

2007-08

F A C U L T Y

Development Programs



NORTHERN KENTUCKY UNIVERSITY

INTRODUCTION3
Mark Bardgett — Project Grant Department of Psychology4
Robin M. Bartlett — Sabbatical Leave Department of Psychology4
Diana Belland — Project Grant Department of Music
Liza Abram Benham — Summer Fellowship Department of Political Science and Criminal Justice6
Tom Cate — Sabbatical Leave Department of Economics and Finance
Lane W. Clarke — Summer Fellowship Department of Teacher Education and School Leadership
Paul D. Cooper — Sabbatical Leave Department of Construction Management8
Mary Carmen Cupito — Sabbatical Leave Communication Department
Ann M. Dollins — Summer Fellowship School of Nursing and Health Professions9
Maureen Doyle — Project Grant Department of Computer Science9
Richard D. Durtsche — Sabbatical Leave, Project Grant and Summer Fellowship Department of Biological Sciences10
Linda Dynan – Summer Fellowship Department of Economics and Finance
Ana England — Sabbatical Leave Department of Visual Arts
Vickie Coleman Gallagher — Summer Fellowship Department of Management

Diane Gronefeld — Sai Scho	bbatical Leave ool of Nursing and Health Professions13		
Yi Hu — Summer Fello Depa	owship artment of Computer Science		
Douglas W. Hume — S	Summer Fellowship rtment of Sociology, Anthropology and Philosophy15		
Jennifer Jolly-Ryan — Chas	Sabbatical Leave se College of Law		
Ken Katkin — Sabbatio Chas	cal Leave se College of Law16		
Young S. Kim — Sumn Depa	mer Fellowship rtment of Economics and Finance		
Yasue Kuwahara — Sa Com	abbatical Leave nmunication Department17		
William J. Landon — P	Project Grant urtment of History and Geography		
Isaac Larison — Projec Depar	ct Grant rtment of Teacher Education and School Leadership		
Aron M. Levin — Sabb	patical Leave artment of Marketing20		
Table of			
	Contents		
Table Yushi (Boni)) Li — Project Grant Department of Sociology, Anthropology and Philosophy	20	
of Bernard Loh	r — Project Grant Department of Biological Sciences	21	

Contents

P. Andrew Miller — Sabbatical Leave	
(continued) Department of English22	
Kevin Muente — Sabbatical Leave Department of Visual Arts	22
Scott Nutter — Sabbatical Leave Department of Physics and Geology	23
Tamara F. O'Callaghan — Sabbatical Leave Department of English	25
Robert T. Rhode — Sabbatical Leave Department of English	26
Erin Robinson — Summer Fellowship School of Nursing and Health Professions	27
Kenneth Ryack — Summer Fellowship Department of Accountancy	28
Kurt Sander — Project Grant Department of Music	29
Sharon Vance — Summer Fellowship Department of History and Geology	30
James Walden — Summer Fellowship Department of Computer Science	31
Robert K. Wallace — Sabbatical Leave and Project Grant Department of English	31
Eileen Weisenbach Keller — Summer Fellowship Department of Marketing	33
Robert W. Wilcox — Sabbatical Leave Department of History and Geography	34
Steven Wilkinson — Sabbatical Leave Department of Mathematics	35

INTRODUCTION

This is documentation involved with the procedures of processing the faculty developmental programs for the academic year of 2007-08 and the summer of 2008. Three faculty development programs are currently in place at Northern: sabbatical leaves, summer fellowships, and project grants. A qualified faculty member may apply to one, two or all three of these programs to aid in their research & academic endeavors. We encourage, inform and invite all interested faculty applicants during the various stages the of application process. We continue to try and bring greater awareness to this academic benefit that not only is substantial to the university but to the personal, professional core mission of our faculty members. An individual's enlightenment reflects on to everyone. It is an honor to support it even brighter!

Sabbatical Leaves are granted by the university to promote the professional growth and effectiveness of the faculty. Sabbatical leaves are granted to enable recipients, based on merit, to devote additional time to scholarly activity and research, advanced study, or artistic performance

 all in pursuit of academic objectives. Tenured, full-time faculty and department chairs are eligible to apply for sabbatical leave. In 2007-08, 18 of the 26 faculty members who applied were awarded for a sabbatical leave.

Summer Fellowships provide funds to support professional development during the summer months. Examples of types of activities that may be applicable include: improving teaching skills; research; scholarly writing; creative or artistic projects; preliminary studies and literature searches; and attending seminars or courses related to one's field or professional work. Full-time tenure-track or tenured faculty may apply for a faculty summer fellowship. 14 faculty members out of the 24 that applied were awarded a fellowship for summer 2008. These 14 faculty members received an award of \$6,000 a piece.

Project Grants provide funds to pay expenses, purchase equipment, and to cover other financial needs for sabbatical leaves, faculty summer fellowships, and for other instructional, scholarly, and creative activities where financial support is not available through department budgets. Full-time tenure-track or tenured faculty may apply for a project grant not to exceed \$6,000. **In 2007-08**, **of the 25 faculty members that applied for a project grant, 10 faculty members were awarded a project grant.**

Faculty Development Programs

At

Northern Kentucky University

PROJECT GRANT 2007-2008

Rats

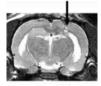
Bardgett, Department **Psychology**



Mark

of

Day 1



Day 14



Day 28

MRI Studies Brain Injury in

The goal of this project was to determine if small animal magnetic resonance imaging or MRI could be used to detect subtle forms of brain damage in laboratory rats. The research was conducted in collaboration with Dr. Diana M. Lindquist, Director of the Small Animal Imaging Facility at Cincinnati Children's Hospital Medical Center and performed at Dr. Lindquist's lab at CCHMC. To achieve the goal of this project, we surgically infused a small quantity of the neurotoxin, N-methyl-D-aspartate or NMDA, into one side of the hippocampus of adult male rats. Dr. Lindquist's lab then imaged both sides of the brain in these animals at 1, 14, and 28 days post-infusion. The animals were then sacrificed on day 29 post-surgery and sections of brain tissue containing both sides of the hippocampus were mounted onto slides for area measurements. We found that brain damage induced by NMDA could be recognized through small animal MRI imaging (see Figure 1). This important finding suggests that longitudinal imaging studies can be conducted in an animal model of brain injury using the same animal each time, as opposed to using separate cohorts of animals at each time point of interest. Such methods should reduce the number of animals needed in neuroscience research projects and provide a more valid and consistent estimate of changes in brain structure as a function of time. At this point, we will likely incorporate these data into a future manuscript describing the effects of damage to the hippocampus in rats on spatial memory.

Figure 1 (at left). Damage produced by infusion of NMDA into the rat hippocampus. The arrows indicate areas of tissue density loss (Day 1) and outright tissue loss on Days 14 and 28. Note that the other side of the hippocampus appears normal.

SABBATICAL LEAVE 2007-08



Robin M. Bartlett, Department of Psychology

Course Development

Objective 1: Research related to a new "Developmental Science Laboratory" course

In the summer of 2006, I was selected to participate in workshop designed to introduce attendees to "virtual new, lab" technology computer intended for use in teaching developmental science. As part of my participation in the workshop, piloted some of the programs in my child development courses during

Objective 2: Exploration of writing a textbook to enhance PSY 210R

s i g n i f i c

2006-07academic year in an effort to assist the software developer with feedback on the effectiveness of the modules in teaching developmental science. My primary sabbatical goals included reviewing the other available modules and conceptualizing how they could be used in a developmental science lab class. Consistent with these goals, I accomplished the following:(a)researchedexistingresources(e.g.,textbooks)forteachingdevelopm ental science research-based courses, (b) thoroughly examined all of the lab modules from the workshop and identified several that I would liketo usein my developmentalscience lab class, (c) developed possible course materials (e.g., reading questions, exercises and assignments) for the selected lab modules, and (d) developed a tentative course syllabus. In addition, the following accomplishments related to this project are worth noting: (a) I analyzed pilot data that I collected in 2006-07 and prepared two written reports that were submitted to the developer of the technology; and (b) I collaborated with the developer of the software and three other pilot testers on a manuscript detailing the use and effectiveness of the virtual labs in teaching developmental science. After roughly five drafts, the manuscript is nearing completion and should be submitted for possible publication in the near future. Finally, I am pleased to report that, consistent with my goal of offering the course as a special topics class during the academic year that I returned from sabbatical, I will be teaching the course in the spring of 2009. If all goes well, I subsequently will complete the appropriate paperwork to have the course added to our curriculum, thereby giving students an opportunity to "do" developmental science and enhancing their educational experiences.

ant amount of my time on sabbatical was devoted to the development of a book prospectus for a course entitled, "Career Planning for Psychology Majors." I spent the fall semester researching and reviewing existing texts on the market (e.g., examining their strengths and weaknesses, conceptualizing how the text would differ from those currently on the market, etc.). In the spring, my time was devoted to preparing a "working draft" of the book prospectus. Following the guidelines provided by a textbook publisher, the prospectus includes a detailed outline of the proposed chapters. Originally, I had hoped to not only prepare the prospectus, but also submit it to the publisher along with several sample chapters. In

a goal as the preparation of the proposal alone required a substantial amount of time. I currently am teaching the course this semester and am continuing to work on the prospectus. I hope to have the sample chapters prepared and the prospectus submitted within a year.

East of Northern: An International Arts Initiative of Northern Kentucky University

Dr. Kurt Sander, Dr. David Cole and I each received individual Faculty Project Grants to support our participation in a joint concert with the Pleven Philharmonic Orchestra in Pleven, Bulgaria on February 2, 2007. Planning for this event had begun in July, 2006 when a friend of Dr. Cole's alerted him to the Professional Development Program for Conductors. This organization, directed by Tanya Tintner, widow of Viennese conductor Georg Tintner, matches conductors, depending on the kind of concert they want to do and the size and proficiency of the orchestra, with appropriate orchestral organizations in Eastern Europe. Most of the placements are in Bulgaria, Rumania, Poland and the Czech Republic.

Kurt, who calls himself "the gatherer" for the project, collaborated with David during the summer of 2006 to shape the musical content of the concert program and to develop it into the first of a series of projects titled the *East of Northern International Arts Initiative*, an arts program aligned with the Vision 2015 Strategic Plan for Northern Kentucky. In a recent interview with Cincinnati Post arts reporter Mary Ellyn Hutton (*Eastern Europe Meets NKU*, Cincinnati Post, 4/12/07), Dean Kevin Corcoran commented on the significance of our project: "'East of Northern' is part of a larger effort to increase NKU's international presence....We recognize that we've got to pay attention to more than our own backyard, both with respect to getting NKU's name out and recruiting students from other parts of the world and to get our students and faculty out to other parts of the world."

Kurt and David selected the opening and closing works for the concert, the premiere of a work by Dr. Sander entitled "Pantocrator," and Dvorak's Symphony No. 8, and invited me to join them in the *East of Northern* project in a performance of a piano concerto. I selected the Beethoven Piano Concerto No. 3 in c minor.

The concert was extremely successful and was very well received by the warmly enthusiastic audience who rewarded us with a standing ovation. For me, the opportunity to play with a professional European orchestra was a revitalizing experience and prepared me well for my performance with the NKU Philharmonic on April 9, 2007. For David, the Pleven concert project afforded the chance to work with a professional orchestra and to flex his conducting muscles in repertoire that might overtax a student orchestra. For Kurt, the project was obviously a wonderful

PROJECT GRANT 2007-08

Diana Belland, Department of Music

vehicle for the premiere of his new piece and an opportunity "to have an experience with a group of musicians with a different world perspective."

As for the benefits of our concert project for Pleven and its music loving citizens, Mary Ellyn Hutton pointed out, "the former Communist bloc countries benefit from renewed exposure to the arts." Says Kevin Corcoran, "They've been deprived for a number of years of anything resembling free expression of arts....it's been a very traditional approach, with political statements." It was apparent to us that music, a vital element of the town's life, was something to be treasured even-or especially--- in the midst of economic hardship, and we felt genuine appreciation for our efforts from both orchestra and audience alike.

In keeping with the spirit of the Vision 2015 Strategic Plan for Northern Kentucky, the *East of Northern International Arts Initiative* intends to develop a long-range series of international arts experiences with select countries of Eastern Europe. The concert with the Pleven Philharmonic was followed by a Bulgarian-American music festival in March, 2008 at NKU featuring Bulgarian composers and musicians.

SUMMER FELLOWSHIP 2008



Liza Abram Benham, Department of Political Science and Criminal Justice

Research and Course Development in Political Science

To all concerned, please accept my deep appreciation for enabling me to have a productive and professionally rewarding summer of 2008. Your support is especially important to me as a new faculty member, aiding my growth as an educator and as a researcher. As described in my application for a Summer Research Fellowship, I have completed (1) an abstract and a working bibliography for a conference paper, and later journal submission, on present-day political economy implications of the sexual commercialization of a century ago and (2) a sample syllabus, lectures and related preparation as part of creating a new course on African American presidential campaigns. The new course will be launched in spring 2009. I also completed preparations for assuming teaching responsibilities fall 2008 for two existing courses in the American Presidency and Political Parties and Elections.

Even more rewarding for my summer work was the realization that a research paper submitted by a former student fits well with the paper described above. The student has agreed to be a co-presenter at a conference (most likely the American Political Science Association 2009 annual meeting) and a co-author for a subsequent journal article. I also have a handshake agreement with a faculty colleague to develop a book

manuscript on a related topic. The student might also participate in the latter.

The interaction with a faculty colleague was part of a larger effort to establish contacts both within and outside academe, linkages that could benefit my growth as a teacher and a researcher, including in obtaining grants and contracts.

Again, I wish to thank the leadership in Kentucky higher education, both at NKU and beyond, for commitment to fostering faculty development. Your support will assist us as we seek to educate leaders to continue in your tradition.

Keynes' General Theory: Seventy-Five Years Later _{SABBATICAL}

The purpose of my sabbatical was to begin work on a project involving an edited LEAVE work on a book by J. M. Keynes, *The General Theory of Employment Interest and Money*. This work, published in

1936, provided the impetus for the development of the branch of economics known as macroeconomics. The title of my edited work is *Keynes' General Theory: Seventy-five Years Later* to be published by Edward Elgar, a publisher who specializes in the history of economic thought. The scheduled publication date is 2011, which coincides with the 75th anniversary of the publication of the *General Theory*.

The individuals listed below have agreed to contribute to the

project:

Roger Backhouse University of Birmingham [UK]

Bradley Bateman Grinnell College Paul Davidson The New School

Robert Dimand Brock University [Canada]

Michel deVroey Catholic University of Louvain [Belgium]

Peter Docherty University of Technology [Australia]

Giuseppe Fontana University of Leeds [UK]

Claude Gnos University of Bourgogne [France]

Don Moggridge University of Toronto [Canada]

Elke Muchlinski Free University of Berlin [Germany]

Edward Nell The New School

Lee Ohanian UCLA

Lall Ramrattan Cal-Berkeley

Plan of the book: Table of Contents, List of Contributors, Editor's Introduction, (Overview of the book and Brief summary of each contribution), Contributors' essays, Bibliography, and Index.

Louis-Philippe
Rochon
Laurentian
University
[Canada]
Roy Rotheim
Skidmore
College
Michael
Szenberg
Pace
University



Tom Cate,
Department of
Economics and Finance

Making the

Case for a University-School District Collaborative: Linking Graduate Coursework and Job-Embedded Professional Development

During the summer of 2008 I was awarded a Faculty Summer Fellowship to support my research exploring how to establish and support a university-school district collaborative. In my research I employed a mixed-method evaluative research model in order to examine the effectiveness of an already existing partnership between the College of Education and Human Services and The Kenton County School District that combines graduate level courses and job embedded professional development. I used the following research questions to guide my data collection and analysis:

- What does a university-school district graduate job-embedded partnership look like?
 How effective is this new professional development model where teachers are engaged in a sustained learning community with the focus on professional practices and teachers as learners where their work is situated in actual classroom practices?
 - Who benefits from this partnership?

I used multiple methods of data collection to assist me in evaluating effectiveness, such as surveys, student data from teachers involved, and survey monkey responses from participants. As a result of this fellowship I

was able to make several state and national presentations on the topic (Kentucky Teacher Quality Summit and AACTE), submit a paper for publication (JOURNAL OF TEACHER EDUCATION), create a

EDUCATION), create a course template to be used by others as they engage in this type of partnership, and establish a data base of teachers involved in this project for both district use and university use in future planning and program assessment.

SUMMER FELLOWSHIP 2008



Lane W. Clarke, Department of Teacher Education and School Leadership

SABBATICAL LEAVE 2007-08

Paul D. Cooper, Department of Construction Management

Building Construction Management Education in the Philippines



The Technology Building housing the shop of various trades.

As the Cebu State College of Science and Technology

(CSCST) in the Philippines instituted a new Bachelor of Science degree in Civil Engineering, an agreement was reached to include all the Construction Management courses from the Northern Kentucky University (NKU) Construction Management program. The decision was made to call it a major in Construction Management within the Civil Engineering Degree Program and design it as a five-year degree program. As an Associate Professor in Construction Management at Northern Kentucky University, the author served as a visiting professor at CSCST during the time of the program formation, from November 12, 2007, to July 1, 2008. The Construction Management (CM) major is the first CM program in the Philippines and is modeled after the program at NKU. The author has taught for 23 years at NKU and been the developer, program coordinator, and Department Chair of the Construction Management program during this time. During his sabbatical, he team-taught first year courses with the Civil Engineering faculty.

SABBATICAL LEAVE 2007-08



Mary Carmen Cupito, Communication Department

on of Breast and Prostate Cancer in News Magazines, 1980-2007

The Depicti

My sabbatical research was motivated by two photographs, one in *Time* and one in *Newsweek*. The *Time* magazine cover photograph showed a thin young woman, hands crossed over her naked upper body, to illustrate a news story about breast cancer. The other, in *Newsweek*, showed a middle-aged man decorously lifting his T-shirt above the waistband of his pants to reveal the top of a scar left by his prostate cancer surgery. These photographs prompted me to wonder how the two top news magazines had depicted the two top "female" and "male" cancers over time.

Following a review of the literature, I hypothesized:

that photographs of women would remain sexually objectified over time, while images of men would not;

that
photographs
accompanying breast
cancer stories would be
more likely to use
models rather than real
patients, compared with
photographs
accompanying prostate
cancer stories;

that news stories that reported on sexual effects of these diseases would be more likely to run sexualized images, or at least photographs of people with their sexual partners, than those that did not mention sexual effects.

An undergraduate

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student helped me to find and photocopy every illustrated news story about breast and prostate cancer in *Time* and *Newsweek* between 1980 and mid-2007. These magazines were chosen because they had been the largest circulating news magazines in the country throughout the study period, and because previous research indicated that they were less likely than women's or men's magazines to use stereotypical images in reporting the news. In addition, the Time and Newsweek websites, which have additional reports not found in the print versions, were searched, although they yielded no new photographs.

Using elements of photographs that have been examined in previous research of stylistic choices made by photographers, I created an Objectivity Index that included the level of nudity, dismemberment (defined as head and face visible, part of face visible and no head visible), camera angle (low, equal eye level, and high), gaze of subject (toward viewer's eyes, toward another subject in image, downcast/off frame), and posture (frontal, side view/toward another person in picture, back view). Each of these variables was coded with a number, and the numbers were summed, with a higher total indicating a greater measure of objectification. I devised a Realism Index also, which included the setting (realistic, nonrealistic), age of subject (over 60, 3560, under 35), and the type of subject pictured (patient or model. A higher total score indicated less realism. Stories were also rated for whether the text mentioned the age-related risk of these diseases, their effects on sexual health, and somatic risks, such as obesity and genes. dent to code the photographs so that we both could examine them and our results could be compared. Unfortunately, I have run into some statistical problems with intercoder reliability tests, and I have

Book Development/Publication: Questioning the Future Existence of Nursing

sought advice and aid from a colleague about this

The effort involved the acquisition of a new knowledge and skills to initiate and complete a publication project. The topic was the questionable future existence of nursing as a profession. A confluence of factors were examined that could bring about the predicted premature end of the profession. This possibility is important as nursing constitutes the largest group of health care providers in the United States. A change in the status or existence of this group could bring negative changes for the public, its health and indirectly higher education.

One of the new areas of content for me was foresight projection, also known as Future Studies. This specific discipline's methods of data collection and analysis and research rigor have been used by the U.S government, the military and other entities for a number of years. The project allowed me to read extensively on the topic and attend a conference for professional foresight projectors, the World Future Society Annual Conference. I realized that I will need to increase the number, range and direction of scenarios to include in my work. I was also able to network with professional foresight projectors. Because of this networking opportunity I am now able to solicit feedback for the scenarios from professional foresight projectors. I am continuing to work on this project. In the Spring semester of 2009 I plan to produce a document for publication.

Ann M. Dollins, School of Nursing and Health Professions

Improving the Robustness of Linesearch Barrier Optimization Methods

I was awarded \$4900 to improve the robustness of MELBA, a barrier linesearch algorithm developed in MATLAB for my PhD dissertation. Following is a summary of the finances and work accomplished with these funds.

A total of \$4,601.17 was spent on this project. A Dell Linux machine was purchased for \$3,250.00. This machine was requested to support analysis of problems with large matrices which current desktop systems cannot handle. MATLAB was purchased for \$500 with funds awarded from Research Grants and Contracts for participation in their Grant Writing Workshop and a subsequent proposal submission. The remaining funds supported a student worker, Jeremy Henage.

The Linux system was built, configured and maintained by the computer science student, Jeremy Henage. In August, 2007 I visited with Dr. Uday

Shanbhag at University Illionois, Urbana Champaign and we discussed some ideas for collaboration. Uday used MELBA in his PhD dissertation and hoped we could collaborate. We discussed my plans for and other **MELBA** possible areas of research and he hypothesized

PROJECT GRANT 2007-08

Maureen Doyle, Department of Computer Science

that the uninterrupted time needed to effectively work on MELBA might be difficult to come by during an academic year. Uday was upbeat however and suggested that there were still many nonlinear optimization problems available that could be researched. As a result of this discussion, we agreed to a 2-prong approach for fall, 2007: Improve the robustness of MELBA and begin to look into PDE (Partial Differential Equation) constrained optimization to see if the algorithm behind MELBA could be an efficient solver. Depending on our results, we would choose one of the prongs for the remainder of the academic year.

Configuring Linux, MATLAB and setting up a source control system took a majority of fall, 2007. I was also researching PDE solvers and the SIAM Conference on Optimization submission due dates was arriving. Uday suggested yet another twist where we would consider variational inequalities (Vis). These are equilibrium optimization problems with PDE constraints and my earlier work might be leveraged in this area. We proposed a session on VIs for the 2008 SIAM Conference on Optimization. Our proposal was accepted, and we spent spring, 2008 developing a method to solve level 0 VIs. I visited Uday in March, 2008 to finalize the mathematics. We presented our work at the SIAM Conference on Optimization in Boston on May 12, 2008.

The DELL system is used not only for my research, but for managing code source in our Software Engineering course, CSC 440. It is my hope that NKU believes these funds were adequately used and the presentation at the SIAM conference summarizing the work is sufficient. My work with Uday is on hold for the near-term. Uday has had pressure from his institution to focus on publishing his dissertation and work with his PhD students. My work with MELBA continues at a slow pace.

SABBATICAL LEAVE 2007-08

PROJECT GRANT 2007-08

SUMMER FELLOWSHIP 2008

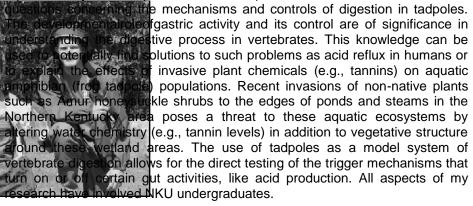
Department of **Biological Sciences**

Richard D. Durtsche.

Understanding

the Developmental Mechanisms and Control of Gastric **Activity Using Tadpoles as a Model System**

research was to explore the functional capacity of digestion in frog tadpoles in aquatic ecosystems exposed to invasive plants, and to focus on a series of



development, we carried out a series of growth experiments with

tadpoles raised in leaf teas from the honeysuckle and native

plants. We replicated these experiments both here at NKU and in

northern Minnesota where the tadpoles would not have exposure

intent my

To test the of impact honeysuckle tadpole

Amur of 0

to this invasive honeysuckle. poles from both areas have significantly reduced digestive capacities (assimilation efficiencies of caloric content and protein) when raised in honeysuckle teas. Moreover, when tested, the young froglets that were raised in honeysuckle teas had decreased fitness (locomotor capacity) when compared to tadpoles raised in native plant teas.

These results indicate the impact of these invasive to local aquatic ecosystems and provide evidence for land managers to plan for plant control measures.

> To investigate measurements Ωf digestive activity, have been working on stomach tissue preparation techniques inventing and fabricating new tools to allow us to measure acid production in tadpoles. Our inventions include a microelectrode that will allow us to probe into the gastric pits of tadpoles stomachs, inject a drug, food, or test chemical, and then record the responding change in acid production from the stomach tissue.

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amber with exchangeable sleeves а that holds open and С sustains stomach tissue for extended periods of analysis while bathing the tissue in nutrient а solution. I am exploring the potential for patents t on these tools. After е many trials, we now have histological preparations t of stomach tissue that h e will allow for the s measurement of gene activation e

associated with digestive enzyme and acid production. m I indicate "we" or "our" as these studies are ecollaborative between myself and many of my aundergraduate research students. I had seven sstudents work with me during the spring semester, uand five students over the summer. One student rwrote and received a Greaves Summer Research eFellowship on a related topic. She also received 1st splace for her poster presentation of our work at the , national Tri-Beta Biology Honor Society meeting that was hosted at NKU this past summer. Two wother students received 3rd place in Biochemistry eand Physiology poster session at the Kentucky Academy of Sciences this November. Since last hspring I have personally presented results of this aresearch with the undergraduates as co-authors at vtwo national/international meetings, elocal/regional meetings, and to the NKU community as a Biology Department seminar. With this minformation, I wrote two and received one NSF abased grant for over \$100,000. I am currently dworking on a manuscript of these results with eundergraduates as co-authors for submission to an international journal.

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The Atlantic Economic Society has invited me to guest-edit the September 2009 edition of *The Atlantic Economic Journal*, the Society's flagship publication. I have proposed that my special issue of the *Journal* focus on the contribution of economic scholarship to understanding and reducing health disparities across US racial and ethnic subpopulations.

As part of this larger project, I have agreed to write a keynote paper for the *Journal*, which will include a broad ranging literature review of the contribution of economic (rather than sociological or medical) scholarship to our understanding of the causes and consequences of the observed racial health status gap among US subpopulations. In this keynote paper, I will also place the work of the issue's contributors in context. The title of the article is (as of now):"What Economic Scholarship Tells Us about the Racial Health Status Gap in the United States: A Synthesis." The invited contributors include:

Gloria Bazzoli, Virginia Commonwealth University: *The Role of Safety-Net Hospitals*.

Thomas McGuire and David Grabowski, Harvard Medical School : Black-White Disparities in Care in Nursing Homes

SUMMER FELLOWSHIP 2008

Linda Dynan,
Department of
Economics and Finance

Darrell Gaskin, University of Maryland: *Impact of Residential Segregation on Health Disparities* Pinka Chatterji, SUNY Albany: *Health Disparities and Labor Market Outcomes*. Albert Okunande, University of Memphis: *To be determined*.

Emilia Simeonova, Columbia University: Disparities in the VA System.

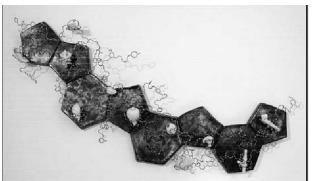
I proposed to use my NKU summer faculty fellowship to develop a manuscript that includes a comprehensive literature review and an analysis of the literature related to US health disparities across racial and ethnic subpopulations (white, African American, and Hispanic). The manuscript will ultimately be published in the September 2009 issue of *The Atlantic Economic Journal*.

I am on track to complete the project as proposed. As of August, approximately 100 articles by authors from the American Society for Health Economists (932 members) who have written on racial health disparities have been reviewed, summarized in tabular format and coded by categories of interest. Refinement and updating of the manuscript will continue until January 2009 at which time the manuscript will be due in order to be published in the *AEJ* September 2009 special issue.

SABBATICAL LEAVE 2007-08

Ana England, Department of Visual Arts

The Oak and the Artist



My project was to make a series of artworks based upon the flora and fauna associated with the oak (*Quercus*). Through reading and direct observation, I studied how one genus of tree is a nucleus for the overlapping life cycles of many forest inhabitants. Of particular interest to me is the point of intersection of one species with another, with the implication that the existence of any one entity, whether it is a moth or a woodpecker, is dependent upon a complex yet delicate web of interdependent relationships.

During my sabbatical, I alternated observations with idea development and fabrication of artwork. For example, the idea for the piece *Soil Song* began with sitting under an oak looking at the soil. At first, I pawed down into the dirt, pushing away leaves, acorns, branches and feathers, looking for minute forms, so decayed as to become unrecognizable as distinct entities. But what *is* soil? Where does soil begin? Fallen branches and seeds, the bones of birds, the chunks of rock are also in the process of decay. At what point, at what size do they become soil? To an alien or an astronaut looking down at the earth, we are all part of an organic ooze covering the landscape. So am *I* soil? I am certainly an agent of soil production as I tramp around the hills and ravines, breaking up fallen twigs and leaves.

Soil Song is one of 10 sculptures completed for my sabbatical project.

Stressful Workplace Conditions: An Exploration of Corporate Culture and Role Stressors that Lead to Political Behaviors and Tension

My research explored role overload (in the workplace) and how it leads to supplication (i.e., pretending not to know how to do something so you can get out of the task). In my mediation model, supplication then lead to turnover intentions. Next, I conducted moderation in SPSS using simple regression. I do indeed have

moderation. The interaction graph below helps to explain the results. When employed in a company that has a *low culture of supplication*, the use of supplication *by the employee* leads to turnover intentions. However, if the company has a high culture of supplication, the use of supplication by the employee does not lead to increased turnover intentions. This concept is consistent with "fit" perceptions, such that a match between an organizational culture and one's individual personality or values will lead to positive outcomes whereas "misfit" leads to negative outcomes.

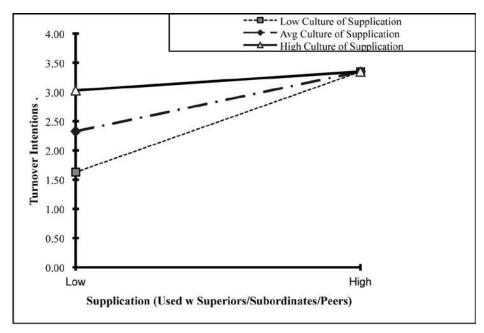


Figure 1: The Interaction of Supplication and a Culture of Supplication on Turnover Intentions

SUMMER FELLOWSHIP 2008

Vickie Coleman Gallagher, Department of Management

Creation of Interactive Learning Modules for Web-Enhanced RAD Courses and Refurbishment of Radiographic Film File



The goal of my sabbatical project was to create interactive learning

modules for web-enhanced RAD courses, with radiographic anatomy as the subject of the modules.

In the Radiologic Technology Program, students are not only taught the specific radiographic projections in which patients must be positioned to demonstrate the anatomy, but how to critique the images that are the end product of the exam. Therefore,

Sabbatical Leave 2007-2008

Diane Gronefeld,

School of Nursing and Health Professions

students learn to examine the radiographic images and evaluate them for anatomical and positioning accuracy. Mastery of radiographic anatomy can be extremely challenging. Since I began teaching the subject in 1989, I've created various study aids for students, including a film file, photographic slides, labeled radiographic images and PowerPoint slides that are posted on Blackboard. Creation of interactive modules was a natural progression for me.

The initial part of my project involved collecting radiographic exams and evaluating them for technical accuracy and teaching effectiveness. If the images were not in digital format, I photographed and edited them. A colleague assisted with photographing bony structures so these images could be included as well. Using Lectora Authoring Software by Trivantis, I set up presentation modules for four RAD courses and incorporated nearly three hundred images. To make the modules interactive, I introduced animation by placing a small dot on important anatomic structures and then adding a mouse-over effect with labels. The resulting presentations let the students view the radiographic images and quiz themselves on the various structures. As they move the mouse over the dot, a label identifying the structure pops up.

The work involved in creating the modules was time-intensive but very gratifying. Before returning to NKU this summer, I was able to achieve my goal of creating the modules and have already implemented them into RAD 200, 208 and 303. I plan to introduce them into RAD 209 in the spring semester. For this academic year, I'm loading specific modules into Blackboard to correspond with the material covered in the course. The students enrolled in the courses will be able to access the modules. I'm tracking student use and have also asked the students to provide feedback in the form of suggestions and criticism. So far, 100% of the students have accessed the modules and their comments have been positive. My ultimate goal is to package all of the modules on one CD. Since there is no such product currently available for purchase in the radiographic discipline, I hope to attract the interest of a publisher in marketing the product as self-instructional media or a study aid for students.

The sabbatical was a rewarding time for me. I've wanted to create interactive modules since first taking a Lectora class several years ago in the Professional and Organizational Development Center. Having a year without teaching responsibilities provided me with the opportunity and time necessary to initiate such a task as creating the interactive modules. I am delighted with the results of my work on the project and feel that I have developed a valuable tool to assist students learning radiographic anatomy. By supporting faculty development efforts such as mine, it is obvious that the University encourages the faculty's creativity and enthusiasm for teaching.

SUMMER FELLOWSHIP 2008



Yi Hu, Department of Computer Science

Identity Information Attacks Toward Corrupting Data Using a Holistic Approach

Based on the project plan for the summer fellowship, I carried the following research tasks in the summer:

- (1) I developed a data mining method for clustering user transactions into user tasks. A user task is a group of database transactions that are semantically related to perform a user task. This step is to facilitate processing time series transaction data for discovering inter-transaction data dependency.
- (2) I designed a database intrusion detection model employing inter-transaction data dependency mining for detecting well-crafted attacks that consists a group of seemingly harmless database transactions. I also implemented a simulation that verified the advantage of our proposed model.
- (3) I wrote the following paper based on the result of the research funded by the faculty summer fellowship:

Yi Hu and Brajendra Panda. Mining Inter-transaction Data Dependencies for Database Intrusion Detection. Submitted to the 24th Annual ACM Symposium on Applied Computing.

Manuscript and Grant Writing for Anthropological Research in Eastern Madagascar

During the summer of 2008, I rewrote two manuscripts and wrote one manuscript for publication. All three manuscripts are currently being reviewed and commented on by colleagues before their planned submission to peer-reviewed journals at the end of the calendar year. The first manuscript, "Malagasy Swidden Agriculture: The Influence of Conservation Organizations on Indigenous Knowledge," will be resubmitted to the American Anthropologist, a premier peer-reviewed journal in anthropology. The second manuscript, "Rice Varieties in Madagascar: Merchants' and Farmers' Schemas," will be resubmitted to Culture and Agriculture, the journal of the Culture and Agriculture Section of the American Anthropological Association. The third manuscript, "Medicinal Plants as Conservation Capital in Andasibe, Madagascar," will be submitted to Human Organization, the journal of the Society for Applied Anthropology.

I also wrote and submitted a National Science Foundation grant ("RUI: The Influence of Kinship on Swidden Farming Ritual Knowledge in Madagascar" RUI/BCS-0849168). The grant was written for the Division of Behavioral and Cognitive Sciences, Cultural Anthropology. Since NKU is primarily an undergraduate institution, this grant was submitted for additional consideration to the Research in Undergraduate Institutions Division. The total amount requested for the grant was \$129,940. Within the budget, I requested funds for two undergraduate students from NKU to accompany me to Madagascar as research assistants.

I am highly confident that after receiving comments from my colleagues and a final revision of my manuscripts, they are likely to be accepted for publication by the journals listed above. I am also highly confident that my grant will be funded. Both the program officer and colleagues have responded well to the research project. The awarding of this summer fellowship allowed me to concentrate on writing the summer, which will benefit not only my road towards tenure and promotion, but also research at NKU and my undergraduate students.

SUMMER FELLOWSHIP 2008



Douglas W. Hume, Department of Sociology, Anthropology and Philosophy

During my sabbatical leave this past year, I wrote a guide book for prospective law students with disabilities. The guide book is entitled, "Disabilities to Exceptional Abilities: Choosing the Right Law School and Getting In."

The purpose of the guide book is to help people with disabilities gain access to law school and help them succeed as law students and lawyers. A broader purpose is to benefit the disability community in general, as lawyers from a protected or minority class are often instrumental in helping members of their class overcome barriers. Most guide books for prospective law students devote only a paragraph or two to people with disabilities. There is little information upon which a prospective law student with disabilities can base decisions about a career in law or going to law school. The guide book is intended to bridge this information gap.

The guide book provides an overview of disability laws, including the legal obligations of law schools and bar examiners to provide accommodations to people with disabilities. In addition, it will help students with disabilities navigate the law school application process, everyday life during law school, the bar examination process, and careers after graduating from law school.

The approach of the guide book is "how to." In addition to raising many

SABBATICAL LEAVE 2007-08 questions to consider in deciding whether to go to law school and if so, which one, a "tool box" is included at the end of the guide book, full of web sites, books, and other resources for the prospective law student to help them choose a law school.

On October 30, 2008, I shared with the NKU Chase College of Law faculty what I learned during my sabbatical about how to make our law school more disability friendly. I presented

"Accommodating Law Students in the Classroom" as part of our Faculty Workshop Series. The flyer for the workshop circulated within the legal community and over twenty law faculty attended my presentation. am currently looking for a publisher for my guide book.



Jennifer Jolly-Ryan, Chase College of Law Fact Under the First Amendment

SABBATICAL LEAVE 2007-08



Ken Katkin, Chase College of Law

The First Amendment to the United States Constitution' generally protects the freedom of speech and of the press. Thus, expressions of unorthodox opinion are strongly protected by the First Amendment. Good-faith errors and inadvertent mistakes of fact are similarly protected. Intentionally-told lies, however, are not always protected by the First Amendment. For example, the First Amendment does not protect perjury, commercial fraud, defamation, libel, slander, misrepresentation, false or misleading advertising, filing false income tax forms, or falsely shouting "fire" in a crowded theater—though all of those activities involve "speech." On the other hand, certain types of "white lies" are thought to fall within the First Amendment's protection. Such protected "white lies" might include false flattery or insincere compliments, unrealistic or unjustifiable expressions of optimism, modest puffery, or dissembling to protect human life. Such "white lies" have been said to be constitutionally protected because they cause little or no harm to any "victim." In addition, "white lies" may also derive First Amendment protection prophylactically, as a means of safeguarding the expression of unorthodox opinion.

For my sabbatical project, I reviewed hundreds of court cases and scholarly articles in order to formulate general rules for treatment of "false statements of fact" under the First Amendment. In the end, I concluded that the First Amendment does not protect knowing falsification of historical, literary, or scientific data in connection with the advancement of opinions, though it does protect the right to make unorthodox interpretations of data.

False Statements of

SUMMER FELLOWSHI P 2008



Young S. Kim, Department of Economics & Finance

Which
Monitors
Monitor the
Most? DualStock
Structure and
Corporate
Governance

the We examine effects of internal and external corporate governance monitoring mechanisms on the choice of dualclass status and the performance firm dual-class firms. Employing 736 dualclass firms and 7,027

Residency at Nanzan University in Nagoya, Japan

spent my sabbatical leave in the spring semester of 2008 at Nanzan University in Nagoya, Japan. Nanzan's International Education Center (IEC) recently established a faculty exchange program and I was chosen as the first visiting professor. The position enabled me to teach a course for students enrolled in the IEC programs as well as to use the university's resources for my research project. I taught a course on Japanese popular culture and conducted a literature review as well as collected data for my research on Japanese television programs.

My class began on January 17. Because this was the first time a course on Japanese popular culture was offered at the International Education single-class firms during the period 1996-2002, we find that dual-class firms tend to be larger, and have higher director ownership, higher institutional ownership, lower blockholdings, and a smaller fraction of independent, outside directors on their boards than single-class firms. In addition, we observe that dual-class firms are followed by a smaller number of security analysts. After correcting for endogeneity bias, our regression results show that not only firms with higher analyst coverage, but also firms with higher analyst following and a lower wedge, measured as the difference between voting rights and cash flow rights, or lower managerial entrenchment are strongly associated with Tobin's q. In contrast, blockholders' ownership, board independence, and institutional ownership play a relatively insignificant role in enhancing Tobin's q. We interpret these results to mean that security analysts are the most effective monitoring mechanism that influence both the dual-class choice and firm performance. Our results are not attributed either to the difference in firm size or to an industry effect.

The initial goal for this project was to present the paper at the National, or International conference, and eventually publish in a high quality peer review journal. I presented the paper at the Financial Management Association in Dallas, TX on Oct 2008. More importantly, I am planning to submit the paper into one of the top journals in the finance area (Journal of Finance or Journal of Financial Economics) in the near future.

Center, 29 students were enrolled, a little more than I had expected. These students came from different regions of the world—Taiwan, Philippines, England, Finland, Latvia, Canada, and the United States. We met 2 hours and 25 minutes once a week for 16 weeks. An overall average score on the course evaluations administered at the end of the term was 4.37 on the 5-point scale which I thought was good. Students' comments also indicated that they not only thought the course was good but their interest in the subject increased. I enjoyed teaching Japanese popular culture in Japan because students could actually experience what we discussed in class. The class at IEC was fun to teach and went well.

Regarding my research, I examined a type of television program generally known as "wide show." Japanese television networks produce this type of program that targets women in their 30s and above who stay home all day. A typical program consists of celebrity gossip, investigative reports on recent crimes, and discussions on political and economic issues. These "wide shows" dominate daytime programming on Japanese television, starting at 5:30 a..m. and continuing through 4:00 p.m. They attract female viewers more than soap operas; in fact, the number of soap operas in recent years has declined, being replaced by "wide shows". I had been fascinated with the enormous popularity of "wide shows" but never stayed in Japan long enough to watch these shows and collect sufficient data for analysis. My stay at Nanzan gave me a long-awaited opportunity to find out what made "wide shows" so appealing to Japanese women and why.

Throughout February, I logged 8 different wide shows daily. Consequently, I realized that each show focused on a different type of stories; for instance, of the three shows that aired between 8-10 a.m. *Sukkiri* focused on celebrity gossip and *Super Morning* covered crime stories more than the other two shows. In the following months, I continued to log *Asa Zuba!* because it had higher ratings than other shows and because the show's host Mino Monta was highly regarded among TV viewers. I continued to watch other programs as well. By the end of June I logged over 200 pages of *Asa Zuba!* and other shows.

In the meantime, I reviewed the existing studies on the wide shows, using the resources at Nanzan University Library which provided me with access to Japanese periodicals. Because of the increased interest in Mass Media Studies among Japanese scholars in recent years, there were more studies done on the topic than I had expected. These studies ranged from the content analysis of the shows to the shows' influence on the perception of reality

viewers. among the One aspect which I didn't find in any existing studies was the comparative study of wide shows with similar types of programs in other cultures. I have alwavs thought that wide shows were a mixture of morning shows, talk shows, and tabloid shows in the U.S. I plan to use the data I collected in Japan to analyze how similar or different wide shows and these U.S. programs were.

There were a few unexpected bi-products of my sabbatical leave at Nanzan. First, I found several new possible research topics, such as director Takeshi Kitano and his movies which were more popular among the non-Japanese audience than the Japanese people and the feminization of Japanese men, including the rise of transvestites on TV. Secondly, I was solicited to submit a paper for the *Journal of the*

SABBATICAL LEAVE 2007-08

Yasue Kuwahara, Communication Department

International Education Center. I am currently working on a paper on the changing perception of foreigners among Japanese to fulfill this request. Lastly, I discussed with the IEC director the possibility of creating a summer program at Nanzan for NKU students. Upon my return from Japan, I also talked with Dr. Mike Klembara of the International Programs about a possible summer program. Both the IEC director and Dr. Klembara were interested in the program idea and we decided to continue our discussion. Hopefully, I can contribute to the internationalization of NKU in the near future by offering students an opportunity to study in Japan.

As described above, the six months spent in Japan were very rewarding to me in many ways. I am thankful to the University for awarding me a sabbatical leave.

PROJECT GRANT 2007-08

William J. Landon, Department of History and Geography
The Epistola fatta per la peste: Transcribing Two Italian Manuscripts and Photographing
Florence, Italy



For my 2007-2008 Faculty Project Grant, I set out and completed a very rigorous research agenda, which entailed travel to Florence, Italy, and especially to two archives there: the *Biblioteca Nazionale Central* and the *Biblioteca Medicea Laurenziana*. In those archives, I examined two manuscripts of Lorenzo di Filippo Strozzi's *Pistola (Epistola) fatta per la peste*, or a *Letter Written Concerning the Plague*. After an exhaustive comparison of those manuscripts, I was able to determine that there are at least three hundred variations between them. I am now finishing a "definitive" Italian edition of the *Pistola*.

This has been a wonderful project and I hope that my final published results will stimulate other scholars in the field of Renaissance studies to examine further the influential, though almost entirely neglected, life of Lorenzo di Filippo Strozzi. The final part of my research project which was funded by a Project Grant involved

producing a complete of a translation of the Pistola. I am delighted to report to you, that this is finished as well. There has only been one translation of the Pistola into English and that was produced in the early twentieth century. That translation was flawed, relying on only one of the Pistola manuscripts, and it was incorrectly attributed to Niccolò Machiavelli. So, my translation breaks new ground by relying on a complete Italian edition and by attributing the Pistola to the correct author. The new translation and Italian critical edition of Strozzi's Pistola now make up the centerpiece of my second book. I have already been offered a contract to publish it. If all goes well it will be in print by 2010.

PROJECT GRANT 2007-08

Isaac Larison, Department of Teacher Education and School Leadership

Reading Success: Α Cross-Cultural Comparison

This project examined the reading success of 6th graders in six

different schools in Denmark and the USA. Money from the grant provided funds for two graduate students from NKU to assist me with the collection of data in the USA and Denmark. The project began in the spring semester of 2007 and was completed in the summer of 2008. This fall we presented at the National Council of Teachers of English in San Antonio, TX.

The graduate students, Ms. Katherine Mirrielees and Ms. Megan Miller conducted informal reading inventories with 100 students in three different schools in the Cincinnati and Northern Kentucky area in the spring of 2007. **During June of**

children of the same grade in three different schools in three different cities.

they continued assessing

Western Kentucky

paid for their travel and lodging costs and made it ipate in the summer study program in Denmark as students using the informal inventory and reading

ring the summer of 2008, an undergraduate student Ms. Andrea Heming University continued work on the project. She teachers and observed children working on group ng the analysis of the data, but our group presented ary/findings in November for a national audience.

als have been achieved with the funding from the grant? e funds from this grant allowed me to attain the first goal for this project. With the help of the two graduate students, I was able to administer nearly 200 reading assessments and questionnaires to 6th graders in

Denmark and the USA. This sample set of reading inventories provides better quality data to analyze the factors that contribute to reading success in English of 6th graders in Denmark and the USA.

The funds made it possible for me to survey 6th graders in both countries about their attitudes and experiences regarding reading to uncover and gather information about what Danish and American students say contributes to their achievement in reading. The survey may provide information about what may make Danish students achieve at an equivalent or higher level than the achievement of their American counterparts also.

2007, they continued their participation in this project through the Kentucky Institute for International Studies in Denmark where they helped conduct nearly 100 assessments with

The funds for this grant allowed me to make comparisons between the different school environments (urban private, rural public and suburban public) for this project. Each of the

SABBATICAL LEAVE 2007-08



Aron M. Levin, Department of Marketing

Endor ser Influe nce on Produ ct Judg ment and six school environments in the USA and Denmark serve a unique clientele and have a different educational structure or focus. However parallels between schools can be drawn.

On behalf of the students who benefited directly from the funding of this project, thank you. Their participation was crucial for administering the reading inventories and conducting the surveys with students in the USA and Denmark. Completing the project would have been impossible without their assistance.

Choice: A Comparative Study of Children and their Parents

According to the Federal Trade Commission, \$1.6 billion was spent by food and beverage marketers in 2006 to promote their products to youth under the age of 17. Placing cartoon characters on food packages is one strategy that targets children. Recently, there was an outcry from consumer groups claiming that characters such as SpongeBob Squarepants are partially responsible for American's growing obesity crisis because of the fact that they are often used to promote unhealthy products.

The present study examines how use of licensed cartoon characters, as well as familiar brand names, influences children's evaluations of healthy and unhealthy food products. **Main Research Question**

Are children (7-8 years old) and their parents influenced by the same factors in their food preferences?

How important to children are cartoon characters on food packages? How important to parents are endorsements from celebrities? How important is brand name familiarity?

Are healthy foods preferred to unhealthy foods by children and parents?

Do boys and girls differ in their preferences?

How do parents' personal preferences compare to their preferences for their children?

We examined these questions by varying these factors concurrently and obtaining ratings by children and their parents. **Summary of Findings**

41 children ages 7-8 and their parents rated packaged food products varied along the following dimensions: healthy/unhealthy products, familiar/unfamiliar brand names, endorser/no endorser. For children the endorser was a well-known cartoon character pictured on the package. For parents the endorser was a well-known celebrity providing a statement of endorsement. Brand name was more important than endorser for both children and parents. Parents and girls but not boys preferred healthy products. Parents showed greater health preference when choosing for themselves than when choosing for their child.

PROJECT GRANT 2007-08



Yushi (Boni) Li, Department of Sociology, Anthropology and Philosophy

Medicaid **Improvements** for Aging **Population** in the Greater Cincinnati Area

This program (The

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Admission Screening System Providing Options and Resources Today) in the state of Ohio has been examined as a case study. The purpose for studying this program is that Kentucky currently does not have a state-wide program to provide in-home services for aging individuals who need assistance with activities of daily living (eating, bathing or dressing etc.) and independent activities of daily living (tracking money, taking medicine or shopping etc.). The PASSPORT program in Ohio is a state-wide program that assists in the prevention of premature nursing home placement. This program provides services for those who only need some help in the home but do not need full nursing facilities. The operation of this program helps to alleviate some project financial pressures of the costs from nursing homes on the state budgets. concentrated on elders thus, the Medicaid program can further help more needy people with health who are 65 or older and care assistance. By studying the Ohio PASSPORT program, the advantages in poverty requiring social and current problems can be evaluated. These evaluations can provide assistance with health suggestions to states, such as Kentucky, to assess their current policies and care. This project studied offer possible improvements and consideration for the establishment of a the efficiency of utilizing state-wide health care program for older population. This information is the Medicaid system for beneficial not only to the state and aging people, but will also benefit policy elders. The PASSPORT makers, future generations and society as a whole by providing other care Pre- alternatives that are more cost efficient.

> on of limited time between 2007 and 2008, I have asked for a one year extension (2008-09) for this project. The Elderly Council offered me the data they had recently collected for evaluation of the PASSPORT program, but the data has only satisfied partially my research needs. I will need to do a face to face interview with PASSPORT program social workers, in order to collect more data. This project is expected to be completed at the end of spring, 2009.

The Role of Song and Vocal Performance in Extra-Pair Mating in a Bird Species of Concern



Birdsong is a remarkably complex vocal communication system that is in many ways ideal for investigating the interplay of genetic and social influences on the evolution of behavior. With the support of my faculty Project Grant, I recorded songs of colormarked grasshopper sparrows (Ammodramus savannarum) at the Chester River Field Research Center, Chestertown, Maryland during the summer of 2007. Recordings were made as a means of assessing song structure

in the population. Altogether, 74 adult males established active territories at the site during 2007. I obtained successful audio recordings of the songs of > 95% of these birds. I also videotaped nest visits by male and female sparrows at several active nest sites, and participated in a large-scale territory mapping effort that delimited the spatial boundaries for territories of all pairs of birds at the site. Studies at the Maryland field site were part of a long term conservation project examining the relationship between habitat restoration and the attraction of endangered and threatened bird species that rely on the restored habitats for breeding areas.

After I returned with these audio recordings, in the fall of 2007 and spring 2008, NKU undergraduates helped me analyze the recordings and evaluate the spectral and temporal structure of these songs in some detail. Once genetic data from our field site in Maryland have been analyzed by a colleague at Towson University, I will then be able to compare the songs of known sons with the songs of both their social and genetic fathers. By recording and territory-mapping almost all singing males at our field site, and videotaping nest feedings, I have a record of the social fathers and all male neighbors (possible extra-pair genetic fathers). Over the next several years, I hope to evaluate whether there is an influence of paternity on variation between song of a father and that of his son (in particular when the son is also the genetic progeny of the social father).

PROJECT GRANT 2007-08

Bernard Lohr, Department of Biological Sciences

SABBATICAL LEAVE 2007-08



P. Andrew Miller, Department of English

Creative Nonfiction

The purpose of my sabbatical was two-fold. I planned to study and explore and study a new area in creative writing studies, specifically creative nonfiction, as well as to start a project in that field. To pursue these goals, the first thing I did on my sabbatical was to attend the Writers in Paradise writing workshop at Eckerd College in St. Petersburg, Florida. I sent in a writing sample and application in the fall of 2007 and was accepted into the creative nonfiction workshop. The instructor was Roland Merullo, а highly regarded novelist and creative nonfiction writer. Mr. Merullo's advice as workshop well as his short lectures gave me a great start for thinking about this field

For one, I found that my creative nonfiction piece that I submitted

was lost somewhere between personal essay and academic prose. Second, I realized quickly that a successful creative nonfiction writer needs to be passionate about his or her subject matter. So, while I was interested in writing about the Great Miami River (the original idea for my project) I was not passionate about it. I took these ideas with me to the annual conference of the Associated Writing Programs, the next step in my sabbatical.

At the AWP conference, I concentrated on attending sessions devoted to creative nonfiction. I found one panel particularly interesting. It was a panel about writing about painful subjects and the effect that writing can have on family and friends.

After returning from that conference, I spent a month writing reflections and observations. While they started off on the original topic of the Great Miami River, I soon started exploring personal memories and issues. My mother had died the year before and that event and I started focusing more on memoir and personal essays instead of nature essays.

In March, I took some passages and an essay to the Kentucky Philological Association annual conference and read it there. The essay was well received. I later read that essay as well as some poems and a short story when I was invited to read at Madisonville Community College by the Madisonville Pride Alliance.

I continued writing and working on essays, my focus now on personal essays, memoir, and lyric essays. I wrote several more essays and submitted them to journals along with stories that I had been working on.

While I began the sabbatical semester with a workshop, I ended the project with one as well. In July, I attended the Aegean Arts Circle Writing Workshop for eight days on the island of Andros in Greece. I workshopped the essays I had been working on and got excellent feedback on my own work. I also finished a new short story while there.

Because of the sabbatical, I now feel that I have a better understanding of this very popular genre. Besides writing and submitting my own work, I will be teaching a class on creative nonfiction in the Spring as an ENG 358 Writing in Creative Genres course. I have also developed and will be teaching a graduate workshop on creative nonfiction for the new MA in English program in Spring of 2010.

SABBATICAL LEAVE 2007-08

Visual Arts

Kevin Muente, Department of

"Making Muente's" (Paintings, that is!)

Overall this

sabbatical helped me make paintings for art shows as well as allowed me time to immerse myself in nature. I did two artist residencies, WildAcres in North Carolina (1 week in late October), and Rocky Mountain National Park (2 weeks in early June). I was also lucky enough to take a trip to California to make paintings in Yosemite and Point Reyes National Seashore. As part of a project grant I also visited the Olympic Peninsula to make paintings and a book with Bob Wallace from the Literature and Language Department. This project is still in progress and should be finished early 2009.



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KY, Fall Invitational Show2007, 25th anniversary show, September 2008

and Creative

Research Center figure drawing long pose sessions. Some of the artwork produced during my sabbatical has already been exhibited.

The following are a list of shows that I exhibited work in over the course of the year.

Gross
McCleaf Galley,
Philadelphia, PA,
The Landscape
Observed and
Imagined. August
2008, upcoming solo
show June, 2009

Heike Pickett Gallery, Versailles,

The Collector's Art Group, Cincinnati, OH, *I of the Storm*, September, *New American Paintings*, Juried exhibition in print, No.76 June-July United Way, Cincinnati, OH, *Beauty Matters*, April, 2008

The University Club, Cincinnati, OH, Art Show, December 2007

I was also allowed time to research New York Galleries and have one currently

interested in my work. Hopefully this will become a profitable enterprise for both our

parties.

2008

2008

Total number of paintings made including studies: 53
Total number of figure drawings made: 10 Thank you for giving me this sabbatical leave at such a crucial stage in my career, I hope that I've been worthy of the gift.

Particle Astrophysics Research on CREST and $_{\mathrm{SABBATICAL}}$ CREAM

Projects LEAVE

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e	Nutter, sabbatical leave.
a	Department of I took the
s e	Physics full 2007-08
d	academic and
-	Geology year, and
t	was able supplement
0	my 65% pay with grants
r	back to my full salary. I
r e	am fortunate to have
р	two ongoing grants in the form of subcontracts
Ö	to Pennsylvania State
r	University with NASA
t	funding. These projects
	have brought over
2	\$260,000 thus far in unmatched external
0	funding to the
0	University, with full F&A.
0	I am usually able to pay
7	for one class per
-	semester reassigned research time from
0	these grants. A
U	proposal for a third
8	project was submitted
	during my sabbatical.
0	My collaborators come from all parts of the
	world. On CREAM,
n	there are several US
	institutions and NASA
m	facilities involved, along
	with Koreans, French, and Russians. On
У	CREST, the institutions
	are all major research
a	universities in the US,
	such as the Universities
c	of Chicago and Michigan, and Indiana
t	University.
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С R Ε S Τ а n d C R Ε Α Μ t h е е s e а r С h р r O е С t S 0 С u

sed on during my sabbatical, are both NASAsponsored balloon-borne particle astrophysics experiments, but with very different goals. CREAM is measuring the relative abundance of different elements in the cosmic rays in a scientifically interesting energy range. Predictions are that the elemental relative abundances should be changing in this energy range as the supernova acceleration mechanism for cosmic rays reaches its upper energy limit. CREAM utilizes methods and detectors new to cosmic ray instruments for this energy range to directly measure through-going particles. The instrument has flown from Antarctica three times now, and is scheduled for a fourth time this coming winter, and a fifth time the following year. I led the instrument recovery team in this year's Antarctic flight and spent five weeks at McMurdo Station as part of that effort.

The CREST experiment will explore the abundance of cosmic ray electrons of very high energies that have not been explored previously, using a technique new to this field. The electrons will not be directly detected (which requires these rare particles to pass through the instrument), but instead will search for characteristic patterns of the photons emitted as synchrotron radiation (typically x-ray energies) as the electrons curve in the Earth's magnetic field. A 1/32 scale version of the instrument is scheduled to be launched this spring from New Mexico to test the electronic acquisition system, and the full instrument will be flown from Antarctica in December 2010. I hope to go on that expedition (I would need to leave campus around Halloween) and to take the student currently working on the project with me. I have become the Antarctica expedition expert within CREST.

My role in these projects is centered on both hardware and software responsibilities. I have built up a reputation in the design and fabrication of instrumentation based on detectors using plastic scintillator, and have built several detectors at NKU with student help that have flown in previous experiments. I am in the process of fabricating pieces of the CREST Antarctic instrument in my lab, with student assistance. The design is novel,

а n d w b e е р 0 r t е d n а

publication after the New Mexico flight. I also have been working on building software models of the CREAM and CREST instruments to simulate their responses, so we can better understand design considerations, efficiencies, backgrounds, instrument acceptance. I lead the CREAM3 simulation effort, and created the original CREST detector simulation which has been used by several collaborators in various studies.

I have written out some of my more consequential activities and accomplishments in list format below. I appreciate the fact that NKU offers the sabbatical opportunity (so many schools do not) and has worked with me to make it possible to participate in these exciting Antarctic expeditions.

- -Led Antarctica CREAM3 instrument recovery team, Jan-Feb 2008.
- -Kept blog of Antarctic expedition (antarctic-scott.blogspot.com) Α
- -Am now on PSU grad student Nick Conklin's PhD thesis committee. C
- -Multiple trips to PSU to work out design and fabrication issues on CREST veto counters
- -Multiple trips to IU in fabrication of veto fiber assemblies for use in CONUS flight
- -Still performed basic departmental duties: RPT, Benefits Committee t
 - -Elected to Senate as At-Large representative starting fall 2008
- -Noted major issue with CREST PMT signals which necessitated d**e**sign

Montreal.

i

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change in **CREST** acquisition electronics, and would have disastrous if not noticed.

heen

-Invited colloquium speaker at University of Maryland and University of Cincinnati on CREST. My talk was later used as the template for a talk at COSPAR 2008,

-Talks at CREST collaboration meetings: Antarctic Recovery Issues. Signal Issues, Veto Progress Report (in collaboration with PSU students)

-Asked to trouble-shoot CREAM TCD paddle fabrication methods at PSU by

new grad students after multiple failures. Successful completion (thus I am recognized at an expert in assembling these types of detectors).

Products:

- -Final design for CREST fiber assemblies and paddles
- -Fabrication method finalized for both
- -CREAM3 Monte Carlo written, potential close collaboration with

French

group at Grenoble.

-TRACER proposal submitted to NASA as PSU subcontract (\$120,000

over 3 years)

Major Publications:

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u c I e i at high energies with the first flight of the CREAM balloon-borne experiment. H.S. Ahn, P.S. Allison, M.G. Bagliesi, J.J. Beatty, G. Bigongiari, P.J. Boyle, T.J. Brandt, J.T. Childers, N.B. Conklin, S. Coutu, M.A. Duvernois, O. Ganel, J.H. Han, H. J. Hyun, J.A. Jeon, K.C. Kim, J.K. Lee, M.H. Lee, L. Lutz, P. Maestro, A. Malinin, P.S. Marrocchesi, S.A. Minnick, S.I. Mognet, S. Nam, S.L. Nutter, I.H. Park, N.H. Park, E.S. Seo, R. Sina, S.P. Swordy, S.P. Wakely, J. Wu, J. Yang,

Y.S. Yoon, R. Zei, S.Y. Zinn. Accepted for publication in Astroparticle Physics.

English Translation with Critical Introduction of Benoit de Sainte-Maure's *Roman de Troie*

During my sabbatical, I completed research and wrote a critical introduction to my English translation of Benoît de Sainte-Maure's *Roman de Troie*, a twelfth-century Old French poem that greatly popularized the story of Troy in the Middle Ages. One of the earliest and longest (over 30,000 lines) retellings of the Troy story, the *Roman de Troie* has long been recognized as an important medieval source for the many versions of the Troy story written afterwards, including Geoffrey Chaucer's *Troilus and Criseyde* and William Shakespeare's *Troilus and Cressida*, yet it has never been translated into English. I am now in the process of discussing its publication with Broadview Press.

My sabbatical work also included the preparation of two formal presentations for major international conferences in my field: the John Gower Society Congress (London, England) and the New Chaucer Society Congress (Swansea, Wales). Both conferences were held in Britain during July 2008 and provided me with the opportunity to network with other medievalists from around the world. My presentation for the John Gower Society is currently under consideration for publication.

While in Britain, I used the opportunity to collect a variety of unique materials for teaching medieval literature at NKU. Such materials included photographs of medieval sites throughout England and Wales, including the Church of St. Mary in the village of Ewelme where Alice Chaucer, the granddaughter of Geoffrey Chaucer, is buried. Her tomb is one of the few "transi tombs" in England. These two-tiered tombs are a sculptural form of memento mori ("Remember that you will die") and function as an allegory on the transient nature of earthly glory. Popular with the aristocracy, they depict the deceased in two very different effigies: the upper tier shows the individual

SABBATICAL LEAVE 2007-08

Tamara F. O'Callaghan, Department of English



Transi Tomb of Alice Chaucer, Duchess of Suffolk (d. 1475), in Church of St. Mary, Ewelme, Oxfordshire

in a lifelike, peaceful repose while

the lower tier depicts him/her as a shrouded, decomposing cadaver.

My sabbatical allowed me to attend the weekly Faculty Learning Community offered by the College of Arts & Sciences where I learned about the most current technology, such as podcasting and 3D virtual environments, for effective teaching in the classroom and online. During this period, I created an online version of the graduate-level Research & Writing course for the Integrative Studies program and began work with virtual environments, such as Second Life. In addition, I started research on the adaptation of medieval literature, specifically *The Canterbury Tales* and the legend of King Arthur, by contemporary Caribbean writers for the purpose of producing a future conference paper and publishable article.



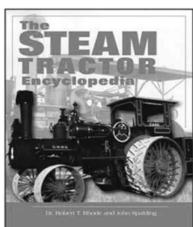
All in all, it is has been an extremely productive seven months.

Without question, I have returned to my teaching and research this semester invigorated and refreshed. I am extremely appreciative of the opportunities afforded to me because of my sabbatical and very grateful to NKU for awarding one to me.

SABBATICAL LEAVE 2007-08

Robert T. Rhode, Department of English

The South in the Era of Steam



My sabbatical during the 2007 fall semester was highly productive. I coauthored *The Steam Tractor Encyclopedia*, published by Quayside Group, the United States and England's
foremost publisher of booksonvintagevehiclesandthepremierpublisher of such books globally. My book
showcases John Spalding's extraordinary collection of historical photographs depicting agricultural steam
engines throughout Canada and the United States; I have written the text, which provides commentary on the
photographic archive and which situates the images in their historical and literary contexts. This work will
enhance my teaching of Studies in American Literature, my upper-division seminar on the literature and
history of the steam era. Devoted to the task of preserving the past for the benefit of future generations, John
has rescued an unparalleled treasury of photographic prints. He and I are delighted to share this collection
with an international audience likely to be surprised by the quantity, quality, and significance of these
photographs of the great North American steam engine. Quayside Group plans to invest considerable
resources

to market our book throughout the world. The encyclopedia is an oversized hardcover edition featuring over four hundred of John's images.

Early in my sabbatical, I found that the timing was right to shift my emphasis toward a book that would be truly comprehensive. I discovered in John Spalding of Nashville, Tennessee, a person willing to work tirelessly toward the goal of producing an authoritative work capable of securing the best publisher for our manuscript, and, ultimately, our co-authored proposal, complete with numerous writing samples, gained enthusiastic reviews from two outside readers. In a recent editorial, Richard Backus, one of Ogden Publications' leading editors, gave the encyclopedia advance billing as the most significant work on this subject in thirty years.

While I was on sabbatical, I also managed to publish my ninety-ninth, my hundredth, and my 101st articles on the subject of the literature and history of the steam era. (These articles bring my total of published articles to over 150, with more than a quarter of them in refereed journals.) Since January of 2007, I have published two articles in *Old Glory*, Great Britain's largest magazine in my field. The magazine's readership numbers in excess of 60,000. Editor-in-chief Colin Tyson says that only a handful of Americans have their work published in *Old Glory* annually and that only "tried and tested writers who know what they're doing" have their stories accepted for publication. My articles (co-authored with Raymond L. Drake) establish the influence of British design concepts on the American road-building and transportation industries of the late nineteenth and early twentieth centuries. My findings enhance themes that my students and I explore in my upper-division course on American literature produced during the age of steam.

Peer Based Mentoring/Tutoring for Success in Nursing

The purpose of the project was to summarize data for publication within an educational journal. Data has been continuously collected regarding success rates of peer mentoring/tutoring (PMTP) in nursing beginning with the spring of 2007 and continuing into this current academic semester. Upon completion of the identified summer fellowship project this faculty member prepared a manuscript eligible for publication as well as documentation of a structured process that can be generalized to other disciplines within Northern Kentucky

University.

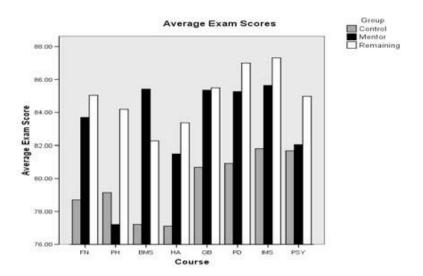
In fulfillment of the purpose and objectives stated in the summer fellowship application a manuscript has been developed for publication. The manuscript document was submitted to, Nursing Education Perspectives the journal of the National League for Nursing. Currently, the manuscript has been accepted with minor revision. The following paragraph is the abstract from the submitted manuscript.

Nursing academia is difficult and rigorous. As such, nursing programs are confronted with concerns related to student retention and attrition. This article describes the implementation and outcomes of a peer-based mentor tutor program (PMTP) for at-risk students in a traditional BSN program. Funding was obtained to provide scholarship incentives for student participants, and cover costs of training and materials. Criteria were determined for the selection of student mentors-tutors, and identification of students at risk. Interventions consisted of weekly PMTP sessions offered for the first four semesters of nursing courses. Course grades were used to determine outcome differences between control and intervention groups. Students in the intervention group were found to score significantly higher on both summative and final grades for the course than the control group.

The bar graph (on the next page) provides a representation of the academic outcomes for PMTP in 2007.

SUMMER FELLOWSHIP 2008

Erin Robinson, School of Nursing and Health Professions



SUMMER FELLOWSHI P 2008



Kenneth Ryack, Department of Accountancy

FN=Fundamentals, PH=Pharmacology, BMS=Beginning Medical Surgical Nursing, HA=Health Assessment, OB=Obstetrical PD=Pediatric Nursing, Nursing, IMS=Intermediate Medical Surgical Nursina. PSY=Psychiatric Nursing

Eas t of Nor ther n: An Inte rnat ion al Art s

faculty project grant, NKU colleagues David Cole, Diana Belland and

Examining the Relationship Between Credit Attitude and Financial Risk Tolerance Among Parents and their College-Age Children

The financial literacy crisis in the United States has sparked a growing body of research examining the factors that affect personal finance knowledge and decision making. Prior research indicates credit attitudes and financial risk tolerance affect debt levels and long-term saving/investment strategies. The literature also suggests parents may have a significant impact on the personal finance attitudes and behavior of their children. The goal of this research project was to investigate the impact of parents' credit attitudes and financial risk tolerance on their children's credit attitudes and financial risk tolerance.

A sample of approximately 380 incoming freshmen and 300 parents at a Connecticut university completed a survey instrument that included a financial risk tolerance scale and three subscales of a credit attitude instrument shown to be both valid and reliable in prior research. Initial analysis revealed a significant relationship between the financial risk tolerance of the mothers and children as well as a significant relationship between the credit attitudes of the fathers and children. However, these relationships lost their significance when other variables known to be predictive of risk tolerance and credit attitudes were entered into the equations.

Consistent with prior research, I found gender, education level, and income level to be significant predictors of risk tolerance, but to varying degrees among the parents as compared to their children. In addition, I found some other interesting relationships not previously identified in the prior research. For example, students that took a personal finance course or played a stock market game as part of a course in high school had significantly higher risk tolerance scores. These variables appear to account for variance above and beyond the variance contributed by factors found to be important in prior research (e.g., gender and income). Also, while the amount of time parents spent teaching their children about personal finance did not appear to influence risk tolerance and credit attitudes, there was a significant difference between the mothers' and students' estimates of how much time was spent teaching them.

Initiative of Northern Kentucky University



As part of a special

Kurt Sander from the project Department of Music made the trip in January to Pleven, Bulgaria, where they participated in a joint Selland concert with the Pleven

Philharmonic Orchestra. Cole, director of orchestral studies at NKU,

conducted. Belland, a member of NKU's piano faculty, was guest artist in Beethoven's Piano Concerto No. 3. The concert opened with the world premiere of theory and composition professor Sander's "Pantocrator."

The concert was well attended by residents of Pleven regional area as well as those in communities. outlying The days leading up to the performance were spent in rehearsals and informative discussions with the member of the orchestra. Many these musicians travel several hours to meet performance their obligations. Their instruments show signs age. but their performing skills seem to compensate for any shortcomings in this area. We exchanged a number of conversations about music and culture, and the had even opportunity to discuss the challenges of

running a professional orchestra with very little funding (something not unheard of in the States).

Unlike the US, however, Bulgaria is an economically challenged country where poverty and joblessness are facts of daily life. Yet, despite the stress of financial matters, we found that the people we met were not only welcoming, but remarkably positive about life. This is reflected in the arts which continue to flourish despite a paucity of funding and resources. I spoke with one gentleman who was a scientist at the local hospital who attends every concert of the Pleven Philharmonic. He was truly excited about our visit and had wonderful things to say about the concert. Although his English was limited, it was clear that this moment encapsulated what the international effort at NKU is really about. At its core, it brings people together to share in common love for the arts, for culture, and for humanity.

The East of Northern International Arts Initiative was developed by NKU music chair Kurt Sander as an arts program aligned with the Vision 2015 Strategic Plan for Northern Kentucky. One of the central missions of Vision 2015 is to shape this area into a "global-knowledge based economy" and a region "characterized by an international perspective, a climate of tolerance, and a culture of openness and inclusion that welcomes and finds strength in differences (Vision 2015: Shaping Our Future). The East of Northern Initiative articulates a similarly noble objective for the arts at NKU.

In keeping with the spirit of the 2015 plan, the East of Northern International Arts Initiative continues to develop a long-range series of international arts experiences with select countries and musicians of Russia and Eastern Europe. Such experiences will continue to occur here in our community, or in the community of each international partner. We anticipate that this initiative will eventually blossom into a broad-based exchange program where scholars and students from countries like Bulgaria, Ukraine, Poland, Romania, and Estonia will be able to exchange ideas and experiences, not only with the students and faculty of NKU, but also with the greater arts community in the nine-county service region of Northern Kentucky.

In addition to the benefits outlined in Vision 2015, the proposed "East of Northern" project directly enhances and extends the scholarly/research and creative activities that have been a part of my focus for the past 15 years. This piece, in many ways represents an orchestra culmination of the iconographic method of music

PROJECT GRANT 2007-08

Kurt Sander, Department of Music

composition. Currently, there is a substantial international interest in music rooted in Eastern Orthodox theology. This artistic direction I have termed "anagogic music" from the Greek word *anagogia*, which means "sensing the spiritual." The premiere of "Pantocrator" in Pleven (a city with a large percentage of Orthodox citizens) would draw significant regional attention from both the NKU and the Pleven communities and would attract national attention other orchestras who might be interested in programming such a work here in the US and abroad. The scheduled performance of his orchestral composition, *Pantocrator*, one of the components of the "East of Northern" project, by the Pleven Philharmonic in Bulgaria on February 1, 2007, will serve as a significant contribution not only to my ongoing efforts in the areas of research and creativity, but also will help bring greater focus to the international activities of the NKU community.

SUMMER FELLOWSHIP 2008

Sharon Vance, Department of History and Geography Solika La-Sadica

book I am writing on Sol Hatchuel -a young Moroccan Jewish girl who was publicly executed in Fez in 1834 after Muslims neighbors testified she converted to Islam. In addition, I was able to return to Israel and the West Bank after 15 years to work on another research project and on a video



I spent my summer grant and fellowship working on gathering primary sources for a

While there I interviewed Palestinians and Israelis about the current economic situation and its relation with the political situation. I was stationed in Jerusalem where I did research in the Jewish National and University Library and the Central Zionist Archives and traveled to Hebron, Sderot (on the border

Measuring the Security of Open Source Web Applications using Static Analysis

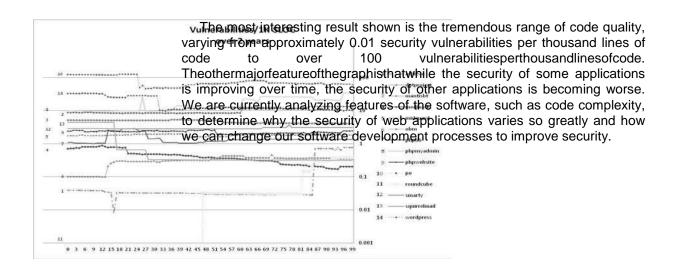
The rapid growth of e-commerce and online banking has

with Gaza) and Be'er Sheva in the Negev, where I interviewed the leader of the Bedouin movement, Nuri EI-Ukbi, and made contact with Shlomo Chertok of Ben Gurion University and spoke with him about setting up student exchange programs between BGU and NKU. We also discussed the possibility of conducting a Spring Break or summer abroad program in Israel and the West Bank for our students. In addition BGU has a number of excellent service learning projects that our students could potentially benefit from. Dr. Chertok and I spoke about the possibilities of conducting courses that would combine study on our campus, at BGU and field research in the Negev with different populations, including Middle Eastern Jewish populations and Arab Bedouin tribes.

All in all the summer was abundantly productive and will hopefully lead to many long term benefits for both my research agenda and for students at Northern. Deepening our active engagement with the region of the Middle East and North Africa is my top priority and I am happy that Northern is supporting this.

Thank you again for allowing me to receive these awards and conduct this research.

been paralleled by an equally rapid growth in computer crime. Much of this crime targets the web applications used to carry out online banking and ecommerce transactions. To measure the evolution of the security of web applications, we analyzed two years of code changes for several open source web applications, including such well known applications as MediaWiki, the software that runs Wikipedia, and Wordpress, the most popular blog software on the Internet. A summary of the results is displayed in the graph below.



SUMMER FELLOWSHIP 2007-08

James Walden, Department of Computer Science

Melville's Print Collection Reconstructed

The 2007-08 sabbatical leave allowed me to make excellent progress on the book I am writing on Herman Melville's print collection. My research into this subject began in 1984, when I discovered a larger group of prints in a county museum in Massachusetts. Since then, I have published nine essays about prints from the collection I have discovered in various public and private holdings. The book I am writing will bring together the 435 prints I have now discovered, documented, and inventoried (the last twenty of them through joint research with Dennis Marnon of the Houghton Library at Harvard). I am arranging the catalog entries according to the successive national schools and subjects, with each group of entries preceded by appropriate headnotes. During the sabbatical period I wrote 90 new catalog entries (from nos. 102 through 192) and wrote 370 new pages of the manuscript draft in its current 540-page form (completing both the Italian and French sections of the catalog). Among the new pages are a 45-page introduction for the projected book and a complete revision of the catalog entries for fourteen Song of Solomon prints in my Biblical section (whose elusive sources I found in two

emblem books published in Germany in the 1620s). This work during the sabbatical period was supported by a project grant which allowed me to acquire

SABBATICA L LEAVE 2007-08

PROJECT GRANT 2007-08

Robert K. Wallace, Department of English



reproductions of images to be used in the book and to take research trips to New Bedford, Massachusetts, and New York City (as summarized below).

Here are some highlights of what I was able to learn and do while completing the work summarized above: (1) Meeting with Dennis Marnon in January 2008, I integrated his newly discovered prints into my catalog and refined our plans for companion essays on our mutual finds. (2) Two Melville descendents provided me with new materials, one with a previously unknown print he has inherited, the other with a previously unknown photograph of the four Melville granddaughters who together were responsible for the prints that survive today. (3) Early in 2008 I was far enough along with my expanded work on the book to pause long enough to write a prospectus that I sent to six potential publishers (which necessitated writing the new forty-five page introduction mentioned above, in which I located Melville's collecting the context of other New York collectors in the 1870s and 1880s). (4) Writing the headnotes for the 68 prints in the French chapter gave me an entirely new appreciation of the historical and cultural, as well as aesthetic, value of the prints that Melville collected, an awareness that will enrich the rest of the book as I continue to write and revise. (5) I did much of my research at the Cincinnati Public Library and through interlibrary loan at NKU, but the opportunities to do research in the print room of the Berlin State Museum in August 2007 and at four New York City museums and libraries in June 2008 allowed me to make discoveries—and establish art historical contacts—that would have been possible in no other way. (6) In August 2008 I gave a talk at the Taft Museum in Cincinnati featuring the Italian prints from Melville's collection. (7) My work on the print collection in general was the cover essay in the first issue of *Discover*, NKU's new magazine on faculty research and creativity. (8) In June 2009 I will present a paper on Melville's Biblical prints at an international conference on Melville and the Mediterranean in Jerusalem. The photo is a reproduction of the image used on the cover of the inaugural Discover issue, Melville's copy of Piranesi's Arch of



the Emperor Marcus Aurelius.

The project grant for 2007-08 assisted the book I am writing on Herman Melville's print collection in two ways. First, it allowed me to purchase photographs of six images for reproduction in the book: a photo of four Melville granddaughters from a Melville descendant in Maine; photos of engravings after Cuyp, Velasquez, and Linton from the Cincinnati Public Library; and photos of engravings after Titian and van Ostade from the Berlin State Museum. Second, the grant allowed me to take two research trips essential to my work. In January 2008, I traveled to New Bedford, Massachusetts, to consult with Dennis Marnon of the Houghton Library at Harvard, who has discovered previously unknown prints from Melville's collection that I will incorporate into my inclusive catalog. In June 2008, I traveled to New York to do research in the print collections and art libraries of the New York Metropolitan Museum, the Frick Museum, the Morgan Library, and the New York Public Library. The photograph shows the four Melville granddaughters (never before published). Together, they and their descendents have been responsible for preserving the 435 prints that I have now discovered, documented, and inventoried from Melville's collection.

Global Brands with Local Missions: A Case Study of the YMCA Brand

Through this Fellowship I, with two co-authors, conducted a research study and completed a manuscript which is now under review for publication. This scholarly work advances the mission of our collegeand university to support multidimensional excellence by increasing understanding of our discipline and its application to an important part of the economy, the not-for-profit sector. A description of the research follows.

NPO Branding: Lessons from Major Players (2008) Weisenbach Keller, Eileen, Mary Conway Dato-on and Doris Shaw (September 2008) Under Review at the *International Journal of Nonprofit and Voluntary Sector Marketing*

Abstract: Are NPOs exhibiting the brand orientation believed to be critical to successful outcomes? To answer this question, we investigated the brand orientation and brand management of the YMCA, American Red Cross, and The Salvation Army to assess the implementation of brand concepts in two different locations within the USA compared to each agency's central body. Despite the support of some propositions, there exists inconsistent evidence of strong brand management in the organizations studied. The variation of brand visuals, missions and taglines indicate that good structure, policy and guidelines are not enough. There must be true brand orientation, which includes oversight of consistent application of all brand constructs to achieve organizational goals.

The following provides a sample of the research findings.

SAMPLE NPO LOGO, MISSION, TAG LINE COMPARISON

Name Logo Use Mission Statement Featured Tag Line

F A C U L T Y Development Programs — 33

SUMMER FELLOWSHIP 2008

Eileen Weisenbach Keller, Department of Marketing

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Diego County

We build strong kids, strong families, strong communities

At the			
YMCA we			
build			
character			

one kid at a time. For over 150 years, the YMCA has been committed to

building character in children, families and the community."

"It's for Everybody"

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SABBATICAL LEAVE 2007-08

Robert W. Wilcox, Department of History and Geography Innovation and Tradition: Cattle Ranching and the Environment in the Brazilian Far West



My sabbatical year was divided between Northern Kentucky and South America, specifically Brazil and Paraguay. The first months of the sabbatical were spent rewriting parts of a manuscript, including updating information that has become available recently. The manuscript, tentatively entitled "The Mirror of the Land: Cattle RanchingandEnvironment in the Brazilian Tropics: Mato Grosso, 18701950", is almost finished to my satisfaction and I have received strong interest in publication from a Brazilian publisher. In addition, part of the first half of the sabbatical involved the writing of an article entitled "Ranching Modernization in Tropical Brazil: Foreign Investment and Environment in Mato Grosso, 1900-1950", recently published in the premier U.S. journal of agricultural history, *Agricultural History*. I also wrote two book reviews to be published this year in the *Luso-Brazilian Review* and *Agricultural History*.

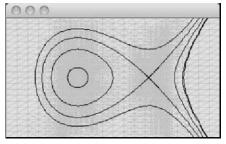
The second part of the sabbatical was spent primarily in Brazil and Paraguay where from December 2007 to July 2008 I was involved in various projects that included chairing a panel and presenting a paper at the IV Simpósio da Sociedade Latinoamericana e Caribenha de História Ambiental (Latin American and Caribbean Society of Environmental History -SOLCHA) in Belo Horizonte, Brazil, May 28-June 1, 2008. My paper was entitled "Cattle, Disease and Environment in Mato Grosso, Brazil, 1870s-2001", a subject that is particularly relevant in Brazil, the largest beef-producing nation on the planet. I also worked with colleagues to translate to Portuguese and update an article I wrote previously in English entitled "Os Paraguayos na construção do Extremo Oeste do Brasil, 1870-1935", recently published in the journal *Fronteiras* (Dourados, MS, Brasil: Universidade Federal de Grande Dourados). And I continued research on the subject of cattle and environmental history in the region and in neighboring Paraguay, where I made contact with some important historians, who are only just discovering the expanding field of environmental history.

A truly rewarding experience of the second half of my sabbatical was as a visiting professor teaching a graduate course in Portuguese entitled "História Ambiental das Américas" (Environmental History of the Americas) in the Master's History Program at the Universidade Federal de Grande Dourados (UFGD) in Dourados, Mato Grosso do Sul, Brazil from March to July, 2008. This was a wonderful experience for everyone involved, especially since it was the first time the department had offered a course in environmental history. I was struck by how similar most of the students are to many I teach at NKU. Most of my students were teachers in satellite cities and towns who have to drive or take a bus over 200 kilometers once or twice a week to attend classes, some to extend their teaching credentials, others to continue graduate studies in research. All engaged the material with zeal and intelligence despite distance and family obligations. It was particularly rewarding for me to have several students add environmental history to their thesis projects and to ask me to be a reader. I also spoke with the international programs office of the UFGD about possible student or faculty programs/exchanges and they are enthusiastic.

Since this is a "frontier" region that experienced most of the same issues of development and environmental pressures that the Amazon region suffers today, the results of my work will offer valuable historical perspective on issues that are continent-wide. While I have been in the region many times before, teaching at the university permitted me to expand contact with students, faculty and community, extending my understanding of regional issues and raising my profile as a historian of the area. As a result, I had the opportunity to offer various presentations to undergraduate and graduate students. And I was asked to become an international editor of a new history journal to be published by the Universidade Federal de Mato

Grosso do Sul (UFMS) in Campo Grande, the state capital. I very much look forward to being a part of this exciting new initiative.

Investigation of Families and Curves with Related Curvature and Torsion



A sabbatical is a good time to investigate

new ideas; some that may lead to results and some that may not. Two ideas I explored have proven to be fruitful for me, for students of mine, and for the mathematical community.

The Wolfram Demonstration Project is a new moderated repository of interactive

demonstrations of mathematical and scientific concepts that can be viewed by anyone that downloads a freeware *Mathematica* browser. *Mathematica* is a computer programming environment that has a large library of mathematical functionality. NKU currently uses it in CSC 270, an introductory computer programming class that is one of two programming classes required of all mathematics majors. During my sabbatical Don Krug, a colleague in the math department, approached me about collaborating on a demonstration that gives a graphical perspective of an important topic in complex analysis, a course he was teaching at the time. The demonstration is on Pólya vector fields that is linked to integration of complex-valued functions. It was developed and submitted to the Wolfram Demonstration Project. After review and some minor modifications, it was accepted and is now available to the public at the Wolfram Demonstration Project website: http://demonstrations.wolfram.com/. To find our demonstration, search on polya and click on "Pólya Vector Fields and Complex Integration Along Closed Curves." The Wolfram Demonstration Project provides the opportunity to involve students in research. For fall 2008 a sophomore student of my CSC 270, the programming course mentioned previously, worked on a demonstration of the reflective properties of conic sections.

Another idea I considered over my sabbatical is a concept in graphics called "adaptive meshes." Representing mathematical expressions as graphics, for example plotting the graph of a line, is accomplished by sampling the mathematical construct at particular values. The simplest techniques sample at evenly spaced values. The drawback to using evenly spaced sampling values is that to achieve a finer resolution of the graphic, one must choose more sample values across the board. However, the mathematical construct may only require finer resolution in limited areas; the remainder may not need the extra information from the sampled values. The extra sampling takes up valuable computer time which for some graphics can be significant. For example, in some mathematical algorithms for generating 3D graphics a "coarse resolution" may still require sampling several thousands of values.

Adaptive meshes achieves finer resolution by choosing sampling values on the fly only where needed. There have been some recent developments in this field that I wanted to understand and generalize. In the 2D contour plots shown, the

SABBATICAL LEAVE 2007-08

Steven Wilkinson,

black curves represent the mathematical Department of Mathematics

expression and the intersection points of the lighter lines are the sampling values; they are generated using an adaptive mesh. This plot came from my version of the algorithm implemented with the Java programming language.

l have working on extending this mesh adaptive concept to 3D contour plots. Meanwhile, I have a senior student implementing the 2D contour plot algorithm in Sage, open-source an alternative Mathematica.

A sabbatical is a wonderful opportunity different explore ideas without the pressure to get immediate results. In particular, besides the two I described here, I worked on two other topics neither of which came to much fruition. Having that time to take chances, knowing that some efforts might fail while still having time to follow other leads has been invaluable.

