. Sutphin wanted me to thank you again for making the connection to Honduras so successful, and for helping him with the presentations he used. I look forward to working with you in the future.
   Thanks again.

3. I just want to praise the professionalism and courtesy of the DELTA team who helped set up a live-feed video-and-audio link between my PHI 312 summer session II course and the home of one of my students in McLean, North Carolina. Please take note of the efforts of Bob Klein, Kim Rothwell, and David Chapman. They were outstanding and true technical wizards. Plus, very patient with me.
Regards,
Barbara Levenbook
Associate Professor of Philosophy

4. You guys are awesome! Thanks for making us all look good!
   Tom

   Thomas K. Miller III, Ph.D.
   Professor of Electrical and Computer Engineering
   Vice Provost for Distance Education and Learning Technology Applications
   Director, Engineering Entrepreneurs Program
   North Carolina State University

5. Barbara Levenbook wrote: Bob, I would like to thank you and DELTA for a
   job very well done on PHI 312, second summer session. I and my students
   have benefitted greatly from your professionalism and courtesy, and the
   amazing wizardry that put Lindsay Lewchuk electronically into the
   classroom. I wish that all my courses were supported by such a competent
   and efficient team! Thank you also for the set of DVDs, which I obtained from
   Dave on Friday.

   Regards, Barbara Levenbook

6. Tony: It was a pleasant surprise last night tuning into the CRC Channel to
   view our courses and noting the new placard informing viewers of the course
   title and instructor's name. The information "runner" noting course title,
   instructor and NC State is an excellent feature also, perfect for viewers
   without digital guides.

   Thanks so much for making this happen so quickly!

   Melissa

7. Darren,

   Thank you for your excellent support for today's Global Seminar
videoconference and presentation.
It was very appreciated!

Kay Zimmerman
North Carolina State University
Distance Education & Learning Technology Applications (DELTA)
Associate Vice Provost for
Marketing & Partnership Development

**Rich Media Migration**

During the Spring/Summer of 2008 Video Communication Services deployed Rich Media capture stations into all VCS managed classrooms. This completely eliminated the use of hard media in the classrooms and expanded the process of archiving captured classes as digital assets. All VCS managed classrooms have been outfitted with capture systems from both ECHO 360 and Sonic Foundry.

**Distance Education Support**

Video Communication Services operated six broadcast quality Distance Education Classrooms on behalf of DELTA. These facilities are uniquely powerful tools for outreach on a wide variety of topics. The primary medium for outreach has become production and presentation of “live interactive courses or teleconferences”. The Distance Education Classroom continues to provide excellent value to DELTA. During the 07/08 fiscal year facility operations and personnel costs, other than, capital expenditures were completely funded by DELTA.

- Programming was produced with minimal program dollars.
- Our website for television and video services continues to be a comprehensive source of information regarding our television and related video services.
  - It provided up-to-date information on our facilities services and rates. It also provided other Departments and agencies with a greater understanding of the facilities and services available to them.
- We continued to explore, evaluate and implement new tools and technologies that allow information and educational programming to be delivered to students either individually, in groups of varying sizes,
interactively, and/or on an “as-needed” basis. Our mechanisms of delivery have expanded beyond videotape to include full motion MPEG, Rich Media, and other streaming media formats.

- On-location video recordings of lectures, panel discussions, training classes, and other informational programs were used in a variety of training and learning situations, including broadcasts to the Cooperating Raleigh Colleges cable channel.

Service

- Video Communication Services staff members are active in many UNC community committees and activities that support teaching and learning with technology. These include: NCREN Advisory Committee, NCREN Directors Group, NCREN Video Managers Group, and NCREN Program Coordinators Group.

- In addition to actively participating in the groups mentioned above, the Video Communication Services staff members are also key contributors in other campus collaborative initiatives. These include: The Rich Media Task Force Committee, Classroom Environment Committee, and NC Connectivity Council Committee.

- Video Communication Services operated seven broadcast quality Distance Education Classrooms. These facilities are uniquely powerful tools for outreach on a wide variety of topics. The primary medium for outreach has become production and presentation of “live interactive courses or teleconferences”.

- Production services for the year included field production and Producer/Director services for Distance Education Administrative Services, EOL and the School of Education.

Relationships

Relationships with university-related organizations included the following:

- Engineering Online – The Engineering Online Program at NC State University has been designed for working professionals. Credit courses in Engineering and Computer Science can be delivered directly to your home or workplace via the Internet. Special undergraduate programs are also offered in various locations throughout North Carolina.
- Distance Education – Distance Education is ideal for learners who seek flexibility of time and location. Whether you’re far from campus even overseas, or your schedule does not permit travel to campus, you can pursue a course of study at NC State.

- DELTA (IDEA) Grant - Innovation in Distributed Education Applications.
  Provided to promote innovation in the use of instructional technology in online distance teaching and learning, build expertise in this area, and enhance the technology-rich learning environment at North Carolina State University.

- ITRE/PTG - The Public Transportation Group (PTG) of the Institute for Transportation Research and Education is responsible for research, training, and technical assistance in the area of public transportation.

- ITRE – Highway Systems Group of the Institute for Transportation Research and Education.

Production Services

Distance Learning Productions
Distance Education classes can be recorded or broadcast live on NC-REN, H.323 or archived on the internet. The distance learning classrooms allow for presenting media including slides, overheads, computer generated graphics, and various media. Two-way interaction with other sites via the NC-REN network or H.323 provides "live" participation with other university sites across the state.

Videoconferencing
Videoconferencing is two-way video interaction with participants at remote sites. Participants can interact with other off-campus sites and view them on large display monitors. The receive site will see a close-up of each person speaking. Overheads, computer graphics, slides, and videotapes can be incorporated into the two-way communication. This service is used for research collaborations, tutorials, and research project planning sessions. We can connect to all of the UNC system universities sites state-wide via NC-REN or H.323 as well as any community college or state agency that are connected to the North Carolina Information Highway (NCIH).

Field Shooting and Production
Field shooting allows for videotaping in remote locations. Utilizing DVCPRO or mini DV recording formats, video can be shot in various remote locations and then edited...
together into a finished program. Special equipment is available for shooting computer screens with no "flicker". Scan converters are also used to record computer outputs in the field. All the necessary lighting and audio equipment is available to shoot high quality productions. A teleprompter can be made available for any field shoot. We use the smallest and lightest 3-CCD camcorder in the market to shoot in compact situations or multi camera productions utilizing our remote production unit. Our associates have a wealth of knowledge and experience.

**Editing**

Editing facilities provide a way to connect various video elements into a finished program or program segment. The editing process can include most digital effects, graphic inserts and multiple channel audio mixing. The flexibility of on-line quality non-linear editing allows changes to be made quickly and without the need to re-edit other program elements before or after the change.

**Producer/Director Planning Services**

Experienced Television Producer/Directors are available to assist and plan any kind of video production. They can assist in scriptwriting, instructional design, graphic design, and all other elements of television production. We specialize in "turn-key" production. Our associates have extensive broadcast experience in complex "live" productions as well as the direction of talent in scripted productions.

**Satellite Uplinking and Downlinking**

Satellite uplinking (transmitting) services for KU-Band and C-Band are available through an arrangement with Microspace. We also have satellite downlinking (receiving) capability for a wide variety of KU & C Band analog and digital programming.

**Summary**

2007-2008 was a productive year for Video Communication Services. As demand for Classroom services and field productions continued to increase, Video Communication Services continued to meet the shifting needs of instructors using technology in their courses. We are committed to furthering our mission and the mission of DELTA. By relying on one of our core values, collaboration, Video Communication Services will continue to leverage our knowledge, expertise and services with others in DELTA and across campus to provide high quality support for teaching and learning with technology to the NCSU community.
Video Communication Services Staff FY 2008

Operations Manager for Video Communication Services: Tony Pearson
Senior Producer/Production Manager for Video Communication Services: Larry Evans
Broadcast and Emerging Media Manager: Darren Ley
Broadcast and Emerging Media Specialist: Jeff Robinson
Broadcast and Emerging Media Specialist: Robert (Bob) Klein
Broadcast and Emerging Media Technician: Shawn Colvin**
Broadcast and Emerging Media Technician: Sheila Martin
Broadcast and Emerging Media Technician: Mark Wiest **
Broadcast and Emerging Media Technician: Michael Whitman
Broadcast and Emerging Media Technician: Leonard Brothers
Broadcast and Emerging Media Technician: Robert Faries

** = new hire during FY 2006
Marketing and Partnership Development

DELTA Marketing & Partnership Development (MPD) provides leadership and vision for NC State marketing and partnerships for distance education and learning technologies. The Office is responsible for developing and implementing strategic marketing initiatives, market research/environmental scans to assess interest in new DE programs, building and supporting collaborative initiatives among all colleges and units on campus, other University of North Carolina institutions, and with other key partners.

The MPD team has as its main responsibilities, the development and implementation of market research, establishing an attractive brand image of DELTA specifically focused on generating interest in DELTA, Learning Technologies and increasing DE enrollments, and managing external strategic DE partnerships. MPD is a unit within DELTA comprised of members from three teams (ISS, MPD, DE). The integration of this exceptional talent and group of resources is an efficient, effective and strategic team process that provides the opportunity to execute the highest quality marketing and partnership products to serve NCSU.

During the past twelve months, MPD has focused on a number of priorities as well as on maintaining the day-to-day services at a high standard. These priorities include:

- Develop and implement the strategic integration of DELTA staff members to comprise the high functioning MPD team – combining staff members from ISS, DE and ET. The MPD team redefined strategic integrated project management to execute marketing projects in a more productive and efficient workflow process.
- Research and define the DELTA brand and identity and implement the DELTA brand throughout the organization through a systematic, team based approach
- Evaluate and implement new marketing technology capabilities for cost savings
- Manage the GTC partnership with ECU to provide DE services to the Rocky Mount region
- Implement strategic environmental scans to assess the need for new DE programs
The key priorities of the unit were achieved and day-to-day functions were carried out according to plan. The budget for 2007-08 was met and balanced. MPD fulfilled its most important strategic goal – to develop, implement and strengthen the DELTA brand and reputation, while supporting the NCSU parent brand. The development and implementation of the DELTA brand, identity, and logo has been very successful this year. Within twelve months, all of the ‘old’ DELTA logos have been identified, removed and the new logos replaced on all DELTA materials in all units. This was accomplished through the execution of the DELTA brand implementation project plan and the support of the DELTA staff. The only (perceived) negative is that everyone was so supportive of the new DELTA brand project that the MPD team was overwhelmed with requests to change their marketing materials.

**Objectives**

- To build an integrated collaborative MPD team and implement strategic marketing approach for DELTA marketing and communications materials.
- Publicize and market DE academic programs through strategic online interactive marketing and partnership strategies.
- Build and maintain support for the GTC project, in collaboration with ECU. The GTC distance education partnership project specifically supports DELTA’s mission:
  - Education is the key to a prosperous future for North Carolina. DELTA promotes the quality of education by extending the reach of the faculty, collaboratively applying expertise in technology and pedagogy in an efficient, effective, and service-oriented environment.
- Coordinate and streamline internal and external marketing
- Implement strategic environmental scans to assess the need for new DE programs at the college level

**Key Tasks**

- Publicize and promote all the DE academic programs to both undergraduate and post-graduate students.
• Develop aggressive, timed marketing strategies (multi media and personal marketing campaign - print materials, interactive marketing, promotional material, etc.).

• Track marketing campaign results; establish new communications tactics through the use of appropriate technologies.

• Develop and implement strategic partnership plans for GTC, UNC Online and military education.

• Coordinate and manage environmental scans, partnering with CUACS and implementing market research through the Facilitate tool, to evaluate the opportunity, realistic assessment of new DE programs to meet enrollment projections.

Distance Education Integrated Interactive Marketing Initiatives
2007-2008

Goals

• Acquisition campaign: Drive traffic to the landing page and encourage visitors to download the DE brochure in PDF format to prospect and recruit new DE students.

Strategy

• Continue to build on awareness that has begun with previous advertising and marketing, while maximizing the use of the media budget to encourage DE enrollment.

Target Audience

• Adults 25-54
• Geography
  North Carolina
  SE US (Atlanta, DE, Maryland)
**Websites Utilized**

- Yahoo
- Google

**Distance Education Marketing Campaign Results**


Online interactive; recruit and direct to DE to request DE print brochures

- Interactive Banner Campaign = 3.6% conversion rate
- Keyword Search Campaign = 7.6% conversion rate

*Change in strategy* due to a staff member leaving for another position. There was no one to mail out the DE brochures and track the correspondence.

*Response to problem* not having a staff member to mail out DE brochures:

Developed a PDF version of the DE brochure, attached it to the campaign interactive ads landing page.

**Revised Campaign to Include PDF Download – Results**

New strategy implemented for interested students to download the PDF of the DE brochure, instead of requesting a hard copy mailed

- Jan. 2, 2008-Jan. 20, 2008  1,234 PDF downloads
- Jan. 2, 2008-Jan. 20, 2008  1,179 keyword searches
Facebook Online Marketing Results

Facebook campaign: New student audience and new online marketing, new creative rotated three-five different creative iterations and measured most effective response rate between April 1 and June 30, 2008

Total clicks 4,474

Overall Marketing Campaign Results

<table>
<thead>
<tr>
<th>Traditional print DE brochure / USPO mail response rate:</th>
<th>Change to PDF download model:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Clicks: 2,393</td>
<td>Total clicks: 2,413</td>
</tr>
<tr>
<td>Total conversions: 108</td>
<td>Total conversions: 620</td>
</tr>
<tr>
<td>Conversion rate: 4.5%</td>
<td>Conversion rate: 25.7%</td>
</tr>
</tbody>
</table>

*NOTE: the conversion rate increased almost 6X*

Continued success for the last campaign - May 12, 2008-June 22, 2008

Total clicks: 2,323

Total conversions: 539

Conversion rate: 23.2%

The PDF download process, for the DE brochure, eliminated the cost of printing, production, USPO postage, time delay spent on USPO mail.

The cost of traditional printing for 8,000 DE brochures is .88 per piece that totals $7,040. It also costs $1.00 per piece to mail a hard copy brochure. The PDF conversion project cost savings were an average of $1.88 per print unit.

UNC Online partnership marketing initiative included co-branding online interactive marketing in four geographic regions: NC, Atlanta, Washington DC, Maryland in print and online format in: Business Week, Wall Street Journal, Atlanta Journal
Constitution, Barrons, marketwatch, Washington Post. The campaign results reflected a reasonable response rate for the co-branding initiative and a lift for the NCSU DE brand.

UNC Online and NCSU DE Co-Branding Online Marketing Partnership Results

**Interactive ads:**

UNC Online referred 214 people to the NCSU DE website and 194 people downloaded the DE brochure PDF

**New Creative Strategy:**

In 2007-2008 the MPD team established a new strategy in the creative design for DE ads. The MPD team implemented photo shoots for ‘real’ DE students in their own environments. The photo shoots were very successful and there have been many positive responses to the new creative. New DE student photos included the colleges of management, education, engineering, CALS, on-campus students taking DE courses.

---

**Marketing Results for the College of Education – NC TEACH program**

New creative of DE students from each specific co-hort region yielded good results:

<table>
<thead>
<tr>
<th>NC TEACH Marketing Efforts by Cohort Area</th>
<th>Percentage Responding that they saw print marketing materials only</th>
<th>Percentage Responding that they saw both print materials and &quot;other&quot; form of marketing</th>
<th>Percentage Responding that they only had &quot;other&quot; form of marketing</th>
</tr>
</thead>
<tbody>
<tr>
<td>Summer '08 and Spring '09 (of those interviewed)</td>
<td>cohort area</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Summer '08 Results</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cohort</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Wake n=118</td>
<td>18%</td>
<td>32%</td>
<td>50%</td>
</tr>
</tbody>
</table>
DELTA Annual Report 2007-2008

<table>
<thead>
<tr>
<th>Cohort</th>
<th>Percentage Responding that they saw print marketing materials only</th>
<th>Percentage Responding that they saw both print materials and &quot;other&quot; form of marketing</th>
<th>Percentage Responding that they only had &quot;other&quot; form of marketing</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wake n=52</td>
<td>14%</td>
<td>15%</td>
<td>72%</td>
</tr>
<tr>
<td>Rocky Mount n=7</td>
<td>62%</td>
<td>33%</td>
<td>5%</td>
</tr>
<tr>
<td>Fayetteville</td>
<td>n/a</td>
<td>n/a</td>
<td>n/a</td>
</tr>
<tr>
<td>Sanford</td>
<td>n/a</td>
<td>n/a</td>
<td>n/a</td>
</tr>
</tbody>
</table>

DELTA Tagline Initiative - *Learning Without Limits*

In our thrust to reposition and rebrand DELTA, we have conducted research to evaluate the brand strengths and develop a new tagline. A memorable tagline can be used to articulate the DELTA vision and mission convey essential qualities of the DELTA brand character, emphasize a compelling benefit to the University, and align the DELTA brand message with an intended target market. The tagline will be used in conjunction with a new marketing, communication plan for the tagline to extend the DELTA brand message, enhance its perceived value and relevance, and help DELTA forge a stronger connection with the internal and external partners. The strength of "Learning Without Limits" is its ability to say multiple things to multiple audiences; it implies that whatever limitation one might be facing -- educational, technological, creative, funding -- DELTA is there to help!

Service! Service! Service!

DELTA Tagline Project Phases completed

Phase 1 - Brand research and analysis for DELTA, especially as it relates to the themes of a new tagline that unifies the different functions and divisions of the
organization.

Phase 2 - Development of comprehensive new DELTA Tagline (primarily for use with internal audiences: DELTA team members, NCSU faculty, students, administrators). Inclusion of tagline in Standard & Usage Guide.

Phase 3 - Development of Tagline applications/collateral for each of the 5 DELTA sub-units

Phase 4 – Development of DELTA tagline implementation plan

**MPD Projects 2007-2008**

1. 2007 & 2008 Summer Institute Materials
2. DE Banner Up
3. DE Billboards
4. DE Flash Acquisition Campaigns/Landing Page
5. DE Fliers
6. DE MBA @ RTP Photos
7. DE Posters for DE Office
8. DE Rack Card
9. DELTA Branding
10. DELTA Business Cards
11. DELTA Holiday Card
12. DELTA Web Banner Update
13. Holliday Hall Shelf
14. I Go To State Posters
15. IDEA Grants Banner Up and Rack Cards
16. ITAP Banner Up
17. Learn Tech Business Cards
18. NC State Alumni Ads
19. NC TEACH Posters, Fliers, Bookmarks
20. New Faculty Orientation Brochure
21. SLOAN Poster for Donna
22. VCS DVD Jacket
23. Workshop Brochures
24. VII Lobby Design
25. DELTA Info Piece
26. DE and DELTA Nameplates
27. Tom Miller’s USDLA Award Display for Holliday Hall
28. DELTA Retreat Materials
29. Greater Charlotte BizED Magazine Ad
30. DE Website Redesign Research
31. DELTA Tagline Research
32. Alumni ads in the Fall, Spring, Summer magazines
33. Environmental scans to assess need for new DE programs for the College of Natural Resources-PRTM, CALS – Animal Science
34. Military Appreciation Day partnership event included a tailgate, video introduction on the jumbotron from NCSU student in Iraq, 49 people attended the event
35. Search committee representation – McKimmon AVC position
36. External partnerships included NCDLA, USDLA
37. Conference planning committee representation: UNC GA TLT, NCDLA, USDLA, DE Forum
2007-2008 MPD Key Initiatives Developed by the New Integrated MPD Team (ISS, MPD, DE)

1. Marketing campaigns-
   a. DELTA programs on campus (IDEA grants, workshops, etc)
   b. GTC in newspaper, radio, billboards
   c. Posters in DE offices
   d. DE campaigns
   e. Greensboro N&R “firefighter” piece
   f. Outdoor advertising creative
   g. Interactive creative
   h. Print creative for five colleges DE materials
   i. Developed Package A for individual DE courses marketing support

2. Participated in-
   a. Education fairs for the military, corporate, government
   b. Gertrude Cox awards
   c. Awards for Excellence
   d. UNC Tomorrow study
   e. New Student/New Faculty Orientation

3. DELTA branding-
   a. ISS Unit briefs
   b. DELTA tagline
   c. Brand DELTA across units

4. Communicated DELTA’s Services-
   a. DELTA Info Piece
   b. Unit reports (end of year)
   c. Workshop brochures

5. Learn & Earn- 2 courses

6. GTC marketing and partnership support
   a. Summer camps
   b. Community Outreach
   c. NC TEACH
   d. COE and K12 partnerships
   e. Poverty Project

7. Kick-off of DE website redesign

8. Co-branding projects with ECU, UNC Online

The Key Initiatives, listed above, were developed and implemented by the new
team and revision of integrated roles and responsibilities:

1. Technical implementation of the work flow process
2. Communicating to the SMT about priorities confusion
3. Making suggestions/consulting on diversity issues
4. Military presence on websites/promotional materials
5. Identifying larger/global contexts
6. Provide creative support, such as NC TEACH
7. Providing pertinent survey data
8. Promote DELTA & DE
9. Print Design
10. Graphic Design
11. Animation
12. Interactive
13. Video
14. Info Design
15. Production of Design Materials
16. Manage Vendors
17. Identify ways to communicate with the University about DELTA
18. Market courses (Package A)
19. Equipment Purchases
20. Vision & Strategy
21. Advertise and target specific audiences
22. Research & Development
23. Project Management
24. Training for MM Team
25. Art Direction
26. Systems Administration
27. PT Staff Recruiting
28. Creative Direction
29. Client Management
30. Design/Maintain websites
31. DELTA and DE Brand Police, implement brand standards
32. Create DELTA and DE branded materials

Issues to consider for 2008-2009:
• Continued development and integration of the MPD to establish roles, responsibilities, processes and procedures.
• Continued management of all MPD projects on the Basecaamp project management system that provides up-to-date project status reports.
• Effectively identify and share resources with ISS and DE to create efficient personnel and materials resource distribution.
• Develop two strategic DE program marketing partnerships, EOL and LPS, that include the full MPD integrated team, establish measurable benchmarks and goals the focus on a three year implementation timeline.
• Establish a measurable capability to identify and track the marketing campaign results that directly relate to student enrollment and coordinate the project with DE to identify enrollment trends.
• Establish a more integrated partnership approach with the GTC project that includes comprehensive marketing support.
• Develop and implement a marketing project management system partnership plan guide to share with partners.

ECU/NCSU Academic Programs at the Gateway Technology Center

Submitted by Marilynn Barner Anselmi, ECU/NCSU Director of Rocky Mount Region Academic Programs

Overview

The ECU/NCSU Academic Programs at the Gateway Technology Center have seen a precipitous rise in the number of individuals who have become involved in the initiative as well as the number of university-sponsored programs during the time period spanning July 1, 2007-June 30, 2008. During this year, 4,890 individuals have come to the GTC directly for presentations, programs or meetings or have attended off-campus presentations featuring the ECU/NCSU Collaborative (see appendix Ia, Ib). These interactions have included activities such as academic open house sessions for various university departments, video-conferenced advising sessions for potential students, enrichment camps for area youth, face-to-face (f2f) curricular course offerings, and presentations for various civic and professional associations (see appendix Ia, Ib). In addition, we have responded to a total of 450
email inquiries generated from the GTC Web site. This tool allows us to personally answer email requests for program and university specific information. In general, the 2007/08 year has been replete with efforts to fulfill the Senate Bill 1239 mandate to, “Bring higher education opportunities to the greater Rocky Mount area.”

While no one report can adequately capture the totality of a year’s efforts, this synopsis will focus on the three major areas of emphasis outlined in the “Academic Programs at the Gateway Technology Center, Goals for 2007-2008” report. These initiatives will focus on the interactions with the GTC community college partners, business and industry, and the public schools. First; however, this report will identify and enumerate the different university developmental efforts we’ve been involved with from different curricular programs.

ECU Recruitment and Directing Efforts for Distance Education Programs

The ECU initiatives for the ECU/NCSU Academic Programs at the GTC have been primarily focused on recruiting and directing potential students to the many online bachelor degree completion and graduate programs ECU offers. These marketing efforts have been integral components of the meetings and presentations we’ve made to the various groups listed above. Every individual was provided with the ECU/NCSU GTC brochure which lists the DE programs both universities have available along with the GTC Web site information. In addition to this general marketing campaign, we have also supplied specific information and services in support of the ECU programs. These efforts have included face-to-face student general student support advising sessions; test proctoring for ECU DE students; and video-conferences between prospective students and specific program advisors at ECU.

Student Support Advising Sessions

We have held 29 f2f student support advising sessions with twenty-three potential ECU students. The majority of these sessions involved potential students from our LEA contacts (particularly interested in ECU’s online Master in Education programs) and the online MBA. Typically, I provide these individuals with specific program brochures, and we examine the program-specific Web site. I provide them with contact information, and we peruse the ECU Options site for further information such as application, admissions and financial aid. I’ve also conducted telephone advising sessions with over 25 prospective ECU students, and I follow these discussions up with personal emails containing the relevant Web site links.
Test Proctoring Services

One of the many services we provide at the GTC is test and exam proctoring for DE students. This academic year, we have proctored fourteen tests for ECU DE students. Typically, the professor or instructor contacts us via email, and we set up the actual testing date and time with the student. We then fax and/or mail the completed exam to the instructor per his/her instructions. We have seen a steady rise in the number of proctoring requests since we began to offer this service, and we anticipate a continued increase in this demand.

Video-Conferenced Advising Sessions

Due to the high speed connectivity available here at the GTC, our ability to provide television quality video-conferencing between us and our university partners is quite remarkable and unique for this geographic area. We have instigated video-conferenced advising sessions between potential students in this area and program coordinators and advisors from ECU on numerous occasions. These conferences have included group presentations for Nash/Rocky Mount Health and IT Academies and representatives from ECU’s IT and Health programs; child-care providers from the Down East Partnership for Children and ECU’s B-K program; three different business/industry groups and ECU’s College of Business; area superintendents and ECU’s College of Education; and several individual prospective students and ECU’s MBA program. These meetings allow potential students the opportunity to put a name and face to the sometimes impersonal world of DE instruction.

GTC Website Responses

During the 2007-08 Academic year, we responded to 235 email responses (see appendix II) for information on ECU and NCSU online programs. We personally responded to each of these requests with a web link to the specified program area, the DE homepage for each university, and general information about the services students within the geographic service area could utilize here at the GTC. We also copy the email response to the appropriate university program advisor so they may initiate contact with these interested potential students. This contact information is being tracked and collected so that we can provide follow-up contact information for these potential students regarding registration dates, etc. (See also appendix V for Google Analytics on GTC website usage).

NCSU College of Engineering

One of the most critical initiatives we have been involved with since the outset of the ECU/NCSU Programs at the GTC has been to assess the need for and promote the undergraduate and graduate programs offered by the NCSU College of Engineering. As the interest surveys and the degree of response for the online graduate programs from the COE have been low, the possibility of “growing our own” bachelor level
engineers has been very encouraging, thanks in part to the many efforts between the GTC and the COE. Beginning with the Summer, 2006 f2f offering of E101 (Introduction to Engineering) at the GTC, we have worked extensively with Drs. Linda Krute and Bill Fortney to establish the groundwork for a far reaching 2+2 pre-engineering program with the community colleges of Edgecombe, Halifax, Nash and (to a lesser degree) Wilson. This 2+2 community college partnership required a full round of presentations for all participating community college presidents and/or vice presidents along with three organizational meetings at the GTC with community college appointed engineering liaisons. These individuals have been identified by each community college as the pre-engineering advisor for their respective campuses. I have stayed in regular contact with the CC advisors to let them know of any NCSU COE developments as well as alerting Dr. Krute to any of their concerns and/or questions. Currently the four community colleges have identified almost 30 students who are pursuing the career pathway of the pre-engineering track. Depending on their academic standing, NCSU COE may begin offering the first of their sophomore level engineering courses at the GTC as early as Spring, 09. Nash Community College has taken the lead in this initiative, and they currently have more than 20 students identified in the pre-engineering track. We provided large banners (see appendix IV) for all our community college 2+2 pre-engineering partners at the March 3, 2008 pre-engineering information session attended by community and private college and public school representatives. Marketing efforts from the GTC for this initiative have included radio spots, newspaper ads (see appendix III), an informational open house, presentations for five county school system administrators, and individualized posters for each community college which were placed in each corresponding high school (18 in total). Presentations were also made for community college and high school counselors in order to apprise them of the 2+2 pre-engineering option along with setting up information booths at two high school college days and for the Honeywell college presentations. On the community front, we presented the COE undergraduate and graduate information at sessions for many groups including the Human Resources Association, three Chambers of Commerce groups, Rocky Mount Industrial Association, Rocky Mount Builders Assoc., both Edgecombe and Nash Early College representatives, 3 Lion’s Club groups, and RM Young Professionals Assoc.. I also served as a panelist for the “State of the Community” Forum—highlighting the 2+2 program.

Much time was also spent in the development and continuation of the very successful Engineering Summer Camp for Middle Grade students which first took place at the GTC during the week of July 9, 2007. Planning for this camp was extensive and included recruitment and screening of six local teachers for lead camp instructor positions; solicitation of camp scholarship support (more than $4,000 was raised from 11 individuals and business and industries); marketing of the camp to area middle schools (posters, flyers and newspaper ads); collection of all initial camp applications and participation in the camp selection process; arranging camp field trips to two industries (Honeywell and Hospira); lining up 10 guest engineers
to come and interact with the students; and coordinating with Dr. Bill Fortney on all
other planning aspects for the camp. Plans are now being finalized for the second
year of Engineering Camp which will be held the week of July 7th. We received 86
applications for the 50 camp slots—furthermore, the Rocky Mount Camp received a
recurring legislative bill of $20,000 to support this initiative. This funding allowed
camp registration to drop from $240/week to $50/week. Additionally, we received
$2,000 is private camp donations. Support from the ECU/NCSU Academic Programs
at the GTC included coordination of local ad campaigns, distribution of camp flyers,
collection and screening of applications, coordination of lunch and facility usage,
coordination of local engineering and industry volunteers, and general program
support.

NCSU College of Engineering also offered ISE 589, Lean Manufacturing, via video
conference through the GTC during Fall, 07.

NCSU College of Education

Master in School Administration

In early November, 2006, Dr. Richard Haley, Director of Distance Education from the
Educational Leadership and Policy Department of the NCSU College of Education,
contacted us about the possibility of beginning a f2f cohort for the Master’s in School
Administration at the GTC. Shortly thereafter, we conducted a tour/demonstration
for superintendents from seven local public school systems. During this meeting,
we conducted an informal interest and needs survey for the MSA. All
superintendents indicated a high need for this program (the superintendents
projected a total of 53 administrative vacancies within the next three years), and we
shared this information with Dr. Haley. We had several other f2f and telephone
conversations concerning this program, and early in 2007, Dr. Haley informed us of
the formation of this f2f MSA cohort to begin Fall, 2007 at the GTC. I visited every
school system in the service area (Edgecombe, Nash/Rocky Mount, Wilson, Halifax,
Roanoke Rapids, Weldon City and Northampton) and conducted presentations at
principals’ meetings to inform all LEA administrators of this opportunity and
distribute Dr. Haley’s brochure for the MSA. I also provided Dr. Haley with contact
information within each LEA, and set up and marketed an informational session for
the MSA. On March 1st, 87 prospective students attended the open house. We have
made all the necessary arrangements for this cohort to meet beginning Fall, 2007
including room and space allocation at the GTC. This will be the first time the NCSU
MSA has been offered in the general Rocky Mount area, and this program directly
answers a looming need for master degree prepared school administrators. This
cohort program has run successfully throughout the 2007/08 academic year. The
cohort took two courses both fall and spring semesters which met either f2f or in a
blended method. Currently, 22 students are enrolled in this program. Dr. Haley has indicated his interest in replicating this cohort offering beginning Fall, 2009.

**NC TEACH**

Dr. Grant Holley and I met in late Fall, 2006 to discuss the possibility of NCSU extending their very successful NC TEACH model to be offered through the GTC. We held a total of four f2f organizational meetings as well as several telephone conversations to begin planning this important expansion. After the NCSU College of Education determined that they would bring this lateral entry f2f opportunity to this region, I continued to work extensively on behalf of NC TEACH to infiltrate this new market area. The first cohort of 13 students graduated in May, 08. All of these NC TEACHers are now employed in one of five local school systems.

I coordinated an extensive marketing campaign in support of the second cohort of NC TEACH (see appendix III). This campaign included ads in four newspapers, posters distributed to all local school systems, public libraries, employment security offices, and radio ads on four local stations. In addition, we conducted information sessions for Nash Rocky Mount, Rocky Mount Preparatory School and Wilson County Schools for lateral entry teachers.

The results from this campaign are as follows: Of the 8 students enrolled in the Rocky Mount cohort of NC TEACH, they learned of this opportunity through the following methods:

- Info sessions—2
- Newspaper ads—4
- Radio ads—1
- NC TEACH posters—1

17 individuals contacted me directly about NC TEACH. These potential NC TEACH candidates learned of the program the following ways:

- Newspaper ads-9
- Radio ads-5
- Info sessions-3

The second cohort of RM NC TEACH includes 7 math/science students and one Social Studies student. According to Ms. Norma Quinones, Coordinator for NCSU Alternative Licensure, another Social Studies student will join this cohort in Fall, 08.

This program promises to help alleviate the severe teacher recruitment and retention problems the LEAs in the five county region have experienced. The results below are provided by the 2005-2006 Education First NC School Report Cards (NC Department of Public Instruction):

<table>
<thead>
<tr>
<th>School System</th>
<th>% of non-licensed teachers</th>
<th>Teacher turnover rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Edgecombe County</td>
<td>19%</td>
<td>29%</td>
</tr>
<tr>
<td>Halifax County</td>
<td>34%</td>
<td>21%</td>
</tr>
</tbody>
</table>
**NCSU ESL**

I met with Ms. Toby Brody, NCSU Director of ESL, and provided program information to all local LEAs on the online ESL program. As part of the program support for Ms. Brody’s ESL programs, we offered two one day ESL workshops for local school system employees in April. 27 teachers/employees registered for the events, and post workshop comments were very positive. Ms. Brody has indicated she has received several requests about the NCSU ESL Online Certification Program based on these workshops.

**NCSU LPS**

Dr. Richard Kearney, Program Coordinator, Leadership in the Public Sector, came up to the GTC in early 2008 to discuss the LPS program and look into ways we have successfully marketed the 2+2 pre-engineering program. LPS and DELTA provided us with a box of program posters which we distributed throughout the four county region to community colleges, county and city offices, police and fire departments, and public libraries. We refer all prospective students to Dr. Kearney or Dr. Ozturk.

**ECU School of Social Work**

One of the first curricular department meetings that either university initiated with us at the GTC was made by Dr. Martha Early, off-campus Program Coordinator for ECU’s School of Social Work. Dr. Early was very interested in offering the Master in Social Work in a face to face cohort model through the GTC. We met first in April, 06 and discussed logistics for making this possible. The ECU School of Social Work regularly schedules off-campus sites for the MSW, and Dr. Early has been a strong supporter of using the GTC as a hub since this first meeting. We held further administrative meetings regarding this f2f cohort in July and August, 07. On October 1st 54 potential students attended an info session here at the GTC. The new MSW cohort of 24 students began classes in May, 08 and will meet every Saturday for three years at the GTC. We maintain close contact with Dr. Early and the instructors in this program to assure they have all the equipment and correct room availability. This coordination includes working closely with the NC Wesleyan College maintenance and security offices.
We are continuing conversations with Dr. Sheila Bunch, interim dean of the Social Work Program, for the implementation of an onsite, f2f BSW program here at the GTC. Tentative plans include a Summer, 09 start date for this program (the first of its kind from ECU). On April 28th, Halifax Community College Social Work Department Chair, Paige Cutchin, brought 12 students who are interested in pursuing the BSW for a focused informational session. I provided materials supplied by Dr. Bunch to these students.

Extension Programs

**NCSU College of Management Math Enrichment Camp**

We have now offered the COM Math Enrichment Camps at the GTC for three consecutive summers. The first camp (based on the COM on-campus FAME-US program) was delivered in June, 2006 for 24 Nash/Rocky Mount 3rd-5th graders. This innovative program used the COM FAME-US curriculum under the directorship of Ms. Paige Edgerton and employed three lead instructors from ECU’s College of Education Wachovia Partnership East program. The second year, we expanded the camp offerings and included groups from Nash/Rocky Mount and Edgecombe County Schools. 45 children attended this hands-on enrichment program during the week of June 18th. This year’s camp was held the week of June 16th and included students from Rocky Mount Preparatory School and Edgecombe County Schools. According to 2005 data from the National Assessment of Educational Progress (NAEP), only 40% of North Carolina fourth graders scored at the “proficiency” level in math. With these scores in mind, it is essential to convince students at an early age that they can master basic math skills. Math camp instructor and ECU WPE student Lindy Holden added, “This summer camp provides opportunity for students to challenge their math expertise through games that are fun yet require critical thinking.” Feed-back from students, parents and school system administration indicates a high level of need for and satisfaction with the camp. NC Senator A.B. Swindell was so impressed with the camp that he has introduced legislation that would provide additional, recurring funding for this type of educational enrichment programming.

**SPACE Program**

The NCSU Office of African American Affairs has offered the Saturday Program for Academic and Cultural Education (SPACE) to middle grade students in Wake County for several years. Thanks to collaboration between SPACE program director, Dr. Keith Powell, and the DELTA and GTC staff, this highly successful enrichment program will be offered to Rocky Mount students beginning Fall, 08. We are now in the planning stages and have procured the program instructors. We have met with representatives from the local Community in Schools, Boys and Girls Clubs, and local school systems to apprise them of this opportunity. We’ve placed ads in the local
newspaper and have already received 20 requests for registration materials. This program will accommodate up to 50 6th-8th graders, and will meet 14 Saturdays during fall and spring semesters. We have also been directly responsible for soliciting student volunteers to serve as mentors for the students.

**NCSU Forestry Extension Program**

The NCSU Forestry Extension Service now holds its professional development workshops via video-conferencing at the GTC. We’ve hosted all the bi-monthly video-conferences for this group (see addendix lb), and the GTC site now has the highest enrollment numbers for any of the workshop sites in the state.

**NCSU Small Business Technology Development Center**

The GTC has been the site for three professional development seminars from the NCSU SBTDC including workshops for Customer Service Training, AAU Coaches Meeting, and Small Business Development.

**NCSU McKimmon and Agricultural Extension Programs**

In efforts to expand our program offerings to include more university extension opportunities, we have become more involved with making McKimmon Center staff aware of the GTC and possible areas of collaboration. NCSU’s Industrial Extension Services opened a field office at the GTC for its northeastern NC field agent, David Yates, early in 2008.

We continue to meet with several NCSU and NCA&T Agricultural Extension agents and they have made frequent and creative use of the GTC. We are working directly with many agents on particular agricultural extension projects including the following offerings during the 2007/08 fiscal year: planning sessions; computer boot camp for farmers; cattle breeders’ webinar; master gardener video conferences; and NCSU Horticulture Science courses.

The GTC is also the site of the NCSU Institute of Reading Development summer courses for children and adults. This program currently offers 8 different levels of reading instruction at the GTC. The courses run from 6/9/08-7/9/08.

**Partnership Efforts**

In projecting the goals for 2007-2008, I identified three crucial partnerships crucial for the long-term progress of the GTC Academic Programs. These key partnerships include the community colleges, businesses and industries, and public schools.

**Community Colleges**

The 2+2 pre-engineering program we have developed with Edgecombe, Halifax, Nash and Wilson Technical Community Colleges has taken a great deal of time and resources with varying levels of success. It appears that Edgecombe and Nash Community Colleges have taken the lead in this collaboration. They have actively begun recruiting students into the pre-engineering track as is apparent in their
regularly published college catalogues and propaganda. NCC graduated two students from their pre-engineering program whom have been accepted into the NCSU College of Engineering. Our ad campaign has featured these two local young men (appendix IVb). NCC and ECC have attended every workshop and meeting we have conducted with the NCSU College of Engineering, and they sent representatives to the recent COE GTC open house. Community college enrollments in this program show that NCC is taking the lead with almost 20 students identified as pursing the pre-engineering program. ECC is second with five, while HCC and WTCC claim to have one student per college on the pre-engineering pathway.

We have met the goal of providing a GTC tour and demonstration for all community college advisors. We have also provided students within each community college with opportunities to conduct virtual advising sessions with the appropriate advisors on ECU and NCSUs’ campus. In addition, we have distributed the new GTC brochures to all our community college partners. These new brochures list all the major online program offerings, as well as highlighting the other important initiatives we have established at the GTC.

Business and Industry
We’ve worked extensively with area business and industry leaders to provide information regarding the various programs and courses both universities have available. We conducted a total 19 different GTC tours, demonstrations and/or presentation specifically for the business/industry population during the 2007-08 academic year. We feel the increase in non-credit, extension program offerings at the GTC will only enhance this exposure. When the NCSU IES office was established, I accompanied Lynn Reese in meeting with the community college presidents at NCC and ECC.

Public Schools
The groups that have frequented and used the GTC most often during this year have been our public school partners. As should be evident in this report, we have worked extensively to alert our LEAs to the various program opportunities we have provided at the GTC (NC TEACH, MSA, pre-engineering, enrichment camps, etc.). We have also encouraged our public school partners to make complete and frequent use of our technology. They have responded by using the GTC for some very innovative and wonderful purposes. These include participating in virtual field trips on the NC coast via video-conferencing; virtual advising sessions with different academies within the schools (i.e. IT Academy, Health Care Academy); professional development staff workshops using video-conferencing capabilities; GTC flex space for many face to face workshops; site for Rocky Mount High School Quiz Bowl competition; a computational chemistry course from the NC School of Science and Math; computer workshops for online instruction; and virtual job interviews for
prospective, out of state teachers. According to the data collected in the Service Activities to NC School Districts Activity Report, supervised by NCSU’s Dr. Lisa Grable, Director, Office of School Services, the GTC has provided $49,000 worth of in-kind services to local public schools during the 2007/08 fiscal year. The North Carolina Department of Public Instruction has also used the GTC for the following presentations/workshops:

School Nutrition of NC; NC Council of Community Programs; and Military Child Education Coalition.

**Conference Presentations**
I delivered presentations at the 2008 TLT conference and at this year’s NCDLA conference.

**Community Engagement**
We have included community non-profit engagement in our recruiting efforts here at the GTC. These efforts have included providing meeting space for various non-profit groups with direct links to higher education including: The College Foundation of NC; Turning Point Workforce Development; Down-East Partnership for Children; Community Mental Health Association; The Culture of Learning Alliance; The Young Professionals Group; The Boys and Girls Clubs of Rocky Mount; and the local librarians’ association. We always capitalize on marketing the various academic programs available from both universities whenever a non-profit group uses any of our facilities.

**GTC Survey Results**
Thirteen participants have returned the GTC ECU/NCSU Academic Partners Survey. All 13 have given the highest rating possible in the categories of: 1) Technology, 2) ECU/NCSU GTC staff cooperation, 3) Gateway Technology Center facility, 4) Facility location. Written comments include the following:

“Great space, the staff are the true treasure of the space. We appreciate their strong community connection.”

“You (Marilynn) and Sara were both very helpful, making this a very pleasant experience for us.”

“Excellent! So helpful and accommodating.”

“The facility was wonderful, and the staff was even better!”
“Gateway Technology Center is a beautiful facility that is a valuable resource for the community.”

“The staff was absolutely wonderful! Everything is first-rate!”

“It never ceases to amaze me when thinking of the plethora of opportunities this facility provides the community. Its doors are always open to students of all ages.”

**Conclusion**

2007-08 has proved to be even more challenging than its predecessors at the ECU/NCSU Academic Programs at the Gateway Technology Center. We have enjoyed tremendous community support and appreciation from the GTC, Inc Board Members to our many university constituents, to our business/industry partners and our counterparts within the community and private colleges and public schools. We have received considerable political attention ranging from an impromptu visit from Lieutenant Governor Beverly Perdue all the way to the ever evolving work of the UNC GA Upper Coastal Plains Learning Council. As we continue to grow and develop, I believe the GTC is morphing into what Dr. Tom Miller described in a recent meeting with UNC GA officials as an, “educational beacon”. As Eastern North Carolina continues to struggle with its many geographic, economic and social challenges, this type of beacon is exactly what this area needs to help shine a new path toward a more secure future.